



LIFE, ACCIDENT AND HEALTH COMPANIES/FRATERNAL BENEFIT SOCIETIES - ASSOCIATION EDITION

QUARTERLY STATEMENT

AS OF SEPTEMBER 30, 2024
OF THE CONDITION AND AFFAIRS OF THE

MASSMUTUAL ASCEND LIFE INSURANCE COMPANY

NAIC Group Code04350435NAIC Company Code63312Employer's ID Number13-1935920
(Current)(Prior)

Organized under the Laws ofOhio, State of Domicile or Port of EntryOH

Country of DomicileUnited States of America

Licensed as business type:Life, Accident and Health [X] Fraternal Benefit Societies []

Incorporated/Organized12/29/1961Commenced Business08/13/1963

Statutory Home Office191 Rosa Parks StreetCincinnati, OH, US 45202
(Street and Number)(City or Town, State, Country and Zip Code)

Main Administrative Office191 Rosa Parks StreetCincinnati, OH, US 45202513-361-9000
(Street and Number)(City or Town, State, Country and Zip Code)(Area Code) (Telephone Number)

Mail AddressPost Office Box 5420Cincinnati, OH, US 45201
(Street and Number or P.O. Box)(City or Town, State, Country and Zip Code)

Primary Location of Books and Records191 Rosa Parks StreetCincinnati, OH, US 45202513-361-9000
(Street and Number)(City or Town, State, Country and Zip Code)(Area Code) (Telephone Number)

Internet Website Addresswww.massmutualascend.com

Statutory Statement ContactRobert Mayhew Earle II513-361-9077
(Name)(Area Code) (Telephone Number)
rearle@mmascend.com513-345-9484
(E-mail Address)(FAX Number)

OFFICERS

PresidentMark Francis Muething

TreasurerBrian Patrick Sponaugle

SecretaryJohn Paul Gruber

Appointed ActuaryIsaac Cezar Hall

OTHER

Donna Marie Carrelli

Michael Harrison Haney

Dominic Lusean Blue

DIRECTORS OR TRUSTEES

Dominic Lusean Blue

Elizabeth Ward Chicares

Susan Marie Cicco

Geoffrey James Craddock

Roger William Crandall

Paul Anthony LaPiana

Sears Andrew Merritt

Mark Francis Muething

Michael James O'Connor

Eric William Partlan

Arthur William Wallace III

State ofOhio

County ofHamilton

SS:

The officers of this reporting entity being duly sworn, each depose and say that they are the described officers of said reporting entity, and that on the reporting period stated above, all of the herein described assets were the absolute property of the said reporting entity, free and clear from any liens or claims thereon, except as herein stated, and that this statement, together with related exhibits, schedules and explanations therein contained, annexed or referred to, is a full and true statement of all the assets and liabilities and of the condition and affairs of the said reporting entity as of the reporting period stated above, and of its income and deductions therefrom for the period ended, and have been completed in accordance with the NAIC Annual Statement Instructions and Accounting Practices and Procedures manual except to the extent that: (1) state law may differ; or, (2) that state rules or regulations require differences in reporting not related to accounting practices and procedures, according to the best of their information, knowledge and belief, respectively. Furthermore, the scope of this attestation by the described officers also includes the related corresponding electronic filing with the NAIC, when required, that is an exact copy (except for formatting differences due to electronic filing) of the enclosed statement. The electronic filing may be requested by various regulators in lieu of or in addition to the enclosed statement.

Mark Francis Muething
President

John Paul Gruber
Secretary

Brian Patrick Sponaugle
Treasurer

Subscribed and sworn to before me this13th day ofNovember 2024

Kelly Buller

- a. Is this an original filing? Yes [X] No []
- b. If no,
1. State the amendment number.....
2. Date filed
3. Number of pages attached.....



Kelly Buller
Notary Public, State of Ohio
My Commission Expires:
October 14, 2028

ASSETS

	Current Statement Date			4 December 31 Prior Year Net Admitted Assets
	1 Assets	2 Nonadmitted Assets	3 Net Admitted Assets (Cols. 1 – 2)	
1. Bonds	36,316,565,910		36,316,565,910	34,972,253,060
2. Stocks:				
2.1 Preferred stocks	344,615,346		344,615,346	201,026,229
2.2 Common stocks	782,622,435		782,622,435	716,418,595
3. Mortgage loans on real estate:				
3.1 First liens	4,871,113,543		4,871,113,543	4,256,509,561
3.2 Other than first liens.....			0	0
4. Real estate:				
4.1 Properties occupied by the company (less \$ encumbrances)			0	0
4.2 Properties held for the production of income (less \$ encumbrances)			0	0
4.3 Properties held for sale (less \$ encumbrances)			0	0
5. Cash (\$(36,065,196)), cash equivalents (\$3,076,821,811) and short-term investments (\$401,206,394)	3,441,963,009		3,441,963,009	2,211,326,604
6. Contract loans (including \$ premium notes)	28,001,955		28,001,955	29,952,551
7. Derivatives	728,227,749		728,227,749	771,436,338
8. Other invested assets	1,618,692,043		1,618,692,043	1,407,752,675
9. Receivables for securities	140,607,973		140,607,973	165,416,503
10. Securities lending reinvested collateral assets			0	0
11. Aggregate write-ins for invested assets	0	0	0	0
12. Subtotals, cash and invested assets (Lines 1 to 11)	48,272,409,963	0	48,272,409,963	44,732,092,116
13. Title plants less \$ charged off (for Title insurers only)			0	0
14. Investment income due and accrued	621,636,764		621,636,764	528,460,439
15. Premiums and considerations:				
15.1 Uncollected premiums and agents' balances in the course of collection	570,950	9,742	561,208	1,059,361
15.2 Deferred premiums, agents' balances and installments booked but deferred and not yet due (including \$ earned but unbilled premiums)	5,986,341	2,348,680	3,637,661	4,562,423
15.3 Accrued retrospective premiums (\$) and contracts subject to redetermination (\$)			0	0
16. Reinsurance:				
16.1 Amounts recoverable from reinsurers	1,461,391		1,461,391	2,547,295
16.2 Funds held by or deposited with reinsured companies			0	0
16.3 Other amounts receivable under reinsurance contracts	76,989,875		76,989,875	451,644,041
17. Amounts receivable relating to uninsured plans			0	0
18.1 Current federal and foreign income tax recoverable and interest thereon	44,879,622		44,879,622	16,025,216
18.2 Net deferred tax asset	366,221,135	27,525,419	338,695,716	272,753,525
19. Guaranty funds receivable or on deposit	5,123,197		5,123,197	2,034,538
20. Electronic data processing equipment and software			0	0
21. Furniture and equipment, including health care delivery assets (\$)	4,681,515	4,681,515	0	0
22. Net adjustment in assets and liabilities due to foreign exchange rates			0	0
23. Receivables from parent, subsidiaries and affiliates	944,431		944,431	719,602
24. Health care (\$) and other amounts receivable			0	0
25. Aggregate write-ins for other than invested assets	638,508,239	96,866,374	541,641,865	533,545,687
26. Total assets excluding Separate Accounts, Segregated Accounts and Protected Cell Accounts (Lines 12 to 25)	50,039,413,423	131,431,730	49,907,981,693	46,545,444,243
27. From Separate Accounts, Segregated Accounts and Protected Cell Accounts	828,180,593		828,180,593	443,319,567
28. Total (Lines 26 and 27)	50,867,594,016	131,431,730	50,736,162,286	46,988,763,810
DETAILS OF WRITE-INS				
1101.				
1102.				
1103.				
1198. Summary of remaining write-ins for Line 11 from overflow page	0	0	0	0
1199. Totals (Lines 1101 through 1103 plus 1198)(Line 11 above)	0	0	0	0
2501. Admitted Disallowed IMR	341,691,777	90,949,467	250,742,310	271,533,895
2502. Company-owned life insurance	228,117,151		228,117,151	223,142,978
2503. Accrued contractual fee income	28,857,400		28,857,400	32,372,894
2598. Summary of remaining write-ins for Line 25 from overflow page	39,841,911	5,916,907	33,925,004	6,495,920
2599. Totals (Lines 2501 through 2503 plus 2598)(Line 25 above)	638,508,239	96,866,374	541,641,865	533,545,687

LIABILITIES, SURPLUS AND OTHER FUNDS

	1 Current Statement Date	2 December 31 Prior Year
1. Aggregate reserve for life contracts \$ 34,975,240,789 less \$ included in Line 6.3 (including \$ 442,688 Modco Reserve)	34,975,240,789	30,159,722,538
2. Aggregate reserve for accident and health contracts (including \$ Modco Reserve)	55,129,135	52,438,219
3. Liability for deposit-type contracts (including \$ Modco Reserve).....	790,697,252	787,970,274
4. Contract claims:		
4.1 Life	152,120,328	164,654,288
4.2 Accident and health	633,473	622,620
5. Policyholders' dividends/refunds to members \$ and coupons \$ due and unpaid		0
6. Provision for policyholders' dividends, refunds to members and coupons payable in following calendar year - estimated amounts:		
6.1 Policyholders' dividends and refunds to members apportioned for payment (including \$ Modco)		
6.2 Policyholders' dividends and refunds to members not yet apportioned (including \$ Modco)		
6.3 Coupons and similar benefits (including \$ Modco)		
7. Amount provisionally held for deferred dividend policies not included in Line 6		
8. Premiums and annuity considerations for life and accident and health contracts received in advance less \$ discount; including \$ 27,524 accident and health premiums	185,211	94,251
9. Contract liabilities not included elsewhere:		
9.1 Surrender values on canceled contracts		
9.2 Provision for experience rating refunds, including the liability of \$ accident and health experience rating refunds of which \$ is for medical loss ratio rebate per the Public Health Service Act		
9.3 Other amounts payable on reinsurance, including \$ 856,644 assumed and \$ 96,766,976 ceded	97,623,620	684,959
9.4 Interest Maintenance Reserve		0
10. Commissions to agents due or accrued-life and annuity contracts \$ 3,499,642 , accident and health \$ and deposit-type contract funds \$	3,499,642	7,033,605
11. Commissions and expense allowances payable on reinsurance assumed		
12. General expenses due or accrued	59,554,566	56,305,815
13. Transfers to Separate Accounts due or accrued (net) (including \$ accrued for expense allowances recognized in reserves, net of reinsured allowances)		0
14. Taxes, licenses and fees due or accrued, excluding federal income taxes	31,236,612	0
15.1 Current federal and foreign income taxes, including \$ on realized capital gains (losses)		
15.2 Net deferred tax liability		
16. Unearned investment income	275,518	290,364
17. Amounts withheld or retained by reporting entity as agent or trustee	1,501,454	1,539,199
18. Amounts held for agents' account, including \$ 2,035,294 agents' credit balances	2,035,294	1,182,367
19. Remittances and items not allocated	87,067,306	109,425,533
20. Net adjustment in assets and liabilities due to foreign exchange rates		
21. Liability for benefits for employees and agents if not included above		
22. Borrowed money \$ and interest thereon \$		
23. Dividends to stockholders declared and unpaid		
24. Miscellaneous liabilities:		
24.01 Asset valuation reserve	583,957,465	528,429,311
24.02 Reinsurance in unauthorized and certified (\$) companies		0
24.03 Funds held under reinsurance treaties with unauthorized and certified (\$) reinsurers		
24.04 Payable to parent, subsidiaries and affiliates	1,030,776	771,693
24.05 Drafts outstanding		
24.06 Liability for amounts held under uninsured plans		
24.07 Funds held under coinsurance	7,732,650,077	9,967,999,333
24.08 Derivatives	457,048,144	528,221,597
24.09 Payable for securities	431,355,570	315,096,798
24.10 Payable for securities lending		
24.11 Capital notes \$ and interest thereon \$		
25. Aggregate write-ins for liabilities	1,318,141,636	812,010,876
26. Total liabilities excluding Separate Accounts business (Lines 1 to 25)	46,780,983,868	43,494,493,640
27. From Separate Accounts Statement	828,180,593	443,319,567
28. Total liabilities (Lines 26 and 27)	47,609,164,461	43,937,813,207
29. Common capital stock	1,507,500	1,507,500
30. Preferred capital stock		
31. Aggregate write-ins for other than special surplus funds	0	0
32. Surplus notes		
33. Gross paid in and contributed surplus	815,178,800	815,178,800
34. Aggregate write-ins for special surplus funds	250,742,310	271,533,895
35. Unassigned funds (surplus)	2,059,569,215	1,962,730,408
36. Less treasury stock, at cost:		
36.1 shares common (value included in Line 29 \$)		
36.2 shares preferred (value included in Line 30 \$)		
37. Surplus (Total Lines 31+32+33+34+35-36) (including \$ in Separate Accounts Statement)	3,125,490,325	3,049,443,103
38. Totals of Lines 29, 30 and 37	3,126,997,825	3,050,950,603
39. Totals of Lines 28 and 38 (Page 2, Line 28, Col. 3)	50,736,162,286	46,988,763,810
DETAILS OF WRITE-INS		
2501. Derivative collateral	1,228,360,410	763,875,478
2502. Unclaimed property	36,476,520	32,408,582
2503. Accounts payable	53,304,706	15,726,816
2598. Summary of remaining write-ins for Line 25 from overflow page	0	0
2599. Totals (Lines 2501 through 2503 plus 2598)(Line 25 above)	1,318,141,636	812,010,876
3101.		
3102.		
3103.		
3198. Summary of remaining write-ins for Line 31 from overflow page	0	0
3199. Totals (Lines 3101 through 3103 plus 3198)(Line 31 above)	0	0
3401. Admitted Disallowed IMR	250,742,310	271,533,895
3402.		
3403.		
3498. Summary of remaining write-ins for Line 34 from overflow page	0	0
3499. Totals (Lines 3401 through 3403 plus 3498)(Line 34 above)	250,742,310	271,533,895

SUMMARY OF OPERATIONS

	1 Current Year To Date	2 Prior Year To Date	3 Prior Year Ended December 31
1. Premiums and annuity considerations for life and accident and health contracts	6,628,896,779	6,237,052,163	8,506,770,768
2. Considerations for supplementary contracts with life contingencies			0
3. Net investment income	2,097,747,738	1,200,637,020	1,918,445,895
4. Amortization of Interest Maintenance Reserve (IMR)	(38,384,222)	9,223,239	10,386,002
5. Separate Accounts net gain from operations excluding unrealized gains or losses			0
6. Commissions and expense allowances on reinsurance ceded	(29,286,869)	83,323,417	70,233,642
7. Reserve adjustments on reinsurance ceded			0
8. Miscellaneous Income:			
8.1 Income from fees associated with investment management, administration and contract guarantees from Separate Accounts.....			
8.2 Charges and fees for deposit-type contracts	8,340,358	9,990,766	11,936,497
8.3 Aggregate write-ins for miscellaneous income	36,876,747	33,783,463	47,277,222
9. Totals (Lines 1 to 8.3)	8,704,190,531	7,574,010,068	10,565,050,026
10. Death benefits	12,246,657	10,720,241	16,774,548
11. Matured endowments (excluding guaranteed annual pure endowments)	2,451,346	8,601,120	11,937,177
12. Annuity benefits	609,013,788	533,372,221	715,138,835
13. Disability benefits and benefits under accident and health contracts	3,563,359	3,205,343	4,296,617
14. Coupons, guaranteed annual pure endowments and similar benefits			0
15. Surrender benefits and withdrawals for life contracts	2,038,153,493	1,747,160,521	2,434,702,622
16. Group conversions		0	0
17. Interest and adjustments on contract or deposit-type contract funds	115,481,097	123,999,667	156,850,177
18. Payments on supplementary contracts with life contingencies		0	0
19. Increase in aggregate reserves for life and accident and health contracts	4,818,330,013	4,305,418,289	5,901,776,775
20. Totals (Lines 10 to 19)	7,599,239,753	6,732,477,402	9,241,476,751
21. Commissions on premiums, annuity considerations, and deposit-type contract funds (direct business only)	360,780,670	282,379,208	393,686,528
22. Commissions and expense allowances on reinsurance assumed	403,107	377,238	498,774
23. General insurance expenses and fraternal expenses	126,364,211	119,224,412	169,800,801
24. Insurance taxes, licenses and fees, excluding federal income taxes	42,129,300	10,035,988	12,712,335
25. Increase in loading on deferred and uncollected premiums	(466,985)	(654,266)	(372,198)
26. Net transfers to or (from) Separate Accounts net of reinsurance	370,827,521	194,537,674	356,807,133
27. Aggregate write-ins for deductions	194,889,821	0	0
28. Totals (Lines 20 to 27)	8,694,167,398	7,338,377,656	10,174,610,124
29. Net gain from operations before dividends to policyholders and federal income taxes (Line 9 minus Line 28)	10,023,133	235,632,412	390,439,902
30. Dividends to policyholders and refunds to members	7,630	5,893	8,940
31. Net gain from operations after dividends to policyholders, refunds to members and before federal income taxes (Line 29 minus Line 30)	10,015,503	235,626,519	390,430,962
32. Federal and foreign income taxes incurred (excluding tax on capital gains)	70,065,112	162,704,841	241,836,467
33. Net gain from operations after dividends to policyholders, refunds to members and federal income taxes and before realized capital gains or (losses) (Line 31 minus Line 32)	(60,049,609)	72,921,678	148,594,495
34. Net realized capital gains (losses) (excluding gains (losses) transferred to the IMR) less capital gains tax of \$ 65,765,586 (excluding taxes of \$ (25,064,566) transferred to the IMR)	(111,422,620)	(121,224,803)	(153,692,165)
35. Net income (Line 33 plus Line 34)	(171,472,229)	(48,303,125)	(5,097,670)
CAPITAL AND SURPLUS ACCOUNT			
36. Capital and surplus, December 31, prior year	3,050,950,603	2,832,582,838	2,832,582,838
37. Net income (Line 35)	(171,472,229)	(48,303,125)	(5,097,670)
38. Change in net unrealized capital gains (losses) less capital gains tax of \$ 92,606,681	230,522,607	138,718,228	165,317,385
39. Change in net unrealized foreign exchange capital gain (loss)	27,917,886	(6,610,316)	19,905,727
40. Change in net deferred income tax	149,944,527	159,735,226	214,574,463
41. Change in nonadmitted assets	(76,726,675)	(22,732,883)	(22,802,347)
42. Change in liability for reinsurance in unauthorized and certified companies			
43. Change in reserve on account of change in valuation basis, (increase) or decrease			0
44. Change in asset valuation reserve	(55,528,154)	35,315,702	48,634,331
45. Change in treasury stock			0
46. Surplus (contributed to) withdrawn from Separate Accounts during period			
47. Other changes in surplus in Separate Accounts Statement			
48. Change in surplus notes			
49. Cumulative effect of changes in accounting principles			
50. Capital changes:			
50.1 Paid in			
50.2 Transferred from surplus (Stock Dividend)			
50.3 Transferred to surplus			
51. Surplus adjustment:			
51.1 Paid in	0	0	0
51.2 Transferred to capital (Stock Dividend)			
51.3 Transferred from capital			
51.4 Change in surplus as a result of reinsurance			
52. Dividends to stockholders			(200,000,000)
53. Aggregate write-ins for gains and losses in surplus	(28,610,740)	22,651,052	(2,164,124)
54. Net change in capital and surplus for the year (Lines 37 through 53)	76,047,222	278,773,884	218,367,765
55. Capital and surplus, as of statement date (Lines 36 + 54)	3,126,997,825	3,111,356,722	3,050,950,603
DETAILS OF WRITE-INS			
08.301. Contractual rider fee income	30,028,871	26,300,906	37,552,904
08.302. Interest on company-owned life insurance	4,974,173	6,881,480	8,921,000
08.303. Reinsurance experience refund	303,433	548,394	748,500
08.398. Summary of remaining write-ins for Line 8.3 from overflow page	1,570,270	52,683	54,818
08.399. Totals (Lines 08.301 through 08.303 plus 08.398) (Line 8.3 above)	36,876,747	33,783,463	47,277,222
2701. Ceded investment income	194,889,821	0	0
2702.		0	0
2703.			
2798. Summary of remaining write-ins for Line 27 from overflow page	0	0	0
2799. Totals (Lines 2701 through 2703 plus 2798)(Line 27 above)	194,889,821	0	0
5301. Correction of error, net of tax	(28,610,740)	22,651,052	(2,164,124)
5302.			
5303.			
5398. Summary of remaining write-ins for Line 53 from overflow page	0	0	0
5399. Totals (Lines 5301 through 5303 plus 5398)(Line 53 above)	(28,610,740)	22,651,052	(2,164,124)

CASH FLOW

	1 Current Year To Date	2 Prior Year To Date	3 Prior Year Ended December 31
Cash from Operations			
1. Premiums collected net of reinsurance	6,630,873,275	6,240,234,477	8,509,223,422
2. Net investment income	2,415,388,955	1,394,594,068	2,279,256,583
3. Miscellaneous income	10,800,655	119,962,738	119,187,230
4. Total (Lines 1 to 3)	9,057,062,885	7,754,791,283	10,907,667,235
5. Benefit and loss related payments	2,205,393,865	2,301,564,412	3,375,051,208
6. Net transfers to Separate Accounts, Segregated Accounts and Protected Cell Accounts	0	0	0
7. Commissions, expenses paid and aggregate write-ins for deductions	694,827,690	417,716,273	570,446,425
8. Dividends paid to policyholders	7,630	5,893	8,940
9. Federal and foreign income taxes paid (recovered) net of \$ 40,701,020 tax on capital gains (losses)	139,620,538	122,635,155	144,633,518
10. Total (Lines 5 through 9)	3,039,849,723	2,841,921,733	4,090,140,091
11. Net cash from operations (Line 4 minus Line 10)	6,017,213,162	4,912,869,550	6,817,527,144
Cash from Investments			
12. Proceeds from investments sold, matured or repaid:			
12.1 Bonds	5,218,763,214	6,793,739,424	8,045,962,540
12.2 Stocks	50,798,242	138,574,793	131,092,554
12.3 Mortgage loans	522,538,139	547,777,075	715,135,948
12.4 Real estate	0	0	0
12.5 Other invested assets	140,541,945	95,276,964	322,063,704
12.6 Net gains or (losses) on cash, cash equivalents and short-term investments	0	0	12,027
12.7 Miscellaneous proceeds	102,319,726	13,763,081	56,688,129
12.8 Total investment proceeds (Lines 12.1 to 12.7)	6,034,961,266	7,589,131,337	9,270,954,902
13. Cost of investments acquired (long-term only):			
13.1 Bonds	6,777,443,516	8,363,729,918	10,104,084,572
13.2 Stocks	184,205,721	147,878,138	128,658,375
13.3 Mortgage loans	1,126,719,948	1,399,495,320	1,881,105,539
13.4 Real estate	0	0	0
13.5 Other invested assets	307,919,204	178,331,364	339,973,269
13.6 Miscellaneous applications	664,640,388	332,436,222	796,679,588
13.7 Total investments acquired (Lines 13.1 to 13.6)	9,060,928,776	10,421,870,962	13,250,501,343
14. Net increase (or decrease) in contract loans and premium notes	(1,950,596)	(1,392,516)	(1,506,611)
15. Net cash from investments (Line 12.8 minus Line 13.7 and Line 14)	(3,024,016,914)	(2,831,347,109)	(3,978,039,830)
Cash from Financing and Miscellaneous Sources			
16. Cash provided (applied):			
16.1 Surplus notes, capital notes	0	0	0
16.2 Capital and paid in surplus, less treasury stock	0	0	0
16.3 Borrowed funds	0	0	0
16.4 Net deposits on deposit-type contracts and other insurance liabilities	(99,263,155)	(110,012,460)	(136,485,911)
16.5 Dividends to stockholders	0	0	200,000,000
16.6 Other cash provided (applied)	(1,663,296,688)	(1,786,771,448)	(2,282,911,755)
17. Net cash from financing and miscellaneous sources (Line 16.1 through Line 16.4 minus Line 16.5 plus Line 16.6)	(1,762,559,843)	(1,896,783,908)	(2,619,397,666)
RECONCILIATION OF CASH, CASH EQUIVALENTS AND SHORT-TERM INVESTMENTS			
18. Net change in cash, cash equivalents and short-term investments (Line 11, plus Lines 15 and 17) ..	1,230,636,405	184,738,533	220,089,648
19. Cash, cash equivalents and short-term investments:			
19.1 Beginning of year	2,211,326,604	1,991,236,956	1,991,236,956
19.2 End of period (Line 18 plus Line 19.1)	3,441,963,009	2,175,975,489	2,211,326,604

Note: Supplemental disclosures of cash flow information for non-cash transactions:

20.0001. Bond conversions and refinancing	227,399,118	201,620,953	255,431,290
20.0002. Common stock conversions	2,671,391	33,929,814	34,388,517
20.0003. Net investment income payment-in-kind for bonds	2,990,775	14,387,705	0
20.0004. Preferred stock conversions	160,485	442,451	442,451
20.0005. Common stocks transferred to other invested assets			6,408,000
20.0006. Other invested assets transferred to bonds		15,499,684	0
20.0007. Bonds transferred to other invested assets		18,555,573	18,555,573
20.0008. Other invested assets transferred to common stocks			15,499,684

EXHIBIT 1

DIRECT PREMIUMS AND DEPOSIT-TYPE CONTRACTS			
	1 Current Year To Date	2 Prior Year To Date	3 Prior Year Ended December 31
1. Individual life	12,997,286	12,925,215	18,599,421
2. Group life			0
3. Individual annuities	7,134,799,478	6,456,241,904	8,746,785,131
4. Group annuities	3,884,598	4,353,119	5,649,266
5. Accident & health	3,446,086	3,639,357	4,723,087
6. Fraternal			0
7. Other lines of business		0	0
8. Subtotal (Lines 1 through 7)	7,155,127,448	6,477,159,595	8,775,756,905
9. Deposit-type contracts	15,687,147	14,820,355	18,694,941
10. Total (Lines 8 and 9)	7,170,814,595	6,491,979,950	8,794,451,846

NOTES TO FINANCIAL STATEMENTS

Note 1 – Summary of Significant Accounting Policies

A. Accounting Practices

The financial statements of the MassMutual Ascend Life Insurance Company (“MMALIC” or “the Company”) are presented on the basis of accounting practices prescribed or permitted by the Ohio Department of Insurance. The Company was formerly known as Great American Life Insurance Company.

The Ohio Department of Insurance recognizes only statutory accounting practices prescribed or permitted by the State of Ohio for determining and reporting the financial condition and results of operations of an insurance company, for determining its solvency under the Ohio Insurance Law. The National Association of Insurance Commissioners’ (“NAIC”) *Accounting Practices and Procedures Manual* has been adopted as a component of prescribed or permitted practices by the State of Ohio.

In 2021 the Ohio Department of Insurance promulgated Ohio Administrative Code Section 3901-1-67, Alternative Derivative and Reserve Accounting Practices (OAC 3901-1-67), which constitutes a prescribed practice as contemplated by the NAIC SAP. The prescribed practice allows Ohio-domiciled insurance companies to utilize certain alternative derivative and reserve accounting practices for eligible derivative instruments and indexed products, respectively, in order to better align the measurement of indexed product reserves and the derivatives that hedge them. Effective January 1, 2022, the Company elected to apply OAC 3901-1-67 to its derivative instruments hedging equity indexed annuity products and equity indexed reserve liabilities.

A reconciliation of the Company’s net income and capital and surplus between NAIC SAP and practices prescribed and permitted by the State of Ohio is shown below:

Net Income	SSAP #	F/S Page	F/S Line #	09/30/2024	12/31/2023
(1) State basis	XXX	XXX	XXX	\$ (171,472,229)	\$ (5,097,670)
(2) State prescribed practices that increase/(decrease) NAIC SAP	XXX	XXX	XXX		
OAC 3901-1-67:					
Derivative instruments	86	4	7, 3	(46,292,393)	(49,286,793)
Reserves for fixed indexed annuities	51	4	1, 19	224,821,859	306,594,598
Tax impact	101	4	18.2, 32	5,887,442	686,970
(3) State permitted practices that increase/(decrease) NAIC SAP	XXX	XXX	XXX	-	-
(4) NAIC SAP (1-2-3=4)	XXX	XXX	XXX	\$ (355,889,137)	\$ (263,092,445)
Surplus					
(5) Statutory surplus state basis	XXX	XXX	XXX	\$ 3,126,997,825	\$ 3,050,950,603
(6) State prescribed practices that increase/(decrease) NAIC SAP					
OAC 3901-1-67:					
Derivative instruments	86	2, 4	7, 3	(654,841,135)	(525,349,344)
Reserves for fixed indexed annuities	51	3, 4	1, 19	579,616,794	354,794,935
Tax impact	101	2, 4	18.2, 32	30,777,281	50,796,596
(7) State permitted practices that increase/(decrease) NAIC SAP	XXX	XXX	XXX	-	-
(8) NAIC SAP (5-6-7=8)	XXX	XXX	XXX	\$ 3,171,444,884	\$ 3,170,708,417

B, C & D – No significant changes.

Note 2 – Accounting Changes and Corrections of Errors

In 2024, the Company recorded a correction of error related to prior years, net of tax, which resulted in a decrease of statutory capital and surplus of \$28,610,740. The correction of error resulted in adjustments to investment activity related to prior years.

In 2023, the Company recorded a correction of error related to prior years, net of tax, which resulted in a decrease of statutory capital and surplus of \$2,164,124. The correction of error resulted in adjustments to Bonds, Mortgage loans, Other invested assets, Derivatives, Accrued investment income and Payable for securities.

Note 3 – Business Combinations and Goodwill

Not applicable.

Note 4 – Discontinued Operations

Not applicable.

Note 5 – Investments

A, B & C – No significant changes.

D. Loan-Backed Securities

- (1) The Company uses dealer-modeled prepayment assumptions for mortgage-backed and asset-backed securities at the date of purchase to determine the effective yields; significant changes in estimated cash flows from the original purchase assumptions are accounted for on a prospective basis.
- (2) The Company does not currently hold any aggregate loan-backed securities with a recognized other-than-temporary impairment (“OTTI”) in which the Company has the intent to sell or the inability or lack of intent to retain the investment in the security for a period of time to recover the amortized cost basis.

NOTES TO FINANCIAL STATEMENTS

(3) The following table shows each security with a credit-related OTTI charge recognized during the period:

CUSIP	Amortized Cost Before OTTI	Present Value of Projected Cash Flow s	OTTI Charge Recognized in Income Statement	Amortized Cost After OTTI	Fair Value at Time of OTTI	Date Reported
07325DAF1	\$ 188,446	\$ 183,894	\$ 4,552	\$ 183,894	\$ 173,542	03/31/2024
07389NAC9	252,999	244,622	8,378	244,622	249,997	03/31/2024
3622EAAA8	3,363,495	3,323,775	39,721	3,323,775	3,153,854	03/31/2024
61751DAE4	1,528,252	1,458,023	70,229	1,458,023	1,795,267	03/31/2024
86358RXY8	141,707	140,513	1,193	140,513	140,491	03/31/2024
86358RXZ5	221,359	218,722	2,638	218,722	201,247	03/31/2024
00703QAD4	3,309,564	3,330,880	(21,316)	3,330,880	2,331,478	03/31/2024
02147XAR8	569,821	568,694	1,127	568,694	462,724	03/31/2024
02152AAS8	1,681,039	1,680,195	844	1,680,195	1,709,668	03/31/2024
059522AU6	1,990,654	1,977,703	12,952	1,977,703	1,952,207	03/31/2024
05952GAT8	319,263	302,417	16,846	302,417	279,733	03/31/2024
05952GAV3	458,831	435,162	23,669	435,162	402,521	03/31/2024
07386XAH9	947,290	948,547	(1,257)	948,547	771,263	03/31/2024
12566UAN4	549,670	541,211	8,459	541,211	531,037	03/31/2024
12566XAM0	651,755	636,729	15,027	636,729	579,587	03/31/2024
12628LAD2	664,264	632,237	32,026	632,237	522,656	03/31/2024
12667F4N2	1,982,772	1,961,149	21,623	1,961,149	1,892,614	03/31/2024
17309BAB3	197,256	194,233	3,023	194,233	166,593	03/31/2024
32051GT70	601,477	580,656	20,821	580,656	513,722	03/31/2024
36244SAD0	2,013,709	2,018,709	(5,000)	2,018,709	2,114,288	03/31/2024
43739EAP2	555,880	552,194	3,685	552,194	523,782	03/31/2024
46627MCY1	3,736,516	3,706,574	29,942	3,706,574	3,728,355	03/31/2024
46627MEC7	346,366	345,013	1,353	345,013	316,216	03/31/2024
46627MEJ2	1,051,940	1,051,330	610	1,051,330	871,833	03/31/2024
47232CAH7	1,625,552	1,588,003	37,549	1,588,003	1,634,793	03/31/2024
643529AC4	499,851	483,505	16,346	483,505	541,706	03/31/2024
65535VMJ4	528,500	514,916	13,584	514,916	545,242	03/31/2024
65535VNL8	1,911,718	1,911,036	683	1,911,036	2,083,864	03/31/2024
65535VSJ8	1,249,637	1,197,771	51,865	1,197,771	1,003,257	03/31/2024
74928RAB0	215,991	215,991	(0)	215,991	236,763	03/31/2024
75115BAC3	932,748	928,740	4,009	928,740	1,022,173	03/31/2024
761118BU1	501,401	464,499	36,902	464,499	506,476	03/31/2024
761118GS1	1,045,906	1,039,755	6,151	1,039,755	922,272	03/31/2024
761118SC3	1,408,050	1,385,794	22,255	1,385,794	1,191,653	03/31/2024
855541AC2	727,538	712,958	14,579	712,958	653,434	03/31/2024
863579J90	310,964	284,727	26,237	284,727	287,552	03/31/2024
86360BAJ7	659,289	637,763	21,526	637,763	625,317	03/31/2024
87222EAB4	751,711	731,584	20,127	731,584	682,690	03/31/2024
87222EAC2	870,200	839,182	31,018	839,182	680,970	03/31/2024
93934NAC9	441,899	429,939	11,960	429,939	357,528	03/31/2024
45660LCK3	2,514,539	2,470,098	44,442	2,470,098	2,723,605	03/31/2024
058931AT3	1,087,439	1,038,180	49,259	1,038,180	879,088	03/31/2024
05949CKX3	1,152,881	1,152,938	(58)	1,152,938	1,158,454	03/31/2024
05990HAT0	835,338	815,604	19,735	815,604	806,647	03/31/2024
07386YAE4	2,127,460	1,872,598	254,863	1,872,598	1,732,749	03/31/2024
07401CAS2	2,546,303	2,534,503	11,800	2,534,503	2,518,043	03/31/2024
12638PAB5	666,442	630,577	35,865	630,577	479,103	03/31/2024
12669G4K4	2,465,908	2,448,797	17,111	2,448,797	2,303,793	03/31/2024
12669GR45	454,211	451,011	3,200	451,011	405,877	03/31/2024
170257AE9	1,986,016	1,903,375	82,642	1,903,375	1,421,183	03/31/2024
2254582Y3	1,063,127	1,052,270	10,856	1,052,270	941,835	03/31/2024
225458L55	477,807	465,565	12,242	465,565	402,724	03/31/2024
32052EAA7	42,488	41,783	704	41,783	39,155	03/31/2024
32056JAA2	1,021,287	994,518	26,768	994,518	1,080,580	03/31/2024
362341FN4	694,244	680,711	13,534	680,711	609,991	03/31/2024
362341XC8	809,401	777,534	31,867	777,534	695,392	03/31/2024
41161PCX9	153,937	153,895	42	153,895	157,664	03/31/2024
46630WAL4	438,439	438,782	(343)	438,782	293,935	03/31/2024
576433D52	471,876	409,240	62,636	409,240	430,054	03/31/2024
57643MLZ5	205,469	199,902	5,567	199,902	176,526	03/31/2024
59023PAB9	470,257	467,493	2,764	467,493	476,269	03/31/2024
74958YAE2	262,093	259,755	2,338	259,755	258,713	03/31/2024
863579RP5	618,742	604,955	13,787	604,955	564,247	03/31/2024
863579UL0	255,178	254,285	893	254,285	237,173	03/31/2024
863579UU0	939,669	934,433	5,236	934,433	960,949	03/31/2024
863579XR4	1,954,913	1,890,491	64,421	1,890,491	1,887,147	03/31/2024
885220KW2	1,741,141	1,720,731	20,410	1,720,731	1,602,474	03/31/2024
03235TAA5	2,269,468	89,151	2,180,317	89,151	91,091	06/30/2024
62878HAA9	77,803,827	67,655,502	10,148,325	67,655,502	37,210,526	06/30/2024
07325DAF1	178,481	176,126	2,355	176,126	166,148	06/30/2024
3622EAAA8	3,292,504	3,184,660	107,843	3,184,660	3,041,184	06/30/2024
86358RXY8	123,852	123,852	0	123,852	123,889	06/30/2024
86358RXZ5	372,918	188,377	184,541	188,377	171,206	06/30/2024
00703QAD4	3,296,107	3,259,847	36,260	3,259,847	2,386,522	06/30/2024
02152AAS8	1,650,275	1,657,538	(7,263)	1,657,538	1,694,329	06/30/2024

NOTES TO FINANCIAL STATEMENTS

CUSIP	Amortized Cost Before OTTI	Present Value of Projected Cash Flow s	OTTI Charge Recognized in Income Statement	Amortized Cost After OTTI	Fair Value at Time of OTTI	Date Reported
05532TAF9	1,330,063	1,000,180	329,883	1,000,180	1,320,833	06/30/2024
059522AU6	2,241,312	1,925,540	315,772	1,925,540	1,895,287	06/30/2024
05952GAV3	459,594	459,364	231	459,364	396,506	06/30/2024
07384YKF2	1,676,124	1,597,771	78,353	1,597,771	1,509,395	06/30/2024
12566UAE4	391,661	388,055	3,606	388,055	342,216	06/30/2024
12566UAN4	537,632	510,793	26,839	510,793	530,113	06/30/2024
12628LAD2	642,284	622,397	19,887	622,397	514,736	06/30/2024
12667F4N2	1,914,833	1,908,135	6,698	1,908,135	1,810,552	06/30/2024
12667GAC7	587,654	584,787	2,867	584,787	567,539	06/30/2024
12668APC3	769,291	754,235	15,056	754,235	708,505	06/30/2024
17307GED6	1,262,267	1,251,250	11,017	1,251,250	1,309,786	06/30/2024
17309BAB3	194,329	190,609	3,721	190,609	163,894	06/30/2024
25150NAB0	1,429,029	1,411,817	17,212	1,411,817	1,189,708	06/30/2024
45254NNT0	86,269	46,530	39,739	46,530	37,525	06/30/2024
46627MAD9	497,454	495,061	2,393	495,061	429,325	06/30/2024
46627MCY1	3,504,842	3,460,914	43,928	3,460,914	3,510,994	06/30/2024
46627MEJ2	1,029,088	1,028,470	619	1,028,470	850,323	06/30/2024
61748HUF6	444,541	437,080	7,462	437,080	394,526	06/30/2024
643529AC4	488,451	472,942	15,509	472,942	512,282	06/30/2024
65535VSJ8	1,198,546	1,139,006	59,540	1,139,006	965,916	06/30/2024
75115DAA3	176,480	172,897	3,583	172,897	155,478	06/30/2024
75116FBH1	1,316,094	1,293,501	22,593	1,293,501	1,096,145	06/30/2024
76110HH85	209,667	196,650	13,018	196,650	207,840	06/30/2024
761118BU1	356,973	358,468	(1,495)	358,468	390,598	06/30/2024
761118FM5	1,654,272	1,550,452	103,819	1,550,452	1,634,697	06/30/2024
761118GS1	577,336	578,234	(897)	578,234	519,129	06/30/2024
761118SC3	1,347,876	1,353,200	(5,324)	1,353,200	1,178,737	06/30/2024
855541AC2	681,799	664,359	17,440	664,359	610,581	06/30/2024
863579J90	281,218	263,740	17,478	263,740	257,606	06/30/2024
86360BAG3	1,593,226	1,526,542	66,684	1,526,542	1,446,404	06/30/2024
86360BAJ7	732,362	624,365	107,997	624,365	608,246	06/30/2024
87222EAB4	737,391	714,622	22,770	714,622	678,658	06/30/2024
87222EAC2	854,908	824,739	30,169	824,739	673,478	06/30/2024
93934NAC9	212,897	212,897	0	212,897	177,003	06/30/2024
45660LCK3	2,492,599	2,447,687	44,912	2,447,687	2,730,961	06/30/2024
058931AT3	849,462	844,051	5,410	844,051	736,680	06/30/2024
05946XY72	969,731	968,019	1,712	968,019	907,973	06/30/2024
05990HAT0	797,257	776,355	20,901	776,355	770,842	06/30/2024
073880AD8	1,041,747	980,882	60,865	980,882	884,127	06/30/2024
07401CAS2	2,149,928	1,800,366	349,563	1,800,366	1,769,018	06/30/2024
12544DAG4	76,422	76,273	149	76,273	63,205	06/30/2024
1266942H0	487,696	485,711	1,985	485,711	402,837	06/30/2024
126694HP6	424,687	418,006	6,681	418,006	407,545	06/30/2024
12669G3S8	1,109,352	1,086,152	23,199	1,086,152	970,937	06/30/2024
12669G4K4	2,416,802	2,413,996	2,805	2,413,996	2,282,559	06/30/2024
12669GR45	488,586	443,234	45,352	443,234	418,915	06/30/2024
2254582Y3	1,038,258	1,042,487	(4,229)	1,042,487	922,895	06/30/2024
225470VF7	1,214,433	1,144,277	70,156	1,144,277	1,034,928	06/30/2024
32052EAA7	41,561	40,891	670	40,891	38,638	06/30/2024
32056JAA2	946,028	935,645	10,383	935,645	957,523	06/30/2024
362341FN4	682,514	656,914	25,600	656,914	596,198	06/30/2024
362341XC8	753,782	753,720	62	753,720	684,524	06/30/2024
466247UG6	396,801	389,244	7,556	389,244	391,491	06/30/2024
46630WAL4	429,077	428,735	343	428,735	286,999	06/30/2024
46631NAA7	629,936	624,489	5,447	624,489	490,712	06/30/2024
46631NDT3	5,702,643	5,440,665	261,978	5,440,665	5,514,444	06/30/2024
52520MCE1	192,541	190,485	2,057	190,485	182,118	06/30/2024
57643MLZ5	197,781	191,438	6,343	191,438	175,020	06/30/2024
59023PAB9	459,882	457,928	1,954	457,928	464,081	06/30/2024
61758VAQ0	2,524,715	2,424,826	99,890	2,424,826	2,004,345	06/30/2024
74958YAE2	259,088	254,354	4,734	254,354	256,384	06/30/2024
863579RP5	601,854	558,618	43,237	558,618	556,863	06/30/2024
863579UL0	255,370	250,985	4,385	250,985	234,764	06/30/2024
863579UU0	1,012,782	885,453	127,329	885,453	919,353	06/30/2024
863579XR4	1,816,437	1,747,652	68,785	1,747,652	1,724,184	06/30/2024
92925VAF7	1,963,141	1,392,435	570,706	1,392,435	1,835,677	06/30/2024
92979DAC9	2,345,113	2,281,758	63,356	2,281,758	2,403,743	06/30/2024
94985AAA7	172,846	172,336	510	172,336	162,836	06/30/2024
94986CAA2	160,856	162,103	(1,247)	162,103	209,862	06/30/2024

NOTES TO FINANCIAL STATEMENTS

CUSIP	Amortized Cost Before OTTI	Present Value of Projected Cash Flow s	OTTI Charge Recognized in Income Statement	Amortized Cost After OTTI	Fair Value at Time of OTTI	Date Reported
07325DAF1	168,747	158,506	10,241	158,506	162,126	09/30/2024
3622EAAA8	3,162,718	3,164,266	(1,548)	3,164,266	3,105,133	09/30/2024
86358RXZ5	173,920	162,831	11,089	162,831	147,869	09/30/2024
00703QAD4	3,230,243	2,980,491	249,753	2,980,491	2,393,260	09/30/2024
05951KAN3	536,453	516,986	19,467	516,986	480,378	09/30/2024
05952GAT8	301,408	301,407	1	301,407	279,298	09/30/2024
07384YKF2	1,545,478	1,473,109	72,368	1,473,109	1,502,463	09/30/2024
12566UAE4	382,321	381,811	510	381,811	347,647	09/30/2024
12628LAD2	623,895	538,842	85,054	538,842	488,888	09/30/2024
12667F4N2	1,854,333	1,825,794	28,539	1,825,794	1,795,414	09/30/2024
12667F5E1	885,926	883,092	2,834	883,092	840,192	09/30/2024
12667GAC7	574,616	574,616	0	574,616	569,728	09/30/2024
17307GED6	1,243,444	1,237,646	5,798	1,237,646	1,306,304	09/30/2024
17309BAB3	188,676	178,404	10,273	178,404	162,800	09/30/2024
25150NAB0	1,395,413	1,340,207	55,206	1,340,207	1,185,177	09/30/2024
32051GT70	553,883	489,420	64,463	489,420	470,987	09/30/2024
36244SAD0	2,079,721	1,738,096	341,626	1,738,096	1,990,034	09/30/2024
46627MAD9	485,365	467,136	18,228	467,136	418,182	09/30/2024
46627MEC7	333,531	312,472	21,058	312,472	300,268	09/30/2024
46627MEJ2	1,002,416	975,069	27,347	975,069	835,072	09/30/2024
61748HUF6	428,955	412,384	16,570	412,384	395,350	09/30/2024
643529AC4	475,293	476,634	(1,341)	476,634	500,686	09/30/2024
65535VSJ8	1,145,447	994,986	150,461	994,986	958,994	09/30/2024
75115DAA3	170,761	164,486	6,275	164,486	151,842	09/30/2024
761118FM5	1,541,807	1,543,298	(1,492)	1,543,298	1,629,022	09/30/2024
761118UG1	420,057	420,046	11	420,046	373,060	09/30/2024
863579J90	250,612	252,143	(1,531)	252,143	245,916	09/30/2024
86360BAG3	1,314,325	1,248,853	65,472	1,248,853	1,207,074	09/30/2024
86360BAJ7	600,711	599,768	944	599,768	589,162	09/30/2024
87222EAB4	717,218	700,713	16,505	700,713	677,103	09/30/2024
87222EAC2	837,388	792,140	45,248	792,140	670,814	09/30/2024
058931AT3	836,589	777,756	58,832	777,756	735,448	09/30/2024
05990HAT0	774,291	709,503	64,788	709,503	797,291	09/30/2024
073880AD8	958,917	955,572	3,345	955,572	876,008	09/30/2024
12544DAG4	75,232	74,708	525	74,708	64,751	09/30/2024
1266942H0	472,093	470,717	1,376	470,717	381,368	09/30/2024
12669G4K4	2,386,332	2,386,419	(87)	2,386,419	2,304,003	09/30/2024
16162YAL9	304,287	300,592	3,695	300,592	302,447	09/30/2024
170257AE9	1,844,597	1,830,194	14,403	1,830,194	1,400,315	09/30/2024
2254582Y3	1,035,685	987,491	48,194	987,491	916,096	09/30/2024
225470VF7	1,045,176	1,047,328	(2,152)	1,047,328	914,335	09/30/2024
466247UG6	388,455	385,026	3,430	385,026	394,828	09/30/2024
46630WAL4	414,400	402,824	11,576	402,824	275,971	09/30/2024
46631NAA7	619,024	566,235	52,789	566,235	485,405	09/30/2024
52520MCE1	187,510	169,666	17,844	169,666	178,580	09/30/2024
57643MLZ5	189,667	181,845	7,821	181,845	175,427	09/30/2024
74958YAE2	252,881	235,028	17,853	235,028	260,844	09/30/2024
863579UU0	872,015	877,227	(5,212)	877,227	896,401	09/30/2024
92925VAF7	1,353,551	1,353,551	(0)	1,353,551	1,805,104	09/30/2024
			19,001,043			

- (4) The following table shows all loan-backed securities with an unrealized loss:

a. The aggregate amount of unrealized losses:

1. Less than 12 Months

\$

8,203,135

2. 12 Months or Longer

364,820,312

b. The aggregate related fair value of securities with unrealized losses:

1. Less than 12 Months

\$

562,396,496

2. 12 Months or Longer

4,914,581,704
- (5) Based on cash flow projections received from independent sources (which reflect loan to collateral values, subordination, vintage and geographic concentration), implied cash flows inherent in security ratings and analysis of historical payment data, management believes that the Company will recover its cost basis in all securities with unrealized losses. The Company has the intent to hold securities in an unrealized loss position until they recover in value or mature.

NOTES TO FINANCIAL STATEMENTS

- E. Dollar Repurchase Agreements and/or Securities Lending Transactions – Not applicable.
- F. Repurchase Agreements Transactions Accounted for as Secured Borrowing – Not applicable.
- G. Reverse Repurchase Agreements Transactions Accounted for as Secured Borrowing – Not applicable.
- H. Repurchase Agreements Transactions Accounted for as a Sale – Not applicable.
- I. Reverse Repurchase Agreements Transactions Accounted for as a Sale – Not applicable.
- J. Real Estate – Not applicable.
- K. Low Income Housing Tax Credits – Not applicable.
- L. Restricted Assets – No significant change.
- M. Working Capital Finance Investments – Not applicable.
- N. Offsetting and Netting of Assets and Liabilities – Not applicable.
- O. 5GI Securities

Investment	Number of 5GI Securities		Aggregate BACV		Aggregate Fair Value	
	Current Year	Prior Year	Current Year	Prior Year	Current Year	Prior Year
(1) Bonds - AC	35	45	\$ 102,967,046	\$ 135,589,812	\$ 98,879,828	\$ 122,893,073
(2) LB&SS - AC	-	-	-	-	-	-
(3) Preferred Stock - AC	1	1	-	3,499,929	-	5,406,921
(4) Preferred Stock - FV	5	13	6,766,658	26,988,109	6,766,658	26,988,109
(5) Total (1+2+3+4)	41	59	\$ 109,733,704	\$ 166,077,850	\$ 105,646,486	\$ 155,288,103

AC - Amortized Cost FV - Fair Value

- P. Short Sales – Not applicable.
- Q. Prepayment Penalties and Acceleration Fees – No significant change.
- R. Share of Cash Pool by Asset Type – Not applicable.

Note 6 – Joint Ventures, Partnerships and Limited Liability Companies

No significant change.

Note 7 – Investment Income

No significant change.

Note 8 – Derivative Instruments

No significant change.

Note 9 – Income Taxes

No significant change.

NOTES TO FINANCIAL STATEMENTS

Note 10 – Information Concerning Parent, Subsidiaries, Affiliates and Other Related Parties

A., B. & C.

The Company is a wholly-owned subsidiary of Glidepath Holdings Inc. which is a subsidiary of Massachusetts Mutual Life Insurance Company ("MMLIC"); 100% of the Company's outstanding common stock is directly owned by Glidepath Holdings Inc. See Schedule Y, Part 1, Organizational Chart.

The Company did not pay or receive federal income tax payments in cash to (from) parent during the period.

The Company did not pay dividends to parent during the period.

The Company did not receive capital contributions during the period.

- D. The Company reported \$944,431 due from and \$1,030,776 due to the parent and affiliated companies. The terms of the agreement require that these amounts are settled within 90 days.
- E. Management or service contracts and all cost sharing arrangements involving the Company:
 - (1) The Company has an agreement with Barings (an affiliate) which provides investment advisory services to the Company.
 - (2) Certain administrative, management, underwriting, claims, accounting, data processing, collection, and investment services are provided under agreements between the Company and affiliates at charges not unfavorable to the Company or the affiliate.
- F. The Company has no material guarantees or undertakings for the benefit of an affiliate.
- G. The Company's outstanding shares are 100% owned by Glidepath Holdings Inc., a subsidiary of MMLIC.
- H. The Company does not own shares of any upstream intermediate entity or its ultimate parent.
- I. The Company has no investment in a subsidiary that exceeds 10% of admitted assets.
- J. The Company did not recognize any impairment or write down for its investments in subsidiary, controlled or affiliated companies during the statement period.
- K. The Company has no investment in a foreign insurance subsidiary.
- L. The Company owns 100% of the outstanding stock of Manhattan National Holding, LLC ("MNH"), a wholly-owned non-insurance subsidiary. MNH owns 100% of the stock of Manhattan National Life Insurance Company ("MNLIC"), a stock life insurance company domiciled in Ohio. The Company utilizes the look-through approach for the valuation of MNH instead of obtaining audited financial statements for MNH. The Company's carrying value in MNH is \$16,835,966, and represents the carrying value of MNLIC, which is presented on the basis of accounting practices prescribed or permitted by the Ohio Department of Insurance.
- M. All SCA Investments – No significant change.
- N. Investment in Insurance SCAs

All U.S insurance subsidiaries owned by the Company prepare their statutory financial statement in compliance with NAIC statutory accounting practices and procedures.
- O. SCA and SSAP No. 48 Entity Loss Tracking – Not applicable.

Note 11 – Debt

- A. The Company has no capital notes or reverse repurchase agreements outstanding.
- B. Federal Home Loan Bank Agreements
 - (1) The Company became a member of the Federal Home Loan Bank ("FHLB") on August 14, 2009. Through its association with the FHLB and by purchasing a set amount of FHLB stock, the Company can enter into deposit contracts. The Company owned \$41,525,200 of FHLB stock at September 30, 2024 and December 31, 2023. The Company also posted collateral to the FHLB of assets with a fair value of approximately \$1,549,985,439 as of September 30, 2024. The Company's FHLB borrowing capacity is based on the Company's estimate of collateral eligible to be pledged with the FHLB. The deposit-type contract liabilities and related assets are accounted for in the Company's general account.
 - (2) FHLB Capital Stock
 - a. The Company held 200,000 shares of Class B membership stock at September 30, 2024 and December 31, 2023. The Company held 215,252 shares of activity and excess stock at September 30, 2024 and December 31, 2023.
 - b. The Company has no membership stock eligible for redemption.
 - (3) Collateral Pledged to FHLB
 - a. The amount of collateral pledged to the FHLB at September 30, 2024 was \$1,549,985,439 (fair value) and \$1,590,802,299 (carrying value). The total aggregate borrowing from the FHLB at September 30, 2024 was \$500,000,000.
 - b. The maximum amount of collateral pledged to the FHLB during the period was \$1,590,851,496 (fair value) and \$1,671,355,293 (carrying value) at March 31, 2024. The amount borrowed from the FHLB at the time of maximum collateral was \$500,000,000.
 - (4) Borrowing from FHLB
 - a. The Company has accessed a total of \$500,000,000 as part of the funding agreement with the FHLB.
 - b. The maximum amount of borrowings from the FHLB during the period was \$500,000,000.
 - c. The current borrowings related to fixed rate funding agreements are subject to prepayment penalties.

NOTES TO FINANCIAL STATEMENTS

Note 12 - Retirement Plans, Deferred Compensation, Postemployment Benefits and Compensated Absences and Other Postretirement Benefit Plans

A., B., C. & D.

The Company did not participate in a defined benefit plan.

E. Defined Contribution Plan

The Company participates in the retirement plans of MMALIC. MMALIC sponsors funded (qualified 401(k) thrift savings) and unfunded (nonqualified deferred compensation thrift savings) defined contribution plans for its employees and retirees. The qualified 401(k) thrift savings plan's net assets available for benefits were \$74,592,356 as of September 30, 2024 and \$58,683,564 as of December 31, 2023. The Company matches a percentage of employee contributions to the qualified 401(k) thrift savings plan. The Company's total matching thrift savings contributions included in general insurance expenses were \$3,738,520 for the nine months ended September 30, 2024 and \$4,458,732 for the year ended December 31, 2023.

F. The Company did not participate in multiemployer plans.

G. The Company did not participate in consolidated or holding company plans.

H. The Company does not accrue for postemployment benefits and compensated absences.

I. The Company does not apply for a subsidy under the Medicare Part D under the Medicare Modernization Act.

Note 13 – Capital and Surplus, Shareholders' Dividend Restrictions and Quasi-Reorganizations

No significant change.

Note 14 – Contingencies

No significant change.

Note 15 – Leases

No significant change.

Note 16 – Information About Financial Instruments With Off-Balance Sheet Risk and Financial Instruments With Concentrations of Credit Risk

No significant change.

Note 17 – Sale, Transfer and Servicing of Financial Assets and Extinguishments of Liabilities

The Company has no reportable transactions.

Note 18 – Gain or Loss to the Reporting Entity from Uninsured Plans and the Uninsured Portion of Partially Insured Plans

Not applicable.

Note 19 – Direct Premium Written/Produced by Managing General Agents/Third Party Administrators

Not applicable.

NOTES TO FINANCIAL STATEMENTS

Note 20 – Fair Value Measurements

A.

(1) Fair Value Measurements at Reporting Date

The Company has categorized its assets and liabilities measured at fair value into the three-level fair value hierarchy as reflected in the following table. See item (4) below for a discussion of each of these three levels.

	Level 1	Level 2	Level 3	Net Asset Value (NAV)	Total
Assets at fair value					
Bonds:					
Special revenue	\$ -	\$ -	\$ -	\$ -	\$ -
Industrial and misc. (unaffiliated)	-	977,877	87,099,706	-	88,077,583
Hybrid securities	-	-	-	-	-
Total bonds	-	977,877	87,099,706	-	88,077,583
Non-affiliated preferred stock	74,783,735	-	70,403,575	-	145,187,310
Non-affiliated common stock	131,498,599	-	177,787,623	-	309,286,222
Currency swaps	-	209,807	-	-	209,807
Currency forward	-	470,018	-	-	470,018
Interest rate swaps	-	36,750,596	-	-	36,750,596
Financial Futures	-	-	-	-	-
Separate account assets	10,495,276	817,815,923	-	-	828,311,199
Total assets at fair value	\$ 216,777,610	\$ 856,224,221	\$ 335,290,904	\$ -	\$ 1,408,292,735
Liabilities at fair value					
Currency swaps	\$ -	\$ 49,842,317	\$ -	\$ -	\$ 49,842,317
Currency forward	-	8,564,770	-	-	8,564,770
Interest rate swaps	-	57,934,616	-	-	57,934,616
Financial Futures	450,188	-	-	-	450,188
Separate account liabilities	10,495,276	817,815,923	-	-	828,311,199
Total liabilities at fair value	\$ 10,945,464	\$ 934,157,626	\$ -	\$ -	\$ 945,103,090

(2) Fair Value Measurements in Level 3 of the Fair Value Hierarchy

	Beginning Balance at 6/30/2024	Transfers into Level 3	Transfers out of Level 3	and (losses) included in Net Income	and (losses) included in Surplus	Purchases	Issuances	Settlements	Other Adjustments	Ending Balance at 9/30/2024
Bonds: industrial and misc (unaffiliated)	\$ 40,911,366	\$ -	\$ -	\$ (23,891,589)	\$ (11,615,075)	\$ 1,370,298	\$ -	\$ (887,030)	\$ 81,211,736	\$ 87,099,706
Non-affiliated preferred stock	72,691,385	-	-	-	7,324,357	-	-	-	(9,612,167)	70,403,575
Non-affiliated common stock	185,478,706	-	-	(81)	(191,866)	68,638	-	-	(7,567,774)	177,787,623
Total	\$ 299,081,457	\$ -	\$ -	\$ (23,891,670)	\$ (4,482,584)	\$ 1,438,936	\$ -	\$ (887,030)	\$ 64,031,795	\$ 335,290,904

(3) Fair Value Recognition of Transfers Between Levels

The Company recognizes and records the transfer of securities into and out of Level 3 due to changes in availability of market observable inputs. All transfers are reflected in the table above at fair value as of the end of the reporting period.

(4) Inputs and Techniques Used in Estimating Fair Value

Level 1 - Quoted prices for identical assets or liabilities in active markets (markets in which transactions occur with sufficient frequency and volume to provide pricing information on an ongoing basis). The Company's Level 1 financial instruments consist primarily of publicly traded equity securities for which quoted market prices in active markets are available.

Level 2 - Quoted prices for similar instruments in active markets; quoted prices for identical or similar assets or liabilities in inactive markets (markets in which there are few transactions, the prices are not current, price quotations vary substantially over time or among market makers, or in which little information is released publicly); and valuations based on other significant inputs that are observable in active markets. Level 2 inputs include benchmark yields, reported trades, corroborated broker/dealer quotes, issuer spreads and benchmark securities. When non-binding broker quotes can be corroborated by comparison to similar securities priced using observable inputs, they are classified as Level 2.

Level 3 - Valuations derived from market valuation techniques generally consistent with those used to estimate the fair value of Level 2 financial instruments in which one or more significant inputs are unobservable or when the market for a security exhibits significantly less liquidity relative to markets supporting Level 2 fair value measurements. The unobservable inputs may include management's own assumptions about the assumptions market participants would use based on the best information available in the circumstances. The Company's Level 3 is comprised of financial instruments whose fair value is estimated based on non-binding broker quotes or internally developed using significant inputs not based on, or corroborated by, observable market information.

The Company's investment manager, Barings LLC ("Barings") is responsible for the valuation process and uses data from outside sources (including nationally recognized pricing services and broker/dealers) in establishing fair value. Valuation techniques utilized by pricing services and prices obtained from external sources are reviewed by Barings internal investment professionals who are familiar with the securities being priced and the markets in which they trade to ensure the fair value determination is representative of an exit price. To validate the appropriateness of the prices obtained, the investment manager considers widely published indices (as benchmarks), recent trades, changes in interest rates, general economic conditions and the credit quality of the specific issuers. In addition, Barings communicates directly with the pricing service regarding the methods and assumptions used in pricing, including verifying, on a test basis, the inputs used by the service to value specific securities.

(5) Derivative Assets and Liabilities

- a. The Company's derivative assets/liabilities are reported on a gross basis (see 20-A-(1)).
- b. The Company has no gross or net derivative assets/liabilities measured at fair value in the Level 3 category.

B. The Company has no additional fair value disclosures.

NOTES TO FINANCIAL STATEMENTS

C. The Company has categorized all the financial assets in the financial statements into the three-level fair value hierarchy as reflected in the following table. See item (4) above for a discussion of each of these three levels.

Type of Financial Instrument	Aggregate Fair Value	Admitted Assets	Level 1	Level 2	Level 3	Net Asset Value (NAV)	Not Practicable (Carrying Value)
Financial assets:							
Bonds:							
U.S. Governments	\$ 147,860,222	\$ 176,249,752	\$ -	\$ 147,860,222	\$ -	\$ -	\$ -
All other government	14,027,608	14,772,001	-	9,366,607	4,661,001	-	-
States, territories and possessions	159,264,649	163,655,877	-	159,264,649	-	-	-
Political subdivisions of states, territories	224,584,808	224,239,040	-	224,584,808	-	-	-
Special revenue	1,750,534,045	1,836,550,669	-	1,734,371,484	16,162,561	-	-
Industrial and misc. (unaffiliated)	30,952,335,406	31,900,767,741	-	21,797,207,831	9,155,127,575	-	-
Hybrid securities	1,203,452,139	1,165,785,923	-	1,190,404,139	13,048,000	-	-
Parent, subs and affiliates	826,678,158	834,544,907	-	681,643,243	145,034,915	-	-
Total bonds	\$ 35,278,737,035	\$ 36,316,565,910	\$ -	\$ 25,944,702,983	\$ 9,334,034,052	\$ -	\$ -
Non affiliated preferred stock	353,992,914	344,615,346	172,274,638	45,033,366	136,684,910	-	-
Non affiliated common stock	309,286,222	309,286,222	131,498,599	-	177,787,623	-	-
Mortgage loans	4,783,548,408	4,871,113,543	-	-	4,783,548,408	-	-
Currency forw ards	470,018	470,018	-	470,018	-	-	-
Fixed-indexed annuity options	996,823,591	690,797,328	454,133,520	542,690,071	-	-	-
Interest rate sw aps	36,750,596	36,750,596	-	36,750,596	-	-	-
Currency sw aps	209,807	209,807	-	209,807	-	-	-
Financial Futures	-	-	-	-	-	-	-
Separate account assets	828,311,199	828,311,199	10,495,276	817,815,923	-	-	-
Cash, cash equivalents and short-term investments	3,441,963,009	3,441,963,009	3,441,963,009	-	-	-	-
Policy loans	28,001,955	28,001,955	-	-	28,001,955	-	-
Total financial assets	<u>46,058,094,754</u>	<u>46,868,084,933</u>	<u>4,210,365,042</u>	<u>\$ 27,387,672,764</u>	<u>\$ 14,460,056,948</u>	<u>\$ -</u>	<u>\$ -</u>
Financial liabilities:							
Currency sw aps	\$ 49,842,317	\$ 49,842,317	\$ -	\$ 49,842,317	\$ -	\$ -	\$ -
Currency forw ards	8,564,770	8,564,770	-	8,564,770	-	-	-
Interest rate sw aps	57,934,616	57,934,616	-	57,934,616	-	-	-
Fixed-indexed annuity options	-	340,256,253	-	-	-	-	-
Financial Futures	450,188	450,188	450,188	-	-	-	-
Separate account liabilities	828,311,199	828,311,199	10,495,276	817,815,923	-	-	-
Total financial liabilities	<u>\$ 945,103,090</u>	<u>\$ 1,285,359,343</u>	<u>\$ 10,945,464</u>	<u>\$ 934,157,626</u>	<u>\$ -</u>	<u>\$ -</u>	<u>\$ -</u>

D. Not Practicable to Estimate Fair Value – The Company has no financial instruments that fall under this classification.

E. NAV Practical Expedient Investments – The Company has no financial investments that fall under this classification.

Note 21 – Other Items

A. Unusual or Infrequent Items

Admitted disallowed Interest Maintenance Reserve (“IMR”):

As of September 30, 2024, the Company had \$250,742,310 of net negative (disallowed) IMR in aggregate and in the general account.

As of September 30, 2024, the Company had \$250,742,310 of negative IMR admitted in the general account.

As of September 30, 2024, the calculated adjusted capital and surplus was \$2,507,423,074.

As of September 30, 2024, the percentage of adjusted capital and surplus for which the admitted disallowed IMR represents was 10%.

The follow ing represents allocated gains (losses) previously deferred to the IMR from derivatives:

	September 30, 2024
Realized capital gains	2,851,134
Realized capital losses	(13,985,758)
Total allocated gains (losses) to IMR from derivatives	<u>\$ (11,134,623)</u>

When the Company sells bonds and recognizes losses due to interest-rate related factors, and the realized losses are transferred to the IMR, the sales proceeds are generally used for reinvestment as governed by prudent asset liability management (“ALM”) policies and procedures. Such sales of bonds are intermittently used to meet liquidity needs and managed within the ALM framework.

IMR losses for fixed income related derivatives were in accordance with documented risk management procedures, as well as the Company’s derivative use plans, and reflect the same historical treatment of derivative gains reversed to IMR and amortized rather than immediately recognized as realized gain upon termination.

As of the period ended September 30, 2024, the IMR asset of \$250,742,310 admitted under the currently adopted statutory accounting interpretation is primarily related to its Funds Withheld (FWH) reinsurance treaty. Included in the FWH assets are reimbursements of capital losses on the invested assets to back the ceded reinsurance liabilities and are recorded as an adjustment to the income statement. Both the IMR and FWH assets are admitted under statutory accounting guidance.

B. The Company had no troubled debt restructuring.

Note 22 – Events Subsequent/Other items

No significant change.

Note 23 – Reinsurance

No significant change.

Note 24 – Retrospectively Rated Contracts & Contracts Subject to Redetermination

Not applicable.

NOTES TO FINANCIAL STATEMENTS

Note 25 – Change in Incurred Losses and Loss Adjustment Expenses

Reserves on accident and health contracts for incurred and loss adjustment expenses attributable to insured events of prior years developed as anticipated during the period. Original estimates are increased or decreased as additional information becomes known regarding individual claims. However, no significant trends or unanticipated events were noted. None of the Company's accident and health contracts are subject to retrospective rating or experience refunds.

Note 26 – Intercompany Pooling Arrangements

Not applicable.

Note 27 – Structured Settlements

Not applicable.

Note 28 – Health Care Receivables

Not applicable.

Note 29 – Participating Policies

No significant change.

Note 30 – Premium Deficiency Reserves

Not applicable.

Note 31 – Reserves for Life Contracts and Annuity Contracts

No significant change.

Note 32 – Analysis of Annuity Actuarial Reserves and Deposit Type Liabilities by Withdrawal Characteristics

No significant change.

Note 33 – Analysis of Life Actuarial Reserves by Withdrawal Characteristics

No significant change.

Note 34 – Premiums and Annuity Considerations Deferred and Uncollected

No significant change.

Note 35 – Separate Accounts

No significant change.

Note 36 – Loss/Claim Adjustment Expenses

No significant change.

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

GENERAL INTERROGATORIES

PART 1 - COMMON INTERROGATORIES

GENERAL

- 1.1

Did the reporting entity experience any material transactions requiring the filing of Disclosure of Material Transactions with the State of Domicile, as required by the Model Act?

Yes [] No [X]
- 1.2

If yes, has the report been filed with the domiciliary state?

Yes [] No []
- 2.1

Has any change been made during the year of this statement in the charter, by-laws, articles of incorporation, or deed of settlement of the reporting entity?

Yes [] No [X]
- 2.2

If yes, date of change:
- 3.1

Is the reporting entity a member of an Insurance Holding Company System consisting of two or more affiliated persons, one or more of which is an insurer?

If yes, complete Schedule Y, Parts 1 and 1A.

Yes [X] No []
- 3.2

Have there been any substantial changes in the organizational chart since the prior quarter end?

Yes [] No [X]
- 3.3

If the response to 3.2 is yes, provide a brief description of those changes.
- 3.4

Is the reporting entity publicly traded or a member of a publicly traded group?

Yes [] No [X]
- 3.5

If the response to 3.4 is yes, provide the CIK (Central Index Key) code issued by the SEC for the entity/group.
- 4.1

Has the reporting entity been a party to a merger or consolidation during the period covered by this statement?

Yes [] No [X]
- 4.2

If yes, provide the name of the entity, NAIC Company Code, and state of domicile (use two letter state abbreviation) for any entity that has ceased to exist as a result of the merger or consolidation.
- | | | |
|----------------|-------------------|-------------------|
| 1 | 2 | 3 |
| Name of Entity | NAIC Company Code | State of Domicile |
| | | |
5.

If the reporting entity is subject to a management agreement, including third-party administrator(s), managing general agent(s), attorney-in-fact, or similar agreement, have there been any significant changes regarding the terms of the agreement or principals involved?

If yes, attach an explanation.

Yes [] No [X] N/A []
- 6.1

State as of what date the latest financial examination of the reporting entity was made or is being made.

12/31/2021
- 6.2

State the as of date that the latest financial examination report became available from either the state of domicile or the reporting entity. This date should be the date of the examined balance sheet and not the date the report was completed or released.

12/31/2021
- 6.3

State as of what date the latest financial examination report became available to other states or the public from either the state of domicile or the reporting entity. This is the release date or completion date of the examination report and not the date of the examination (balance sheet date).

05/23/2023
- 6.4

By what department or departments?
State of Ohio, Department of Insurance
- 6.5

Have all financial statement adjustments within the latest financial examination report been accounted for in a subsequent financial statement filed with Departments?

Yes [] No [] N/A [X]
- 6.6

Have all of the recommendations within the latest financial examination report been complied with?

Yes [] No [] N/A [X]
- 7.1

Has this reporting entity had any Certificates of Authority, licenses or registrations (including corporate registration, if applicable) suspended or revoked by any governmental entity during the reporting period?

Yes [] No [X]
- 7.2

If yes, give full information:
- 8.1

Is the company a subsidiary of a bank holding company regulated by the Federal Reserve Board?

Yes [] No [X]
- 8.2

If response to 8.1 is yes, please identify the name of the bank holding company.
- 8.3

Is the company affiliated with one or more banks, thrifts or securities firms?

Yes [X] No []
- 8.4

If response to 8.3 is yes, please provide below the names and location (city and state of the main office) of any affiliates regulated by a federal regulatory services agency [i.e. the Federal Reserve Board (FRB), the Office of the Comptroller of the Currency (OCC), the Federal Deposit Insurance Corporation (FDIC) and the Securities Exchange Commission (SEC)] and identify the affiliate's primary federal regulator.

1 Affiliate Name	2 Location (City, State)	3 FRB	4 OCC	5 FDIC	6 SEC
Barings LLC	Charlotte, NC	..NO..	..NO..	..NO..	..YES..
Baring International Investment Limited	London, UK	..NO..	..NO..	..NO..	..YES..
Baring Securities LLC	Charlotte, NC	..NO..	..NO..	..NO..	..YES..
Flourish Financial, LLC	New York, NY	..NO..	..NO..	..NO..	..YES..
IMM Ascend Life Investor Services, LLC	Cincinnati, OH	..NO..	..NO..	..NO..	..YES..
IML Distributors, LLC	Springfield, MA	..NO..	..NO..	..NO..	..YES..
IML Investment Advisers, LLC	Springfield, MA	..NO..	..NO..	..NO..	..YES..
IML Investors Services	Springfield, MA	..NO..	..NO..	..NO..	..YES..
IML Strategic Distributors, LLC	Springfield, MA	..NO..	..NO..	..NO..	..YES..
The MassMutual Trust Company, OCC	Enfield, CT	..NO..	..YES..	..NO..	..NO..

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

GENERAL INTERROGATORIES

9.1

Are the senior officers (principal executive officer, principal financial officer, principal accounting officer or controller, or persons performing similar functions) of the reporting entity subject to a code of ethics, which includes the following standards?
(a) Honest and ethical conduct, including the ethical handling of actual or apparent conflicts of interest between personal and professional relationships;
(b) Full, fair, accurate, timely and understandable disclosure in the periodic reports required to be filed by the reporting entity;
(c) Compliance with applicable governmental laws, rules and regulations;
(d) The prompt internal reporting of violations to an appropriate person or persons identified in the code; and
(e) Accountability for adherence to the code.

Yes [X] No []

9.11

If the response to 9.1 is No, please explain:
.....

9.2

Has the code of ethics for senior managers been amended?

Yes [] No [X]

9.21

If the response to 9.2 is Yes, provide information related to amendment(s).
.....

9.3

Have any provisions of the code of ethics been waived for any of the specified officers?

Yes [] No [X]

9.31

If the response to 9.3 is Yes, provide the nature of any waiver(s).
.....

FINANCIAL

10.1

Does the reporting entity report any amounts due from parent, subsidiaries or affiliates on Page 2 of this statement?

Yes [X] No []

10.2

If yes, indicate any amounts receivable from parent included in the Page 2 amount:\$

INVESTMENT

11.1

Were any of the stocks, bonds, or other assets of the reporting entity loaned, placed under option agreement, or otherwise made available for use by another person? (Exclude securities under securities lending agreements.)

Yes [] No [X]

11.2

If yes, give full and complete information relating thereto:
.....

12.

Amount of real estate and mortgages held in other invested assets in Schedule BA:

\$ 348,930,657

13.

Amount of real estate and mortgages held in short-term investments:

\$

14.1

Does the reporting entity have any investments in parent, subsidiaries and affiliates?

Yes [X] No []

14.2

If yes, please complete the following:

	1	2
	Prior Year-End Book/Adjusted Carrying Value	Current Quarter Book/Adjusted Carrying Value
14.21 Bonds	\$ 744,638,614	\$ 819,968,691
14.22 Preferred Stock	\$ 0	\$
14.23 Common Stock	\$ 445,210,536	\$ 473,336,212
14.24 Short-Term Investments	\$ 0	\$
14.25 Mortgage Loans on Real Estate	\$ 0	\$
14.26 All Other	\$ 237,992,753	\$ 324,524,169
14.27 Total Investment in Parent, Subsidiaries and Affiliates (Subtotal Lines 14.21 to 14.26)	\$ 1,427,841,903	\$ 1,617,829,072
14.28 Total Investment in Parent included in Lines 14.21 to 14.26 above	\$	\$

15.1

Has the reporting entity entered into any hedging transactions reported on Schedule DB?

Yes [X] No []

15.2

If yes, has a comprehensive description of the hedging program been made available to the domiciliary state? Yes [X] No [] N/A []
If no, attach a description with this statement.
.....

16.

For the reporting entity's security lending program, state the amount of the following as of the current statement date:

16.1

Total fair value of reinvested collateral assets reported on Schedule DL, Parts 1 and 2.

\$ 0

16.2

Total book/adjusted carrying value of reinvested collateral assets reported on Schedule DL, Parts 1 and 2

\$ 0

16.3

Total payable for securities lending reported on the liability page.

\$ 0

8.1

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

GENERAL INTERROGATORIES

17. Excluding items in Schedule E - Part 3 - Special Deposits, real estate, mortgage loans and investments held physically in the reporting entity's offices, vaults or safety deposit boxes, were all stocks, bonds and other securities, owned throughout the current year held pursuant to a custodial agreement with a qualified bank or trust company in accordance with Section 1, III - General Examination Considerations, F. Outsourcing of Critical Functions, Custodial or Safekeeping Agreements of the NAIC Financial Condition Examiners Handbook? Yes [X] No []
- 17.1 For all agreements that comply with the requirements of the NAIC Financial Condition Examiners Handbook, complete the following:

1 Name of Custodian(s)	2 Custodian Address
Bank of New York Mellon	1 Wall Street, New York, NY 10286
State Street Bank and Trust Company	JAB2NWN. Quincy, MA 02171

- 17.2 For all agreements that do not comply with the requirements of the NAIC Financial Condition Examiners Handbook, provide the name, location and a complete explanation:

1 Name(s)	2 Location(s)	3 Complete Explanation(s)

- 17.3 Have there been any changes, including name changes, in the custodian(s) identified in 17.1 during the current quarter? Yes [] No [X]
- 17.4 If yes, give full information relating thereto:

1 Old Custodian	2 New Custodian	3 Date of Change	4 Reason

- 17.5 Investment management – Identify all investment advisors, investment managers, broker/dealers, including individuals that have the authority to make investment decisions on behalf of the reporting entity. For assets that are managed internally by employees of the reporting entity, note as such. ["...that have access to the investment accounts"; "...handle securities"]

1 Name of Firm or Individual	2 Affiliation
ARES Capital Management LLC	U.....
Ares Management LLC	U.....
Barings LLC	A.....
Centerbridge Martello Advisors, LLC	U.....
Fractal Investments LLC	U.....
Western Asset Management Company	U.....
Angelo, Gordon & Co., L.P	U.....

- 17.5097 For those firms/individuals listed in the table for Question 17.5, do any firms/individuals unaffiliated with the reporting entity (i.e. designated with a "U") manage more than 10% of the reporting entity's invested assets?..... Yes [] No [X]
- 17.5098 For firms/individuals unaffiliated with the reporting entity (i.e. designated with a "U") listed in the table for Question 17.5, does the total assets under management aggregate to more than 50% of the reporting entity's invested assets?..... Yes [] No [X]

- 17.6 For those firms or individuals listed in the table for 17.5 with an affiliation code of "A" (affiliated) or "U" (unaffiliated), provide the information for the table below.

1 Central Registration Depository Number	2 Name of Firm or Individual	3 Legal Entity Identifier (LEI)	4 Registered With	5 Investment Management Agreement (IMA) Filed
130074	ARES Capital Management LLC	549300R4YHRZ8JUZU385	SEC	NO.....
130074	Ares Management LLC	549300JA9GMPFTSVQQ05	SEC	NO.....
106006	Barings LLC	ANDKRHQKPRRG4Q2KLR05	SEC	DS.....
131940	Angelo, Gordon & Co., L.P.	XXJ808RONB9FETFPGB63	SEC	NO.....
157359	Centerbridge Martello Advisors, LLC	549300F5X7LPP05D3544	SEC	NO.....
311767	Fractal Investments LLC	984500D14JFD006CBC96	SEC	NO.....
110441	Western Asset Management Company	549300C5A561UXU1CN46	SEC	NO.....

- 18.1 Have all the filing requirements of the Purposes and Procedures Manual of the NAIC Investment Analysis Office been followed? Yes [] No [X]
- 18.2 If no, list exceptions:
At 9/30/2024, 22 issues for 21 issuers did not meet the filing requirements of the Purposes and Procedures Manual. The majority of these issues currently lack one or more of the following: Valid cusip/PPN, audited financials and/or executed legal documentation.
Exceptions totaled \$67,718,662 or 0.18% of all assets.

19. By self-designating 5GI securities, the reporting entity is certifying the following elements for each self-designated 5GI security:
a. Documentation necessary to permit a full credit analysis of the security does not exist or an NAIC CRP credit rating for an FE or PL security is not available.
b. Issuer or obligor is current on all contracted interest and principal payments.
c. The insurer has an actual expectation of ultimate payment of all contracted interest and principal.
Has the reporting entity self-designated 5GI securities? Yes [X] No []

20. By self-designating PLGI securities, the reporting entity is certifying the following elements of each self-designated PLGI security:
a. The security was purchased prior to January 1, 2018.
b. The reporting entity is holding capital commensurate with the NAIC Designation reported for the security.
c. The NAIC Designation was derived from the credit rating assigned by an NAIC CRP in its legal capacity as a NRSRO which is shown on a current private letter rating held by the insurer and available for examination by state insurance regulators.
d. The reporting entity is not permitted to share this credit rating of the PL security with the SVO.
Has the reporting entity self-designated PLGI securities? Yes [] No [X]

21. By assigning FE to a Schedule BA non-registered private fund, the reporting entity is certifying the following elements of each self-designated FE fund:
a. The shares were purchased prior to January 1, 2019.
b. The reporting entity is holding capital commensurate with the NAIC Designation reported for the security.
c. The security had a public credit rating(s) with annual surveillance assigned by an NAIC CRP in its legal capacity as an NRSRO prior to January 1, 2019.
d. The fund only or predominantly holds bonds in its portfolio.
e. The current reported NAIC Designation was derived from the public credit rating(s) with annual surveillance assigned by an NAIC CRP in its legal capacity as an NRSRO.
f. The public credit rating(s) with annual surveillance assigned by an NAIC CRP has not lapsed.
Has the reporting entity assigned FE to Schedule BA non-registered private funds that complied with the above criteria? Yes [] No [X]

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

GENERAL INTERROGATORIES

PART 2 - LIFE AND ACCIDENT AND HEALTH COMPANIES/FRATERNAL BENEFIT SOCIETIES

Life and Accident Health Companies/Fraternal Benefit Societies:

1.

Report the statement value of mortgage loans at the end of this reporting period for the following categories:

1

Amount

1.1

Long-Term Mortgages In Good Standing

1.11

Farm Mortgages

\$

1.12

Residential Mortgages

\$

3,290,157,374

1.13

Commercial Mortgages

\$

1,580,956,168

1.14

Total Mortgages in Good Standing

\$

4,871,113,542

1.2

Long-Term Mortgages In Good Standing with Restructured Terms

1.21

Total Mortgages in Good Standing with Restructured Terms

\$

1.3

Long-Term Mortgage Loans Upon which Interest is Overdue more than Three Months

1.31

Farm Mortgages

\$

1.32

Residential Mortgages

\$

1.33

Commercial Mortgages

\$

1.34

Total Mortgages with Interest Overdue more than Three Months

\$

0

1.4

Long-Term Mortgage Loans in Process of Foreclosure

1.41

Farm Mortgages

\$

1.42

Residential Mortgages

\$

1.43

Commercial Mortgages

\$

1.44

Total Mortgages in Process of Foreclosure

\$

0

1.5

Total Mortgage Loans (Lines 1.14 + 1.21 + 1.34 + 1.44) (Page 2, Column 3, Lines 3.1 + 3.2)

\$

4,871,113,542

1.6

Long-Term Mortgages Foreclosed, Properties Transferred to Real Estate in Current Quarter

1.61

Farm Mortgages

\$

1.62

Residential Mortgages

\$

1.63

Commercial Mortgages

\$

1.64

Total Mortgages Foreclosed and Transferred to Real Estate

\$

0

2.

Operating Percentages:

2.1

A&H loss percent

%

2.2

A&H cost containment percent

%

2.3

A&H expense percent excluding cost containment expenses

%

3.1

Do you act as a custodian for health savings accounts?

Yes

[]

No

[X]

3.2

If yes, please provide the amount of custodial funds held as of the reporting date

\$

3.3

Do you act as an administrator for health savings accounts?

Yes

[]

No

[X]

3.4

If yes, please provide the balance of the funds administered as of the reporting date

\$

4.

Is the reporting entity licensed or chartered, registered, qualified, eligible or writing business in at least two states?

Yes

[X]

No

[]

4.1

If no, does the reporting entity assume reinsurance business that covers risks residing in at least one state other than the state of domicile of the reporting entity?

Yes

[]

No

[]

Fraternal Benefit Societies Only:

5.1

In all cases where the reporting entity has assumed accident and health risks from another company, provisions should be made in this statement on account of such reinsurances for reserve equal to that which the original company would have been required to establish had it retained the risks. Has this been done?

Yes

[]

No

[]

N/A

[]

5.2

If no, explain:

6.1

Does the reporting entity have outstanding assessments in the form of liens against policy benefits that have increased surplus?

Yes

[]

No

[]

6.2

If yes, what is the date(s) of the original lien and the total outstanding balance of liens that remain in surplus?

Date	Outstanding Lien Amount

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE S - CEDED REINSURANCE

Showing All New Reinsurance Treaties - Current Year to Date

1	2	3	4	5	6	7	8	9	10
NAIC Company Code	ID Number	Effective Date	Name of Reinsurer	Domiciliary Jurisdiction	Type of Reinsurance Ceded	Type of Business Ceded	Type of Reinsurer	Certified Reinsurer Rating (1 through 6)	Effective Date of Certified Reinsurer Rating
			NONE						

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE T - PREMIUMS AND ANNUITY CONSIDERATIONS

Current Year To Date - Allocated by States and Territories

States, Etc.			1	Direct Business Only					
				Life Contracts		4 Accident and Health Insurance Premiums, Including Policy, Membership and Other Fees	5 Other Considerations	6 Total Columns 2 Through 5	7 Deposit-Type Contracts
				2 Life Insurance Premiums	3 Annuity Considerations				
Active Status (a)									
1.	Alabama	AL	L	162,511	110,333,863	23,871		110,520,245	
2.	Alaska	AK	L	4,678	5,826,549			5,831,227	
3.	Arizona	AZ	L	327,766	133,435,911	12,982		133,776,659	320,744
4.	Arkansas	AR	L	102,974	53,096,787	1,011		53,200,772	380,992
5.	California	CA	L	3,106,563	802,358,549	16,519		805,481,631	1,306,871
6.	Colorado	CO	L	146,292	88,644,491	58,721		88,849,504	
7.	Connecticut	CT	L	219,023	126,930,141	2,726		127,151,890	
8.	Delaware	DE	L	28,896	22,848,478			22,877,374	
9.	District of Columbia	DC	L	16,849	5,198,147			5,214,996	
10.	Florida	FL	L	1,078,842	703,403,233	190,335		704,672,410	1,610,713
11.	Georgia	GA	L	489,931	217,088,692	63,827		217,642,450	285,666
12.	Hawaii	HI	L	157,464	62,187,262			62,344,726	46,192
13.	Idaho	ID	L	55,307	33,324,809	7,832		33,387,948	
14.	Illinois	IL	L	379,056	247,283,030	103,129		247,765,215	601,695
15.	Indiana	IN	L	105,827	159,101,002	79,191		159,286,020	192,367
16.	Iowa	IA	L	87,256	50,453,708	78,634		50,619,598	186,428
17.	Kansas	KS	L	69,759	40,549,189	97,552		40,716,500	
18.	Kentucky	KY	L	108,863	62,044,120	98,362		62,251,345	
19.	Louisiana	LA	L	143,400	120,011,748	5,799		120,160,947	
20.	Maine	ME	L	50,945	27,041,083	4,150		27,096,178	
21.	Maryland	MD	L	323,156	178,016,144	(3,895)		178,335,405	62,143
22.	Massachusetts	MA	L	280,709	152,827,894			153,108,603	1,328,697
23.	Michigan	MI	L	155,968	263,842,480	2,429		264,000,877	
24.	Minnesota	MN	L	289,247	110,277,188	5,123		110,571,558	46,669
25.	Mississippi	MS	L	78,913	35,265,862	2,199		35,346,974	
26.	Missouri	MO	L	200,199	369,079,031	115,378		369,394,608	792,036
27.	Montana	MT	L	5,220	4,830,787			4,836,007	
28.	Nebraska	NE	L	86,694	25,137,305	59,744		25,283,743	
29.	Nevada	NV	L	183,775	53,175,907	11,056		53,370,738	
30.	New Hampshire	NH	L	40,536	31,898,432	39,838		31,978,806	1,115,379
31.	New Jersey	NJ	L	349,354	306,301,967	5,098		306,656,419	2,919,276
32.	New Mexico	NM	L	194,809	19,859,654			20,054,463	11,299
33.	New York	NY	N	75,009	28,815,788	10,814		28,901,611	
34.	North Carolina	NC	L	707,504	292,397,338	997,838		294,102,680	
35.	North Dakota	ND	L	33,859	16,751,749			16,785,608	
36.	Ohio	OH	L	233,615	306,734,562	34,737		307,002,914	869,222
37.	Oklahoma	OK	L	356,330	34,727,728	56,658		35,140,716	53,213
38.	Oregon	OR	L	69,818	60,610,218	57,327		60,737,363	221,382
39.	Pennsylvania	PA	L	736,494	412,058,326	13,395		412,808,215	1,791,710
40.	Rhode Island	RI	L	31,099	45,887,931	2,020		45,921,050	
41.	South Carolina	SC	L	245,962	194,311,463	160,492		194,717,917	631,356
42.	South Dakota	SD	L	38,951	14,628,107	25		14,667,083	
43.	Tennessee	TN	L	280,468	173,810,611	150,032		174,241,111	
44.	Texas	TX	L	1,484,815	359,017,818	76,936		360,579,569	112,987
45.	Utah	UT	L	68,871	50,910,509	28,959		51,008,339	
46.	Vermont	VT	L	28,786	10,954,564	11,549		10,994,899	
47.	Virginia	VA	L	522,325	193,685,066	157,603		194,364,994	
48.	Washington	WA	L	219,736	136,429,762	131,423		136,780,921	409,917
49.	West Virginia	WV	L	83,901	31,808,540	4,636		31,897,077	95,481
50.	Wisconsin	WI	L	162,177	147,117,879	185,449		147,465,505	294,712
51.	Wyoming	WY	L	15,430	5,990,594			6,006,024	
52.	American Samoa	AS	N					0	
53.	Guam	GU	N	55,198				55,198	
54.	Puerto Rico	PR	L	347				347	
55.	U.S. Virgin Islands	VI	N	1,174				1,174	
56.	Northern Mariana Islands	MP	N					0	
57.	Canada	CAN	N					0	
58.	Aggregate Other Aliens	OT	XXX	63,172	362,080	625	0	425,877	0
59.	Subtotal	XXX		14,545,823	7,138,684,076	3,162,129	0	7,156,392,028	15,687,147
90.	Reporting entity contributions for employee benefits plans	XXX						0	
91.	Dividends or refunds applied to purchase paid-up additions and annuities	XXX						0	
92.	Dividends or refunds applied to shorten endowment or premium paying period	XXX						0	
93.	Premium or annuity considerations waived under disability or other contract provisions	XXX		343,083		261,816		604,899	
94.	Aggregate or other amounts not allocable by State	XXX		0	0	0	0	0	0
95.	Totals (Direct Business)	XXX		14,888,906	7,138,684,076	3,423,945	0	7,156,996,927	15,687,147
96.	Plus Reinsurance Assumed	XXX		2,050,353	162,864	2,235,446		4,448,663	
97.	Totals (All Business)	XXX		16,939,259	7,138,846,940	5,659,391	0	7,161,445,590	15,687,147
98.	Less Reinsurance Ceded	XXX		6,570,164	520,578,208	3,423,945		530,572,317	29,626
99.	Totals (All Business) less Reinsurance Ceded	XXX		10,369,095	6,618,268,732	2,235,446	0	6,630,873,273	15,657,521
DETAILS OF WRITE-INS									
58001.	Other Alien	XXX		63,172	362,080	625		425,877	
58002.		XXX							
58003.		XXX							
58998.	Summary of remaining write-ins for Line 58 from overflow page	XXX		0	0	0	0	0	0
58999.	Totals (Lines 58001 through 58003 plus 58998)(Line 58 above)	XXX		63,172	362,080	625	0	425,877	0
9401.		XXX							
9402.		XXX							
9403.		XXX							
9498.	Summary of remaining write-ins for Line 94 from overflow page	XXX		0	0	0	0	0	0
9499.	Totals (Lines 9401 through 9403 plus 9498)(Line 94 above)	XXX		0	0	0	0	0	0

(a) Active Status Counts:

1. L - Licensed or Chartered - Licensed insurance carrier or domiciled RRG.....	51	4. Q - Qualified - Qualified or accredited reinsurer.....	0
2. R - Registered - Non-domiciled RRGs.....	0	5. N - None of the above - Not allowed to write business in the state.....	6
3. E - Eligible - Reporting entities eligible or approved to write surplus lines in the state.....	0		

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

The following entities are general partner level or above of **Massachusetts Mutual Life Insurance Company** (Parent)

	<u>Federal Tax ID</u>	<u>NAIC Co Code</u>	<u>State of Domicile</u>
MASSACHUSETTS MUTUAL LIFE INSURANCE COMPANY	04-1590850	65935	Massachusetts
Direct & Indirect Owned Subsidiaries:			
C.M. Life Insurance Company	06-1041383	93432	Connecticut
MML Bay State Life Insurance Company	43-0581430	70416	Connecticut
CML Special Situations Investor LLC	None		Delaware
CM Life Mortgage Lending LLC	None		Delaware
CML Mezzanine Investor III, LLC	None		Delaware
CML Global Capabilities LLC	None		Delaware
MM Global Capabilities I LLC	None		Delaware
MassMutual Global Business Services India LLP	None		India
MM Global Capabilities (Netherlands) B.V.	None		Netherlands
MassMutual Global Business Services Romania S.R.L.	None		Romania
MM Global Capabilities II LLC	None		Delaware
MM Global Capabilities III LLC	None		Delaware
MM/Barings Multifamily TEBS 2020 LLC	None		Delaware
Berkshire Way LLC	04-1590850		Delaware
MML Special Situations Investor LLC	None		Delaware
Timberland Forest Holding LLC	47-5322979		Delaware
Lyme Adirondack Forest Company, LLC	None		Delaware
Lyme Adirondack Timberlands I, LLC	None		Delaware
Lyme Adirondack Timberlands II, LLC	None		Delaware
Lyme Adirondack Timber Sales, LLC	None		Delaware
MSP-SC, LLC	04-1590850		Delaware
Insurance Road LLC	04-1590850		Delaware
MassMutual Trad Private Equity LLC	04-1590850		Delaware
MassMutual Intellectual Property LLC	04-1590850		Delaware
Trad Investments I LLC	None		Delaware
ITPS Holding LLC	None		Delaware
HITPS LLC	None		Delaware
EM Opportunities LLC	None		Delaware
MassMutual MCAM Insurance Company, Inc.	None		Vermont
MassMutual Ventures US IV GP, LLC*	None		Delaware
MassMutual Ventures US IV, L.P.	None		Delaware
MassMutual Ventures US IV, LLC	None		Delaware
MassMutual Ventures Europe/APAC I GP, LLC	None		Delaware
MassMutual Ventures Europe/APAC I GP, L.P.	None		Cayman Islands
MassMutual Ventures Europe/APAC I L.P.	None		Cayman Islands
MassMutual Ventures Southeast Asia III LLC	None		Delaware
MMV Digital I LLC	None		Cayman Islands

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

12.1

	<u>Federal Tax ID</u>	<u>NAIC Co Code</u>	<u>State of Domicile</u>
Counterpointe Sustainable Advisors LLC	None		Delaware
CSA Intermediate Holdco LLC	None		Delaware
Counterpointe Trust Services LLC	None		Delaware
CP PACE LLC	None		Delaware
Counterpointe Titling Trust	None		Delaware
CSA Employee Services Company LLC	None		Delaware
Counterpointe Sustainable Real Estate II LLC	None		Delaware
Counterpointe Energy Solutions II LLC	None		Delaware
Counterpointe Energy Solutions (CA) II LLC	27-0105644		Delaware
Counterpointe Energy Solutions (FL) II LLC	None		Delaware
Counterpointe Energy Solutions (IL) LLC	None		Delaware
Loop-Counterpointe PACE LLC	None		Delaware
Counterpointe Energy Services LLC	None		Delaware
CSA Incentive Holdco LLC	None		Delaware
Jefferies Finance LLC	27-0105644		Delaware
JFIN GP Adviser LLC	None		Delaware
Jefferies MM Lending LLC	None		Delaware
Green SPE LLC	None		Delaware
Apex Credit Partners LLC	None		Delaware
Apex GP I LLC	None		Delaware
Apex Securitized Income Fund LP	None		Delaware
Jefferies Credit Partners LLC	None		Delaware
Jefferies Credit Management LLC	None		Delaware
JCM GP I LLC	None		Delaware
JCM H-2 Credit Fund GP LLC	None		Delaware
JCP Direct Lending CLO 2022 LLC	None		Delaware
Jefferies Direct Lending Europe SCSp SICAV-RAIF	None		Luxembourg
Jefferies Credit Management Holdings LLC	None		Delaware
JDLF GP (Europe) S.a.r.l	None		Luxembourg
JFAM GP LLC	None		Delaware
JFAM GP LP	None		Delaware
Jefferies Direct Lending Fund C LP	None		Delaware
Jefferies DLF C Holdings LLC	None		Delaware
Jefferies Direct Lending Fund C SPE LLC	None		Delaware
JDLF II GP LLC	None		Delaware
JDLF II GP LP	None		Delaware
Jefferies Direct Lending Fund II C LP	None		Delaware
Jefferies DLF 2 C Holdings LLC	None		Delaware
Jefferies Direct Lending Fund II C SPE LLC	None		Delaware
JDLF III GP LLC*	None		Delaware
JDLF III GP LP*	None		Delaware
Jefferies Direct Lending Fund III C LP	None		Delaware
JCP Direct Lending CLO 2023-1 LLC	None		Delaware

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

	Federal Tax ID	NAIC Co Code	State of Domicile
JCP Direct Lending CLO 2023 Ltd.	None		Jersey Channel Islands
JCP GP I LLC	None		Delaware
Jefferies M Super Private Credit Fund GP LLC	None		Delaware
Jefferies Private Credit BDC Inc.	None		Maryland
JCP Funding 2024 LLC	None		Delaware
Jefferies Senior Lending LLC	None		Delaware
JFIN Revolver Holdings LLC	None		Delaware
JFIN Revolver Holdings II LLC	None		Delaware
JFIN Co-Issuer Corporation	None		Delaware
JFIN Europe GP, S.a.r.l.	None		Luxembourg
Jefferies Finance Europe, S.L.P.	None		Luxembourg
Jefferies Finance Europe, SCSp	None		Luxembourg
Jefferies Finance Business Credit LLC	None		Delaware
JFIN Business Credit Fund I LLC	None		Delaware
JFIN Funding 2021 LLC	None		Delaware
JSPCS MM LLC	None		Delaware
JFIN LC Fund LLC	None		Delaware
JFIN Revolver CLO 2017 Ltd.	None		Cayman Islands
JFIN Revolver CLO 2017-II Ltd.	None		Cayman Islands
JFIN Revolver CLO 2017-III Ltd.	None		Cayman Islands
JFIN Revolver CLO 2018 Ltd.	None		Cayman Islands
JFIN Revolver CLO 2019 Ltd.	None		Cayman Islands
JFIN Revolver CLO 2019-II Ltd.	None		Cayman Islands
JFIN Revolver CLO 2020 Ltd.	None		Cayman Islands
JFIN Revolver CLO 2021-II Ltd.	None		Cayman Islands
JFIN Revolver CLO 2021-V Ltd.	None		Cayman Islands
JFIN Revolver CLO 2022-II Ltd.	None		Cayman Islands
JFIN Revolver CLO 2022-III Ltd.	None		Cayman Islands
JFIN Revolver CLO 2022-IV Ltd.	None		Cayman Islands
JFIN Revolver CLO 2024-I Ltd.	None		Delaware
JFIN Revolver CLO 2022-IV LLC	None		Cayman Islands
JFIN Revolver Fund, L.P.	None		Delaware
JFIN Revolver Funding 2021 Ltd.	None		Delaware
JFIN Revolver Funding 2021-III Ltd.	None		Delaware
JFIN Revolver Funding 2021-IV Ltd.	None		Delaware
JFIN Revolver Funding 2022-I Ltd.	None		Bermuda
JFIN Revolver SPE1 2022 LLC	None		Delaware
JFIN Revolver SPE3 2022 LLC	None		Delaware
JFIN Revolver SPE4 2022 LLC	None		Delaware
JFIN Revolver SPE4 2022 Ltd.	None		Delaware
JCP Private Loan Management GP LLC	None		Delaware
JCP Private Loan Management LP	None		Delaware
Apex Credit Holdings LLC	None		Delaware

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

12.3

	Federal Tax ID	NAIC Co Code	State of Domicile
JFIN CLO 2012 Ltd.	None		Cayman Islands
JFIN CLO 2013 Ltd.	None		Cayman Islands
JFIN CLO 2014 Ltd.	None		Cayman Islands
JFIN CLO 2014-II Ltd.	None		Cayman Islands
JFIN CLO 2015 Ltd.	None		Cayman Islands
JFIN CLO 2015-II Ltd.	None		Cayman Islands
JFIN CLO 2016 Ltd.	None		Cayman Islands
JFIN CLO 2017 Ltd.	None		Cayman Islands
JFIN CLO 2017 II Ltd.	None		Cayman Islands
Tomorrow Parent, LLC	None		Delaware
Custom Ecology Holdco, LLC	None		Delaware
Glidepath Holdings Inc.	86-2294635		Delaware
MassMutual Ascend Life Insurance Company	13-1935920	63312	Ohio
AAG Insurance Agency, LLC	31-1422717		Kentucky
Annuity Investors Life Insurance Company	31-1021738	93661	Ohio
MM Ascend Life Investor Services, LLC	31-1395344		Ohio
MM Ascend Mortgage Lending LLC	None		Ohio
Manhattan National Holding, LLC	26-3260520		Ohio
Manhattan National Life Insurance Company	45-0252531	67083	Ohio
MassMutual Mortgage Lending LLC	None		Delaware
MM Copper Hill Road LLC	04-1590850		Delaware
MMV CTF I GP LLC	None		Delaware
MassMutual Ventures Climate Technology Fund I LP	None		Delaware
MM Direct Private Investments Holding LLC	None		Delaware
MM Direct Private Investments UK Limited	None		England & Wales
DPI-ACRES Capital LLC	None		Delaware
DPI-ARES Mortgage Lending LLC	None		Delaware
MM Investment Holding	None		Cayman Islands
MMIH Bond Holdings LLC	None		Delaware
MassMutual Asset Finance LLC*	26-0073611		Delaware
MMAF Equipment Finance LLC 2017-B	32-0546197		Delaware
MMAF Equipment Finance LLC 2019-A	83-3722640		Delaware
MMAF Equipment Finance LLC 2019-B	None		Delaware
MMAF Equipment Finance LLC 2020-A	None		Delaware
MMAF Equipment Finance LLC 2020-B	None		Delaware
MMAF Equipment Finance LLC 2021-A	None		Delaware
MMAF Equipment Finance LLC 2022-A	None		Delaware
MMAF Equipment Finance LLC 2022-B	None		Delaware
MMAF Equipment Finance LLC 2023-A	None		Delaware
MMAF Equipment Finance LLC 2024-A	None		Delaware
MML Management Corporation	04-2443240		Massachusetts
MassMutual International Holding MSC, Inc.	04-3548444		Massachusetts

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

	Federal Tax ID	NAIC Co Code	State of Domicile
MassMutual Holding MSC, Inc.	04-3341767		Massachusetts
MML CM LLC	None		Delaware
Blueprint Income LLC	None		New York
Flourish Holding Company LLC	None		Delaware
Flourish Insurance Agency LLC	None		Delaware
Flourish Digital Assets LLC	None		Delaware
Flourish Financial LLC	None		Delaware
Flourish Technologies LLC	None		Delaware
MML Distributors LLC*	04-3356880		Massachusetts
MML Investment Advisers, LLC	None		Delaware
MML Strategic Distributors, LLC	46-3238013		Delaware
The MassMutual Trust Company, FSB	06-1563535		Connecticut
MML Private Placement Investment Company I, LLC	04-1590850		Delaware
MML Private Equity Fund Investor LLC	04-1590850		Delaware
MM Private Equity Intercontinental LLC	04-1590850		Delaware
Pioneers Gate LLC	45-2738137		Delaware
MassMutual Holding LLC	04-2854319		Delaware
Fern Street LLC	37-1732913		Delaware
Low Carbon Energy Holding	None		United Kingdom
Sleeper Street LLC	None		Delaware
Haven Life Insurance Agency, LLC	46-2252944		Delaware
GASL Holdings LLC	None		Delaware
Barings Asset-Based Income Fund (US) LP*	None		Delaware
Barings Perpetual European Direct Lending Fund	None		Luxembourg
Barings Emerging Generation Fund II	88-0916548		Delaware
Babson Capital Global Special Situation Credit Fund 2*	98-1206017		Delaware
Barings Global Real Assets Fund LP*	82-3867745		Delaware
Barings Global Special Situations Credit Fund 3	None		Luxembourg
MassMutual Assignment Company	06-1597528		North Carolina
MassMutual Capital Partners LLC	04-1590850		Delaware
Marco Hotel LLC	46-4255307		Delaware
HB Naples Golf Owner LLC	45-3623262		Delaware
RB Apartments LLC	82-4411267		Delaware
Intermodal Holding II LLC	None		Delaware
MassMutual Ventures Holding LLC	None		Delaware
Crane Venture Partners LLP	None		United Kingdom
MassMutual Ventures Management LLC	None		Delaware
MassMutual Ventures SEA Management Private Limited	None		Singapore
MMV UK/SEA Limited	None		England & Wales
MassMutual Ventures India Private Limited	None		India
MassMutual Ventures Southeast Asia I LLC	None		Delaware
MassMutual Ventures Southeast Asia II LLC	None		Delaware
MassMutual Ventures UK LLC	None		Delaware

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

	Federal Tax ID	NAIC Co Code	State of Domicile
MassMutual Ventures US I LLC	47-1296410		Delaware
MassMutual Ventures US II LLC	None		Delaware
MassMutual Ventures US III LLC	None		Delaware
MM Catalyst Fund LLC	None		Delaware
MM Catalyst Fund II LLC	None		Delaware
MM Rothesay Holdco US LLC	04-1590850		Delaware
Rothesay Limited	None		United Kingdom
Rothesay Mortgages Limited	None		United Kingdom
Rothesay Life Plc	None		United Kingdom
Rothesay MA No.1 Limited	None		United Kingdom
Rothesay MA No.3 Limited	None		United Kingdom
Rothesay MA No.4 Limited	None		United Kingdom
LT Mortgage Financing Limited	None		United Kingdom
Rothesay Property Partnership 1 LLP	None		United Kingdom
Rothesay Foundation	None		United Kingdom
Rothesay Pensions Management Limited	None		United Kingdom
Rothesay Asset Management UK Limited	None		United Kingdom
Rothesay Asset Management Australia Pty Ltd	None		Australia
Rothesay Asset Management North America LLC	None		Delaware
MML Investors Services, LLC	04-1590850		Massachusetts
MML Insurance Agency, LLC	04-1590850		Massachusetts
MMLISI Financial Alliances, LLC	41-2011634		Delaware
LifeScore Labs, LLC	47-1466022		Massachusetts
MM Asset Management Holding LLC	45-4000072		Delaware
Barings LLC	51-0504477		Delaware
Baring Asset Management (Asia) Holdings Limited	98-0524271		Hong Kong, Special Administrative Region of China
Baring International Fund Managers (Bermuda) Limited	98-0457465		Bermuda
Baring Asset Management (Asia) Limited	98-0457463		Hong Kong, Special Administrative Region of China
Baring Asset Management Korea Limited	None		Korea
Barings Investment Management (Shanghai) Limited	None		Hong Kong, Special Administrative Region of China
Barings Overseas Investment Fund Management (Shanghai) Limited	None		Hong Kong, Special Administrative Region of China
Baring SICE (Taiwan) Limited	98-0457707		Taiwan ROC
Barings Singapore Pte. Ltd.	None		Singapore
Barings Japan Limited	98-0236449		Japan
Barings Australia Holding Company Pty Ltd	None		Australia
Barings Australia Pty Ltd	None		Australia
Barings Australia Real Estate Holdings Pty Ltd	None		Australia
Barings Australia Real Estate Pty Ltd	14-0045656		Australia
Barings Australia Property Partners Holdings Pty Ltd	98-0457456		Australia
Barings Australia Asset Management Pty Ltd	None		Australia
Barings Australia Property Partners Pty Ltd	None		Australia
Barings Australia Structured Finance Holdings Pty Ltd	None		Australia
Barings Australia Structured Finance Pty Ltd	None		Australia

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

12.6

	Federal Tax ID	NAIC Co Code	State of Domicile
Gryphon Capital Partners Pty Ltd	None		Australia
Gryphon Capital Management Pty Ltd	None		Australia
Gryphon Capital Investments Pty Ltd	None		Australia
Barings Finance LLC	80-0875475		Delaware
BCF Europe Funding Limited	None		Ireland
BCF Senior Funding I LLC	None		Delaware
BCF Senior Funding I Designated Activity Company	None		Ireland
Barings Real Estate Acquisitions LLC	None		Delaware
Barings Securities LLC	04-3238351		Delaware
Barings Guernsey Limited	98-0437588		Guernsey
Barings Europe Limited	None		United Kingdom
Barings Asset Management Spain SL	None		Spain
Baring France SAS	None		France
Baring International Fund Managers (Ireland) Limited	None		Ireland
Barings GmbH	None		Germany
Barings Italy S.r.l.	None		Italy
Barings Sweden AB	None		Sweden
Barings Netherlands B.V.	None		Netherlands
Barings (U.K.) Limited	98-0432153		United Kingdom
Barings Switzerland Sàrl	None		Switzerland
Baring Asset Management Limited	98-0241935		United Kingdom
Barings European Direct Lending 1 GP LLP	None		United Kingdom
Baring International Investment Limited	98-0457328		United Kingdom
Baring Fund Managers Limited	98-0457586		United Kingdom
BCGSS 2 GP LLP	None		United Kingdom
Baring Investment Services Limited	98-0457578		United Kingdom
Barings Core Fund Feeder I GP S.à.r.l.	None		Luxembourg
Barings Investment Fund (LUX) GP S.à r.l.	None		Luxembourg
Barings BME GP S.à.r.l.	None		United Kingdom
Barings GPC GP S.à.r.l.	None		Luxembourg
Barings European Core Property Fund GP Sà.r.l	None		United Kingdom
Barings Umbrella Fund (LUX) GP S.à.r.l.	None		Luxembourg
GPLF4(S) GP S.à r. l	None		Luxembourg
PREIF Holdings Limited Partnership	None		United Kingdom
BMC Holdings DE LLC	None		Delaware
Barings Real Estate Advisers Inc.	04-3238351		Delaware
Remington L & W Holdings LLC	81-4065378		Delaware
Aland Royalty GP, LLC	None		Delaware
Alaska Future Fund GP, LLC	None		Delaware
BAI Funds SLP, LLC	None		Delaware
BAI GP, LLC	None		Delaware
Baring Asset-Based Income Fund (US) GP, LLC	None		Delaware
Barings CMS Fund GP, LLC	None		Delaware

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

12.7

	<u>Federal Tax ID</u>	<u>NAIC Co Code</u>	<u>State of Domicile</u>
Barings Infiniti Fund Management LLC	None		Delaware
Barings New Jersey Emerging Manager Program GP, LLC	None		Delaware
Barings Hotel Opportunity Venture I GP, LLC	None		Delaware
Baring Investment Series LLC	None		Delaware
Barings Emerging Generation Fund GP, LLC	None		Delaware
Barings Emerging Generation Fund GP II, LLC	None		Delaware
Barings EPLF4 Rated Feeder, L.P.	None		Delaware
Barings ERS PE Emerging Manager III GP, LLC	None		Delaware
Barings FC III LLC	None		Delaware
Barings Global Investment Funds (U.S.) Management LLC	04-1590850		Delaware
Barings CLO Investment Partners GP, LLC	None		Delaware
Barings Core Property Fund GP LLC	None		Delaware
Barings DAPPLF1 Rated Feeder, G.P.	None		Delaware
Barings DAPPLF1 Rated Feeder, L.P.	None		Delaware
Barings Direct Lending GP Ltd.	None		Cayman Islands
Barings Diversified Residential Fund GP LLC	None		Delaware
Barings Diversified Residential Fund LP	None		Delaware
Barings Global Energy Infrastructure Advisors, LLC	None		Delaware
Barings Capital Solutions Perpetual Fund GP LLC	None		Delaware
Barings Centre Street CLO Equity Partnership GP, LLC	None		Delaware
Barings Centre Street CLO Equity Partnership LP	None		Delaware
Barings Global Real Assets Fund GP, LLC	None		Delaware
Barings GPSF LLC	None		Delaware
Barings North American Private Loan Fund Management, LLC	None		Delaware
Barings North American Private Loan Fund II Management, LLC	None		Delaware
Barings North American Private Loan Fund III Management, LLC	None		Delaware
Barings Global Special Situations Credit Fund 4 GP (Delaware) LLC	None		Delaware
Barings - MM Revolver Fund GP LLC	None		Delaware
Barings Real Estate European Value Add Fund II Feeder LLC	None		Cayman Islands
Barings SEM GP LLC	None		Delaware
BMT RE Debt Fund GP LLC	None		Delaware
Barings Small Business Fund LLC	84-5063008		Delaware
Barings TYIDF2 Rated Feeder GP LLC	None		Delaware
Barings TYIDF2 Rated Feeder, L.P.	None		Delaware
Barings Active Passive Equity Direct EAFE LLC	None		Delaware
BCLF GP LLC	None		Delaware
Benton Street Advisors, Inc.	98-0536233		Cayman Islands
BHOVI Incentive LLC	None		Delaware
BIG Real Estate Fund GP LLC	None		Delaware
BIG Real Estate Incentive I LLC	None		Delaware
BIG Real Estate Incentive II LLC	None		Delaware
BRECS VII GP LLC	None		Delaware
BREDIF GP LLC	None		Delaware

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

		Federal Tax ID	NAIC Co Code	State of Domicile
	CPF Springing Member, LLC	None		Delaware
	CREA-MA Reorganization Trust	None		Delaware
	CREF X GP LLC	None		Delaware
	Great Lakes III GP, LLC	04-1590850		Delaware
	Lake Jackson LLC	None		Delaware
	Barings Emerging Markets Blended Fund I GP, LLC	None		Delaware
	Barings EPLF4 Rated Feeder GP LLC	None		Delaware
	Mezzco III LLC	41-2280126		Delaware
	Mezzco IV LLC	80-0920285		Delaware
	Mezzco Australia II LLC	None		Delaware
	RECSA-NY GP LLC	None		Delaware
	Barings CLO 2022-I	98-1624360		Cayman Island
	Barings CLO 2022-II	None		Cayman Island
	Amherst Long Term Holdings, LLC	None		Delaware
	Enroll Confidently, Inc.	None		Delaware
	MassMutual International LLC	04-3313782		Delaware
	MassMutual Solutions LLC	None		Delaware
	Haven Technologies Asia Limited	None		Hong Kong
	Yunfeng Financial Group Limited	None		Hong Kong
	MassMutual External Benefits Group LLC	27-3576835		Delaware
	MM Vine Street LLC	None		Delaware
	Stillings Street LLC	None		Delware
	5301 Wisconsin Avenue Associates, LLC	None		District of Columbia
	5301 Wisconsin Avenue GP, LLC	None		Delaware
Other Affiliates & Funds:				
	100 w. 3rd Street LLC	04-1590850		Delaware
	300 South Tryon Hotel LLC	82-2432216		Delaware
	300 South Tryon LLC	04-1590850		Delaware
	Almack Mezzanine Fund II Unleveraged LP	None		United Kingdom
	Barings Affordable Housing Mortgage Fund I LLC	82-3468147		Delaware
	Barings Affordable Housing Mortgage Fund II LLC	61-1902329		Delaware
	Barings Affordable Housing Mortgage Fund III LLC	85-3036663		Delaware
	Barings Construction Lending Fund LP	None		Delaware
	Barings Emerging Generation Fund II LP	None		Delaware
	Barings Emerging Generation Fund, LP	84-3784245		Delaware
	Barings Emerging Markets Corporate Bond Fund	None		Ireland
	Barings Hotel Opportunity Venture I LP	None		Delaware
	Barings Miller Investment Trust	04-1590850		Australia
	Barings Real Estate Debt Income Fund LP	85-3449260		Delaware
	Barings Real Estate European Value Add I SCSp	None		Luxembourg
	Barings Small Business Fund, L.P.	None		Delaware
	Barings-MM Revolver Fund LP*	None		Delaware
	Barings U.S. High Yield Fund	None		Delaware

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

	Federal Tax ID	NAIC Co Code	State of Domicile
Beauty Brands Acquisition LLC	None		Delaware
Beauty Brands Acquisition Intermediate LLC	None		Delaware
Forma Brands, LLC	None		Delaware
Cornerstone Permanent Mortgage Fund LLC	45-2632610		Massachusetts
CREA Ridge Apartments, LLC	None		Delaware
Euro Real Estate Holdings Herleshausen LLC	None		Delaware
London Office JV Holdings LLC	None		Delaware
Riverwalk MM Member, LLC	None		Delaware
Aland Royalty Holdings LP	None		Delaware
Chassis Acquisition Holding LLC	81-2244465		Delaware
CRA Aircraft Holding LLC	81-4258759		Delaware
EIP Holdings I, LLC	None		Delaware
Red Lake Ventures, LLC	46-5460309		Delaware
Validus Holding Company LLC	46-0687392		Delaware
SBNP SIA II LLC	04-1590850		Delaware
SBNP SIA III LLC	None		Delaware
MM Speedway El Paso Member LLC	None		Delaware
Barings European Real Estate Debt Income Fund	None		Luxembourg
Babson Capital Loan Strategies Fund, L.P.*	37-1506417		Delaware
Barings US High Yield Bond Fund	None		Ireland
Babson CLO Ltd. 2015-I	None		Cayman Islands
Babson CLO Ltd. 2015-II	None		Cayman Islands
Babson CLO Ltd. 2016-II	None		Cayman Islands
Barings CLO 2018-III	None		Cayman Islands
Barings CLO 2018-IV	None		Cayman Islands
Barings CLO 2019-II	98-1473665		Cayman Islands
Barings CLO 2019-III	None		Cayman Islands
Barings CLO 2019-IV	None		Cayman Islands
Barings CLO 2020-I	None		Cayman Islands
Barings CLO 2020-III	None		Cayman Islands
Barings CLO 2020-IV	None		Cayman Islands
Barings CLO 2021-I	None		Cayman Islands
Barings CLO 2021-II	None		Cayman Islands
Barings CLO 2021-III	None		Cayman Islands
Barings CLO 2024-II	None		Cayman Islands
Babson Euro CLO 2014-I BV	None		Netherlands
Babson Euro CLO 2015-I BV	None		Netherlands
Barings Euro CLO 2019-I	3603726OH		Ireland
Barings Euro CLO 2019-II	None		Ireland
Barings Euro CLO 2020-I DAC	None		Ireland
Barings Euro CLO 2021-I DAC	3715576VH		Ireland
Barings Euro CLO 2021-II DAC	3750378QH		Ireland
Barings Euro CLO 2021-III DAC	None		Ireland

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

	<u>Federal Tax ID</u>	<u>NAIC Co Code</u>	<u>State of Domicile</u>
Barings Euro CLO 2023-II DAC	None		Ireland
Barings Global Energy Infrastructure Fund I LP	98-1332384		Cayman Islands
Barings Global Special Situations Credit 4 Delaware*	85-1465973		Delaware
Barings Global Special Situations Credit 4 LUX*	98-1570693		Luxembourg
Barings Europe Select Fund	None		Ireland
Barings Hotel Opportunity Venture	87-0977058		Connecticut
Barings Innovations & Growth Real Estate Fund*	86-3661023		Delaware
Barings Middle Market CLO 2017-I Ltd & LLC	None		Cayman Islands
Barings Middle Market CLO 2018-I	None		Cayman Islands
Barings Middle Market CLO 2019-I	None		Cayman Islands
Barings Middle Market CLO Ltd 2021-I	98-1612604		Cayman Islands
Barings Middle Market CLO Ltd 2023-I	None		Bermuda
Barings Middle Market CLO Ltd 2023-II	None		Bermuda
Barings RE Credit Strategies VII LP	98-1332384		Delaware
Barings Target Yield Infrastructure Debt Fund	98-1567942		Luxembourg
Barings CLO Investment Partners LP	81-0841854		Delaware
Barings Euro Value Add II (BREEVA II)*	None		Luxembourg
Barings Transportation Fund LP*	87-1262754		Delaware
Braemar Energy Ventures I, L.P.*	None		Delaware
Barings European Core Property Fund SCSp*	None		Luxembourg
Barings European Private Loan Fund III A	46-5001122		Luxembourg
Benchmark 2018-B2 Mortgage Trust	38-4059932		New York
Benchmark 2018-B4	None		New York
Benchmark 2018-B8	38-4096530		New York
Barings Core Property Fund LP	20-5578089		Delaware
DPI Acres Capital SPV LLC	04-1590850		Delaware
DPI-ARES Mortgage Lending SPV, LLC	04-1590850		Delaware
E2E Affordable Housing Debt Fund LLC	None		Delaware
Great Lakes III, L.P.	37-1708623		Delaware
GIA EU Holdings - Emerson JV Sarl	98-1607033		Luxembourg
JPMCC Commercial Mortgage Securities Trust 2017-JP7	38-4041011; 38-4041012		New York
JPMDB Commercial Mortgage Securities Trust 2017-C5	38-4032059		New York
Martello Re Feeder LP	None		Delaware
Martello Re LP	None		Delaware
Martello Re Holding Limited LLC	None		Delaware
Martello Re Limited	None		Bermuda
Martello Re Services Company	None		Delaware
Miami Douglas Three MM, LLC	04-1590850		Delaware
MM BIG Peninsula Co-Invest Member LLC*	87-4021641		Delaware
MM Direct Private Investment Holding	04-1590850		Delaware
MM CM Holding LLC	None		Delaware
MM Debt Participations LLC	81-3000420		Delaware

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

	Federal Tax ID	NAIC Co Code	State of Domicile
MM MD1 Station Member LLC*	04-1590850		Delaware
MM MD2 Station Member LLC*	04-1590850		Delaware
MMV Climate Technology Fund GP*	04-1590850		Delaware
MM REED District Landco Member LLC	None		Delaware
MM Subline Borrower LLC	04-1590850		Delaware
SBNP SIA IV LLC	None		Delaware
Washington Pine LLC	04-1590850		Delaware
Ten Fan Pier Boulevard LLC	35-2553915		Delaware
Tower Square Capital Partners III, L.P.	41-2280127		Delaware
Tower Square Capital Partners IIIA, L.P.	41-2280129		Delaware
Trailside MM Member LLC*	04-1590850		Delaware
Washington Gateway Three LLC	32-0574045		Delaware
Washington Gateway Two LLC*	83-1325764		Delaware
MALIC Debt Participations LLC	None		Delaware
Barings Affiliates & Funds:			
Babson Capital Loan Strategies Master Fund LP	None		Cayman Islands
Barings China Aggregate Bond Private Securities Investment Fund	None		Peoples Republic of China
Barings Global High Yield Fund	47-3790192		Massachusetts
Great Lakes II LLC*	71-1018134		Delaware
Wood Creek Venture Fund LLC	04-1590850		Delaware
Barings Real Estate Affiliates & Funds:			
Barings California Mortgage Fund IV	None		California
Barings Umbrella Fund LUX SCSp SICAV RAIF*	None		Luxembourg
Calgary Railway Holding LLC	82-2285211		Delaware
Cornbrook PRS Holdings LLC	82-3307907		Delaware
Cornerstone California Mortgage Fund I LLC	95-4207717		California
Cornerstone California Mortgage Fund II LLC	95-4207717		California
Cornerstone California Mortgage Fund III LLC	95-4207717		California
Cornerstone Fort Pierce Development, LLC*	56-2630592		Delaware
Cornerstone Permanent Mortgage Fund II LLC	61-1750537		Massachusetts
Cornerstone Permanent Mortgage Fund III LLC	35-2531693		Massachusetts
Cornerstone Permanent Mortgage Fund IV LLC	61-1793735		Massachusetts
CREA/PPC Venture, LLC	20-0348173		Delaware
Danville Riverwalk Venture, LLC	82-2783393		Delaware
Euro Real Estate Holdings LLC	04-1590850		Delaware
Fan Pier Development LLC*	20-3347091		Delaware
GIA EU Holdings LLC - Avalon Spain	04-1590850		Delaware
GIA EU Holdings LLC	04-1590850		Delaware
Landmark Manchester Holdings LLC	81-5360103		Delaware
MMLIC Debt Participations LLC	13-1935920		Delaware
MM Brookhaven Member LLC	04-1590850		Delaware
MM Ascend Mtg. Lending LLC	04-1590850		Delaware
MM Kannapolis Industrial Member LLC*	04-1590850		Delaware

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

	Federal Tax ID	NAIC Co Code	State of Domicile
MM East South Crossing Member LLC	04-1590850		Delaware
MM Horizon Savannah Member LLC*	04-1590850		Delaware
MM Horizon Savannah Member II LLC*	04-1590850		Delaware
MM Ironhead Commerce Center	04-1590850		Delaware
MM National Self-Storage Program Member LLC	04-1590850		Delaware
MM 1400 E 4th Street Member LLC	04-1590850		Delaware
MM 1370 AVE OF AM LLC	04-1590850		Delaware
One Harbor Shore LLC*	80-0948028		Delaware
Paco France Logistics LLC	04-1590850		Delaware
Salomon Brothers Commercial Mortgage Trust 2001-MM	None		Delaware
Three PW Office Holding LLC	81-5273574		Delaware
Trailside MM Member II LLC	04-1590850		Delaware
Unna, Dortmund Holding LLC	82-3250684		Delaware
Washington Gateway Apartments Venture LLC*	45-5401109		Delaware
West 37th Street Hotel LLC*	88-3861481		Delaware
MassMutual Premier Funds:			
MassMutual Premier Strategic Emerging Markets Fund	26-3229251		Massachusetts
MassMutual Select Funds:			
MassMutual Select Mid-Cap Value Fund	42-1710935		Massachusetts
MassMutual Select Small Capital Value Equity Fund	02-0769954		Massachusetts
MassMutual Select Small Company Value Fund	04-3584140		Massachusetts
MassMutual Select T. Rowe Price Retirement 2005 Fund	82-3347422		Massachusetts
MassMutual Select T. Rowe Price Retirement 2010 Fund	82-3355639		Massachusetts
MassMutual Select T. Rowe Price Retirement 2015 Fund	82-3382389		Massachusetts
MassMutual Select T. Rowe Price Retirement 2020 Fund	82-3396442		Massachusetts
MassMutual Select T. Rowe Price Retirement 2025 Fund	82-3417420		Massachusetts
MassMutual Select T. Rowe Price Retirement 2030 Fund	82-3430358		Massachusetts
MassMutual Select T. Rowe Price Retirement 2035 Fund	82-3439837		Massachusetts
MassMutual Select T. Rowe Price Retirement 2040 Fund	82-3451779		Massachusetts
MassMutual Select T. Rowe Price Retirement 2045 Fund	82-3472295		Massachusetts
MassMutual Select T. Rowe Price Retirement 2050 Fund	82-3481715		Massachusetts
MassMutual Select T. Rowe Price Retirement 2055 Fund	82-3502011		Massachusetts
MassMutual Select T. Rowe Price Retirement 2060 Fund	82-3525148		Massachusetts
MassMutual Select T. Rowe Price Retirement Balanced Fund	82-3533944		Massachusetts
MML Series Investment Funds:			
MML Series International Equity Fund	46-4257056		Massachusetts
MML Series Investment Funds II:			
MML Series II Dynamic Bond Fund	47-3529636		Massachusetts
MML Series II Equity Rotation Fund	47-3544629		Massachusetts
MassMutual RetireSMART Funds:			
MassMutual RetireSMART 2035 Fund	27-1933380		Massachusetts
MassMutual RetireSMART 2045 Fund	27-1932769		Massachusetts
MassMutual RetireSMART 2055 Fund	46-3289207		Massachusetts

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y – INFORMATION CONCERNING ACTIVITIES OF INSURER MEMBERS OF A HOLDING COMPANY GROUP
PART 1 – ORGANIZATIONAL CHART

	Federal Tax ID	NAIC Co Code	State of Domicile
MassMutual RetireSMART 2060 Fund	47-5326235		Massachusetts
MassMutual 20/80 Allocation Fund	45-1618155		Massachusetts
MML SER INVT FD II ISHARES 80/20 ALLOCATION FD	45-1618222		Massachusetts
MassMutual RetireSMART In Retirement Fund	03-0532464		Massachusetts
MassMutual 40/60 Allocation Fund	45-1618262		Massachusetts
MassMutual 60/40 Allocation Fund	45-1618046		Massachusetts
MassMutual ishares 60/40 Allocation Fund	45-1618046		Massachusetts
MassMutual Balanced Fund	04-3212054		Massachusetts
MassMutual Blue Chip Growth Fund	04-3556992		Massachusetts
MassMutual Core Bond Fund	04-3277549		Massachusetts
MassMutual Disciplined Growth Fund	04-3539084		Massachusetts
MassMutual Disciplined Value Fund	04-3539083		Massachusetts
MassMutual Diversified Value Fund	01-0821120		Massachusetts
MassMutual Equity Opportunities Fund	04-3512590		Massachusetts
MassMutual Inflation-Protected and Income Fund	03-0532475		Massachusetts
MassMutual Mid Cap Growth Fund	04-3512596		Massachusetts
MassMutual Premier Diversified Bond Fund	04-3464165		Massachusetts
MassMutual RetireSMART by JPMorgan 2065 Fund	92-1441036		Massachusetts
MassMutual Select 80/20 Allocation Fund	45-1618222		Massachusetts
MassMutual Select Overseas Fund	04-3557000		Massachusetts
MassMutual Select T Rowe Price Retirement 2065 Fund	92-1427882		Massachusetts
MassMutual Small Cap Growth Equity Fund	04-3464205		Massachusetts
MassMutual Small Cap Opportunities Fund	04-3424705		Massachusetts
MassMutual Small Cap Value Equity Fund	02-0769954		Massachusetts
MassMutual Clinton Municipal Credit Opportunities Fund	93-4168848		Massachusetts
MassMutual Clinton Municipal Fund	93-4190918		Massachusetts
MassMutual Clinton Short-Term Municipal Fund	93-4193313		Massachusetts

*This entity is owned by another or multiple entities in the group. Please refer to Sch Y Part 1A for the ownership and percentage information.

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12 Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	13 If Control is Owner- ship Provide Percen- tage	14 Ultimate Controlling Entity(ies)/Person(s)	15 Is an SCA Filing Re- quired? (Yes/No)	16 *
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi- ciliary Loca- tion	Rela- tion- ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)					
. 0435 ...	Massachusetts Mut Life Ins Co	... 65935 ...	04-1590850 ..	3848388 .....	.....	.....	Massachusetts Mutual Life Insurance Company (MMLIC)	.. MA.....	.. UIP.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0435 ...	Massachusetts Mut Life Ins Co	... 93432 ...	06-1041383 ..	.....	.....	.....	C.M. Life Insurance Company	.. CT.....	.. IA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0435 ...	Massachusetts Mut Life Ins Co	... 70416 ...	43-0581430 ..	.....	.....	.....	MML Bay State Life Insurance Company	.. CT.....	.. IA.....	C.M. Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							CML Special Situations Investor LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							CM Life Mortgage Lending LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							CML Mezzanine Investor III, LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...										Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							CML Global Capabilities LLC	.. DE.....	.. NIA.....	Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							MM Global Capabilities I LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							MassMutual Global Business Services India LLP	.. IND.....	.. NIA.....	MM Global Capabilities I LLC	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							MM Global Capabilities (Netherlands) B.V. ...	.. NLD.....	.. NIA.....	MM Global Capabilities I LLC	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							MassMutual Global Business Services Romania S.R.L.	.. ROU.....	.. NIA.....	MM Global Capabilities (Netherlands) B.V. Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							MM Global Capabilities II LLC	.. DE.....	.. NIA.....	Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							MM Global Capabilities III LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							MM/Barings Multifamily TEBS 2020 LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	Berkshire Way LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							MML Special Situations Investor LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...			47-5322979 ..	.....	.....	.....	Timberland Forest Holding LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...			47-5322979 ..	.....	.....	.....	Timberland Forest Holding LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Influence.....	.....	MMLIC .....	.....	.....
. 0000 ...			47-5322979 ..	.....	.....	.....	Timberland Forest Holding LLC	.. DE.....	.. NIA.....	Wood Creek Capital Management LLC	Management.....	.....	MMLIC .....	.....	.....
. 0000 ...							Lyme Adirondack Forest Company, LLC	.. DE.....	.. NIA.....	Timberland Forest Holding LLC	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							Lyme Adirondack Timberlands I, LLC	.. DE.....	.. NIA.....	Lyme Adirondack Forest Company, LLC	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							Lyme Adirondack Timberlands II, LLC	.. DE.....	.. NIA.....	Lyme Adirondack Forest Company, LLC	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							Lyme Adirondack Timber Sales, LLC	.. DE.....	.. NIA.....	Lyme Adirondack Forest Company, LLC	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	MSP-SC, LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	Insurance Road LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	MassMutual Trad Private Equity LLC	.. DE.....	.. NIA.....	Insurance Road LLC	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	MassMutual Intellectual Property LLC	.. DE.....	.. NIA.....	Insurance Road LLC	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							Trad Investments I LLC	.. DE.....	.. NIA.....	Insurance Road LLC	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...										Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							ITPSHolding LLC	.. DE.....	.. NIA.....	Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							HITPS LLC	.. DE.....	.. NIA.....	ITPS Holding LLC	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...										Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							EM Opportunities LLC	.. DE.....	.. NIA.....	Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...							MassMutual MCAM Insurance Company, Inc.	.. VT.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000 ...	MMLIC .....	.....	.....
. 0000 ...										Massachusetts Mutual Life Insurance Company	Ownership.....	.. 99.000 ...	MMLIC .....	.....	.....
. 0000 ...							MassMutual Ventures US IV GP, LLC	.. DE.....	.. NIA.....	Company	Ownership.....	.....	MMLIC .....	.....	.....
. 0000 ...							MassMutual Ventures US IV GP, LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Ascend	Ownership.....	.. 1.000 ...	MMLIC .....	.....	.....

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12 Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	13 If Control is Owner- ship Provide Percen- tage	14 Ultimate Controlling Entity(ies)/Person(s)	15 Is an SCA Filing Re- quired? (Yes/No)	16 *
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi- ciliary Loca- tion	Rela- tion- ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)					
.0000							MassMutual Ventures US IV, L.P.	..DE....	NIA.....	MassMutual Ventures US IV GP, LLC	Ownership.....	100.000	MMLIC		
.0000							MassMutual Ventures US IV LLC	..DE....	NIA.....	MassMutual Ventures US IV, L.P.	Ownership.....	100.000	MMLIC		
.0000							MassMutual Ventures Europe/APAC I GP, LLC ..	..DE....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	100.000	MMLIC		
.0000							MassMutual Ventures Europe/APAC I GP, L.P. .	..CYM....	NIA.....	MassMutual Ventures Europe/APAC I GP, LLC	Ownership.....	100.000	MMLIC		
.0000							MassMutual Ventures Europe/APAC I L.P.	..CYM....	NIA.....	MassMutual Ventures Europe/APAC I GP, L.P.	Ownership.....	100.000	MMLIC		
.0000							MassMutual Ventures Southeast Asia III LLC .	..DE....	NIA.....	MassMutual Ventures Europe/APAC I L.P.	Ownership.....	100.000	MMLIC		
.0000							MMV Digital I LLC	..CYM....	NIA.....	MassMutual Ventures Southeast Asia III LLC	Ownership.....	100.000	MMLIC		
.0000							Counterpointe Sustainable Advisors LLC	..DE....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	100.000	MMLIC		
.0000							CSA Intermediate Holdco LLC	..DE....	NIA.....	Counterpointe Sustainable Advisors LLC ...	Ownership.....	100.000	MMLIC		
.0000							Counterpointe Trust Services LLC	..DE....	NIA.....	CSA Intermediate Holdco LLC	Ownership.....	100.000	MMLIC		
.0000							CP PACE LLC	..DE....	NIA.....	CSA Intermediate Holdco LLC	Ownership.....	100.000	MMLIC		
.0000							Counterpointe Titling Trust	..DE....	NIA.....	CP PACE LLC	Ownership.....	100.000	MMLIC		
.0000							CSA Employee Services Company LLC	..DE....	NIA.....	CSA Intermediate Holdco LLC	Ownership.....	100.000	MMLIC		
.0000							Counterpointe Sustainable Real Estate II LLC								
.0000								..DE....	NIA.....	CSA Intermediate Holdco LLC	Ownership.....	100.000	MMLIC		
.0000							Counterpointe Energy Solutions II LLC	..DE....	NIA.....	CSA Intermediate Holdco LLC	Ownership.....	100.000	MMLIC		
.0000							Counterpointe Energy Solutions (CA) II LLC .	..DE....	NIA.....	Counterpointe Energy Solutions II LLC	Ownership.....	100.000	MMLIC		
.0000							Counterpointe Energy Solutions (FL) II LLC .	..DE....	NIA.....	Counterpointe Energy Solutions II LLC	Ownership.....	100.000	MMLIC		
.0000							Counterpointe Energy Solutions (IL) LLC	..DE....	NIA.....	Counterpointe Energy Solutions II LLC	Ownership.....	100.000	MMLIC		
.0000							Loop-Counterpointe PACE LLC	..DE....	NIA.....	Counterpointe Energy Solutions (IL) LLC ...	Ownership.....	100.000	MMLIC		
.0000							Counterpointe Energy Services LLC	..DE....	NIA.....	CSA Intermediate Holdco LLC	Ownership.....	100.000	MMLIC		
.0000			27-0105644				CSA Incentive Holdco LLC	..DE....	NIA.....	Counterpointe Sustainable Advisors LLC ...	Ownership.....	100.000	MMLIC		1
.0000			27-0105644				Jefferies Finance LLC	..DE....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	50.000	MMLIC		1
.0000							JFIN GP Adviser LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000	MMLIC		
.0000							Jefferies MM Lending LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000	MMLIC		
.0000							Green SPE LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000	MMLIC		
.0000							Apex Credit Partners LLC	..DE....	NIA.....	Green SPE LLC	Ownership.....	100.000	MMLIC		
.0000							Apex GP I LLC	..DE....	NIA.....	Apex Credit Partners LLC	Ownership.....	100.000	MMLIC		
.0000							Apex Securitized Income Fund LP	..DE....	NIA.....	Apex GP I LLC	Ownership.....	100.000	MMLIC		
.0000							Jefferies Credit Partners LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000	MMLIC		
.0000							Jefferies Credit Management LLC	..DE....	NIA.....	Jefferies Credit Partners LLC	Ownership.....	100.000	MMLIC		
.0000							JCM GP I LLC	..DE....	NIA.....	Jefferies Credit Management LLC	Ownership.....	100.000	MMLIC		
.0000							JCM H-2 Credit Fund GP LLC	..DE....	NIA.....	Jefferies Credit Management LLC	Ownership.....	100.000	MMLIC		
.0000							JCP Direct Lending CLO 2022 LLC	..DE....	NIA.....	Jefferies Credit Management LLC	Ownership.....	100.000	MMLIC		
.0000							Jefferies Direct Lending Europe SCSp SICAV- RAIF	..LUX....	NIA.....	Jefferies Credit Partners LLC	Ownership.....	9.900	MMLIC		
.0000							Jefferies Credit Management Holdings LLC	..DE....	NIA.....	Jefferies Credit Partners LLC	Ownership.....	9.900	MMLIC		
.0000							JDLF GP (Europe) S.a.r.l	..LUX....	NIA.....	Jefferies Credit Partners LLC	Ownership.....	100.000	MMLIC		
.0000							JFAM GP LLC	..DE....	NIA.....	Jefferies Credit Partners LLC	Ownership.....	100.000	MMLIC		
.0000							JFAM GP LP	..DE....	NIA.....	Jefferies Credit Partners LLC	Ownership.....	100.000	MMLIC		
.0000							Jefferies Direct Lending Fund C LP	..DE....	NIA.....	JFAM GP LP	Ownership.....	100.000	MMLIC		
.0000							Jefferies DLF C Holdings LLC	..DE....	NIA.....	Jefferies Direct Lending Fund C LLC	Ownership.....	100.000	MMLIC		
.0000							Jefferies Direct Lending Fund C SPE LLC	..DE....	NIA.....	Jefferies DLF C Holdings LLC	Ownership.....	100.000	MMLIC		
.0000							JDLF II GP LLC	..DE....	NIA.....	Jefferies Credit Partners LLC	Ownership.....	100.000	MMLIC		
.0000							JDLF II GP LP	..DE....	NIA.....	JDLF II GP LLC	Ownership.....	100.000	MMLIC		

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12 Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	13 If Control is Owner- ship Provide Percent- age	14 Ultimate Controlling Entity(ies)/Person(s)	15 Is an SCA Filing Re- quired? (Yes/No)	16 *
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi- ciliary Loca- tion	Relation- ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)					
.0000 ...							Jefferies Direct Lending Fund II C LP	..DE....	NIA.....	JDLF II GP LP	Ownership.....	100.000 ...	MMLIC		
.0000 ...							Jefferies DLF 2 C Holdings LLC	..DE....	NIA.....	Jefferies Direct Lending Fund II C LP	Ownership.....	100.000 ...	MMLIC		
.0000 ...							Jefferies Direct Lending Fund II C SPE LLC ..	..DE....	NIA.....	Jefferies DLF 2 C Holdings LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JDLF III GP LLC	..DE....	NIA.....	Jefferies Credit Partners LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JDLF III GP LP	..DE....	NIA.....	JDLF III GP LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							Jefferies Direct Lending Fund III C LP	..DE....	NIA.....	JDLF III GP LP	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JCP Direct Lending CLO 2023-1 LLC		NIA.....	Jefferies Credit Partners LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JCP Direct Lending CLO 2023 Ltd.	..JEY...	NIA.....	JCP Direct Lending CLO 2023 Ltd.	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JCP GP I LLC	..DE....	NIA.....	Jefferies Credit Partners LLC	Ownership.....	100.000 ...	MMLIC		
							Jefferies M Super Private Credit Fund GP LLC								
.0000 ...								..DE....	NIA.....	Jefferies Credit Partners LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							Jefferies Private Credit BDC Inc.	..MD....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JCP Funding 2024 LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							Jefferies Senior Lending LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver Holdings LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver Holdings II LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Co-Issuer Corporation		NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Europe GP, S.a.r.l.	..LUX...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							Jefferies Finance Europe, S.L.P.	..LUX...	NIA.....	JFIN Europe GP, S.a.r.l.	Ownership.....	100.000 ...	MMLIC		
.0000 ...							Jefferies Finance Europe, SCSp	..LUX...	NIA.....	JFIN Europe GP, S.a.r.l.	Ownership.....	100.000 ...	MMLIC		
.0000 ...							Jefferies Finance Business Credit LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Business Credit Fund I LLC	..DE....	NIA.....	Jefferies Finance Business Credit LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Funding 2021 LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JSPCS MM LLC		NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN LC Fund LLC		NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2017 Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2017-II Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2017-III Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2018 Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2019 Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2019-II Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2020 Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2021-II Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2021-V Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2022-II Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2022-III Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2022-IV Ltd.	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2024-I Ltd.	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver CLO 2022-IV LLC	..CYM...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver Fund, L.P.	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	90.000 ...	MMLIC		
.0000 ...							JFIN Revolver Funding 2021 Ltd.	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver Funding 2021 III Ltd.		NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver Funding 2021 IV Ltd.	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver Funding 2022-I Ltd.	..BMJ...	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver SPE1 2022 LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver SPE3 2022 LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver SPE4 2022 LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JFIN Revolver SPE4 2022 Ltd.	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		
.0000 ...							JCP Private Loan Management GP LLC	..DE....	NIA.....	Jefferies Finance LLC	Ownership.....	100.000 ...	MMLIC		

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Location	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Ownership Provide Per-centage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
.0000							JCP Private Loan Management LP		NIA	JCP Private Loan Management GP LLC	Ownership	100.000	MLLIC		
.0000							Apex Credit Holdings LLC		NIA	Jefferies Finance LLC	Ownership	100.000	MLLIC		
.0000							JFIN CLO 2012 Ltd.	.CYM	NIA	Apex Credit Holdings LLC	Ownership	100.000	MLLIC		
.0000							JFIN CLO 2013 Ltd.	.CYM	NIA	Apex Credit Holdings LLC	Ownership	100.000	MLLIC		
.0000							JFIN CLO 2014 Ltd.	.CYM	NIA	Apex Credit Holdings LLC	Ownership	100.000	MLLIC		
.0000							JFIN CLO 2014-II Ltd.	.CYM	NIA	Apex Credit Holdings LLC	Ownership	100.000	MLLIC		
.0000							JFIN CLO 2015 Ltd.	.CYM	NIA	Apex Credit Holdings LLC	Ownership	100.000	MLLIC		
.0000							JFIN CLO 2015-II Ltd.	.CYM	NIA	Apex Credit Holdings LLC	Ownership	85.000	MLLIC		
.0000							JFIN CLO 2016 Ltd.	.CYM	NIA	Apex Credit Holdings LLC	Ownership	100.000	MLLIC		
.0000			86-2294635				JFIN CLO 2017 Ltd.	.CYM	NIA	Apex Credit Holdings LLC	Ownership	100.000	MLLIC		
.0000	Massachusetts Mut Life Ins Co	63312	13-1935920				JFIN CLO 2017-II Ltd.	.CYM	NIA	Apex Credit Holdings LLC	Ownership	100.000	MLLIC		
.0000			86-2294635				Tomorrow Parent, LLC	.DE	NIA	Jefferies Finance LLC	Ownership	100.000	MLLIC		
.0000	Massachusetts Mut Life Ins Co	63312	13-1935920				Custom Ecology Holdco, LLC	.DE	NIA	Jefferies Finance LLC	Ownership	100.000	MLLIC		
.0000			86-2294635				Glidepath Holdings Inc.	.DE	UDP	Massachusetts Mutual Life Insurance Company	Ownership	100.000	MLLIC		
.0435	Massachusetts Mut Life Ins Co	63312	13-1935920				MassMutual Ascend Life Insurance Company	.OH	RE	Glidepath Holdings Inc.	Ownership	100.000	MLLIC		
.0000			31-1422717				AAG Insurance Agency, LLC	.KY	NIA	MassMutual Ascend Life Insurance Company	Ownership	100.000	MLLIC		
.0435	Massachusetts Mut Life Ins Co	93661	31-1021738				Annuity Investors Life Insurance Company	.OH	DS	MassMutual Ascend Life Insurance Company	Ownership	100.000	MLLIC		
.0000			31-1395344				MM Ascend Life Investor Services, LLC	.OH	NIA	MassMutual Ascend Life Insurance Company	Ownership	100.000	MLLIC		
.0000	Massachusetts Mut Life Ins Co	67083	45-0252531				MM Ascend Mortgage Lending LLC	.OH	DS	MassMutual Ascend Life Insurance Company	Ownership	100.000	MLLIC		
.0000			26-3260520				Manhattan National Holding, LLC	.OH	DS	MassMutual Ascend Life Insurance Company	Ownership	100.000	MLLIC		
.0435	Massachusetts Mut Life Ins Co	67083	45-0252531				Manhattan National Life Insurance Company	.OH	DS	Manhattan National Holding LLC	Ownership	100.000	MLLIC		
.0000							MassMutual Mortgage Lending LLC	.DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	100.000	MLLIC		
.0000			04-1590850				MM Copper Hill Road LLC	.DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	100.000	MLLIC		
.0000							MMV CTF I GP LLC	.DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	100.000	MLLIC		
.0000							MassMutual Ventures Climate Technology Fund I LP		NIA	MMV CTF I GP LLC	Ownership	100.000	MLLIC		
.0000							MM Direct Private Investments Holding LLC	.DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	100.000	MLLIC		
.0000							MM Direct Private Investments UK Limited	.GBR	NIA	MM Direct Private Investments Holding LLC	Ownership	100.000	MLLIC		
.0000			26-0073611				DPI-ACRES Capital LLC		NIA	Massachusetts Mutual Life Insurance Company	Ownership	100.000	MLLIC		
.0000			26-0073611				DPI-ARES Mortgage Lending LLC	.DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	100.000	MLLIC		
.0000			26-0073611				MM Investment Holding	.CYM	NIA	Massachusetts Mutual Life Insurance Company	Ownership	100.000	MLLIC		
.0000			26-0073611				MMIH Bond Holdings LLC	.DE	NIA	MM Investment Holding	Ownership	99.610	MLLIC		
.0000			26-0073611				MassMutual Asset Finance LLC	.DE	NIA	C.M. Life Insurance Company	Ownership	0.400	MLLIC		
.0000			26-0073611				MassMutual Asset Finance LLC	.DE	NIA	MM Investment Holding	Ownership	99.600	MLLIC		
.0000			32-0546197				MMAF Equipment Finance LLC 2017-B	.DE	NIA	MassMutual Asset Finance LLC	Ownership	100.000	MLLIC		
.0000			83-3722640				MMAF Equipment Finance LLC 2019-A	.DE	NIA	MassMutual Asset Finance LLC	Ownership	100.000	MLLIC		
.0000							MMAF Equipment Finance LLC 2019-B	.DE	NIA	MassMutual Asset Finance LLC	Ownership	100.000	MLLIC		
.0000							MMAF Equipment Finance LLC 2020-A	.DE	NIA	MassMutual Asset Finance LLC	Ownership	100.000	MLLIC		
.0000							MMAF Equipment Finance LLC 2020-B	.DE	NIA	MassMutual Asset Finance LLC	Ownership	100.000	MLLIC		
.0000			04-2443240				MMAF Equipment Finance LLC 2021-A	.DE	NIA	MassMutual Asset Finance LLC	Ownership	100.000	MLLIC	YES	
.0000			04-3548444				MMAF Equipment Finance LLC 2022-A	.DE	NIA	MassMutual Asset Finance LLC	Ownership	100.000	MLLIC		
.0000			04-3341767				MMAF Equipment Finance LLC 2022-B	.DE	NIA	MassMutual Asset Finance LLC	Ownership	100.000	MLLIC		

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Location	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Ownership Provide Percentage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
.0000			04-2443240				MMAF Equipment Finance LLC 2023-A	..DE.....	NIA.....	MassMutual Asset Finance LLC	Ownership.....	100.000	MMLIC		
.0000			04-3548444				MMAF Equipment Finance LLC 2024-A	..DE.....	NIA.....	MassMutual Asset Finance LLC	Ownership.....	100.000	MMLIC		
.0000			04-2443240				MML Management Corporation	..MA.....	NIA.....	MM Investment Holding	Ownership.....	100.000	MMLIC	...YES...	
.0000			04-3548444				MassMutual International Holding MSC, Inc.	..MA.....	NIA.....	MML Management Corporation	Ownership.....	100.000	MMLIC		
.0000			04-3341767				MassMutual Holding MSC, Inc.	..MA.....	NIA.....	MML Management Corporation	Ownership.....	100.000	MMLIC		
							Massachusetts Mutual Life Insurance Company								
.0000							MML CM LLC	..DE.....	NIA.....	Company	Ownership.....	100.000	MMLIC		
.0000							Blueprint Income LLC	..NY.....	NIA.....	MML CM LLC	Ownership.....	100.000	MMLIC		
.0000			04-3356880				Flourish Holding Company LLC	..DE.....	NIA.....	MML CM LLC	Ownership.....	100.000	MMLIC		
.0000			04-3356880				Flourish Insurance Agency LLC	..DE.....	NIA.....	Flourish Holding Company LLC	Ownership.....	100.000	MMLIC		
.0000							Flourish Digital Assets LLC	..DE.....	NIA.....	Flourish Holding Company LLC	Ownership.....	100.000	MMLIC		
.0000			04-3356880				Flourish Financial LLC	..DE.....	NIA.....	Flourish Holding Company LLC	Ownership.....	100.000	MMLIC		
.0000			04-3356880	2881445			Flourish Technologies LLC	..DE.....	NIA.....	Flourish Holding Company LLC	Ownership.....	100.000	MMLIC	...YES...	
							Massachusetts Mutual Life Insurance Company								
.0000			04-3356880				MML Distributors LLC	..MA.....	NIA.....	Company	Ownership.....	99.000	MMLIC		
.0000			04-3356880				MML Distributors LLC	..MA.....	NIA.....	MassMutual Holding LLC	Ownership.....	1.000	MMLIC		
							Massachusetts Mutual Life Insurance Company								
.0000			06-1563535	2881445			MML Investment Advisers, LLC	..DE.....	NIA.....	Company	Ownership.....	100.000	MMLIC		
							Massachusetts Mutual Life Insurance Company								
.0000			46-3238013				MML Strategic Distributors, LLC	..DE.....	NIA.....	Company	Ownership.....	100.000	MMLIC		
							Massachusetts Mutual Life Insurance Company								
.0000			06-1563535	2881445			The MassMutual Trust Company, FSB	..CT.....	NIA.....	Company	Ownership.....	100.000	MMLIC	...YES...	
							MML Private Placement Investment Company I, LLC			Massachusetts Mutual Life Insurance Company					
.0000			04-1590850	2392316				..DE.....	NIA.....	Company	Ownership.....	100.000	MMLIC	...YES...	
							Massachusetts Mutual Life Insurance Company								
.0000			04-1590850				MML Private Equity Fund Investor LLC	..DE.....	NIA.....	Company	Ownership.....	100.000	MMLIC		
.0000			04-1590850				MML Private Equity Fund Investor LLC	..DE.....	NIA.....	Baring Asset Management Limited	Management.....	100.000	MMLIC		
							Massachusetts Mutual Life Insurance Company								
.0000			04-1590850	2392316			MM Private Equity Intercontinental LLC	..DE.....	NIA.....	Company	Ownership.....	100.000	MMLIC		
							Massachusetts Mutual Life Insurance Company								
.0000			45-2738137				Pioneers Gate LLC	..DE.....	NIA.....	Company	Ownership.....	100.000	MMLIC		
							Massachusetts Mutual Life Insurance Company								
.0000			04-2854319	2392316			MassMutual Holding LLC		NIA.....	Company	Ownership.....	100.000	MMLIC	...YES...	
.0000			37-1732913				Fern Street LLC	..DE.....	NIA.....	MassMutual Holding LLC	Ownership.....	100.000	MMLIC		
.0000			46-2252944				Low Carbon Energy Holding	..GBR.....	NIA.....	MassMutual Holding LLC	Ownership.....	49.000	MMLIC		
.0000			82-2932156				Sleeper Street LLC	..DE.....	NIA.....	MassMutual Holding LLC	Ownership.....	100.000	MMLIC		
.0000			46-2252944				Haven Life Insurance Agency, LLC	..DE.....	NIA.....	MassMutual Holding LLC	Ownership.....	100.000	MMLIC		
.0000			82-2932156				GASL Holdings LLC	..DE.....	NIA.....	MassMutual Holding LLC	Ownership.....	11.300	MMLIC		
.0000			82-2932156				GASL Holdings LLC	..DE.....	NIA.....	Barings LLC	Board.....	1.160	MMLIC		
.0000			36-4868350				Barings Asset-Based Income Fund (US) LP	..DE.....	NIA.....	MassMutual Holding LLC	Ownership/Influence.....	11.500	MMLIC		
.0000			36-4868350				Barings Asset-Based Income Fund (US) LP		NIA.....	C.M. Life Insurance Company	Ownership/Influence.....	1.110	MMLIC		
.0000			36-4868350				Barings Asset-Based Income Fund (US) LP		NIA.....	Barings LLC	Management.....	29.300	MMLIC		
							Barings Perpetual European Direct Lending Fund	..LUX.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence.....	82.130	MMLIC		
.0000			88-0916548				Barings Perpetual European Direct Lending Fund	..LUX.....	NIA.....	Barings LLC	Influence.....		MMLIC		
							Massachusetts Mutual Life Insurance Company								
.0000			88-0916548				Barings Emerging Generation Fund II	..DE.....	NIA.....	Company	Ownership/Influence.....	39.700	MMLIC		
.0000			88-0916548				Barings Emerging Generation Fund II	..DE.....	NIA.....	Barings LLC	Influence.....	1.100	MMLIC		

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Location	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Ownership Provide Percen-tage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
.0000			98-1206017				Babson Capital Global Special Situation Credit Fund 2	..DE	NIA.....	MassMutual Holding LLC	Ownership/Influence	..23.700	MMLIC		
.0000			98-1206017				Babson Capital Global Special Situation Credit Fund 2	..DE	NIA.....	C.M. Life Insurance Company	Ownership	..1.500	MMLIC		
.0000			98-1206017				Babson Capital Global Special Situation Credit Fund 2	..DE	NIA.....	Barings LLC	Management	..6.700	MMLIC		
.0000			82-3867745				Barings Global Real Assets Fund LP	..DE	NIA.....	MassMutual Holding LLC	Ownership/Influence	..26.140	MMLIC		
.0000			82-3867745				Barings Global Real Assets Fund LP		NIA.....	C.M. Life Insurance Company	Ownership	..5.100	MMLIC		
.0000			82-3867745				Barings Global Real Assets Fund LP		NIA.....	Barings LLC	Management	..100.000	MMLIC		
.0000			06-1597528				Barings Global Special Situations Credit Fund 3	..LUX	NIA.....	MassMutual Holding LLC	Ownership/Influence	..19.680	MMLIC		
.0000			04-1590850				Barings Global Special Situations Credit Fund 3	..LUX	NIA.....	Barings LLC	Management	..100.000	MMLIC		
.0000			06-1597528				MassMutual Assignment Company	..NC	NIA.....	MassMutual Holding LLC	Ownership	..100.000	MMLIC		
.0000			04-1590850				MassMutual Capital Partners LLC	..DE	NIA.....	MassMutual Holding LLC	Ownership	..100.000	MMLIC		
.0000			46-4255307				Marco Hotel LLC	..DE	NIA.....	MassMutual Holding LLC	Ownership	..100.000	MMLIC		
.0000			45-3623262				HB Naples Golf Owner LLC	..DE	NIA.....	MassMutual Holding LLC	Ownership	..100.000	MMLIC		
.0000			82-4411267				RB Apartments LLC	..DE	NIA.....	MassMutual Holding LLC	Ownership	..100.000	MMLIC		
.0000							Intermodal Holding II LLC		NIA.....	MassMutual Holding LLC	Ownership	..100.000	MMLIC		
.0000							MassMutual Ventures Holding LLC	..DE	NIA.....	MassMutual Holding LLC	Ownership	..100.000	MMLIC		
.0000							Crane Venture Partners LLP	..GBR	NIA.....	MassMutual Ventures Holding LLC	Ownership	..33.000	MMLIC		
.0000							MassMutual Ventures Management LLC		NIA.....	MassMutual Ventures Holding LLC	Ownership	..100.000	MMLIC		
.0000							MassMutual Ventures SEA Management Private Limited		NIA.....	MassMutual Ventures Management LLC	Ownership	..100.000	MMLIC		
.0000							MMV UK/SEA Limited	..GBR	NIA.....	MassMutual Ventures SEA Management Private Limited	Ownership	..100.000	MMLIC		
.0000							MassMutual Ventures India Private Limited	..IND	NIA.....	MassMutual Ventures SEA Management Private Limited	Ownership	..100.000	MMLIC		
.0000			47-1296410				MassMutual Ventures Southeast Asia I LLC	..DE	NIA.....	MassMutual Ventures Holding LLC	Ownership	..100.000	MMLIC		
.0000			47-1296410				MassMutual Ventures Southeast Asia II LLC	..DE	NIA.....	MassMutual Ventures Holding LLC	Ownership	..100.000	MMLIC		
.0000							MassMutual Ventures UK LLC	..DE	NIA.....	MassMutual Ventures Holding LLC	Ownership	..100.000	MMLIC		
.0000			47-1296410				MassMutual Ventures US I LLC	..DE	NIA.....	MassMutual Ventures Holding LLC	Ownership	..100.000	MMLIC		
.0000							MassMutual Ventures US II LLC	..DE	NIA.....	MassMutual Ventures Holding LLC	Ownership	..100.000	MMLIC		
.0000			04-1590850				MassMutual Ventures US III LLC	..DE	NIA.....	MassMutual Ventures Holding LLC	Ownership	..100.000	MMLIC		
.0000			04-1590850				MM Catalyst Fund LLC	..DE	NIA.....	MassMutual Holding LLC	Ownership	..100.000	MMLIC		
.0000							MM Catalyst Fund II LLC		NIA.....	MassMutual Holding LLC	Ownership	..100.000	MMLIC		
.0000			04-1590850				MM Rothesay Holdco US LLC	NIA.....	NIA.....	MassMutual Holding LLC	Ownership	..100.000	MMLIC		
.0000							Rothesay Limited	..GBR	NIA.....	MM Rothesay Holdco US LLC	Ownership	..47.600	MMLIC		
.0000							Rothesay Mortgages Limited	..GBR	NIA.....	Rothesay Limited	Ownership	..100.000	MMLIC		
.0000							Rothesay Life Plc	..GBR	NIA.....	Rothesay Limited	Ownership	..100.000	MMLIC		
.0000							Rothesay MA No.1 Limited	..GBR	NIA.....	Rothesay Life PLC	Ownership	..100.000	MMLIC		
.0000							Rothesay MA No.3 Limited	..GBR	NIA.....	Rothesay Life PLC	Ownership	..100.000	MMLIC		
.0000							Rothesay MA No.4 Limited	..GBR	NIA.....	Rothesay Life PLC	Ownership	..100.000	MMLIC		
.0000							LT Mortgage Financing Limited	..GBR	NIA.....	Rothesay Life PLC	Ownership	..100.000	MMLIC		
.0000							Rothesay Property Partnership 1 LLP	..GBR	NIA.....	Rothesay Life PLC	Ownership	..100.000	MMLIC		
.0000							Rothesay Foundation	..GBR	NIA.....	Rothesay Limited	Ownership	..100.000	MMLIC		
.0000							Rothesay Pensions Management Limited	..GBR	NIA.....	Rothesay Limited	Ownership	..100.000	MMLIC		
.0000			04-1590850				Rothesay Asset Management UK Limited	..GBR	NIA.....	Rothesay Limited	Ownership	..100.000	MMLIC		
.0000			04-1590850				Rothesay Asset Management Australia Pty Ltd	..AUS	NIA.....	Rothesay Asset Management UK Limited	Ownership	..100.000	MMLIC		
.0000			04-1590850				Rothesay Asset Management North America LLC	..DE	NIA.....	Rothesay Asset Management UK Limited	Ownership	..100.000	MMLIC		

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Location	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Ownership Provide Percen-tage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
.0000			04-1590850				MML Investors Services, LLC	..MA	NIA	MassMutual Holding LLC	Ownership	100.000	MMLIC		
.0000			04-1590850				MML Insurance Agency, LLC	..MA	NIA	MML Investors Services, LLC	Ownership	100.000	MMLIC		
.0000			41-2011634				MMLISI Financial Alliances, LLC	..DE	NIA	MML Investors Services, LLC	Ownership	100.000	MMLIC		
.0000			47-1466022				LifeScore Labs, LLC	..MA	NIA	MassMutual Holding LLC	Ownership	100.000	MMLIC		
.0000			45-4000072				MM Asset Management Holding LLC	NIA	NIA	MassMutual Holding LLC	Ownership	100.000	MMLIC		
.0000			51-0504477				Barings LLC	NIA	NIA	MassMutual Holding LLC	Ownership	100.000	MMLIC		
.0000			98-0524271				Baring Asset Management (Asia) Holdings Limited	..HKG	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			98-0457465				Baring International Fund Managers (Bermuda) Limited	..BMU	NIA	Baring Asset Management (Asia) Holdings Limited	Ownership	100.000	MMLIC		
.0000			98-0457463				Baring Asset Management (Asia) Limited	..HKG	NIA	Baring Asset Management (Asia) Holdings Limited	Ownership	100.000	MMLIC		
.0000			98-0457707				Baring Asset Management Korea Limited	..KOR	NIA	Baring Asset Management (Asia) Limited	Ownership	100.000	MMLIC		
.0000			98-0457707				Barings Investment Management (Shanghai) Limited	..HKG	NIA	Baring Asset Management (Asia) Limited	Ownership	100.000	MMLIC		
.0000			98-0236449				Barings Overseas Investment Fund Management (Shanghai) Limited	..HKG	NIA	Barings Investment Management (Shanghai) Limited	Ownership	100.000	MMLIC		
.0000			98-0457707				Baring SICE (Taiwan) Limited	..TWN	NIA	Baring Asset Management (Asia) Holdings Limited	Ownership	100.000	MMLIC		
.0000							Barings Singapore Pte. Ltd.	..SGP	NIA	Baring Asset Management (Asia) Holdings Limited	Ownership	100.000	MMLIC		
.0000			98-0236449				Barings Japan Limited	..JPN	NIA	Baring Asset Management (Asia) Holdings Limited	Ownership	100.000	MMLIC		
.0000			14-0045656				Barings Australia Holding Company Pty Ltd	..AUS	NIA	Baring Asset Management (Asia) Holdings Limited	Ownership	100.000	MMLIC		
.0000			14-0045656				Barings Australia Pty Ltd	..AUS	NIA	Barings Australia Holding Company Pty Ltd	Ownership	100.000	MMLIC		
.0000			98-0457456				Barings Australia Real Estate Holdings Pty Ltd	..AUS	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			14-0045656				Barings Australia Real Estate Pty Ltd	..AUS	NIA	Barings Australia Real Estate Holdings Pty Ltd	Ownership	100.000	MMLIC		
.0000			98-0457456				Barings Australia Property Partners Holdings Pty Ltd	..AUS	NIA	Barings Australia Real Estate Pty Ltd	Ownership	100.000	MMLIC		
.0000							Barings Australia Asset Management Pty Ltd	..AUS	NIA	Barings Australia Property Partners Holdings Pty Ltd	Ownership	100.000	MMLIC		
.0000							Barings Australia Property Partners Pty Ltd	..AUS	NIA	Barings Australia Property Partners Holdings Pty Ltd	Ownership	100.000	MMLIC		
.0000							Barings Australia Structured Finance Holdings Pty Ltd	..AUS	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings Australia Structured Finance Pty Ltd	..AUS	NIA	Barings Australia Structured Finance Holdings Pty Ltd	Ownership	100.000	MMLIC		
.0000			80-0875475				Gryphon Capital Partners Pty Ltd	..AUS	NIA	Barings Australia Structured Finance Pty Ltd	Ownership	100.000	MMLIC		
.0000			80-0875475				Gryphon Capital Management Pty Ltd	..AUS	NIA	Gryphon Capital Partners Pty Ltd	Ownership	100.000	MMLIC		
.0000							Gryphon Capital Investments Pty Ltd	..AUS	NIA	Gryphon Capital Partners Pty Ltd	Ownership	100.000	MMLIC		
.0000			80-0875475				Barings Finance LLC	..DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							BCF Europe Funding Limited	..IRL	NIA	Barings Finance LLC	Ownership	100.000	MMLIC		
.0000			04-3238351				BCF Senior Funding I LLC	..DE	NIA	Barings Finance LLC	Ownership	100.000	MMLIC		
.0000			04-3238351				BCF Senior Funding I Designated Activity Company	..IRL	NIA	Barings Finance LLC	Ownership	100.000	MMLIC		
.0000			98-0437588				Barings Real Estate Acquisitions LLC	NIA	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			04-3238351				Barings Securities LLC	NIA	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			98-0437588				Barings Guernsey Limited	..GGY	NIA	Barings LLC	Ownership	100.000	MMLIC		

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12 Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	13 If Control is Owner- ship Provide Percen- tage	14 Ultimate Controlling Entity(ies)/Person(s)	15 Is an SCA Filing Re- quired? (Yes/No)	16 *
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi- ciliary Loca- tion	Rela- tion- ship to Report- ing Entity	Directly Controlled by (Name of Entity/Person)					
.0000							Barings Europe Limited	.GBR		Barings Guernsey Limited	Ownership	100.000	MMLIC		
.0000							Barings Asset Management Spain SL	.ESP	NIA	Barings Europe Limited	Ownership	100.000	MMLIC		
.0000							Baring France SAS	.FRA	NIA	Barings Europe Limited	Ownership	100.000	MMLIC		
							Baring International Fund Managers (Ireland) Limited	.IRL	NIA	Barings Europe Limited	Ownership	100.000	MMLIC		
							Barings GmbH	.DEU	NIA	Barings Europe Limited	Ownership	100.000	MMLIC		
			98-0432153				Barings Italy S.r.l.	.ITA	NIA	Barings Europe Limited	Ownership	100.000	MMLIC		
			98-0432153				Barings Sweden AB	.SWE	NIA	Barings Europe Limited	Ownership	100.000	MMLIC		
			98-0241935				Barings Netherlands B.V.	.NLD	NIA	Barings Europe Limited	Ownership	100.000	MMLIC		
			98-0432153				Barings (U.K.) Limited	.GBR	NIA	Barings Europe Limited	Ownership	100.000	MMLIC		
			98-0457328				Barings Switzerland Sarl	.CHE	NIA	Barings Europe Limited	Ownership	100.000	MMLIC		
			98-0241935				Baring Asset Management Limited	.GBR	NIA	Barings Europe Limited	Ownership	100.000	MMLIC		
			98-0457586				Barings European Direct Lending 1 GP LLP	.GBR	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
			98-0457328				Baring International Investment Limited	.GBR	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
			98-0457586				Baring Fund Managers Limited	.GBR	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
			98-0457578				BCGSS 2 GP LLP	.GBR	NIA	Baring Fund Managers Limited	Ownership	100.000	MMLIC		
							Baring Investment Services Limited	.GBR	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
							Barings Core Fund Feeder I GP S.a.r.l.	.LUX	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
							Barings Investment Fund (LUX) GP S.a. r.l.	.LUX	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
							Barings BME GP S.a.r.l.	.GBR	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
							Barings GPC GP S.a. r.l.	.LUX	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
							Barings European Core Property Fund GP Sarl	.GBR	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
							Barings Umbrella Fund (LUX) GP S.a.r.l.	.LUX	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
			04-3238351	3456895			GPLF4(S) GP S.a. r. l	.LUX	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
			04-3238351	3456895			PREIF Holdings Limited Partnership	.GBR	NIA	Baring Asset Management Limited	Ownership	100.000	MMLIC		
			81-4065378				BMC Holdings DE LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
			04-3238351	3456895			Barings Real Estate Advisers Inc.	.CA	NIA	Barings LLC Massachusetts Mutual Life Insurance Company	Ownership	100.000	MMLIC		
			81-4065378				Remington L & W Holdings LLC	.DE	NIA	Company	Ownership/Influence	.65.370	MMLIC		
			81-4065378				Remington L & W Holdings LLC	.DE	NIA	Barings LLC	Influence	100.000	MMLIC		
							Aland Royalty GP, LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
							Alaska Future Fund GP, LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
							BAI Funds SLP, LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
							BAI GP, LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
							Baring Asset-Based Income Fund (US) GP, LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
							Barings CMS Fund GP, LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
							Barings Infiniti Fund Management LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
							Barings New Jersey Emerging Manager Program GP, LLC	.DE	NIA	Barings LLC Massachusetts Mutual Life Insurance Company	Ownership	100.000	MMLIC		
							Barings Hotel Opportunity Venture I GP, LLC	.DE	NIA	Company	Ownership	100.000	MMLIC		
			04-1590850				Baring Investment Series LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
							Barings Emerging Generation Fund GP, LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
							Barings Emerging Generation Fund GP II, LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
							Barings EPLF4 Rated Feeder, L.P.	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
			04-1590850				Barings ERS PE Emerging Manager III GP, LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
							Barings FC III LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
			04-1590850				Barings Global Investment Funds (U.S.) Management LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
			88-3792609				Barings CLO Investment Partners GP, LLC	.DE	NIA	Barings LLC	Ownership	100.000	MMLIC		

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Location	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Ownership Provide Percentage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
.0000			88-3792609				Barings Core Property Fund GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings DAPPLF1 Rated Feeder, G.P.		NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings DAPPLF1 Rated Feeder, L.P.	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings Direct Lending GP Ltd.	CYM	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings Diversified Residential Fund GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings Diversified Residential Fund LP	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings Global Energy Infrastructure Advisors, LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			88-3792609				Barings Capital Solutions Perpetual Fund GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			88-3792609				Barings Centre Street CLO Equity Partnership GP, LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			88-3792609				Barings Centre Street CLO Equity Partnership LP	DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	27.890	MMLIC		
.0000			88-3792609				Barings Centre Street CLO Equity Partnership LP	DE	NIA	Barings LLC	Management	100.000	MMLIC		
.0000			84-5063008				Barings Global Real Assets Fund GP, LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings GPSF LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			98-0536233				Barings North American Private Loan Fund Management, LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings North American Private Loan Fund II Management, LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings North American Private Loan Fund III Management, LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings Global Special Situations Credit Fund 4 GP (Delaware) LLC		NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings – MM Revolver Fund GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings Real Estate European Value Add Fund II Feeder LLC	CYM	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			84-5063008				Barings SEM GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			84-5063008				BMT RE Debt Fund GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			84-5063008				Barings Small Business Fund LLC	DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	33.600	MMLIC		
.0000			84-5063008				Barings Small Business Fund LLC	DE	NIA	Barings LLC	Management	100.000	MMLIC		
.0000							Barings TYIDF2 Rated Feeder GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			98-0536233				Barings TYIDF2 Rated Feeder, L.P.		NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							BCLF GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			98-0536233				Benton Street Advisors, Inc.	CYM	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							Barings Active Passive Equity Direct EAFE LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			80-0920285				BHOVI Incentive LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							BIG Real Estate Fund GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			98-1624360				BIG Real Estate Incentive I LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							BIG Real Estate Incentive II LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							BRECS VII GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000							BREDIF GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			04-3313782				CPF Springing Member, LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			04-1590850				CREA-MA Reorganization Trust	DE	NIA	Barings LLC	Ownership	100.000	MMLIC	YES	
.0000							CREF X GP LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		
.0000			04-1590850				Great Lakes III GP, LLC	DE	NIA	Barings LLC	Ownership	100.000	MMLIC		

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12 Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	13 If Control is Owner- ship Provide Perce- ntage	14 Ultimate Controlling Entity(ies)/Person(s)	15 Is an SCA Filing Re- quired? (Yes/No)	16 *
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi- ciliary Loca- tion	Rela- tion- ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)					
. 0000 ...			27-3576835 ..	.....	.....	.....	Lake Jackson LLC	.. DE.....	 NIA.....	Barings LLC	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			41-2280126 ..	.....	.....	.....	Barings Emerging Markets Blended Fund I GP, LLC	.. DE.....	 NIA.....	Barings LLC	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			80-0920285 ..	.....	.....	.....	Barings EPLF4 Rated Feeder GP LLC	.. DE.....	 NIA.....	Barings LLC	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			41-2280126 ..	.....	.....	.....	Mezzco III LLC	.. DE.....	 NIA.....	Barings LLC	Ownership.....	99.300 ...	MM L I C .....	.....	.....
. 0000 ...			80-0920285 ..	.....	.....	.....	Mezzco IV LLC	.. DE.....	 NIA.....	Barings LLC	Ownership.....	99.300 ...	MM L I C .....	.....	.....
. 0000 ...			98-1624360 ..	.....	.....	.....	Mezzco Australia II LLC .....	.....	..... NIA.....	Barings LLC	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...							RECSA-NY GP LLC .....	.....	..... NIA.....	Barings LLC	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			98-1624360 ..	.....	.....	.....	Barings QLO 2022-I	.. CYM.....	 NIA.....	Barings LLC	Influence.....	24.500 ...	MM L I C .....	.....	.....
. 0000 ...							Barings QLO 2022-II	.. CYM.....	 NIA.....	Barings LLC	Influence.....	25.000 ...	MM L I C .....	.....	.....
. 0000 ...			04-3313782 ..	.....	.....	.....	Amherst Long Term Holdings, LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	24.500 ...	MM L I C .....	.....	.....
. 0000 ...			61-1902329 ..	.....	.....	.....	Enroll Confidently, Inc.	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	25.000 ...	MM L I C .....	.....	.....
. 0000 ...			04-3313782 ..	.....	.....	.....	MassMutual International LLC .....	.....	..... NIA.....	Company	Ownership.....	100.000 ...	MM L I C	... YES...	.....
. 0000 ...			85-3036663 ..	.....	.....	.....	MassMutual Solutions LLC .....	.....	..... NIA.....	MassMutual International LLC	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			27-3576835 ..	.....	.....	.....	Haven Technologies Asia Limited	.. HKG.....	 NIA.....	MassMutual Solutions LLC	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...							Yunfeng Financial Group Limited	.. HKG.....	 NIA.....	MassMutual International LLC	Ownership.....	24.900 ...	MM L I C .....	.....	.....
. 0000 ...			27-3576835 ..	.....	.....	.....	MassMutual External Benefits Group LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	MM Vine Street LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			82-2432216 ..	.....	.....	.....	Stillings Street LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	5301 Wisconsin Avenue Associates, LLC	.. DC.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	99.000 ...	MM L I C .....	.....	.....
. 0000 ...							5301 Wisconsin Avenue GP, LLC .....	.....	..... NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	100 w. 3rd Street LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			82-2432216 ..	.....	.....	.....	300 South Tryon Hotel LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	300 South Tryon LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			61-1902329 ..	.....	.....	.....	Almack Mezzanine Fund II Unleveraged LP	.. GBR.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	72.900 ...	MM L I C .....	.....	.....
. 0000 ...			85-3036663 ..	.....	.....	.....	Barings Affordable Housing Mortgage Fund I LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			85-3036663 ..	.....	.....	.....	Barings Affordable Housing Mortgage Fund I LLC	.. DE.....	 NIA.....	Barings LLC	Management.....	4.800 ...	MM L I C .....	.....	.....
. 0000 ...			61-1902329 ..	.....	.....	.....	Barings Affordable Housing Mortgage Fund II LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			61-1902329 ..	.....	.....	.....	Barings Affordable Housing Mortgage Fund II LLC	.. DE.....	 NIA.....	Barings LLC	Management.....	39.700 ...	MM L I C .....	.....	.....
. 0000 ...			85-3036663 ..	.....	.....	.....	Barings Affordable Housing Mortgage Fund III LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	100.000 ...	MM L I C .....	.....	.....
. 0000 ...			85-3036663 ..	.....	.....	.....	Barings Affordable Housing Mortgage Fund III LLC	.. DE.....	 NIA.....	Barings LLC	Management	86.000 ...	MM L I C .....	.....	.....
. 0000 ...							Barings Construction Lending Fund LP .....	.....	..... NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	85.710 ...	MM L I C .....	.....	.....

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12 Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	13 If Control is Owner- ship Provide Percen- tage	14 Ultimate Controlling Entity(ies)/Person(s)	15 Is an SCA Filing Re- quired? (Yes/No)	16 *
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi- iliary Loca- tion	Rela- tion- ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)					
. 0000 ...			45-2632610 ..	.....	.....	.....	Barings Emerging Generation Fund II LP .....	.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..39.700	MMLIC .....	.....	.....
. 0000 ...			84-3784245 ..	.....	.....	.....	Barings Emerging Generation Fund, LP	.. DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	..67.740	MMLIC .....	.....	.....
. 0000 ...			84-3784245 ..	.....	.....	.....	Barings Emerging Generation Fund, LP	.. DE.....	NIA.....	Barings LLC	Management.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	Barings Emerging Markets Corporate Bond Fund	.. IRL.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..57.330	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	Barings Emerging Markets Corporate Bond Fund	.. IRL.....	NIA.....	Barings LLC	Ownership.....	..57.600	MMLIC .....	.....	.....
. 0000 ...			85-3449260 ..	.....	.....	.....	Barings Hotel Opportunity Venture I LP	.. DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..65.000	MMLIC .....	.....	.....
. 0000 ...			85-3449260 ..	.....	.....	.....	Barings Hotel Opportunity Venture I LP	.. DE.....	NIA.....	Barings LLC	Management.....	.....	MMLIC .....	.....	.....
. 0000 ...			85-3449260 ..	.....	.....	.....	Barings Miller Investment Trust	.. AUS.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..57.330	MMLIC .....	.....	.....
. 0000 ...			81-4258759 ..	.....	.....	.....	Barings Miller Investment Trust	.. AUS.....	NIA.....	MassMutual Ascend Life Insurance Company ..	Influence	..9.330	MMLIC .....	.....	.....
. 0000 ...			85-3449260 ..	.....	.....	.....	Barings Real Estate Debt Income Fund LP .....	.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..100.000	MMLIC .....	.....	.....
. 0000 ...			85-3449260 ..	.....	.....	.....	Barings Real Estate Debt Income Fund LP .....	.....	NIA.....	C.M. Life Insurance Company	Influence	..29.000	MMLIC .....	.....	.....
. 0000 ...			85-3449260 ..	.....	.....	.....	Barings Real Estate Debt Income Fund LP	.. DE.....	NIA.....	Barings LLC	Management	..33.600	MMLIC .....	.....	.....
. 0000 ...			46-5460309 ..	.....	.....	.....	Barings Real Estate European Value Add I SCSp ..	.. GBR.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..49.990	MMLIC .....	.....	.....
. 0000 ...			46-0687392 ..	.....	.....	.....	Barings Real Estate European Value Add I SCSp ..	.. GBR.....	NIA.....	C.M. Life Insurance Company	Ownership	..4.900	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	Barings Real Estate European Value Add I SCSp ..	.. GBR.....	NIA.....	Barings LLC	Management	..14.000	MMLIC .....	.....	.....
. 0000 ...							Barings Small Business Fund, L.P.	.. DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..33.600	MMLIC .....	.....	.....
. 0000 ...							Barings U.S. High Yield Fund	.. DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	..30.090	MMLIC .....	.....	.....
. 0000 ...							Barings-MM Revolver Fund LP	.. DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..86.000	MMLIC .....	.....	.....
. 0000 ...			45-2632610 ..	.....	.....	.....	Barings-MM Revolver Fund LP	.. DE.....	NIA.....	MM Ascend	Ownership/Influence	..14.000	MMLIC .....	.....	.....
. 0000 ...			45-2632610 ..	.....	.....	.....	Beauty Brands Acquisition LLC	.. DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..32.630	MMLIC .....	.....	.....
. 0000 ...			37-1506417 ..	.....	.....	.....	Beauty Brands Acquisition Intermediate LLC ..	.. DE.....	NIA.....	Beauty Brands Acquisition LLC	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...							Beauty Brands Acquisition Intermediate LLC ..	.....	.....	Beauty Brands Acquisition Intermediate LLC	.....	.....	MMLIC .....	.....	.....
. 0000 ...							Forma Brands, LLC	.. DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	..100.000	MMLIC .....	.....	.....
. 0000 ...			45-2632610 ..	.....	.....	.....	Cornerstone Permanent Mortgage Fund LLC	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			45-2632610 ..	.....	.....	.....	Cornerstone Permanent Mortgage Fund LLC	.. MA.....	NIA.....	Barings LLC	Management.....	..100.000	MMLIC .....	.....	2
. 0000 ...			83-0560183 ..	.....	.....	.....	CREA Ridge Apartments, LLC	.. DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	..100.000	MMLIC .....	.....	3
. 0000 ...			83-0560183 ..	.....	.....	.....	Euro Real Estate Holdings Herleshausen LLC ..	.. DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..47.500	MMLIC .....	.....	.....
. 0000 ...			81-2244465 ..	.....	.....	.....	London Office JV Holdings LLC	.. DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	..100.000	MMLIC .....	.....	.....
. 0000 ...			81-4258759 ..	.....	.....	.....	Riverwalk MM Member, LLC	.. DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	..100.000	MMLIC .....	.....	.....
. 0000 ...			83-0560183 ..	.....	.....	.....	Aland Royalty Holdings LP	.. DE.....	NIA.....	MassMutual Holding LLC	Ownership/Influence	..26.690	MMLIC .....	.....	.....
. 0000 ...			83-0560183 ..	.....	.....	.....	Aland Royalty Holdings LP	.. DE.....	NIA.....	Barings LLC	Management	..29.000	MMLIC .....	.....	.....

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Location	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Ownership Provide Percentage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
.0000			81-2244465				Chassis Acquisition Holding LLC	..DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..30.000	MMLIC		
.0000			81-4258759				CRA Aircraft Holding LLC	..DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..40.000	MMLIC		
.0000			81-4258759				CRA Aircraft Holding LLC	..DE	NIA	Barings LLC	Influence	..40.440	MMLIC		
.0000			04-1590850				EIP Holdings I, LLC	..DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..29.000	MMLIC		
.0000			46-5460309				Red Lake Ventures, LLC	..DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..31.520	MMLIC		
.0000			46-5460309				Red Lake Ventures, LLC		NIA	Barings LLC	Influence	..54.700	MMLIC		
.0000			46-0687392				Validus Holding Company LLC		NIA	Barings LLC	Ownership	..40.440	MMLIC		
.0000			04-1590850				SBNP SIA II LLC	..DE	NIA	Barings LLC	Ownership	..100.000	MMLIC		
.0000			37-1506417				SBNP SIA III LLC	..DE	NIA	Barings LLC	Ownership	..100.000	MMLIC		
.0000			37-1506417				MM Speedway El Paso Member LLC	..DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	..100.000	MMLIC		
.0000							Barings European Real Estate Debt Income Fund	..LUX	NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..54.720	MMLIC		
.0000							Barings European Real Estate Debt Income Fund	..LUX	NIA	Barings LLC	Influence		MMLIC		
.0000			37-1506417				Babson Capital Loan Strategies Fund, L.P.		NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..76.630	MMLIC		2
.0000			37-1506417				Babson Capital Loan Strategies Fund, L.P.		NIA	C.M. Life Insurance Company	Ownership	..3.800	MMLIC		3
.0000			37-1506417				Babson Capital Loan Strategies Fund, L.P.		NIA	Barings LLC	Management		MMLIC		
.0000							Barings US High Yield Bond Fund	..IRL	NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence		MMLIC		
.0000			37-15576VH				Barings US High Yield Bond Fund	..IRL	NIA	Barings LLC	Management		MMLIC		
.0000							Babson CLO Ltd. 2015-I	..CYM	NIA	Barings LLC	Influence		MMLIC		2
.0000							Babson CLO Ltd. 2015-II	..CYM	NIA	Barings LLC	Influence		MMLIC		3
.0000			98-1473665				Babson CLO Ltd. 2016-II	..CYM	NIA	Barings LLC	Influence		MMLIC		
.0000			98-1332384				Barings CLO 2018-III	..CYM	NIA	Barings LLC	Influence	..91.220	MMLIC		
.0000							Barings CLO 2018-IV	..CYM	NIA	Barings LLC	Influence	..67.500	MMLIC		
.0000			98-1473665				Barings CLO 2019-II	..CYM	NIA	Barings LLC	Influence	..3.540	MMLIC		
.0000							Barings CLO 2019-III	..CYM	NIA	Barings LLC	Influence		MMLIC		
.0000							Barings CLO 2019-IV	..CYM	NIA	Barings LLC	Influence	..12.500	MMLIC		
.0000							Barings CLO 2020-I	..CYM	NIA	Barings LLC	Influence	..0.700	MMLIC		
.0000							Barings CLO 2020-II	..CYM	NIA	Barings LLC	Influence		MMLIC		
.0000							Barings CLO 2020-IV	..CYM	NIA	Barings LLC	Influence	..70.780	MMLIC		
.0000							Barings CLO 2021-I	..CYM	NIA	Barings LLC	Influence		MMLIC		
.0000							Barings CLO 2021-II	..CYM	NIA	Barings LLC	Influence		MMLIC		
.0000			87-0977058				Barings CLO 2021-III	..CYM	NIA	Barings LLC	Influence	..51.030	MMLIC		
.0000			87-0977058				Barings CLO 2024-II	..CYM	NIA	Barings LLC	Influence		MMLIC		
.0000			36-037260H				Babson Euro CLO 2014-I BV	..NLD	NIA	Barings LLC	Influence	..29.700	MMLIC		
.0000			86-3661023				Babson Euro CLO 2015-I BV	..NLD	NIA	Barings LLC	Influence	..0.400	MMLIC		
.0000			36-037260H				Barings Euro CLO 2019-I BV	..IRL	NIA	Barings LLC	Influence		MMLIC		
.0000			37-15576VH				Barings Euro CLO 2019-II BV	..IRL	NIA	Barings LLC	Influence		MMLIC		
.0000							Barings Euro CLO 2020-I DAC	..IRL	NIA	Barings LLC	Influence		MMLIC		
.0000			37-15576VH				Barings Euro CLO 2021-I DAC	..IRL	NIA	Barings LLC	Influence		MMLIC		
.0000							Barings Euro CLO 2021-II DAC	..IRL	NIA	Barings LLC	Influence		MMLIC		
.0000			98-1332384				Barings Euro CLO 2021-III DAC	..IRL	NIA	Barings LLC	Influence	..97.550	MMLIC		

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Location	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Ownership Provide Perce-n-tage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
.0000			98-1332384				Barings Euro CLO 2023-II DAC	.IRL	NIA	Barings LLC	Influence	.67.230	MMLIC		
.0000			98-1332384				Barings Global Energy Infrastructure Fund I LP	.CYM	NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	.99.230	MMLIC		
.0000			98-1567942				Barings Global Special Situations Credit 4 Delaware	.DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	.67.000	MMLIC		
.0000			98-1567942				Barings Global Special Situations Credit 4 Delaware		NIA	C.M. Life Insurance Company	Ownership	.3.500	MMLIC		
.0000			81-0841854				Barings Global Special Situations Credit 4 Delaware		NIA	Barings LLC	Management	.0.700	MMLIC		
.0000			81-0841854				Barings Global Special Situations Credit 4 LUX	.LUX	NIA	Massachusetts Mutual Life Insurance Company	Ownership	.12.600	MMLIC		
.0000							Barings Global Special Situations Credit 4 LUX	.LUX	NIA	C.M. Life Insurance Company	Ownership	.0.700	MMLIC		
.0000			87-0977058				Barings Global Special Situations Credit 4 LUX	.LUX	NIA	Barings LLC	Management	.49.300	MMLIC		
.0000			87-0977058				Barings Europe Select Fund	.IRL	NIA	Barings LLC	Management		MMLIC		
.0000			87-0977058				Barings Hotel Opportunity Venture	.CT	NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	.50.000	MMLIC		
.0000			87-0977058				Barings Hotel Opportunity Venture	.CT	NIA	Barings LLC	Management	.0.400	MMLIC		
.0000			86-3661023				Barings Innovations & Growth Real Estate Fund		NIA	Massachusetts Mutual Life Insurance Company	Ownership	.29.700	MMLIC		
.0000			86-3661023				Barings Innovations & Growth Real Estate Fund		NIA	C.M. Life Insurance Company	Ownership	.0.400	MMLIC		
.0000							Barings Middle Market CLO 2017-I Ltd & LLC	.CYM	NIA	Barings LLC	Influence		MMLIC		
.0000			98-1612604				Barings Middle Market CLO 2018-I	.CYM	NIA	Barings LLC	Influence	.12.590	MMLIC		
.0000							Barings Middle Market CLO 2019-I	.CYM	NIA	Barings LLC	Influence	.0.800	MMLIC		
.0000			98-1612604				Barings Middle Market CLO Ltd 2021-I	.CYM	NIA	Barings LLC	Influence		MMLIC		
.0000			98-1332384				Barings Middle Market CLO Ltd 2023-I	.BMJ	NIA	Barings LLC	Influence	.34.800	MMLIC		
.0000			98-1332384				Barings Middle Market CLO Ltd 2023-II	.BMJ	NIA	Barings LLC	Influence		MMLIC		
.0000			98-1332384				Barings RE Credit Strategies VII LP		NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	.34.690	MMLIC		
.0000			98-1332384				Barings RE Credit Strategies VII LP		NIA	Baring Asset Management Limited	Management		MMLIC		
.0000			98-1567942				Barings Target Yield Infrastructure Debt Fund	.LUX	NIA	Massachusetts Mutual Life Insurance Company	Ownership	.18.870	MMLIC		
.0000			98-1567942				Barings Target Yield Infrastructure Debt Fund	.LUX	NIA	Baring Asset Management Limited	Management		MMLIC		
.0000			81-0841854				Barings CLO Investment Partners LP		NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	.100.000	MMLIC		
.0000			81-0841854				Barings CLO Investment Partners LP		NIA	Barings LLC	Management	.2.400	MMLIC		
.0000							Barings Euro Value Add II (BREEVA II)	.LUX	NIA	Massachusetts Mutual Life Insurance Company	Ownership/Influence	.27.500	MMLIC		
.0000			87-1262754				Barings Euro Value Add II (BREEVA II)	.LUX	NIA	C.M. Life Insurance Company	Ownership	.2.400	MMLIC		
.0000			87-1262754				Barings Euro Value Add II (BREEVA II)	.LUX	NIA	Barings LLC	Management	.8.200	MMLIC		
.0000			87-1262754				Barings Transportation Fund LP	.DE	NIA	MassMutual Holding LLC	Ownership/Influence	.13.310	MMLIC		
.0000			87-1262754				Barings Transportation Fund LP	.DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	.8.200	MMLIC		
.0000							Barings Transportation Fund LP		NIA	Massachusetts Mutual Life Insurance Company	Ownership		MMLIC		
.0000			38-4041011				Braemar Energy Ventures I, L.P.	.DE	NIA	Company	Ownership/Influence	.98.500	MMLIC		
.0000			38-4032059				Braemar Energy Ventures I, L.P.		NIA	C.M. Life Insurance Company	Ownership	.1.500	MMLIC		
.0000							Braemar Energy Ventures I, L.P.		NIA	Barings LLC	Management	.0.800	MMLIC		
.0000			04-1590850				Barings European Core Property Fund SCSp	.LUX	NIA	MassMutual Holding LLC	Ownership/Influence	.12.860	MMLIC		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Location	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Ownership Provide Percen-tage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
.0000 ...			46-5001122 ..	.....	.....	.....	Barings European Core Property Fund SCSp	.LUX.....	NIA.....	C.M. Life Insurance Company	Ownership.....	0.800 ...	MMLIC .....	.....	.....
.0000 ...			38-4059932 ..	.....	.....	.....	Barings European Core Property Fund SCSp	.LUX.....	NIA.....	Barings Real Estate Advisers LLC	Management.....	0.800 ...	MMLIC .....	.....	.....
.0000 ...			46-5001122 ..	.....	.....	.....	Barings European Private Loan Fund III A	.LUX.....	NIA.....	Company	Ownership.....	44.980 ...	MMLIC .....	.....	.....
.0000 ...			38-4059932 ..	.....	.....	.....	Benchmark 2018-B2 Mortgage Trust	.NY.....	NIA.....	Barings LLC	Influence.....	100.000 ...	MMLIC .....	.....	.....
.0000 ...			20-5578089 ..	.....	.....	.....	Benchmark 2018-B4	.NY.....	NIA.....	Barings LLC	Influence.....	24.400 ...	MMLIC .....	.....	.....
.0000 ...			38-4096530 ..	.....	.....	.....	Benchmark 2018-B8	.NY.....	NIA.....	Barings LLC	Influence.....	.....	MMLIC .....	.....	.....
.0000 ...			20-5578089 ..	.....	.....	.....	Barings Core Property Fund LP	.DE.....	NIA.....	MassMutual Holding LLC	Ownership/Influence	25.900 ...	MMLIC .....	.....	.....
.0000 ...			20-5578089 ..	.....	.....	.....	Barings Core Property Fund LP	.DE.....	NIA.....	Barings Real Estate Advisers LLC	Management.....	100.000 ...	MMLIC .....	.....	.....
.0000 ...			04-1590850 ..	.....	.....	.....	DPI Acres Capital SPV LLC	.DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	100.000 ...	MMLIC .....	.....	.....
.0000 ...			04-1590850 ..	.....	.....	.....	DPI-ARES Mortgage Lending SPV, LLC	.DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	100.000 ...	MMLIC .....	.....	.....
.0000 ...			37-1708623 ..	.....	.....	.....	E2E Affordable Housing Debt Fund LLC	.DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	100.000 ...	MMLIC .....	.....	.....
.0000 ...			37-1708623 ..	.....	.....	.....	Great Lakes III, L.P. ....	.....	NIA.....	Company	Ownership/Influence	40.450 ...	MMLIC .....	.....	.....
.0000 ...			37-1708623 ..	.....	.....	.....	Great Lakes III, L.P. ....	.....	NIA.....	Barings LLC	Management.....	100.000 ...	MMLIC .....	.....	.....
.0000 ...			98-1607033 ..	.....	.....	.....	GIA EU Holdings – Emerson JV Sarl	.LUX.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	100.000 ...	MMLIC .....	.....	.....
.0000 ...			98-1607033 ..	.....	.....	.....	GIA EU Holdings – Emerson JV Sarl	.LUX.....	NIA.....	Barings LLC	Management.....	100.000 ...	MMLIC .....	.....	.....
.0000 ...			38-4041011 ..	.....	.....	.....	JPMCC Commercial Mortgage Securities Trust 2017-JP7	.NY.....	NIA.....	Barings LLC	Influence.....	44.000 ...	MMLIC .....	.....	.....
.0000 ...			38-4032059 ..	.....	.....	.....	JPMDB Commercial Mortgage Securities Trust 2017-C5	.NY.....	NIA.....	Barings LLC	Influence.....	54.000 ...	MMLIC .....	.....	.....
.0000 ...			41-2280127 ..	.....	.....	.....	Martello Re Feeder LP	.DE.....	NIA.....	MassMutual Holding LLC	Ownership	44.000 ...	MMLIC .....	.....	.....
.0000 ...			41-2280129 ..	.....	.....	.....	Martello Re LP .....	.....	NIA.....	Martello Re Feeder LP	Ownership	54.000 ...	MMLIC .....	.....	.....
.0000 ...			41-2280129 ..	.....	.....	.....	Martello Re Holding Limited LLC	.DE.....	NIA.....	Martello Re LP	Ownership.....	100.000 ...	MMLIC .....	.....	.....
.0000 ...			04-1590850 ..	.....	.....	.....	Martello Re Limited	.BMU.....	NIA.....	Martello Re Holding Limited LLC	Ownership.....	100.000 ...	MMLIC .....	.....	.....
.0000 ...			87-4021641 ..	.....	.....	.....	Martello Re Services Company	.DE.....	NIA.....	Martello Re Holding Limited LLC	Ownership.....	100.000 ...	MMLIC .....	.....	.....
.0000 ...			04-1590850 ..	.....	.....	.....	Miami Douglas Three MM, LLC	.DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	100.000 ...	MMLIC .....	.....	.....
.0000 ...			87-4021641 ..	.....	.....	.....	MM BIG Peninsula Co-Invest Member LLC	.DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	27.000 ...	MMLIC .....	.....	.....
.0000 ...			87-4021641 ..	.....	.....	.....	MM BIG Peninsula Co-Invest Member LLC	.DE.....	NIA.....	C.M. Life Insurance Company	Ownership.....	0.800 ...	MMLIC .....	.....	.....
.0000 ...			04-1590850 ..	.....	.....	.....	MM Direct Private Invetment Holding	.DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	100.000 ...	MMLIC .....	.....	.....
.0000 ...			81-3000420 ..	.....	.....	.....	MM CM Holding LLC	.DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	100.000 ...	MMLIC .....	.....	.....
.0000 ...			81-3000420 ..	.....	.....	.....	MM Debt Participations LLC	.DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	100.000 ...	MMLIC .....	.....	.....
.0000 ...			81-3000420 ..	.....	.....	.....	MM Debt Participations LLC	.DE.....	NIA.....	Barings LLC	Management.....	3.100 ...	MMLIC .....	.....	.....
.0000 ...			04-1590850 ..	.....	.....	.....	MM MD1 Station Member LLC	.DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	47.000 ...	MMLIC .....	.....	.....
.0000 ...			04-1590850 ..	.....	.....	.....	MM MD1 Station Member LLC	.DE.....	NIA.....	C.M. Life Insurance Company	Ownership.....	3.100 ...	MMLIC .....	.....	.....
.0000 ...			04-1590850 ..	.....	.....	.....	MM MD2 Station Member LLC	.DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	47.000 ...	MMLIC .....	.....	.....
.0000 ...			04-1590850 ..	.....	.....	.....	MM MD2 Station Member LLC	.DE.....	NIA.....	C.M. Life Insurance Company	Ownership.....	3.100 ...	MMLIC .....	.....	.....
.0000 ...			04-1590850 ..	.....	.....	.....	MMV Climate Technology Fund GP	.DE.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	99.000 ...	MMLIC .....	.....	.....
.0000 ...			04-1590850 ..	.....	.....	.....	MMV Climate Technology Fund GP	.DE.....	NIA.....	Massachusetts Mutual Ascend	Ownership.....	1.000 ...	MMLIC .....	.....	.....

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Location	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Ownership Provide Percen-tage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
. 0000 ...			04-1590850 ..	.....	.....	.....	MM REED District Landco Member LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	MM Subline Borrower LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			41-2280127 ..	.....	.....	.....	SBNP SIA IV LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..99.000	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	Washington Pine LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership	..100.000	MMLIC .....	.....	.....
. 0000 ...			35-2553915 ..	.....	.....	.....	Ten Fan Pier Boulevard LLC	.. DE.....	 NIA.....	Company	Ownership	..100.000	MMLIC .....	.....	.....
. 0000 ...			41-2280127 ..	.....	.....	.....	Tower Square Capital Partners III, L.P.	.. DE.....	 NIA.....	Barings LLC	Management.....	..90.000	MMLIC .....	.....	.....
. 0000 ...			41-2280127 ..	.....	.....	.....	Tower Square Capital Partners III, L.P.	.. DE.....	 NIA.....	MassMutual Holding LLC	Ownership/Influence	..17.290	MMLIC .....	.....	.....
. 0000 ...			41-2280129 ..	.....	.....	.....	Tower Square Capital Partners IIIA, L.P.	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..97.170	MMLIC .....	.....	.....
. 0000 ...			41-2280129 ..	.....	.....	.....	Tower Square Capital Partners IIIA, L.P.	.. DE.....	 NIA.....	Barings LLC	Management.....	..95.800	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	Trailside MM Member LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..66.970	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	Trailside MM Member LLC	.. DE.....	 NIA.....	C.M. Life Insurance Company	Ownership.....	..7.380	MMLIC .....	.....	.....
. 0000 ...			83-1325764 ..	.....	.....	.....	Washington Gateway Two LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..95.800	MMLIC .....	.....	.....
. 0000 ...			83-1325764 ..	.....	.....	.....	Washington Gateway Two LLC .....	.....	..... NIA.....	C.M. Life Insurance Company	Ownership.....	..6.720	MMLIC .....	.....	.....
. 0000 ...			32-0574045 ..	.....	.....	.....	Washington Gateway Three LLC .....	.....	..... NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..95.230	MMLIC .....	.....	.....
. 0000 ...			47-3790192 ..	.....	.....	.....	MALIC Debt Participations LLC	.. DE.....	 NIA.....	Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			71-1018134 ..	.....	.....	.....	Babson Capital Loan Strategies Master Fund LP	..CYM.....	 NIA.....	Barings LLC	Management.....	..0.750	MMLIC .....	.....	.....
. 0000 ...			71-1018134 ..	.....	.....	.....	Barings China Aggregate Bond Private Securities Investment Fund	..CHN.....	 NIA.....	Barings LLC	Management	..0.320	MMLIC .....	.....	.....
. 0000 ...			47-3790192 ..	.....	.....	.....	Barings Global High Yield Fund	..MA.....	 NIA.....	Barings LLC	Management.....	..40.000	MMLIC .....	.....	.....
. 0000 ...			71-1018134 ..	.....	.....	.....	Great Lakes II LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..0.750	MMLIC .....	.....	.....
. 0000 ...			71-1018134 ..	.....	.....	.....	Great Lakes II LLC .....	.....	..... NIA.....	C.M. Life Insurance Company	Ownership.....	..0.320	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	Wood Creek Venture Fund LLC .....	.....	..... NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..40.000	MMLIC .....	.....	.....
. 0000 ...			82-2285211 ..	.....	.....	.....	Barings California Mortgage Fund IV	.. CA.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership/Influence	..100.000	MMLIC .....	.....	.....
. 0000 ...			82-3307907 ..	.....	.....	.....	Barings California Mortgage Fund IV	.. CA.....	 NIA.....	Barings LLC	Influence.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			95-4207717 ..	.....	.....	.....	Barings Umbrella Fund LUX SCSp SICAV RAIF ...	..LUX.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..24.960	MMLIC .....	.....	.....
. 0000 ...			95-4207717 ..	.....	.....	.....	Barings Umbrella Fund LUX SCSp SICAV RAIF ...	..LUX.....	 NIA.....	C.M. Life Insurance Company	Ownership.....	..2.300	MMLIC .....	.....	.....
. 0000 ...			82-2285211 ..	.....	.....	.....	Calgary Railway Holding LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..90.000	MMLIC .....	.....	.....
. 0000 ...			82-3307907 ..	.....	.....	.....	Cornbrook PRS Holdings LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			95-4207717 ..	.....	.....	.....	Cornerstone California Mortgage Fund I LLC ..	.. CA.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			95-4207717 ..	.....	.....	.....	Cornerstone California Mortgage Fund II LLC ..	.. CA.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			95-4207717 ..	.....	.....	.....	Cornerstone California Mortgage Fund III LLC ..	.. CA.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			56-2630592 ..	.....	.....	.....	Cornerstone Fort Pierce Development LLC	.. DE.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..90.000	MMLIC .....	.....	.....

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Location	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Owner-ship Provide Percen-tage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
. 0000 ...			56-2630592 ..	.....	.....	.....	Cornerstone Fort Pierce Development LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Ownership.....	.. 5.900	MMLIC .....	.....	.....
. 0000 ...			61-1750537 ..	.....	.....	.....	Cornerstone Permanent Mortgage Fund II	.. MA.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000	MMLIC .....	.....	.....
. 0000 ...			61-1750537 ..	.....	.....	.....	Cornerstone Permanent Mortgage Fund II	.. MA.....	.. NIA.....	Barings LLC	Management.....	.. 94.400	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	Cornerstone Permanent Mortgage Fund III LLC	.. MA.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000	MMLIC .....	.....	.....
. 0000 ...			61-1793735 ..	.....	.....	.....	Cornerstone Permanent Mortgage Fund IV	.. MA.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000	MMLIC .....	.....	.....
. 0000 ...			20-0348173 ..	.....	.....	.....	CREA/PPC Venture LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 28.520	MMLIC .....	.....	.....
. 0000 ...			82-2783393 ..	.....	.....	.....	Danville Riverwalk Venture, LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 94.400	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	Euro Real Estate Holdings LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 50.000	MMLIC .....	.....	.....
. 0000 ...			20-3347091 ..	.....	.....	.....	Fan Pier Development LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 65.000	MMLIC .....	.....	.....
. 0000 ...			20-3347091 ..	.....	.....	.....	Fan Pier Development LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Ownership.....	.. 5.850	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	GIA EU Holdings LLC - Avalon Spain	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	.....	.....	GIA EU Holdings LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000	MMLIC .....	.....	.....
. 0000 ...			81-5360103 ..	.....	0000927972 ..	OQ	Landmark Manchester Holdings LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000	MMLIC .....	.....	.....
. 0000 ...			13-1935920 ..	.....	0000927972 ..	OQ	MMLIC Debt Participations LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Ascend	Ownership.....	.. 100.000	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM Brookhaven Member LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 95.000	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM Ascend Mtg. Lending LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 100.000	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM Kannapolis Industrial Member LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 82.720	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM Kannapolis Industrial Member LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Ascend	Ownership.....	.. 12.280	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM East South Crossing Member LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 95.000	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM Horizon Savannah Member LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 95.000	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM Horizon Savannah Member LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Ownership.....	.. 3.700	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM Horizon Savannah Member II LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 4.430	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM Horizon Savannah Member II LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Ownership.....	.. 0.180	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM Horizon Savannah Member II LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Ascend	Ownership.....	.. 0.380	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM Ironhead Commerce Center	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 75.250	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM Ironhead Commerce Center	.. DE.....	.. NIA.....	Massachusetts Mutual Ascend	Ownership.....	.. 19.800	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM National Self-Storage Program Member LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Ownership.....	.. 98.000	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM 1370 AVE OF AM LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 90.000	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM 1370 AVE OF AM LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Ownership.....	.. 3.330	MMLIC .....	.....	.....
. 0000 ...			04-1590850 ..	.....	0000916053 ..	OQ	MM 1400 E 4th Street Member LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Ownership.....	.. 96.000	MMLIC .....	.....	.....
. 0000 ...			80-0948028 ..	.....	0000916053 ..	OQ	One Harbor Shore LLC	.. DE.....	.. NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 94.990	MMLIC .....	.....	.....
. 0000 ...			80-0948028 ..	.....	.....	.....	One Harbor Shore LLC	.. DE.....	.. NIA.....	C.M. Life Insurance Company	Ownership.....	.. 6.030	MMLIC .....	.....	.....

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Loca-tion	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Owner-ship Provide Percen-tage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
.0000			04-1590850				Paco France Logistics LLC	..DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	..100.000	MMLIC		
.0000			88-3861481				Salomon Brothers Commercial Mortgage Trust 2001-MM	..DE	NIA	Barings Real Estate Advisers LLC	Influence	..93.800	MMLIC		
.0000			81-5273574		0000916053	OQ	Three PW Office Holding LLC	..DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	..95.100	MMLIC		
.0000			04-1590850		0000927972	OQ	Trailside MM Member II LLC	..DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	..47.100	MMLIC		
.0000			82-3250684		0000927972	OQ	Unna, Dortmund Holding LLC	..DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	..100.000	MMLIC		
.0000			45-5401109		0000916053	OQ	Washington Gateway Apartments Venture LLC	..DE	NIA	Company	Ownership	..95.440	MMLIC		
.0000			45-5401109		0000916053	OQ	Washington Gateway Apartments Venture LLC	..DE	NIA	C.M. Life Insurance Company	Ownership	..4.770	MMLIC		
.0000			88-3861481		0000916053	OQ	West 37th Street Hotel LLC	..DE	NIA	Massachusetts Mutual Life Insurance Company	Ownership	..93.800	MMLIC		
.0000			88-3861481		0000916053	OQ	West 37th Street Hotel LLC	..DE	NIA	C.M. Life Insurance Company	Ownership	..6.200	MMLIC		
.0000			26-3229251		0000927972	OQ	MassMutual Premier Strategic Emerging Markets Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Ownership	..57.940	MMLIC		
.0000			42-1710935		0000916053	OQ	MassMutual Select Mid-Cap Value Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Ownership	..38.710	MMLIC		
.0000			02-0769954		0000916053	OQ	MassMutual Select Small Capital Value Equity Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..63.350	MMLIC		
.0000			04-3584140		0000916053	OQ	MassMutual Select Small Company Value Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Ownership	..43.500	MMLIC		
.0000			82-3347422		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2005 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Ownership	..24.510	MMLIC		
.0000			82-3355639		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2010 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..100.000	MMLIC		
.0000			82-3382389		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2015 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..100.000	MMLIC		
.0000			82-3396442		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2020 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..100.000	MMLIC		
.0000			82-3417420		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2025 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..100.000	MMLIC		
.0000			82-3430358		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2030 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..100.000	MMLIC		
.0000			82-3439837		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2035 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..100.000	MMLIC		
.0000			82-3451779		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2040 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..99.790	MMLIC		
.0000			82-3472295		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2045 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..100.000	MMLIC		
.0000			82-3481715		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2050 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..100.000	MMLIC		
.0000			82-3502011		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2055 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..97.230	MMLIC		
.0000			82-3525148		0000916053	OQ	MassMutual Select T. Rowe Price Retirement 2060 Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..3.280	MMLIC		
.0000			82-3533944		0000916053	OQ	MassMutual Select T. Rowe Price Retirement Balanced Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..7.690	MMLIC		
.0000			46-4257056		0000916053	OQ	MML Series International Equity Fund	..MA	NIA	Massachusetts Mutual Life Insurance Company	Influence	..100.000	MMLIC		

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Loca-tion	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Owner-ship Provide Percen-tage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
. 0000 ...			47-3529636 ..	.....	0000916053 ..	OQ	MML Series II Dynamic Bond Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Influence.....	..38.540	MMLIC .....	.....	.....
. 0000 ...			47-3544629 ..	.....	0000916053 ..	OQ	MML Series II Equity Rotation Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..97.230	MMLIC .....	.....	.....
. 0000 ...			27-1933389 ..	.....	0000916053 ..	OQ	MassMutual RetireSMART 2035 Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..3.220	MMLIC .....	.....	.....
. 0000 ...			27-1932769 ..	.....	0000916053 ..	OQ	MassMutual RetireSMART 2045 Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..6.440	MMLIC .....	.....	.....
. 0000 ...			46-3289207 ..	.....	0000916053 ..	OQ	MassMutual RetireSMART 2055 Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..20.410	MMLIC .....	.....	.....
. 0000 ...			47-5326235 ..	.....	0000916053 ..	OQ	MassMutual RetireSMART 2060 Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..38.170	MMLIC .....	.....	.....
. 0000 ...			45-1618155 ..	.....	0000916053 ..	OQ	MassMutual 20/80 Allocation Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Influence.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			45-1618222 ..	.....	0000916053 ..	OQ	MML SER INVT FD II ISHARES 80/20 ALLOCATION FD	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..34.200	MMLIC .....	.....	.....
. 0000 ...			03-0532464 ..	.....	0000916053 ..	OQ	MassMutual RetireSMART In Retirement Fund ...	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..7.180	MMLIC .....	.....	.....
. 0000 ...			45-1618262 ..	.....	0000916053 ..	OQ	MassMutual 40/60 Allocation Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Influence.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			45-1618046 ..	.....	0000916053 ..	OQ	MassMutual 60/40 Allocation Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			45-1618046 ..	.....	0000916053 ..	OQ	MassMutual ishares 60/40 Allocation Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..58.190	MMLIC .....	.....	.....
. 0000 ...			04-3212054 ..	.....	0000916053 ..	OQ	MassMutual Balanced Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			04-3556992 ..	.....	0000916053 ..	OQ	MassMutual Blue Chip Growth Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			04-3277549 ..	.....	0000916053 ..	OQ	MassMutual Core Bond Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..4.800	MMLIC .....	.....	.....
. 0000 ...			04-3539084 ..	.....	0000916053 ..	OQ	MassMutual Disciplined Growth Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			04-3539083 ..	.....	0000916053 ..	OQ	MassMutual Disciplined Value Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			01-0821120 ..	.....	0000916053 ..	OQ	MassMutual Diversified Value Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			04-3512590 ..	.....	0000916053 ..	OQ	MassMutual Equity Opportunities Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			03-0532475 ..	.....	0000916053 ..	OQ	MassMutual Inflation-Protected and Income Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..99.790	MMLIC .....	.....	.....
. 0000 ...			04-3512596 ..	.....	0000916053 ..	OQ	MassMutual Mid Cap Growth Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			04-3464165 ..	.....	0000916053 ..	OQ	MassMutual Premier Diversified Bond Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			92-1441036 ..	.....	0000916053 ..	OQ	MassMutual RetireSMART by JPMorgan 2065 Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..90.930	MMLIC .....	.....	.....
. 0000 ...			45-1618222 ..	.....	0000916053 ..	OQ	MassMutual Select 80/20 Allocation Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			04-3557000 ..	.....	0000916053 ..	OQ	MassMutual Select Overseas Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			92-1427882 ..	.....	0000916053 ..	OQ	MassMutual Select T Rowe Price Retirement 2065 Fund	.. MA.....	NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..30.050	MMLIC .....	.....	.....

SCHEDULE Y
PART 1A - DETAIL OF INSURANCE HOLDING COMPANY SYSTEM

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Group Code	Group Name	NAIC Company Code	ID Number	Federal RSSD	CIK	Name of Securities Exchange if Publicly Traded (U.S. or International)	Names of Parent, Subsidiaries Or Affiliates	Domi-ciliary Loca-tion	Relation-ship to Reporting Entity	Directly Controlled by (Name of Entity/Person)	Type of Control (Ownership, Board, Management, Attorney-in-Fact, Influence, Other)	If Control is Owner-ship Provide Percen-tage	Ultimate Controlling Entity(ies)/Person(s)	Is an SCA Filing Re-quired? (Yes/No)	*
. 0000 ...			04-3464205 ..	.....	0000916053 ..	OQ	MassMutual Small Cap Growth Equity Fund	.. MA.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..61.390	MMLIC .....	.....	.....
. 0000 ...			04-3424705 ..	.....	0000916053 ..	OQ	MassMutual Small Cap Opportunities Fund	.. MA.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	.. 9.920	MMLIC .....	.....	.....
. 0000 ...			02-0769954 ..	.....	0000916053 ..	OQ	MassMutual Small Cap Value Equity Fund	.. MA.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....
. 0000 ...			93-4168848 ..	.....	0000916053 ..	OQ	MassMutual Clinton Municipal Credit Opportunities Fund	.. MA.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..99.600	MMLIC .....	.....	.....
. 0000 ...			93-4190918 ..	.....	0000916053 ..	OQ	MassMutual Clinton Municipal Fund	.. MA.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..98.860	MMLIC .....	.....	.....
. 0000 ...			93-4193313 ..	.....	0000916053 ..	OQ	MassMutual Clinton Short-Term Municipal Fund	.. MA.....	 NIA.....	Massachusetts Mutual Life Insurance Company	Ownership.....	..100.000	MMLIC .....	.....	.....

Asterisk	Explanation
1	Massachusetts Mutual Life Insurance Company owns 14.23% of the affiliated debt of Jefferies Finance LLC
2	Debt investors own .5% and includes only Great Lakes III, L.P.
3	Debt investors own .2% and includes only Great Lakes III, L.P.

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SUPPLEMENTAL EXHIBITS AND SCHEDULES INTERROGATORIES

The following supplemental reports are required to be filed as part of your statement filing. However, in the event that your company does not transact the type of business for which the special report must be filed, your response of NO to the specific interrogatory will be accepted in lieu of filing a "NONE" report and a bar code will be printed below. If the supplement is required of your company but is not being filed for whatever reason enter SEE EXPLANATION and provide an explanation following the interrogatory questions.

	Response
1. Will the Trusteed Surplus Statement be filed with the state of domicile and the NAIC with this statement?	NO
2. Will the Medicare Part D Coverage Supplement be filed with the state of domicile and the NAIC with this statement?	NO
3. Will the Reasonableness of Assumptions Certification required by Actuarial Guideline XXXV be filed with the state of domicile and electronically with the NAIC?	NO
4. Will the Reasonableness and Consistency of Assumptions Certification required by Actuarial Guideline XXXV be filed with the state of domicile and electronically with the NAIC?	YES
5. Will the Reasonableness of Assumptions Certification for Implied Guaranteed Rate Method required by Actuarial Guideline XXXVI be filed with the state of domicile and electronically with the NAIC?	NO
6. Will the Reasonableness and Consistency of Assumptions Certification required by Actuarial Guideline XXXVI (Updated Average Market Value) be filed with the state of domicile and electronically with the NAIC?	NO
7. Will the Reasonableness and Consistency of Assumptions Certification required by Actuarial Guideline XXXVI (Updated Market Value) be filed with the state of domicile and electronically with the NAIC?	NO
8. Will the Life PBR Statement of Exemption be filed with the state of domicile by July 1st and electronically with the NAIC with the second quarterly filing per the Valuation Manual (by August 15)? (2nd Quarter Only) The response for 1st and 3rd quarters should be N/A. A NO response resulting with a bar code is only appropriate in the 2nd quarter. In the case of an ongoing statement of exemption, enter "SEE EXPLANATION" and provide as an explanation that the company is utilizing an ongoing statement of exemption.	N/A

AUGUST FILING

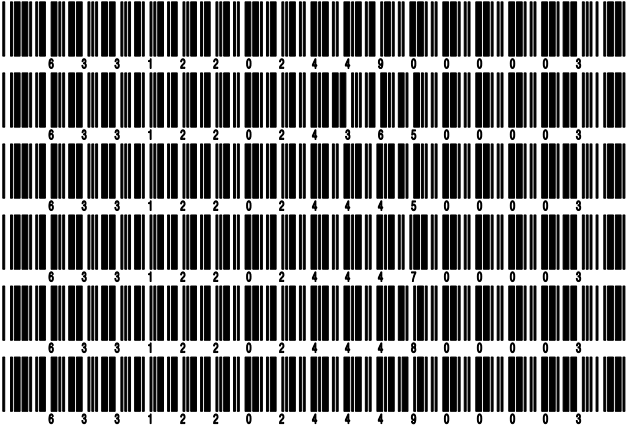
9. Will the regulator-only (non-public) Communication of Internal Control Related Matters Noted in Audit be filed with the state of domicile and electronically with the NAIC (as a regulator-only non-public document) by August 1? The response for 1st and 3rd quarters should be N/A. A NO response resulting with a bar code is only appropriate in the 2nd quarter.	N/A
--	-----

Explanation:

1. The data for this supplement is not required to be filed.
2. The data for this supplement is not required to be filed.
3. The data for this supplement is not required to be filed.
5. The data for this supplement is not required to be filed.
6. The data for this supplement is not required to be filed.
7. The data for this supplement is not required to be filed.

Bar Code:

1. Trusteed Surplus Statement [Document Identifier 490]
2. Medicare Part D Coverage Supplement [Document Identifier 365]
3. Reasonableness of Assumptions Certification required by Actuarial Guideline XXXV [Document Identifier 445]
5. Reasonableness of Assumptions Certification for Implied Guaranteed Rate Method required by Actuarial Guideline XXXVI [Document Identifier 447]
6. Reasonableness and Consistency of Assumptions Certification required by Actuarial Guideline XXXVI [Document Identifier 448]
7. Reasonableness and Consistency of Assumptions Certification required by Actuarial Guideline XXXVI (Updated Market Value) [Document Identifier 449]



STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

OVERFLOW PAGE FOR WRITE-INS

Additional Write-ins for Assets Line 25

	Current Statement Date			4 December 31 Prior Year Net Admitted Assets
	1 Assets	2 Nonadmitted Assets	3 Net Admitted Assets (Cols. 1 - 2)	
2504. Accounts receivable	39,841,911	5,916,907	33,925,004	6,495,920
2597. Summary of remaining write-ins for Line 25 from overflow page	39,841,911	5,916,907	33,925,004	6,495,920

Additional Write-ins for Summary of Operations Line 8.3

	1 Current Year To Date	2 Prior Year To Date	3 Prior Year Ended December 31
08.304. Miscellaneous income	1,570,270	52,683	54,818
08.397. Summary of remaining write-ins for Line 8.3 from overflow page	1,570,270	52,683	54,818

SCHEDULE A - VERIFICATION

Real Estate

	1	2
	Year to Date	Prior Year Ended December 31
1. Book/adjusted carrying value, December 31 of prior year		
2. Cost of acquired:		
2.1 Actual cost at time of acquisition		
2.2 Additional investment made after acquisition		
3. Current year change in encumbrances		
4. Total gain (loss) on disposals		
5. Deduct amounts received on disposals		
6. Total foreign exchange change in book/adjusted carrying value		
7. Deduct current year's other than temporary impairment recognized		
8. Deduct current year's depreciation		
9. Book/adjusted carrying value at the end of current period (Lines 1+2+3+4-5+6-7-8)		
10. Deduct total nonadmitted amounts		
11. Statement value at end of current period (Line 9 minus Line 10)		

SCHEDULE B - VERIFICATION

Mortgage Loans

	1	2
	Year to Date	Prior Year Ended December 31
1. Book value/recorded investment excluding accrued interest, December 31 of prior year	4,256,509,561	3,088,813,561
2. Cost of acquired:		
2.1 Actual cost at time of acquisition	960,636,218	1,756,164,211
2.2 Additional investment made after acquisition	183,101,871	124,941,328
3. Capitalized deferred interest and other	10,092,081	1,553,080
4. Accrual of discount	2,822,717	12,149,299
5. Unrealized valuation increase/(decrease)		0
6. Total gain (loss) on disposals	92,603	20,713
7. Deduct amounts received on disposals	539,556,280	715,396,315
8. Deduct amortization of premium and mortgage interest points and commitment fees	2,672,863	11,955,401
9. Total foreign exchange change in book value/recorded investment excluding accrued interest	87,635	219,085
10. Deduct current year's other than temporary impairment recognized		0
11. Book value/recorded investment excluding accrued interest at end of current period (Lines 1+2+3+4+5+6-7-8+9-10)	4,871,113,543	4,256,509,561
12. Total valuation allowance		
13. Subtotal (Line 11 plus Line 12)	4,871,113,543	4,256,509,561
14. Deduct total nonadmitted amounts		0
15. Statement value at end of current period (Line 13 minus Line 14)	4,871,113,543	4,256,509,561

SCHEDULE BA - VERIFICATION

Other Long-Term Invested Assets

	1	2
	Year to Date	Prior Year Ended December 31
1. Book/adjusted carrying value, December 31 of prior year	1,407,752,674	1,363,435,250
2. Cost of acquired:		
2.1 Actual cost at time of acquisition	139,920,526	111,126,612
2.2 Additional investment made after acquisition	167,998,677	253,810,230
3. Capitalized deferred interest and other	0	
4. Accrual of discount	6,985,825	18,437,513
5. Unrealized valuation increase/(decrease)	89,615,287	40,213,029
6. Total gain (loss) on disposals	1,590,087	(24,473,456)
7. Deduct amounts received on disposals	140,541,945	337,563,388
8. Deduct amortization of premium and depreciation	1,794,397	(1,868,276)
9. Total foreign exchange change in book/adjusted carrying value	587,657	320,433
10. Deduct current year's other than temporary impairment recognized	53,422,351	19,421,825
11. Book/adjusted carrying value at end of current period (Lines 1+2+3+4+5+6-7-8+9-10)	1,618,692,041	1,407,752,674
12. Deduct total nonadmitted amounts	0	
13. Statement value at end of current period (Line 11 minus Line 12)	1,618,692,041	1,407,752,674

SCHEDULE D - VERIFICATION

Bonds and Stocks

	1	2
	Year to Date	Prior Year Ended December 31
1. Book/adjusted carrying value of bonds and stocks, December 31 of prior year	35,889,697,885	34,200,158,053
2. Cost of bonds and stocks acquired	7,228,907,288	10,587,374,782
3. Accrual of discount	97,992,858	153,594,732
4. Unrealized valuation increase/(decrease)	62,777,869	22,186,367
5. Total gain (loss) on disposals	(130,884,373)	(443,074,595)
6. Deduct consideration for bonds and stocks disposed of	5,634,980,840	8,457,950,336
7. Deduct amortization of premium	32,252,513	108,381,453
8. Total foreign exchange change in book/adjusted carrying value	27,255,985	19,484,345
9. Deduct current year's other than temporary impairment recognized	64,710,468	83,694,011
10. Total investment income recognized as a result of prepayment penalties and/or acceleration fees	0	0
11. Book/adjusted carrying value at end of current period (Lines 1+2+3+4+5-6-7+8-9+10)	37,443,803,690	35,889,697,885
12. Deduct total nonadmitted amounts	0	0
13. Statement value at end of current period (Line 11 minus Line 12)	37,443,803,690	35,889,697,885

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 1B

Showing the Acquisitions, Dispositions and Non-Trading Activity
During the Current Quarter for all Bonds and Preferred Stock by NAIC Designation

NAIC Designation	1 Book/Adjusted Carrying Value Beginning of Current Quarter	2 Acquisitions During Current Quarter	3 Dispositions During Current Quarter	4 Non-Trading Activity During Current Quarter	5 Book/Adjusted Carrying Value End of First Quarter	6 Book/Adjusted Carrying Value End of Second Quarter	7 Book/Adjusted Carrying Value End of Third Quarter	8 Book/Adjusted Carrying Value December 31 Prior Year
BONDS								
1. NAIC 1 (a)	21,511,845,587	6,062,480,044	5,446,655,648	(307,986,693)	20,814,947,762	21,511,845,587	21,819,683,290	20,587,542,236
2. NAIC 2 (a)	15,404,124,752	34,710,187,675	33,690,456,618	(778,033,407)	15,133,208,386	15,404,124,752	15,645,822,401	14,265,448,635
3. NAIC 3 (a)	1,244,651,980	92,810,093	88,460,053	(49,476,029)	1,265,821,956	1,244,651,980	1,199,525,991	1,252,366,009
4. NAIC 4 (a)	475,758,098	96,301,433	39,804,705	(13,651,497)	442,473,529	475,758,098	518,603,330	494,396,912
5. NAIC 5 (a)	236,368,359	18,794,259	17,842,622	(18,461,182)	248,030,788	236,368,359	218,858,814	271,743,826
6. NAIC 6 (a)	70,341,963	9,329,246	520,711	36,592,370	34,067,263	70,341,963	115,742,868	41,900,864
7. Total Bonds	38,943,090,739	40,989,902,750	39,283,740,357	(1,131,016,438)	37,938,549,683	38,943,090,739	39,518,236,694	36,913,398,482
PREFERRED STOCK								
8. NAIC 1	15,000,000				0	15,000,000	15,000,000	4,914,449
9. NAIC 2	228,208,684	35,716,175	22,289,800	4,093,798	244,611,090	228,208,684	245,728,857	161,940,169
10. NAIC 3	1,742,777			11,400,620	7,793,201	1,742,777	13,143,397	6,998,696
11. NAIC 4	3,500,000			(3,500,000)	3,000,000	3,500,000	0	3,000,000
12. NAIC 5	25,598,131			(17,504,543)	28,280,574	25,598,131	8,093,588	24,141,839
13. NAIC 6	(114,938)	53,443,851		9,320,590	(332,829)	(114,938)	62,649,503	31,076
14. Total Preferred Stock	273,934,654	89,160,026	22,289,800	3,810,466	283,352,036	273,934,654	344,615,346	201,026,229
15. Total Bonds and Preferred Stock	39,217,025,392	41,079,062,776	39,306,030,157	(1,127,205,971)	38,221,901,718	39,217,025,392	39,862,852,040	37,114,424,711

(a) Book/Adjusted Carrying Value column for the end of the current reporting period includes the following amount of short-term and cash equivalent bonds by NAIC designation:

NAIC 1 \$ 856,550,915 ; NAIC 2 \$ 2,344,307,369 ; NAIC 3 \$ NAIC 4 \$ 812,500 ; NAIC 5 \$ 0 ; NAIC 6 \$ 0

SCHEDULE DA - PART 1

Short-Term Investments

	1	2	3	4	5
	Book/Adjusted Carrying Value	Par Value	Actual Cost	Interest Collected Year-to-Date	Paid for Accrued Interest Year-to-Date
7709999999 Totals	401,206,394	xxx	399,397,795	3,273,040	0

SCHEDULE DA - VERIFICATION

Short-Term Investments

	1	2
	Year To Date	Prior Year Ended December 31
1. Book/adjusted carrying value, December 31 of prior year	424,197,318	389,684,178
2. Cost of short-term investments acquired	904,443,281	969,540,658
3. Accrual of discount	13,323,381	13,275,593
4. Unrealized valuation increase/(decrease)		0
5. Total gain (loss) on disposals	(1,068,476)	(31,610)
6. Deduct consideration received on disposals	939,689,110	948,271,501
7. Deduct amortization of premium	0	0
8. Total foreign exchange change in book/adjusted carrying value		0
9. Deduct current year's other than temporary impairment recognized		0
10. Book/adjusted carrying value at end of current period (Lines 1+2+3+4+5-6-7+8-9)	401,206,394	424,197,318
11. Deduct total nonadmitted amounts	0	0
12. Statement value at end of current period (Line 10 minus Line 11)	401,206,394	424,197,318

SCHEDULE DB - PART A - VERIFICATION

Options, Caps, Floors, Collars, Swaps and Forwards

1.	Book/Adjusted Carrying Value, December 31, prior year (Line 10, prior year)	222,241,110
2.	Cost Paid/(Consideration Received) on additions	525,179,310
3.	Unrealized Valuation increase/(decrease)	5,783,033
4.	SSAP No. 108 adjustments	
5.	Total gain (loss) on termination recognized	725,218,329
6.	Considerations received/(paid) on terminations	724,877,897
7.	Amortization	(481,914,015)
8.	Adjustment to the Book/Adjusted Carrying Value of hedged item	
9.	Total foreign exchange change in Book/Adjusted Carrying Value	
10.	Book/Adjusted Carrying Value at End of Current Period (Lines 1+2+3+4+5-6+7+8+9)	271,629,870
11.	Deduct nonadmitted assets	
12.	Statement value at end of current period (Line 10 minus Line 11)	271,629,870

SCHEDULE DB - PART B - VERIFICATION

Futures Contracts

1.	Book/Adjusted carrying value, December 31 of prior year (Line 6, prior year)	20,973,705
2.	Cumulative cash change (Section 1, Broker Name/Net Cash Deposits Footnote - Cumulative Cash Change column)	
3.1	Add:	
	Change in variation margin on open contracts - Highly Effective Hedges	
3.11	Section 1, Column 15, current year to date minus	0
3.12	Section 1, Column 15, prior year	0
	Change in variation margin on open contracts - All Other	
3.13	Section 1, Column 18, current year to date minus	(450,189)
3.14	Section 1, Column 18, prior year	20,973,705
3.2	Add:	
	Change in adjustment to basis of hedged item	
3.21	Section 1, Column 17, current year to date minus	0
3.22	Section 1, Column 17, prior year	0
	Change in amount recognized	
3.23	Section 1, Column 19, current year to date minus	(450,189)
3.24	Section 1, Column 19, prior year plus	20,973,705
3.25	SSAP No. 108 adjustments	(21,423,894)
3.3	Subtotal (Line 3.1 minus Line 3.2)	0
4.1	Cumulative variation margin on terminated contracts during the year	(14,592,026)
4.2	Less:	
	4.21 Amount used to adjust basis of hedged item	
	4.22 Amount recognized	(35,565,731)
	4.23 SSAP No. 108 adjustments	(35,565,731)
4.3	Subtotal (Line 4.1 minus Line 4.2)	20,973,705
5.	Dispositions gains (losses) on contracts terminated in prior year:	
	5.1 Total gain (loss) recognized for terminations in prior year	
	5.2 Total gain (loss) adjusted into the hedged item(s) for terminations in prior year	450,189
6.	Book/Adjusted carrying value at end of current period (Lines 1+2+3.3-4.3-5.1-5.2)	(450,189)
7.	Deduct total nonadmitted amounts	
8.	Statement value at end of current period (Line 6 minus Line 7)	(450,189)

Schedule DB - Part C - Section 1 - Replication (Synthetic Asset) Transactions (RSATs) Open
N O N E

Schedule DB-Part C-Section 2-Reconciliation of Replication (Synthetic Asset) Transactions Open
N O N E

SCHEDULE DB - VERIFICATION

Verification of Book/Adjusted Carrying Value, Fair Value and Potential Exposure of all Open Derivative Contracts

		Book/Adjusted Carrying Value Check
1.	Part A, Section 1, Column 14.....	271,629,792
2.	Part B, Section 1, Column 15 plus Part B, Section 1 Footnote - Total Ending Cash Balance.....	0
3.	Total (Line 1 plus Line 2)	271,629,792
4.	Part D, Section 1, Column 6	728,227,749
5.	Part D, Section 1, Column 7	(457,048,144)
6.	Total (Line 3 minus Line 4 minus Line 5)	450,188
		Fair Value Check
7.	Part A, Section 1, Column 16	917,912,309
8.	Part B, Section 1, Column 13	(450,189)
9.	Total (Line 7 plus Line 8)	917,462,120
10.	Part D, Section 1, Column 9	1,033,124,576
11.	Part D, Section 1, Column 10	(115,662,455)
12.	Total (Line 9 minus Line 10 minus Line 11)	(1)
		Potential Exposure Check
13.	Part A, Section 1, Column 21	85,519,345
14.	Part B, Section 1, Column 20	3,878,250
15.	Part D, Section 1, Column 12	89,397,595
16.	Total (Line 13 plus Line 14 minus Line 15)	0

SCHEDULE E - PART 2 - VERIFICATION

(Cash Equivalents)

	1	2
	Year To Date	Prior Year Ended December 31
1. Book/adjusted carrying value, December 31 of prior year	1,944,403,033	1,535,691,774
2. Cost of cash equivalents acquired	72,231,825,593	105,964,099,263
3. Accrual of discount	96,418,006	71,821,164
4. Unrealized valuation increase/(decrease)		0
5. Total gain (loss) on disposals	6,276	10,949
6. Deduct consideration received on disposals	71,195,831,096	105,627,220,117
7. Deduct amortization of premium	0	0
8. Total foreign exchange change in book/adjusted carrying value	0	0
9. Deduct current year's other than temporary impairment recognized	0	0
10. Book/adjusted carrying value at end of current period (Lines 1+2+3+4+5-6-7+8-9)	3,076,821,811	1,944,403,033
11. Deduct total nonadmitted amounts	0	0
12. Statement value at end of current period (Line 10 minus Line 11)	3,076,821,811	1,944,403,033

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE A - PART 2

Showing All Real Estate ACQUIRED AND ADDITIONS MADE During the Current Quarter

[illegible]

SCHEDULE A - PART 3

Showing All Real Estate DISPOSED During the Quarter, Including Payments During the Final Year on "Sales Under Contract"

[illegible]

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE B - PART 2

Showing All Mortgage Loans ACQUIRED AND ADDITIONS MADE During the Current Quarter

1 Loan Number	Location		4 Loan Type	5 Date Acquired	6 Rate of Interest	7 Actual Cost at Time of Acquisition	8 Additional Investment Made After Acquisition	9 Value of Land and Buildings
	2 City	3 State						
1550201J1	Various	TX		07/01/2021	3.687	0	2,498	768,278
0299999. Mortgages in good standing - Residential mortgages-insured or guaranteed						0	2,498	768,278
121836XY1	Various	NJ		09/21/2023	8.800		1,622	4,230,501
146738AB5	Various	FL		11/29/2022	9.288		56,405	1,664,245
146738BC2	Various	NC		12/09/2022	8.841		249,782	1,708,693
146738DE6	Various	FL		01/11/2023	9.892		165,782	1,588,836
146738FG9	Various	FL		02/09/2023	10.005		188,141	1,370,322
146738GH6	Various	FL		02/24/2023	8.026		1,866,873	0
146738HI3	Various	FL		03/09/2023	8.645		968,587	3,605,571
146738IJO	Various	FL		03/23/2023	7.470		3,095,510	5,276,179
146738JK6	Various	FL		04/11/2023	8.544		5,655,129	8,732,244
146738KL2	Various	MA		04/27/2023	9.280		69,657	2,980,535
146738LM9	Various	CA		05/11/2023	7.605		1,222,948	6,359,936
146738NO3	Various	CA		05/11/2023	7.876		242,283	1,898,915
146738OP9	Various	FL		06/06/2023	7.500		2,823,955	7,147,032
146738PO6	Various	FL		06/23/2023	8.508		4,337,345	12,495,666
146738QO3	Various	CA		07/11/2023	8.561		2,074,450	11,914,553
146738RS0	Various	FL		07/27/2023	7.432		1,998,434	11,726,946
146738ST7	Various	FL		08/10/2023	6.837		1,456,230	6,728,908
146738TU3	Various	NY		08/11/2023	7.786		4,398,448	11,958,310
146738UV9	Various	CA		08/24/2023	8.760		3,084,790	9,088,086
146738VII6	Various	CA		09/07/2023	9.115		1,936,523	8,144,307
146738WX3	Various	FL		09/21/2023	9.056		2,760,390	12,072,384
146738XY0	Various	CA		10/12/2023	9.563		2,036,274	11,579,567
146738YZ6	Various	FL		10/26/2023	9.416		3,476,755	6,959,252
146738ZA0	Various	CA		11/09/2023	8.930		2,788,363	10,664,391
146738ZB8	Various	CA		11/29/2023	9.716		365,261	4,243,627
146738ZD4	Various	FL		12/07/2023	7.757		1,052,361	6,008,339
146738ZG7	Various	CA		12/21/2023	9.361		1,743,445	8,617,524
146738ZJ3	Various	CA		12/21/2023	8.869		1,117,894	6,141,788
146738ZJ1	Various	NC		01/11/2024	6.563		1,722,986	6,544,585
146738ZK8	Various	CA		01/11/2024	6.471		4,672,806	20,621,495
BC01488562	Various	MA		05/26/2023	7.346		1,004,475	10,245,127
BC01982689	Various	NY		07/25/2024	8.590	17,736,138		18,050,049
BC01982690	Various	CA		07/11/2024	7.720	10,086,462		10,265,833
BC02019580	Various	WA		08/22/2024	9.165	5,087,010		5,087,590
BC02056177	Various	CA		08/22/2024	8.316	51,828,958		52,803,226
BC02064845	Various	CA		09/26/2024	7.450	3,555,224		3,555,224
BC02068374	Various	CA		09/11/2024	8.405	57,753,331		58,526,118
BGS16AYD8	Various	GA		10/14/2021	6.700		1,557,365	25,396,672
BGS16B2R0	Various	AZ		03/30/2022	6.000		1,430,692	47,673,294
BGS16B3F5	Various	OH		01/18/2022	3.510		1,200,000	93,095,520
BGS21TW27	Various	CA		01/25/2024	7.287		755,832	5,562,586
BGS22X8H0	Various	FL		02/08/2024	8.955		344,764	399,509
BGS26ES03	Various	CA		01/25/2024	8.006		3,493,044	18,078,051
BGS26ES11	Various	MA		02/08/2024	7.972		15,181,520	11,964,411
BGS272DT1	Various	NJ		02/29/2024	8.136		262,177	7,647,163
BGS277MN3	Various	CA		02/22/2024	8.309		2,943,586	10,766,923
BGS277N02	Various	CA		03/07/2024	8.652		2,070,431	13,648,424
BGS277M25	Various	FL		03/21/2024	8.603		2,371,287	11,538,235
BGS29VH79	Various	CA		04/11/2024	8.644		1,465,998	13,946,819
BGS2AZPX2	Various	FL		04/25/2024	8.902		2,648,750	16,073,479
BGS2C6SN6	Various	NJ		05/09/2024	9.980		2,053,667	9,597,138
BGS2C6K27	Various	CA		05/09/2024	7.114	(4,291,918)		4,374,948
BGS2DSSB0	Various	FL		05/23/2024	8.790	(21,460,271)		9,801,089

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE B - PART 2

Showing All Mortgage Loans ACQUIRED AND ADDITIONS MADE During the Current Quarter

1 Loan Number	Location		4 Loan Type	5 Date Acquired	6 Rate of Interest	7 Actual Cost at Time of Acquisition	8 Additional Investment Made After Acquisition	9 Value of Land and Buildings
	2 City	3 State						
BGS2F5TD3	Various	FL .....	.....	06/26/2024	9.660 .....	.....	(8,522,629)	4,257,102
BGS2F5Z53	Various	CA .....	.....	06/21/2024	8.170 .....	.....	20,516,419	20,165,395
BGS2F5Z07	Various	FL .....	.....	06/13/2024	9.290 .....	.....	(15,565,774)	11,193,727
BGS2HJLR8	Various	CA .....	.....	07/03/2024	8.030	7,584,849	0	7,726,363
BGS2HJUX5	Various	CA .....	.....	07/25/2024	7.830	15,301,376	0	15,524,781
BGS2HJYJ2	Various	FL .....	.....	07/11/2024	9.710	2,005,898	0	1,862,863
BGS2HJZM4	Various	FL .....	.....	07/25/2024	9.290	5,351,778	0	5,338,472
BGS2HK072	Various	CA .....	.....	07/18/2024	7.790	11,736,795	0	11,924,406
BGS2HRE07	Various	OR .....	.....	07/25/2024	8.920	2,202,714	0	2,246,519
BGS2LDKU0	Various	NY .....	.....	08/15/2024	7.473	6,643,516	0	6,711,715
BGS2LDM04	Various	CA .....	.....	08/01/2024	7.909	5,410,706	0	5,495,631
BGS2LDM06	Various	CT .....	.....	08/27/2024	7.563	7,340,127	0	7,442,920
BGS2LDMH7	Various	CA .....	.....	08/08/2024	7.636	20,434,662	0	20,744,969
BGS2LDMN4	Various	CA .....	.....	08/22/2024	7.678	5,442,488	0	5,528,514
BGS2LDNK9	Various	TX .....	.....	08/15/2024	8.591	2,959,460	0	3,009,579
BGS2LE147	Various	CA .....	.....	08/06/2024	4.180	25,531,358	0	26,378,633
BGS2NV5I5	Various	CA .....	.....	09/05/2024	7.679	6,722,128	0	6,863,456
BGS2NVZN2	Various	CA .....	.....	09/12/2024	7.936	10,452,233	0	10,634,986
BGS2NZ031	Various	CA .....	.....	09/19/2024	7.520	5,781,933	0	5,857,422
BGS2NZ0N7	Various	CA .....	.....	09/19/2024	7.853	6,622,300	0	6,670,002
BGS2NZ3V6	Various	CA .....	.....	09/20/2024	8.040	61,862,301 .....	.....	61,862,301
0399999. Mortgages in good standing - Residential mortgages-all other						355,433,745	67,088,844	917,609,921
N216311	Salt Lake City	UT .....	.....	07/19/2022	12.800 .....	.....	10,419,049	87,743,502
N226021	Arlington	VA .....	.....	05/05/2022	4.490 .....	.....	3,271,856	108,131,878
N226161	Flower Mound	TX .....	.....	12/02/2022	10.610 .....	.....	851,190	14,320,432
N236011	Philadelphia	PA .....	.....	06/23/2023	10.200 .....	.....	1,298,487	13,632,247
N236071	The Woodlands	TX .....	.....	08/15/2023	7.390 .....	.....	1,292,773	2,197,213
N236081	Bedford	MA .....	.....	07/27/2023	10.450 .....	.....	1,245,083	85,131,049
N236101	Lancaster	TX .....	.....	09/20/2023	9.860 .....	.....	1,503,299	26,571,427
N236131	Beverly Hills	CA .....	.....	10/30/2023	10.610 .....	.....	529,632	34,951,375
N23A021	Willawong	AUS .....	.....	08/02/2023	9.860 .....	.....	129,430	7,185,403
N23A031	Te Kauwhata	NZL .....	.....	12/21/2023	9.610 .....	.....	310,655	10,028,378
N246021	Menifee	CA .....	.....	07/30/2024	10.200	3,013,060 .....	.....	3,500,000
N246081	Darien	CT .....	.....	06/25/2024	10.610 .....	.....	297,342	3,823,529
N246111	Lakeville	MN .....	.....	09/12/2024	9.360	1,814,475 .....	.....	18,181,820
N24A011	Melbourne	AUS .....	.....	09/04/2024	9.860	70,987 .....	.....	3,202,483
N24E021	Worksop	GBR .....	.....	08/16/2024	8.960	2,334,037 .....	.....	4,892,444
NAC0023	New York	NY .....	.....	07/07/2022	8.670 .....	.....	1,442,512	16,242,908
NAC0025	New York	NY .....	.....	07/07/2022	13.120 .....	.....	269,881	6,113,840
ND24603	Los Angeles	CA .....	.....	07/11/2024	11.950	1,886,025 .....	.....	6,875,110
0599999. Mortgages in good standing - Commercial mortgages-all other						9,118,584	22,861,189	452,725,038
N226091	Brooklyn	NY .....	.....	11/16/2022	14.360 .....	.....	5,763,014	293,999,510
0699999. Mortgages in good standing - Mezzanine Loans						0	5,763,014	293,999,510
0899999. Total Mortgages in good standing						364,552,329	95,715,545	1,665,102,747
1699999. Total - Restructured Mortgages						0	0	0
2499999. Total - Mortgages with overdue interest over 90 days						0	0	0
3299999. Total - Mortgages in the process of foreclosure						0	0	0
3399999 - Totals						364,552,329	95,715,545	1,665,102,747

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE B - PART 3

Showing All Mortgage Loans DISPOSED, Transferred or Repaid During the Current Quarter

1	Location		4	5	6	7	Change in Book Value/Recorded Investment						14	15	16	17	18
	2	3					8	9	10	11	12	13					
Loan Number	City	State	Loan Type	Date Acquired	Disposal Date	Book Value/Recorded Investment Excluding Accrued Interest Prior Year	Unrealized Valuation Increase/(Decrease)	Current Year's (Amortization)/Accretion	Current Year's Other-Than-Temporary Impairment Recognized	Capitalized Deferred Interest and Other	Total Change in Book Value (8+9-10+11)	Total Foreign Exchange Change in Book Value	Book Value/Recorded Investment Excluding Accrued Interest on Disposal	Consid-eration	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal
146738EF2	Various	PA .....	.....	.....01/26/2023	09/15/2024	6,023,159 .....	.....	.....	.....	.....	.....0 .....	.....	.....6,284,588	6,324,046 .....	.....	.....39,458	39,458
146738GH6	Various	FL .....	.....	.....02/24/2023	09/15/2024	6,627,102 .....	.....	.....	.....	.....	.....0 .....	.....	.....8,522,618	8,500,809 .....	.....	.....(21,809)	(21,809)
NAG0931	Colorado Springs	CO .....	.....	.....06/01/2021	09/27/2024	30,045,120 .....	.....	.....	.....	.....	.....0 .....	.....	.....30,045,120	30,045,120 .....	.....	.....	.....0
Foreign Exchange Coupon Adj ...	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....0 .....	.....	.....	.....71,556	71,556 .....	.....	.....71,556
0199999. Mortgages closed by repayment						42,695,381	0	0	0	0	0	0	44,852,326	44,941,531	71,556	17,649	89,205
Residential .....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....0 .....	.....	.....241,385,085	241,352,424 .....	.....	.....(32,661)	(32,661)
Commercial .....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....	.....0 .....	.....	.....11,061,896	11,061,896 .....	.....	.....	.....0
0299999. Mortgages with partial repayments						0	0	0	0	0	0	0	252,446,981	252,414,320	0	(32,661)	(32,661)
.....																	
.....																	
.....																	
.....																	
.....																	
.....																	
0599999 - Totals						42,695,381	0	0	0	0	0	0	297,299,307	297,355,851	71,556	(15,012)	56,544

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE BA - PART 2

Showing Other Long-Term Invested Assets ACQUIRED AND ADDITIONS MADE During the Current Quarter

1	2	Location		5	6	7	8	9	10	11	12	13	
		3	4		NAIC Designation, NAIC Designation Modifier and SVO Administrative Symbol								
CUSIP Identification	Name or Description	City	State	Name of Vendor or General Partner		Date Originally Acquired	Type and Strategy	Actual Cost at Time of Acquisition	Additional Investment Made After Acquisition	Amount of Encumbrances	Commitment for Additional Investment	Percentage of Ownership	
000000-00-0	2725 Sprott Private Resource Lending Fund III LP	Toronto	CA.....	Sprott Resource Lending Corp		11/29/2022	3.....	0	479,731	0	3,163,538	0.863	
000000-00-0	2848 CB UNI Consumer JV LLC	New York	NY.....	Centerbridge Partners LP		06/30/2024	3.....	0	9,125,334	0	0	40.013	
1399999. Non-Registered Private Funds - Other Fixed Income Instruments - Unaffiliated									0	9,605,065	0	3,163,538	XXX
000000-00-0	2781 FIRST EAGLE DCF A FUNDING LLC	Boston	MA.....	First Eagle DCF Manager LLC		07/06/2023	1.....	0	444,812	0	1,555,188	1.330	
000000-00-0	6124 Yukon Capital Partners III LP	Minneapolis	MN.....	Yukon Partners III LLC		07/18/2017	2.....	0	15,255	0	826,025	4.432	
000000-00-0	6126 Gryphon Mezzanine Partners LP	San Francisco	CA.....	Gryphon Mezzanine Partners GP LP		11/30/2017	2.....	0	52,879	0	403,265	6.340	
1799999. Joint Venture Interests - Fixed Income - NAIC Designation Not Assigned by the SVO - Unaffiliated									0	512,947	0	2,784,478	XXX
000000-00-0	2622 OceanSound Partners Fund LP	New York	NY.....	OceanSound Partners		12/27/2021	3.....	0	433,418	0	390,197	0.641	
000000-00-0	2644 SDC Digital Infrastructure Opportunity Fund III LP	New York	NY.....	SDC DIOF III GP LP		04/25/2022	1.....	0	161,529	0	1,693,172	0.328	
000000-00-0	2656 Trident IX LP	Greenwich	CT.....	Trident Capital IX LP		06/24/2022	1.....	0	389,261	0	1,738,092	0	
000000-00-0	2672 River Cities Capital Fund VII LP	Cincinnati	OH.....	River Cities Management VI LLC		07/15/2022	3.....	0	850,000	0	2,650,000	0	
000000-00-0	2686 SER Capital Partners I LP	Houston	TX.....	Apollo Global Management		07/31/2021	3.....	0	424,910	0	739,758	1.951	
000000-00-0	2693 Sunstone Partners III Main LP	San Mateo	CA.....	Sunstone Partners		04/12/2023	3.....	0	239,311	0	3,016,118	0.595	
000000-00-0	2710 Asper DHUK LP	London SE1 9SG .....	.....	Asper Investment Management		10/21/2022	3.....	0	37,267	0	6,342,465	1.216	
000000-00-0	2748 INDUSTRY VENTURES SECONDARY X LP	San Francisco	CA.....	INDUSTRY VENTURES MANAGEMENT X LLC		01/02/2024	3.....	0	200,231	0	1,499,769	0.200	
000000-00-0	2756 IPCC Fund LP	Wilmington	DE.....	IPCC GP LLC		05/25/2023	1.....	0	113,646	0	1,434,377	0.400	
000000-00-0	2771 LS Power Fund V Feeder 1 LP	New Castle County	DE.....	LS Power Fund V GP LLC		12/04/2023	3.....	0	497,060	0	4,365,343	0.170	
000000-00-0	2774 Terramont SC Co-Invest LP	New York	NY.....	Terramont Infrastructure Partners		08/01/2023	3.....	0	4,344	0	2,042,553	12.760	
000000-00-0	2776 JFL Equity Investors VI LP	New York	NY.....	JFL GP Investors IV LLC		09/05/2023	3.....	0	134,584	0	3,137,608	0.206	
000000-00-0	2780 Amulet Capital Fund III LP	Greenwich	CT.....	Amulet Capital Fund II GP LP		08/01/2023	3.....	0	29,584	0	3,006,271	0.360	
000000-00-0	2800 Blue Ocean Income Fund III LP	New York	NY.....	Blue Ocean GP LLC		11/07/2023	3.....	0	157,186	0	745,603	4.396	
000000-00-0	2802 Ara USDCF US Co Invest LP	Houston	TX.....	Ara Infrastructure		02/16/2024	3.....	0	75,833	0	3,449,657	3.333	
000000-00-0	2804 EIV Capital Fund V LP	Houston	TX.....	EIV Fund Advisors IV LLC		06/03/2024	3.....	0	165,999	0	3,964,983	0.500	
000000-00-0	2834 Apollo Asset-Backed Finance Lending Company, L.P.	Wilmington	DE.....	Apollo ABF Advisors GP LLC		06/28/2024	3.....	0	1,000,000	0	2,000,000	0.500	
000000-00-0	2859 CB Laker Buyer LP	New York	NY.....	Centerbridge Partners LP		07/01/2024	2.....	9,741,025	0	0	0	50.000	
000000-00-0	2861 Kudu Investment Management LLC	New York	NY.....	Centerbridge Partners LP		07/01/2024	1.....	9,417,457	0	0	0	50.000	
000000-00-0	6002 A&M Capital Partners III LP	Greenwich	CT.....	A&M Capital-GP II LP		05/25/2018	3.....	0	966,462	0	0	0.882	
000000-00-0	6013 NB Secondary Opportunities Fund IV LP	New York	NY.....	NB Secondary Opportunities Assoc IV LP		04/19/2017	3.....	0	250,000	0	2,132,731	0.421	
000000-00-0	6031 Snow Phipps III LP	New York	NY.....	Snow Phipps GP III LLC		06/08/2016	3.....	0	46,368	0	1,133,582	1.074	
000000-00-0	6047 Gryphon Partners IV LP	San Francisco	CA.....	Gryphon GenPar IV LP		12/06/2016	3.....	0	57,392	0	0	0.460	
000000-00-0	6050 ManchesterStory Venture Fund LP	West Des Moines	IA.....	ManchesterStory GP1 LLC		03/23/2017	3.....	0	33,160	0	771,792	2.526	
000000-00-0	6058 Cintrifuse Syndicate Fund II, LLC	Cincinnati	OH.....	Cintrifuse Fund Management II LLC		09/18/2017	1.....	0	64,960	0	120,562	4.477	
000000-00-0	6066 Corsair V Financial Services Capital Partners LP	New York	NY.....	Rivercrest Capital GP LLC		06/25/2018	3.....	0	196,067	0	2,699,709	1.407	
000000-00-0	6068 Trilantic Capital Partners VI LP	New York	NY.....	Trilantic Capital Partners Assoc VI LP		07/25/2018	3.....	0	131,183	0	1,138,470	0.493	
000000-00-0	6073 Roark Capital Partners Fund V LP	Atlanta	GA.....	Roark Capital GenPar V LP		11/01/2018	3.....	0	12,392	0	527,119	0.144	
000000-00-0	6076 Blackstone Tactical Opportunities Fund III LP	New York	NY.....	Blackstone Tac Opportunities Assoc 3 LLC		02/08/2019	3.....	0	28,625	0	0	0.243	
000000-00-0	6081 OBIP LP	Cincinnati	OH.....	Orchard Investment Management III LLC		06/27/2019	3.....	0	17,489	0	0	49.968	
000000-00-0	6083 Tritium Partners II LLC	Austin	TX.....	Tritium II GP LLC		11/13/2019	3.....	0	134,633	0	469,237	2.050	
000000-00-0	6086 Gallant Capital Partners I LP	Los Angeles	CA.....	CincyTech LLC		05/29/2020	3.....	0	276,261	0	582,851	3.149	
000000-00-0	6101 Revelstoke EPIC Fund I LP	Denver	CA.....	RCP Single Asset Fund I GP LLC		10/01/2021	3.....	0	4,625	0	146,211	0.378	
000000-00-0	6049 A&M Capital Opportunities Fund LP	Greenwich	CT.....	A&M Capital Opportunities-GP LP		10/01/2021	3.....	0	2,118,062	0	0	0	
000000-00-0	2192 A&M Capital Opportunities Fund LP	Greenwich	CT.....	A&M Capital Opportunities-GP LP		09/08/2017	3.....	0	6,494,845	0	0	0	
1999999. Joint Venture Interests - Common Stock - Unaffiliated									19,158,482	15,746,688	0	51,938,230	XXX
000000-00-0	2757 MassMutual Ventures US IV GP	Springfield	MA.....	Massachusetts Mutual Life Ins Co		05/11/2023	3.....	0	(16)	0	0	1.000	
000000-00-0	2759 MMV Climate Technology Fund GP	Springfield	MA.....	Massachusetts Mutual Life Ins Co		05/15/2023	3.....	0	19,800	0	0	1.000	
2099999. Joint Venture Interests - Common Stock - Affiliated									0	19,784	0	0	XXX
000000-00-0	2458 Barings Innovations & Growth Real Estate Fund	Springfield	MA.....	Massachusetts Mutual Life Ins Co		10/06/2021	3.....	0	0	15,965,695	0	0	0
000000-00-0	2525 MM BIG Peninsula Co-Invest Member LLC	Hartford	CT.....	Massachusetts Mutual Life Ins Co		06/30/2021	3.....	0	0	2,683,840	25,195,747	0	0
000000-00-0	2676 Trailside MM Member II LLC	Hartford	CT.....	Massachusetts Mutual Life Ins Co		07/26/2022	3.....	0	0	3,405,690	2,200,808	0	0
000000-00-0	2833 Barings Miller Investment Trust	Sydney		Barings Australia Asset Management Pty		06/28/2024	3.....	0	0	4,549,078	0	0	0
000000-00-0	2860 CP Fresh Recreational Holdings LP	New York	NY.....	Centerbridge Partners LP		07/01/2024	3.....	13,480,195	0	0	0	50.000	0
2199999. Joint Venture Interests - Real Estate - Unaffiliated									13,480,195	0	26,604,303	27,396,554	XXX
000000-00-0	2530 MM Horizon Savannah Member II LLC	Springfield	MA.....	Massachusetts Mutual Life Ins Co		10/25/2021	3.....	0	.7	0	3,641,488	0	0.380
000000-00-0	2866 MM Ironhead Commerce Center	Springfield	MA.....	MassMutual		09/26/2024	3.....	4,204,395	0	0	0	19.800	0

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE BA - PART 2

Showing Other Long-Term Invested Assets ACQUIRED AND ADDITIONS MADE During the Current Quarter

1	2	Location		5	6	7	8	9	10	11	12	13
		3	4									
CUSIP Identification	Name or Description	City	State	Name of Vendor or General Partner	NAIC Designation, NAIC Designation Modifier and SVO Administrative Symbol	Date Originally Acquired	Type and Strategy	Actual Cost at Time of Acquisition	Additional Investment Made After Acquisition	Amount of Encumbrances	Commitment for Additional Investment	Percentage of Ownership
000000-00-0	2731 MM Kannapolis Industrial Member LLC	Boston	MA.....	Massachusetts Mutual Life Ins Co .....	.....	02/08/2023 ...	3.....	0	49,879	1,234,324	2,227,420	12.280
2299999. Joint Venture Interests - Real Estate - Affiliated								4,204,395	49,886	4,875,811	2,227,420	XXX
000000-00-0	2735 MALIC Debt Participations LLC	Charlotte	NC.....	MassMutual Ascend Life Insurance Company .....	.....	02/06/2023 ...	3.....	0	2,000	0	0	100.000
2499999. Joint Venture Interests - Mortgage Loans - Affiliated								0	2,000	0	0	XXX
000000-00-0	2601 BSP TS Co-Invest I LLC	New York	NY.....	Broad Sky Partners LLC .....	.....	12/10/2021 ...	3.....	0	19,884	0	895,094	38.330
000000-00-0	2616 Stork SPV LP	Greenwich	CT.....	Amulet Capital Fund II GP LP .....	.....	12/20/2021 ...	3.....	0	33,081	0	3,020,125	0.845
000000-00-0	2742 OceanSound Partners Co-Invest II LP Series F	New York	NY.....	OceanSound Partners .....	.....	03/01/2023 ...	3.....	0	1,272,995	0	0	2.620
000000-00-0	2744 OEP VIII Project Laser Co-Investment Partners LP	New York	NY.....	One Equity Partners .....	.....	03/17/2023 ...	3.....	0	937	0	0	1.110
000000-00-0	2782 Q-Energy V FCR	Madrid	NC.....	Amulet Capital Fund II GP LP .....	.....	08/18/2023 ...	3.....	0	444,149	0	3,297,578	0.150
000000-00-0	2793 Preservation Capital Partners Strategic Opportunities I LP	London .....	.....	Preservation Capital Partners .....	.....	11/06/2023 ...	3.....	0	21,589	0	1,145,726	1.348
000000-00-0	2862 CB Catalyst Co-Invest LP	New York	NY.....	Centerbridge Partners LP .....	.....	07/01/2024 ...	3.....	8,841,460	0	0	0	50.000
000000-00-0	2874 CB Atlantic II CO-Invest,L.P.	New York	NY.....	Centerbridge Partners LP .....	.....	09/24/2024 ...	3.....	8,051,142	0	0	0	38.095
2599999. Joint Venture Interests - Other - Unaffiliated								16,892,602	1,792,635	0	8,358,524	XXX
00834H-10-4	7171 Affirm Asset Securitizat-2022-X1 CERT	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	03/31/2023 ...	3.....	0	(974,074)	0	0	.....
US4493-1B-A	7182 ICG 2015-1A SUB VARIABLE COUPON 0.000000 MATURITY 20281019 ..	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	03/31/2023 ...	3.....	0	14,917	0	0	.....
92259U-AG-3	7206 Velocity Commercial Capi-VCC 2022-2 M6	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	02/28/2024 ...	3.....	0	4,479,712	0	0	.....
US8860-7B-A	7208 Thunderbolt III Aircraft-TBOLT 2019-1 E	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	02/28/2024 ...	3.....	0	800,186	0	0	.....
000000-00-0	7170 RT balancing	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	01/01/2023 ...	3.....	0	32,095,016	0	0	.....
000000-00-0	7111 BABSON CLO LTD 2015-II SUB NT	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	05/09/2014 ...	3.....	0	369,928	0	0	.....
000000-00-0	7161 Galaxy XXIII CLO Ltd-GALXY 2017-23A SUBA	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	05/09/2014 ...	3.....	0	(243,770)	0	0	.....
000000-00-0	7166 Loan Asset Issuer LLC Series 2022 NG-1	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	03/13/2014 ...	3.....	0	1,421,721	0	0	.....
000000-00-0	7167 AMMC CLO 16 Ltd	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	03/13/2014 ...	3.....	0	(481,843)	0	0	.....
000000-00-0	7174 Loan Asset Issuer LLC - Series 2021 NG-1 Class A Asset Backe	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	03/31/2023 ...	3.....	0	932,422	0	0	.....
000000-00-0	7177 Voya CLO 2018-2 Ltd-VOYA 2018-2A SUB	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	03/31/2023 ...	3.....	0	(2,551,074)	0	0	.....
000000-00-0	7183 LCM 19A INC VARIABLE COUPON 0.000000 MATURITY 20270715 ..	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	03/31/2023 ...	3.....	0	(91,572)	0	0	.....
000000-00-0	7207 Thunderbolt II Aircraft-TBOLT 2018-A G	Springfield	MA.....	Massachusetts Mutual Life Ins Co .....	.....	02/28/2024 ...	3.....	0	334,096	0	0	.....
4699999. Residual Tranches or Interests with Underlying Assets Having Characteristics of Fixed Income Instruments - Unaffiliated								0	36,105,664	0	0	XXX
6099999. Total - Unaffiliated								49,531,279	63,762,999	26,604,303	93,641,325	XXX
6199999. Total - Affiliated								4,204,395	71,670	4,875,811	2,227,420	XXX
6299999 - Totals								53,735,674	63,834,669	31,480,115	95,868,745	XXX

SCHEDULE BA - PART 3

Showing Other Long-Term Invested Assets DISPOSED, Transferred or Repaid During the Current Quarter

1	2	Location		5	6	7	8	Change in Book/Adjusted Carrying Value						15	16	17	18	19	20
		3	4					9	10	11	12	13	14						
CUSIP Identification	Name or Description	City	State	Name of Purchaser or Nature of Disposal	Date Originally Acquired	Disposal Date	Book/ Adjusted Carrying Value Less Encumbrances, Prior Year	Unrealized Valuation Increase/ (De-crease)	Current Year's (Depre-ciation) or (Amorti-zation)/ Accretion	Current Year's Other Than Temporary	Capital-ized Deferred Interest and Other	Total Change in Book/ Adjusted Carrying Value (9+10-11+12)	Total Foreign Exchange Change in Book/ Adjusted Carrying Value	Book/ Adjusted Carrying Value Less Encumbrances on Disposal	Consid-eration	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Invest-ment Income
000000-00-0	2725 Sprott Private Resource Lending Fund III LP	Toronto	CA.....	Distribution	11/29/2022 ...	09/26/2024 ...	0	0	0	0	0	0	0	0	10,335	0	0	0	0

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE BA - PART 3

Showing Other Long-Term Invested Assets DISPOSED, Transferred or Repaid During the Current Quarter

1	2	Location		5	6	7	8	Change in Book/Adjusted Carrying Value						15	16	17	18	19	20
		3	4					9	10	11	12	13	14						
CUSIP Identification	Name or Description	City	State	Name of Purchaser or Nature of Disposal	Date Originally Acquired	Disposal Date	Book/ Adjusted Carrying Value Less Encum- brances, Prior Year	Unrealized Valuation Increase/ (De- crease)	Current Year's (Depre- ciation) or (Amorti- zation)/ Accretion	Current Year's Other Than Temporary Impair- ment Recog- nized	Capital- ized Deferred Interest and Other	Total Change in Book/ Adjusted Carrying Value (9+10- 11+12)	Total Foreign Exchange Change in Book/ Adjusted Carrying Value	Book/ Adjusted Carrying Value Less Encum- brances on Disposal	Consid- eration	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Invest- ment Income
1399999. Non-Registered Private Funds - Other Fixed Income Instruments - Unaffiliated																			
000000-00-0	6116 Sierra Senior Loan Strategy JV I LLC	New York	NY	Distribution	07/16/2015	07/31/2024	0	0	0	0	0	0	0	0	10,335	0	0	0	0
000000-00-0	6117 Monarch Capital Partners III LP	New York	NY	Distribution	01/12/2015	08/23/2024	0	0	0	0	0	0	0	0	54,950	0	0	0	0
000000-00-0	6123 NB Private Equity Credit Opportunities Fund LP	New York	NY	Distribution	06/07/2017	08/16/2024	0	0	0	0	0	0	0	0	259,667	0	0	0	0
000000-00-0	6125 Monarch Capital Partners IV LP	New York	NY	Distribution	10/30/2017	09/05/2024	0	0	0	0	0	0	0	0	404,946	0	0	0	0
000000-00-0	6126 Gryphon Mezzanine Partners LP	San Francisco	CA	Distribution	11/30/2017	09/06/2024	0	0	0	0	0	0	0	0	1,322,242	0	0	0	0
000000-00-0	6133 PineBridge Private Credit Feeder LP	WESTPORT	CT	Distribution	11/28/2018	07/31/2024	0	0	0	0	0	0	0	0	1,305,587	0	0	0	0
1799999. Joint Venture Interests - Fixed Income - NAIC Designation Not Assigned by the SVO - Unaffiliated																			
000000-00-0	2060 Gryphon Partners IV LP	San Francisco	CA	Distribution	11/25/2015	08/31/2024	0	0	0	0	0	0	0	0	2,622,747	0	0	0	0
000000-00-0	2192 A&M Capital Opportunities Fund LP	Greenwich	CT	Distribution	09/08/2017	08/26/2024	0	0	0	0	0	0	0	0	(416,122)	0	0	0	0
000000-00-0	2619 OSP Hamilton Equity Aggregator LP	Wilmington	DE	Distribution	07/22/2022	07/31/2024	0	0	0	0	0	0	0	0	2,118,062	0	0	0	0
000000-00-0	2622 OceanSound Partners Fund LP	New York	NY	Distribution	12/27/2021	08/31/2024	0	0	0	0	0	0	0	0	21,205	0	0	0	0
000000-00-0	2662 Gallant Capital Partners II LP	Los Angeles	CA	Distribution	11/02/2022	09/30/2024	0	0	0	0	0	0	0	0	100,073	0	0	0	0
000000-00-0	2705 Energy Acquisition Vehicle LP	New York	NY	Distribution	09/22/2022	09/03/2024	0	0	0	0	0	0	0	0	30,626	0	0	0	0
000000-00-0	2756 IPCO Fund LP	Wilmington	DE	Distribution	05/25/2023	09/30/2024	0	0	0	0	0	0	0	0	218,304	0	0	0	0
000000-00-0	2776 JFL Equity Investors VI LP	New York	NY	Distribution	09/05/2023	08/31/2024	0	0	0	0	0	0	0	0	149,653	0	0	0	0
000000-00-0	2780 Amulet Capital Fund III LP	Greenwich	CT	Distribution	08/01/2023	08/23/2024	0	0	0	0	0	0	0	0	273,061	0	0	0	0
000000-00-0	2802 Ara USOCF US Co Invest LP	Houston	TX	Distribution	02/16/2024	09/03/2024	0	0	0	0	0	0	0	0	415,843	0	0	0	0
000000-00-0	6002 A&M Capital Partners II LP	Greenwich	CT	Distribution	05/25/2018	07/03/2024	0	0	0	0	0	0	0	0	559,096	0	0	0	0
000000-00-0	6009 LLR Equity Partners IV LP	Philadelphia	PA	Distribution	03/14/2014	09/19/2024	0	0	0	0	0	0	0	0	233,476	0	0	0	0
000000-00-0	6013 NB Secondary Opportunities Fund IV LP	New York	NY	Distribution	04/19/2017	09/30/2024	0	0	0	0	0	0	0	0	1,273,554	0	0	0	0
000000-00-0	6016 Channel 51 LLC	Miami	FL	Distribution	04/29/2016	08/31/2024	0	0	0	0	0	0	0	0	515,794	0	0	0	0
000000-00-0	6018 StepStone VC Opportunities IV, L.P	Owing Mills	MD	Distribution	04/25/2016	08/30/2024	0	0	0	0	0	0	0	0	4,661,508	0	0	0	0
000000-00-0	6023 Patriot Financial Partners III, L.P.	Radnor	PA	Distribution	07/21/2017	07/11/2024	0	0	0	0	0	0	0	0	1,023,750	0	0	0	0
000000-00-0	6026 River Cities Capital Fund IV LP	Davenport	IA	Distribution	09/30/2012	09/30/2024	0	0	0	0	0	0	0	0	500,000	0	0	0	0
000000-00-0	6027 River Cities Capital Fund V LP	Davenport	IA	Distribution	12/31/2012	08/31/2024	0	0	0	0	0	0	0	0	349,259	0	0	0	0
000000-00-0	6033 Solamere Capital Fund II LP	Boston	MA	Distribution	08/19/2013	08/31/2024	0	0	0	0	0	0	0	0	691,436	0	0	0	0
000000-00-0	6034 Solamere Capital Fund II-A LP	Cincinnati	OH	Distribution	08/19/2013	07/12/2024	0	0	0	0	0	0	0	0	257,356	0	0	0	0
000000-00-0	6047 Gryphon Partners IV LP	San Francisco	CA	Distribution	12/06/2016	08/31/2024	0	0	0	0	0	0	0	0	225,589	0	0	0	0
000000-00-0	6048 Gryphon Partners V LP	San Francisco	CA	Distribution	08/29/2018	09/11/2024	0	0	0	0	0	0	0	0	416,122	0	0	0	0
000000-00-0	6049 A&M Capital Opportunities Fund LP	Greenwich	CT	Liquidation of Investment	10/01/2021	08/26/2024	(2,213,194)	2,118,062	0	(2,118,062)	0	4,236,125	0	0	941,560	0	0	0	0
000000-00-0	6050 ManchesterStory Venture Fund LP	West Des Moines	IA	Distribution	03/23/2017	07/24/2024	0	0	0	0	0	0	0	0	6,494,845	0	0	0	0
000000-00-0	6054 Greenspring Global Partners VIII LP	Owing Mills	MD	Distribution	07/14/2017	09/09/2024	0	0	0	0	0	0	0	0	11,133	0	0	0	0
000000-00-0	6063 Rivercrest Capital Partners LP	Fort Worth	TX	Distribution	04/02/2018	09/30/2024	0	0	0	0	0	0	0	0	252,323	0	0	0	0
000000-00-0	6067 NB Dyal IV US Investors LP	New York	NY	Distribution	06/11/2018	09/19/2024	0	0	0	0	0	0	0	0	226,797	0	0	0	0
000000-00-0	6073 Roark Capital Partners Fund V LP	Atlanta	GA	Distribution	11/01/2018	09/17/2024	0	0	0	0	0	0	0	0	104,365	0	0	0	0
000000-00-0	6076 Blackstone Tactical Opportunities Fund III LP	New York	NY	Distribution	02/08/2019	08/06/2024	0	0	0	0	0	0	0	0	3,009	0	0	0	0
000000-00-0	6079 Goldner Hawn Fund VII LP	Minneapolis	MN	Distribution	04/29/2019	09/30/2024	0	0	0	0	0	0	0	0	18,669	0	0	0	0
000000-00-0	6086 Gallant Capital Partners I LP	Los Angeles	CA	Distribution	05/29/2020	08/31/2024	0	0	0	0	0	0	0	0	2,510,599	0	0	0	0
000000-00-0	6091 CCA Life Settlements Fund II LP	Dublin	PA	Distribution	12/16/2019	07/24/2024	0	0	0	0	0	0	0	0	542,417	0	0	0	0
000000-00-0	6096 LLR Equity Partners VI LP	Philadelphia	PA	Distribution	05/13/2021	09/25/2024	0	0	0	0	0	0	0	0	99,340	0	0	0	0
000000-00-0	6098 Dyal V US Investors LP	New York	NY	Distribution	10/01/2021	08/02/2024	0	0	0	0	0	0	0	0	95,574	0	0	0	0
000000-00-0	6099 NB Strategic Capital LP	New York	NY	Distribution	03/05/2020	07/30/2024	0	0	0	0	0	0	0	0	99,034	0	0	0	0
000000-00-0	6100 NB Strategic Co-Investment Partners IV LP	New York	NY	Distribution	01/29/2020	09/26/2024	0	0	0	0	0	0	0	0	71,354	0	0	0	0
000000-00-0	6104 Vivo Capital Fund IX LP	Palo Alto	CA	Distribution	09/09/2019	09/06/2024	0	0	0	0	0	0	0	0	65,833	0	0	0	0
1999999. Joint Venture Interests - Common Stock - Unaffiliated																			
000000-00-0	2792 Hayfin Maritime Yield Fund LP	George Town		Distribution	10/25/2023	09/30/2024	0	0	0	0	0	0	0	0	25,678,959	0	0	0	0
000000-00-0	6111 Hillpointe Workforce Housing Partnership I LP	Winter Park	FL	Distribution	03/17/2020	09/25/2024	0	0	0	0	0	0	0	0	553,700	0	0	0	0
000000-00-0	6112 Hillpointe Workforce Housing Partnership II LP	WINTER PARK	FL	Distribution	11/03/2020	09/16/2024	0	0	0	0	0	0	0	0	225,093	0	0	0	0
2199999. Joint Venture Interests - Real Estate - Unaffiliated																			
								0	0	0	0	0	0	0	1,113,522	0	0	0	0
								0	0	0	0	0	0	0	1,892,315	0	0	0	0

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE BA - PART 3

Showing Other Long-Term Invested Assets DISPOSED, Transferred or Repaid During the Current Quarter

1	2	Location		5	6	7	8	Change in Book/Adjusted Carrying Value						15	16	17	18	19	20
		3	4					9	10	11	12	13	14						
CUSIP Identification	Name or Description	City	State	Name of Purchaser or Nature of Disposal	Date Originally Acquired	Disposal Date	Book/ Adjusted Carrying Value Less Encumbrances, Prior Year	Unrealized Valuation Increase/ (Decrease)	Current Year's (Depreciation) or (Amortization)/ Accretion	Current Year's Other Than Temporary Impairment Recognized	Capitalized Deferred Interest and Other	Total Change in Book/ Adjusted Carrying Value (9+10-11+12)	Total Foreign Exchange Change in Book/ Adjusted Carrying Value	Book/ Adjusted Carrying Value Less Encumbrances on Disposal	Consideration	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Investment Income
000000-00-0	2530 MM Horizon Savannah Member LLC	Springfield	MA	Distribution	10/25/2021	09/01/2024	0	0	0	0	0	0	0	0	40,999	0	0	0	0
2299999. Joint Venture Interests - Real Estate - Affiliated								0	0	0	0	0	0	0	40,999	0	0	0	0
000000-00-0	2461 Barings Real Estate Debt Income Fund LP	Hartford	CT	Distribution	03/24/2021	09/30/2024	0	0	0	0	0	0	0	0	5,891,477	0	0	0	0
2499999. Joint Venture Interests - Mortgage Loans - Affiliated								0	0	0	0	0	0	0	5,891,477	0	0	0	0
000000-00-0	2707 TSS Co-Invest Holdings LP	Beverly Hills	CA	Distribution	09/09/2022	09/30/2024	0	0	0	0	0	0	0	0	7,938	0	0	0	0
000000-00-0	2765 Energy Acquisition Vehicle II LP	Wilmington	DE	Distribution	06/01/2023	09/30/2024	0	0	0	0	0	0	0	0	1,601,318	0	0	0	0
000000-00-0	2787 NAW HOLDINGS LLC	Radnor	PA	Distribution	09/13/2023	08/01/2024	0	0	0	0	0	0	0	0	169	0	0	0	0
000000-00-0	2824 FOREST ULTIMATE HOLDINGS LLC	Chicago	IL	Distribution	04/30/2024	09/06/2024	0	0	0	0	0	0	0	0	15,499	0	0	0	0
2599999. Joint Venture Interests - Other - Unaffiliated								0	0	0	0	0	0	0	1,624,923	0	0	0	0
US5595-3P-A	7147 Magnetite XVI Ltd-MAGNE 2015-16A SUB	Springfield	MA	Distribution	05/09/2014	07/31/2024	0	0	0	0	0	0	0	0	2,531	0	0	0	0
US3631-9W-A	7161 Galaxy XXI CLO Ltd-GALXY 2017-23A SUBA	Springfield	MA	Distribution	05/09/2014	03/31/2024	0	0	0	0	0	0	0	0	(184,604)	0	0	0	0
46655H-AK-9	7164 JCP Direct Lending CLO 2022 LLC	Springfield	MA	Distribution	03/13/2014	08/31/2024	0	0	0	0	0	0	0	0	737,552	0	0	0	0
53950T-10-5	7165 Loan Asset Issuer LLC SER 2021 M-2	Springfield	MA	Distribution	03/13/2014	07/31/2024	0	0	0	0	0	0	0	0	13,642	3,952	0	3,952	0
00834H-10-4	7171 Affirm Asset Securitized-2022-X1 CERT	Springfield	MA	Distribution	03/31/2023	08/31/2024	0	0	0	0	0	0	0	0	(2,908,864)	(974,074)	0	(974,074)	0
US4493-1B-A	0.000000 MATURITY 20281019	Springfield	MA	Distribution	03/31/2023	08/31/2024	0	0	0	0	0	0	0	0	423,420	(6,757)	0	(6,757)	0
US5018-BR-A	7183 LCM 19A INC VARIABLE COUPON 0.000000	Springfield	MA	Distribution	03/31/2023	07/31/2024	0	0	0	0	0	0	0	0	(44,694)	(91,572)	0	(91,572)	0
US6759-23-A	7184 OCT34 2017-1A SUB1 VARIABLE COUPON	Springfield	MA	Distribution	03/31/2023	07/31/2024	0	0	0	0	0	0	0	0	241,017	0	0	0	0
92259U-AG-3	7206 Velocity Commercial Capi-VCC 2022-2 M6 SUB	Springfield	MA	Distribution	02/28/2024	08/31/2024	0	0	0	0	0	0	0	0	5,091,422	0	0	0	0
US8860-7B-A	7208 Thunderbolt III Aircraft-TBOLT 2019-1 E	Springfield	MA	Distribution	02/28/2024	08/31/2024	0	0	0	0	0	0	0	0	12,177,515	0	1,068,451	1,068,451	0
000000-00-0	7111 BABSON CLO LTD 2015-II SUB NT	Springfield	MA	Distribution	05/09/2014	09/30/2024	0	0	0	0	0	0	0	0	864,997	0	0	0	0
000000-00-0	7136 Ammc Clo 20 Ltd-AMMC 2017-20A	Springfield	MA	Distribution	05/09/2014	09/30/2024	0	0	0	0	0	0	0	0	330,363	0	0	0	0
000000-00-0	7140 AMMC CLO 22 Ltd-AMMC 2018-22A SUB	Springfield	MA	Distribution	05/09/2014	09/30/2024	0	0	0	0	0	0	0	0	2,179,620	0	0	0	0
000000-00-0	7146 Man GLG US CLO-GLGU 2018-1A SUB	Springfield	MA	Distribution	05/09/2014	09/30/2024	0	0	0	0	0	0	0	0	312,254	0	0	0	0
000000-00-0	7155 Babson CLO Ltd/Cayman Is-BABSN LP-2A SUB	Springfield	MA	Distribution	05/09/2014	09/30/2024	0	0	0	0	0	0	0	0	(796,740)	0	0	0	0
000000-00-0	7166 Loan Asset Issuer LLC Series 2022 NG-1	Springfield	MA	Distribution	03/13/2014	09/30/2024	0	0	0	0	0	0	0	0	1,421,721	0	0	0	0
000000-00-0	7167 AMMC CLO 16 Ltd	Springfield	MA	Distribution	03/13/2014	09/30/2024	0	0	0	0	0	0	0	0	2,217,025	0	0	0	0
000000-00-0	7170 RT balancing	Springfield	MA	Distribution	01/01/2023	09/30/2024	0	0	0	0	0	0	0	0	22,159,237	0	0	0	0
000000-00-0	7174 Loan Asset Issuer LLC - Series 2021 NG-1	Springfield	MA	Distribution	03/31/2023	09/30/2024	0	0	0	0	0	0	0	0	932,422	0	0	0	0
000000-00-0	7177 Voya CLO 2018-2 Ltd-VOYA 2018-2A SUB	Springfield	MA	Distribution	03/31/2023	09/30/2024	0	0	0	0	0	0	0	0	(2,551,074)	0	0	0	0
000000-00-0	7207 Thunderbolt II Aircraft -TBOLT 2018-A G	Springfield	MA	Distribution	02/28/2024	09/30/2024	0	0	0	0	0	0	0	0	334,096	0	0	0	0
4699999. Residual Tranches or Interests with Underlying Assets Having Characteristics of Fixed Income Instruments - Unaffiliated								0	0	0	0	0	0	0	42,952,855	(1,068,451)	1,068,451	0	0
6099999. Total - Unaffiliated								(2,213,194)	2,118,062	0	(2,118,062)	0	4,236,125	0	74,782,133	(1,068,451)	1,068,451	0	0
6199999. Total - Affiliated								0	0	0	0	0	0	0	5,932,475	0	0	0	0
6299999 - Totals								(2,213,194)	2,118,062	0	(2,118,062)	0	4,236,125	0	80,714,609	(1,068,451)	1,068,451	0	0

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 3

Show All Long-Term Bonds and Stock Acquired During the Current Quarter

1	2	3	4	5	6	7	8	9	10
CUSIP Identification	Description	Foreign	Date Acquired	Name of Vendor	Number of Shares of Stock	Actual Cost	Par Value	Paid for Accrued Interest and Dividends	NAIC Designation, NAIC Designation Modifier and SVO Administrative Symbol
04317N-AF-6	ARUBA GOVERNMENT Senior Unsecured Notes	D	08/15/2024	DIRECT		4,643,000	4,643,000	0	2.B FE
0309999999. Subtotal - Bonds - All Other Governments						4,643,000	4,643,000	0	XXX
30767E-AE-9	Farm Credit Bank of Texa-FARMCB 7 3/4 PE		09/06/2024	BARCLAYS CAPITAL INC		8,559,730	8,372,000	161,982	2.B FE
835574-CB-8	County of Sonoma CA-REVENUE BONDS		08/15/2024	KEY CAPITAL MARKETS		21,821,939	20,925,000	241,973	1.B FE
0909999999. Subtotal - Bonds - U.S. Special Revenues						30,381,669	29,297,000	403,955	XXX
00138C-BB-3	Corebridge Global Fundin-SECURED		08/19/2024	JP MORGAN SECURITIES		11,248,200	11,250,000	0	1.F FE
00262E-AA-9	AIP ITALY LP Senior Secured Notes Class		08/08/2024	DIRECT		20,000,000	20,000,000	0	1.F Z
002939-AD-8	A&D Mortgage Trust 2024--ADMT 2024-NQM4		08/27/2024	NOMURA SECURITIES IN		4,999,956	5,000,000	21,844	1.D FE
002939-AE-6	A&D Mortgage Trust 2024--ADMT 2024-NQM4		08/27/2024	NOMURA SECURITIES IN		9,999,874	10,000,000	45,267	1.G FE
00423E-AB-3	ACADIA REALTY TRUST Senior Note		08/21/2024	DIRECT		20,000,000	20,000,000	0	2.B Z
00835A-AB-4	Affirm Asset Securitizat-AFFRM 2024-B B		09/06/2024	BARCLAYS CAPITAL INC		9,999,593	10,000,000	0	1.C FE
00835A-AC-2	Affirm Asset Securitizat-AFFRM 2024-B C		09/06/2024	BARCLAYS CAPITAL INC		8,498,178	8,500,000	0	1.F FE
00846U-AQ-4	Agilent Technologies Inc-SENIOR UNSECURE		09/04/2024	WELLS FARGO		19,973,200	20,000,000	0	2.A FE
02073L-AA-9	Alpha Generation LLC-SENIOR UNSECURED		09/19/2024	CITIGROUP GLOBAL MAR		461,000	461,000	0	4.B FE
02352B-AA-3	Amentum Escrow Corp-SENIOR UNSECURED		07/30/2024	JP MORGAN SECURITIES		421,000	421,000	0	4.B FE
03027X-AW-0	American Tower Corp-SENIOR UNSECURED		08/02/2024	JP MORGAN SECURITIES		12,575,351	13,047,000	234,121	2.C FE
04636N-AK-9	Astrazeneca Finance LLC-SENIOR UNSECURED		07/26/2024	MORGAN		20,090,000	20,000,000	408,000	1.F FE
053015-AH-6	Automatic Data Processin-SENIOR UNSECURE		09/04/2024	BOFAMLSEC		9,964,100	10,000,000	0	1.D FE
05541T-AP-6	BGC Partners Inc-SENIOR UNSECURED		09/27/2024	EXCHANGE OFFER		444	0	0	2.C FE
07386X-AH-9	Bear Stearns ALT-A Trust-BALTA 2007-1 21		08/23/2024	PAYUP		(28,321)	0	0	4.B FM
101137-AX-5	Boston Scientific Corp-SENIOR UNSECURED		08/02/2024	BARCLAYS CAPITAL INC		19,720,000	20,000,000	342,222	2.A FE
105925-AB-7	BRAVO Residential Fundin-BRAVO 2024-NQM5		07/31/2024	BOFAMLSEC		3,999,928	4,000,000	23,551	1.C FE
110122-DQ-8	Bristol-Myers Squibb Co-SENIOR UNSECURED		08/02/2024	VARIOUS		16,849,400	20,000,000	66,056	1.F FE
11135F-BZ-3	Broadcom Inc-AVGO 5.05 07/12/27		08/02/2024	MORGAN		7,109,480	7,000,000	22,585	2.B FE
12542R-MH-4	CHS INC SER DD SR NT		07/16/2024	DIRECT		22,500,000	22,500,000	0	2.A Z
12575A-AA-5	CMFT Net Lease Master Is-CIMNL 2021-1 A1		09/24/2024	CANTOR		4,464,518	4,951,334	1,437	1.A FE
12662P-AD-0	CVR Energy Inc-SENIOR UNSECURED		09/27/2024	JEFFERIESLLC		37,600	40,000	288	4.A FE
127387-AM-0	Cadence Design Systems I-SENIOR UNSECURE		09/04/2024	HSBC SECURITIES INC		4,999,150	5,000,000	0	1.G FE
127387-AN-8	Cadence Design Systems I-SENIOR UNSECURE		09/04/2024	JP MORGAN SECURITIES		9,985,800	10,000,000	0	1.G FE
16144Q-AA-2	Chase Auto Owner Trust 2-CHAOT 2024-5A C		09/13/2024	JP MORGAN SECURITIES		6,498,044	6,500,000	0	1.F FE
16144Q-AG-0	Chase Auto Owner Trust 2-CHAOT 2024-5A D		09/13/2024	JP MORGAN SECURITIES		2,849,343	2,850,000	0	2.C FE
16159X-AV-4	Chase Home Lending Mortg-CHASE 2024-8 A9		09/17/2024	JP MORGAN SECURITIES		9,956,250	10,000,000	38,194	1.A FE
17134Q-AN-2	CHURCH & DWIGHT CO INC-SENIOR UNSECURED		07/22/2024	CITIGROUP GLOBAL MAR		9,540,100	10,000,000	150,500	2.A FE
18977W-2D-1	CNO 5 7/8 06/04/27		07/26/2024	JP MORGAN SECURITIES		5,953,490	5,875,000	52,732	1.G FE
18977W-2F-6	CNO Global Funding-SECURED		09/04/2024	GOLDMAN		6,057,788	6,061,000	0	1.G FE
196919-AA-2	COLT 2024-INV3 Mortgage -COLT 2024-INV3		08/12/2024	MORGAN		13,525,985	13,526,000	38,856	1.A FE
196919-AB-0	COLT 2024-INV3 Mortgage -COLT 2024-INV3		08/12/2024	MORGAN		7,499,865	7,500,000	22,543	1.C FE
20268A-AA-0	Commonbond Student Loan -CBSLT 2021-BGS		09/25/2024	GOLDMAN		3,264,439	3,871,833	126	1.A FE
20268K-AA-8	Commonbond Student Loan -CBSLT 2017-BGS		08/09/2024	RBC CAPITAL MARKETS		4,212,909	4,591,726	5,811	1.A FE
20269D-AA-3	Commonbond Student Loan -CBSLT 2018-AGS		08/09/2024	RBC CAPITAL MARKETS		3,665,822	3,944,395	5,979	1.A FE
20903X-AF-0	Consolidated Communicati-FIRST LIEN		09/12/2024	JP MORGAN SECURITIES		3,298,750	3,500,000	102,375	4.C FE
21925D-AB-5	Cornerstone Building Bra-SECURED		07/31/2024	DEUTSCHE BANK SECURI		2,187,000	2,187,000	0	4.B FE
22228F-AF-3	COUNTERPOINTE TITLING TR 2023-1 SUBOL 2		08/30/2024	DIRECT		564,033	564,033	0	1.F PL
22229Q-AA-9	Habitat 2024 Class A SUBI - Subclass 1		08/29/2024	DIRECT		2,495,204	2,495,204	0	1.F Z
22229Q-AB-7	Habitat 2024 Class B SUBI - Subclass 1		08/29/2024	DIRECT		211,117	0	0	1.F Z
22757H-AA-9	Cross 2024-H5 Mortgage T-CROSS 2024-H5 A		07/31/2024	GOLDMAN		4,999,955	5,000,000	29,270	1.A FE
22757H-AB-7	Cross 2024-H5 Mortgage T-CROSS 2024-H5 A		07/31/2024	GOLDMAN		7,499,927	7,500,000	45,045	1.C FE
233331-BM-8	DTE Energy Co-SENIOR UNSECURED		08/01/2024	MORGAN		17,624,425	17,500,000	0	2.B FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 3

Show All Long-Term Bonds and Stock Acquired During the Current Quarter

1	2	3	4	5	6	7	8	9	10
CUSIP Identification	Description	Foreign	Date Acquired	Name of Vendor	Number of Shares of Stock	Actual Cost	Par Value	Paid for Accrued Interest and Dividends	NAIC Designation, NAIC Designation Modifier and SVO Administrative Symbol
233853-AV-2	Daimler Truck Finance No-SENIOR UNSECURE		08/02/2024	MORGAN		10,103,500	10,000,000	27,778	1.G FE
26844L-AB-4	EFMT 2024-INV2-EFMT 2024-INV2 A2		09/27/2024	BARCLAYS CAPITAL INC		3,149,987	3,150,000	14,809	1.D FE
26844L-AC-2	EFMT 2024-INV2-EFMT 2024-INV2 A3		09/27/2024	BARCLAYS CAPITAL INC		4,749,988	4,750,000	22,973	1.G FE
27889*-AQ-2	ECOM ATLANTIC INC Senior Unsecured Notes		08/08/2024	DIRECT		25,000,000	25,000,000	0	2.A Z
000000-00-0	EDENS LIMITED PARTNERSHI Senior Note 3yr		07/23/2024	DIRECT		10,000,000	10,000,000	0	2.B Z
29717P-BA-4	ESS 5 1/2 04/01/34		08/19/2024	WELLS FARGO		2,057,420	2,000,000	47,972	2.A FE
30165B-AF-0	Exeter Automobile Receiv-EART 2024-5A C		09/24/2024	BARCLAYS CAPITAL INC		1,999,860	2,000,000	0	1.F FE
31425B-AA-5	FCI Funding 2024-1 LLC-FCITL 2024-1A A		08/07/2024	CAPONE		22,999,179	23,000,000	0	1.A FE
34535C-AB-2	Ford Credit Auto Owner T-FORDR 2023-2 B		08/06/2024	MIZUHO SECURITIES		596,494	580,000	2,098	1.C FE
36152B-AD-4	GBX Leasing 2023-1 LLC-GBXL 2023-1A B		09/23/2024	WELLS FARGO		5,097,449	4,948,980	4,003	1.F FE
36264F-AK-7	GSK Consumer Healthcare -SENIOR UNSECURE		08/02/2024	BARCLAYS CAPITAL INC		19,499,400	20,000,000	245,625	2.A FE
36267V-AF-0	GE HealthCare TechnologI-SENIOR UNSECURE		08/02/2024	MORGAN		20,519,300	20,000,000	232,278	2.B FE
36830F-AF-3	GCAT 2024-INV3 Trust-GCAT 2024-INV3 A6		08/02/2024	BOFAMLSEC		7,770,871	7,750,000	43,809	1.A FE
36830F-AN-6	GCAT 2024-INV3 Trust- 36830FAN6		08/02/2024	BOFAMLSEC		3,004,688	3,000,000	18,500	1.B FE
379352-AL-1	GLOBAL MARINE INC-NOTE		08/23/2024	WELLS FARGO		2,049,705	2,169,000	35,849	5.C FE
39571M-AD-0	GreenSky Home Improvemen-GSKY 2024-1 A4		07/30/2024	GOLDMAN		9,999,571	10,000,000	0	1.A Z
40495*-AB-4	HGIT PROPERTIES LP Guaranteed Senior Not		07/02/2024	DIRECT		19,593,000	19,593,010	0	2.B PL
423452-AH-4	Helmerich & Payne Inc-SENIOR UNSECURED		09/10/2024	WELLS FARGO		7,349,912	7,353,000	0	2.B FE
43283Q-AC-4	Hilton Grand Vacations B-SECURED		08/01/2024	BOFAMLSEC		3,759,375	3,750,000	11,732	3.A FE
43283Y-AA-1	Hilton Grand Vacations T-HGVT 2024-1B A		09/18/2024	U. S. BANCORP		3,877,297	3,804,769	2,431	1.A FE
451102-CG-0	Icahn Enterprises LP / I-SENIOR UNSECURE		08/09/2024	JEFFERIESLLC		1,001,250	1,000,000	18,500	3.C FE
45687V-AD-8	Ingersoll Rand Inc-SENIOR UNSECURED		08/02/2024	CITADELEQ		22,747,879	22,100,000	270,087	2.B FE
45866F-AZ-7	Intercontinental Exchang-SENIOR UNSECURE		07/26/2024	CITIGROUP GLOBAL MAR		13,630,093	14,299,000	213,095	1.G FE
45866F-BB-9	Intercontinental Exchang-SENIOR UNSECURE		09/10/2024	EXCHANGE OFFER		13,647,684	14,299,000	14,398	1.G FE
46632Y-AD-6	JP Morgan Mortgage Trust-JPMIT 2008-R3 2		09/01/2024	PAYUP		59	59	0	1.A FM
46658G-AT-9	JP Morgan Mortgage Trust-JPMIT 2024-8 A9		08/21/2024	JP MORGAN SECURITIES		2,869,344	2,868,000	13,862	1.B FE
469815-AL-8	Jacobs Entertainment Inc-SENIOR UNSECURE		08/22/2024	VARIOUS		5,189,081	5,585,000	42,784	4.B FE
47587*-AA-0	JEN HoldCo 24 LLC Senior Secured Notes		07/19/2024	DIRECT		7,587,000	7,587,000	0	2.B Z
486606-R8-7	KAYNE ANDERSON ENERGY IN KYN 7Y Senior		08/13/2024	DIRECT		10,000,000	10,000,000	0	1.A FE
501044-DS-7	Kroger Co/The-SENIOR UNSECURED		08/20/2024	WELLS FARGO		9,998,000	10,000,000	0	2.A FE
501044-DT-5	Kroger Co/The		08/20/2024	WELLS FARGO		10,263,212	10,274,000	0	2.B FE
53229K-AA-7	Lightning Power LLC-SECURED		09/06/2024	VARIOUS		4,378,800	4,230,000	15,541	3.C FE
55389Q-AB-3	MVW 2024-2 LLC-MVIWOT 2024-2A B		09/24/2024	WELLS FARGO		5,999,749	6,000,000	0	1.F FE
55389Q-AC-1	MVW 2024-2 LLC-MVIWOT 2024-2A C		09/24/2024	WELLS FARGO		3,999,430	4,000,000	0	2.B FE
567928-AA-4	Mariner Finance Issuance-MFIT 2024-AA A		07/30/2024	WELLS FARGO		2,999,632	3,000,000	0	1.A FE
567928-AB-2	Mariner Finance Issuance-MFIT 2024-AA B		07/30/2024	WELLS FARGO		999,981	1,000,000	0	1.D FE
57636Q-BA-1	Mastercard Inc-SENIOR UNSECURED		09/03/2024	BOFAMLSEC		9,225,923	9,231,000	0	1.D FE
58942H-AC-5	Mercy Health/OH-SECURED		09/05/2024	VARIOUS		7,387,233	7,415,000	46,196	1.E FE
600418-AA-1	MILLENNIUM PIPELINE INTE Senior Unsecure		08/09/2024	DIRECT		6,000,000	6,000,000	0	2.B Z
600418-AB-9	MILLENNIUM PIPELINE INTE Senior Unsecure		08/09/2024	DIRECT		7,500,000	7,500,000	0	2.B Z
61776Q-AC-0	Morgan Stanley ResidentI-MSRM 2024-3 A2		07/30/2024	MORGAN		4,998,124	5,000,000	30,833	1.A FE
62847R-AA-5	MVW 2024-1 LLC-MVIWOT 2024-1A A		08/12/2024	BARCLAYS CAPITAL INC		5,194,555	5,121,730	17,408	1.A FE
62979*-AT-4	NSA OP LP Senior Notes		08/23/2024	DIRECT		15,000,000	15,000,000	0	2.A FE
64110L-AX-4	Netflix Inc-SENIOR UNSECURED		08/02/2024	GOLDMAN		21,741,600	20,000,000	283,333	2.A FE
67103H-AH-0	O'Reilly Automotive Inc-SENIOR UNSECURED		08/02/2024	MORGAN		12,454,116	12,743,000	88,351	2.B FE
67190A-AB-2	Oak Street Investment Gr-OAKIG 2021-1A A		09/25/2024	DEUTSCHE BANK SECURI		5,294,216	5,876,341	1,890	1.A FE
68902V-AK-3	Otis Worldwide Corp-SENIOR UNSECURED		08/02/2024	GOLDMAN		13,540,131	14,958,000	181,179	2.B FE
69357V-AA-3	PMHC II Inc-SENIOR UNSECURED		07/12/2024	WELLS FARGO		1,810,000	2,000,000	75,000	5.B FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 3

Show All Long-Term Bonds and Stock Acquired During the Current Quarter

1	2	3	4	5	6	7	8	9	10
CUSIP Identification	Description	Foreign	Date Acquired	Name of Vendor	Number of Shares of Stock	Actual Cost	Par Value	Paid for Accrued Interest and Dividends	NAIC Designation, NAIC Designation Modifier and SVO Administrative Symbol
69381J-AA-0	PRPM 2024-RCF5 LLC-PRPM 2024-RCF5 A1		08/02/2024	GOLDMAN		9,752,289	10,000,000	0	1.A FE
69392B-AD-8	PEAC Solutions Receivabl-PEAC 2024-2A B		09/24/2024	WELLS FARGO		3,749,807	3,750,000	0	1.C FE
70687F-AE-9	PenFed Auto Receivables -PNFED 2024-A B		08/13/2024	JP MORGAN SECURITIES		4,199,968	4,200,000	0	1.C FE
74153W-CU-1	Pricoa Global Funding I-SECURED		08/20/2024	DEUTSCHE BANK SECURI		14,996,700	15,000,000	0	1.D FE
74745*-AA-3	QTS IRVING DC3 LLC Senior Secured Notes		07/10/2024	DIRECT		6,944,450	6,944,450	0	1.F Z
75041V-AB-0	Radiology Partners Inc-RADPAR 8 1/2 01/3		07/09/2024	EXCHANGE OFFER		4,439,855	4,531,317	48,854	4.C FE
760759-AS-9	Republic Services Inc-SENIOR UNSECURED		07/22/2024	GOLDMAN		3,561,659	3,725,000	23,747	2.A FE
771196-CP-5	Roche Holdings Inc-SENIOR UNSECURED		09/03/2024	JP MORGAN SECURITIES		15,000,000	15,000,000	0	1.C FE
776696-AG-1	Roper Technologies Inc-SENIOR UNSECURED		08/19/2024	JP MORGAN SECURITIES		9,955,000	10,000,000	0	2.B FE
78200J-AA-0	Rush Obligated Group-UNSECURED		08/29/2024	BOFAMLSEC		2,443,525	2,500,000	28,598	1.E FE
78355H-KV-0	Ryder System Inc-SENIOR UNSECURED		07/26/2024	CITIGROUP GLOBAL MAR		18,076,174	17,662,000	410,249	2.A FE
000000-00-0	SCF FUNDING LLC Senior Unsecured Notes		07/31/2024	DIRECT		20,000,000	20,000,000	0	2.B Z
78403D-BD-1	SBA Tower Trust-SECURED		09/10/2024	BARCLAYS BANK PLC		30,000,000	30,000,000	0	1.F FE
78450X-AA-6	SMB Private Education Lo-SMB 2024-E A1A		08/07/2024	JP MORGAN SECURITIES		12,994,903	13,000,000	0	1.A FE
78525C-AA-3	S&S Holdings LLC-SECURED		09/25/2024	U B S SECURITIES		3,880,356	3,874,000	0	4.B FE
78573N-AH-5	Sabre GBLB Inc-SECURED		08/01/2024	VARIOUS		4,966,250	5,000,000	64,688	4.C FE
795758-AN-7	SALTCHUK RESOURCES INC Sr Unsecured Bond		07/08/2024	DIRECT		8,636,000	8,636,000	0	2.A PL
795924-AA-7	Saluda Grade Alternative-GRADE 2024-INNV1		08/05/2024	NOMURA SECURITIES IN		9,999,811	10,000,000	57,371	1.A FE
81749N-AB-1	Sequoia Mortgage Trust 2-SEMT 2024-8 A2		08/09/2024	WELLS FARGO		15,364,375	15,500,000	66,306	1.A FE
81749N-AV-7	Sequoia Mortgage Trust 2-SEMT 2024-8 A20		08/09/2024	WELLS FARGO		13,958,435	14,171,000	60,620	1.A FE
824348-AW-6	Sherwin-Williams Co/The-SENIOR UNSECURED		07/26/2024	BOFAMLSEC		14,258,688	14,823,000	82,391	2.B FE
855244-BG-3	Starbucks Corp-SBUX 4.85 02/08/27		08/02/2024	CITIGROUP GLOBAL MAR		5,056,050	5,000,000	119,229	2.A FE
86363G-AF-1	Structured Adjustable Ra-SARM 2007-3 3A1		08/01/2024	PAYUP		126	197	0	1.A FM
863667-BE-0	Stryker Corp-SENIOR UNSECURED		09/04/2024	WELLS FARGO		14,968,650	15,000,000	0	2.A FE
86944B-AG-8	Sutter Health-UNSECURED		08/21/2024	JP MORGAN SECURITIES		4,471,798	5,025,000	2,241	1.E FE
871829-BF-3	SY 3 1/4 07/15/27		07/22/2024	CITIGROUP GLOBAL MAR		5,924,300	6,211,000	4,486	2.B FE
872480-AA-6	Tif Funding II LLC-SERIES 20-1A CLASS A		07/25/2024	BOFAMLSEC		1,261,751	1,383,333	482	1.F FE
872480-AE-8	TIF Funding II LLC-TIF 2021-1A A		07/25/2024	VARIOUS		4,412,191	5,048,750	1,388	1.E FE
87251F-AD-1	TCW DIRECT LENDING STRUCTURED SOLUTIONS		07/29/2024	DIRECT		100,719	100,719	0	2.B FE
881943-AF-1	TEVT 2023-1 B		09/18/2024	U. S. BANCORP		2,567,969	2,500,000	11,721	1.C FE
88517Q-AB-9	Thor 2024-A LLC-THOR 2024-A B		09/16/2024	WELLS FARGO		6,498,973	6,500,000	0	2.B FE
88749*-AD-3	TING ISSUER LLC TING FUNDING LLC (TRANCH		08/13/2024	DIRECT		24,391,321	24,395,000	0	1.F Z
88749*-AE-1	TING ISSUER LLC TING FUNDING LLC (TRANCH		08/13/2024	DIRECT		1,999,877	2,000,000	0	1.F Z
89182Q-AB-1	Towd Point Mortgage Trus-TPMT 2024-CES4		09/12/2024	JP MORGAN SECURITIES		6,109,876	6,110,000	22,827	1.B FE
89683L-AA-8	TRP - TRIP Rail Master F-TRP 2021-2 A		07/24/2024	MIZUHO SECURITIES		3,920,145	4,279,561	2,045	1.F FE
902494-BC-6	Tyson Foods Inc-SENIOR UNSECURED		08/01/2024	JP MORGAN SECURITIES		9,674,500	10,000,000	59,167	2.B FE
90353T-AN-0	Uber Technologies Inc-SENIOR UNSECURED		09/04/2024	MORGAN		18,993,730	19,000,000	0	2.B FE
91324P-DE-9	UnitedHealth Group Inc-SENIOR UNSECURED		08/01/2024	JP MORGAN SECURITIES		9,139,541	9,550,000	83,735	1.F FE
91324P-DX-7	UnitedHealth Group Inc-SENIOR UNSECURED		08/02/2024	JP MORGAN SECURITIES		17,579,200	20,000,000	88,889	1.F FE
92259W-AA-2	Velocity Commercial Capi-VCC 2024-4 A		08/06/2024	CITIGROUP GLOBAL MAR		9,999,653	10,000,000	20,100	1.A FE
924925-AD-2	Verus Securitization Tru-VERUS 2024-7 A2		09/11/2024	MORGAN		14,999,813	15,000,000	37,528	1.C FE
92538N-AC-1	Verus Securitization Tru-VERUS 2022-4 A3		08/15/2024	BOFAMLSEC		1,838,837	1,830,598	3,615	1.F FE
92540N-AB-9	Verus Securitization Tru-VERUS 2024-INNV2		08/14/2024	WELLS FARGO		5,797,944	5,798,000	18,720	1.C FE
928668-CF-7	Volkswagen Group of Amer-SENIOR UNSECURE		08/02/2024	MORGAN		10,187,100	10,000,000	195,806	1.G FE
931427-AW-8	WBA 8 1/8 08/15/29		08/16/2024	JP MORGAN SECURITIES		2,540,625	2,500,000	3,950	4.A FE
94106L-BX-6	Waste Management Inc-SENIOR UNSECURED		07/22/2024	JP MORGAN SECURITIES		10,059,200	10,000,000	27,500	1.G FE
96949L-AD-7	Williams Cos Inc/The-SENIOR UNSECURED		07/22/2024	BOFAMLSEC		5,225,904	5,400,000	21,375	2.B FE
97246J-AA-6	Wilsonart LLC-SENIOR UNSECURED		07/25/2024	GOLDMAN		2,250,000	2,250,000	0	5.B FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 3

Show All Long-Term Bonds and Stock Acquired During the Current Quarter

1	2	3	4	5	6	7	8	9	10
CUSIP Identification	Description	Foreign	Date Acquired	Name of Vendor	Number of Shares of Stock	Actual Cost	Par Value	Paid for Accrued Interest and Dividends	NAIC Designation, NAIC Designation Modifier and SVO Administrative Symbol
98978V-AL-7	Zoetis Inc-SENIOR UNSECURED		07/26/2024	BOFAMLSEC		28,377,000	30,000,000	342,500	2.A FE
000000-00-0	AMERICAN AIRLINES INC Junior Secured Deb		08/15/2024	DIRECT		29,000,000	29,000,000	0	2.B Z
000000-00-0	PRIME PROPERTY FUND LLC Senior Notes		09/17/2024	DIRECT		4,000,000	4,000,000	0	2.A Z
66369#-AB-7	NSG UK Enterprises Limit Senior Note Ser		09/20/2024	BOFAMLSEC		62,500	62,491	0	2.C Z
T3420#-AE-1	CRIF SpA Senior Unsecured Notes		08/12/2024	BNP PARIBAS		(10,000)	(10,000)	0	2.B Z
071734-AQ-0	Bausch Health Cos Inc-FIRST LIEN	A.	07/24/2024	VARIOUS		1,964,829	2,451,000	0	4.C FE
071734-AR-8	Bausch Health Cos Inc-BHCCN 14 10/15/30	A.	07/24/2024	DIRECT		392,806	490,000	0	5.C FE
29250N-BX-2	Enbridge Inc-SENIOR UNSECURED	A.	07/26/2024	CITIGROUP GLOBAL MAR		9,960,169	9,570,000	118,030	2.A FE
68251P-AA-5	1375209 BC Ltd-FIRST LIEN	A.	07/02/2024	VARIOUS		4,029,665	4,378,000	114,750	5.B
00119V-AN-9	AGL CLO 6 LTD-AGL 2020-6A AR	D.	08/05/2024	BOFAMLSEC		19,995,000	20,000,000	56,197	1.A FE
00121G-AA-6	AGL Core CLO 15 Ltd-AGL 2021-15A A1	D.	08/06/2024	BOFAMLSEC		13,988,800	14,000,000	41,649	1.A FE
00176B-AM-5	AMMC CLO XIII Ltd-AMMC 2013-13A B3LR	D.	07/24/2024	PAYUP		8,454	8,454	0	6. FE
00176E-AJ-6	AMMC CLO XII Ltd-AMMC 2013-12A FR	D.	08/28/2024	PAYUP		9,824	9,824	0	5.A FE
00774M-BG-9	AerCap Ireland Capital D-SENIOR UNSECURE	D.	07/26/2024	GOLDMAN		18,434,347	17,873,000	326,129	2.B FE
03768C-AS-8	Apidos CLO XXX-APID XXXA A2R	D.	08/15/2024	RBC CAPITAL MARKETS		15,000,000	15,000,000	124,965	1.C FE
03768R-AQ-9	Apidos CLO XXXII-APID 2019-32A A1R	D.	08/02/2024	MORGAN		4,002,000	4,000,000	9,928	1.A FE
000000-00-0	BG BETA I LTD Class A-2 Senior Secured N	C.	07/01/2024	DIRECT		10,000,000	10,000,000	0	1.F Z
06759U-AL-7	Barings Clo Ltd 2022-II-BABSN 2022-2A A1	D.	07/02/2024	BARCLAYS CAPITAL INC		7,055,000	7,055,000	0	1.A FE
067930-AL-1	Barings Private Credit C-BPCC 2023-1A A1	D.	08/27/2024	BNP PARIBAS		25,000,000	25,000,000	0	1.A Z
12564D-AA-2	CIFC Funding 2021-III Lt-CIFC 2021-3A A	D.	08/06/2024	DEUTSCHE BANK SECURI		19,995,000	20,000,000	85,649	1.A FE
20752T-AB-0	Connect Finco SARL / Con-SECURED	C.	09/13/2024	VARIOUS		2,574,438	2,575,000	0	4.A FE
25243Y-BG-3	Diageo Capital PLC-SENIOR UNSECURED	D.	07/22/2024	MORGAN		10,108,603	9,950,000	130,373	1.G FE
27829P-AL-0	Eaton Vance CLO 2020-2 L-EATON 2020-2A A	D.	08/05/2024	DEUTSCHE BANK SECURI		7,000,000	7,000,000	28,717	1.A FE
36320T-BF-9	Galaxy XXII CLO Ltd-GALXY 2016-22A BRRR	D.	09/16/2024	JP MORGAN SECURITIES		15,000,000	15,000,000	0	1.D Z
37960J-AA-6	Global Aircraft Leasing -SR UNSECURED	D.	08/28/2024	PIK NOTE BUY UP		97,500	97,500	0	4.B FE
423012-AF-0	Heineken NV-HEIANA 3 1/2 01/29/28	D.	08/02/2024	VARIOUS		62,128,309	64,405,000	14,467	2.A FE
47216Q-AB-9	JDE Peet's NV-SENIOR UNSECURED	D.	08/01/2024	VARIOUS		13,002,240	14,182,000	7,833	2.C FE
48251T-AG-6	KKR CLO 20 Ltd-KKR 20 BR	D.	08/29/2024	DEUTSCHE BANK SECURI		10,000,000	10,000,000	0	1.B Z
48252Y-AQ-2	KKR CLO 23 Ltd-KKR 23 BR	D.	08/16/2024	CITIGROUP GLOBAL MAR		10,000,000	10,000,000	0	1.B Z
55819M-AU-0	Madison Park Funding XXX-MDPK 2019-35A B	D.	08/07/2024	BNP PARIBAS		4,494,600	4,500,000	19,095	1.C FE
62878U-2H-4	NBN Co Ltd-SENIOR UNSECURED	D.	09/24/2024	JP MORGAN SECURITIES		2,894,577	2,900,000	0	1.D FE
62878U-2J-0	NBN Co Ltd-SENIOR UNSECURED	D.	09/24/2024	JP MORGAN SECURITIES		2,899,478	2,900,000	0	1.D FE
65345X-AA-2	GENESIS AIRCRAFT SERVICE Class A Certifi	C.	07/09/2024	VARIOUS		(54,359,471)	(54,360,082)	0	1.F Z
65345X-AB-0	GENESIS AIRCRAFT SERVICE Class B Certifi	C.	07/09/2024	VARIOUS		(22,860,801)	(23,059,309)	0	2.B Z
67113G-AS-6	OHA Credit Funding 5 Ltd-OAKC 2020-5A AR	D.	09/30/2024	CITIGROUP GLOBAL MAR		3,000,000	3,000,000	0	1.A Z
675935-AU-4	Octagon 60 Ltd-OCT60 2022-1A BR	D.	09/27/2024	NOMURA SECURITIES IN		9,000,000	9,000,000	0	1.D Z
749529-AA-1	REVL 2024 2 LTD REVL 2024-2 LTD	C.	08/22/2024	DIRECT		6,469,311	6,469,311	0	1.E PL
74980Q-AE-1	ALM Ltd/KY-RRAM 2021-17A A2	D.	08/06/2024	BOFAMLSEC		5,002,500	5,000,000	24,043	1.C FE
75625Q-AE-9	Reckitt Benckiser Treasu-SENIOR UNSECURE	D.	08/01/2024	JP MORGAN SECURITIES		18,988,100	20,000,000	52,500	1.G FE
761925-AA-4	REVL 2024-1, Ltd Class A Notes	C.	09/12/2024	DIRECT		7,583,333	7,583,333	0	1.E PL
87167G-OM-0	Symphony CLO XXII Ltd-SYMP 2020-22A BR	D.	09/13/2024	MORGAN		15,000,000	15,000,000	0	1.C FE
88315L-AL-2	Textainer Marine Contain-TMGL 2021-1A A	D.	08/12/2024	BARCLAYS CAPITAL INC		3,392,534	3,778,667	4,056	1.F FE
92676X-AF-4	Viking Cruises Ltd-SENIOR UNSECURED	D.	08/09/2024	WELLS FARGO		2,515,625	2,500,000	86,042	4.C FE
92917N-BA-5	Voya CLO 2019-1 Ltd-VOYA 2019-1A CRR	D.	09/27/2024	CIBC OPPENHEIMER		2,500,000	2,500,000	0	1.F Z
92917N-BG-2	Voya CLO 2019-1 Ltd-VOYA 2019-1A BRR	D.	09/27/2024	CIBC OPPENHEIMER		9,200,000	9,200,000	0	1.D Z
96467F-AU-4	Whitebox Clo I Ltd-WBOX 2019-1A A1RR	D.	08/02/2024	GOLDMAN		8,511,900	8,500,000	0	1.A FE
000000-00-0	SAPPHIRE XXIX SERIES 202-SAPP 2024-2 A2	B.	09/25/2024	NATIONAL AUSTRALIA B		2,594,260	2,594,260	0	1.A FE
000000-00-0	SAPPHIRE XXIX SERIES 202-SAPP 2024-2 B	B.	09/25/2024	NATIONAL AUSTRALIA B		3,857,255	3,857,256	0	1.C FE
B9550#-AP-6	UMICORE SA Senior Sustainability-linked	B.	07/18/2024	DIRECT		21,718,000	21,718,003	0	2.A Z
B6520C-ND-#	REVL 2024-1, Ltd Class A Notes	C.	09/11/2024	DIRECT		(7,583,333)	(7,583,333)	0	1.D Z
D2736#-AY-5	FRITZ DRAXLMAIER GMBH AN Senior Unsecure	D.	08/29/2024	DIRECT		6,000,000	6,000,000	0	2.C PL
F2000#-AC-2	C2 DEVELOPPMENT Senior Unsecured Notes	B.	07/16/2024	DIRECT		21,390,008	21,390,008	0	2.A Z
68481#-AA-0	STENN MEZZ CLASS B	D.	08/06/2024	DIRECT		3,250,000	3,250,000	0	2.B Z
68481#-AB-8	STENN MEZZ CLASS C	D.	08/06/2024	DIRECT		3,750,000	3,750,000	0	3.B Z
L6256K-AA-8	Maslow Kensington Investments S.A.R.L -	B.	09/04/2024	DIRECT		516,864	516,864	(98)	1.F Z
000000-00-0	EVOS FINANCE BV Senior Secured Notes Tra	B.	07/01/2024	DIRECT		24,681,300	24,681,289	0	2.B Z

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 3

Show All Long-Term Bonds and Stock Acquired During the Current Quarter

1	2	3	4	5	6	7	8	9	10
CUSIP Identification	Description	Foreign	Date Acquired	Name of Vendor	Number of Shares of Stock	Actual Cost	Par Value	Paid for Accrued Interest and Dividends	NAIC Designation, NAIC Designation Modifier and SVO Administrative Symbol
N7334#-AZ-6	WERELDHAVE NV Senior Unsecured Notes	B.....	...07/16/2024	DIRECT .....	.....	10,889,000	10,889,000	0	2.B Z
Q5S469-AB-3	Liberty Series 2024-1 SM-LBRTY 2024-1SME	B.....	...09/04/2024	NATIONAL AUSTRALIA B .....	.....	10,087,500	10,087,499	0	1.A FE
Q738AB-AC-5	Pepper Residential Secur-PEPAU 40 A2	B.....	...08/08/2024	NATIONAL AUSTRALIA B .....	.....	3,946,800	3,946,800	0	1.A FE
Q738AB-AH-4	Pepper Residential Secur-PEPAU 40 B	B.....	...08/08/2024	NATIONAL AUSTRALIA B .....	.....	1,447,160	1,447,160	0	1.C FE
Q7S4C0W-AB-1	Resimac Bastille Trust S-RESI 2024-2NC A	B.....	...08/14/2024	DBAUS .....	.....	5,285,600	5,285,601	0	1.A FE
000000-00-0	Merrion Square Residenti-MERRI 2024-1A A	B.....	...07/03/2024	MORGAN STANLEY & CO .....	.....	12,878,764	12,955,200	0	1.A FE
000000-00-0	Merrion Square Residenti-MERRI 2024-1A B	B.....	...07/03/2024	MORGAN STANLEY & CO .....	.....	2,090,694	2,105,220	0	1.C FE
000000-00-0	Merrion Square Residenti-MERRI 2024-1A C	B.....	...07/03/2024	MORGAN STANLEY & CO .....	.....	1,670,443	1,700,370	0	1.G FE
805564-EM-9	Saxon Asset Securities Tr 1999-3 Mt Ln Ast Bk Cer Ser 1999-3 .....	.....	...07/24/2024	PAYUP .....	.....	895	0	0	1.A FM
1109999999. Subtotal - Bonds - Industrial and Miscellaneous (Unaffiliated)						1,679,384,395	1,699,082,835	6,833,569	XXX
00773H-AA-5	AerCap Global Aviation T-AER 6 1/2 06/15 .....	.....	...09/26/2024	VARIOUS .....	.....	12,464,219	12,460,000	110,697	2.C FE
03765H-AE-1	Apollo Management Holdin-SUBORDINATED .....	.....	...07/19/2024	SEAPORT GROUP .....	.....	18,053,500	18,200,000	83,463	2.A FE
04018V-AA-1	ARES FINANCE CO-SUBORDINATED .....	.....	...08/08/2024	VARIOUS .....	.....	4,822,696	5,104,500	21,165	2.C FE
15189T-BJ-5	CenterPoint Energy Inc-CNP 6.85 02/15/55 .....	.....	...08/12/2024	MORGAN .....	.....	10,000,000	10,000,000	0	2.C FE
172967-PM-7	Citigroup Inc-C 7 PERP .....	.....	...07/23/2024	CITIGROUP GLOBAL MAR .....	.....	29,630,000	29,630,000	0	3.A FE
21871X-AT-6	Corebridge Financial Inc-CRBG 6 3/8 09/1 .....	.....	...09/05/2024	CITIGROUP GLOBAL MAR .....	.....	16,667,000	16,667,000	0	2.C FE
26441C-CG-8	Duke Energy Corp-DUK 6.45 09/01/54 .....	.....	...08/19/2024	MORGAN .....	.....	10,000,000	10,000,000	0	2.C FE
29336U-AH-0	ENLK Float PERP .....	.....	...08/15/2024	MIZUHO SECURITIES .....	.....	13,700,938	13,750,000	224,563	3.B FE
29360A-AA-8	ENSTAR FINANCE CO LLC .....	.....	...08/05/2024	SEAPORT GROUP .....	.....	9,612,500	10,000,000	242,778	2.C FE
29360A-AB-6	Enstar Finance LLC-JR SUBORDINATED .....	.....	...07/19/2024	MIZUHO SECURITIES .....	.....	9,675,000	10,000,000	10,694	2.C FE
65473P-AT-2	NiSource Inc-NI 6 3/8 03/31/55 .....	.....	...09/03/2024	GOLDMAN .....	.....	7,500,000	7,500,000	0	3.A FE
726503-AE-5	Plains All American Pipe-PAA FLOAT PERP .....	.....	...08/27/2024	SEAPORT GROUP .....	.....	4,050,000	4,050,000	13,879	3.A FE
816851-BT-5	Sempra-SRE 6.4 10/01/54 .....	.....	...09/04/2024	BARCLAYS CAPITAL INC .....	.....	26,667,000	26,667,000	0	2.C FE
95002Y-AC-7	Wells Fargo & Co-WFC 6.85 PERP .....	.....	...07/16/2024	WELLS FARGO .....	.....	16,514,000	16,514,000	0	2.B FE
00774M-BK-0	AerCap Ireland Capital D-AER 6.95 03/10/	D.....	...07/08/2024	JP MORGAN SECURITIES .....	.....	4,007,000	4,007,000	0	3.A FE
00774Y-AA-7	AerCap Holdings NV-AER 5 7/8 10/10/2079	D.....	...07/25/2024	BOFAMLSEC .....	.....	25,177,210	25,211,000	401,066	2.C FE
018820-AD-2	Allianz SE-SUBORDINATED	D.....	...08/27/2024	CITIGROUP GLOBAL MAR .....	.....	9,400,000	9,400,000	0	1.D Z
05565Q-DW-5	BP Capital Markets PLC-SUBORDINATED	D.....	...09/05/2024	BARCLAYS CAPITAL INC .....	.....	18,427,530	17,634,000	15,797	1.G FE
65558R-AK-5	Nordea Bank Abp-NDAFH 6.3 PERP	D.....	...09/19/2024	BOFAMLSEC .....	.....	5,059,000	5,059,000	0	2.A FE
1309999999. Subtotal - Bonds - Hybrid Securities						251,427,593	251,853,500	1,124,102	XXX
22228#-AD-8	CounterpointsRE C-PACE 3111 Sunset Blvd .....	.....	...09/06/2024	DIRECT .....	.....	444,922	444,922	0	1.F
06764A-AA-8	Barings Loan Partners CL-BABSN LP-4A X	D.....	...08/27/2024	CITIGROUP GLOBAL MAR .....	.....	275,000	275,000	0	1.A
06764A-AC-4	Barings Loan Partners CL-BABSN LP-4A A	D.....	...08/27/2024	CITIGROUP GLOBAL MAR .....	.....	34,000,000	34,000,000	0	1.A
06764A-AE-0	Barings Loan Partners CL-BABSN LP-4A B	D.....	...08/27/2024	CITIGROUP GLOBAL MAR .....	.....	6,000,000	6,000,000	0	1.C
06764A-AG-5	Barings Loan Partners CL-BABSN LP-4A C	D.....	...08/27/2024	CITIGROUP GLOBAL MAR .....	.....	2,750,000	2,750,000	0	1.F
06764A-AJ-9	Barings Loan Partners CL-BABSN LP-4A D	D.....	...08/27/2024	CITIGROUP GLOBAL MAR .....	.....	2,000,000	2,000,000	0	2.B
06764B-AA-6	Barings Loan Partners CL-BABSN LP-4A E	D.....	...08/27/2024	CITIGROUP GLOBAL MAR .....	.....	1,750,000	1,750,000	0	3.C
06764E-AC-6	Barings Middle Market Lo-BMMLP 2024-1A A	D.....	...08/16/2024	NATIXIS CAP MKT .....	.....	20,000,000	20,000,000	0	1.A
06764E-AE-2	Barings Middle Market Lo-BMMLP 2024-1A B	D.....	...08/16/2024	NATIXIS CAP MKT .....	.....	9,250,000	9,250,000	0	1.C
06764E-AG-7	Barings Middle Market Lo-BMMLP 2024-1A C	D.....	...08/16/2024	NATIXIS CAP MKT .....	.....	9,500,000	9,500,000	0	1.F
06764E-AJ-1	Barings Middle Market Lo-BMMLP 2024-1A D	D.....	...08/16/2024	NATIXIS CAP MKT .....	.....	2,500,000	2,500,000	0	2.C
06764F-AB-5	Barings Middle Market Lo-BMMLP 2024-1I E	D.....	...08/16/2024	NATIXIS CAP MKT .....	.....	5,000,000	5,000,000	0	3.C
067925-AC-1	Barings Middle Market Lo-BMMLP 2024-1I A	D.....	...08/16/2024	BOFAMLSEC .....	.....	20,000,000	20,000,000	0	1.A
067925-AE-7	Barings Middle Market Lo-BMMLP 2024-1I A	D.....	...08/16/2024	BOFAMLSEC .....	.....	3,000,000	3,000,000	0	1.C
067925-AG-2	Barings Middle Market Lo-BMMLP 2024-1I A	D.....	...08/16/2024	BOFAMLSEC .....	.....	4,000,000	4,000,000	0	1.F
067925-AJ-6	Barings Middle Market Lo-BMMLP 2024-1I A	D.....	...08/16/2024	BOFAMLSEC .....	.....	5,250,000	5,250,000	0	2.C
067926-AA-3	Barings Middle Market Lo-BMMLP 2024-1I A	D.....	...08/16/2024	BOFAMLSEC .....	.....	1,400,000	1,400,000	0	3.C
067930-AQ-0	Barings Private Credit C-BPCC 2023-1A A2	D.....	...08/27/2024	BNP PARIBAS .....	.....	10,500,000	10,500,000	0	1.C
067930-AS-6	Barings Private Credit C-BPCC 2023-1A BR	D.....	...08/27/2024	BNP PARIBAS .....	.....	15,000,000	15,000,000	0	1.F
1509999999. Subtotal - Bonds - Parent, Subsidiaries and Affiliates						152,619,922	152,619,922	0	XXX
00177#-AA-1	AMF Levered II, LLC - Revolver .....	.....	...07/24/2024	BANK LOANS BARINGS .....	.....	1,602,967	1,602,967	0	1.C PL
00463#-AA-6	Accuserve Solutions, Inc. - Term Loan .....	.....	...08/15/2024	BANK LOANS BARINGS .....	.....	348,324	348,324	0	4.B PL

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 3

Show All Long-Term Bonds and Stock Acquired During the Current Quarter

1	2	3	4	5	6	7	8	9	10
CUSIP Identification	Description	Foreign	Date Acquired	Name of Vendor	Number of Shares of Stock	Actual Cost	Par Value	Paid for Accrued Interest and Dividends	NAIC Designation, NAIC Designation Modifier and SVO Administrative Symbol
00797*-AB-3	Aero Operating LLC/Delayed Draw Term Loa		07/01/2024	BANK LOANS BARINGS		2,597	2,597	0	3.B PL
02317Z-MM-5	AMBER CS LLC - Senior Secured Loan		07/16/2024	BANK LOANS BARINGS		3,637,297	3,637,297	0	2.B Z
03770*-AA-0	Apollo Asset-Backed Finance Lending Comp		09/03/2024	BANK LOANS BARINGS		2,500,000	2,500,000	0	2.A PL
03770*-AB-8	Apollo Asset-Backed Finance Lending Comp		09/03/2024	BANK LOANS BARINGS		1,000,000	1,000,000	0	2.C PL
04250*-AC-9	ARMSTRONG TRANS GROUP LLC / MAXFRB LLC T		07/31/2024	PIK NOTE BUY UP		1,543	1,543	0	4.C
04940J-AB-9	Atlas Securitized Products Funding 1 LP		07/31/2024	VARIOUS		0	0	(413,148)	1.G PL
04940J-AC-7	Atlas Securitized Products Funding 1 LP		07/31/2024	VARIOUS		0	0	(216,602)	1.G PL
04941*-AA-2	Atlas Securitized Products Funding 1 LP		09/30/2024	VARIOUS		46,630,620	47,302,571	0	1.D PL
04941*-AB-0	Atlas Securitized Products Funding 1 LP		09/30/2024	VARIOUS		23,016,974	23,148,067	0	1.D PL
04941*-AC-8	Atlas Securitized Products Funding 1 LP		09/30/2024	VARIOUS		46,630,620	47,302,571	0	1.G PL
04941*-AD-6	Atlas Securitized Products Funding 1 LP		09/30/2024	VARIOUS		23,016,974	23,148,067	0	1.G PL
000000-00-0	BKF ENGINEERS Senior Term Loa		08/23/2024	BANK LOANS BARINGS		277,778	283,447	0	4.C Z
05566Z-MN-4	BR DSCO II Investco, LLC & BR SCO II-A I		07/01/2024	BANK LOANS BARINGS		9,000,000	9,000,000	0	1.F Z
09262X-AD-3	Blackstone Credit Rated Fund Trust SPV L		09/25/2024	BANK LOANS BARINGS		4,735,337	4,735,337	0	1.G PL
09580*-AA-7	BLUE OCEAN INCOME FUND III LP - Class A		09/09/2024	BANK LOANS BARINGS		890,721	890,721	0	1.G PL
10970*-AA-9	Brinley PD SPV I LLC/Revolving Facility		09/23/2024	BANK LOANS BARINGS		925,000	925,000	0	1.F PL
12625Z-MT-6	CRE II LENDER SUB I, LLC - Term Loan Ser		07/24/2024	BANK LOANS BARINGS		1,177,017	1,177,017	0	1.F Z
12625Z-MU-3	CRE III LENDER SUB I, LLC - Term Loan Ser		08/16/2024	BANK LOANS BARINGS		584,290	584,290	0	1.F Z
14318*-AA-6	CARLYLE SECURED LENDING III SPV, - Senio		09/30/2024	BANK LOANS BARINGS		720,000	720,000	0	2.A PL
000000-00-0	CARRIX INC TERM A-1		08/02/2024	BANK LOANS BARINGS		19,790,000	20,000,000	0	2.A Z
15645*-AA-3	Centric Brands Inc. - 2024 Term Loan A1		09/27/2024	PIK NOTE BUY UP		(61,993)	(61,993)	0	6. PL
15645*-AB-1	Centric Brands Inc. - 2024 Term Loan A2		08/06/2024	PIK NOTE BUY UP		54,113	54,113	0	6. PL
000000-00-0	DF Fund IV Herman - 2024 Fixed Term Loan		07/25/2024	BANK LOANS BARINGS		20,937,000	21,000,000	0	2.B Z
000000-00-0	PEV Holdings 1067 AB LLC		09/25/2024	BANK LOANS BARINGS		13,860,000	14,000,000	0	4.B Z
18685Z-MM-5	CLIFFWATER ENHANCED LENDING FUND-Senior		07/19/2024	BANK LOANS BARINGS		5,749,129	5,749,129	0	1.F Z
18685Z-MN-3	CLIFFWATER ENHANCED LENDING FUND-Senior		07/19/2024	BANK LOANS BARINGS		10,714,286	10,714,286	0	1.F Z
000000-00-0	COMPLY365 LLC DOTL		08/27/2024	BANK LOANS BARINGS		62,053	62,053	0	4.C Z
21079*-AA-6	CONTINENTAL ACQUISITION HOLDINGS INC. -		09/30/2024	PIK NOTE BUY UP		6,537	6,537	0	3.B PL
21079*-AB-4	CONTINENTAL ACQUISITION HOLDINGS INC. -		09/30/2024	PIK NOTE BUY UP		2,410	2,410	0	3.B PL
21257*-AC-8	Convey Health Solutions Inc./Term Loan		09/30/2024	PIK NOTE BUY UP		13,723	13,723	0	3.A PL
000000-00-0	DISA HOLDINGS CORP Incremental DDT		08/13/2024	BANK LOANS BARINGS		24,339	24,339	0	4.C Z
239426-AD-1	DAWSON RATED FUND 6-R1 LP - Secured Clas		09/19/2024	BANK LOANS BARINGS		12,700,987	12,700,987	0	1.G PL
239426-AF-6	DAWSON RATED FUND 6-R1 LP - Secured Clas		09/19/2024	BANK LOANS BARINGS		3,175,247	3,175,247	0	2.C PL
29251*-AB-9	Encina Business Credit SPV LLC Revolving		09/27/2024	BANK LOANS BARINGS		3,520,000	3,520,000	0	2.B Z
30034*-AA-3	EVERLAKE PRIVATE FUND BORROWER, LLC - Se		09/18/2024	BANK LOANS BARINGS		2,166,667	2,166,667	0	2.A PL
31575*-AA-8	First Eagle DCF-A Funding LLC - Revolvin		07/19/2024	BANK LOANS BARINGS		1,779,249	1,779,249	0	3.A PL
000000-00-0	FOREST BUYER LLC DELAYED DRAW TERM LN		08/19/2024	BANK LOANS BARINGS		171,360	171,360	0	4.C Z
000000-00-0	FOREST BUYER LLC 1ST AMEND TERM LN		08/19/2024	BANK LOANS BARINGS		1,388,992	1,403,022	0	4.C Z
34960*-AE-3	Fortis Payment Systems LLC 10TH AMEND TE		08/15/2024	BANK LOANS BARINGS		14,359	14,359	0	4.C
38050*-AA-7	GOJO Industries Inc. - Term Loan		09/30/2024	VARIOUS		7,874,388	8,082,666	0	5.A
40494*-AB-1	HXSG INTERMEDIARY 2 LLC INITIAL DOTL		07/10/2024	BANK LOANS BARINGS		127,724	127,724	0	4.C Z
44961*-AB-1	Implus Footcare LLC/Initial Term Loan 0		09/30/2024	PIK NOTE BUY UP		4,538	4,538	0	3.C PL
45321*-AA-5	Implus Footcare LLC/Spenco Incremental		09/30/2024	PIK NOTE BUY UP		706	706	0	3.C PL
45661*-AA-3	INDUSTRY VENTURES MM HOLDCO, LLC, - Seni		07/26/2024	BANK LOANS BARINGS		10,000,000	10,000,000	0	1.F PL
47235*-AA-2	JEFFERIES DIRECT LENDING FUND II SPE LLC		09/20/2024	BANK LOANS BARINGS		4,452,163	4,452,163	0	2.C PL
47236*-AA-1	JEFFERIES DIRECT LENDING OFFSHORE FD II		09/20/2024	BANK LOANS BARINGS		2,474,657	2,474,657	0	2.C PL
47236*-AA-5	JEFFERIES DIRECT LENDING OFFSHORE FUND I		09/25/2024	BANK LOANS BARINGS		558,208	558,208	0	2.C PL
47236*-AA-3	JEFFERIES DIRECT LENDING FD II C SPE LLC		09/20/2024	BANK LOANS BARINGS		780,989	780,989	0	2.C PL

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 3

Show All Long-Term Bonds and Stock Acquired During the Current Quarter

1	2	3	4	5	6	7	8	9	10
CUSIP Identification	Description	Foreign	Date Acquired	Name of Vendor	Number of Shares of Stock	Actual Cost	Par Value	Paid for Accrued Interest and Dividends	NAIC Designation, NAIC Designation Modifier and SVO Administrative Symbol
47237#-AA-0	JEFFERIES DIRECT LENDING OFFSHORE FUND I		09/20/2024	BANK LOANS BARINGS		2,444,111	2,444,111	0	2.B PL
48633#-AB-6	KAVEH VENTURES LLC SR SECD TERM LN		09/20/2024	BANK LOANS BARINGS		8,379,591	8,379,591	0	1.D Z
48773#-AF-7	Kellermeyer Bergensons Services, LLC - 2		07/31/2024	PIK NOTE BUY UP		30,113	30,113	0	4.B PL
48773#-AH-3	Kellermeyer Bergensons Services, LLC - 2		07/31/2024	PIK NOTE BUY UP		8,946	8,946	0	4.B PL
50541#-AA-5	Laboratories Bidco LLC/Term Loan 9/19		09/30/2024	PIK NOTE BUY UP		1,926	1,926	0	3.C PL
50541#-AB-3	Laboratories Bidco LLC/Second Amendment		09/30/2024	PIK NOTE BUY UP		305	305	0	3.C PL
50541#-AC-1	LABORATORIES BIDCO LLC - THIRD AMENDMENT		09/30/2024	PIK NOTE BUY UP		1,956	1,956	0	3.C PL
50541#-AD-9	LABORATORIES BIDCO LLC - TL		09/30/2024	PIK NOTE BUY UP		9,258	9,258	0	4.C PL
50541#-AE-7	LABORATORIES BIDCO LLC - DELAYED DRAW TE		09/30/2024	PIK NOTE BUY UP		675	675	0	5.B GI
51222#-AN-7	LAKEVIEW LOAN SERVICING Lakeview MSR Tr		08/12/2024	BANK LOANS BARINGS		30,000,000	30,000,000	0	1.F Z
51514*-AA-0	Landmark Equity Partners XVII-B, L.P. -		08/01/2024	BANK LOANS BARINGS		3,376,800	3,376,800	0	1.F PL
51514#-AA-8	LANDMARK EQUITY PARTNERS XVII-D LLC REVO		08/01/2024	BANK LOANS BARINGS		6,146,000	6,146,000	0	1.F PL
52172*-AA-1	LeadsOnline - Term Loan		08/23/2024	PIK NOTE BUY UP		(422)	(422)	0	5.A
54288#-AC-2	LONG TERM CARE GROUP INC AMENDMENT NO 1		07/19/2024	PIK NOTE BUY UP		5,354	5,354	0	5.B
000000-00-0	EMPOWER BRANDS FRANCHISI Term Loan TL US		07/16/2024	BANK LOANS BARINGS		1,166,047	1,202,110	0	4.C Z
55268#-AB-1	MB PURCHASER LLC DDTL		09/06/2024	BANK LOANS BARINGS		141,006	141,006	0	5.B GI
55314#-AR-7	MI OPCO HOLDINGS INC Term Loan TL-B		07/12/2024	BANK LOANS BARINGS		5,806,452	6,451,613	0	4.B Z
60510#-AF-5	Mission Lane Credit Card Master Trust -		08/16/2024	BANK LOANS BARINGS		5,600,000	5,600,000	0	2.B PL
60510#-AG-7	Mission Lane Credit Card Master Trust -		08/16/2024	BANK LOANS BARINGS		26,600,000	26,600,000	0	1.F PL
60510#-B*-8	Mission Lane Credit Card Master Trust -		08/16/2024	BANK LOANS BARINGS		2,800,000	2,800,000	0	3.A PL
62879#-AB-9	NB SOF V ISPV 2022 LLC - Class A Term Lo		09/25/2024	BANK LOANS BARINGS		546,078	546,078	0	1.G PL
62879#-AB-1	NB Select Opportunities ISPV 2022 LLC -		08/27/2024	BANK LOANS BARINGS		3,541,532	3,541,532	0	1.G PL
62879#-AC-9	NB Select Opportunities ISPV 2022 LLC -		08/27/2024	BANK LOANS BARINGS		820,786	820,786	0	2.C PL
62902#-AA-3	NCL III-PE-D LLC / NCL III-PE-E LLC SECD		08/01/2024	BANK LOANS BARINGS		1,708,000	1,708,000	0	1.F PL
62907#-AA-0	NEFCO Holding Company, LLC - Term Loan		08/13/2024	BANK LOANS BARINGS		393,735	395,714	0	4.C
62907#-AB-8	NEFCO Holding Company, LLC - Delayed Dra		08/13/2024	BANK LOANS BARINGS		59,938	60,240	0	4.C
62907#-AC-6	NEFCO Holding Company, LLC - Delayed Dra		08/13/2024	BANK LOANS BARINGS		60,403	60,706	0	4.C
62907#-AD-4	NEFCO Holding Company, LLC - Delayed Dra		08/13/2024	BANK LOANS BARINGS		71,588	71,948	0	4.C
000000-00-0	NEFCO HLDG CO LLC AMEND NO. 3 TERM LN		08/13/2024	BANK LOANS BARINGS		295,359	298,342	0	4.C Z
62931*-AA-2	NMC Skincare Intermediate Holdings II L		09/06/2024	PIK NOTE BUY UP		1,372	1,372	0	3.B PL
62931*-AC-8	NMC Skincare Intermediate Holdings II L		09/06/2024	PIK NOTE BUY UP		462	462	0	3.B PL
000000-00-0	NAW BUYER LLC DELAYED DRAW TERM LN		07/26/2024	BANK LOANS BARINGS		10,713	10,713	0	4.C Z
65658#-AA-2	NORTH HAVEN FALCON BUYER LLC - TERM LOA		08/22/2024	PIK NOTE BUY UP		3,798	3,798	0	3.C PL
65658#-AB-0	NORTH HAVEN FALCON BUYER LLC - DELAYED		09/30/2024	PIK NOTE BUY UP		704	704	0	3.C PL
67008*-AA-9	NOVIPAK BUYER LLC INITIAL TERM LN		09/30/2024	PIK NOTE BUY UP		1,356	1,356	0	2.C PL
67080#-A*-8	NXT Capital Structured Note I, LLC - Cla		08/28/2024	BANK LOANS BARINGS		5,495,845	5,495,845	0	1.A PL
68144#-AB-6	Olympia Acquisition, Inc-2022 2nd Amendn		08/30/2024	PIK NOTE BUY UP		866	866	0	4.C PL
68144#-AC-4	Olympia Acquisition, Inc - 2022 2nd Amen		09/20/2024	PIK NOTE BUY UP		5,200	5,200	0	4.C PL
68144#-AD-2	Olympia Acquisition, Inc-2022 Rolled Ter		08/30/2024	PIK NOTE BUY UP		20,074	20,074	0	4.C PL
68144#-AE-0	Olympia Acquisition, Inc - 2023 First Ou		09/20/2024	PIK NOTE BUY UP		1,311	1,311	0	4.C PL
69451*-AC-3	PPW AERO BUYER INC INCREMENTAL DDTL		09/20/2024	BANK LOANS BARINGS		1,191,406	1,191,406	0	4.C Z
72305#-AA-7	PINEBRIDGE PRIVATE CREDIT III HOLDINGS L		08/29/2024	BANK LOANS BARINGS		491,667	491,667	0	1.G PL
73112#-AB-6	Policy Services Company, 1L PIK Toggle T		07/24/2024	PIK NOTE BUY UP		81,881	81,881	0	5.B Z
73112#-AC-4	Policy Services Company, 1L PIK Toggle D		07/24/2024	VARIOUS		29,007	29,007	0	5.B Z
74066*-AA-4	PREMIER SPECIALTIES INC. - TERM LOAN		09/30/2024	PIK NOTE BUY UP		3,509	3,509	0	3.B PL
74142#-AJ-8	Pretium Packaging LLC New 1st Out Ter		08/01/2024	PIK NOTE BUY UP		1,035	1,035	0	4.B FE
74142#-AK-5	Pretium Packaging LLC New 2nd Out Ter		08/01/2024	PIK NOTE BUY UP		1,968	1,968	0	5.B FE
74354#-AA-1	PROJECT ESSENTIAL BIDCO LLC - TERM LOAN		08/28/2024	PIK NOTE BUY UP		3,161	3,161	0	4.A PL

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 3

Show All Long-Term Bonds and Stock Acquired During the Current Quarter

1	2	3	4	5	6	7	8	9	10
CUSIP Identification	Description	Foreign	Date Acquired	Name of Vendor	Number of Shares of Stock	Actual Cost	Par Value	Paid for Accrued Interest and Dividends	NAIC Designation, NAIC Designation Modifier and SVO Administrative Symbol
74363#-AA-0	PROSPECT INTER HLDGS LLC/PROSPECT PHYSIC		07/03/2024	PIK NOTE BUY UP		116,774	116,774	0	4.A Z
000000-00-0	RPX CORP Term Loan		08/02/2024	BANK LOANS BARINGS		1,562,497	1,586,292	0	4.C Z
75279#-AB-2	RANDYS HLDGS INC DELAYED DRAW TERM LOAN		07/15/2024	BANK LOANS BARINGS		62,326	62,326	0	4.C Z
75645#-AA-9	Red Cedar Holdings BLP Cl A Ln		07/26/2024	BANK LOANS BARINGS		6,667,500	6,667,500	0	1.D PL
78029#-AG-4	ROYAL HOLDCO CORP DELAYED DRAW TERM LN B		09/10/2024	BANK LOANS BARINGS		107,010	107,010	0	2.C PL
78503#-AA-4	SPV FACILITY I LLC - Senior Secured Revo		09/27/2024	BANK LOANS BARINGS		14,100,000	14,100,000	0	1.G Z
81272*-AB-7	Seattle Soccer LLC - 2023 Multi Draw Ter		09/12/2024	VARIOUS		3,666,014	3,666,014	0	2.A PL
816307-A#-1	SelectQuote Inc./Term Loan 10/19		09/30/2024	PIK NOTE BUY UP		5,548	5,548	0	3.C PL
82419*-AC-7	Shermco Intermediate Holdings Inc. - 202		09/18/2024	BANK LOANS BARINGS		15,187	15,187	0	3.B PL
000000-00-0	SPATCO ENERGY SOLUTIONS INC CLOSING DT T		07/23/2024	BANK LOANS BARINGS		1,444,901	1,474,389	0	4.C Z
84729#-AB-6	SPATCO ENERGY SOLUTIONS Tranche A DDTL		08/30/2024	BANK LOANS BARINGS		235,902	235,902	0	4.C Z
000000-00-0	SPATCO ENERGY SOLUTIONS DDTL B		08/30/2024	BANK LOANS BARINGS		29,488	29,488	0	4.C Z
000000-00-0	SPRUCE POWER HOLDING COR Spruce SET Borr		07/02/2024	BANK LOANS BARINGS		19,166,667	19,166,667	0	1.D Z
85789#-AB-0	STEALTH HOLDING LLC - DELAYED DRAW TERM		07/11/2024	BANK LOANS BARINGS		(10,900)	(10,900)	0	4.C PL
88167#-AA-8	Tetragon Financial Group (Delaware) LLC		07/12/2024	BANK LOANS BARINGS		5,000,000	5,000,000	0	1.F PL
92213L-AE-3	VARAGON STRUCTURED NOTES ISSUER I, LLC -		09/06/2024	BANK LOANS BARINGS		1,890,651	1,890,651	0	1.A PL
928432-A#-0	Visual Edge Technology, Inc./Last Out T		08/22/2024	PIK NOTE BUY UP		18,702	18,702	0	5.B PL
92974*-AC-3	WSP FC Acquisition LLC/Third Amendment		09/30/2024	PIK NOTE BUY UP		3,964	3,964	0	3.B Z
96524K-AB-6	WHITEHORSE LIQUIDITY PARTNERS V-R LP TER		09/20/2024	BANK LOANS BARINGS		7,960,756	7,482,883	0	2.C PL
96524K-AC-4	WHITEHORSE LIQUIDITY PARTNERS V-R LP TER		09/20/2024	BANK LOANS BARINGS		8,161,672	7,482,883	0	3.C PL
96524K-AD-2	WHITEHORSE LIQUIDITY PARTNERS V-R LP, -C		09/20/2024	BANK LOANS BARINGS		653,593	653,593	0	1.G PL
98415D-A#-3	XIFIN Inc./Term Loan 02/20		07/26/2024	PIK NOTE BUY UP		(204)	(204)	0	3.B PL
98876*-AE-5	ZB Holdco LLC - 2023 Incremental Delayed		08/05/2024	BANK LOANS BARINGS		72,771	72,771	0	3.B PL
000000-00-0	Kings III - Delayed Draw Term Loan		08/29/2024	BANK LOANS BARINGS		51,874	51,874	0	5.B GI
000000-00-0	NP Inc. - NP Line of Credit First Lien R		07/11/2024	BANK LOANS BARINGS		1,370,298	1,370,298	0	6. *
000000-00-0	Warner Pacific Insurance Services - Dela		07/01/2024	BANK LOANS BARINGS		6,726	6,726	0	4.C Z
000000-00-0	OCULAR THERAPEUTIX INC First Lien Term		09/11/2024	BANK LOANS BARINGS		7,943,000	6,500,000	0	6. *
000000-00-0	Checkout Holding Corp. - 2023 Exit Term		09/13/2024	PIK NOTE BUY UP		6,714	6,714	0	5.B GI
000000-00-0	ZIYAD INC 2024-1 DDTL		09/27/2024	BANK LOANS BARINGS		78,863	78,863	0	4.C Z
000000-00-0	TECH 7 Super Senior EU		08/28/2024	BANK LOANS BARINGS		41,112	41,112	0	5.B Z
BGS2GA-NM-7	AirX Climate Solutions Inc		07/03/2024	BANK LOANS BARINGS		477,353	484,622	0	4.C Z
000000-00-0	JETBLUE AIRWAYS CORPORAT Term Loan Class		08/16/2024	BANK LOANS BARINGS		1,020,989	1,020,989	0	2.A Z
000000-00-0	TIPCO TECHNOLOGIES Senior Term Loa		09/03/2024	BANK LOANS BARINGS		147,239	149,481	0	4.B Z
000000-00-0	JETBLUE AIRWAYS CORPORAT Term Loan Tranc		08/16/2024	BANK LOANS BARINGS		1,175,381	1,175,381	0	2.A Z
000000-00-0	JETBLUE AIRWAYS CORPORAT Term Loan Tranc		08/16/2024	BANK LOANS BARINGS		3,106,459	3,106,459	0	2.B Z
000000-00-0	VICINITY ENERGY INC Term Loan		09/12/2024	BANK LOANS BARINGS		6,917,400	7,000,000	0	2.B Z
000000-00-0	CALDWELL & GREGORY LLC 1L Term Loan		09/30/2024	BANK LOANS BARINGS		1,107,321	1,124,184	0	4.C Z
G8656#-AA-9	TPG TIGER HOLDCO, LLC, - Class A Term Lo		09/20/2024	BANK LOANS BARINGS		1,509,438	1,509,438	0	1.G PL
G8656#-AB-7	TPG TIGER HOLDCO, LLC, - Class B Term Lo		09/20/2024	BANK LOANS BARINGS		503,146	503,146	0	2.B PL
14741#-AB-9	Cascade Services - Delayed Draw Term Loa		08/15/2024	BANK LOANS BARINGS		122,999	122,999	0	4.C Z
000000-00-0	PEV Holdings 1066 AB LLC	C.	09/25/2024	BANK LOANS BARINGS		11,880,000	12,000,000	0	4.B Z
000000-00-0	INFONIGA HLDG GMBH EUR FACILITY B2	B.	08/23/2024	BANK LOANS BARINGS		620,376	620,375	0	4.C Z
000000-00-0	Tech 8 SASU New Money A1 Fa	B.	09/30/2024	PIK NOTE BUY UP		15,374	15,374	0	6. *
BGS2BL-MZ-0	WEBCENTRAL DEH Incremental TLB	B.	09/05/2024	BANK LOANS BARINGS		2,448,515	2,524,242	0	4.C Z
000000-00-0	WEBCENTRAL DEH Incremental CAF	B.	08/09/2024	BANK LOANS BARINGS		252,078	252,078	0	4.C Z
000000-00-0	PRODUCTLIFE GROUP SA Incremental DDT	B.	09/25/2024	BANK LOANS BARINGS		715,211	715,210	0	4.C Z
000000-00-0	PINARD EMBALLAGES SAS Unitranche		09/26/2024	BANK LOANS BARINGS		4,544,496	4,649,102	0	4.B Z
000000-00-0	XPFIBRE SAS Senior Term Loa	B.	08/30/2024	BANK LOANS BARINGS		12,155,000	12,155,005	0	2.B Z
000000-00-0	A&W HLDG GMBH EUR FAC B1		07/11/2024	BANK LOANS BARINGS		4,826,421	4,924,918	0	4.C Z

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 3

Show All Long-Term Bonds and Stock Acquired During the Current Quarter

1	2	3	4	5	6	7	8	9	10
CUSIP Identification	Description	Foreign	Date Acquired	Name of Vendor	Number of Shares of Stock	Actual Cost	Par Value	Paid for Accrued Interest and Dividends	NAIC Designation, NAIC Designation Modifier and SVO Administrative Symbol
66684@-AA-9	OHA Credit Solutions Master Fund I SPV,	C.....	08/02/2024	BANK LOANS BARINGS .....	.....	.....1,542,942	1,542,942	0	1.F PL
L4807*-AA-2	HL SCOPE MASTER SICAV-RAIF SCSp - Senior	D.....	09/10/2024	BANK LOANS BARINGS .....	.....	.....17,774,485	17,774,485	0	1.F PL
L9714*-AA-3	WEST STREET EUROPEAN PRIVATE CREDIT MM S	B.....	09/25/2024	BANK LOANS BARINGS .....	.....	.....10,525,288	10,525,291	0	1.G PL
L9714*-AC-9	WEST STREET EUROPEAN PRIVATE CREDIT MM S	B.....	09/25/2024	BANK LOANS BARINGS .....	.....	.....10,646,714	10,646,717	0	1.G PL
000000-00-0	KEYSTONE BIDCO BV EUR FAC B TRANCHE B2	B.....	08/29/2024	BANK LOANS BARINGS .....	.....	.....2,970,676	3,039,055	0	4.C Z
000000-00-0	VIRTUAL IT GROUP PTY LTD Senior Term Loa .....	.....	.....07/01/2024	BANK LOANS BARINGS .....	.....	.....1,892,006	1,945,508	0	4.C Z
1909999999. Subtotal - Bonds - Unaffiliated Bank Loans						575,727,475	576,745,006	(629,750)	XXX
2509999997. Total - Bonds - Part 3						2,694,184,054	2,714,241,263	7,731,876	XXX
2509999998. Total - Bonds - Part 5						XXX	XXX	XXX	XXX
2509999999. Total - Bonds						2,694,184,054	2,714,241,263	7,731,876	XXX
30767E-40-6	Farm Credit Bank of Texa-FARM CREDIT BAN .....	.....	.....07/31/2024	SEAPORT GROUP	6,383.000	647,875	0.00	0	2.B FE
61762V-83-8	Morgan Stanley-MORGAN STANLEY .....	.....	.....07/23/2024	MORGAN	1,000,000.000	25,000,000	0.00	0	2.C FE
09069Z-ZG-9	BIOWISH TECHNOLOGIES SERIES F PERP PFD	C.....	09/05/2024	REINVEST	3,248,941.000	160,485	0.00	0	6. *
29359U-10-9	Enstar Group Ltd-PREFERRED STOCK	D.....	08/05/2024	SEAPORT GROUP	490,000.000	10,068,300	0.00	0	2.C FE
4019999999. Subtotal - Preferred Stocks - Industrial and Miscellaneous (Unaffiliated) Perpetual Preferred						35,876,660	XXX	0	XXX
03770@-10-0	APOLLO ASSET-BACKED FINANCE LENDING COMP .....	.....	.....09/03/2024	DIRECT	8,250.000	8,250.000	0.00	0	6.A PL
000000-00-0	DISH DBS Issuer Pfd 6/29 .....	.....	.....09/27/2024	DIRECT	466,667.000	45,033,366	0.00	0	6. *
4029999999. Subtotal - Preferred Stocks - Industrial and Miscellaneous (Unaffiliated) Redeemable Preferred						53,283,366	XXX	0	XXX
4509999997. Total - Preferred Stocks - Part 3						89,160,026	XXX	0	XXX
4509999998. Total - Preferred Stocks - Part 5						XXX	XXX	XXX	XXX
4509999999. Total - Preferred Stocks						89,160,026	XXX	0	XXX
23345M-10-7	DT Midstream Inc-COMMON STOCK .....	.....	.....08/20/2024	BLOOMBERG TRADEBOOK	213.000	16,054	.....	.....0	.....
388689-10-1	GRAPHIC PACKAGING HOLDIN-COMMON STOCK .....	.....	.....09/11/2024	BLOOMBERG TRADEBOOK	4,000.000	115,705	.....	.....0	.....
49456B-10-1	Kinder Morgan Inc/DE-KINDER MORGAN INC .....	.....	.....08/21/2024	BLOOMBERG TRADEBOOK	19,167.000	402,365	.....	.....0	.....
695156-10-9	PACKAGING CORP OF AMERIC-COMMON STOCK .....	.....	.....09/11/2024	BLOOMBERG TRADEBOOK	800.000	162,773	.....	.....0	.....
701094-10-4	Parker-Hannifin Corp-COMMON STOCK .....	.....	.....09/11/2024	BLOOMBERG TRADEBOOK	300.000	174,406	.....	.....0	.....
958669-10-3	Western Midstream Partne-COMMON STOCK .....	.....	.....08/21/2024	BLOOMBERG TRADEBOOK	12,598.000	483,453	.....	.....0	.....
969457-10-0	WILLIAMS COS INC COMMON STK .....	.....	.....08/22/2024	BLOOMBERG TRADEBOOK	6,990.000	313,048	.....	.....0	.....
000000-00-0	SPATCO ENERGY SOLUTIONS LLC .....	.....	.....07/23/2024	3843	68,557.000	68,557	.....	.....0	.....
067901-10-8	Barrick Gold Corp-COMMON STOCK .....	.....	.....09/11/2024	BLOOMBERG TRADEBOOK	4,000.000	78,621	.....	.....0	.....
000000-00-0	TCS Squeeze Out Share Warrant	B.....	09/05/2024	BARINGSLLC	46.000	81	.....	.....0	.....
5019999999. Subtotal - Common Stocks - Industrial and Miscellaneous (Unaffiliated) Publicly Traded						1,815,063	XXX	0	XXX
78463V-10-7	SPDR Gold Shares-ETF .....	.....	.....07/18/2024	BLOOMBERG TRADEBOOK	2,500.000	568,009	.....	.....0	.....
5819999999. Subtotal - Common Stocks - Exchange Traded Funds						568,009	XXX	0	XXX
5989999997. Total - Common Stocks - Part 3						2,383,072	XXX	0	XXX
5989999998. Total - Common Stocks - Part 5						XXX	XXX	XXX	XXX
5989999999. Total - Common Stocks						2,383,072	XXX	0	XXX
5999999999. Total - Preferred and Common Stocks						91,543,098	XXX	0	XXX
6009999999 - Totals						2,785,727,152	XXX	7,731,876	XXX

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Identification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..36179X-NF-9	Ginnie Mae II Pool-POOL #MA8490		09/01/2024	PAYDOWN		589,275	589,275	590,104	590,051	0	(776)	0	(776)	0	589,275	0	0	0	22,155	12/01/2052	1.A
..36179Y-QW-9	Ginnie Mae II Pool-POOL #MA8569		09/01/2024	PAYDOWN		629,977	629,977	634,505	634,229	0	(4,252)	0	(4,252)	0	629,977	0	0	0	23,601	01/01/2053	1.A
..36179Y-AS-3	Ginnie Mae II Pool-POOL #MA9017		09/01/2024	PAYDOWN		709,226	709,226	702,410	702,616	0	6,610	0	6,610	0	709,226	0	0	0	40,009	07/01/2053	1.A
..36179Y-DK-7	Ginnie Mae II Pool-POOL #MA9106		09/01/2024	PAYDOWN		1,239,725	1,239,725	1,228,571	1,228,929	0	10,797	0	10,797	0	1,239,725	0	0	0	45,748	08/01/2053	1.A
..38375B-4Z-2	Government National Mort-GNR 2013-H16 FI		09/01/2024	PAYDOWN		0	0	65,052	66,437	0	16,189	0	16,189	0	0	0	0	0	5,251	07/01/2063	1.A
..38375U-CG-3	Government National Mort-GNR 2014-H02 AI		09/01/2024	PAYDOWN		0	0	69,789	61,549	0	10,650	0	10,650	0	0	0	0	0	5,269	12/01/2063	1.A
..38375U-DC-1	Government National Mort-GNR 2014-H01 AI		09/01/2024	PAYDOWN		0	0	246,253	190,357	0	661	0	661	0	0	0	0	0	26,091	01/01/2064	1.A
..38375U-EF-3	Government National Mort-GNR 2014-H03 IS		09/01/2024	PAYDOWN		0	0	82,282	63,529	0	(1,548)	0	(1,548)	0	0	0	0	0	7,754	02/01/2064	1.A
..38375U-MV-9	Government National Mort-GNR 2014-H16 BI		09/01/2024	PAYDOWN		0	0	182,070	96,773	0	(3,298)	0	(3,298)	0	0	0	0	0	15,406	07/01/2064	1.A
..38375U-NQ-9	Government National Mort-GNR 2014-H17 DI		09/01/2024	PAYDOWN		0	0	205,541	109,892	0	(2,262)	0	(2,262)	0	0	0	0	0	16,137	08/01/2064	1.A
..38375U-PT-1	Government National Mort-GNR 2014-H19 EI		09/01/2024	PAYDOWN		0	0	57,550	36,563	0	175	0	175	0	0	0	0	0	4,549	09/01/2064	1.A
..38375U-RD-4	Government National Mort-GNR 2014-H23 AI		09/01/2024	PAYDOWN		0	0	249,450	181,235	0	14,700	0	14,700	0	0	0	0	0	4,106	11/01/2064	1.A
..38375U-UY-4	Government National Mort-GNR 2015-H08 BI		09/01/2024	PAYDOWN		0	0	184,586	146,139	0	17,037	0	17,037	0	0	0	0	0	5,391	03/01/2065	1.A
..38382A-3P-8	Government National Mort-GNR 2019-140 SE		09/20/2024	PAYDOWN		0	0	14,770	22,132	0	(1,380)	0	(1,380)	0	0	0	0	0	402	11/20/2049	1.A
..38382C-K5-9	Government National Mort-GNR 2020-17 PS		09/20/2024	PAYDOWN		0	0	45,542	60,393	0	(3,831)	0	(3,831)	0	0	0	0	0	1,160	01/20/2050	1.A
..38382C-M3-2	Government National Mort-GNR 2020-17 QS		09/20/2024	PAYDOWN		0	0	18,019	23,045	0	(1,342)	0	(1,342)	0	0	0	0	0	456	01/20/2050	1.A
..38382C-YR-6	Government National Mort-GNR 2020-18 SW		09/20/2024	PAYDOWN		0	0	140,854	200,628	0	(11,976)	0	(11,976)	0	0	0	0	0	3,116	02/20/2050	1.A
..38382D-UT-4	Government National Mort-GNR 2020-31 ST		09/20/2024	PAYDOWN		0	0	63,029	87,346	0	(5,467)	0	(5,467)	0	0	0	0	0	1,354	03/20/2050	1.A
..38382D-VF-3	Government National Mort-GNR 2020-31 HS		09/20/2024	PAYDOWN		0	0	15,271	8,431	0	(2,017)	0	(2,017)	0	0	0	0	0	353	05/20/2046	1.A
..38382F-BU-7	Government National Mort-GNR 2020-77 SU		09/20/2024	PAYDOWN		0	0	46,387	43,253	0	(2,530)	0	(2,530)	0	0	0	0	0	904	09/20/2047	1.A
..38382F-BW-3	Government National Mort-GNR 2020-77 SQ		09/20/2024	PAYDOWN		0	0	34,077	60,551	0	(4,442)	0	(4,442)	0	0	0	0	0	769	08/20/2049	1.A
..38382F-NZ-3	Government National Mort-GNR 2020-62 JS		09/20/2024	PAYDOWN		0	0	102,730	93,162	0	(5,592)	0	(5,592)	0	0	0	0	0	1,794	05/20/2050	1.A
..38382G-BE-1	Government National Mort-GNR 2020-86 US		09/20/2024	PAYDOWN		0	0	56,545	105,649	0	(7,151)	0	(7,151)	0	0	0	0	0	1,571	01/20/2050	1.A
..38382G-BH-4	Government National Mort-GNR 2020-86 KS		09/20/2024	PAYDOWN		0	0	64,640	63,066	0	0	0	0	0	0	0	0	0	0	06/20/2050	1.A
..38382G-CT-7	Government National Mort-GNR 2020-86 SK		09/20/2024	PAYDOWN		0	0	94,265	99,881	0	(6,046)	0	(6,046)	0	0	0	0	0	1,733	06/20/2050	1.A
..38382H-YB-0	Government National Mort-GNR 2020-116 EI		09/01/2024	PAYDOWN		0	0	35,264	30,889	0	(2,308)	0	(2,308)	0	0	0	0	0	4,234	08/01/2050	1.A
..38382K-IV-1	Government National Mort-GNR 2020-146 LI		09/01/2024	PAYDOWN		0	0	84,332	74,636	0	(5,570)	0	(5,570)	0	0	0	0	0	9,960	10/01/2050	1.A
..38382L-UB-8	Government National Mort-GNR 2020-176 SQ		09/20/2024	PAYDOWN		0	0	22,295	20,399	0	(1,096)	0	(1,096)	0	0	0	0	0	516	11/20/2050	1.A
..38382L-R7-8	Government National Mort-GNR 2020-185 YI		09/01/2024	PAYDOWN		0	0	116,846	99,721	0	(7,641)	0	(7,641)	0	0	0	0	0	12,933	12/01/2050	1.A
..38382M-CJ-6	Government National Mort-GNR 2020-189 SN		09/20/2024	PAYDOWN		0	0	29,007	26,009	0	0	0	0	0	0	0	0	0	0	12/20/2050	1.A
..38382M-E8-8	Government National Mort-GNR 2021-9 DI		09/01/2024	PAYDOWN		0	0	115,482	96,963	0	(7,436)	0	(7,436)	0	0	0	0	0	13,540	01/01/2051	1.A
..38382M-Z6-9	Government National Mort-GNR 2021-15 SQ		09/20/2024	PAYDOWN		0	0	48,705	43,423	0	0	0	0	0	0	0	0	0	0	10/20/2050	1.A
0109999999. Subtotal - Bonds - U.S. Governments						3,168,203	3,168,203	5,646,223	5,367,876	0	(11,142)	0	(11,142)	0	3,168,203	0	0	0	276,262	XXX	XXX
..686053-GG-8	Oregon School Boards Ass-GENERAL OBLIGAT		09/30/2024	SINKING PAYMENT		0	0	0	0	0	0	0	0	0	0	0	0	0	36,827	06/30/2028	1.C FE
0509999999. Subtotal - Bonds - U.S. States, Territories and Possessions						0	0	0	0	0	0	0	0	0	0	0	0	0	36,827	XXX	XXX
..129775-EM-0	City of Cathoun GA-GENERAL OBLIGATION		09/01/2024	MATURITY		1,000,000	1,000,000	1,000,000	1,000,000	0	0	0	0	0	1,000,000	0	0	0	48,210	09/01/2024	1.B FE
..134141-ZE-3	Campbell Union School Di-GENERAL OBLIGAT		08/01/2024	CALL 100		650,000	650,000	650,000	650,000	0	0	0	0	0	650,000	0	0	0	35,139	08/01/2027	1.B FE
..718814-ZZ-2	PHOENIX AZ-BUILD AMERICA GENERAL OBLIGAT		07/01/2024	CALL 100		1,555,000	1,555,000	1,846,127	1,708,473	0	22,671	0	22,671	0	1,731,144	0	(176,144)	(176,144)	81,933	07/01/2034	1.B FE
0709999999. Subtotal - Bonds - U.S. Political Subdivisions of States, Territories and Possessions						3,205,000	3,205,000	3,496,127	3,358,473	0	22,671	0	22,671	0	3,381,144	0	(176,144)	(176,144)	165,282	XXX	XXX
..01026C-AD-3	Alabama Economic Settle-REVENUE BONDS		09/16/2024	MRB002A		11,895,600	12,000,000	12,245,830	12,155,973	0	(10,247)	0	(10,247)	0	12,145,726	0	(250,126)	(250,126)	514,402	09/15/2032	1.G FE
..041083-VB-9	Arkansas Development Fin-REVENUE BONDS		07/05/2025	CALL 100		1	1	1	1	0	0	0	0	0	0	0	0	0	(17)	07/01/2043	1.B FE
..196479-F9-5	Colorado Housing and Fin-REVENUE BONDS		09/01/2024	CALL 100		72,375	72,375	74,530	73,260	0	(159)	0	(159)	0	73,101	0	(726)	(726)	2,347	03/01/2048	1.A FE
..196479-V4-8	Colorado Housing and Fin-REVENUE BONDS		08/01/2024	CALL 100		24,125	24,125	24,833	24,464	0	(40)	0	(40)	0	24,424	0	(299)	(299)	676	11/01/2048	1.A FE
..196480-EX-1	Colorado Housing and Fin-REVENUE BONDS		08/01/2024	CALL 100		79,188	79,188	79,188	79,188	0	0	0	0	0	79,188	0	0	0	1,701	01/01/2050	1.A FE
..25477P-NF-8	District of Columbia Hou-REVENUE BONDS		08/15/2024	CALL 100		45,495	45,495	45,495	45,495	0	0	0	0	0	45,495	0	0	0	1,176	06/15/2045	1.B FE
..29270C-WJ-0	Energy Northwest-REVENUE BONDS		07/01/2024	MATURITY		1,000,000	1,000,000	1,000,000	1,000,000	0	0	0	0	0	1,000,000	0	0	0	57,100	07/01/2024	1.C FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..296122-UT-9	Escambia County Housing -REVENUE BONDS .....	.....	08/01/2024	CALL 100 .....	.....	35,730	35,730	35,730	35,730	0	0	0	0	0	35,730	0	0	0	647	11/01/2038	1.A FE
..312931-A6-5	Freddie Mac Gold Pool-FG A84529 .....	.....	09/01/2024	PAYDOWN .....	.....	230	230	233	232	0	(1)	0	(1)	0	230	0	0	0	7	02/01/2039	1.A
..31320Q-AG-1	Freddie Mac Pool-FR SD2707 .....	.....	09/01/2024	PAYDOWN .....	.....	462,351	462,351	454,910	454,944	0	7,407	0	7,407	0	462,351	0	0	0	17,431	04/01/2053	1.A
..31320Q-B9-6	Freddie Mac Pool-FR SD2764 .....	.....	09/01/2024	PAYDOWN .....	.....	432,715	432,715	425,278	425,392	0	7,323	0	7,323	0	432,715	0	0	0	14,481	04/01/2053	1.A
..313398-P7-8	Freddie Mac REMICS-FHR 2334 TD .....	.....	09/01/2024	PAYDOWN .....	.....	1,458	1,458	1,525	1,469	0	(11)	0	(11)	0	1,458	0	0	0	63	07/01/2031	1.A
..313399-B9-7	Freddie Mac REMICS-FHR 2344 SN .....	.....	09/15/2024	PAYDOWN .....	.....	0	0	16,173	0	0	0	0	0	0	0	0	0	0	5	08/15/2031	1.A
..31339G-HQ-7	Freddie Mac REMICS-FHR 2367 SA .....	.....	09/15/2024	PAYDOWN .....	.....	0	0	23,069	0	0	0	0	0	0	0	0	0	0	17	06/15/2031	1.A
..3133JL-UE-7	Freddie Mac Pool-FREDDIE MAC POOL-FR QU7 .....	.....	09/01/2024	PAYDOWN .....	.....	201,565	201,565	203,140	202,903	0	(1,339)	0	(1,339)	0	201,565	0	0	0	2,691	03/01/2051	1.A
..3133KP-Q2-7	Freddie Mac Pool-FR RA7673 .....	.....	09/01/2024	PAYDOWN .....	.....	511,234	511,234	501,568	501,856	0	9,377	0	9,377	0	511,234	0	0	0	17,092	07/01/2052	1.A
..3133KQ-VY-9	Freddie Mac Pool-FR RA8731 .....	.....	09/01/2024	PAYDOWN .....	.....	610,658	610,658	598,986	599,234	0	11,424	0	11,424	0	610,658	0	0	0	20,299	04/01/2053	1.A
..3133KR-BN-3	Freddie Mac Pool-FR RA9045 .....	.....	09/01/2024	PAYDOWN .....	.....	710,445	710,445	699,344	699,495	0	10,950	0	10,950	0	710,445	0	0	0	22,460	05/01/2053	1.A
..3133KR-MX-9	Freddie Mac Pool-FR RA9374 .....	.....	09/01/2024	PAYDOWN .....	.....	710,024	710,024	695,490	695,717	0	14,306	0	14,306	0	710,024	0	0	0	25,306	07/01/2053	1.A
..3133KS-C6-7	Freddie Mac Pool-FR RA9993 .....	.....	09/01/2024	PAYDOWN .....	.....	1,209,178	1,209,178	1,188,395	1,188,722	0	20,456	0	20,456	0	1,209,178	0	0	0	47,618	10/01/2053	1.A
..3133N3-U9-3	Freddie Mac Pool-FREDDIE MAC POOL-FR RE6 .....	.....	09/01/2024	PAYDOWN .....	.....	105,869	105,869	107,632	107,451	0	(1,582)	0	(1,582)	0	105,869	0	0	0	2,715	11/01/2049	1.A
..3133N3-V6-6	Freddie Mac Pool-FREDDIE MAC POOL-FR RE6 .....	.....	09/01/2024	PAYDOWN .....	.....	13,944	13,944	14,146	14,144	0	(200)	0	(200)	0	13,944	0	0	0	323	09/01/2049	1.A
..3133N3-X3-3	Freddie Mac Pool-FREDDIE MAC POOL-FR RE6 .....	.....	09/01/2024	PAYDOWN .....	.....	302,438	302,438	309,715	309,580	0	(7,143)	0	(7,143)	0	302,438	0	0	0	4,880	05/01/2051	1.A
..3133TB-4G-2	Freddie Mac REMICS-FHR 1991 PG .....	.....	09/01/2024	PAYDOWN .....	.....	1,651	1,651	1,711	1,655	0	(4)	0	(4)	0	1,651	0	0	0	66	09/01/2027	1.A
..3133TC-HE-1	Freddie Mac REMICS-FHR 2018 PG .....	.....	09/01/2024	PAYDOWN .....	.....	657	657	694	664	0	(7)	0	(7)	0	657	0	0	0	28	01/01/2028	1.A
..3133TD-3A-2	Freddie Mac REMICS-FHR 2037 HB .....	.....	09/01/2024	PAYDOWN .....	.....	1,742	1,742	1,905	1,775	0	(33)	0	(33)	0	1,742	0	0	0	104	03/01/2028	1.A
..3133TH-S8-1	Freddie Mac REMICS-FHR 2118 PE .....	.....	09/01/2024	PAYDOWN .....	.....	5,738	5,738	6,024	5,795	0	(58)	0	(58)	0	5,738	0	0	0	253	01/01/2029	1.A
..3133TK-EB-2	Freddie Mac REMICS-FHR 2145 S .....	.....	09/15/2024	PAYDOWN .....	.....	0	0	59,676	0	0	0	0	0	0	0	0	0	0	57	04/15/2029	1.A
..3133TR-YA-7	Freddie Mac REMICS-FHR 2292 SI .....	.....	09/15/2024	PAYDOWN .....	.....	0	0	14,159	0	0	0	0	0	0	0	0	0	0	5	11/15/2030	1.A
..3133TS-F2-4	Freddie Mac REMICS-FHR 2303 CK .....	.....	09/01/2024	PAYDOWN .....	.....	1,944	1,944	2,007	1,961	0	(17)	0	(17)	0	1,944	0	0	0	78	04/01/2031	1.A
..3133TU-HJ-0	Freddie Mac REMICS-FHR 2322 SC .....	.....	09/15/2024	PAYDOWN .....	.....	0	0	7,350	0	0	0	0	0	0	0	0	0	0	20	05/15/2031	1.A
..3133TU-S7-4	Freddie Mac REMICS-FHR 2357 QH .....	.....	09/01/2024	PAYDOWN .....	.....	801	801	840	814	0	(13)	0	(13)	0	801	0	0	0	35	09/01/2031	1.A
..31359N-2W-0	Fannie Mae REMICS-FNR 1997-19 PG .....	.....	09/01/2024	PAYDOWN .....	.....	1,952	1,952	2,103	1,958	0	(7)	0	(7)	0	1,952	0	0	0	92	04/01/2027	1.A
..31359V-GF-4	Fannie Mae REMICS-FNR 1999-1 PJ .....	.....	09/01/2024	PAYDOWN .....	.....	6,912	6,912	7,350	7,003	0	(92)	0	(92)	0	6,912	0	0	0	298	02/01/2029	1.A
..3136AC-FK-2	Fannie Mae REMICS-FNR 2013-4 GI .....	.....	09/01/2024	PAYDOWN .....	.....	0	0	17,191	3,480	0	(870)	0	(870)	0	0	0	0	0	1,016	02/01/2043	1.A
..31371K-LU-3	Fannie Mae Pool-POOL #254239 .....	.....	09/01/2024	PAYDOWN .....	.....	91	91	106	98	0	(7)	0	(7)	0	91	0	0	0	4	03/01/2032	1.A
..3137A9-6Y-7	Freddie Mac REMICS-FHR 3850 LS .....	.....	09/01/2024	PAYDOWN .....	.....	0	0	14,972	1,317	0	33	0	33	0	0	0	0	0	(2)	05/01/2039	1.A
..3137AC-TN-9	Freddie Mac REMICS-FHR 3897 LI .....	.....	09/01/2024	PAYDOWN .....	.....	0	0	73,399	20,773	0	(85)	0	(85)	0	0	0	0	0	(12)	01/01/2037	1.A
..3137FA-NH-7	Freddie Mac REMICS-FHR 4709 WI .....	.....	09/01/2024	PAYDOWN .....	.....	0	0	19,105	22,144	0	(307)	0	(307)	0	0	0	0	0	410	10/01/2038	1.A
..3137FI-WI-0	Freddie Mac REMICS-FHR 5020 AI .....	.....	09/01/2024	PAYDOWN .....	.....	0	0	26,242	22,313	0	(1,382)	0	(1,382)	0	0	0	0	0	4,102	09/01/2050	1.A
..31388T-QZ-9	Fannie Mae Pool-POOL #614372 .....	.....	09/01/2024	PAYDOWN .....	.....	470	470	538	498	0	(28)	0	(28)	0	470	0	0	0	22	01/01/2032	1.A
..313921-JK-5	Fannie Mae REMICS-FNR 2001-57 PD .....	.....	09/01/2024	PAYDOWN .....	.....	1,653	1,653	1,743	1,682	0	(29)	0	(29)	0	1,653	0	0	0	71	10/01/2031	1.A
..31392B-SC-1	Fannie Mae REMICS-FNR 2002-6 L .....	.....	09/01/2024	PAYDOWN .....	.....	304	304	316	308	0	(5)	0	(5)	0	304	0	0	0	12	02/01/2032	1.A
..31392C-EM-2	Fannie Mae REMIC Trust 2-FNW 2002-W2 AF5 .....	.....	09/01/2024	PAYDOWN .....	.....	2,988	2,988	2,869	2,988	0	119	0	119	0	2,988	0	0	0	90	06/01/2032	1.A
..31392E-PC-8	Fannie Mae REMICS-FNR 2002-58 PG .....	.....	09/01/2024	PAYDOWN .....	.....	7,579	7,579	7,988	7,716	0	(137)	0	(137)	0	7,579	0	0	0	311	09/01/2032	1.A
..31392H-FC-2	Fannie Mae REMICS-FNR 2002-97 SR .....	.....	09/25/2024	PAYDOWN .....	.....	0	0	38,870	0	0	0	0	0	0	0	0	0	0	44	01/25/2033	1.A
..31392K-SC-6	Freddie Mac REMICS-FHR 2455 GK .....	.....	09/01/2024	PAYDOWN .....	.....	6,352	6,352	6,754	6,494	0	(142)	0	(142)	0	6,352	0	0	0	278	05/01/2032	1.A
..31392M-SR-9	Freddie Mac REMICS-FHR 2448 TX .....	.....	09/01/2024	PAYDOWN .....	.....	7,447	7,447	7,823	7,565	0	(117)	0	(117)	0	7,447	0	0	0	295	05/01/2032	1.A
..31393Y-ED-3	Fannie Mae REMICS-FNR 2004-28 SB .....	.....	09/25/2024	PAYDOWN .....	.....	0	0	11,192	2,010	0	(286)	0	(286)	0	0	0	0	0	206	05/25/2034	1.A
..31396W-BR-6	Fannie Mae REMICS-FNR 2007-56 SN .....	.....	09/25/2024	PAYDOWN .....	.....	0	0	15,456	0	0	0	0	0	0	0	0	0	0	21	06/25/2037	1.A
..31397W-F3-4	Freddie Mac REMICS-FHR 3457 ES .....	.....	09/15/2024	PAYDOWN .....	.....	0	0	3,322	0	0	0	0	0	0	0	0	0	0	2	06/15/2038	1.A
..31398M-EL-6	Fannie Mae REMICS-FNR 2010-14 SJ .....	.....	09/25/2024	PAYDOWN .....	.....	0	0	56,827	1,723	0	(569)	0	(569)	0	0	0	0	0	190	03/25/2040	1.A
..3140HN-LY-6	Fannie Mae Pool-POOL #BK8442 .....	.....	09/01/2024	PAYDOWN .....	.....	151,421	151,421	151,799	151,757	0	(336)	0	(336)	0	151,421	0	0	0	2,022	01/01/2051	1.A

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..3140JS-EP-0	Fannie Mae Pool-POOL #BN9141		09/01/2024	PAYDOWN		341,775	341,775	340,600	340,680	0	1,095	0	1,095	0	341,775	0	0	0	4,290	04/01/2051	1.A
..3140JX-EE-4	Fannie Mae Pool-POOL #B02832		09/01/2024	PAYDOWN		6,138	6,138	6,268	6,232	0	(95)	0	(95)	0	6,138	0	0	0	138	09/01/2049	1.A
..3140K0-EL-8	Fannie Mae Pool-POOL #B04638		09/01/2024	PAYDOWN		15,007	15,007	15,033	15,021	0	(14)	0	(14)	0	15,007	0	0	0	338	11/01/2049	1.A
..3140K2-LK-8	Fannie Mae Pool-POOL #B06629		09/01/2024	PAYDOWN		326,833	326,833	328,416	328,246	0	(1,414)	0	(1,414)	0	326,833	0	0	0	4,361	04/01/2051	1.A
..3140K2-PV-0	Fannie Mae Pool-POOL #B06735		09/01/2024	PAYDOWN		733,016	733,016	734,676	734,447	0	(1,432)	0	(1,432)	0	733,016	0	0	0	9,651	05/01/2051	1.A
..3140OB-N5-3	Fannie Mae Pool-POOL #CA4011		09/01/2024	PAYDOWN		36,422	36,422	36,996	36,941	0	(519)	0	(519)	0	36,422	0	0	0	957	08/01/2049	1.A
..3140OC-DT-0	Fannie Mae Pool-POOL #CA4613		09/01/2024	PAYDOWN		36,318	36,318	36,893	36,856	0	(538)	0	(538)	0	36,318	0	0	0	949	11/01/2049	1.A
..3140OC-PN-0	Fannie Mae Pool-POOL #CA4928		09/01/2024	PAYDOWN		23,128	23,128	23,634	23,624	0	(496)	0	(496)	0	23,128	0	0	0	498	01/01/2050	1.A
..3140OH-NJ-0	Fannie Mae Pool-POOL #CA9392		09/01/2024	PAYDOWN		988,715	988,715	998,293	997,142	0	(8,427)	0	(8,427)	0	988,715	0	0	0	12,488	03/01/2051	1.A
..3140OM-4N-1	Fannie Mae Pool-POOL #CB2628		09/01/2024	PAYDOWN		221,851	221,851	187,880	189,160	0	32,690	0	32,690	0	221,851	0	0	0	3,650	01/01/2052	1.A
..3140OR-EJ-8	Fannie Mae Pool-POOL #CB5536		09/01/2024	PAYDOWN		329,635	329,635	333,394	333,278	0	(3,644)	0	(3,644)	0	329,635	0	0	0	12,303	01/01/2053	1.A
..3140OS-QC-8	Fannie Mae Pool-POOL #CB6750		09/01/2024	PAYDOWN		1,315,512	1,315,512	1,272,494	1,272,943	0	42,569	0	42,569	0	1,315,512	0	0	0	46,638	07/01/2053	1.A
..3140OS-TZ-4	Fannie Mae Pool-POOL #CB6867		09/01/2024	PAYDOWN		1,125,952	1,125,952	1,088,548	1,088,887	0	37,065	0	37,065	0	1,125,952	0	0	0	40,199	08/01/2053	1.A
..3140XL-W6-1	Fannie Mae Pool-POOL #FS5168		09/01/2024	PAYDOWN		474,753	474,753	466,297	466,439	0	8,314	0	8,314	0	474,753	0	0	0	17,410	06/01/2053	1.A
..31416K-NIP-9	Fannie Mae Pool-POOL #AA2453		09/01/2024	PAYDOWN		112	112	113	113	0	(1)	0	(1)	0	112	0	0	0	3	02/01/2039	1.A
..31418D-JW-3	Fannie Mae Pool-POOL #MA3876		09/01/2024	PAYDOWN		37,645	37,645	37,739	37,708	0	(63)	0	(63)	0	37,645	0	0	0	849	12/01/2049	1.A
..31418D-YS-5	Fannie Mae Pool-POOL #MA4320		09/01/2024	PAYDOWN		224,587	224,587	228,939	228,653	0	(4,066)	0	(4,066)	0	224,587	0	0	0	3,745	04/01/2051	1.A
..31418E-T6-7	Fannie Mae Pool-POOL #MA5072		09/01/2024	PAYDOWN		425,496	425,496	422,405	422,424	0	3,073	0	3,073	0	425,496	0	0	0	15,768	07/01/2053	1.A
..31418E-XU-9	Fannie Mae Pool-POOL #MA5190		09/01/2024	PAYDOWN		358,802	358,802	356,559	356,559	0	2,243	0	2,243	0	358,802	0	0	0	13,095	11/01/2053	1.A
..34074M-LW-9	Florida Housing Finance -REVENUE BONDS		07/15/2024	CALL 100		765,000	765,000	765,000	765,000	0	0	0	0	0	765,000	0	0	0	25,430	07/01/2030	1.A FE
..34074M-ND-9	Florida Housing Finance -REVENUE BONDS		08/01/2024	CALL 100		120,612	120,612	120,612	120,612	0	0	0	0	0	120,612	0	0	0	2,473	07/01/2037	1.A FE
..34074M-PF-2	Florida Housing Finance -REVENUE BONDS		08/01/2024	CALL 100		64,293	64,293	64,293	64,293	0	0	0	0	0	64,294	0	(1)	(1)	1,053	01/01/2043	1.A FE
..41980U-AB-7	State of Hawaii Departme-REVENUE BONDS		07/01/2024	CALL 100		224,947	224,947	224,936	224,947	0	0	0	0	0	224,947	0	0	0	10,939	01/01/2031	1.A FE
..45129W-KB-5	Idaho Housing & Finance -REVENUE BONDS		07/15/2024	CALL 100		380,000	380,000	478,754	413,922	0	(1,741)	0	(1,741)	0	412,181	0	(32,181)	(32,181)	24,122	07/15/2028	1.F FE
..45201Y-YL-5	ILLINOIS ST HSG DEV AUTH REV PROG SER B		08/01/2024	CALL 100		23,548	23,548	22,818	22,977	0	11	0	11	0	22,988	0	560	560	432	06/01/2043	1.B FE
..45203L-CT-8	Illinois Housing Develop-REVENUE BONDS		08/28/2024	CALL 100		36,709	36,709	36,709	36,680	0	1	0	1	0	36,682	0	27	27	957	09/01/2034	1.A FE
..567830-BU-7	County of Marin CA-REVENUE BONDS		08/01/2024	CALL 100		1,095,000	1,095,000	1,157,492	1,104,353	0	1,868	0	1,868	0	1,106,221	0	(11,221)	(11,221)	59,240	08/01/2026	1.A FE
..57419R-D6-9	Maryland Community Devel-REVENUE BONDS		08/29/2024	CALL 100		160,000	160,000	165,682	160,721	0	(279)	0	(279)	0	160,443	0	(443)	(443)	5,569	09/01/2047	1.B FE
..575579-WX-1	Massachusetts Bay Transp-REVENUE BONDS		07/02/2024	CALL 101.949997		2,039,000	2,000,000	2,235,020	2,122,444	0	(6,924)	0	(6,924)	0	2,115,521	0	(76,521)	(76,521)	115,701	07/01/2031	1.B FE
..57586N-MW-8	Massachusetts Housing FI-REVENUE BONDS		09/13/2024	VARIOUS		(1,122)	(1,122)	(1,122)	(1,122)	0	0	0	0	0	(1,122)	0	0	0	(19)	12/01/2027	1.C FE
..575898-CS-8	Massachusetts Port Autho-REVENUE BONDS		07/01/2024	CALL 100		200,000	200,000	206,800	0	0	(184)	0	(184)	0	206,616	0	(6,616)	(6,616)	6,202	07/01/2043	1.F FE
..57604P-SP-5	Massachusetts Clean Wate-REVENUE BONDS		08/01/2024	CALL 100		450,000	450,000	537,705	498,878	0	16,262	0	16,262	0	515,140	0	(65,140)	(65,140)	23,364	08/01/2040	1.A FE
..59334H-FU-4	Miami-Dade County Housin-REVENUE BONDS		09/03/2024	CALL 100		20,280	20,280	20,280	20,280	0	0	0	0	0	20,280	0	0	0	385	11/01/2038	1.A FE
..60416Q-FW-9	Minnesota Housing Financ-REVENUE BONDS		08/01/2024	CALL 100		33,699	33,699	32,857	33,049	0	15	0	15	0	33,064	0	635	635	637	09/01/2041	1.A FE
..60416Q-GK-4	Minnesota Housing Financ-REVENUE BONDS		08/01/2024	CALL 100		10,551	10,551	10,551	10,551	0	0	0	0	0	10,551	0	0	0	192	08/01/2046	1.A FE
..60416Q-GM-0	Minnesota Housing Financ-REVENUE BONDS		09/03/2024	CALL 100		10,626	10,626	9,266	9,408	0	23	0	23	0	9,432	0	1,195	1,195	176	10/01/2046	1.A FE
..60416Q-HA-5	Minnesota Housing Financ-REVENUE BONDS		08/01/2024	CALL 100		72,431	72,431	72,431	72,431	0	0	0	0	0	72,431	0	0	0	1,565	03/01/2048	1.A FE
..60416Q-HE-7	Minnesota Housing Financ-REVENUE BONDS		08/01/2024	CALL 100		97,311	97,311	97,311	97,311	0	0	0	0	0	97,311	0	0	0	2,168	09/01/2048	1.A FE
..60416Q-HG-2	Minnesota Housing Financ-REVENUE BONDS		08/01/2024	CALL 100		51,748	51,748	51,748	51,748	0	0	0	0	0	51,748	0	0	0	1,366	11/01/2048	1.A FE
..60416Q-HJ-6	Minnesota Housing Financ-REVENUE BONDS		08/01/2024	CALL 100		45,169	45,169	45,169	45,169	0	0	0	0	0	45,169	0	0	0	1,076	01/01/2049	1.A FE
..60416Q-HL-1	Minnesota Housing Financ-REVENUE BONDS		08/01/2024	CALL 100		81,519	81,519	81,519	81,519	0	0	0	0	0	81,519	0	0	0	1,899	03/01/2049	1.A FE
..60416Q-HN-7	Minnesota Housing Financ-REVENUE BONDS		09/03/2024	CALL 100		7,046	7,046	7,046	7,046	0	0	0	0	0	7,046	0	0	0	135	06/01/2049	1.A FE
..60416Q-HS-6	Minnesota Housing Financ-REVENUE BONDS		08/01/2024	CALL 100		106,205	106,205	106,205	106,205	0	0	0	0	0	106,205	0	0	0	(6,414)	12/01/2049	1.A FE
..60636Y-HL-8	Missouri Housing Develop-REVENUE BONDS		07/01/2024	VARIOUS		30,000	30,000	30,000	30,000	0	0	0	0	0	30,000	0	0	0	1,284	07/01/2028	1.B FE
..60636Y-MJ-7	Missouri Housing Develop-REVENUE BONDS		08/01/2024	CALL 100		4,914	4,914	4,914	4,914	0	0	0	0	0	4,914	0	0	0	176	01/01/2040	1.B FE
..60637B-FA-3	MISSOURI ST HSG DEV COMM-TAXABLE-REF-SPL		09/05/2024	CALL 100		34,359	34,359	34,359	34,359	0	0	0	0	0	34,359	0	0	0	629	08/01/2036	1.B FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Identification	Description	For-eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Design-ation, NAIC Design-ation Modifier and SVO Admini-strative Symbol
..60637B-ML-1	Missouri Housing Develop-REVENUE BONDS .....	.....	08/01/2024	CALL 100 .....	.....	76,551	76,551	74,063	74,605	0	35	0	35	0	74,640	0	1,911	1,911	1,180	06/01/2044	1.B FE
..610763-PF-5	Monroe County Water Auth-REVENUE BONDS .....	.....	08/01/2024	CALL 100 .....	.....	360,000	360,000	360,000	360,000	0	0	0	0	0	360,000	0	0	0	21,218	08/01/2025	1.B FE
..641667-NZ-9	New Albany-Floyd County -REVENUE BONDS .....	.....	07/15/2024	CALL 100 .....	.....	600,000	600,000	600,000	600,000	0	0	0	0	0	600,000	0	0	0	21,101	01/15/2027	1.B FE
..647200-2G-8	New Mexico Mortgage Fina-REVENUE BONDS .....	.....	08/01/2024	CALL 100 .....	.....	48,635	48,635	48,635	48,635	0	0	0	0	0	48,635	0	0	0	874	08/01/2035	1.A FE
..647200-4S-0	New Mexico Mortgage Fina-REVENUE BONDS .....	.....	08/01/2024	CALL 100 .....	.....	90,000	90,000	90,000	90,000	0	0	0	0	0	90,000	0	0	0	1,636	09/01/2040	1.B FE
..64972C-BD-4	New York City Housing De-REVENUE BONDS .....	.....	08/15/2024	CALL 100 .....	.....	11,380	11,380	11,380	11,380	0	0	0	0	0	11,380	0	0	0	232	06/15/2036	1.C FE
..64972C-M6-7	New York City Housing De-REVENUE BONDS .....	.....	08/01/2024	CALL 100 .....	.....	65,554	65,554	65,554	65,629	0	(1)	0	(1)	0	65,628	0	(74)	(74)	1,355	10/01/2046	1.B FE
..677377-2P-7	Ohio Housing Finance Age-REVENUE BONDS .....	.....	08/01/2024	CALL 100 .....	.....	150,000	150,000	150,000	150,000	0	0	0	0	0	150,000	0	0	0	2,674	11/01/2041	1.A FE
..68607D-NK-7	OREGON ST DEPT OF TRANSPRTN-BUILD AMERIC .....	.....	07/10/2024	CALL 103.507004 .....	.....	3,622,745	3,500,000	3,878,770	3,689,494	0	(12,421)	0	(12,421)	0	3,677,073	0	(54,328)	(54,328)	132,148	11/15/2030	1.B FE
..686087-MP-9	State of Oregon Housing -REVENUE BONDS .....	.....	07/01/2024	CALL 100 .....	.....	565,000	565,000	565,000	565,000	0	0	0	0	0	565,000	0	0	0	16,334	07/01/2033	1.C FE
..708797-AN-5	Pennsylvania Housing Fin-REVENUE BONDS .....	.....	08/26/2024	CALL 100 .....	.....	28,165	28,165	28,165	28,150	0	1	0	1	0	28,151	0	14	14	753	08/01/2035	1.A FE
..88275F-NU-9	Texas Department of Hous-REVENUE BONDS .....	.....	08/01/2024	CALL 100 .....	.....	25,000	25,000	25,000	25,006	0	(5)	0	(5)	0	25,001	0	(1)	(1)	667	09/01/2039	1.B FE
..88275F-PA-1	Texas Department of Hous-REVENUE BONDS .....	.....	08/01/2024	CALL 100 .....	.....	32,129	32,129	30,302	30,548	0	22	0	22	0	30,571	0	1,558	1,558	683	09/01/2047	1.B FE
..898365-AM-3	Trustees of Boston Colle-REVENUE BONDS .....	.....	07/01/2024	MATURITY .....	.....	1,220,000	1,220,000	1,220,000	1,220,000	0	0	0	0	0	1,220,000	0	0	0	49,032	07/01/2024	1.D FE
..91412G-GX-7	University of California-REVENUE BONDS .....	.....	08/01/2024	CALL 101.018997 .....	.....	757,642	750,000	790,620	769,717	0	(7,271)	0	(7,271)	0	762,445	0	(4,803)	(4,803)	25,584	05/15/2031	1.C FE
..91476P-GP-7	University of Oklahoma/T-REVENUE BONDS .....	.....	07/01/2024	SINKING PAYMENT .....	.....	1,190,000	1,190,000	1,190,000	1,190,000	0	0	0	0	0	1,190,000	0	0	0	52,122	07/01/2046	1.E FE
..91743P-DD-4	Utah Housing Corp-REVENUE BONDS .....	.....	08/21/2024	CALL 100 .....	.....	26,976	26,976	28,160	28,065	0	(17)	0	(17)	0	28,048	0	(1,072)	(1,072)	739	02/21/2050	1.B FE
..91743P-DE-2	Utah Housing Corp-REVENUE BONDS .....	.....	08/21/2024	CALL 100 .....	.....	7,042	7,042	7,303	7,283	0	(3)	0	(3)	0	7,279	0	(237)	(237)	158	03/21/2050	1.B FE
..92812U-G3-5	Virginia Housing Develop-REVENUE BONDS .....	.....	08/25/2024	CALL 100 .....	.....	63,298	63,298	63,298	63,258	0	1	0	1	0	63,259	0	40	40	1,954	12/25/2043	1.A FE
..92812U-Q4-3	Virginia Housing Develop-REVENUE BONDS .....	.....	08/25/2024	CALL 100 .....	.....	158,064	158,064	158,064	158,064	0	0	0	0	0	158,064	0	0	0	4,049	10/25/2037	1.A FE
..92812U-Q6-8	Virginia Housing Develop-REVENUE BONDS .....	.....	08/25/2024	CALL 100 .....	.....	63,182	63,182	63,182	63,171	0	0	0	0	0	63,171	0	11	11	1,419	06/25/2041	1.A FE
..92812U-Q7-6	Virginia Housing Develop-REVENUE BONDS .....	.....	08/25/2024	CALL 100 .....	.....	186,481	186,481	186,481	186,481	0	0	0	0	0	186,481	0	0	0	3,861	10/25/2049	1.A FE
..92812U-Q8-4	Virginia Housing Develop-REVENUE BONDS .....	.....	08/25/2024	CALL 100 .....	.....	265,445	265,445	265,445	265,445	0	0	0	0	0	265,445	0	0	0	5,275	12/25/2049	1.A FE
..92812U-XB-9	Virginia Housing Develop-REVENUE BONDS .....	.....	09/30/2024	CALL 100 .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	(4,563)	03/25/2038	1.A FE
..92813T-EE-6	Virginia Housing Develop-REVENUE BONDS .....	.....	08/25/2024	CALL 100 .....	.....	165,330	165,330	165,330	165,253	0	2	0	2	0	165,255	0	75	75	3,873	08/25/2042	1.B FE
..93978X-EQ-9	Washington State Housing-REVENUE BONDS .....	.....	08/01/2024	CALL 100 .....	.....	75,000	75,000	75,000	74,944	0	(69)	0	(69)	0	74,875	0	125	125	1,375	09/01/2040	1.A FE
..93978X-ER-7	Washington State Housing-REVENUE BONDS .....	.....	08/01/2024	CALL 100 .....	.....	155,000	155,000	154,303	155,000	0	0	0	0	0	155,000	0	0	0	3,255	05/01/2041	1.A FE
0909999999. Subtotal - Bonds - U.S. Special Revenues						41,818,486	41,753,499	43,133,115	42,027,800	0	151,808	0	151,808	0	42,316,126	0	(497,638)	(497,638)	1,580,593	XXX	XXX
..000366-AA-2	AASET 2017-1 TRUST-SERIES 17-1A CLASS A .....	.....	07/22/2024	VARIOUS .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	6,863	05/16/2042	2.B FE
..00077B-4W-0	ABN Amro Mortgage Corp-AMAC 2002-9 A30 .....	.....	09/01/2024	PAYDOWN .....	.....	280	280	282	273	0	7	0	7	0	280	0	0	0	11	12/01/2032	1.A FM
..000780-ML-6	ABN Amro Mortgage Corp-AMAC 2003-12 2A .....	.....	09/01/2024	PAYDOWN .....	.....	84	84	85	82	0	1	0	1	0	84	0	0	0	3	12/01/2033	1.A FM
..00164T-AA-6	AMC East Communities LLC-SECURED .....	.....	07/15/2024	SINKING PAYMENT .....	.....	292,802	292,802	307,110	295,607	0	(2,805)	0	(2,805)	0	292,802	0	0	0	17,730	01/15/2028	1.F FE
..00184@-AA-4	Amazon (Euclid Oh) Trust Certificate .....	.....	09/30/2024	SINKING PAYMENT .....	.....	36,357	36,357	36,357	36,339	0	18	0	18	0	36,357	0	0	0	1,104	06/30/2039	1.D
..00191#-AA-3	Amazon (Tucson Az) Trust Certificate .....	.....	09/30/2024	SINKING PAYMENT .....	.....	39,268	39,268	39,268	39,236	0	32	0	32	0	39,268	0	0	0	1,207	08/31/2039	1.D
..00191@-AA-5	Amazon (Oklahoma City Ok Trust Certifica .....	.....	09/30/2024	SINKING PAYMENT .....	.....	74,146	74,146	74,146	74,138	0	8	0	8	0	74,146	0	0	0	2,356	09/30/2039	1.E
..00193*-AA-5	Amazon (Tulsa Ok) Trust Certificate .....	.....	09/30/2024	SINKING PAYMENT .....	.....	77,525	77,525	77,525	77,521	0	4	0	4	0	77,525	0	0	0	2,465	09/30/2039	1.D
..00195#-AA-9	Amazon (Toledo Oh) Trust Certificate .....	.....	09/30/2024	SINKING PAYMENT .....	.....	127,759	127,759	127,759	127,759	0	0	0	0	0	127,759	0	0	0	3,545	10/31/2040	1.D
..00225#-AA-3	Amazon (Grand Rapids, M Trust Certifica .....	.....	09/30/2024	SINKING PAYMENT .....	.....	36,340	36,340	36,340	36,312	0	27	0	27	0	36,340	0	0	0	1,118	09/30/2039	1.D
..002939-AD-8	A&D Mortgage Trust 2024-ADMT 2024-NQM4 .....	.....	09/01/2024	PAYDOWN .....	.....	17,485	17,485	17,484	0	0	0	0	0	0	17,485	0	0	0	82	08/01/2069	1.D FE
..002939-AE-6	A&D Mortgage Trust 2024-ADMT 2024-NQM4 .....	.....	09/01/2024	PAYDOWN .....	.....	34,969	34,969	34,969	0	0	0	0	0	0	34,969	0	0	0	170	08/01/2069	1.G FE
..00432C-CW-9	ACCESS GROUP INC-SERIES 2005-B CLASS A3 .....	.....	07/25/2024	PAYDOWN .....	.....	48,857	48,857	45,071	48,135	0	723	0	723	0	48,857	0	0	0	2,345	07/25/2035	1.A FE
..00436M-AA-3	Accelerated Assets 2018-AALLC 2018-1 A .....	.....	09/02/2024	PAYDOWN .....	.....	138,313	138,313	138,278	138,296	0	17	0	17	0	138,313	0	0	0	3,589	12/02/2033	1.F FE
..007036-GS-9	Adjustable Rate Mortgage-ARMT 2005-2 2A1 .....	.....	09/01/2024	PAYDOWN .....	.....	1,558	1,558	1,457	1,512	0	(169)	0	(169)	0	1,558	0	0	0	158	06/01/2035	1.A FM
..007036-SE-7	Adjustable Rate Mortgage-ARMT 2005-9 5A1 .....	.....	09/25/2024	PAYDOWN .....	.....	33,651	33,651	23,474	41,909	0	(8,258)	0	(8,258)	0	33,651	0	0	0	1,123	11/25/2035	1.A FM
..00703Q-AD-4	Adjustable Rate Mortgage-ARMT 2006-3 4A1 .....	.....	08/26/2024	PAYDOWN .....	.....	58,339	58,339	31,378	22,759	0	35,738	158	35,580	0	58,339	0	0	0	908	08/25/2036	1.A FM
..008513-AA-1	Agree LP-SENIOR UNSECURED .....	.....	09/18/2024	MRB002A .....	.....	1,728,912	1,900,000	1,885,788	1,888,646	0	1,134	0	1,134	0	1,889,780	0	(160,868)	(160,868)	53,263	10/01/2030	2.A FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..009098-A*-5	Air Cargo Logistics Ft W Lease-Collatera		09/10/2024	SINKING PAYMENT		29,001	29,001	29,001	29,001	0	0	0	0	0	29,001	0	0	0	978	11/10/2039	1.E
..00910G-A*-4	Air Cargo Logistics Ctl Trust Certificat		09/10/2024	SINKING PAYMENT		41,231	41,231	41,231	41,231	0	0	0	0	0	41,231	0	0	0	1,467	02/10/2041	1.E
..00981@-AA-9	Akron Childrens Hospital Trust Certifica		09/15/2024	SINKING PAYMENT		27,167	27,167	27,439	27,406	0	(239)	0	(239)	0	27,167	0	0	0	808	08/15/2050	1.F
..02146P-AF-2	Alternative Loan Trust 2-CWALT 2006-HY12		09/01/2024	PAYDOWN		141,088	141,088	90,502	110,757	0	0	0	30,331	0	141,088	0	0	0	3,954	08/01/2036	1.A FM
..02146T-AL-1	Alternative Loan Trust 2-CWALT 2006-24CB		09/01/2024	PAYDOWN		9,740	8,112	3,982	4,216	0	0	0	4,509	0	9,740	0	0	0	196	08/01/2036	1.A FM
..02147W-AT-6	Alternative Loan Trust 2-CWALT 2006-26CB		09/01/2024	PAYDOWN		24,209	23,762	16,314	14,715	0	0	0	9,107	0	24,209	0	0	0	1,122	09/01/2036	3.B FM
..02147X-AR-8	Alternative Loan Trust 2-CWALT 2006-32CB		09/01/2024	PAYDOWN		6,360	6,632	4,389	4,551	0	0	9	2,019	0	6,360	0	0	0	236	11/01/2036	4.A FM
..02150V-AA-3	Alternative Loan Trust 2-CWALT 2007-HY7C		09/25/2024	PAYDOWN		10,446	10,358	8,369	10,037	0	0	0	366	0	10,446	0	0	0	452	08/25/2037	1.A FM
..02152A-AS-8	Alternative Loan Trust 2-CWALT 2007-16CB		09/25/2024	PAYDOWN		34,552	43,963	26,695	27,556	0	0	(102)	12,635	0	34,552	0	0	0	1,631	08/25/2037	1.A FM
..023135-CA-2	Amazon.com Inc-SENIOR UNSECURED		07/30/2024	MRB0010		11,994,503	12,000,000	12,084,840	12,076,351	0	(2,136)	0	(2,136)	0	12,074,215	0	(79,712)	(79,712)	247,250	05/12/2041	1.D FE
..02660L-AA-8	American Home Mortgage A-AHMA 2006-4 1A1		09/25/2024	PAYDOWN		1,126	1,126	844	408	0	718	0	718	0	1,126	0	0	0	37	10/25/2046	1.A FM
..02660T-AR-4	American Home Mortgage I-AHM 2004-1 4A		09/01/2024	PAYDOWN		17,380	17,380	17,184	17,380	0	0	0	0	0	17,380	0	0	0	504	04/01/2044	5.A FM
..02660T-DH-3	American Home Mortgage I-AHM 2005-1 6A		09/01/2024	PAYDOWN		19,197	19,197	16,726	21,624	0	(2,426)	0	(2,426)	0	19,197	0	0	0	708	06/01/2045	1.A FM
..02660T-EK-5	American Home Mortgage I-AHM 2005-2 1A1		09/25/2024	PAYDOWN		61,749	61,749	57,793	59,902	0	1,847	0	1,847	0	61,749	0	0	0	1,825	09/25/2045	1.A FM
..02660V-AE-8	American Home Mortgage A-AHMA 2005-1 3A1		09/25/2024	PAYDOWN		4,079	4,079	3,327	3,958	0	121	0	121	0	4,079	0	0	0	82	11/25/2035	1.A FM
..02665X-AB-5	American Homes 4 Rent 20-AH4R 2014-SFR3		09/01/2024	PAYDOWN		14,600,000	14,600,000	14,972,121	14,634,698	0	(34,698)	0	(34,698)	0	14,600,000	0	0	0	460,009	12/01/2036	1.A FE
..02665X-AC-3	American Homes 4 Rent 20-AH4R 2014-SFR3		09/01/2024	PAYDOWN		5,600,000	5,600,000	5,599,651	5,597,902	0	2,098	0	2,098	0	5,600,000	0	0	0	193,032	12/01/2036	1.A FE
..026929-AA-7	American Home Mortgage I-AHM 2006-3 11A1		09/25/2024	PAYDOWN		22,496	22,496	17,224	18,172	0	4,325	0	4,325	0	22,496	0	0	0	830	12/25/2046	1.A FM
..03464B-AA-6	Angel Oak Mortgage Trust-AOMT 2022-1 A1		07/30/2024	VARIOUS		5,366,248	5,366,248	5,366,166	5,366,248	0	0	0	0	0	5,366,248	0	0	0	102,547	12/01/2066	1.A
..03464B-AB-4	Angel Oak Mortgage Trust-AOMT 2022-1 A2		09/01/2024	PAYDOWN		378,265	378,265	378,261	378,262	0	3	0	3	0	378,265	0	0	0	8,144	12/01/2066	1.A
..03464B-AC-2	Angel Oak Mortgage Trust-AOMT 2022-1 A3		09/01/2024	PAYDOWN		378,265	378,265	378,259	378,259	0	6	0	6	0	378,265	0	0	0	8,541	12/01/2066	1.A
..03464P-AA-5	Angel Oak Mortgage Trust-AOMT 2022-2 A1		09/01/2024	PAYDOWN		318,699	318,699	317,578	318,699	0	0	0	0	0	318,699	0	0	0	7,026	01/01/2067	1.A FE
..03464P-AB-3	Angel Oak Mortgage Trust-AOMT 2022-2 A2		09/01/2024	PAYDOWN		191,220	191,220	190,924	190,926	0	293	0	293	0	191,220	0	0	0	4,730	01/01/2067	1.B FE
..03464P-AC-1	Angel Oak Mortgage Trust-AOMT 2022-2 A3		09/01/2024	PAYDOWN		191,220	191,220	190,739	190,742	0	478	0	478	0	191,220	0	0	0	4,858	01/01/2067	1.E FE
..03464T-AA-7	Angel Oak Mortgage Trust-AOMT 2022-3 A1		09/01/2024	PAYDOWN		269,761	269,761	266,874	267,631	0	2,130	0	2,130	0	269,761	0	0	0	6,843	01/01/2067	1.A FE
..03464T-AB-5	Angel Oak Mortgage Trust-AOMT 2022-3 A2		09/01/2024	PAYDOWN		179,840	179,840	176,003	176,704	0	3,136	0	3,136	0	179,840	0	0	0	4,837	01/01/2067	1.C FE
..035229-CQ-4	ANHEUSER-BUSCH COS LLC-DEBENTURE		08/23/2024	KEY CAPITAL MARKETS		7,324,905	6,741,000	8,128,904	7,934,701	0	(73,996)	0	(73,996)	0	7,860,705	0	(535,800)	(535,800)	446,769	01/15/2033	1.G FE
..03837Q-AA-0	Aqua Finance Trust 2019-AQFIT 2019-A A		09/15/2024	PAYDOWN		59,338	59,338	59,328	59,326	0	12	0	12	0	59,338	0	0	0	1,241	07/16/2040	1.A FE
..03838W-AA-9	Aquarion Co-SENIOR UNSECURED		08/15/2024	MATURITY		12,000,000	12,000,000	11,949,360	11,995,995	0	4,005	0	4,005	0	12,000,000	0	0	0	480,000	08/15/2024	2.B FE
..038413-AA-8	Aqua Finance Trust 2020-AQFIT 2020-AA A		09/17/2024	PAYDOWN		220,389	220,389	220,348	220,350	0	0	0	0	0	220,389	0	0	0	2,697	07/17/2046	1.A FE
..04015K-AB-6	Ares Finance Co II LLC-SENIOR UNSECURED		07/30/2024	MRB0010		2,521,626	2,600,000	2,495,064	2,514,837	0	6,790	0	6,790	0	2,521,626	0	0	0	52,813	06/15/2030	2.A FE
..041242-AA-6	Arko Corp-SENIOR UNSECURED		09/18/2024	STIFEL NICOLAUS		4,270,250	4,495,000	4,433,838	4,448,144	0	4,905	0	4,905	0	4,453,049	0	(182,799)	(182,799)	194,534	11/15/2029	4.C FE
..04249@-AD-3	Army & Air Force Exchang Senior Note		09/15/2024	SINKING PAYMENT		46,711	46,711	46,711	46,711	0	0	0	0	0	46,711	0	0	0	1,774	10/15/2024	1.D
..04285E-AC-1	Arroyo Mortgage Trust 20-ARRW 2022-2 A2		09/01/2024	PAYDOWN		123,646	123,646	119,710	120,798	0	2,849	0	2,849	0	123,646	0	0	0	3,285	07/01/2057	1.C FE
..04285E-AD-9	Arroyo Mortgage Trust 20-ARRW 2022-2 A3		09/01/2024	PAYDOWN		123,646	123,646	118,521	119,930	0	3,716	0	3,716	0	123,646	0	0	0	4,104	07/01/2057	1.F FE
..04285E-AM-9	Arroyo Mortgage Trust 20-ARRW 2022-2 A1		09/01/2024	PAYDOWN		118,890	118,890	117,452	118,068	0	823	0	823	0	118,890	0	0	0	3,144	07/01/2057	1.A FE
..04686J-AC-5	Athene Holding Ltd-SENIOR UNSECURED		09/16/2024	VARIOUS		19,606,338	20,350,000	20,787,222	20,667,682	0	(29,874)	0	(29,874)	0	20,667,688	0	(1,061,351)	(1,061,351)	798,360	01/15/2031	2.A FE
..05178T-AA-9	Aurora Military Housing -SECURED		07/15/2024	SINKING PAYMENT		14,806	14,806	14,806	14,807	0	(1)	0	(1)	0	14,806	0	0	0	868	07/15/2034	1.F FE
..05279@-AA-9	Autoliv ASP, Inc. Trust Certificate Tran		09/15/2024	SINKING PAYMENT		74,972	74,972	74,972	74,972	0	0	0	0	0	74,972	0	0	0	3,145	05/15/2034	2.B
..05351K-AB-5	Avant Credit Card Master-AVCCT 2021-1A B		09/15/2024	Avant Credit Card Master-AVCCT 2021-1A B		2,250,000	2,250,000	2,206,582	2,237,143	0	12,857	0	12,857	0	2,250,000	0	0	0	27,338	04/15/2027	1.G FE
..05351K-B#-5	Avant Credit Card Master AVCMT Series 2		09/17/2024	DIRECT		5,210,000	5,210,000	5,136,459	5,153,866	0	10,600	0	10,600	0	5,164,466	0	45,534	45,534	523,894	04/15/2027	2.C PL
..05351K-B*-9	Avant Credit Card Master AVCMT Series 2		09/17/2024	DIRECT		7,690,000	7,690,000	7,650,308	7,660,299	0	5,874	0	5,874	0	7,666,173	0	23,827	23,827	796,547	04/15/2027	1.C PL
..05351K-B@-7	Avant Credit Card Master AVCMT Series 2		09/17/2024	DIRECT		4,100,000	4,100,000	4,083,691	4,087,747	0	2,389	0	2,389	0	4,090,136	0	9,864	9,864	308,161	04/15/2027	1.G PL
..05532E-CE-3	BCAP LLC 2009-RR10 Trust-BCAP 2009-RR10		09/01/2024	PAYDOWN		11,594	13,011	3,743	8,195	0	3,799	0	3,799	0	11,594	0	0	0	544	06/01/2037	1.A FM
..05532T-AF-9	BCAP LLC 2010-RR1 Trust-BCAP 2010-RR1 2A		09/01/2024	PAYDOWN		173,327	173,327	75,397	262,205	0	(46,195)	0	(46,195)	0	173,327	0	0	0	5,252	06/01/2045	1.A FM
..05533N-AJ-3	BCAP LLC 2010-RR12 Trust-BCAP 2010-RR12		09/01/2024	PAYDOWN		18,914	20,482	17,945	19,912	0	340	0	340	0	18,914	0	0	0	460	06/01/2037	5.A FM

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Identification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..05552F-AE-7	BBOMS Trust-BBOMS 2022-C15 D .....	.....	08/13/2024	PERFTRUSTCP .....	.....	2,190,000	4,000,000	3,093,768	3,218,203	0	47,836	0	47,836	0	3,266,040	0	(1,076,040)	(1,076,040)	70,278	04/01/2055	1.F
..05552Y-AL-0	BBOMS Mortgage Trust 202-BBOMS 2022-C16 .....	.....	08/01/2024	BOFAMLSec .....	.....	6,075,000	7,500,000	6,903,516	6,969,821	0	29,458	0	29,458	0	6,999,279	0	(924,279)	(924,279)	230,958	06/01/2055	1.A
..05553D-AB-7	BHG Securitization Trust-BHG 2022-B B .....	.....	09/17/2024	PAYDOWN .....	.....	1,785,737	1,785,737	1,785,691	1,785,714	0	23	0	23	0	1,785,737	0	0	0	58,306	06/18/2035	1.D FE
..05586*-AA-9	BGS Spartanburg 2017 Trust Certificate .....	.....	09/15/2024	SINKING PAYMENT .....	.....	123,671	123,671	123,671	123,671	0	0	0	0	0	123,671	0	0	0	3,824	07/15/2032	2.A S
..05587*-AA-8	BGS Fedex Series 2017A Trust Certificate .....	.....	09/15/2024	SINKING PAYMENT .....	.....	104,099	104,099	104,099	104,102	0	(3)	0	(3)	0	104,099	0	0	0	3,105	03/15/2037	1.E PL
..05588*-AA-7	BGS Huntersville 2017 Trust Certificate .....	.....	09/15/2024	SINKING PAYMENT .....	.....	102,949	102,949	102,949	102,949	0	0	0	0	0	102,949	0	0	0	3,042	05/15/2038	2.B S
..05590*-AA-9	BPHQ 2017 Trust Certificate BP Corp Nort .....	.....	09/15/2024	SINKING PAYMENT .....	.....	53,708	53,708	53,708	53,708	0	0	0	0	0	53,708	0	0	0	1,429	11/15/2032	1.F
..05609K-AC-3	BX Commercial Mortgage T-BX 2021-XL2 B .....	.....	09/15/2024	PAYDOWN .....	.....	19,541	19,541	18,768	18,866	0	675	0	675	0	19,541	0	0	0	962	10/15/2038	1.A
..05609K-AJ-8	BX Commercial Mortgage T-BX 2021-XL2 E .....	.....	09/15/2024	PAYDOWN .....	.....	19,541	19,541	19,443	19,442	0	99	0	99	0	19,541	0	0	0	1,088	10/15/2038	1.A
..05609K-AL-3	BX Commercial Mortgage T-BX 2021-XL2 F .....	.....	09/15/2024	PAYDOWN .....	.....	48,852	48,852	48,608	48,611	0	241	0	241	0	48,852	0	0	0	2,869	10/15/2038	1.A
..05609K-AN-9	BX Commercial Mortgage T-BX 2021-XL2 G .....	.....	09/15/2024	PAYDOWN .....	.....	58,623	58,623	58,329	58,327	0	295	0	295	0	58,623	0	0	0	3,711	10/15/2038	1.A
..05609R-AL-8	BX Trust-BX 2021-BXMF D .....	.....	09/15/2024	PAYDOWN .....	.....	1,342,220	1,342,220	1,331,389	1,338,826	0	3,395	0	3,395	0	1,342,220	0	0	0	74,586	10/15/2026	1.A
..05609R-AN-4	BX Trust-BX 2021-BXMF E .....	.....	09/15/2024	PAYDOWN .....	.....	2,512,123	2,512,123	2,491,800	2,505,815	0	6,308	0	6,308	0	2,512,123	0	0	0	151,053	10/15/2026	1.A
..058927-AG-9	Banc of America Funding -BAFC 2006-A 3A2 .....	.....	09/01/2024	PAYDOWN .....	.....	3,535	3,599	3,142	3,456	0	122	0	122	0	3,535	0	0	0	162	02/01/2036	3.B FM
..058931-AD-8	Banc of America Funding -BAFC 2006-3 2A1 .....	.....	09/01/2024	PAYDOWN .....	.....	10,805	12,078	9,850	9,758	0	2,163	0	2,163	0	10,805	0	0	0	801	03/01/2036	1.A FM
..058931-AT-3	Banc of America Funding -BAFC 2006-3 4A1 .....	.....	09/01/2024	PAYDOWN .....	.....	2,554	6,524	5,894	6,637	0	65	342	(257)	0	2,554	0	0	0	499	03/01/2036	4.A FM
..058931-BL-9	Banc of America Funding -BAFC 2006-3 5A8 .....	.....	09/01/2024	PAYDOWN .....	.....	585	714	725	652	0	64	0	64	0	585	0	0	0	23	03/01/2036	3.C FM
..058933-AN-2	Banc of America Funding -BAFC 2006-D 5A1 .....	.....	09/01/2024	PAYDOWN .....	.....	8,748	10,602	9,690	9,844	0	594	0	594	0	8,748	0	0	0	476	05/01/2036	1.A FM
..05894X-R7-0	Banc of America Funding -BAFC 2005-F 2A2 .....	.....	09/25/2024	PAYDOWN .....	.....	0	0	15,596	0	0	0	0	0	0	0	0	0	0	0	11/25/2035	5.A FE
..05946X-XP-3	Banc of America Funding -BAFC 2005-E 3A1 .....	.....	09/01/2024	PAYDOWN .....	.....	14,701	16,910	16,582	17,258	0	(375)	0	(375)	0	14,701	0	0	0	902	05/01/2035	4.B FM
..05946X-Y7-2	Banc of America Funding -BAFC 2005-8 2A8 .....	.....	09/01/2024	PAYDOWN .....	.....	9,770	11,207	10,586	10,954	0	151	19	132	0	9,770	0	0	0	649	01/01/2036	3.C FM
..05946X-YV-9	Banc of America Funding -BAFC 2005-F 2A1 .....	.....	09/01/2024	PAYDOWN .....	.....	57,947	62,099	57,867	63,489	0	(2,723)	0	(2,723)	0	57,947	0	0	0	3,271	09/01/2035	3.B FM
..05948X-T2-7	Banc of America Mortgage-BOAMS 2004-A 2A .....	.....	09/01/2024	PAYDOWN .....	.....	6,077	6,077	5,986	6,066	0	12	0	12	0	6,077	0	0	0	247	02/01/2034	1.A FM
..05949A-H8-6	Banc of America Mortgage-BOAMS 2005-A 2A .....	.....	09/01/2024	PAYDOWN .....	.....	18,474	18,474	17,862	18,474	0	0	0	0	0	18,474	0	0	0	665	02/01/2035	1.A FM
..05949A-H9-4	Banc of America Mortgage-BOAMS 2005-A 2A .....	.....	09/01/2024	PAYDOWN .....	.....	23,070	23,070	22,465	23,070	0	0	0	0	0	23,070	0	0	0	757	02/01/2035	1.A FM
..05949C-GW-0	Banc of America Mortgage-BOAMS 2005-8 A9 .....	.....	09/01/2024	PAYDOWN .....	.....	6,969	8,115	7,904	7,699	0	388	0	388	0	6,969	0	0	0	320	09/01/2035	4.B FM
..05949C-HM-1	Banc of America Mortgage-BOAMS 2005-1 IA .....	.....	09/01/2024	PAYDOWN .....	.....	116,570	116,570	100,140	102,673	0	13,895	0	13,895	0	116,570	0	0	0	6,185	10/01/2035	4.B FM
..05949C-KS-4	Banc of America Mortgage-BOAMS 2005-J 2A .....	.....	09/01/2024	PAYDOWN .....	.....	180	178	176	185	0	(5)	0	(5)	0	178	0	0	0	11	11/01/2035	3.A FM
..05949C-KX-3	Banc of America Mortgage-BOAMS 2005-J 4A .....	.....	09/01/2024	PAYDOWN .....	.....	12,886	13,132	10,738	10,792	0	2,267	(1)	2,268	0	12,886	0	0	0	475	11/01/2035	1.A FM
..05949C-PP-5	Banc of America Mortgage-BOAMS 2005-L 4A .....	.....	09/01/2024	PAYDOWN .....	.....	15,057	15,186	14,370	14,300	0	863	0	863	0	15,057	0	0	0	652	01/01/2036	1.A FM
..05949J-AX-7	Banc of America Funding -BAFC 2006-1 1A2 .....	.....	09/01/2024	PAYDOWN .....	.....	13,879	15,150	15,255	13,879	0	(1,375)	0	(1,375)	0	13,879	0	0	0	768	01/01/2036	1.A FM
..05950F-AD-7	Banc of America Funding -BAFC 2006-4 A4 .....	.....	09/25/2024	PAYDOWN .....	.....	0	0	18,873	0	0	0	0	0	0	0	0	0	0	3	07/25/2036	6. *
..05950M-AJ-9	Banc of America Funding -BAFC 2006-G 3A3 .....	.....	09/01/2024	PAYDOWN .....	.....	137,398	137,398	131,730	135,563	0	1,835	0	1,835	0	137,398	0	0	0	5,492	07/01/2036	1.A FM
..05950P-AF-0	Banc of America Funding -BAFC 2006-H 2A3 .....	.....	09/01/2024	PAYDOWN .....	.....	15,322	16,545	14,493	14,054	0	2,283	0	2,283	0	15,322	0	0	0	608	09/01/2046	1.A FM
..05950R-BG-3	Banc of America Funding -BAFC 2006-6 3A2 .....	.....	09/25/2024	PAYDOWN .....	.....	0	0	2,395	0	0	0	0	0	0	0	0	0	0	0	08/25/2036	6. *
..05950T-AC-9	Banc of America Mortgage-BOAMS 2006-B 2A .....	.....	09/01/2024	PAYDOWN .....	.....	6,536	7,265	7,005	5,967	0	(109)	0	(109)	0	5,380	0	1,156	1,156	178	11/01/2046	1.A FM
..05951F-AB-0	Banc of America Funding -BAFC 2007-1 1A1 .....	.....	09/01/2024	PAYDOWN .....	.....	1,079	1,365	1,365	1,079	0	287	0	287	0	1,366	0	0	0	46	01/01/2037	1.A FM
..05951K-AN-3	Banc of America Funding -BAFC 2006-7 1A1 .....	.....	09/01/2024	PAYDOWN .....	.....	3,545	7,108	6,237	6,481	0	496	0	496	0	3,545	0	0	0	282	09/01/2036	2.B FM
..05951U-AC-5	Banc of America Funding -BAFC 2006-8T2 A .....	.....	09/01/2024	PAYDOWN .....	.....	306	304	287	230	0	71	0	71	0	306	0	0	0	10	10/01/2036	1.A FM
..05951V-AV-1	Banc of America Funding -BAFC 2006-1 6A1 .....	.....	09/20/2024	PAYDOWN .....	.....	11,872	9,498	7,830	9,418	0	798	0	798	0	11,872	0	0	0	283	12/20/2046	1.A FM
..059522-AA-0	Banc of America Funding -BAFC 2007-C 6A1 .....	.....	09/20/2024	PAYDOWN .....	.....	35,673	35,673	30,678	40,667	0	(4,994)	0	(4,994)	0	35,673	0	0	0	(2,921)	05/20/2047	1.A FM
..059522-AU-6	Banc of America Funding -BAFC 2007-C 1A2 .....	.....	09/01/2024	PAYDOWN .....	.....	108,361	112,534	97,088	100,268	0	27,739	16,461	11,278	0	108,361	0	0	0	4,809	05/01/2036	1.A FM
..059523-AN-0	Banc of America Funding -BAFC 2007-5 4A3 .....	.....	09/25/2024	PAYDOWN .....	.....	0	0	158,782	35,178	0	(665)	0	(665)	0	0	0	0	0	3,038	07/25/2037	6. *
..059523-AX-8	Banc of America Funding -BAFC 2007-5 7A1 .....	.....	09/01/2024	PAYDOWN .....	.....	0	17,287	10,086	12,560	0	(2,137)	0	(2,137)	0	0	0	0	0	845	07/01/2047	1.A FM
..05952G-AT-8	Banc of America Funding -BAFC 2007-D 3A1 .....	.....	09/01/2024	PAYDOWN .....	.....	1,678	2,525	2,375	2,516	0	(293)	134	(427)	0	1,678	0	0	0	214	06/01/2037	1.A FM
..05952G-AV-3	Banc of America Funding -BAFC 2007-D 3A3 .....	.....	09/01/2024	PAYDOWN .....	.....	1,583	3,633	3,404	3,615	0	41	190	(149)	0	1,583	0	0	0	106	06/01/2037	2.C FM

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Identification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..05953Y-AH-4	Banc of America Funding -BAFC 2007-4 TA1		09/01/2024	PAYDOWN		4,116	4,025	3,517	3,285	0	752	0	752	0	4,116	0	0	0	139	05/01/2037	1.A FM
..05954D-AL-0	Banc of America Funding -BAFC 2007-E 6A1		09/01/2024	PAYDOWN		217	218	189	196	0	30	0	30	0	217	0	0	0	6	09/01/2037	4.B FM
..05990E-AD-2	Banc of America Funding -BAFC 2012-R6 2A		09/26/2024	PAYDOWN		53,651	52,961	46,089	58,075	0	(4,452)	0	(4,452)	0	53,651	0	0	0	1,805	07/26/2036	3.C FM
..05990H-AH-6	Banc of America Funding -BAFC 2010-R2 1A		09/01/2024	PAYDOWN		24,465	26,774	16,941	18,044	0	7,858	0	7,858	0	24,465	0	0	0	1,110	08/01/2037	1.A FM
..05990H-AQ-6	Banc of America Funding -BAFC 2010-R2 3A		09/01/2024	PAYDOWN		59,598	59,598	57,940	58,726	0	872	0	872	0	59,598	0	0	0	2,251	07/01/2035	1.A FM
..05990H-AT-0	Banc of America Funding -BAFC 2010-R2 4A		09/01/2024	PAYDOWN		1,584	6,657	5,061	5,701	0	73	292	(219)	0	1,584	0	0	0	255	08/01/2036	1.A FM
..06051G-FH-7	Bank of America Corp-SUBORDINATED NOTE		08/26/2024	MATURITY		13,000,000	13,000,000	12,990,510	12,998,956	0	1,044	0	1,044	0	13,000,000	0	0	0	546,000	08/26/2024	2.A FE
..06051G-KC-2	Bank of America Corp-SUBORDINATED		09/16/2024	CITIGROUP GLOBAL MAR		8,413,000	10,000,000	9,313,000	9,387,487	0	28,542	0	28,542	0	9,416,029	0	(1,003,029)	(1,003,029)	245,442	09/21/2036	2.A FE
..06424@-AA-1	Bank Of America (Houston Pass-Thru Certi		09/15/2024	SINKING PAYMENT		99,129	99,129	99,738	99,470	0	(341)	0	(341)	0	99,129	0	0	0	2,193	12/31/2029	1.B S
..06744D-AA-7	Barclays Mortgage Loan T-BARC 2022-NQM1		09/01/2024	PAYDOWN		66,149	66,149	64,914	65,193	0	955	0	955	0	66,149	0	0	0	2,027	07/01/2052	1.A FE
..06744D-AB-5	Barclays Mortgage Loan T-BARC 2022-NQM1		09/01/2024	PAYDOWN		66,149	66,149	63,640	64,083	0	2,066	0	2,066	0	66,149	0	0	0	1,998	07/01/2052	1.C FE
..06744D-AC-3	Barclays Mortgage Loan T-BARC 2022-NQM1		09/01/2024	PAYDOWN		186,010	186,010	176,569	178,219	0	7,791	0	7,791	0	186,010	0	0	0	6,508	07/01/2052	1.F FE
..06744Y-AA-1	Barclays Mortgage Loan T-BARC 2022-INV1		09/01/2024	PAYDOWN		507,580	507,580	507,574	507,580	0	0	0	0	0	507,580	0	0	0	14,718	02/01/2062	1.A FE
..071813-BP-3	Baxter International Inc-SENIOR UNSECURE		08/23/2024	CITADELEQ		3,798,888	5,100,000	5,364,282	5,343,842	0	(4,928)	0	(4,928)	0	5,338,914	0	(1,540,026)	(1,540,026)	183,954	08/15/2046	2.B FE
..07325D-AF-1	Bayview Financial Mortga-BAYV 2006-C 1A5		09/01/2024	PAYDOWN		10,016	10,016	7,967	9,308	0	1,057	349	708	0	10,016	0	0	0	248	11/01/2036	1.A FM
..07325V-AE-4	Bayview Financial Acquis-BAYV 2007-A 1A4		09/01/2024	PAYDOWN		521,071	521,071	437,700	485,477	0	35,595	0	35,595	0	521,071	0	0	0	19,215	05/01/2037	1.A FM
..07336P-AA-2	Bayview Opportunity Mast-BVCLN 2024-EDU1		09/25/2024	PAYDOWN		642,712	642,712	642,712	0	0	0	0	0	0	642,712	0	0	0	14,118	06/25/2047	1.A FE
..07336P-AC-8	Bayview Opportunity Mast-BVCLN 2024-EDU1		09/25/2024	PAYDOWN		119,021	119,021	119,021	0	0	0	0	0	0	119,021	0	0	0	2,749	06/25/2047	1.F FE
..07384M-AK-5	Bear Stearns ARM Trust 2-BSARM 2004-10 2		09/01/2024	PAYDOWN		18,503	18,503	17,254	18,209	0	294	0	294	0	18,503	0	0	0	683	01/01/2035	1.A FM
..07384M-OB-8	Bear Stearns ARM Trust 2-BSARM 2004-3 2A		09/01/2024	PAYDOWN		14,684	14,684	14,730	14,684	0	0	0	0	0	14,684	0	0	0	467	07/01/2034	1.A FM
..07384M-S7-8	Bear Stearns ARM Trust 2-BSARM 2004-5 2A		09/01/2024	PAYDOWN		49,122	49,122	49,336	49,122	0	0	0	0	0	49,122	0	0	0	1,452	07/01/2034	4.A FM
..07384Y-KF-2	Bear Stearns Asset Backe-BSABS 2003-AC4		09/01/2024	PAYDOWN		62,584	62,584	58,885	61,827	0	3,645	2,889	756	0	62,584	0	0	0	2,661	09/01/2033	1.A FM
..07384Y-TL-0	Bear Stearns Asset Backe-BSABS 2004-SD2		09/01/2024	PAYDOWN		4,168	4,168	4,215	4,282	0	(114)	0	(114)	0	4,168	0	0	0	159	03/01/2044	1.A FM
..07386H-PD-7	Bear Stearns ALT-A Trust-BALTA 2004-12 2		09/01/2024	PAYDOWN		2,922	2,922	2,681	2,777	0	144	0	144	0	2,922	0	0	0	103	01/01/2035	1.A FM
..07386H-QZ-7	Bear Stearns ALT-A Trust-BALTA 2005-2 2A		09/01/2024	PAYDOWN		58,974	57,309	49,126	47,489	0	10,088	0	10,088	0	58,974	0	0	0	2,085	04/01/2035	1.A FM
..07386H-UG-4	Bear Stearns ALT-A Trust-BALTA 2005-5 21		09/01/2024	PAYDOWN		76	76	69	73	0	3	0	3	0	76	0	0	0	3	07/01/2035	1.A FM
..07386X-AH-9	Bear Stearns ALT-A Trust-BALTA 2007-1 21		09/01/2024	PAYDOWN		758	305	182	178	0	175	0	175	0	758	0	0	0	11	01/01/2047	3.B FM
..07386Y-AE-4	Bear Stearns ARM Trust 2-BSARM 2007-5 3A		09/01/2024	PAYDOWN		15,340	15,414	14,106	14,109	0	3,178	1,899	1,279	0	15,340	0	0	0	832	08/01/2047	1.A FM
..073870-AG-2	Bear Stearns ALT-A Trust-BALTA 2007-2 2A		09/01/2024	PAYDOWN		6,969	4,662	2,469	2,673	0	3,049	0	3,049	0	6,969	0	0	0	100	04/01/2037	1.A FM
..073879-GN-2	Bear Stearns Asset Backe-BSABS 2004-AC5		09/25/2024	PAYDOWN		8,053	8,053	6,019	6,928	0	1,125	0	1,125	0	8,053	0	0	0	273	10/25/2034	1.A FM
..073880-AD-8	Bear Stearns ARM Trust 2-BSARM 2007-1 2A		09/01/2024	PAYDOWN		22,490	25,229	22,603	23,644	0	2,286	1,363	923	0	22,490	0	0	0	838	02/01/2047	4.A FM
..073880-AG-1	Bear Stearns ARM Trust 2-BSARM 2007-1 3A		09/01/2024	PAYDOWN		8,603	7,416	6,251	6,792	0	1,230	0	1,230	0	8,603	0	0	0	239	02/01/2047	1.A FM
..07389N-AC-9	Bear Stearns Asset Backe-BSABS 2006-SD4		09/01/2024	PAYDOWN		3,864	3,864	3,035	3,135	0	833	104	729	0	3,864	0	0	0	130	10/01/2036	1.A FM
..07401C-AS-2	Bear Stearns ARM Trust 2-BSARM 2007-4 21		09/01/2024	PAYDOWN		11,808	10,787	9,907	11,808	0	2,554	1,249	1,305	0	11,808	0	0	0	274	06/01/2047	5.A FM
..08862G-AA-2	BHG Securitization Trust-BHG 2023-B A		09/17/2024	PAYDOWN		597,757	597,757	597,678	597,683	0	74	0	74	0	597,757	0	0	0	27,967	12/17/2036	1.A FE
..088929-AB-0	BGC Group Inc-SENIOR UNSECURED		09/27/2024	EXCHANGE OFFER		444	0	0	0	0	444	0	444	0	444	0	0	0	0	12/15/2025	2.C FE
..09261H-AB-3	Blackstone Private Credi-SENIOR UNSECURE		09/15/2024	MATURITY		9,129,000	9,129,000	8,965,371	9,072,994	0	56,006	0	56,006	0	9,129,000	0	0	0	159,758	09/15/2024	2.C FE
..09581J-AA-4	BLUE OWL FIN LLC-SENIOR UNSECURED		09/16/2024	JP MORGAN SECURITIES		8,789,600	10,000,000	9,459,500	9,556,464	0	36,973	0	36,973	0	9,593,436	0	(803,836)	(803,836)	240,731	06/10/2031	2.B FE
..097093-AC-2	BOF VII AL Funding Trust-BVABS 2023-CAR3		09/25/2024	PAYDOWN		733,192	733,192	733,185	733,183	0	9	0	9	0	733,192	0	0	0	28,254	07/26/2032	1.D FE
..10568K-AA-6	BRAVO Residential Fundin-BRAVO 2022-NQM2		09/01/2024	PAYDOWN		184,973	184,973	184,971	184,973	0	0	0	0	0	184,973	0	0	0	5,557	11/01/2061	1.A FE
..10568K-AB-4	BRAVO Residential Fundin-BRAVO 2022-NQM2		09/01/2024	PAYDOWN		82,694	82,694	82,693	82,693	0	1	0	1	0	82,694	0	0	0	2,840	11/01/2061	1.C FE
..10569F-AC-2	BRAVO Residential Fundin-BRAVO 2022-NQM1		09/01/2024	PAYDOWN		288,775	288,775	288,556	288,564	0	211	0	211	0	288,775	0	0	0	7,814	09/01/2061	1.E FE
..10569J-AB-6	BRAVO Residential Fundin-BRAVO 2022-NQM3		09/01/2024	PAYDOWN		33,496	33,496	33,462	33,462	0	34	0	34	0	33,496	0	0	0	1,239	07/01/2062	1.C FE
..105925-AB-7	BRAVO Residential Fundin-BRAVO 2024-NQM5		09/01/2024	PAYDOWN		80,070	80,070	80,069	80,069	0	1	0	1	0	80,070	0	0	0	399	06/01/2064	1.C FE
..10922N-AG-8	Brighthouse Financial In-SENIOR UNSECURE		09/16/2024	VARIOUS		12,883,960	12,277,000	13,403,025	13,182,234	0	(86,585)	0	(86,585)	0	13,095,649	0	(211,689)	(211,689)	542,602	05/15/2030	2.B FE
..1104AM-AA-4	BRITISH AIR 20-1 A PPT-FIRST LIEN		08/15/2024	SINKING PAYMENT		36,987	36,987	36,987	36,982	0	5	0	5	0	36,987	0	0	0	1,179	11/15/2032	1.G FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22	
										11	12	13	14	15								
CUSIP Ident-ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recog- nized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol	
..11750*-AA-7	Bryan Health (Kearney NE Senior Secured .....	.....	09/15/2024	SINKING PAYMENT		71,388	71,388	71,388	71,388	0	0	0	0	0	71,388	0	0	0	0	2,041	12/15/2046	1.E
..120568-BC-3	Bunge Ltd Finance Corp-SENIOR UNSECURED .....	.....	08/08/2024	VARIOUS		9,324,232	10,000,000	9,825,800	9,858,365	0	10,203	0	10,203	0	9,868,568	0	(544,337)	(544,337)	198,611	05/14/2031	2.B FE	....
..12327A-AA-6	Business Jet Securities -BJETS 2022-1A A .....	.....	09/15/2024	PAYDOWN		737,335	737,335	715,330	720,432	0	16,903	0	16,903	0	737,335	0	0	0	22,421	06/15/2037	1.F FE	....
..12327F-AA-5	Business Jet Securities -BJETS 2020-1A A .....	.....	09/30/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	13,813	11/15/2035	1.F FE	....
..12479R-AE-7	CAPITAL AUTOMOTIVE REIT-SERIES 17-1A CLA .....	.....	08/29/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	6,041	04/15/2047	1.E FE	....
..12489W-JQ-8	Credit-Based Asset Servi-CBASS 2004-CB4 .....	.....	09/01/2024	PAYDOWN		566	566	564	562	0	4	0	4	0	566	0	0	0	15	05/01/2035	1.A FM	....
..12510H-AB-6	CARS-DB4 LP-CAUTO 2020-1A A2 .....	.....	09/15/2024	PAYDOWN		7,118	7,118	7,117	7,117	0	1	0	1	0	7,118	0	0	0	144	02/15/2050	1.A FE	....
..12510H-AC-4	Capital Automotive Reit-CAUTO 2020-1A A3 .....	.....	09/15/2024	PAYDOWN		9,446	9,446	9,184	7,411	0	260	0	260	0	9,446	0	0	0	199	02/15/2050	1.A FE	....
..12510H-AF-7	Capital Automotive Reit-CAUTO 2020-1A A6 .....	.....	09/15/2024	PAYDOWN		2,938	2,938	2,669	2,700	0	237	0	237	0	2,938	0	0	0	75	02/15/2050	1.E FE	....
..12510H-AG-5	CARS-DB4 LP-CAUTO 2020-1A B1 .....	.....	09/30/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	4,629	02/15/2050	2.B FE	....
..12510H-AL-4	CARS-DB5 LP-CAUTO 2021-1A A2 .....	.....	09/15/2024	PAYDOWN		1,259	1,259	982	0	0	277	0	277	0	1,259	0	0	0	17	08/15/2051	1.A FE	....
..12510H-AM-2	CARS-DB5 LP-CAUTO 2021-1A A3 .....	.....	09/15/2024	PAYDOWN		3,810	3,810	3,392	2,616	0	370	0	370	0	3,810	0	0	0	43	08/15/2051	1.E FE	....
..12510H-AN-0	Capital Automotive REIT-CAUTO 2021-1A A4 .....	.....	09/15/2024	PAYDOWN		22,500	22,500	21,465	21,638	0	862	0	862	0	22,500	0	0	0	428	08/15/2051	1.E FE	....
..12510H-AQ-3	Capital Automotive REIT-CAUTO 2022-1A A2 .....	.....	09/15/2024	PAYDOWN		64,375	64,375	64,002	64,049	0	326	0	326	0	64,375	0	0	0	1,209	03/15/2052	1.E FE	....
..12530M-AB-1	CF Hippolyta Issuer LLC-SERIES 20-1 CLAS .....	.....	09/15/2024	PAYDOWN		10,910	10,910	10,905	10,906	0	4	0	4	0	10,910	0	0	0	145	07/15/2060	1.E FE	....
..12531W-BA-9	CFCRE 2016-3 MTG TR PASS THRU CTF CL A-2 .....	.....	08/01/2024	PAYDOWN		3,634,597	3,634,597	3,670,899	3,641,146	0	(6,549)	0	(6,549)	0	3,634,597	0	0	0	98,052	01/01/2048	1.A	
..125431-AH-9	CHL Mortgage Pass-Through-CIHL 2006-HYB4 .....	.....	09/01/2024	PAYDOWN		3,685	3,558	3,481	2,428	0	1,135	0	1,135	0	3,685	0	0	0	118	06/01/2036	1.A FM	....
..12543X-AD-8	CHL Mortgage Pass-Through-CIHL 2006-19 1A .....	.....	09/01/2024	PAYDOWN		20,301	19,377	12,248	11,796	0	7,747	0	7,747	0	20,301	0	0	0	937	01/01/2037	2.C FM	....
..12544B-AE-3	CHL Mortgage Pass-Through-CIHL 2007-HY5 3 .....	.....	09/01/2024	PAYDOWN		39,432	39,432	30,689	34,671	0	4,761	0	4,761	0	39,432	0	0	0	1,183	09/01/2037	1.G FM	....
..12544H-BF-6	CHL Mortgage Pass-Through-CIHL 2007-HY7 A .....	.....	09/01/2024	PAYDOWN		151	129	161	123	0	125	0	125	0	151	0	0	0	4	11/01/2037	1.A FM	....
..12545E-AK-2	CHL Mortgage Pass-Through-CIHL 2007-J2 2A .....	.....	09/01/2024	PAYDOWN		(135)	6	4	3	0	(62)	0	(62)	0	(135)	0	0	0	80	07/01/2037	1.A FM	....
..12546Y-AA-9	CHNGE Mortgage Trust-CHNGE 2022-2 A1 .....	.....	09/01/2024	PAYDOWN		1,114,715	1,114,715	1,114,705	1,114,715	0	0	0	0	0	1,114,715	0	0	0	27,084	03/01/2067	1.C FE	....
..12551S-AA-4	CHNGE Mortgage Trust 202-CHNGE 2022-4 A1 .....	.....	09/01/2024	PAYDOWN		543,217	543,217	532,304	536,383	0	6,834	0	6,834	0	543,217	0	0	0	22,196	10/01/2057	1.C FE	....
..12558M-AG-7	CIT Home Equity Loan Tru-CITHE 2002-1 AF .....	.....	09/01/2024	PAYDOWN		3,174	3,174	3,249	3,155	0	19	0	19	0	3,174	0	0	0	132	02/01/2030	1.A FM	....
..12563L-AS-6	QLI Funding VI LLC-2020-3A A .....	.....	09/18/2024	PAYDOWN		275,000	275,000	252,175	253,694	0	21,306	0	21,306	0	275,000	0	0	0	3,801	10/18/2045	1.F FE	....
..12564E-AA-0	CIM Trust 2021-J2-CIM 2021-J2 A1 .....	.....	09/01/2024	PAYDOWN		488,591	488,591	494,088	493,675	0	(5,084)	0	(5,084)	0	488,591	0	0	0	8,354	04/01/2051	1.A	....
..12564K-AA-6	CIM Trust 2021-J1-CIM 2021-J1 A1 .....	.....	09/01/2024	PAYDOWN		247,524	247,524	254,021	253,576	0	(6,052)	0	(6,052)	0	247,524	0	0	0	4,064	03/01/2051	1.A	....
..12565K-AA-5	QLI Funding VIII LLC-CLIF 2021-1A A .....	.....	09/18/2024	PAYDOWN		157,118	157,118	134,545	137,025	0	20,092	0	20,092	0	157,118	0	0	0	1,718	02/18/2046	1.F FE	....
..12566K-AE-7	QLI Funding VIII LLC-CLIF 2022-1A A .....	.....	09/18/2024	PAYDOWN		200,000	200,000	170,242	170,681	0	29,319	0	29,319	0	200,000	0	0	0	3,627	01/18/2047	1.F FE	....
..12566U-AE-4	CitiMortgage Alternative-CMALT 2007-A2 1 .....	.....	09/01/2024	PAYDOWN		5,839	5,812	5,349	5,603	0	166	60	106	0	5,839	0	0	0	344	02/01/2037	3.A FM	....
..12566U-AN-4	CitiMortgage Alternative-CMALT 2007-A2 1 .....	.....	09/01/2024	PAYDOWN		9,966	9,110	7,016	7,795	0	1,964	510	1,454	0	9,966	0	0	0	377	02/01/2037	1.A FM	....
..12566V-AE-2	CitiMortgage Alternative-CMALT 2007-A4 1 .....	.....	09/01/2024	PAYDOWN		4,115	6,624	5,787	5,797	0	498	0	498	0	4,115	0	0	0	396	04/01/2037	1.A FM	....
..12566X-AM-0	CitiMortgage Alternative-CMALT 2007-A7 2 .....	.....	09/01/2024	PAYDOWN		16,893	16,621	15,552	16,346	0	556	378	178	0	16,893	0	0	0	244	07/01/2037	4.A FM	....
..12569C-AB-7	CHNGE Mortgage Trust 202-CHNGE 2022-NQM1 .....	.....	09/01/2024	PAYDOWN		140,678	140,678	140,358	140,678	0	0	0	0	0	140,678	0	0	0	5,716	06/01/2067	1.B FE	....
..12569C-AC-5	CHNGE Mortgage Trust 202-CHNGE 2022-NQM1 .....	.....	09/01/2024	PAYDOWN		293,080	293,080	288,911	290,503	0	2,577	0	2,577	0	293,080	0	0	0	11,931	06/01/2067	1.F FE	....
..12569Q-AA-8	CHNGE Mortgage Trust 202-CHNGE 2023-4 A1 .....	.....	09/01/2024	PAYDOWN		560,820	560,820	561,960	561,842	0	(1,022)	0	(1,022)	0	560,820	0	0	0	28,634	09/01/2058	1.A FE	....
..12585S-AA-4	CHP (Fresno Ca) Trust Certificate .....	.....	09/15/2024	SINKING PAYMENT		403,982	403,982	403,982	403,982	0	0	0	0	0	403,982	0	0	0	9,679	02/15/2028	1.E	....
..12598R-AA-1	COLT 2021-5 Mortgage Loa-COLT 2021-5 A1 .....	.....	09/01/2024	PAYDOWN		237,005	237,005	214,786	218,368	0	18,637	0	18,637	0	237,005	0	0	0	2,922	11/01/2066	1.A FE	....
..12628L-AD-2	CSAB Mortgage-Backed Tru-CSAB 2006-4 A2A .....	.....	09/01/2024	PAYDOWN		42,564	42,564	8,729	9,301	0	33,986	722	33,264	0	42,564	0	0	0	306	12/01/2036	1.A FM	....
..12632Q-AX-1	COMM 2014-CCRE18 Mortgag-COMM 2014-CR18 .....	.....	09/30/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	5,084	07/01/2047	1.A	....
..12635R-AW-8	CSAIL 2015-C4 Commercial-CSAIL 2015-C4 A .....	.....	09/30/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	197	11/01/2048	1.A	....
..12638P-AB-5	CSMC Mortgage-Backed Tru-CSMC 2007-3 1A1 .....	.....	09/01/2024	PAYDOWN		6,827	6,827	2,142	2,257	0	4,694	123	4,571	0	6,827	0	0	0	43	04/01/2037	1.A FM	....
..12640W-AC-4	CSMC Series 2008-3R-CSMC 2008-3R 1A2 .....	.....	09/01/2024	PAYDOWN		27,444	25,790	23,648	24,315	0	1,554	0	1,554	0	27,444	0	0	0	786	07/01/2037	4.A FM	....
..126416-AB-2	CSMC 2022-NQM1-CSMC 2022-NQM1 A2 .....	.....	09/01/2024	PAYDOWN		301,428	301,428	301,424	301,425	0	4	0	4	0	301,428	0	0	0	5,288	11/01/2066	1.C FE	....
..126416-AC-0	CSMC 2022-NQM1-CSMC 2022-NQM1 A3 .....	.....	09/01/2024	PAYDOWN		738,169	738,169	738,166	738,167	0	2	0	2	0	738,169	0	0	0	13,469	11/01/2066	1.F FE	....
..12641T-AB-2	CSMC Series 2009-SR-CSMC 2009-SR 1A2 .....	.....	09/01/2024	PAYDOWN																		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..12646U-AK-4	CSMC Trust 2013-1VR1-CSMC 2013-1VR1 A2 .....	.....	09/01/2024	PAYDOWN	.....	49,806	49,806	46,569	47,010	0	2,796	0	2,796	0	49,806	0	0	0	1,055	03/01/2043	1.A
..12646W-AH-7	CSMC Trust 2013-1VR2-CSMC 2013-1VR2 A2 .....	.....	09/01/2024	PAYDOWN	.....	13,264	13,264	12,393	12,500	0	764	0	764	0	13,264	0	0	0	264	04/01/2043	1.A
..12646X-AJ-1	CSMC Trust 2013-1VR3-CSMC 2013-1VR3 A2 .....	.....	09/01/2024	PAYDOWN	.....	26,177	26,177	24,786	25,109	0	1,068	0	1,068	0	26,177	0	0	0	522	05/01/2043	1.A
..12647G-BZ-0	CSMC Trust 2013-1VR4-CSMC 2013-1VR4 A20 .....	.....	09/01/2024	PAYDOWN	.....	9,479	9,479	9,258	9,284	0	195	0	195	0	9,479	0	0	0	206	07/01/2043	1.A
..12647H-BC-9	CSMC Trust 2013-8R-CSMC 2013-8R 4A2 .....	.....	09/27/2024	PAYDOWN	.....	241,797	226,041	164,063	208,705	0	21,853	0	21,853	0	241,797	0	0	0	4,380	12/27/2036	1.A FM
..12647P-AK-4	CSMC Trust 2013-7-CSMC 2013-7 A6 .....	.....	09/01/2024	PAYDOWN	.....	33,061	33,061	31,862	32,005	0	641	0	641	0	33,061	0	0	0	(1,023)	08/01/2043	1.A
..12648H-BB-0	CSMC Trust 2014-1VR2-CSMC 2014-1VR2 B1 .....	.....	09/01/2024	PAYDOWN	.....	74,656	74,656	73,162	73,417	0	1,239	0	1,239	0	74,656	0	0	0	1,938	04/01/2044	1.A
..12648T-AQ-2	CSMC Trust 2014-1VR3-CSMC 2014-1VR3 B1 .....	.....	09/01/2024	PAYDOWN	.....	93,593	93,593	93,066	92,963	0	629	0	629	0	93,593	0	0	0	2,481	07/01/2044	1.A
..12659Y-AB-0	COLT 2022-3 Mortgage Loa-COLT 2022-3 A2 .....	.....	09/01/2024	PAYDOWN	.....	410,610	410,610	410,604	410,606	0	4	0	4	0	410,610	0	0	0	11,042	06/01/2028	1.C FE
..12659Y-AC-8	COLT 2022-3 Mortgage Loa-COLT 2022-3 A3 .....	.....	09/01/2024	PAYDOWN	.....	328,488	328,488	328,317	328,379	0	109	0	109	0	328,488	0	0	0	1,178	06/01/2028	1.F FE
..12660B-AB-7	Credit Suisse Mortgage C-CSMC 2022-ATH1 .....	.....	09/01/2024	PAYDOWN	.....	493,769	493,769	493,761	493,763	0	6	0	6	0	493,769	0	0	0	11,199	01/01/2067	1.C FE
..12660B-AC-5	Credit Suisse Mortgage C-CSMC 2022-ATH1 .....	.....	09/01/2024	PAYDOWN	.....	733,995	733,995	733,988	733,990	0	5	0	5	0	733,995	0	0	0	17,400	01/01/2067	1.F FE
..12663G-AA-5	COLT 2022-7 Mortgage Loa-COLT 2022-7 A1 .....	.....	09/01/2024	PAYDOWN	.....	102,899	102,899	102,898	102,899	0	0	0	0	0	102,899	0	0	0	3,809	04/01/2067	1.A FE
..12663G-AB-3	COLT 2022-7 Mortgage Loa-COLT 2022-7 A2 .....	.....	09/01/2024	PAYDOWN	.....	97,757	97,757	97,756	97,757	0	0	0	0	0	97,757	0	0	0	4,225	04/01/2067	1.C FE
..12663G-AC-1	COLT 2022-7 Mortgage Loa-COLT 2022-7 A3 .....	.....	09/01/2024	PAYDOWN	.....	51,451	51,451	51,101	51,269	0	182	0	182	0	51,451	0	0	0	2,306	04/01/2067	1.F FE
..12664A-AE-9	CSMC 2022-ATH3-CSMC 2022-ATH3 A2 .....	.....	09/01/2024	PAYDOWN	.....	135,132	135,132	135,131	135,132	0	0	0	0	0	135,132	0	0	0	5,853	08/01/2067	1.C FE
..12664A-AF-6	CSMC 2022-ATH3-CSMC 2022-ATH3 A3 .....	.....	09/01/2024	PAYDOWN	.....	140,838	140,838	140,837	140,838	0	0	0	0	0	140,838	0	0	0	7,161	08/01/2067	1.F FE
..126650-AN-0	CVS Pass-Through Trust-FIRST LIEN .....	.....	09/10/2024	SINKING PAYMENT	.....	84,412	84,412	86,334	84,412	0	(1,729)	0	(1,729)	0	84,412	0	0	0	3,850	10/10/2025	2.B
..126650-AW-0	CVS Pass-Through Trust-FIRST LIEN .....	.....	09/10/2024	SINKING PAYMENT	.....	70,246	70,246	70,246	70,247	0	0	0	0	0	70,246	0	0	0	2,490	01/11/2027	2.B
..126650-BQ-2	CVS HEALTH CORP PASS THRU CTF 30/360 .....	.....	09/10/2024	SINKING PAYMENT	.....	106,325	106,325	124,848	99,701	0	6,624	0	6,624	0	106,325	0	0	0	4,931	01/10/2030	2.B FE
..126650-BY-5	CVS PASS-THROUGH TRUST-SENIOR SECURED NO .....	.....	09/10/2024	SINKING PAYMENT	.....	11,623	11,623	13,736	12,586	0	(964)	0	(964)	0	11,623	0	0	0	460	01/10/2034	2.B FE
..12665E-AD-2	CSMC 2022-NQM4 Trust-CSMC 2022-NQM4 A2 .....	.....	09/01/2024	PAYDOWN	.....	118,139	118,139	114,964	115,891	0	2,248	0	2,248	0	118,139	0	0	0	3,812	06/01/2067	1.C FE
..12665V-AA-0	CVS Pass-Through Trust S-FIRST LIEN .....	.....	09/10/2024	SINKING PAYMENT	.....	167,323	167,323	167,323	167,323	0	0	0	0	0	167,323	0	0	0	5,042	08/11/2036	2.B FE
..12665W-AD-2	CSMC 2022-ATH2-CSMC 2022-ATH2 A2 .....	.....	09/01/2024	PAYDOWN	.....	264,747	264,747	257,135	258,015	0	6,732	0	6,732	0	264,747	0	0	0	4,255	05/01/2067	1.C FE
..126670-JP-4	CHL Mortgage Pass-Through-CIHL 2005-HYB9 .....	.....	09/01/2024	PAYDOWN	.....	8,583	9,100	7,111	7,845	0	1,141	0	1,141	0	8,583	0	0	0	364	02/01/2036	1.A FM
..126670-NY-0	CIABS Asset-Backed Certi-CIWL 2005-16 2AF .....	.....	09/01/2024	PAYDOWN	.....	7,047	7,047	6,749	177,093	0	(170,046)	0	(170,046)	0	7,047	0	0	0	213	05/01/2036	1.A FM
..126673-DR-0	CIABS Asset-Backed Certi-CIWL 2004-7 MF2 .....	.....	09/01/2024	PAYDOWN	.....	145,062	145,062	148,326	144,215	0	847	0	847	0	145,062	0	0	0	4,157	10/01/2034	1.A FM
..12667F-4N-2	Alternative Loan Trust 2-CWALT 2005-7CB .....	.....	09/01/2024	PAYDOWN	.....	70,642	70,526	58,393	59,848	0	11,585	0	10,724	0	70,642	0	0	0	2,447	03/01/2038	1.A FM
..12667F-5E-1	Alternative Loan Trust 2-CWALT 2005-6CB .....	.....	09/01/2024	PAYDOWN	.....	34,887	34,756	30,195	30,933	0	3,958	0	3,958	0	34,887	0	0	0	934	04/01/2035	1.A FM
..12667F-EG-6	Alternative Loan Trust 2-CWALT 2004-J2 3 .....	.....	09/01/2024	PAYDOWN	.....	13,450	13,450	13,355	13,411	0	39	0	39	0	13,450	0	0	0	500	04/01/2034	1.A FM
..12667F-RE-7	Alternative Loan Trust 2-CWALT 2004-J6 1 .....	.....	08/01/2024	MATURITY	.....	48,651	48,651	49,381	48,669	0	(17)	0	(17)	0	48,651	0	0	0	1,477	08/01/2024	1.A FM
..12667F-RG-2	Alternative Loan Trust 2-CWALT 2004-J6 2 .....	.....	09/01/2024	PAYDOWN	.....	281	281	282	281	0	0	0	0	0	281	0	0	0	12	11/01/2031	1.A FM
..12667F-VN-2	COUNTRYWIDE ALTERNATIVE -SERIES 2004-24C .....	.....	09/01/2024	PAYDOWN	.....	237,551	237,551	237,402	235,764	0	1,787	0	1,787	0	237,551	0	0	0	9,914	11/01/2034	1.A FM
..12667G-AA-1	Alternative Loan Trust 2-CWALT 2005-13CB .....	.....	09/25/2024	PAYDOWN	.....	91,078	90,962	78,558	71,139	0	19,845	0	19,845	0	91,078	0	0	0	2,896	05/25/2035	1.A FM
..12667G-AC-7	Alternative Loan Trust 2-CWALT 2005-13CB .....	.....	09/01/2024	PAYDOWN	.....	12,620	12,464	10,233	10,966	0	1,581	54	1,527	0	12,620	0	0	0	343	05/01/2035	1.A FM
..12668A-4C-6	Alternative Loan Trust 2-CWALT 2005-IM1 .....	.....	08/26/2024	PAYDOWN	.....	0	(17,808)	(11,675)	(9,951)	0	2,858	0	2,858	0	0	0	0	0	(149)	01/25/2036	1.A FM
..12668A-PC-3	Alternative Loan Trust 2-CWALT 2005-54CB .....	.....	09/01/2024	PAYDOWN	.....	19,462	19,313	15,814	14,784	0	3,643	312	3,331	0	19,462	0	0	0	673	11/01/2036	1.A FM
..12668A-XL-4	Alternative Loan Trust 2-CWALT 2005-63 5 .....	.....	09/01/2024	PAYDOWN	.....	12,358	12,358	11,253	11,194	0	2,032	0	2,032	0	12,358	0	0	0	353	12/01/2035	1.A FM
..12668B-YA-5	Alternative Loan Trust 2-CWALT 2006-7CB .....	.....	09/01/2024	PAYDOWN	.....	1,145	1,134	980	544	0	594	0	594	0	1,145	0	0	0	45	05/01/2036	1.A FM
..126694-2H-0	CHL Mortgage Pass-Through-CIHL 2006-10 1A .....	.....	09/01/2024	PAYDOWN	.....	14,341	14,341	7,594	7,767	0	6,600	31	6,569	0	14,341	0	0	0	640	05/01/2036	3.A FM
..126694-4F-2	CHL Mortgage Pass-Through-CIHL 2006-HYB3 .....	.....	09/01/2024	PAYDOWN	.....	22,895	22,897	21,990	22,817	0	266	0	266	0	22,895	0	0	0	461	05/01/2036	1.A FM
..126694-BE-7	CHL Mortgage Pass-Through-CIHL 2005-HYB6 .....	.....	09/01/2024	PAYDOWN	.....	3,853	3,853	3,268	3,482	0	418	0	418	0	3,853	0	0	0	115	10/01/2035	1.A FM
..126694-CS-5	CHL Mortgage Pass-Through-CIHL 2005-21 A1 .....	.....	09/01/2024	PAYDOWN	.....	162	951	772	719	0	94	0	94	0	162	0	0	0	30	10/01/2035	4.B FM
..126694-HP-6	CHL Mortgage Pass-Through-CIHL 2005-25 A1 .....	.....	08/01/2024	PAYDOWN	.....	11	(77)	(62)	(39)	0	12	0	12	0	11	0	0	0	(4)	11/01/2035	1.A FM
..126694-LC-0	CHL Mortgage Pass-Through-CIHL 2005-24 A3 .....	.....	09/01/2024	PAYDOWN	.....	1,805	1,807	1,379	1,331	0	462	0	462	0	1,805	0	0	0	265	11/01/2035	5.A FM
..126694-MH-8	CHL Mortgage Pass-Through-CIHL 2005-HYB7 .....	.....	09/01/2024	PAYDOWN	.....	81,800	146,739	117,392	129,251	0	4,568	0	4,568	0	81,800	0	0	0	4,688	11/01/2035	1.A FM

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Identification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..126694-QJ-0	CHL Mortgage Pass-Through-CIHL 2005-HY8B .....	.....	09/01/2024	PAYDOWN .....	.....	38,100	38,101	34,588	37,270	0	825	0	825	0	38,100	0	0	0	1,425	12/01/2035	1.A FM
..126694-UJ-5	CHL Mortgage Pass-Through-CIHL 2005-31 1A .....	.....	09/01/2024	PAYDOWN .....	.....	12,001	12,001	9,780	10,236	0	1,806	0	1,806	0	12,001	0	0	0	433	01/01/2036	1.A FM
..126694-UM-8	CHL Mortgage Pass-Through-CIHL 2005-31 2A .....	.....	09/01/2024	PAYDOWN .....	.....	29,879	29,888	28,758	28,773	0	1,115	0	1,115	0	29,879	0	0	0	853	01/01/2036	1.A FM
..126694-UN-6	CHL Mortgage Pass-Through-CIHL 2005-31 2A .....	.....	09/01/2024	PAYDOWN .....	.....	46,165	46,165	44,419	44,441	0	1,723	0	1,723	0	46,165	0	0	0	1,477	01/01/2036	1.A FM
..12669D-US-5	CHL Mortgage Pass-Through-CIHL 2002-39 A1 .....	.....	09/01/2024	PAYDOWN .....	.....	58,272	58,272	58,060	56,715	0	0	0	0	0	56,717	0	1,556	1,556	2,417	02/01/2033	1.A FM
..12669F-A8-6	CHL Mortgage Pass-Through-CIHL 2004-11 2A .....	.....	09/01/2024	PAYDOWN .....	.....	108,564	108,564	87,937	97,373	0	11,191	0	11,191	0	108,564	0	0	0	3,279	07/01/2034	1.A FM
..12669F-VH-3	CHL Mortgage Pass-Through-CIHL 2004-6 2A1 .....	.....	09/01/2024	PAYDOWN .....	.....	4,754	4,754	4,763	4,662	0	93	0	93	0	4,754	0	0	0	172	05/01/2034	1.A FM
..12669G-3S-8	CHL Mortgage Pass-Through-CIHL 2005-16 A2 .....	.....	09/01/2024	PAYDOWN .....	.....	5,963	5,775	4,244	4,414	0	1,491	91	1,400	0	5,963	0	0	0	214	09/01/2035	2.C FM
..12669G-4K-4	CHL Mortgage Pass-Through-CIHL 2005-J3 1A .....	.....	09/01/2024	PAYDOWN .....	.....	25,508	24,894	19,707	19,965	0	5,212	160	5,052	0	25,508	0	0	0	804	09/01/2035	1.A FM
..12669G-AA-0	CHL Mortgage Pass-Through-CIHL 2005-HYB3 .....	.....	09/01/2024	PAYDOWN .....	.....	125,866	125,866	114,538	125,125	0	741	0	741	0	125,866	0	0	0	2,691	06/01/2035	1.A FM
..12669G-BY-6	CHL Mortgage Pass-Through-CIHL 2004-HYB7 .....	.....	09/01/2024	PAYDOWN .....	.....	19,512	19,512	19,597	19,211	0	301	0	301	0	19,512	0	0	0	607	11/01/2034	1.A FM
..12669G-BZ-3	CHL Mortgage Pass-Through-CIHL 2004-HYB7 .....	.....	09/01/2024	PAYDOWN .....	.....	56,831	56,831	57,079	55,931	0	900	0	900	0	56,831	0	0	0	1,767	11/01/2034	1.A FM
..12669G-GH-8	CHL Mortgage Pass-Through-CIHL 2004-HYB8 .....	.....	09/01/2024	PAYDOWN .....	.....	22,974	22,974	20,666	20,666	0	2,308	0	2,308	0	22,974	0	0	0	733	01/01/2035	1.A FM
..12669G-R4-5	CHL Mortgage Pass-Through-CIHL 2005-15 A8 .....	.....	09/01/2024	PAYDOWN .....	.....	2,182	2,215	1,303	1,324	0	1,025	140	885	0	2,182	0	0	0	79	08/01/2035	1.A FM
..12694*-AA-4	CVS (New Albany, IN) Trust Certificate .....	.....	09/15/2024	SINKING PAYMENT .....	.....	47,863	47,863	47,863	47,863	0	0	0	0	0	47,863	0	0	0	2,255	01/15/2041	2.B
..12697#-AA-7	Cric KY HQ LLC Senior Secured Note .....	.....	09/15/2024	SINKING PAYMENT .....	.....	42,065	42,065	42,065	42,066	0	(1)	0	(1)	0	42,065	0	0	0	448	03/15/2042	1.D PL
..12707*-AA-9	CVS (NC SC PA & VA) Con Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT .....	.....	112,883	112,883	112,883	112,883	0	0	0	0	0	112,883	0	0	0	3,675	01/15/2044	2.B
..12724@-AA-6	CVS (Clawson & Richmond Trust Certificat .....	.....	09/15/2024	SINKING PAYMENT .....	.....	128,305	128,305	129,541	129,133	0	(827)	0	(827)	0	128,305	0	0	0	4,038	01/15/2035	2.B
..12733#-AA-3	CTL Pass-Thru Trust Seri Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT .....	.....	80,197	80,197	80,197	80,197	0	0	0	0	0	80,197	0	0	0	2,255	10/15/2043	1.F
..12760@-AA-1	CGA Capital Corp Pass Thru Ctls Series 2 .....	.....	09/10/2024	SINKING PAYMENT .....	.....	259,787	259,787	259,787	259,787	0	0	0	0	0	259,787	0	0	0	12,151	03/10/2031	1.A
..12762*-AA-1	CDI Tuscany Intermediate Senior Secured .....	.....	09/30/2024	SINKING PAYMENT .....	.....	47,961	47,961	47,961	47,961	0	0	0	0	0	47,961	0	0	0	2,782	06/30/2040	2.A PL
..13177*-AA-8	Camargo Investments I LL Senior Note .....	.....	09/20/2024	VARIOUS .....	.....	(710,460)	(710,460)	(710,460)	(710,460)	0	0	0	0	0	(710,460)	0	0	0	(64,361)	05/31/2025	5.B GI
..14040H-CG-8	Capital One Financial Co-SUBORDINATED .....	.....	08/26/2024	JP MORGAN SECURITIES .....	.....	8,052,000	10,000,000	9,264,100	9,382,366	0	41,511	0	41,511	0	9,423,877	0	(1,371,877)	(1,371,877)	254,248	07/29/2032	2.B FE
..14310Q-AA-6	Carlyle GMS Finance MM C-CGFM 2015-1A A1 .....	.....	07/02/2024	PAYDOWN .....	.....	27,757,494	27,757,494	27,757,494	27,757,494	0	0	0	0	0	27,757,494	0	0	0	1,427,176	10/15/2031	1.A FE
..14310Q-AE-8	Carlyle GMS Finance MM C-CGFM 2015-1A A1 .....	.....	07/02/2024	PAYDOWN .....	.....	14,299,315	14,299,315	14,299,315	14,297,919	0	1,396	0	1,396	0	14,299,315	0	0	0	467,600	10/15/2031	1.A FE
..14310Q-AG-3	Carlyle GMS Finance MM C-CGFM 2015-1A A2 .....	.....	07/02/2024	PAYDOWN .....	.....	15,000,000	15,000,000	15,000,000	15,000,000	0	0	0	0	0	15,000,000	0	0	0	845,892	10/15/2031	1.C FE
..14576A-AA-0	Cars Net Lease Mortgage -CARM 2020-1A A1 .....	.....	09/15/2024	PAYDOWN .....	.....	17,500	17,500	17,493	17,495	0	5	0	5	0	17,500	0	0	0	245	12/15/2050	1.A FE
..14576A-AB-8	Cars Net Lease Mortgage -CARM 2020-1A A2 .....	.....	09/15/2024	PAYDOWN .....	.....	1,875	1,875	1,874	1,874	0	1	0	1	0	1,875	0	0	0	31	12/15/2050	1.A FE
..14576A-AC-6	Cars Net Lease Mortgage -CARM 2020-1A A3 .....	.....	09/15/2024	PAYDOWN .....	.....	3,625	3,625	3,536	2,811	0	89	0	89	0	3,625	0	0	0	67	12/15/2050	1.F FE
..14686G-AD-8	Carvana Auto Receivables-CRVNA 2022-NY C .....	.....	09/10/2024	PAYDOWN .....	.....	212,698	212,698	212,674	212,690	0	8	0	8	0	212,698	0	0	0	4,812	12/11/2028	1.D FE
..14855#-AA-4	Castlelake Secured Aviat Notes Class A .....	.....	09/15/2024	SINKING PAYMENT .....	.....	222,944	222,944	217,282	218,020	0	4,819	0	4,819	0	222,944	0	0	0	24,531	05/31/2035	1.F PL
..14856G-AA-8	Castlelake Aircraft Stru-CLAST 2021-1A A .....	.....	09/15/2024	PAYDOWN .....	.....	127,869	127,869	127,865	127,869	0	0	0	0	0	127,869	0	0	0	2,876	01/15/2046	1.G FE
..152314-KJ-8	Centex Home Equity Loan -CXHE 2004-C AF5 .....	.....	09/01/2024	PAYDOWN .....	.....	97,932	97,932	97,688	97,464	0	468	0	468	0	97,932	0	0	0	3,191	06/01/2034	1.A FM
..161546-CW-4	Chase Funding Trust Seri-CFAB 2002-3 1A5 .....	.....	09/01/2024	PAYDOWN .....	.....	81,862	81,862	81,490	81,490	0	372	0	372	0	81,862	0	0	0	2,966	06/01/2032	1.A FM
..16159#-AC-8	Chase Home Lending Mortg-CHASE 2019-1 A3 .....	.....	09/01/2024	PAYDOWN .....	.....	10,980	10,980	11,241	11,245	0	(264)	0	(264)	0	10,980	0	0	0	257	03/01/2050	1.A
..16162#-PV-5	Chase Mortgage Finance T-CHASE 2005-A2 1 .....	.....	09/01/2024	PAYDOWN .....	.....	1,868	4,639	3,986	3,704	0	534	0	534	0	1,868	0	0	0	77	01/01/2036	1.A FM
..161630-BA-5	Chase Mortgage Finance T-CHASE 2007-A1 1 .....	.....	09/01/2024	PAYDOWN .....	.....	1,800	1,800	1,743	1,784	0	16	0	16	0	1,800	0	0	0	65	02/01/2037	1.A FM
..16165M-AG-3	ChaseFlex Trust Series 2-CFKX 2006-2 A5 .....	.....	09/01/2024	PAYDOWN .....	.....	41,107	41,160	37,648	37,945	0	3,215	0	3,215	0	41,108	0	0	0	1,082	09/01/2036	1.A FM
..16372#-AA-0	Chemical Bank Pass-Thru Certificate .....	.....	09/10/2024	SINKING PAYMENT .....	.....	56,376	56,376	56,376	56,376	0	0	0	0	0	56,376	0	0	0	3,036	06/10/2044	2.A
..16877#-AA-0	Childress Klien-Cambridg Senior Secured .....	.....	09/05/2024	SINKING PAYMENT .....	.....	183,511	183,511	183,741	183,657	0	(145)	0	(145)	0	183,511	0	0	0	(316)	01/05/2036	1.B
..169926-AA-0	CHNGE Mortgage Trust 202-CHNGE 2023-2 A1 .....	.....	09/01/2024	PAYDOWN .....	.....	235,479	235,479	231,652	232,043	0	3,435	0	3,435	0	235,479	0	0	0	10,019	06/01/2058	1.A FE
..170257-AE-9	CHL Mortgage Pass-Through-CIHL 2006-16 3A .....	.....	09/01/2024	PAYDOWN .....	.....	0	(16)	(9)	(6)	0	1	0	1	0	0	0	0	0	(430)	11/01/2036	1.A FM
..17025R-AA-3	COUNTRYWIDE HOME LOANS-SERIES 2007-HY4 C .....	.....	09/01/2024	PAYDOWN .....	.....	77,879	76,960	55,620	59,299	0	17,945	0	17,945	0	77,879	0	0	0	1,180	09/01/2047	1.A FM
..17030A-AA-3	CHNGE Mortgage Trust 202-CHNGE 2023-3 A1 .....	.....	09/01/2024	PAYDOWN .....	.....	409,524	409,524	406,836	407,212	0	2,312	0	2,312	0	409,524	0	0	0	19,321	07/01/2058	1.A FE
..17030J-AA-4	CHNGE Mortgage Trust 202-CHNGE 2022-1 A1 .....	.....	09/01/2024	PAYDOWN .....	.....	375,958	375,958	375,955	375,958	0	0	0	0	0	375,958	0	0	0	7,820	01/01/2067	1.A FE
..172967-KU-4	Citigroup Inc-SUBORDINATED .....	.....	08/23/2024	CITIGROUP GLOBAL MAR .....	.....	5,907,960	6,000,000	5,864,580	5,938,618	0	7,993	0	7,993	0	5,946,611	0	(38,651)	(38,651)	268,813	07/25/2028	2.B FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..17307G-EB-7	Citigroup Mortgage Loan -CMLTI 2005-8 1A		09/01/2024	PAYDOWN		34,374	33,870	28,709	30,471	0	3,472	0	3,472	0	34,374	0	0	0	602	10/01/2035	1.A FM
..17307G-ED-6	Citigroup Mortgage Loan -CMLTI 2004-HYB2		09/01/2024	PAYDOWN		14,366	14,366	12,941	13,116	0	1,366	116	1,250	0	14,366	0	0	0	622	03/01/2034	1.A FM
..17307G-RE-0	Citigroup Mortgage Loan -CMLTI 2005-2 1A		09/01/2024	PAYDOWN		11,213	11,213	10,439	11,045	0	168	0	168	0	11,213	0	0	0	362	05/01/2035	1.A FM
..17307G-TY-4	Citigroup Mortgage Loan -CMLTI 2005-3 24		09/01/2024	PAYDOWN		120,861	121,191	115,283	101,957	0	19,091	0	19,091	0	120,861	0	0	0	3,241	08/01/2035	1.A FM
..17307G-VN-5	Citigroup Mortgage Loan -CMLTI 2005-WF2		09/01/2024	PAYDOWN		162	162	135	44	0	118	0	118	0	162	0	0	0	7	08/01/2035	1.A FM
..17307G-W9-5	Citigroup Mortgage Loan -CMLTI 2005-11 A		09/01/2024	PAYDOWN		761	737	761	763	0	(2)	0	(2)	0	761	0	0	0	40	11/01/2035	1.A FM
..17309A-AD-1	CitiMortgage Alternative-CMALT 2006-A1 1		09/01/2024	PAYDOWN		57,126	54,159	51,531	52,264	0	2,630	0	2,630	0	57,126	0	0	0	1,827	04/01/2036	1.A FM
..17309A-AF-6	CitiMortgage Alternative-CMALT 2006-A1 1		09/01/2024	PAYDOWN		80,594	78,125	74,057	72,299	0	6,762	0	6,762	0	80,594	0	0	0	2,978	04/01/2036	1.A FM
..17309B-AB-3	Citigroup Mortgage Loan -CMLTI 2006-WF2		09/01/2024	PAYDOWN		7,809	7,809	3,259	3,355	0	4,569	115	4,454	0	7,809	0	0	0	122	05/01/2036	1.A FM
..17309N-AG-6	Citicorp Residential Mor-CRMSI 2006-1 M1		09/01/2024	PAYDOWN		155,740	155,740	149,218	154,649	0	1,091	0	1,091	0	155,740	0	0	0	4,788	07/01/2036	1.A FM
..17309V-AH-6	CitiMortgage Alternative-CMALT 2006-A4 1		09/01/2024	PAYDOWN		7,837	9,682	9,317	9,414	0	218	0	218	0	7,837	0	0	0	381	09/01/2036	4.A FM
..17312H-AF-6	Citicorp Residential Mor-CRMSI 2007-2 A6		09/01/2024	PAYDOWN		145	145	139	144	0	1	0	1	0	145	0	0	0	4	06/01/2037	1.A FM
..17312V-AA-6	Citigroup Mortgage Loan -CMLTI 2007-6 1A		09/01/2024	PAYDOWN		3,776	3,925	1,370	2,313	0	1,516	0	1,516	0	3,776	0	0	0	64	03/01/2037	1.A FM
..17315X-AF-8	Citigroup Mortgage Loan -CMLTI 2009-9 2A		09/30/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	(13)	11/01/2035	1.A FM
..17322N-AD-6	Citigroup Mortgage Loan -CMLTI 2014-J1 A		09/01/2024	PAYDOWN		8,927	8,927	8,874	8,752	0	175	0	175	0	8,927	0	0	0	197	06/01/2044	1.A
..17323M-AE-5	Citigroup Mortgage Loan -CMLTI 2015-A B3		09/01/2024	PAYDOWN		354,005	354,005	321,702	326,839	0	27,166	0	27,166	0	354,005	0	0	0	11,221	06/01/2058	1.A
..193051-AA-7	Cold Storage Trust 2020-COLD 2020-1CE5		08/15/2024	PAYDOWN		1,965,981	1,965,981	1,943,864	1,946,392	0	19,589	0	19,589	0	1,965,981	0	0	0	84,528	11/15/2037	1.A
..19393B-AB-3	College Ave Student Loan-CASL 2023-A A2		09/25/2024	PAYDOWN		77,134	77,134	77,119	77,123	0	12	0	12	0	77,134	0	0	0	2,790	05/25/2055	1.A FE
..19421U-AB-0	College Avenue Student L-CASL 2019-A A2		09/25/2024	PAYDOWN		114,190	114,190	114,148	114,162	0	28	0	28	0	114,190	0	0	0	2,513	12/28/2048	1.A FE
..19424K-AB-9	College Avenue Student L-CASL 2021-A A2		09/25/2024	PAYDOWN		230,915	230,915	230,869	230,878	0	37	0	37	0	230,915	0	0	0	2,465	07/25/2051	1.A FE
..19424K-AD-5	College Ave Student Loan-CASL 2021-A C		09/25/2024	PAYDOWN		123,080	123,080	113,234	114,816	0	8,265	0	8,265	0	123,080	0	0	0	2,398	07/25/2051	1.F FE
..19425A-AD-6	College Avenue Student L-CASL 2021-B C		09/25/2024	PAYDOWN		96,289	96,289	96,289	96,289	0	8	0	8	0	96,289	0	0	0	1,766	06/25/2052	1.F FE
..19425A-AE-4	College Avenue Student L-CASL 2021-B D		09/25/2024	PAYDOWN		313,486	313,486	313,343	313,401	0	86	0	86	0	313,486	0	0	0	7,596	06/25/2052	2.B FE
..19685G-AA-4	COLT Funding LLC-COLT 2022-4 A1		09/01/2024	PAYDOWN		71,476	71,476	69,957	70,518	0	957	0	957	0	71,476	0	0	0	2,066	03/01/2067	1.A FE
..19685G-AC-0	COLT Funding LLC-COLT 2022-4 A3		09/01/2024	PAYDOWN		95,626	95,626	94,813	94,967	0	660	0	660	0	95,626	0	0	0	2,891	03/01/2067	1.F FE
..19687Y-AA-3	COLT 2020-RPL1 Trust-COLT 2020-RPL1 A1		09/01/2024	PAYDOWN		520,506	520,506	520,505	520,499	0	7	0	7	0	520,506	0	0	0	4,882	01/01/2065	1.A FE
..19688E-AA-6	COLT 2021-1 Mortgage Loa-COLT 2021-1 A1		09/01/2024	PAYDOWN		304,232	304,232	267,724	278,145	0	26,087	0	26,087	0	304,232	0	0	0	1,815	06/01/2066	1.A FE
..19688F-AA-3	COLT 2021-3 Mortgage Loa-COLT 2021-3 A1		09/01/2024	PAYDOWN		223,348	223,348	191,800	195,689	0	27,659	0	27,659	0	223,348	0	0	0	1,446	09/01/2066	1.A FE
..19688H-AA-9	COLT 2022-1 Mortgage Loa-COLT 2022-1 A1		09/01/2024	VARIOUS		15,444,500	15,444,573	15,444,420	15,444,485	0	15	0	15	0	15,444,500	0	0	0	233,343	12/01/2066	1.A FE
..19688L-AA-0	COLT 2022-5 Mortgage Loa-COLT 2022-5 A1		09/01/2024	PAYDOWN		256,133	256,133	256,054	256,133	0	0	0	0	0	256,133	0	0	0	7,874	04/01/2067	1.A FE
..19688M-AB-8	COLT 2022-5 Mortgage Loa-COLT 2022-5 A2		09/01/2024	PAYDOWN		427,068	427,068	420,847	422,924	0	4,144	0	4,144	0	427,068	0	0	0	13,128	03/01/2067	1.C FE
..19688M-AB-6	COLT 2022-8 Mortgage Loa-COLT 2022-8 A2		09/01/2024	PAYDOWN		78,544	78,544	77,887	78,005	0	539	0	539	0	78,544	0	0	0	3,389	08/01/2067	1.C FE
..19688M-AC-4	COLT 2022-8 Mortgage Loa-COLT 2022-8 A3		09/01/2024	PAYDOWN		81,338	81,338	80,084	80,298	0	1,040	0	1,040	0	81,338	0	0	0	3,511	08/01/2067	1.F FE
..196919-AA-2	COLT 2024-INV3 Mortgage -COLT 2024-INV3		09/01/2024	PAYDOWN		209,372	209,372	209,372	209,372	0	0	0	0	0	209,372	0	0	0	950	09/01/2069	1.A FE
..196919-AB-0	COLT 2024-INV3 Mortgage -COLT 2024-INV3		09/01/2024	PAYDOWN		116,094	116,094	116,092	0	0	2	0	2	0	116,094	0	0	0	551	09/01/2069	1.C FE
..20267U-AA-7	COMMONBOND STUDENT LOAN -SERIES 16-B CLA		09/25/2024	PAYDOWN		45,980	45,980	45,967	45,974	0	6	0	6	0	45,980	0	0	0	833	10/25/2040	1.A FE
..20268A-AB-8	Commonbond Student Loan -CBSLT 2021-BGS		08/25/2024	PAYDOWN		113,957	113,957	94,015	0	0	19,942	0	19,942	0	113,957	0	0	0	1,104	09/25/2051	1.G FE
..20268B-AB-6	Commonbond Student Loan -CBSLT 2020-1 B		09/25/2024	PAYDOWN		81,178	81,178	69,002	69,479	0	11,700	0	11,700	0	81,178	0	0	0	1,723	10/25/2051	1.D FE
..20268K-AA-8	Commonbond Student Loan -CBSLT 2017-BGS		09/25/2024	PAYDOWN		120,581	120,581	110,633	0	0	9,948	0	9,948	0	120,581	0	0	0	355	09/25/2042	1.A FE
..20268W-AB-0	Commonbond Student Loan -CBSLT 2021-AGS		09/25/2024	PAYDOWN		30,459	30,459	23,149	0	0	7,310	0	7,310	0	30,459	0	0	0	284	03/25/2052	1.D FE
..20269D-AA-3	Commonbond Student Loan -CBSLT 2018-AGS		09/25/2024	PAYDOWN		110,161	110,161	102,381	0	0	7,780	0	7,780	0	110,161	0	0	0	456	02/25/2044	1.A FE
..20753Y-CH-3	Connecticut Avenue Secur-CAS 2022-R04 1M		09/25/2024	PAYDOWN		355,944	355,944	355,778	356,111	0	(167)	0	(167)	0	355,944	0	0	0	17,680	03/25/2042	1.A
..20755D-AA-4	Connecticut Avenue Secur-CAS 2022-R08 1M		09/25/2024	PAYDOWN		565,205	565,205	568,176	562,894	0	2,311	0	2,311	0	565,205	0	0	0	29,998	07/25/2042	1.A
..212168-AA-6	Continental Wind LLC-FIRST LIEN		08/31/2024	SINKING PAYMENT		195,014	195,014	195,014	195,014	0	0	0	0	0	195,014	0	0	0	11,701	02/28/2033	2.B FE
..221609-AA-6	Costco (Monterey Park C Trust Certifica		09/20/2024	SINKING PAYMENT		32,503	32,503	32,503	32,499	0	5	0	5	0	32,503	0	0	0	1,060	06/20/2043	1.E
..22163F-AA-1	Costco (Oceanside NY) Le Trust Certifica		09/15/2024	SINKING PAYMENT		79,348	79,348	79,348	79,348	0	0	0	0	0	79,348	0	0	0	1,662	11/30/2041	1.E

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22	
										11	12	13	14	15								
CUSIP Ident-ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol	
..224044-CN-5	Cox Communications Inc-SENIOR UNSECURED		08/08/2024	VARIOUS		30,413,975	34,783,000	33,748,862	33,939,967	0	60,574	0	60,574	0	34,000,541	0	(3,586,566)	(3,586,566)	580,698	06/15/2031	2.B FE	....
..224092-AA-4	OP EF Asset Securitizati-CPEF 2023-1A A		09/15/2024	PAYDOWN		1,391,348	1,391,348	1,384,449	1,384,639	0	6,709	0	6,709	0	1,391,348	0	0	0	69,758	03/15/2032	1.C FE	....
..22541Q-CZ-3	Credit Suisse First Bost-CSFB 2003-AR15		09/25/2024	PAYDOWN		24,883	24,883	24,883	25,392	0	(508)	0	(508)	0	24,883	0	0	0	1,042	06/25/2033	1.A FM	....
..22541Q-FV-9	CSFB MORTGAGE-BACKED PAS-CSFB 2003-17 1A		09/01/2024	PAYDOWN		7,417	7,417	7,486	7,406	0	11	0	11	0	7,417	0	0	0	271	06/01/2033	4.C FM	....
..22541Q-XS-6	Credit Suisse First Bost-CSFB 2003-23 DB		09/01/2024	PAYDOWN		72,234	72,234	72,279	72,107	0	127	0	127	0	72,234	0	0	0	2,242	09/01/2033	1.A FM	....
..22541S-PJ-1	CSFB Mortgage-Backed Tru-CSFB 2004-AR6 C		09/25/2024	PAYDOWN		8,606	8,606	6,842	7,912	0	694	0	694	0	8,606	0	0	0	339	10/25/2034	1.A FM	....
..225458-2Y-3	Credit Suisse First Bost-CSFB 2005-8 9A1		09/01/2024	PAYDOWN		3,412	3,412	2,721	2,809	0	645	17	628	0	3,412	0	0	0	205	09/01/2035	2.B FM	....
..225458-L5-5	Credit Suisse First Bost-CSFB 2005-7 1A1		09/01/2024	PAYDOWN		4,024	4,024	3,705	3,618	0	500	94	406	0	4,024	0	0	0	106	08/01/2035	3.B FM	....
..225458-LD-8	CSFB MORTGAGE-BACKED PAS-CSFB 2005-3 6A1		09/01/2024	PAYDOWN		10,765	10,765	9,500	10,266	0	499	0	499	0	10,765	0	0	0	418	07/01/2035	1.A FM	....
..225470-VF-7	CSMC Mortgage-Backed Tru-CSMC 2006-1 3A1		09/01/2024	PAYDOWN		156,542	156,518	83,349	88,902	0	72,808	5,101	67,707	0	156,542	0	0	0	7,768	02/01/2036	1.A FM	....
..225410-FJ-9	Credit Suisse First Bost-CSFB 2003-1 1A1		09/01/2024	PAYDOWN		3,850	3,850	3,989	3,900	0	(50)	0	(50)	0	3,850	0	0	0	180	02/01/2033	2.B FM	....
..22757H-AA-9	Cross 2024-H5 Mortgage T-CROSS 2024-H5 A		09/01/2024	PAYDOWN		119,200	119,200	119,199	0	0	0	1	0	0	119,200	0	0	0	575	08/01/2069	1.A FE	....
..22757H-AB-7	Cross 2024-H5 Mortgage T-CROSS 2024-H5 A		09/01/2024	PAYDOWN		178,800	178,800	178,798	0	0	2	0	2	0	178,800	0	0	0	895	08/01/2069	1.C FE	....
..22942M-BF-2	CSMC Mortgage-Backed Tru-CSMC 2006-8 5A1		09/01/2024	PAYDOWN		21,023	21,023	20,497	20,491	0	531	0	531	0	21,023	0	0	0	769	10/01/2026	3.A FM	....
..22960*-AA-0	CTL PASS THRU TR SER 2013 (OCHSNER SLIDE		09/15/2024	SINKING PAYMENT		248,810	248,810	248,810	248,813	0	(2)	0	(2)	0	248,810	0	0	0	8,740	12/15/2028	1.G	....
..229658-AA-3	WAG (Edina, Minnesota) C Trust Certifica		09/15/2024	SINKING PAYMENT		49,510	49,510	50,005	49,808	0	(298)	0	(298)	0	49,510	0	0	0	1,642	07/15/2037	3.A	....
..22970*-AA-8	BNSF (Dayton, Texas) Con Trust Certifica		09/01/2024	SINKING PAYMENT		188,472	188,472	188,472	188,477	0	(5)	0	(5)	0	188,472	0	0	0	5,990	05/15/2034	1.D PL	....
..229738-AA-3	Great West Casualty Comp Trust Certifica		09/15/2024	SINKING PAYMENT		88,261	88,261	88,557	88,487	0	(227)	0	(227)	0	88,261	0	0	0	4,185	12/15/2037	1.C PL	....
..229778-AA-9	CTL Pass-Thru Trust Seri Trust Certifica		09/15/2024	SINKING PAYMENT		79,770	79,770	79,770	79,770	0	0	0	0	0	79,770	0	0	0	2,403	12/15/2038	1.E	....
..23242L-AB-9	CIWHEQ Revolving Home Equ-CIWHEL 2006-F 2A		09/16/2024	PAYDOWN		9,699	9,699	6,777	9,110	0	588	0	588	0	9,699	0	0	0	384	07/15/2036	1.A FM	....
..23248A-AJ-0	COUNTRYWIDE ASSET-BACKED-SERIES 2007-SEA		09/25/2024	PAYDOWN		9,246	9,246	5,733	12,019	0	(2,772)	0	(2,772)	0	9,246	0	0	0	241	05/25/2047	1.A FM	....
..233046-AF-8	DNKN 2017-1A A211		08/20/2024	PAYDOWN		52,500	52,500	52,500	52,500	0	0	0	0	0	52,500	0	0	0	1,587	11/20/2047	2.B FE	....
..233046-AH-4	DB Master Finance LLC-DNKN 2017-1AW A211		08/20/2024	PAYDOWN		30,000	30,000	29,986	29,994	0	6	0	6	0	30,000	0	0	0	756	11/20/2047	1.C FE	....
..233046-AM-3	DB Master Finance LLC-DNKN 2019-1AW A23W		08/20/2024	PAYDOWN		45,000	45,000	45,480	45,282	0	(282)	0	(282)	0	45,000	0	0	0	1,355	05/20/2049	1.C FE	....
..233168-AA-5	DEA (Nashville TN) LLC Pass-Thru Certifi		09/05/2024	SINKING PAYMENT		92,567	92,567	92,567	92,567	0	0	0	0	0	92,567	0	0	0	2,160	08/05/2040	1.B	....
..23332U-AD-6	DSLA Mortgage Loan Trust-DSLA 2004-AR1 A		09/19/2024	PAYDOWN		10,480	10,480	9,193	10,650	0	(170)	0	(170)	0	10,480	0	0	0	401	09/19/2044	1.A FM	....
..240238-AA-7	DC Department of Correct Pass-Thru Certi		09/15/2024	SINKING PAYMENT		91,885	91,885	91,885	91,998	0	(113)	0	(113)	0	91,885	0	0	0	7,184	03/15/2033	1.B PL	....
..24380X-AA-5	Deephaven Residential Mo-DRMT 2022-2 A1		09/01/2024	PAYDOWN		74,438	74,438	70,158	70,215	0	4,223	0	4,223	0	74,438	0	0	0	2,248	03/01/2067	1.A FE	....
..24736X-AA-6	DELTA AIR LINES 2015-1AA-FIRST LIEN		07/30/2024	SINKING PAYMENT		0	0	0	0	0	0	0	0	0	0	0	0	0	(2,877)	07/30/2027	1.F FE	....
..24736Y-AA-4	Delta Air Lines 2015-1 C-DAL 3 7/8 07/30		07/30/2024	SINKING PAYMENT		76,705	76,705	76,705	76,675	0	30	0	30	0	76,705	0	0	0	3,024	07/30/2027	2.B FE	....
..25150M-AC-0	Deutsche Alt-A Securitie-DBALT 2007-RMP1		09/25/2024	PAYDOWN		54,350	54,350	42,801	60,606	0	(6,256)	0	(6,256)	0	54,350	0	0	0	696	12/25/2036	1.A FM	....
..25150N-AB-0	Deutsche Alt-A Securitie-DBALT 2006-AR5		09/25/2024	PAYDOWN		37,607	37,607	13,538	13,658	0	24,123	175	23,948	0	37,607	0	0	0	565	10/25/2036	1.A FM	....
..251510-CV-3	Deutsche Alt-A Securitie-DBALT 2005-1 1A		09/25/2024	PAYDOWN		22,985	22,985	16,693	19,247	0	3,738	0	3,738	0	22,985	0	0	0	875	02/25/2035	1.A FM	....
..251510-EP-4	DEUTSCHE ALT-A SECURITIE-DBALT 2005-3 5A		09/25/2024	PAYDOWN		82,430	82,430	61,869	78,221	4,564	(355)	0	4,209	0	82,430	0	0	0	3,162	06/25/2035	5.A FM	....
..251510-LM-3	Deutsche Alt-A Securitie-DBALT 2006-AR1		08/01/2024	PAYDOWN		8,064	7,029	6,311	6,912	0	1,871	0	1,871	0	8,064	0	0	0	164	02/01/2036	2.B FM	....
..251510-MD-2	Deutsche Alt-B Securitie-DBALT 2006-AB1		09/01/2024	PAYDOWN		13,988	14,258	14,235	9,989	0	4,314	0	4,314	0	13,988	0	0	0	463	02/01/2036	1.A FM	....
..251563-FP-2	Deutsche Mortgage Securi-DMSI 2004-4 7AR		09/25/2024	PAYDOWN		0	0	2,101	12	0	5	0	5	0	33	0	0	33	06/25/2034	6. *	....	
..25273C-AB-6	Diamond Resorts Owner Tr-DROT 2021-1A B		09/20/2024	PAYDOWN		85,545	85,545	85,023	85,210	0	335	0	335	0	85,545	0	0	0	1,179	11/21/2033	1.F FE	....
..256746-AJ-7	Dollar Tree Inc-SENIOR UNSECURED		07/30/2024	MRB0010		9,244,539	9,447,000	9,184,459	9,230,403	0	14,136	0	14,136	0	9,244,539	0	0	0	166,202	12/01/2031	2.B FE	....
..26067*-AA-3	Dow (Midland Mi) Control Trust Certifica		09/15/2024	SINKING PAYMENT		167,011	167,011	167,763	167,391	0	(379)	0	(379)	0	167,011	0	0	0	5,773	03/15/2034	2.A	....
..26208L-AC-2	DRIVEN BRANDS FUNDING LL-HONK 2018-1A A2		07/29/2024	PAYDOWN		6,580,000	6,580,000	6,580,000	6,580,332	0	(332)	0	(332)	0	6,580,000	0	0	0	241,645	04/20/2048	2.C FE	....
..26209X-AC-5	DRIVEN BRANDS FUNDING LL-HONK 2020-2A A2		07/20/2024	PAYDOWN		12,500	12,500	12,500	12,500	0	0	0	0	0	12,500	0	0	0	303	01/20/2051	2.C FE	....
..26209X-AF-8	DRIVEN BRANDS FUNDING LL-HONK 2022-1A A2		07/20/2024	PAYDOWN		87,500	87,500	87,500	87,500	0	0	0	0	0	87,500	0	0	0	4,852	10/20/2052	2.C FE	....
..264438-AA-6	Dulles Discovery 1 Contr Pass-Thru Certi		09/05/2024	SINKING PAYMENT		150,206	150,206	150,206	150,206	0	0	0	0	0	150,206	0	0	0	4,331	06/05/2037	1.A	....
..26844Q-AA-5	EFMT 2023-1-EFMT 2023-1 A1		09/01/2024	PAYDOWN		124,046	124,046	122,573	0	0	1,473	0	1,473	0	124,046	0	0	0	8,193	02/01/2068	1.A FE	....
..268478-AA-8	Edx/Ge Inventory Supply Pass-Thru Certif		07/15/2024	SINKING PAYMENT		112,011	112,011	112,011	112,011	0	(1)	0										

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-ign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/(Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..26848#-AA-5	EDX/GE Inventory Supply Pass-Thru Certif .....	.....	07/15/2024	SINKING PAYMENT .....	.....	99,390	99,390	99,390	99,392	0	(1)	0	(1)	0	99,390	0	0	0	3,307	01/15/2029	2.A
..26848#-AA-9	EDX/GE Inventory Supply Pass-Thru Certif .....	.....	07/15/2024	SINKING PAYMENT .....	.....	51,949	51,949	51,949	51,949	0	0	0	0	0	51,949	0	0	0	1,305	01/15/2030	2.A
..26894B-AA-4	Eagle Bancorp Inc-SUBORDINATED .....	.....	09/01/2024	MATURITY .....	.....	4,000,000	4,000,000	4,000,000	4,000,000	0	0	0	0	0	4,000,000	0	0	0	230,000	09/01/2024	2.C FE
..26929H-AB-1	EWC Master Issuer LLC-WAX 2022-1A A2 .....	.....	09/15/2024	PAYDOWN .....	.....	18,750	18,750	18,015	18,129	0	621	0	621	0	18,750	0	0	0	773	03/15/2052	2.B FE
..28166L-AA-2	EDvestinU Private Educat-EDVES 2021-A A .....	.....	09/25/2024	PAYDOWN .....	.....	219,635	219,635	191,932	192,644	0	26,991	0	26,991	0	219,635	0	0	0	2,665	11/25/2045	1.A FE
..28416L-AA-0	Elara HGV Timeshare Issu-EHGV 2021-A A .....	.....	09/25/2024	PAYDOWN .....	.....	136,261	136,261	122,166	123,270	0	12,990	0	12,990	0	136,261	0	0	0	1,235	08/27/2035	1.A FE
..28416L-AB-8	Elara HGV Timeshare Issu-EHGV 2021-A B .....	.....	09/25/2024	PAYDOWN .....	.....	104,199	104,199	102,449	102,792	0	1,407	0	1,407	0	104,199	0	0	0	1,208	08/27/2035	1.F FE
..28416T-AA-3	Elara HGV Timeshare Issu-EHGV 2019-A A .....	.....	09/25/2024	PAYDOWN .....	.....	200,214	200,214	187,576	189,591	0	10,623	0	10,623	0	200,214	0	0	0	3,526	01/25/2034	1.A FE
..28628C-AB-2	ELFI Graduate Loan Progr-ELFI 2022-A B .....	.....	09/25/2024	PAYDOWN .....	.....	292,473	292,473	236,356	246,876	0	45,597	0	45,597	0	292,473	0	0	0	0	08/26/2047	1.C FE
..28932M-AA-3	Elm Road Generating Stat-SECURED NOTE .....	.....	08/11/2024	SINKING PAYMENT .....	.....	214,886	214,886	214,886	214,892	0	(5)	0	(5)	0	214,886	0	0	0	11,193	02/11/2030	1.F FE
..29280M-AA-9	Energy Asset Issuer Trus Senior Secured .....	.....	09/25/2024	SINKING PAYMENT .....	.....	1,298,600	1,298,600	1,298,600	0	0	0	0	0	0	1,298,600	0	0	0	48,747	03/25/2049	1.F PL
..293791-AF-6	Enterprise Products Oper-SENIOR UNSECURE .....	.....	08/26/2024	VARIOUS .....	.....	11,466,850	10,000,000	13,224,000	12,741,884	0	(168,524)	0	(168,524)	0	12,573,360	0	(1,106,510)	(1,106,510)	678,906	03/01/2033	1.G FE
..29977F-AA-2	EverBright Solar Trust 2-EVBRT 2024-A A .....	.....	09/20/2024	PAYDOWN .....	.....	137,696	137,696	136,484	0	1,212	0	0	1,212	0	137,696	0	0	0	3,468	06/22/2054	1.G FE
..30225V-AG-2	Extra Space Storage LP-SENIOR UNSECURED .....	.....	08/08/2024	VARIOUS .....	.....	18,472,200	21,158,000	20,011,041	20,199,913	0	61,821	0	61,821	0	20,261,734	0	(1,789,535)	(1,789,535)	441,933	03/15/2032	2.B FE
..30227F-AJ-9	Extended Stay America Tr-ESA 2021-ESH D .....	.....	09/15/2024	PAYDOWN .....	.....	251,387	251,387	251,387	251,387	0	0	0	0	0	251,387	0	0	0	13,857	07/15/2038	1.A
..30260G-AA-4	FCI Funding 2021-1 LLC-FCITL 2021-1A A .....	.....	08/15/2024	PAYDOWN .....	.....	1,029,096	1,029,096	1,029,096	1,029,086	0	10	0	10	0	1,029,096	0	0	0	7,550	04/15/2033	1.A FE
..302637-AG-8	FS KKR MM QLO 1 LLC-FSKMM 2019-1A A1R .....	.....	07/15/2024	PAYDOWN .....	.....	1,347,435	1,347,435	1,347,435	1,347,435	0	0	0	0	0	1,347,435	0	0	0	77,892	01/15/2031	1.A FE
..30292*-AA-2	FBI Bronx Control Trust Pass-Thru Certif .....	.....	09/15/2024	SINKING PAYMENT .....	.....	147,279	147,279	147,279	147,279	0	0	0	0	0	147,279	0	0	0	3,846	07/15/2033	1.B PL
..31307#-AA-9	FDL-CC LLC Senior Note Tranche A-1 .....	.....	09/15/2024	SINKING PAYMENT .....	.....	35,060	35,060	35,066	35,063	0	(3)	0	(3)	0	35,060	0	0	0	1,239	02/15/2035	1.A
..31307#-AC-5	FDL-CC LLC Senior Note Tranche A-3 .....	.....	09/15/2024	SINKING PAYMENT .....	.....	19,937	19,937	19,938	19,938	0	(1)	0	(1)	0	19,937	0	0	0	704	06/15/2037	1.A
..3137BL-AR-9	Freddie Mac Multifamily -FMMV M036 A .....	.....	09/15/2024	CALL 100 .....	.....	4,725,000	4,725,000	4,854,938	4,750,943	0	(7,864)	0	(7,864)	0	4,743,079	0	(18,079)	(18,079)	137,918	12/01/2029	1.B FE
..31425B-AA-5	FCI Funding 2024-1 LLC-FCITL 2024-1A A .....	.....	09/15/2024	PAYDOWN .....	.....	715,230	715,230	715,204	0	26	0	0	26	0	715,230	0	0	0	3,350	08/15/2036	1.A FE
..31429#-AA-2	Fedex Chino Control Pass Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT .....	.....	210,208	210,208	210,208	210,208	0	0	0	0	0	210,208	0	0	0	4,899	10/15/2035	2.B
..31572Y-AB-4	Ellington Financial Mort-EFMT 2022-2 A2 .....	.....	09/01/2024	PAYDOWN .....	.....	81,429	81,429	80,194	80,434	0	995	0	995	0	81,429	0	0	0	2,424	04/01/2067	1.C FE
..31572Y-AC-2	Ellington Financial Mort-EFMT 2022-2 A3 .....	.....	09/01/2024	PAYDOWN .....	.....	310,276	310,276	304,557	305,671	0	4,605	0	4,605	0	310,276	0	0	0	9,073	04/01/2067	1.G FE
..31573E-AA-9	Ellington Financial Mort-EFMT 2022-3 A1 .....	.....	09/01/2024	PAYDOWN .....	.....	298,710	298,710	295,432	296,182	0	2,528	0	2,528	0	298,710	0	0	0	10,182	08/01/2067	1.A FE
..31573E-AB-7	Ellington Financial Mort-EFMT 2022-3 A2 .....	.....	09/01/2024	PAYDOWN .....	.....	206,468	206,468	200,672	201,818	0	4,650	0	4,650	0	206,468	0	0	0	7,038	08/01/2067	1.C FE
..31573E-AC-5	Ellington Financial Mort-EFMT 2022-3 A3 .....	.....	09/01/2024	PAYDOWN .....	.....	99,570	99,570	95,213	96,039	0	3,531	0	3,531	0	99,570	0	0	0	3,394	08/01/2067	1.F FE
..31684E-AA-5	Figure Lending LLC FIGRE Trust 2023-HE1a .....	.....	07/25/2024	VARIOUS .....	.....	2,121,830	2,121,830	2,100,578	2,100,178	0	424	0	424	0	2,100,602	0	21,229	21,229	(756,742)	11/25/2053	1.A PL
..31740J-AA-6	FINANCE OF AMERICA STRUC-FASST 2023-RMF1 .....	.....	09/25/2024	PAYDOWN .....	.....	765,464	765,464	677,970	684,760	0	80,685	0	80,685	0	765,464	0	0	0	14,132	02/25/2053	1.A FE
..32010L-AN-4	First Eagle Commercial L-NWSTR 2016-1A A .....	.....	07/25/2024	PAYDOWN .....	.....	564,051	564,051	564,043	564,024	0	27	0	27	0	564,051	0	0	0	15,529	01/25/2032	1.A FE
..32027L-AE-5	First Franklin Mortgage -FFML 2006-FF14 .....	.....	09/25/2024	PAYDOWN .....	.....	43,603	43,603	38,173	43,495	0	109	0	109	0	43,603	0	0	0	1,159	10/25/2036	1.A FM
..32051G-SQ-9	First Horizon Alternativ-FHAMS 2005-AA7 .....	.....	09/01/2024	PAYDOWN .....	.....	110,422	110,434	96,685	96,928	0	13,497	0	13,497	0	110,422	0	0	0	5,169	09/01/2035	1.A FM
..32051G-T7-0	First Horizon Alternativ-FHAMS 2006-FA1 .....	.....	09/01/2024	PAYDOWN .....	.....	16,677	17,805	33,899	8,176	0	610	0	8,166	0	16,677	0	0	0	1,182	04/01/2036	1.A FM
..32051G-XQ-3	First Horizon Mortgage P-FHASI 2005-AR5 .....	.....	09/01/2024	PAYDOWN .....	.....	11,412	11,412	10,330	9,765	0	1,648	0	1,648	0	11,412	0	0	0	519	11/01/2035	1.A FM
..32051G-XV-2	First Horizon Mortgage P-FHASI 2005-AR5 .....	.....	09/01/2024	PAYDOWN .....	.....	13,417	13,417	13,225	12,859	0	557	0	557	0	13,417	0	0	0	477	11/01/2035	1.A FM
..32052E-AA-7	First Horizon Mortgage P-FHASI 2006-AR3 .....	.....	09/01/2024	PAYDOWN .....	.....	1,905	1,905	1,213	1,213	0	719	40	679	0	1,905	0	0	0	55	11/01/2036	1.A FM
..33803W-AA-7	Fishers Lane Associates -SECURED .....	.....	09/05/2024	SINKING PAYMENT .....	.....	348,796	348,796	348,796	348,797	0	0	0	0	0	348,796	0	0	0	9,301	08/05/2030	1.B
..33972P-AA-7	FLNG LIQUEFACTION 2 LLC-FIRST LIEN .....	.....	09/30/2024	SINKING PAYMENT .....	.....	110,000	110,000	110,000	109,991	0	9	0	9	0	110,000	0	0	0	2,269	03/31/2038	2.B FE
..34107#-AA-7	Florida Pipeline Holding Senior Secured .....	.....	08/15/2024	SINKING PAYMENT .....	.....	954,337	954,337	954,337	954,337	0	0	0	0	0	954,337	0	0	0	27,867	08/15/2038	2.B PL
..34417M-AB-3	FOCUS Brands Funding LLC-FOCUS 2017-1A A .....	.....	07/30/2024	PAYDOWN .....	.....	15,000	15,000	15,000	15,000	0	0	0	0	0	15,000	0	0	0	573	04/30/2047	2.B FE
..35041J-AA-3	Foundation Finance Trust-FFIN 2019-1A A .....	.....	07/15/2024	PAYDOWN .....	.....	10,469	10,469	10,467	10,446	0	23	0	23	0	10,469	0	0	0	(2)	11/15/2034	1.A FE
..35564K-B2-4	Freddie Mac Structured A-STACR 2022-HO2 .....	.....	09/25/2024	PAYDOWN .....	.....	598,171	598,171	598,655	597,687	0	484	0	484	0	598,171	0	0	0	32,436	07/25/2042	1.A
..35564K-E3-9	Freddie Mac STACR REMIC -STACR 2022-HO3 .....	.....	09/25/2024	PAYDOWN .....	.....	354,592	354,592	354,592	354,592	0	0	0	0	0	354,592	0	0	0	18,361	08/25/2042	1.A
..35824#-AA-4	Fresno County (Rowell) Bu Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT .....	.....	3,862	3,862	3,898	3,891	0	(29)	0	(29)	0	3,862	0	0	0	84	05/15/2040	1.D S
..35826#-AA-4	County of Fresno CA Trust Certificates .....	.....	09/15/2024	SINKING PAYMENT .....	.....	103,254	103,254	104,284	103,990	0	(736)	0	(736)	0	103,254	0	0	0	3,227	06/15/2038	1.C

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-ign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/(Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..36120F-AA-3	Granite Park FX Notes Is Senior Secured .....	.....	09/15/2024	SINKING PAYMENT .....	.....	388,721	388,721	388,658	0	0	63	0	63	0	388,721	0	0	0	12,028	07/15/2032	1.G PL
..36120F-AB-1	Granite Park FX Notes Is Senior Secured .....	.....	09/15/2024	SINKING PAYMENT .....	.....	414,998	414,998	414,888	0	0	111	0	111	0	414,998	0	0	0	13,029	07/15/2032	2.B PL
..36152B-AC-6	GBX Leasing 2023-1 LLC-GBXL 2023-1A A .....	.....	09/20/2024	PAYDOWN .....	.....	9,650	9,650	9,645	9,645	0	5	0	5	0	9,650	0	0	0	413	11/20/2053	1.C FE
..36157N-FL-3	GE Mortgage Services LLC-GEOMS 1997-HE4 .....	.....	09/01/2024	PAYDOWN .....	.....	1,327	1,327	1,047	474	0	853	0	853	0	1,327	0	0	0	41	12/01/2028	1.A FM
..36167K-AA-6	GCAT 2021-NQM6 Trust-GCAT 2021-NQM6 A1 .....	.....	09/01/2024	PAYDOWN .....	.....	113,061	113,061	101,613	104,297	0	8,763	0	8,763	0	113,061	0	0	0	1,366	08/01/2066	1.A
..36169K-AA-4	GCAT 2022-NQM2 Trust-GCAT 2022-NQM2 A1 .....	.....	09/01/2024	PAYDOWN .....	.....	61,780	61,780	61,493	61,642	0	138	0	138	0	61,780	0	0	0	1,689	02/01/2067	1.A FE
..36169K-AB-2	GCAT 2022-NQM2 Trust-GCAT 2022-NQM2 A2 .....	.....	09/01/2024	PAYDOWN .....	.....	226,529	226,529	222,074	222,804	0	3,725	0	3,725	0	226,529	0	0	0	6,193	02/01/2067	1.C FE
..36185N-6N-5	GMACM Mortgage Loan Trus-GMACM 2005-AR2 .....	.....	09/01/2024	PAYDOWN .....	.....	48,565	48,565	40,579	42,403	0	6,162	0	6,162	0	48,565	0	0	0	1,667	05/01/2035	1.A FM
..36198#-AA-0	GE Huntsville 2020A Leas Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT .....	.....	65,224	65,224	65,224	65,224	0	0	0	0	0	65,224	0	0	0	1,985	04/15/2046	2.A
..36200#-AA-8	GE Huntsville 2020B Leas Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT .....	.....	15,394	15,394	15,394	15,394	0	0	0	0	0	15,394	0	0	0	468	04/15/2046	2.A
..36228F-UJ-3	GSR Mortgage Loan Trust -GSR 2003-7F 4A1 .....	.....	09/01/2024	PAYDOWN .....	.....	10,165	10,165	9,914	9,896	0	269	0	269	0	10,165	0	0	0	314	10/01/2032	1.A FM
..3622EA-AA-8	GSAA TRUST-GSAA 2007-3 1A1A .....	.....	09/25/2024	PAYDOWN .....	.....	96,029	96,029	52,521	51,396	0	47,029	2,396	44,633	0	96,029	0	0	0	913	03/25/2047	1.A FM
..362341-4A-4	GSR Mortgage Loan Trust -GSR 2006-AR1 2A .....	.....	09/01/2024	PAYDOWN .....	.....	6,913	6,525	6,243	6,408	0	167	0	167	0	6,913	0	0	0	197	01/01/2036	1.A FM
..362341-4F-3	GSR Mortgage Loan Trust -GSR 2006-AR1 3A .....	.....	09/01/2024	PAYDOWN .....	.....	625	625	615	584	0	79	0	79	0	755	0	0	0	29	01/01/2036	1.A FM
..362341-DP-1	GSR Mortgage Loan Trust -GSR 2005-6F 1A5 .....	.....	09/01/2024	PAYDOWN .....	.....	34,781	34,781	34,911	34,862	0	(81)	0	(81)	0	34,781	0	0	0	1,157	07/01/2035	1.G FM
..362341-FN-4	GSR Mortgage Loan Trust -GSR 2005-AR4 3A .....	.....	09/01/2024	PAYDOWN .....	.....	4,405	4,405	3,325	3,421	0	1,178	193	985	0	4,405	0	0	0	171	07/01/2035	1.A FM
..362341-SG-5	GSR MORTGAGE LOAN TRUST-SERIES 2005-AR6 .....	.....	09/01/2024	PAYDOWN .....	.....	139,952	139,952	126,831	127,832	0	12,116	0	12,116	0	139,952	0	0	0	6,128	09/01/2035	1.A FM
..362341-XC-8	GSR Mortgage Loan Trust -GSR 2005-AR7 4A .....	.....	09/01/2024	PAYDOWN .....	.....	(104)	(183)	(145)	(114)	0	8	0	8	0	(104)	0	0	0	(9)	11/01/2035	4.A FM
..362341-XE-4	GSR Mortgage Loan Trust -GSR 2005-AR7 5A .....	.....	09/01/2024	PAYDOWN .....	.....	59,758	44,392	38,506	38,781	0	10,834	0	10,834	0	59,758	0	0	0	2,047	11/01/2035	1.A FM
..362341-XG-9	GSR Mortgage Loan Trust -GSR 2005-AR7 6A .....	.....	09/01/2024	PAYDOWN .....	.....	12,754	12,754	12,130	12,586	0	168	0	168	0	12,754	0	0	0	463	11/01/2035	1.A FM
..36242D-4W-0	GSR Mortgage Loan Trust -GSR 2005-AR3 6A .....	.....	09/01/2024	PAYDOWN .....	.....	4,363	4,363	4,099	3,927	0	435	0	435	0	4,363	0	0	0	142	05/01/2035	1.G FM
..36242D-BZ-5	GSR MORTGAGE LOAN TRUST-SERIES 2004-9 CL .....	.....	09/01/2024	PAYDOWN .....	.....	56,101	56,101	54,488	56,101	0	0	0	0	0	56,101	0	0	0	1,946	08/01/2034	1.A FM
..36242D-FS-7	GSR Mortgage Loan Trust -GSR 2004-11 2A1 .....	.....	09/01/2024	PAYDOWN .....	.....	18,618	18,618	18,717	18,618	0	0	0	0	0	18,618	0	0	0	658	09/01/2034	1.A FM
..36242D-FX-6	GSR Mortgage Loan Trust -GSR 2004-11 3A1 .....	.....	09/01/2024	PAYDOWN .....	.....	729	729	730	729	0	0	0	0	0	729	0	0	0	32	09/01/2034	1.A FM
..36242D-H4-8	GSR Mortgage Loan Trust -GSR 2005-AR2 1A .....	.....	09/01/2024	PAYDOWN .....	.....	8,033	8,033	7,707	7,803	0	229	0	229	0	8,033	0	0	0	230	10/09/2029	2.A FM
..36242D-H9-7	GSR Mortgage Loan Trust -GSR 2005-AR2 4A .....	.....	09/01/2024	PAYDOWN .....	.....	19,163	19,163	18,624	19,163	0	0	0	0	0	19,163	0	0	0	685	04/01/2035	1.A FM
..36242D-QY-2	GSR Mortgage Loan Trust -GSR 2004-15F 2A .....	.....	09/01/2024	PAYDOWN .....	.....	7,959	9,613	8,632	8,551	0	948	0	948	0	7,959	0	0	0	321	12/01/2034	4.B FM
..36242D-VA-8	GSR Mortgage Loan Trust -GSR 2005-1F 1A6 .....	.....	09/01/2024	PAYDOWN .....	.....	18,103	18,103	17,823	17,539	0	565	0	565	0	18,103	0	0	0	665	02/01/2035	2.C FM
..36244S-AD-0	GSAA Home Equity Trust 2-GSAA 2006-13 AF .....	.....	09/01/2024	PAYDOWN .....	.....	105,122	105,122	30,334	30,747	0	74,298	(77)	74,375	0	105,122	0	0	0	1,571	07/01/2036	1.A FM
..36248#-AA-0	GSA (Anchorage AK) CTL P Pass-Thru Certi .....	.....	09/15/2024	SINKING PAYMENT .....	.....	362,713	362,713	365,977	363,925	0	(1,212)	0	(1,212)	0	362,713	0	0	0	8,477	11/15/2030	1.A
..362480-AC-9	GSC CAPITAL CORP MORTGAG-SERIES 2006-2 C .....	.....	09/25/2024	PAYDOWN .....	.....	47,490	46,235	35,763	47,721	0	(1,149)	0	(1,149)	0	47,490	0	0	0	1,555	05/25/2036	1.A FM
..36249#-AA-1	GSA Gth l US Government Lease-Backed Pas .....	.....	09/15/2024	SINKING PAYMENT .....	.....	77,365	77,365	77,365	77,366	0	(1)	0	(1)	0	77,365	0	0	0	2,974	05/15/2038	1.A
..36264E-BD-5	GS Mortgage-Backed Secur-GSMB5 2022-NQM1 .....	.....	09/01/2024	PAYDOWN .....	.....	123,839	123,839	127,670	126,907	0	(3,068)	0	(3,068)	0	123,839	0	0	0	3,379	05/01/2062	1.D
..36298G-AA-7	GPMA Monetization Trust-SECURED .....	.....	09/09/2024	SINKING PAYMENT .....	.....	256,173	256,173	259,758	257,136	0	(963)	0	(963)	0	256,173	0	0	0	10,987	10/09/2029	2.A FE
..36830F-AF-3	GCAT 2024-INV3 Trust-GCAT 2024-INV3 A6 .....	.....	09/01/2024	PAYDOWN .....	.....	186,833	186,833	187,336	0	0	(503)	0	(503)	0	186,833	0	0	0	847	09/01/2054	1.A FE
..36830F-AN-6	GCAT 2024-INV3 Trust- 36830FAN6 .....	.....	09/01/2024	PAYDOWN .....	.....	54,242	54,242	54,327	0	0	(85)	0	(85)	0	54,242	0	0	0	269	09/01/2054	1.B FE
..36831B-CC-6	GCAT 2024-INV1 Trust-GCAT 2024-INV1 B1 .....	.....	09/01/2024	PAYDOWN .....	.....	22,937	22,937	24,313	0	0	(1,376)	0	(1,376)	0	22,937	0	0	0	969	01/01/2054	1.E FE
..36831B-CF-9	GCAT 2024-INV1 Trust-GCAT 2024-INV1 B2 .....	.....	09/01/2024	PAYDOWN .....	.....	16,900	16,900	17,631	0	0	(731)	0	(731)	0	16,900	0	0	0	714	01/01/2054	1.F FE
..36850#-AA-9	Geisinger (Jenkins Towns Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT .....	.....	143,764	143,764	143,764	143,764	0	0	0	0	0	143,764	0	0	0	3,220	12/15/2033	1.F S
..372460-AC-9	Genuine Parts Co-SENIOR UNSECURED .....	.....	08/08/2024	VARIOUS .....	.....	24,816,717	28,300,000	26,365,446	26,669,076	0	105,403	0	105,403	0	26,774,480	(1,957,763)	(1,957,763)	(1,957,763)	788,494	02/01/2032	2.B FE
..379352-AL-1	GLOBAL MARINE INC-NOTE .....	.....	09/19/2024	WELLS FARGO .....	.....	716,250	750,000	708,750	0	0	625	0	625	0	709,375	0	6,875	6,875	15,896	06/01/2028	5.C FE
..380241-AA-7	Goddard Funding LLC-GDRD 2022-1 A2 .....	.....	07/30/2024	PAYDOWN .....	.....	42,250	42,250	42,262	42,317	0	(67)	0	(67)	0	42,250	0	0	0	2,175	10/30/2052	2.C FE
..38141E-C2-3	GOLDMAN SACHS GROUP INC-SR UNSECURED .....	.....	07/08/2024	MATURITY .....	.....	22,000,000	22,000,000	21,944,760	21,996,650	0	3,350	0	3,350	0	22,000,000	0	0	0	1,270,500	07/08/2024	2.A FE
..38141G-WQ-3	Goldman Sachs Group Inc/-SENIOR UNSECURE .....	.....	09/29/2024	CALL 100 .....	.....	21,150,000	21,150,000	21,150,000	21,150,000	0	0	0	0	0	21,150,000	0	0	0	346,014	09/29/2025	2.A FE
..38141G-ZM-9	Goldman Sachs Group Inc/-SENIOR UNSECURE .....	.....	08/23/2024	CITIGROUP GLOBAL MAR .....	.....	27,024,992	30,400,000	29,665,821	29,761,964	0	38,327	0	38,327	0	29,800,291	0	(2,775,299)	(2,775,299)	948,247	02/24/2033	2.A FE
..38150Y-AD-5	Goldman Home Improvement-GHIT 2022-GRN1 .....	.....	09/25/2024	PAYDOWN .....	.....	690,014	690,014	675,202	679,703	0	10,311	0	10,311	0	690,014	0	0	0	33,709	06/25/2052	2.A FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..38177B-AA-0	Golub Capital BDC CLO 20-GCBDC 2018-1A A		07/22/2024	PAYDOWN		4,771,234	4,771,234	4,771,234	4,771,234	0	0	0	0	0	4,771,234	0	0	0	369,314	01/20/2031	1.A FE
..38217U-AC-6	Goodgreen 2021-1 Trust-GOODG 2021-1A C		09/15/2024	PAYDOWN		34,181	34,181	31,190	31,375	0	2,806	0	2,806	0	34,181	0	0	0	25,370	10/15/2056	2.B FE
..38237G-AA-7	GoodLeap Sustainable Hom-GOOD 2021-4GS A		09/20/2024	PAYDOWN		254,329	254,329	194,244	0	0	60,085	0	60,085	0	254,329	0	0	0	3,248	07/20/2048	1.F FE
..38349Y-AA-3	GoTo Group Inc-FIRST LIEN		07/16/2024	JP MORGAN SECURITIES		448,906	531,250	431,040	0	0	348	0	348	0	431,388	0	17,518	17,518	649	05/01/2028	4.B FE
..38349Y-AB-1	GoTo Group Inc-LOGM 5 1/2 05/01/28		08/07/2024	JP MORGAN SECURITIES		297,500	531,250	583,172	0	0	(2,196)	0	(2,196)	0	580,976	0	(283,476)	(283,476)	1,217	05/01/2028	5.B FE
..39538W-BE-7	GreenPoint Mortgage Fund-GPMF 2005-HY1 M		09/25/2024	PAYDOWN		244,096	244,096	176,207	289,251	0	(45,155)	0	(45,155)	0	244,096	0	0	0	7,951	07/25/2035	1.A FM
..39678W-AC-6	Greenwich Capital Struct-GCSP 2005-1 A1		09/01/2024	PAYDOWN		11,327	11,327	11,271	11,479	0	(151)	0	(151)	0	11,327	0	0	0	361	09/01/2034	1.A FM
..40431H-AD-9	HSI Asset Loan Obligatio-HALO 2006-2 1A4		09/25/2024	PAYDOWN		0	0	10,415	0	0	0	0	0	0	0	0	0	0	10	12/25/2036	6. FE
..41161P-CX-9	HarborView Mortgage Loan-HVMTL 2004-1 1A		09/19/2024	PAYDOWN		5,137	5,137	4,878	0	0	261	1	260	0	5,137	0	0	0	204	04/19/2034	1.A FM
..41161P-EX-7	HarborView Mortgage Loan-HVMTL 2004-5 2A		09/01/2024	PAYDOWN		11,461	11,461	9,193	11,127	0	334	0	334	0	11,461	0	0	0	380	06/01/2034	1.A FM
..41161P-EZ-2	HarborView Mortgage Loan-HVMTL 2004-5 3A		09/01/2024	PAYDOWN		6,120	6,120	6,093	6,120	0	0	0	0	0	6,120	0	0	0	182	06/01/2034	1.A FM
..41161P-FV-0	HarborView Mortgage Loan-HVMTL 2004-6 5A		09/01/2024	PAYDOWN		125,796	125,796	127,523	128,405	0	(2,609)	0	(2,609)	0	125,796	0	0	0	4,495	08/01/2034	1.A FM
..41161P-MV-2	HarborView Mortgage Loan-HVMTL 2005-4 1A		09/01/2024	PAYDOWN		4,325	4,325	3,052	2,927	0	0	0	0	0	2,927	0	1,398	1,398	173	07/01/2035	1.A FM
..41161P-TN-3	HARBORVIEW MORTGAGE LOAN-SERIES 2005-10		09/19/2024	PAYDOWN		3,580	3,580	2,082	2,139	0	1,441	0	1,441	0	3,580	0	0	0	119	11/19/2035	1.A FM
..41161P-UK-7	HarborView Mortgage Loan-SERIES 05-11 CL		09/19/2024	PAYDOWN		3,506	3,506	2,472	3,881	0	(376)	0	(376)	0	3,506	0	0	0	112	08/19/2045	1.A FM
..41161V-AC-4	HarborView Mortgage Loan-HVMTL 2006-7 2A		09/19/2024	PAYDOWN		7,590	7,547	5,362	6,755	0	810	0	810	0	7,590	0	0	0	301	09/19/2046	1.A FM
..41162G-AA-0	HarborView Mortgage Loan-HVMTL 2006-11 A		09/19/2024	PAYDOWN		11,218	11,188	10,087	11,043	0	1,449	0	1,449	0	11,218	0	0	0	349	12/19/2036	1.E FM
..42249#-AA-7	HealthPartners, Inc. Senior Note Series		09/05/2024	CALL 100		1,004,865	1,004,865	1,004,865	1,004,885	0	38	0	38	0	1,004,923	0	(58)	(58)	47,096	05/15/2030	1.F
..423452-AG-6	Helmerich & Payne Inc-SENIOR UNSECURED		07/30/2024	MRB0010		7,798,815	8,000,000	7,773,651	7,807,331	0	12,845	0	12,845	0	7,820,176	0	(21,361)	(21,361)	193,978	09/29/2031	2.A FE
..42770Q-AA-0	HERO Funding Trust 2014-HERO 2014-2A A		09/20/2024	PAYDOWN		121,394	121,394	121,311	121,362	0	32	0	32	0	121,394	0	0	0	4,844	09/21/2040	1.A FE
..42770R-AA-8	HERO Funding Trust 2014-HERO 2014-1A A		09/20/2024	PAYDOWN		71,200	71,200	71,200	71,200	0	0	0	0	0	71,200	0	0	0	3,382	09/20/2038	1.A FE
..43283B-AB-9	Hilton Grand Vacations T-HGVT 2022-1D B		09/20/2024	PAYDOWN		212,364	212,364	201,547	202,448	0	9,916	0	9,916	0	5,898	0	0	0	5,898	06/20/2034	1.G FE
..43283G-AD-4	Hilton Grand Vacations T-HGVT 2022-2A D		09/25/2024	PAYDOWN		346,102	346,102	346,056	346,065	0	38	0	38	0	346,102	0	0	0	20,103	01/25/2037	3.G FE
..43283Y-AB-9	Hilton Grand Vacations T-HGVT 2024-1B B		09/15/2024	PAYDOWN		195,847	195,847	195,811	0	0	36	0	36	0	195,847	0	0	0	3,763	09/15/2039	1.F FE
..432917-AB-8	Hilton Grand Vacations T-HGVT 2023-1A B		09/25/2024	PAYDOWN		1,316,367	1,316,367	1,315,476	1,315,516	0	851	0	851	0	1,316,367	0	0	0	53,777	01/25/2038	1.G FE
..433674-AA-6	NRZ Excess Spread-Collat-NZES 2020-PLS1		09/25/2024	PAYDOWN		174,611	174,611	174,611	174,611	0	0	0	0	0	174,611	0	0	0	4,464	12/25/2025	2.C FE
..43722#-AA-1	Home Depot (Monterey Par Trust Certifica		09/15/2024	SINKING PAYMENT		67,049	67,049	67,049	67,049	0	0	0	0	0	67,049	0	0	0	1,590	06/15/2038	1.F
..43722*-AA-5	Home Depot South Windsor Pass-Thru Certi		09/15/2024	SINKING PAYMENT		55,190	55,190	55,190	55,190	0	0	0	0	0	55,190	0	0	0	1,189	10/15/2040	1.F
..43739E-AP-2	HOMEBANC MORTGAGE TRUST-SERIES 2005-1 CL		09/25/2024	PAYDOWN		41,971	41,971	35,375	34,732	0	7,475	236	7,239	0	41,971	0	0	0	1,372	03/25/2035	1.A FM
..43739E-CL-9	HomeBanc Mortgage Trust -HMBT 2006-1 1A1		09/01/2024	PAYDOWN		5,298	3,419	2,984	3,046	0	639	0	639	0	5,298	0	0	0	96	04/01/2037	1.A FM
..43741B-AA-7	HomeBanc Mortgage Trust -HMBT 2007-1 11A		09/01/2024	PAYDOWN		33,051	33,882	33,655	32,641	0	1,071	0	1,071	0	33,051	0	0	0	1,135	04/01/2047	1.G FM
..44107T-BA-3	Host Hotels & Resorts LP-SENIOR UNSECURE		07/30/2024	MRB0010		3,833,993	4,000,000	3,786,240	3,822,722	0	11,271	0	11,271	0	3,833,993	0	0	0	85,711	12/15/2031	2.C FE
..45254N-JB-4	IMPAC CMB TRUST-SERIES 2004-4 CLASS 2A1		09/01/2024	PAYDOWN		17,184	17,184	16,533	16,557	0	627	0	627	0	17,184	0	0	0	608	09/01/2034	1.A FM
..45254N-KX-4	IMPAC CMB TRUST-SERIES 2004-9 CLASS 1A1		09/25/2024	PAYDOWN		2,365	2,365	2,164	2,361	0	4	0	4	0	2,365	0	0	0	102	01/25/2035	1.A FM
..45254N-MZ-7	Impac CMB Trust Series 2-IMM 2005-2 1A2		09/25/2024	PAYDOWN		42,997	42,997	34,935	40,089	0	2,908	0	2,908	0	42,997	0	0	0	1,719	04/25/2035	1.A FM
..45254N-NT-0	Impac CMB Trust Series 2-IMM 2005-3 M1		09/25/2024	PAYDOWN		3,987	1,246	1,520	623	809	2,730	476	3,063	0	3,987	0	0	0	39	08/25/2035	1.A FM
..45254T-TN-4	Impac Secured Assets Tru-IMSA 2006-1 2A1		09/25/2024	PAYDOWN		52	52	36	71	0	(20)	0	(20)	0	52	0	0	0	2	05/25/2036	1.A FM
..45276Q-AA-2	Imperial Fund Mortgage T-IMPRL 2022-NQM5		09/01/2024	PAYDOWN		126,001	126,001	125,999	126,001	0	0	0	0	0	126,001	0	0	0	4,584	08/01/2067	1.A FE
..45276Q-AB-0	Imperial Fund Mortgage T-IMPRL 2022-NQM5		09/01/2024	PAYDOWN		339,875	339,875	339,870	339,875	0	0	0	0	0	339,875	0	0	0	14,043	08/01/2067	1.C FE
..45276Q-AC-8	Imperial Fund Mortgage T-IMPRL 2022-NQM5		09/01/2024	PAYDOWN		93,556	93,556	92,763	93,556	0	796	0	796	0	93,556	0	0	0	3,943	08/01/2067	1.G FE
..45384B-AA-4	Independent Bank Group I-SUBORDINATED		08/01/2024	MATURITY		13,000,000	13,000,000	12,912,500	12,991,993	0	8,007	0	8,007	0	13,000,000	0	0	0	763,750	08/01/2024	2.B FE
..45660K-AA-9	IndyMac INDX Mortgage Lo-INDX 2006-AR39		09/25/2024	PAYDOWN		19,678	19,489	15,701	19,816	0	(319)	0	(319)	0	19,678	0	0	0	761	02/25/2037	1.A FM
..45660L-CK-3	IndyMac INDX Mortgage Lo-INDX 2005-AR2 1		09/25/2024	PAYDOWN		3,252	3,252	2,117	2,496	0	832	76	756	0	3,252	0	0	0	152	02/25/2035	1.A FM
..45660L-DB-2	IndyMac INDX Mortgage Lo-INDX 2005-AR1 1		09/01/2024	PAYDOWN		986	986	979	986	0	0	0	0	0	986	0	0	0	37	03/01/2035	1.A FM
..45660L-V9-7	IndyMac INDX Mortgage Lo-INDX 2005-AR31		09/01/2024	PAYDOWN		2,979	2,978	2,666	2,997	0	(17)	0	(17)	0	2,979	0	0	0	70	01/01/2036	1.A FM
..45660N-X9-1	IndyMac INDX Mortgage Lo-INDX 2004-AR6 5		09/01/2024	PAYDOWN		21,576	21,576	17,693	20,081	0	1,495	0	1,495	0	21,576	0	0	0	713	10/01/2034	1.A FM

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..45661X-AB-8	IndyMac INDX Mortgage Lo-INDX 2006-AR13		09/25/2024	PAYDOWN		11,413	11,413	6,840	7,702	0	3,710	0	3,710	0	11,413	0	0	0	316	07/25/2036	1.A FM
..45669A-AD-6	IndyMac INDX Mortgage Lo-INDA 2007-AR1 2		09/01/2024	PAYDOWN		9,910	9,910	8,608	8,536	0	1,373	0	1,373	0	9,910	0	0	0	394	03/01/2037	3.C FM
..45783N-AA-5	InStar Leasing III LLC-INSTR 2021-1A A		09/15/2024	PAYDOWN		47,230	47,230	47,204	47,211	0	19	0	19	0	47,230	0	0	0	726	02/15/2054	1.F FE
..45866F-AZ-7	Intercontinental Exchang-SENIOR UNSECURE		09/10/2024	EXCHANGE OFFER		13,647,684	14,299,000	13,630,093	0	0	17,591	0	17,591	0	13,647,684	0	0	0	273,568	09/01/2028	1.G FE
..46591K-AC-7	JP Morgan Mortgage Trust-JPMIT 2019-8 A3		09/01/2024	PAYDOWN		45,460	45,460	46,050	47,062	0	(1,602)	0	(1,602)	0	45,460	0	0	0	1,017	03/01/2050	1.A
..46616M-AA-8	J G WENTWORTH RECV XXII-ASSET BKD NT 10-		09/15/2024	PAYDOWN		24,144	24,144	24,139	24,063	0	81	0	81	0	24,144	0	0	0	623	12/15/2048	1.A FE
..46616M-AB-6	JG Wentworth XXII LLC-HENDR 2010-3A B		09/15/2024	PAYDOWN		9,320	9,320	9,320	9,321	0	(1)	0	(1)	0	9,320	0	0	0	431	12/15/2050	1.A FE
..46616P-AA-1	JGWPT XXIII LLC-HENDR 2011-1A A		09/15/2024	PAYDOWN		50,508	50,508	50,495	50,495	0	13	0	13	0	50,508	0	0	0	1,626	10/15/2056	1.A FE
..46616Q-AA-9	321 HENDERSON RECEIVABLE-SERIES 2011-2A		09/15/2024	PAYDOWN		84,338	84,338	84,289	84,292	0	46	0	46	0	84,338	0	0	0	2,767	09/15/2056	1.A FE
..46616V-AA-8	J G WENTWORTH RECV XXV-ASSET BKD NT 12-1		09/15/2024	PAYDOWN		35,361	35,361	35,353	35,619	0	(258)	0	(258)	0	35,361	0	0	0	944	02/16/2065	1.A FE
..46617A-AA-3	JGWPT XXVII LLC-ASSET BKD SERIES 2012-3		09/15/2024	PAYDOWN		106,482	106,482	105,415	105,808	0	674	0	674	0	106,482	0	0	0	2,391	09/15/2065	1.A FE
..46617F-AA-2	JGWPT XXVIII LLC-HENDR 2013-1A A		09/16/2024	PAYDOWN		90,319	90,319	90,059	90,034	0	285	0	285	0	90,319	0	0	0	1,935	04/15/2067	1.A FE
..46617J-AA-4	JGWPT XXIX LLC-HENDR 2013-2A A		09/15/2024	PAYDOWN		127,177	127,177	127,147	127,175	0	2	0	2	0	127,177	0	0	0	3,673	03/15/2062	1.A FE
..46617L-AA-9	JGWPT XXX LLC-HENDR 2013-3A A		09/15/2024	PAYDOWN		150,326	150,326	150,204	150,222	0	104	0	104	0	150,326	0	0	0	4,097	01/17/2073	1.A FE
..46617T-AA-2	JGWPT XXXI LLC-ASSET BKD SERIES 2014-1 C		09/15/2024	PAYDOWN		98,128	98,128	98,073	98,071	0	57	0	57	0	98,128	0	0	0	2,601	03/15/2063	1.A FE
..46618A-AA-2	JGWPT XXXII LLC-ASSET BKD SERIES 2014-2		09/15/2024	PAYDOWN		211,016	211,016	210,721	210,749	0	267	0	267	0	211,016	0	0	0	5,112	01/17/2073	1.A FE
..46618H-AA-7	J G WENTWORTH XXXIII LLC-ASSET BKD SER 2		09/15/2024	PAYDOWN		230,640	230,640	230,817	230,797	0	(157)	0	(157)	0	230,640	0	0	0	5,498	06/15/2077	1.A FE
..46618L-AA-8	J G WENTWORTH XXXIV LLC-ASSET BKD SER 20		09/15/2024	PAYDOWN		325,370	325,370	322,349	324,491	0	880	0	880	0	325,370	0	0	0	6,939	09/15/2072	1.A FE
..46619R-AA-4	J.G. Wentworth XXXIX LLC-ASSET BKD NT 15-		09/15/2024	PAYDOWN		113,846	113,846	114,021	113,981	0	(135)	0	(135)	0	113,846	0	0	0	3,009	03/15/2058	1.A FE
..46619X-AA-1	JG Wentworth XXXVI LLC-HENDR 2015-3A A		09/15/2024	PAYDOWN		85,049	85,049	84,975	84,984	0	65	0	65	0	85,049	0	0	0	2,383	03/17/2070	1.A FE
..46620J-AA-9	J.G. Wentworth XXXVIII L-HENDR 2017-1A A		09/15/2024	PAYDOWN		119,331	119,331	119,239	119,237	0	94	0	94	0	119,331	0	0	0	3,210	08/16/2060	1.A FE
..46620V-AA-2	J.G. Wentworth XXXIX LLC-HENDR 2017-2A A		09/15/2024	PAYDOWN		132,072	132,072	132,013	132,072	0	0	0	0	0	132,072	0	0	0	3,145	09/15/2072	1.A FE
..466247-J4-6	JP Morgan Mortgage Trust-JPMIT 2006-A2 2		09/01/2024	PAYDOWN		1,826	1,826	1,628	1,630	0	196	0	196	0	1,826	0	0	0	73	04/01/2036	1.C FM
..466247-L6-8	JP Morgan Mortgage Trust-JPMIT 2006-A2 1		09/01/2024	PAYDOWN		123,812	123,812	118,009	123,810	0	2	0	2	0	123,812	0	0	0	4,812	08/01/2034	1.A FM
..466247-OP-1	JP Morgan Mortgage Trust-JPMIT 2005-A3 7		09/01/2024	PAYDOWN		4,648	4,648	4,274	3,901	0	747	0	747	0	4,648	0	0	0	271	06/01/2035	1.A FM
..466247-PP-0	JP Morgan Mortgage Trust-JPMIT 2005-A4 2		09/01/2024	PAYDOWN		11,911	11,911	10,571	11,679	0	233	0	233	0	11,911	0	0	0	443	07/01/2035	1.A FM
..466247-UG-6	JP MORGAN MORTGAGE TRUST-SERIES 2005-A6		09/01/2024	PAYDOWN		4,627	4,627	4,129	4,158	0	550	80	470	0	4,627	0	0	0	159	08/01/2035	1.A FM
..466247-ZP-1	JP Morgan Mortgage Trust-JPMIT 2005-S3 1		09/01/2024	PAYDOWN		5,270	5,270	3,031	2,884	0	2,386	0	2,386	0	5,270	0	0	0	203	01/01/2036	3.B FM
..46625H-JY-7	JPMorgan Chase & Co-SUBORDINATED NOTE		09/10/2024	MATURITY		13,000,000	13,000,000	12,931,750	12,994,082	0	5,918	0	5,918	0	13,000,000	0	0	0	503,750	09/10/2024	1.G FE
..46627M-AD-9	JP Morgan Alternative Lo-JPALT 2005-S1 1		09/01/2024	PAYDOWN		3,908	3,909	1,413	1,484	0	2,438	7	2,431	0	3,908	0	0	0	189	12/01/2035	1.A FM
..46627M-CU-9	JP Morgan Alternative Lo-JPALT 2006-A1 2		09/01/2024	PAYDOWN		10,586	8,911	8,906	5,867	0	3,173	0	3,173	0	10,586	0	0	0	283	03/01/2036	1.A FM
..46627M-CY-1	JP Morgan Alternative Lo-JPALT 2006-A1 3		09/01/2024	PAYDOWN		256,896	256,896	195,469	197,778	0	63,191	4,073	59,118	0	256,896	0	0	0	9,356	03/01/2036	1.A FM
..46627M-EC-7	JP Morgan Alternative Lo-JPALT 2006-S1 1		09/01/2024	PAYDOWN		7,039	14,429	10,711	8,337	0	5,522	32	5,490	0	7,039	0	0	0	678	03/01/2036	1.A FM
..46627M-EJ-2	JP Morgan Alternative Lo-JPALT 2006-S1 1		09/01/2024	PAYDOWN		20,722	20,722	13,023	13,430	0	7,325	16	7,309	0	20,722	0	0	0	935	03/01/2036	3.B FM
..46628K-AC-4	JP Morgan Mortgage Trust-JPMIT 2006-A3 2		09/01/2024	PAYDOWN		3,960	3,960	3,497	3,219	0	741	0	741	0	3,960	0	0	0	128	05/01/2036	1.A FM
..46628L-AB-4	JP Morgan Mortgage Trust-JPMIT 2006-A4 1		09/01/2024	PAYDOWN		1,081	858	636	611	0	337	0	337	0	1,081	0	0	0	34	06/01/2036	1.A FM
..46628V-AH-9	JP Morgan Alternative Lo-JPALT 2006-S3 A		09/01/2024	PAYDOWN		(8,690)	17,360	11,601	12,401	0	(2,742)	0	(2,742)	0	(8,690)	0	0	0	116	08/01/2036	1.A FM
..46630B-AE-3	JP Morgan Alternative Lo-JPALT 2008-R3 3		09/01/2024	PAYDOWN		18,970	18,970	17,187	15,201	0	3,769	0	3,769	0	18,970	0	0	0	333	05/01/2037	1.A FM
..46630G-AN-5	JP Morgan Mortgage Trust-JPMIT 2007-A1 4		09/01/2024	PAYDOWN		168	168	157	167	0	1	0	1	0	168	0	0	0	7	07/01/2035	1.A FM
..46630P-AP-0	JP Morgan Mortgage Trust-JPMIT 2007-A2 3		09/01/2024	PAYDOWN		103	103	99	76	0	27	0	27	0	103	0	0	0	4	04/01/2037	1.A FM
..46630W-AB-6	JP Morgan Mortgage Trust-JPMIT 2007-S2 1		08/01/2024	PAYDOWN		24,260	24,260	13,145	11,306	0	12,954	0	12,954	0	24,260	0	0	0	1,069	06/01/2037	3.C FM
..46630W-AL-4	JP Morgan Mortgage Trust-JPMIT 2007-S2 1		08/01/2024	PAYDOWN		8,906	8,582	4,781	4,457	0	4,278	0	4,278	0	8,906	0	0	0	370	06/01/2037	3.B FM
..46631N-AA-7	JP Morgan Mortgage Trust-JPMIT 2007-S3 1		08/01/2024	PAYDOWN		2,153	2,153	1,182	1,216	0	947	10	937	0	2,153	0	0	0	92	08/01/2037	4.A FM
..46631N-DT-3	JP Morgan Mortgage Trust-JPMIT 2007-S3 1		09/01/2024	PAYDOWN		73,427	74,526	37,806	40,531	0	35,554	1,805	33,749	0	73,427	0	0	0	3,712	08/01/2037	1.A FM
..46632T-AA-3	JP Morgan Mortgage Trust-JPMIT 2008-R2 1		09/01/2024	PAYDOWN		137,112	137,112	110,373	130,076	0	7,036	0	7,036	0	137,112	0	0	0	4,218	07/01/2037	1.A FM
..46632Y-AB-0	JP Morgan Mortgage Trust-JPMIT 2008-R3 1		09/01/2024	PAYDOWN		29,707	29,708	3,777	(2,243)	0	31,944	0	31,944	0	29,707	0	0	0	1,272	06/01/2036	1.A FM

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-ign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..46632Y-AD-6	JP Morgan Mortgage Trust-JPMMT 2008-R3 2	.....	07/01/2024	PAYDOWN	.....	59	59	20	20	0	37	0	37	0	59	0	0	0	2	08/01/2037	1.A FM
..46633M-AM-1	JP Morgan Resecuritizati-JPMRR 2009-6 2A	.....	09/01/2024	PAYDOWN	.....	6,123	6,282	635	(444)	0	6,584	0	6,584	0	6,123	0	0	0	263	04/01/2035	1.A FM
..46634D-AX-6	JP Morgan Resecuritizati-JPMRR 2010-1 3A	.....	09/01/2024	PAYDOWN	.....	37,429	42,699	20,164	24,243	0	15,621	0	15,621	0	37,429	0	0	0	2,152	04/01/2037	1.A FM
..46635B-AD-3	JP Morgan Resecuritizati-JPMRR 2010-7 1A	.....	09/01/2024	PAYDOWN	.....	164,067	164,067	115,380	135,694	0	28,373	0	28,373	0	164,067	0	0	0	6,028	03/01/2039	1.A FM
..466365-AC-7	Jack in the Box Funding -JACK 2019-1A A2	.....	08/25/2024	PAYDOWN	.....	80,238	80,238	75,615	77,229	0	3,008	0	3,008	0	80,238	0	0	0	2,991	08/25/2049	2.B FE
..466365-AD-5	Jack in the Box Funding -JACK 2022-1A A2	.....	08/25/2024	PAYDOWN	.....	35,000	35,000	35,000	35,000	0	0	0	0	0	35,000	0	0	0	904	02/26/2052	2.B FE
..466365-AE-3	Jack in the Box Funding -JACK 2022-1A A2	.....	08/25/2024	PAYDOWN	.....	25,725	25,725	22,935	23,851	0	1,874	0	1,874	0	25,725	0	0	0	798	02/26/2052	2.B FE
..46647P-CU-8	JPMorgan Chase & Co-SENIOR UNSECURED	.....	08/23/2024	CITIGROUP GLOBAL MAR	.....	13,786,475	15,500,000	14,807,150	14,904,697	0	36,886	0	36,886	0	14,941,583	0	(1,155,108)	(1,155,108)	498,813	01/25/2033	1.E FE
..46651G-AC-3	JP Morgan Mortgage Trust-JPMMT 2019-7 A3	.....	09/01/2024	PAYDOWN	.....	20,687	20,687	20,945	20,972	0	(286)	0	(286)	0	20,687	0	0	0	593	02/01/2050	1.A
..46658G-AT-9	JP Morgan Mortgage Trust-JPMMT 2024-8 A9	.....	09/01/2024	PAYDOWN	.....	50,836	50,836	50,859	0	0	(24)	0	(24)	0	50,836	0	0	0	254	01/01/2055	1.B FE
..46817M-AL-1	Jackson Financial Inc-SENIOR UNSECURED	.....	09/24/2024	VARIOUS	.....	23,589,555	27,000,000	26,431,197	26,500,137	0	40,633	0	40,633	0	26,540,770	0	(2,951,215)	(2,951,215)	704,644	11/23/2031	2.B FE
..472320-AA-8	Jefferies Resecuritizati-JMAC 2008-R1 A	.....	09/25/2024	PAYDOWN	.....	79,638	70,317	64,392	67,244	0	1,496	0	1,496	0	79,638	0	0	0	4,823	06/25/2047	1.A FM
..472321-AA-6	Jefferies Resecuritizati-JMAC 2008-R2 1A	.....	09/01/2024	PAYDOWN	.....	344,413	344,413	263,961	338,074	0	6,339	0	6,339	0	344,413	0	0	0	15,767	10/01/2035	1.A FM
..472321-AD-0	Jefferies Resecuritizati-JMAC 2008-R2 2A	.....	09/01/2024	PAYDOWN	.....	6,205	6,205	2,679	5,396	0	809	0	809	0	6,205	0	0	0	237	01/01/2037	1.A FM
..472321-AG-3	Jefferies Resecuritizati-JMAC 2008-R2 1A	.....	09/01/2024	PAYDOWN	.....	0	22,070	4,844	6,303	0	(172)	0	(172)	0	0	0	0	0	876	10/01/2035	1.A FM
..472321-AH-4	Jefferies Resecuritizati-JMAC 2008-R2 3A	.....	09/01/2024	PAYDOWN	.....	175,529	122,115	42,258	77,543	0	79,652	0	79,652	0	175,529	0	0	0	4,288	01/01/2039	1.A FM
..47232A-AC-2	Jefferies Resecuritizati-JMAC 2008-R3 1A	.....	09/01/2024	PAYDOWN	.....	11,672	11,855	4,460	6,716	0	5,020	0	5,020	0	11,672	0	0	0	515	03/01/2036	1.A FM
..47232A-AE-8	Jefferies Resecuritizati-JMAC 2008-R3 2A	.....	09/01/2024	PAYDOWN	.....	123,723	123,723	87,843	123,723	0	3,107	0	3,107	0	123,723	0	0	0	2,611	06/01/2036	1.A FM
..47232A-AH-1	Jefferies Resecuritizati-JMAC 2008-R3 3A	.....	09/01/2024	PAYDOWN	.....	53,024	52,755	10,302	53,271	0	31,271	0	31,271	0	53,024	0	0	0	1,616	05/01/2037	1.A FM
..47232C-AH-7	Jefferies Resecuritizati-JMAC 2009-R1 4A	.....	09/01/2024	PAYDOWN	.....	6,442	14,788	12,541	12,851	0	(1,048)	298	(1,346)	0	5,517	0	925	925	426	06/01/2037	1.A FM
..47232T-AB-3	Jefferies Resecuritizati-JMAC 2009-R3 1A	.....	09/01/2024	PAYDOWN	.....	42,329	42,329	37,038	40,095	0	2,234	0	2,234	0	42,329	0	0	0	1,388	12/01/2035	1.A FM
..47233D-AB-7	Jefferies Resecuritizati-JMAC 2009-R11 1	.....	09/01/2024	PAYDOWN	.....	45,881	49,178	6,422	15,298	0	29,686	0	29,686	0	45,881	0	0	0	1,753	09/01/2036	1.A FM
..47760Q-AB-9	Jimmy Johns Funding LLC-JIMMY 2017-1A A2	.....	07/30/2024	PAYDOWN	.....	18,000	18,000	18,000	18,000	0	0	0	0	0	18,000	0	0	0	654	07/30/2047	2.B FE
..48669R-AB-7	Great Lakes Kcap F3c Sen-KCAP 2017-1A B	.....	09/20/2024	PAYDOWN	.....	2,564,396	2,564,396	2,546,643	2,576,142	0	(11,746)	0	(11,746)	0	2,564,396	0	0	0	158,875	12/20/2029	1.A FE
..488401-AC-4	Kemper Corp-SENIOR UNSECURED	.....	09/18/2024	MRB002A	.....	16,009,025	18,421,000	16,258,375	16,650,126	0	166,592	0	166,592	0	16,816,718	0	(807,692)	(807,692)	428,595	09/30/2030	2.C FE
..488401-AD-2	Kemper Corp-SENIOR UNSECURED	.....	09/18/2024	MRB002A	.....	9,075,534	10,000,000	9,610,600	9,668,492	0	24,933	0	24,933	0	9,693,425	0	(617,892)	(617,892)	407,444	02/23/2032	2.C FE
..502438-AA-8	LVCVA (Las Vegas NV) Rec Trust Certifica	.....	07/22/2024	SINKING PAYMENT	.....	576,079	576,079	576,079	576,079	0	0	0	0	0	576,079	0	0	0	(58,939)	12/15/2039	4.A
..50543L-AA-0	LABRADOR AVIATION FINANC-SERIES 2016-1A	.....	09/15/2024	PAYDOWN	.....	418,077	418,077	409,965	415,884	0	2,192	0	2,192	0	418,077	0	0	0	11,761	01/15/2042	3.A FE
..51236J-AB-3	Lakeview Trust 2022-EB03-BVEBO 2022-3 M1	.....	08/30/2024	PAYDOWN	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	13,651	05/29/2052	1.B FE
..52520M-CE-1	Lehman Mortgage Trust 20-LMT 2005-2 3A7	.....	09/01/2024	PAYDOWN	.....	4,978	4,978	2,685	2,702	0	2,305	29	2,276	0	4,978	0	0	0	196	12/01/2035	1.A FM
..525221-EM-5	Lehman XS Trust Series 2-LXS 2005-TN 1A1	.....	09/25/2024	PAYDOWN	.....	16,506	16,506	12,106	14,384	0	2,122	0	2,122	0	16,506	0	0	0	555	12/25/2035	1.A FM
..525221-GM-3	LEHMAN XS TRUST-SERIES 2005-9N CLASS 1A1	.....	09/25/2024	PAYDOWN	.....	117,793	117,793	100,455	126,851	0	(9,058)	0	(9,058)	0	117,793	0	0	0	2,839	02/25/2036	1.A FM
..52523M-AD-2	Lehman XS Trust 2006-15-LXS 2006-15 A4	.....	09/25/2024	PAYDOWN	.....	37,594	36,968	20,435	34,160	0	3,097	0	3,097	0	37,594	0	0	0	1,207	10/25/2036	1.A FM
..525241-AL-9	Lehman XS Trust 2007-1-LXS 2007-T 1WF1	.....	09/01/2024	PAYDOWN	.....	44,552	42,109	27,197	29,101	0	13,319	0	13,319	0	44,552	0	0	0	1,050	01/01/2037	1.A FM
..53946H-AA-6	Loan Asset Issuer LLC - Series 2022 NG-2	.....	09/25/2024	CA_CASH_CLOSE	.....	3,909,302	3,909,302	3,909,302	3,909,302	0	0	0	0	0	3,909,302	0	0	0	162,971	11/25/2047	1.G PL
..53948H-AA-1	Loan Asset Issuer LLC - Series 2021 NG-1	.....	09/25/2024	CA_CASH_CLOSE	.....	323,621	323,621	323,621	323,621	0	0	0	0	0	323,621	0	0	0	7,900	10/25/2046	1.G PL
..53950T-AB-3	Loan Asset Issuer LLC, Series 2021 M-2 -	.....	09/10/2024	CA_CASH_CLOSE	.....	22,448,432	22,448,432	22,448,432	22,448,432	0	0	0	0	0	22,448,432	0	0	0	411,392	11/10/2033	1.D PL
..53950T-AB-1	Loan Asset Issuer LLC, Series 2021 M-2 -	.....	09/10/2024	CA_CASH_CLOSE	.....	9,070,074	9,070,074	9,070,074	9,070,074	0	0	0	0	0	9,070,074	0	0	0	217,636	11/10/2033	1.G PL
..53950T-AC-9	Loan Asset Issuer LLC, Series 2021 M-2 -	.....	09/10/2024	CA_CASH_CLOSE	.....	5,899,809	5,899,809	5,899,809	5,899,809	0	0	0	0	0	5,899,809	0	0	0	160,913	11/10/2033	2.C PL
..53950T-AD-7	Loan Asset Issuer LLC, Series 2021 M-2 -	.....	09/10/2024	CA_CASH_CLOSE	.....	4,719,847	4,719,847	4,719,847	4,719,847	0	0	0	0	0	4,719,847	0	0	0	163,161	11/10/2033	3.C PL
..53950T-AE-5	Loan Asset Issuer LLC, Series 2021 M-2 -	.....	09/10/2024	CA_CASH_CLOSE	.....	3,628,029	3,628,029	3,628,029	3,628,029	0	0	0	0	0	3,628,029	0	0	0	179,434	11/10/2033	4.C PL
..53950U-AA-0	Loan Asset Issuer LLC - Series 2023 NG-1	.....	09/25/2024	CA_CASH_CLOSE	.....	5,131,670	5,131,670	5,131,670	5,131,670	0	0	0	0	0	5,131,670	0	0	0	84,835	08/25/2048	1.G PL
..53950U-AB-8	Loan Asset Issuer LLC - Series 2023 NG-1	.....	09/25/2024	CA_CASH_CLOSE	.....	761,910	761,910	761,910	761,910	0	0	0	0	0	761,910	0	0	0	70,970	08/25/2048	2.C PL
..53950X-AA-4	Loan Asset Issuer LLC - Series 2022 NG-1	.....	09/25/2024	CA_CASH_CLOSE	.....	1,625,800	1,625,800	1,625,800	1,625,800	0	0	0	0	0	1,625,800	0	0	0	37,252	02/25/2047	1.G PL
..55274Q-AK-1	MASTR Asset Securitizati-MASTR 2006-2 1A	.....	09/01/2024	PAYDOWN	.....	3,449	3,449	3,251	2,425	0	1,024	0	1,024	0	3,449	0	0	0	158	06/01/2036	3.B FM
..552758-AA-2	MFRA Trust-MFRA 2022-CHM1 A1	.....	09/01/2024	PAYDOWN	.....	503,010	503,010	503,009	503,010	0	0	0	0	0	503,010	0	0	0	13,844	09/01/2056	1.C FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..55283A-AA-7	MCA Fund Holding LLC-MCA 2020-1 A		08/01/2024	PAYDOWN		1,180,241	1,180,241	1,182,723	1,181,306	0	(1,065)	0	(1,065)	0	1,180,241	0	0	0	28,768	11/01/2035	1.F FE
..55285P-AB-0	MFA 2023-NQM1 Trust-MFRA 2023-NQM1 A2		09/01/2024	PAYDOWN		44,295	44,295	43,668	43,832	0	463	0	463	0	44,295	0	0	0	1,725	11/01/2067	1.C FE
..55286E-AC-2	MFA 2022-NQM3 Trust-MFRA 2022-NQM3 A3		09/01/2024	PAYDOWN		275,066	275,066	267,977	270,170	0	4,895	0	4,895	0	275,066	0	0	0	10,346	09/01/2067	1.F FE
..55400U-AB-9	MVW 2022-1 LLC-MVWOT 2022-1A B		09/20/2024	PAYDOWN		473,810	473,810	473,757	473,760	0	50	0	50	0	473,810	0	0	0	12,304	11/21/2039	1.F FE
..55400W-AA-7	MVW 2023-2 LLC-MVWOT 2023-2A A		09/20/2024	PAYDOWN		472,845	472,845	481,341	0	0	(8,496)	0	(8,496)	0	472,845	0	0	0	9,885	11/20/2040	1.A FE
..57109N-AB-5	Marlette Funding Trust 2-MFT 2022-3A B		09/15/2024	PAYDOWN		919,278	919,278	912,759	916,606	0	2,619	0	2,619	0	919,278	0	0	0	36,455	11/15/2032	1.D FE
..576431-AJ-9	MASTR Adjustable Rate Mo-MARM 2007-1 2A1		08/01/2024	PAYDOWN		495	495	395	(35)	0	530	0	530	0	495	0	0	0	14	11/01/2036	1.A FM
..576433-C5-3	MASTR Adjustable Rate Mo-MARM 2005-6 5A2		09/01/2024	PAYDOWN		4,951	4,770	3,698	4,019	0	796	0	796	0	4,951	0	0	0	104	07/01/2035	1.A FM
..576433-D5-2	MASTR Adjustable Rate Mo-MARM 2005-7 3A1		09/01/2024	PAYDOWN		468	350	186	229	0	193	30	163	0	468	0	0	0	11	09/01/2035	1.A FM
..576433-GM-2	MASTR Adjustable Rate Mo-MARM 2003-6 6A1		09/01/2024	PAYDOWN		6,256	6,256	6,021	6,029	0	226	0	226	0	6,256	0	0	0	141	12/01/2033	1.A FM
..576433-HM-1	MASTR Adjustable Rate Mo-MARM 2003-7 4A1		09/01/2024	PAYDOWN		11,884	11,884	11,557	11,824	0	60	0	60	0	11,884	0	0	0	497	01/01/2034	1.A FM
..576433-QD-1	MASTR Adjustable Rate Mo-MARM 2004-7 5A1		09/01/2024	PAYDOWN		1,920	1,920	1,824	1,881	0	39	0	39	0	1,920	0	0	0	81	07/01/2034	2.C FM
..576434-XA-9	MASTR Adjustable Rate Mo-MARM 2005-1 3A1		09/01/2024	PAYDOWN		2,349	2,349	2,231	2,240	0	109	0	109	0	2,349	0	0	0	50	02/01/2035	1.A FM
..576433-KW-1	MASTR Adjustable Rate Mo-MARM 2005-2 3A1		09/01/2024	PAYDOWN		5,142	5,142	4,936	5,023	0	119	0	119	0	5,142	0	0	0	165	03/01/2035	1.A FM
..576434-J7-0	MASTR Alternative Loan T-MALT 2005-2 4A3		09/25/2024	PAYDOWN		31,486	31,486	26,173	36,240	0	(4,754)	0	(4,754)	0	31,486	0	0	0	1,160	03/25/2035	1.A FM
..576434-W5-9	MASTR Alternative Loan T-MALT 2005-6 3A1		09/01/2024	PAYDOWN		4,261	4,261	3,105	4,118	0	143	0	143	0	4,261	0	0	0	161	12/01/2035	4.A FM
..57643M-LZ-5	MASTR Asset Securitizati-MASTR 2006-1 1A		09/01/2024	PAYDOWN		931	931	591	635	0	332	37	295	0	931	0	0	0	37	05/01/2036	1.A FM
..57645T-AA-5	MASTR Adjustable Rate Mo-MARM 2007-HF2 A		07/25/2024	PAYDOWN		29,693	29,693	26,044	29,657	0	3,649	0	3,649	0	29,693	0	0	0	382	09/25/2037	1.A FM
..581557-BS-3	McKesson Corp-SENIOR UNSECURED		09/16/2024	CALL 100		6,225,000	6,162,750	6,168,327	6,168,327	0	18,131	0	18,131	0	6,186,458	0	38,542	38,542	354,955	02/15/2026	1.G FE
..58403Y-AR-7	Med Trust 2021-MDLN-MED 2021-MDLN D		07/15/2024	PAYDOWN		10,284,642	10,284,642	10,143,494	10,298,629	0	(13,988)	0	(13,988)	0	10,284,642	0	0	0	452,956	11/15/2038	1.A
..58403Y-AU-0	Med Trust 2021-MDLN-MED 2021-MDLN E		07/15/2024	PAYDOWN		7,961,790	7,961,790	7,961,790	7,961,790	0	0	0	0	0	7,961,790	0	0	0	404,827	11/15/2038	1.A
..58403Y-AX-4	Med Trust 2021-MDLN-MED 2021-MDLN F		07/15/2024	PAYDOWN		8,957,013	8,957,013	8,957,013	8,957,013	0	0	0	0	0	8,957,013	0	0	0	500,476	11/15/2038	1.A
..585495-AA-2	Mello Mortgage Capital A-MELLO 2021-MTG1		09/01/2024	PAYDOWN		372,954	372,954	377,538	377,338	0	(4,385)	0	(4,385)	0	372,954	0	0	0	6,059	04/01/2051	1.A
..58768P-AC-8	Mercedes-Benz Auto Recei-MBART 2022-1 A3		09/15/2024	PAYDOWN		3,980,464	3,980,464	3,986,967	3,985,093	0	(4,629)	0	(4,629)	0	3,980,464	0	0	0	143,463	08/16/2027	1.A FE
..59023P-AB-9	Merrill Lynch Mortgage I-MLCC 2006-3 2A1		09/01/2024	PAYDOWN		12,965	12,965	11,138	11,204	0	1,876	114	1,762	0	12,965	0	0	0	507	10/01/2036	5.A FM
..590488-AA-6	Mesa Air Group, Inc. Class A Notes		07/15/2024	SINKING PAYMENT		369,870	369,870	369,870	369,925	0	(55)	0	(55)	0	369,870	0	0	0	18,519	07/15/2029	2.B PL
..595481-AA-0	Mid-State Capital Corp 2-MDST 2005-1 A		09/01/2024	PAYDOWN		38,826	38,826	37,273	38,826	0	0	0	0	0	38,826	0	0	0	1,515	01/01/2040	1.E FE
..59549W-AA-1	Mid-State Trust XI-MDST 11 A1		09/15/2024	PAYDOWN		62,234	62,234	62,232	62,234	0	0	0	0	0	62,234	0	0	0	2,060	07/15/2038	1.E FE
..59748T-AA-7	MIDLAND COGEN VENTURE-SENIOR SECURED NOT		09/15/2024	SINKING PAYMENT		416,500	416,500	416,500	416,500	0	0	0	0	0	416,500	0	0	0	24,990	03/15/2025	3.A FE
..61035M-AA-0	Monroe Capital ABS Fundi-MCAF 2023-1A A1		07/22/2024	PAYDOWN		3,150,000	3,150,000	3,149,452	3,150,000	0	0	0	0	0	3,150,000	0	0	0	246,133	04/22/2033	1.A FE
..61035M-AG-7	Monroe Capital ABS Fundi-MCAF 2023-1A B		07/22/2024	PAYDOWN		4,300,000	4,300,000	4,298,962	4,300,000	0	0	0	0	0	4,300,000	0	0	0	396,621	04/22/2033	1.E FE
..61035M-AK-8	Monroe Capital ABS Fundi-MCAF 2023-1A C		07/22/2024	PAYDOWN		2,050,000	2,050,000	2,049,643	2,050,000	0	0	0	0	0	2,050,000	0	0	0	231,481	04/22/2033	1.G FE
..61747Y-EF-8	Morgan Stanley-SUBORDINATED		09/16/2024	CITIGROUP GLOBAL MAR		29,261,050	35,000,000	32,687,500	32,937,725	0	96,402	0	96,402	0	33,034,126	0	(3,773,076)	(3,773,076)	871,815	09/16/2036	2.A FE
..61747Y-EL-5	Morgan Stanley-SENIOR UNSECURED		08/23/2024	SUNTRUST CAPITAL MAR		3,542,120	4,000,000	3,818,362	3,829,584	0	11,222	0	11,222	0	3,829,584	0	(287,464)	(287,464)	129,165	01/21/2033	1.E FE
..61748H-AW-1	Morgan Stanley Mortgage -MSM 2004-5AR 4A		09/01/2024	PAYDOWN		50,262	50,262	50,826	51,241	0	(980)	0	(980)	0	50,262	0	0	0	2,156	07/01/2034	1.A FM
..61748H-FX-2	MORGAN STANLEY MORTGAGE -SERIES 2004-10A		09/01/2024	PAYDOWN		34,452	34,452	32,660	33,898	0	554	0	554	0	34,452	0	0	0	1,398	11/01/2034	2.C FM
..61748H-UF-6	Morgan Stanley Mortgage -MSM 2006-1AR 1A		09/25/2024	PAYDOWN		9,273	6,756	3,762	3,679	0	79	79	3,600	0	9,273	0	0	0	200	02/25/2036	1.A FM
..61749L-AP-6	Morgan Stanley Mortgage -MSM 2006-8AR 5A		09/01/2024	PAYDOWN		14,163	14,163	10,365	12,095	0	2,068	0	2,068	0	14,163	0	0	0	747	06/01/2036	1.A FM
..61749L-BM-2	Morgan Stanley Mortgage -MSM 2006-8AR 6A		09/01/2024	PAYDOWN		17,972	17,972	13,951	12,922	0	5,050	0	5,050	0	17,972	0	0	0	1,064	06/01/2036	1.A FM
..61751D-AE-4	Morgan Stanley Mortgage -MSM 2006-17XS A		09/01/2024	PAYDOWN		62,197	62,197	18,445	19,136	0	43,961	900	43,961	0	62,197	0	0	0	494	10/01/2046	1.A FM
..61751M-AU-8	Morgan Stanley Mortgage -MSM 2007-10XS A		09/01/2024	PAYDOWN		43,925	43,925	40,013	42,094	0	1,831	0	1,831	0	43,925	0	0	0	1,049	02/01/2037	1.A FM
..61751Q-AB-1	Morgan Stanley Home Equi-MSHL 2007-1 A2		09/25/2024	PAYDOWN		23,607	23,607	13,530	9,204	0	14,404	0	14,404	0	23,607	0	0	0	551	12/25/2036	1.A FM
..617526-AD-0	Morgan Stanley ABS Capit-MSAC 2007-HE1 A		09/25/2024	PAYDOWN		28,786	28,786	14,600	17,484	0	11,302	0	11,302	0	28,786	0	0	0	541	11/25/2036	1.A FM
..61758V-AQ-0	Morgan Stanley Re-REMIC -MSRR 2010-R2 3B		09/01/2024	PAYDOWN		161,550	161,550	66,960	99,930	0	65,782	4,162	61,620	0	161,550	0	0	0	7,448	10/01/2037	4.C FM
..61759X-AC-6	Morgan Stanley Re-REMIC -MSRR 2010-RB 1C		09/01/2024	PAYDOWN		2,904	8,682	5,869	5,492	0	1,355	0	1,355	0	2,904	0	0	0	377	01/01/2037	4.C FM
..61776Q-AC-0	Morgan Stanley Residenti-MSRM 2024-3 A2		09/01/2024	PAYDOWN		497,112	497,112	496,926	0	0	187	0	187	0	497,112	0	0	0	2,313	07/01/2054	1.A FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-ign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/(Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..618933-AA-3	Mosaic Solar Loan Trust -MSAIC 2023-3A A ....	.....	09/20/2024	PAYDOWN	.....	624,008	624,008	613,066	612,776	0	11,232	0	11,232	0	624,008	0	0	0	24,230	11/20/2053	1.D FE
..61915R-AK-2	MortgageIT Trust 2005-3-MHL 2005-3 A1 .....	.....	09/25/2024	PAYDOWN	.....	349	349	201	412	0	(63)	0	(63)	0	349	0	0	0	15	08/25/2035	1.A FM
..61915R-AU-0	MortgageIT Trust 2005-5-MHL 2005-5 A1 .....	.....	09/25/2024	PAYDOWN	.....	18,580	18,580	11,984	16,755	0	1,825	0	1,825	0	18,580	0	0	0	762	12/25/2035	1.A FM
..61946K-AA-2	Mosaic Solar Loan Trust -MSAIC 2022-3A A ....	.....	09/20/2024	PAYDOWN	.....	100,816	100,816	100,812	100,812	0	4	0	4	0	100,816	0	0	0	4,186	06/20/2053	1.D FE
..61946Q-AB-7	Mosaic Solar Loan Trust -MSAIC 2022-1A B .....	.....	09/20/2024	PAYDOWN	.....	712,809	712,809	686,030	687,966	0	24,843	0	24,843	0	712,809	0	0	0	14,922	01/20/2053	1.G FE
..61946U-AB-8	Mosaic Solar Loan Trust -MSAIC 2022-2A B ....	.....	09/20/2024	PAYDOWN	.....	141,329	141,329	139,867	139,936	0	1,392	0	1,392	0	141,329	0	0	0	4,800	01/21/2053	1.G FE
..62847R-AA-5	MVII 2024-1 LLC-MVIIOT 2024-1A A .....	.....	09/20/2024	PAYDOWN	.....	264,208	264,208	267,965	0	0	(3,757)	0	(3,757)	0	264,208	0	0	0	1,776	02/20/2043	1.A FE
..62878Y-AA-2	NOTHING BUNDT CAKES-BUNDT 2021-1 A2 .....	.....	07/30/2024	PAYDOWN	.....	12,500	12,500	12,500	12,500	0	0	0	0	0	12,500	0	0	0	280	07/30/2051	2.C FE
..62935*-AB-6	NOAA Maryland LLC Senior Note Tranche B .....	.....	07/30/2024	CA_CASH_CLOSE	.....	10,723,812	10,000,000	10,100,000	10,073,971	0	(2,710)	0	(2,710)	0	10,071,261	0	652,551	652,551	396,713	05/15/2035	1.A
..62942K-AA-4	NPP Mortgage Trust 2013--NPPMT 2013-1 A1 ....	.....	09/01/2024	PAYDOWN	.....	114,234	114,234	109,224	110,121	0	4,113	0	4,113	0	114,234	0	0	0	2,360	07/01/2043	1.A
..62946A-AA-2	NP SPE II LLC-NPRL 2016-1A A1 .....	.....	09/20/2024	PAYDOWN	.....	333,879	333,879	333,879	333,885	0	(6)	0	(6)	0	333,879	0	0	0	9,453	04/20/2046	1.G FE
..62946A-AC-8	NP SPE II LLC-NPRL 2017-1A A1 .....	.....	09/20/2024	PAYDOWN	.....	364,221	364,221	364,217	364,221	0	0	0	0	0	364,221	0	0	0	9,524	10/21/2047	1.G FE
..62947A-AB-9	NP SPE II LLC-NPRL 2019-2A A2 .....	.....	07/19/2024	PAYDOWN	.....	1,452	1,452	1,452	1,452	0	0	0	0	0	1,452	0	0	0	186	11/19/2049	1.F FE
..62955M-AA-4	NRZ FHT Excess LLC-NZES 2020-FHT1 A .....	.....	09/25/2024	PAYDOWN	.....	72,471	72,471	72,469	72,469	0	2	0	2	0	72,471	0	0	0	2,464	11/25/2025	2.C FE
..62960N-AA-5	NXT Capital CLO 2020-1 L-NXTC 2020-1A A .....	.....	09/05/2024	PAYDOWN	.....	12,772,257	12,772,257	12,772,257	12,772,257	0	0	0	0	0	12,772,257	0	0	0	780,371	01/20/2031	1.A FE
..637071-AM-3	National Oilwell Varco I-SENIOR UNSECURE .....	.....	08/08/2024	VARIOUS	.....	9,827,196	10,000,000	10,321,700	10,246,603	0	(23,880)	0	(23,880)	0	10,222,723	0	(395,527)	(395,527)	243,000	12/01/2029	2.B FE
..63713B-AC-2	Truist Financial Corp-SENIOR UNSECURED .....	.....	09/30/2024	MATURITY	.....	15,000,000	15,000,000	15,000,000	15,000,000	0	0	0	0	0	15,000,000	0	0	0	318,750	09/30/2024	2.A Z
..638961-AA-0	Navient Private Educatio-NAVSL 2023-A A .....	.....	09/15/2024	PAYDOWN	.....	202,132	202,132	201,839	201,869	0	263	0	263	0	202,132	0	0	0	7,476	10/15/2071	1.A FE
..63939K-AD-3	Navient Private Educatio-NAVSL 2017-A B .....	.....	09/15/2024	PAYDOWN	.....	539,773	539,773	517,508	517,591	0	22,183	0	22,183	0	539,773	0	0	0	14,149	12/16/2058	1.A FE
..63940V-AC-6	Navient Private Educatio-NAVSL 2018-CA B .....	.....	09/15/2024	PAYDOWN	.....	167,474	167,474	156,133	158,611	0	8,864	0	8,864	0	167,474	0	0	0	5,301	06/16/2042	1.A FE
..63942A-AB-2	Navient Private Educatio-NAVSL 2020-IA A .....	.....	09/16/2024	PAYDOWN	.....	197,299	197,299	191,873	191,672	0	5,627	0	5,627	0	197,299	0	0	0	8,681	04/15/2069	1.A FE
..63942G-AA-1	Navient Private Educatio-NAVSL 2021-FA A .....	.....	09/15/2024	PAYDOWN	.....	183,988	183,988	157,310	183,988	0	26,678	0	26,678	0	183,988	0	0	0	855	02/18/2070	1.A FE
..63942M-AA-8	Navient Private Educatio-NAVSL 2022-A A .....	.....	09/15/2024	PAYDOWN	.....	103,296	103,296	89,404	90,060	0	13,236	0	13,236	0	103,296	0	0	0	1,534	07/15/2070	1.A FE
..63942T-AA-3	Navient Student Loan Trust - NAVSL 2023- .....	.....	09/15/2024	PAYDOWN	.....	192,987	192,987	192,987	192,987	0	0	0	0	0	192,987	0	0	0	10,348	03/15/2072	1.A FE
..63946T-AA-9	NB Direct Access Insuran Senior Secured .....	.....	08/14/2024	CA_CASH_CLOSE	.....	587,158	587,158	587,158	587,158	0	0	0	0	0	587,158	0	0	0	77,177	07/29/2025	2.A PL
..64016N-AA-5	Neighborly Issuer LLC-NBLY 2021-1A A2 .....	.....	07/30/2024	PAYDOWN	.....	4,000	4,000	3,503	3,721	0	279	0	279	0	4,000	0	0	0	72	04/30/2051	2.C FE
..64016N-AC-1	Neighborly Issuer 2022-1-NBLY 2022-1A A2 .....	.....	07/30/2024	PAYDOWN	.....	10,000	10,000	8,841	9,070	0	930	0	930	0	10,000	0	0	0	277	01/30/2052	2.C FE
..64033N-AA-4	Nelnet Student Loan Trus-NSLT 2014-5A A .....	.....	09/25/2024	PAYDOWN	.....	538,927	538,927	519,391	521,691	0	17,236	0	17,236	0	538,927	0	0	0	24,351	07/25/2046	1.B FE
..64033Q-AB-5	Nelnet Student Loan Trus-NSLT 2015-2A A2 .....	.....	09/25/2024	PAYDOWN	.....	424,446	424,446	410,121	407,174	0	17,272	0	17,272	0	424,446	0	0	0	17,885	09/25/2042	1.B FE
..643529-AC-4	New Century Alternative -NCAMT 2006-ALT2 .....	.....	09/01/2024	PAYDOWN	.....	28,874	28,874	5,246	5,444	0	23,774	343	23,431	0	28,874	0	0	0	257	10/01/2036	1.A FM
..643529-AD-2	New Century Alternative -NCAMT 2006-ALT2 .....	.....	09/01/2024	PAYDOWN	.....	13,173	13,173	8,760	13,173	0	10,653	0	10,653	0	13,173	0	0	0	141	10/01/2036	1.A FM
..64352V-MP-3	New Century Home Equity -NCHET 2005-A A5 .....	.....	09/01/2024	PAYDOWN	.....	90,855	90,855	85,631	87,260	0	3,595	0	3,595	0	90,855	0	0	0	3,137	08/01/2035	1.A FM
..64755*-AA-9	New Mountain Guardian III Senior Notes S .....	.....	08/16/2024	CA_CASH_CLOSE	.....	3,189,150	3,189,150	3,189,150	3,189,150	0	0	0	0	0	3,189,150	0	0	0	51,782	07/15/2025	2.C PL
..64755*-AB-7	New Mountain Guardian III Senior Notes S .....	.....	08/16/2024	CA_CASH_CLOSE	.....	1,200,000	1,200,000	1,200,000	1,200,000	0	0	0	0	0	1,200,000	0	0	0	41,477	07/15/2025	2.C PL
..64830Y-AC-1	NRZ Excess Spread-Collat-NZES 2021-FMT1 .....	.....	09/25/2024	PAYDOWN	.....	170,073	170,073	170,071	170,072	0	1	0	1	0	170,073	0	0	0	3,778	03/25/2026	2.C FE
..64831Q-AA-1	New Residential Mortgage-NRZT 2022-NQM3 .....	.....	09/01/2024	PAYDOWN	.....	864,850	864,850	852,121	855,330	0	9,521	0	9,521	0	864,850	0	0	0	27,763	04/01/2062	1.A
..64831Q-AB-9	New Residential Mortgage-NRZT 2022-NQM3 .....	.....	09/01/2024	PAYDOWN	.....	216,459	216,459	213,792	213,792	0	2,668	0	2,668	0	216,459	0	0	0	6,526	04/01/2062	1.E
..64831T-AA-5	New Residential Mortgage-NRZT 2021-NQM3 .....	.....	09/01/2024	PAYDOWN	.....	313,472	313,472	291,530	294,879	0	18,593	0	18,593	0	313,472	0	0	0	(2,528)	11/01/2056	1.A
..64831V-AB-8	New Residential Mortgage-NRZT 2022-NQM5 .....	.....	09/01/2024	PAYDOWN	.....	224,628	224,628	221,697	222,773	0	1,855	0	1,855	0	224,628	0	0	0	9,654	11/01/2052	1.C FE
..64831V-AC-6	New Residential Mortgage-NRZT 2022-NQM5 .....	.....	09/01/2024	PAYDOWN	.....	314,479	314,479	307,510	309,560	0	4,919	0	4,919	0	314,479	0	0	0	13,161	11/01/2052	1.F FE
..650119-AA-8	New York University-UNSECURED .....	.....	07/01/2024	CALL 100	.....	413,000	413,000	444,589	426,040	0	2,321	0	2,321	0	428,360	0	(15,360)	(15,360)	21,625	07/01/2032	1.D FE
..65158T-AG-2	NewMarket Corp-SENIOR UNSECURED .....	.....	08/08/2024	VARIOUS	.....	9,252,576	10,000,000	9,876,300	9,907,355	0	6,949	0	6,949	0	9,914,304	0	(661,728)	(661,728)	237,000	03/18/2031	2.B FE
..65535V-KX-5	Nomura Asset Acceptance -NAA 2005-WF1 2A .....	.....	09/01/2024	PAYDOWN	.....	881	881	896	896	0	(1)	0	(1)	0	881	0	0	0	39	03/01/2035	1.A FM
..65535V-MJ-4	Nomura Asset Acceptance -NAA 2005-AR3 1A .....	.....	09/25/2024	PAYDOWN	.....	89,443	89,443	69,672	71,349	0	19,932	1,838	18,094	0	89,443	0	0	0	2,280	07/25/2035	1.A FM
..65535V-NL-8	Nomura Asset Acceptance -NAA 2005-AR4 5A .....	.....	09/25/2024	PAYDOWN	.....	931,308	931,308	533,785	486,424	0	24,249	182	24,067	0	510,491	0	420,817	420,817	18,090	08/25/2035	1.A FM
..65535V-SJ-8	Nomura Asset Acceptance -NAA 2006-AP2 A2 .....	.....	09/01/2024	PAYDOWN	.....	31,065	31,065	10,894	11,709	0	20,423	1,067	19,356	0	31,065	0	0	0	548	01/01/2036	1.A FM

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..65539C-AK-2	Nomura Resecuritization -NMRR 2011-4RA 1		09/01/2024	PAYDOWN		28,622	24,705	20,527	21,610	0	3,801	0	3,801	0	28,622	0	0	0	847	12/01/2036	1.A FM
..65540E-BR-9	Nomura Resecuritization -NMRR 2014-1R 3A		09/30/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	322	07/26/2036	6. *
..66415*-AA-8	Northeast Energy Center Senior Secured N		09/30/2024	SINKING PAYMENT		197,969	197,969	197,969	197,969	0	0	0	0	0	197,969	0	0	0	6,755	12/31/2038	2.C
..67098A-AM-1	OBX 2019-INV1 Trust-OBX 2019-INV1 A12		09/01/2024	PAYDOWN		159,241	159,241	145,705	153,916	0	5,325	0	5,325	0	159,241	0	0	0	4,061	11/01/2048	1.A
..67113A-AP-5	OBX 2019-EXP3 Trust-OBX 2019-EXP3 1A8		09/01/2024	PAYDOWN		2,904	2,904	2,908	2,911	0	(8)	0	(8)	0	2,904	0	0	0	68	10/01/2059	1.A
..67113X-AB-6	OBX 2021-J1 Trust-OBX 2021-J1 A2		09/01/2024	VARIOUS		11,971,453	12,057,520	11,984,045	11,963,899	0	7,554	0	7,554	0	11,971,453	0	0	0	159,800	05/01/2051	1.A
..67117D-AA-8	Onslow Bay Mortgage Loan-OBX 2022-NQM7 A		09/01/2024	PAYDOWN		84,761	84,761	84,761	84,761	0	0	0	0	0	84,761	0	0	0	2,885	08/01/2062	1.A FE
..67117D-AB-6	Onslow Bay Mortgage Loan-OBX 2022-NQM7 A		09/01/2024	PAYDOWN		40,069	40,069	39,977	40,069	0	0	0	0	0	40,069	0	0	0	1,521	08/01/2062	1.C FE
..67117D-AC-4	Onslow Bay Mortgage Loan-OBX 2022-NQM7 A		09/01/2024	PAYDOWN		57,791	57,791	57,352	40,335	0	.81	0	.81	0	57,791	0	0	0	2,035	08/01/2062	1.F FE
..67118H-AC-4	OBX 2024-NQM2 Trust-OBX 2024-NQM2 A2		09/01/2024	PAYDOWN		206,407	206,407	206,404	0	0	3	0	3	0	206,407	0	0	0	7,122	12/01/2063	1.C FE
..67119F-AA-1	OBX 2024-NQM7 Trust-OBX 2024-NQM7 A1		09/01/2024	PAYDOWN		221,146	221,146	221,145	0	0	1	0	1	0	221,146	0	0	0	5,656	03/01/2064	1.A FE
..67119F-AB-9	OBX 2024-NQM7 Trust-OBX 2024-NQM7 A2		09/01/2024	PAYDOWN		221,146	221,146	221,146	0	0	0	0	0	0	221,146	0	0	0	4,715	03/01/2064	1.C FE
..67181D-AA-9	Oak Street Investment Gr-OAKIG 2020-1A A		09/20/2024	PAYDOWN		27,218	27,218	27,109	25,901	0	109	0	109	0	27,218	0	0	0	303	11/20/2050	1.A FE
..67181D-AB-7	Oak Street Investment Gr-SERIES 20-1A CL		09/20/2024	PAYDOWN		25,903	25,903	25,892	25,895	0	8	0	8	0	25,903	0	0	0	349	11/20/2050	1.A FE
..67190A-AA-4	Oak Street Investment Gr-OAKIG 2021-1A A		09/20/2024	PAYDOWN		35,070	35,070	33,641	33,823	0	1,247	0	1,247	0	35,070	0	0	0	317	01/20/2051	1.A FE
..67190A-AB-2	Oak Street Investment Gr-OAKIG 2021-1A A		09/20/2024	PAYDOWN		21,432	21,432	21,429	21,429	0	3	0	3	0	21,432	0	0	0	252	01/20/2051	1.A FE
..67190A-AC-0	Oak Street Investment Gr-OAKIG 2021-1A A		09/20/2024	PAYDOWN		11,000	11,000	10,241	10,332	0	668	0	668	0	11,000	0	0	0	205	01/20/2051	2.A FE
..67190A-AD-8	Oak Street Investment Gr-OAKIG 2021-1A A		09/20/2024	PAYDOWN		11,419	11,419	11,169	11,204	0	214	0	214	0	11,419	0	0	0	248	01/20/2051	2.A FE
..674135-EM-6	Oakwood Mortgage Investo-OAK 1999-A M2		09/01/2024	PAYDOWN		0	(4,002)	(3,541)	(579)	0	2,642	0	2,642	0	0	0	0	0	(221)	04/01/2029	6. FE
..67448Q-AC-5	OBX 2019-EXP1 Trust-OBX 2019-EXP1 1A3		09/01/2024	PAYDOWN		66,437	66,437	66,105	66,006	0	432	0	432	0	66,437	0	0	0	1,942	01/01/2059	1.A
..680033-AC-1	Old National Bancorp/IN-SENIOR UNSECURED		08/15/2024	MATURITY		19,000,000	19,000,000	19,000,000	19,000,000	0	0	0	0	0	19,000,000	0	0	0	783,750	08/15/2024	2.A FE
..681919-BD-7	Omnicom Group Inc-SENIOR UNSECURED		08/08/2024	MRB002A		1,818,256	2,100,000	2,096,283	2,097,140	0	224	0	224	0	2,097,364	0	(279,108)	(279,108)	55,662	08/01/2031	2.A FE
..681936-BL-3	Omega Healthcare Investo-SENIOR UNSECURE		09/16/2024	BBVA SECURITIES INC.		9,451,800	10,000,000	10,209,600	10,159,623	0	(18,790)	0	(18,790)	0	10,140,833	0	(689,033)	(689,033)	348,403	10/01/2029	2.C FE
..68378N-AA-8	Oportun Issuance Trust 2-OPIN 2022-A A		09/08/2024	PAYDOWN		1,274,829	1,274,829	1,274,154	1,274,583	0	246	0	246	0	1,274,829	0	0	0	48,215	06/09/2031	1.D FE
..69144A-AA-7	Oxford Finance Funding 2-OXFIN 2020-1A A		08/15/2024	PAYDOWN		83,642	83,642	83,283	83,389	0	253	0	253	0	83,642	0	0	0	1,618	02/15/2028	1.F FE
..69145B-AA-4	OXFORD FINANCE FUNDING T-OXFIN 2022-1A A		09/15/2024	PAYDOWN		87,685	87,685	87,685	87,685	0	0	0	0	0	87,685	0	0	0	2,137	02/15/2030	1.F FE
..69337X-AH-7	PHH Alternative Mortgage-PHHAM 2007-1 21		09/01/2024	PAYDOWN		18,947	25,125	21,908	23,382	0	1,263	0	1,263	0	18,947	0	0	0	681	02/01/2037	4.A FM
..69345B-AA-3	PMT Loan Trust 2013-J1-PMTLT 2013-J1 A1		09/01/2024	PAYDOWN		25,277	25,277	24,630	24,696	0	582	0	582	0	25,277	0	0	0	592	09/01/2043	1.A
..69354N-AC-0	PRA Group Inc-SENIOR UNSECURED		09/03/2024	CALL 100		3,990,000	3,990,000	4,169,550	4,041,433	0	1,588	0	1,588	0	4,043,021	0	(53,021)	(53,021)	294,263	09/01/2025	3.B FE
..693684-AA-0	PSMC 2020-1 Trust-PSMC 2020-1 A1		09/01/2024	PAYDOWN		78,215	78,215	79,963	80,613	0	(2,398)	0	(2,398)	0	78,215	0	0	0	1,738	01/01/2050	1.A
..693696-AA-4	Pvone 2023-1 LLC-PVONE 2023-1A A		09/15/2024	PAYDOWN		1,545,202	1,545,202	1,544,324	1,542,011	0	3,190	0	3,190	0	1,545,202	0	0	0	74,136	07/16/2035	1.A FE
..693699-AA-8	PVONE 2023-1 LLC-PVONE 2023-2A A		09/15/2024	PAYDOWN		1,725,329	1,725,329	1,725,327	1,725,314	0	16	0	16	0	1,725,329	0	0	0	92,741	09/17/2035	1.A FE
..69374X-AA-8	PSMC 2019-2 Trust-PSMC 2019-2 A1		09/01/2024	PAYDOWN		3,993	3,993	4,073	4,055	0	(62)	0	(62)	0	3,993	0	0	0	98	10/01/2049	1.A
..69375B-AA-5	PSMC 2019-3 Trust-PSMC 2019-3 A1		09/01/2024	PAYDOWN		16,337	16,337	16,574	16,697	0	(360)	0	(360)	0	16,337	0	0	0	90	11/01/2049	1.A
..69381J-AA-0	PRPM 2024-RCF5 LLC-PRPM 2024-RCF5 A1		09/25/2024	PAYDOWN		888,599	888,599	866,587	0	0	22,012	0	22,012	0	888,599	0	0	0	3,949	08/25/2054	1.A FE
..693984-AB-2	PRKOM 2023-AFC3 Trust-PRKOM 2023-AFC3 A2		09/01/2024	PAYDOWN		409,781	409,781	409,778	409,779	0	2	0	2	0	409,781	0	0	0	21,810	09/01/2058	1.C FE
..69403W-AA-5	Pacific Beacon LLC-FIRST LIEN		07/15/2024	SINKING PAYMENT		0	0	0	0	0	0	0	0	0	0	0	0	0	(11,641)	07/15/2026	2.B FE
..69478X-AC-9	Pacific Premier Bancorp -SUBORDINATED		09/03/2024	MATURITY		5,000,000	5,000,000	5,000,000	5,000,000	0	0	0	0	0	5,000,000	0	0	0	287,500	09/03/2024	2.B FE
..69546V-AA-5	PAGAYA AI Debt Trust 202-PAID 2022-2 A		09/15/2024	PAYDOWN		771,588	771,588	771,588	771,588	0	0	0	0	0	771,588	0	0	0	25,492	01/15/2030	1.A FE
..70215F-AA-8	Partstat (Varian 2020 I Pass-Thru Certif		09/15/2024	SINKING PAYMENT		151,586	151,586	151,586	151,586	0	0	0	0	0	151,586	0	0	0	2,463	03/15/2030	1.E
..70338A-10-3	Patrons' Legacy-PATRL 5.646 05/17/22		08/19/2024	SINKING PAYMENT		788,450	788,450	788,450	0	0	0	0	0	0	788,450	0	0	0	77,033	09/17/2025	1.F FE
..714046-AH-2	PerkinElmer Inc-SENIOR UNSECURED		07/30/2024	MRB0010		6,998,353	7,000,000	6,997,550	6,998,199	0	154	0	154	0	6,998,353	0	0	0	156,188	03/15/2031	2.B FE
..72703P-AC-7	Planet Fitness Master Is-2019-1A A2 FIXE		09/05/2024	PAYDOWN		27,500	27,500	27,841	27,777	0	(277)	0	(277)	0	27,500	0	0	0	796	12/05/2049	2.B FE
..74042W-AA-2	Preferred Term Securitie-SECURED		09/30/2024	PAYDOWN		153,926	153,926	146,150	153,926	0	0	0	0	0	153,926	0	0	0	6,442	09/23/2035	1.C FE
..741011-AA-8	Presidio Petroleum LLC Presidio Finance		08/26/2024	CALL 100		2,170,179	2,170,179	2,170,179	2,170,179	0	0	0	0	0	2,170,179	0	0	0	56,855	05/25/2028	1.G PL
..74166Y-AC-4	Primrose Schools 22-1A A2		07/30/2024	PAYDOWN		6,750	6,750	6,750	6,750	0	0	0	0	0	6,750	0	0	0	289	04/30/2052	2.B FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..74333W-AJ-1	Progress Residential Trust-PROG 2021-SFR		09/01/2024	PAYDOWN		244,318	244,318	244,309	244,311	0	7	0	7	0	244,318	0	0	0	5,854	12/01/2040	2.A FE
..74338*-AA-6	Project Axis Garner NC C Trust Certificat		09/15/2024	SINKING PAYMENT		118,266	118,266	118,266	118,267	0	(2)	0	(2)	0	118,266	0	0	0	3,183	11/15/2039	1.D
..74351@-AA-6	Project Arrow Oak Creek Trust Certificate		09/10/2024	SINKING PAYMENT		128,462	128,462	128,462	128,462	0	0	0	0	0	128,462	0	0	0	3,490	07/10/2040	1.D
..743874-AC-3	Provident Funding Mortga-PFMT 2020-1 A2		09/01/2024	PAYDOWN		29,477	29,477	29,896	29,878	0	(402)	0	(402)	0	29,477	0	0	0	612	02/01/2050	1.A
..74387L-AC-5	Provident Funding Mortga-PFMT 2019-1 A2		09/01/2024	PAYDOWN		69,806	69,806	70,776	70,676	0	(870)	0	(870)	0	69,806	0	0	0	1,312	12/01/2049	1.A
..74387Y-AD-5	Provident Funding Mortga-PFMT 2021-1 A2A		09/01/2024	VARIOUS		12,539,123	12,644,824	12,563,634	12,570,898	0	6,447	0	6,447	0	12,577,345	0	(38,222)	(38,222)	167,434	04/01/2051	1.A
..74922M-AA-9	RALI Series 2006-QA6 Tru-RALI 2006-QA6 A		09/25/2024	PAYDOWN		23,433	23,132	20,224	24,597	0	(17,899)	0	(17,899)	0	23,433	0	0	0	1,771	07/25/2036	3.C FM
..74922Q-AA-0	RALI Series 2006-QA8 Tru-RALI 2006-QA8 A		09/25/2024	PAYDOWN		7,553	7,306	5,592	8,113	0	(742)	0	(742)	0	7,553	0	0	0	254	09/25/2036	1.A FM
..74923G-AC-7	RALI Series 2007-QA1 Tru-RALI 2007-QA1 A		09/25/2024	PAYDOWN		60,145	65,847	49,050	52,430	0	11,395	0	11,395	0	60,145	0	0	0	1,632	01/25/2037	1.A FM
..74923H-AQ-4	RALI Series 2007-QS4 Tru-RALI 2007 QA 3A		09/01/2024	PAYDOWN		15,987	17,588	16,011	16,152	0	1,228	0	1,228	0	15,987	0	0	0	758	03/01/2037	4.A FM
..74927T-AC-5	RBSSP Resecuritization T-RBSSP 2010-9 3A		09/26/2024	PAYDOWN		40,958	40,958	38,449	35,957	0	5,001	0	5,001	0	40,958	0	0	0	1,123	10/26/2034	1.A FM
..74928D-AV-7	RBSSP Resecuritization T-RBSSP 2009-1 7A		09/01/2024	PAYDOWN		59,886	59,886	27,662	44,481	0	15,579	0	15,579	0	59,886	0	0	0	1,054	06/01/2037	1.A FM
..74928F-AY-6	RBSSP Resecuritization T-RBSSP 2009-3 6A		09/01/2024	PAYDOWN		0	6,053	3,700	1,388	0	2,385	0	2,385	0	0	0	0	0	169	03/01/2036	1.A FM
..74928R-AB-0	RBSSP Resecuritization T-RBSSP 2009-10 1		09/01/2024	PAYDOWN		2,436	2,442	1,595	1,660	0	780	0	780	0	2,436	0	0	0	90	08/01/2035	1.A FM
..74928U-AM-9	RBSSP Resecuritization T-RBSSP 2009-12 5		09/01/2024	PAYDOWN		7,400	10,847	7,682	9,681	0	72	0	72	0	7,400	0	0	0	352	08/01/2036	1.A FM
..74928U-AA-5	RBSSP Resecuritization T-RBSSP 2009-12 8		09/01/2024	PAYDOWN		7,013	8,342	3,548	4,956	0	2,616	0	2,616	0	7,013	0	0	0	374	06/01/2036	1.A FM
..74928U-BV-8	RBSSP Resecuritization T-RBSSP 2009-12 1		09/26/2024	PAYDOWN		738,828	738,828	602,145	683,931	0	54,897	0	54,897	0	738,828	0	0	0	30,838	10/25/2035	1.A FM
..74928X-BB-6	RBSSP Resecuritization T-RBSSP 2009-6 3A		09/26/2024	PAYDOWN		56,077	56,000	37,533	44,543	0	11,489	0	11,489	0	56,077	0	0	0	2,255	01/26/2036	1.A FM
..74929F-AK-5	RBSSP Resecuritization T-RBSSP 2010-3 4A		09/01/2024	PAYDOWN		7,429	7,429	7,305	7,429	0	0	0	0	0	7,429	0	0	0	336	12/01/2035	1.A FM
..74930X-BB-2	RBSSP Resecuritization T-RBSSP 2012-1 4B		08/01/2024	PAYDOWN		67,837	67,837	64,784	67,837	0	2,054	0	2,054	0	67,837	0	0	0	417,820	01/01/2029	1.A FM
..749357-AA-7	RCKT Mortgage Trust 2019-RCKT 2019-1 A1		09/01/2024	PAYDOWN		128,392	128,392	130,378	131,402	0	(3,010)	0	(3,010)	0	128,392	0	0	0	2,955	09/01/2049	1.A
..749389-AA-0	RCKT Mortgage Trust 2020-RCKT 2020-1 A1		09/01/2024	PAYDOWN		122,903	122,903	117,373	112,842	0	10,061	0	10,061	0	122,903	0	0	0	2,468	02/01/2037	1.A FM
..749574-AC-3	RFMSI Series 2006-SA2 Tr-RFMSI 2006-SA2		09/01/2024	PAYDOWN		385	1,648	1,195	913	0	405	0	405	0	385	0	0	0	68	08/01/2036	1.A FM
..74958T-AB-9	RFMSI Series 2007-SA3 Tr-RFMSI 2007-SA3		09/01/2024	PAYDOWN		3,181	3,707	2,919	2,792	0	883	0	883	0	3,181	0	0	0	163	07/01/2037	1.A FM
..74958W-AC-0	RFMSI Series 2007-SA1 Tr-RFMSI 2007-SA1		09/01/2024	PAYDOWN		303	1,507	855	780	0	218	0	218	0	303	0	0	0	57	02/01/2037	1.A FM
..74958X-AF-1	RFMSI Series 2007-SA2 Tr-RFMSI 2007-SA2		09/01/2024	PAYDOWN		16,277	15,626	14,244	15,063	0	746	0	746	0	16,277	0	0	0	623	04/01/2037	3.B FM
..74958Y-AE-2	RFMSI Series 2007-S4 Tru-RFMSI 2007-S4 A		09/25/2024	PAYDOWN		2,694	3,840	3,040	3,370	0	321	90	231	0	2,694	0	0	0	118	04/25/2037	1.A FM
..74968R-AA-3	RMF Proprietary Issuance-RPIT 2019-1 A		09/25/2024	PAYDOWN		526,689	526,689	522,612	523,917	0	2,772	0	2,772	0	526,689	0	0	0	13,662	10/25/2063	1.A FE
..74969M-AA-3	RMF Proprietary Issuance-RPIT 2020-1 A		08/25/2024	PAYDOWN		181,387	181,387	181,387	181,387	0	0	0	0	0	181,387	0	0	0	4,224	04/26/2060	1.A FE
..74969P-AA-6	RP Escrow Issuer LLC-SECURED		07/17/2024	EXCHANGE OFFER		5,006,633	5,000,000	5,025,000	5,008,076	0	(1,443)	0	(1,443)	0	5,006,633	0	0	0	48,854	12/15/2025	5.B FE
..75003H-AA-5	Renewable Energy Alterna Senior Secured		09/30/2024	SINKING PAYMENT		0	0	0	0	0	0	0	0	0	0	0	0	0	(3,513)	09/30/2046	2.C PL
..75086@-AA-3	Rainier Gsa Portfolio I US Govt Lease Ba		09/15/2024	SINKING PAYMENT		67,729	67,729	67,729	67,729	0	0	0	0	0	67,729	0	0	0	3,318	07/15/2036	1.F
..75115B-AC-3	RALI Series 2006-QA5 Tru-RALI 2006-QA5 2		09/01/2024	PAYDOWN		33,710	41,464	29,200	31,045	0	7,570	136	7,434	0	33,710	0	0	0	2,192	07/01/2036	6. FM
..75115D-AA-3	RALI Series 2006-QS13 Tru-RALI 2006-QS13		09/25/2024	PAYDOWN		2,171	3,658	2,568	2,898	0	411	58	353	0	2,171	0	0	0	120	09/25/2036	1.A FM
..75115L-AA-5	RALI Series 2007-QH7 Tru-RALI 2007-QH7 1		09/25/2024	PAYDOWN		35,561	35,561	32,716	34,601	0	959	0	959	0	35,561	0	0	0	1,378	08/25/2037	1.A FM
..75116C-ET-9	RESIDENTIAL ACCREDIT LOA-SERIES 2007-QS6		09/01/2024	PAYDOWN		3,320	4,984	2,978	3,370	0	987	0	987	0	3,320	0	0	0	253	04/01/2037	1.A FM
..75116F-BH-1	RALI Series 2007-QS9 Tru-RALI 2007-QS9 A		09/01/2024	PAYDOWN		18,515	25,091	22,207	23,719	0	1,284	407	877	0	18,515	0	0	0	1,521	07/01/2037	5.A FM
..75156V-AD-7	RAMP Series 2006-RS3 Tru-RAMP 2006-RS3 A		09/25/2024	PAYDOWN		45,842	79,913	56,163	59,027	0	8,930	0	8,930	0	45,842	0	0	0	2,275	05/25/2036	1.A FM
..75458*-AB-5	Rayburn Country Electric Senior Secured		09/30/2024	SINKING PAYMENT		0	0	0	0	0	0	0	0	0	0	0	0	0	9,264	12/30/2042	2.B FE
..75575R-AA-5	Ready Capital Mortgage F-RGMT 2023-FL11		09/25/2024	PAYDOWN		638,958	638,958	637,360	634,014	0	4,943	0	4,943	0	638,958	0	0	0	39,407	10/25/2039	1.A FE
..756109-CE-2	Realty Income Corp-SENIOR UNSECURED		08/26/2024	VARIOUS		23,326,298	25,765,000	23,716,084	0	0	119,791	0	119,791	0	23,835,875	0	(509,577)	(509,577)	684,044	02/15/2032	1.G FE
..75971F-AY-9	RENAISSANCE HOME EQUITY -RAINC 2007-3W AF		07/01/2024	PAYDOWN		3,544	3,544	2,552	2,776	0	769	0	769	0	3,544	0	0	0	108	09/01/2037	1.A FM
..75973V-AA-4	Renew 2024-1-RENEW 2024-1A A		09/20/2024	PAYDOWN		281,308	281,308	281,715	0	0	(407)	0	(407)	0	281,308	0	0	0	7,224	11/20/2059	1.A FE
..759950-DM-7	Renaissance Home Equity -RAINC 2004-3 AF5		08/01/2024	PAYDOWN		61,026	61,026	53,855	54,496	0	6,529	0	6,529	0	61,026	0	0	0	1,738	11/01/2034	1.A FM
..759950-EM-6	Renaissance Home Equity -RAINC 2004-4 AF5		09/01/2024	PAYDOWN		170,954	170,954	154,340	156,103	0	14,851	0	14,851	0	170,954	0	0	0	4,245	02/01/2035	1.A FM
..76029#-AA-1	Republic Airways Holding Senoir Secured		09/15/2024	SINKING PAYMENT		281,250	281,250	281,250	281,250	0	0	0	0	0	281,250	0	0	0	22,572	12/15/2028	2.B PL

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Identification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..76042E-AA-7	Republic Finance Issuanc-REPS 2020-A A		09/20/2024	PAYDOWN		1,183,853	1,183,853	1,183,647	1,183,820	0	33	0	33	0	1,183,853	0	0	0	19,822	11/20/2030	1.A FE
..760985-S6-9	RFSC Series 2004-PP1 Tru-RFSC 2004-PP1A		09/25/2024	PAYDOWN		46,350	46,350	46,118	42,047	0	4,146	0	4,146	0	46,350	0	0	0	2,843	11/25/2042	1.A FM
..76110H-H8-5	RALI Series 2004-QA6 Tru-RALI 2004-QA6 N		09/01/2024	PAYDOWN		11,923	11,678	9,554	10,133	0	2,256	642	1,614	0	11,923	0	0	0	402	12/01/2034	1.A FM
..76110H-U9-0	RALI Series 2005-QA2 Tru-RALI 2005-QA2 N		09/01/2024	PAYDOWN		7,387	7,387	4,057	4,060	0	3,328	0	3,328	0	7,387	0	0	0	233	02/01/2035	1.A FM
..761118-BU-1	RALI Series 2005-QA8 Tru-RALI 2005-QA8 N		09/01/2024	PAYDOWN		7,592	13,050	9,783	11,031	0	779	799	(29)	0	7,592	0	0	0	391	07/01/2035	1.A FM
..761118-FL-7	RALI Series 2005-QA9 Tru-RALI 2005-QA9 C		09/01/2024	PAYDOWN		71,550	69,457	67,338	66,283	0	3,081	0	3,081	0	71,550	0	0	0	2,670	08/01/2035	2.C FM
..761118-FM-5	RESIDENTIAL ACCREDIT LOA-SERIES 2005-QA9		09/01/2024	PAYDOWN		30,977	31,633	25,226	26,986	0	5,312	689	4,623	0	30,977	0	0	0	1,263	08/01/2035	1.A FM
..761118-GS-1	RALI Series 2005-QS13 Tr-RALI 2005-QS13		09/25/2024	PAYDOWN		45,756	38,133	30,737	31,747	0	7,936	160	7,776	0	45,756	0	0	0	907	09/25/2035	1.A FM
..761118-GT-9	RALI Series 2005-QS13 Tr-RALI 2005-QS13		09/25/2024	PAYDOWN		0	0	1,792	0	0	0	0	0	0	0	0	0	0	0	09/25/2035	5.C FE
..761118-KH-0	RALI Series 2005-QS15 Tr-RALI 2005-QS15		09/01/2024	PAYDOWN		6,497	7,389	6,826	5,259	0	2,026	0	2,026	0	6,497	0	0	0	377	10/01/2035	1.A FM
..761118-SC-3	RALI Series 2006-QS1 Tru-RALI 2006-QS1 A		09/01/2024	PAYDOWN		57,037	64,619	56,945	59,921	0	4,118	716	3,402	0	57,037	0	0	0	2,327	01/01/2036	5.A FM
..761118-UG-1	RALI Series 2006-QS2 Tru-RALI 2006-QS2 1		09/01/2024	PAYDOWN		13,519	13,121	12,422	12,760	0	1,247	(103)	1,350	0	13,519	0	0	0	1,698	02/01/2036	4.C FM
..761118-UQ-9	RALI Series 2006-QS2 Tru-RALI 2006-QS2 1		09/01/2024	PAYDOWN		2,912	2,670	2,473	2,339	0	322	0	322	0	2,912	0	0	0	158	02/01/2036	3.B FM
..76112B-NM-8	GMACM Mortgage Loan Trus-GMACM 2005-AA1		09/01/2024	PAYDOWN		212,814	157,202	141,780	145,200	0	19,171	0	19,171	0	212,814	0	0	0	5,762	05/01/2035	1.A FM
..76971E-AA-2	RMF Buyout Issuance Trus-RBIT 2020-HB1 A		09/25/2024	PAYDOWN		705,532	705,532	705,531	707,681	0	(2,149)	0	(2,149)	0	705,532	0	0	0	7,995	10/25/2050	1.A FE
..78386N-BC-2	SACO I Inc-SACO 1999-3 1B1		09/01/2024	PAYDOWN		8,808	8,808	8,743	8,743	0	65	0	65	0	8,808	0	0	0	337	04/01/2039	1.A FM
..78397W-AC-0	SCF Equipment Leasing 20-SCFET 2022-2A A		09/20/2024	PAYDOWN		247,164	247,164	246,376	246,685	0	479	0	479	0	247,164	0	0	0	12,049	10/21/2030	1.A FE
..78398B-AE-1	SCG 2023-NASH Mortgage T-SCG 2023-NASH C		09/30/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	725,838	12/15/2040	1.G FE
..78433X-AA-8	Stonepeak 2021-1 ABS-SALTT 2021-1A AA		09/15/2024	PAYDOWN		37,514	37,514	34,976	35,419	0	2,095	0	2,095	0	37,514	0	0	0	546	02/28/2033	1.C FE
..78433X-AC-4	Stonepeak 2021-1 ABS-SALTT 2021-1A B		09/15/2024	PAYDOWN		40,366	40,366	37,157	38,383	0	1,983	0	1,983	0	40,366	0	0	0	976	02/28/2033	2.B FE
..78448R-AE-6	SMB Private Education Lo-SMB 2015-C B		09/15/2024	PAYDOWN		448,822	448,822	429,887	434,698	0	14,124	0	14,124	0	448,822	0	0	0	10,496	09/15/2043	1.A FE
..78449C-AC-2	SMB Private Education Lo-SMB 2022-C B		09/17/2024	BARCLAYS CAPITAL INC		15,263,543	15,300,000	15,292,994	15,294,078	0	491	0	491	0	15,294,569	0	(31,026)	(31,026)	590,567	05/16/2050	1.C FE
..78449L-AC-2	SMB 2018-B A2B		09/16/2024	PAYDOWN		64,393	64,393	63,236	63,499	0	894	0	894	0	64,393	0	0	0	2,703	01/15/2037	1.A FE
..78449X-AA-0	SMB Private Education Lo-SMB 2020-B A1A		09/15/2024	PAYDOWN		211,319	211,319	207,290	208,471	0	2,848	0	2,848	0	211,319	0	0	0	1,808	07/15/2053	1.A FE
..78449Y-AA-8	SMB Private Education Lo-SMB 2021-B A		09/15/2024	PAYDOWN		429,216	429,216	391,392	400,630	0	28,586	0	28,586	0	429,216	0	0	0	3,734	07/17/2051	1.A FE
..78450F-AD-9	SMB Private Education Lo-SMB 2022-A B		09/15/2024	PAYDOWN		118,806	118,806	117,360	117,786	0	1,020	0	1,020	0	118,806	0	0	0	2,603	11/16/2054	1.D FE
..78450F-AE-7	SMB Private Education Lo-SMB 2022-A C		09/15/2024	PAYDOWN		321,544	321,544	321,408	321,442	0	102	0	102	0	321,544	0	0	0	8,449	11/16/2054	1.G FE
..78450F-AB-1	SMB Private Education Lo-SMB 2023-D A1B		09/16/2024	PAYDOWN		322,000	322,000	322,000	322,000	0	0	0	0	0	322,000	0	0	0	17,801	09/15/2053	1.A FE
..78518#-AA-5	Saber Midstream LLC Senior Secured Notes		09/30/2024	SINKING PAYMENT		884,802	884,802	882,590	883,079	0	1,723	0	1,723	0	884,802	0	0	0	45,188	03/31/2029	2.C PL
..78518#-AB-3	Saber Midstream LLC Senior Secured Notes		09/30/2024	SINKING PAYMENT		273,467	273,467	273,467	273,467	0	0	0	0	0	273,467	0	0	0	19,964	03/31/2030	2.C PL
..79582M-AA-9	Saluda Grade Alternative-GRADE 2024-F1G5		09/01/2024	PAYDOWN		636,407	636,407	636,407	636,407	0	1	0	1	0	636,407	0	0	0	11,772	04/01/2054	1.A FE
..79588T-AD-2	Sammons Financial Group -SENIOR UNSECURE		09/18/2024	MRB002A		12,009,241	13,730,000	12,977,223	13,073,757	0	52,979	0	52,979	0	13,126,735	0	(1,117,495)	(1,117,495)	425,458	04/16/2031	2.A FE
..79588T-AE-0	Sammons Financial Group -SENIOR UNSECURE		09/18/2024	MRB002A		7,070,972	7,500,000	7,492,875	7,493,360	0	763	0	763	0	7,494,124	0	(423,152)	(423,152)	337,448	04/08/2032	2.A FE
..795924-AA-7	Saluda Grade Alternative-GRADE 2024-INW1		09/01/2024	PAYDOWN		169,412	169,412	169,409	169,412	0	3	0	3	0	169,412	0	0	0	779	08/01/2059	1.A FE
..805564-EM-9	Saxon Asset Securities T-SAST 1999-3 BF1		09/01/2024	PAYDOWN		16,335	13,655	13,655	12,043	0	2,223	0	2,223	0	16,335	0	0	0	600	12/01/2032	1.A FM
..81378E-AA-1	SECURITIZED ASSET BACKED-SERIES 2007-BR4		09/25/2024	PAYDOWN		65,321	65,321	28,597	25,973	0	39,348	0	39,348	0	65,321	0	0	0	1,167	05/25/2037	1.A FM
..81743A-AA-7	SEQUOIA MORTGAGE TRUST 2-SEMT 2019-5 A1		09/01/2024	PAYDOWN		40,098	40,098	40,800	40,877	0	(1,488)	0	(1,488)	0	40,098	0	0	0	(2,724)	12/01/2049	1.A
..81743C-AE-5	Sequoia Mortgage Trust 2-SEMT 2024-5 A5		09/01/2024	PAYDOWN		458,370	458,370	455,792	0	0	2,579	0	2,579	0	458,370	0	0	0	7,139	06/01/2054	1.A FE
..81745A-AB-3	Sequoia Mortgage Trust 2-SEMT 2013-5 A2		09/01/2024	PAYDOWN		53,036	53,036	50,210	50,631	0	2,405	0	2,405	0	53,036	0	0	0	992	05/01/2043	1.A
..81745C-AA-1	Sequoia Mortgage Trust 2-SEMT 2013-7 A1		09/01/2024	PAYDOWN		38,859	38,859	35,621	35,238	0	3,238	0	3,238	0	38,859	0	0	0	665	06/01/2043	1.A
..81745J-AA-6	Sequoia Mortgage Trust 2-SEMT 2013-11 A1		09/01/2024	PAYDOWN		48,401	48,401	47,751	47,830	0	572	0	572	0	48,401	0	0	0	1,101	09/01/2043	1.A
..81745M-AA-9	Sequoia Mortgage Trust 2-SEMT 2013-2 A		09/01/2024	PAYDOWN		48,813	48,813	43,727	44,283	0	4,530	0	4,530	0	48,813	0	0	0	648	02/01/2043	1.A
..81745R-AB-6	Sequoia Mortgage Trust 2-SEMT 2013-3 A2		09/01/2024	PAYDOWN		61,787	61,787	57,127	57,641	0	4,146	0	4,146	0	61,787	0	0	0	1,031	03/01/2043	1.A
..81748J-AA-3	Sequoia Mortgage Trust 2-SEMT 2019-4 A1		09/01/2024	PAYDOWN		103,708	103,708	105,880	107,158	0	(3,450)	0	(3,450)	0	103,708	0	0	0	2,420	11/01/2049	1.A
..81748K-AA-0	Sequoia Mortgage Trust 2-SEMT 2020-2 A1		09/01/2024	PAYDOWN		65,965	65,965	67,594	68,586	0	(2,621)	0	(2,621)	0	65,965	0	0	0	1,562	03/01/2050	1.A
..81748M-AA-6	Sequoia Mortgage Trust 2-SEMT 2020-1 A1		09/01/2024	PAYDOWN		40,300	40,300	41,225	41,287	0	(987)	0	(987)	0	40,300	0	0	0	970	02/01/2050	1.A

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-ign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..81749N-AB-1	Sequoia Mortgage Trust 2-SEMT 2024-B A2	.....	09/01/2024	PAYDOWN	.....	405,889	405,889	402,338	0	0	3,552	0	3,552	0	405,889	0	0	0	1,860	09/01/2054	1.A FE
..81749N-AV-7	Sequoia Mortgage Trust 2-SEMT 2024-B A20	.....	09/01/2024	PAYDOWN	.....	371,087	371,087	365,521	0	0	5,566	0	5,566	0	371,087	0	0	0	1,701	09/01/2054	1.A FE
..817743-AA-5	SERVPRO Master Issuer LL-SPRO 2019-1A A2	.....	07/25/2024	PAYDOWN	.....	45,625	45,625	45,908	45,744	0	(119)	0	(119)	0	45,625	0	0	0	1,328	10/25/2049	2.C FE
..824348-AX-4	SHERWIN-WILLIAMS CO-SENIOR UNSECURED	.....	07/30/2024	MRB0010	.....	7,674,841	7,409,000	7,691,057	7,679,105	0	(4,264)	0	(4,264)	0	7,674,841	0	0	0	221,344	06/01/2047	2.B FE
..826525-AB-3	Sierra Timeshare 2020-2 -SPFC 2020-2A B	.....	09/20/2024	PAYDOWN	.....	516,083	516,083	487,859	494,162	0	21,920	0	21,920	0	516,083	0	0	0	7,949	07/20/2037	1.F FE
..82652R-AB-5	Sierra Timeshare 2021-2 -SPFC 2021-2A B	.....	09/20/2024	PAYDOWN	.....	40,678	40,678	37,475	37,932	0	2,746	0	2,746	0	40,678	0	0	0	548	09/20/2038	1.F FE
..82667C-AC-9	Signal Rail I LLC-SRL 2024-1A A	.....	09/17/2024	PAYDOWN	.....	13,749	13,749	13,741	0	0	7	0	7	0	13,749	0	0	0	183	05/17/2054	1.C FE
..826934-AC-5	Sierra Timeshare 2022-3 -SPFC 2022-3A C	.....	09/20/2024	PAYDOWN	.....	191,199	191,199	191,155	191,149	0	50	0	50	0	191,199	0	0	0	9,671	07/20/2039	2.B FE
..82817*-AA-9	Silver Spring Metro Cent Senior Note Tra	.....	09/05/2024	SINKING PAYMENT	.....	127,574	127,574	127,574	127,574	0	0	0	0	0	127,574	0	0	0	3,515	01/05/2029	1.A
..828178-AA-7	Silver Spring Metro Cent Senior Note Tra	.....	09/05/2024	SINKING PAYMENT	.....	64,604	64,604	64,604	64,604	0	0	0	0	0	64,604	0	0	0	1,617	01/07/2029	1.A
..83206E-AA-5	SMB Private Education Lo-SMB 2024-C A1A	.....	09/15/2024	PAYDOWN	.....	244,636	244,636	244,592	0	0	44	0	44	0	244,636	0	0	0	3,433	06/17/2052	1.A FE
..83206N-AC-1	SMB Private Education Lo-SMB 2022-B B	.....	09/15/2024	PAYDOWN	.....	60,431	60,431	57,149	0	0	3,281	0	3,281	0	60,431	0	0	0	919	02/16/2055	1.D FE
..83207D-AA-6	SMB Private Education Lo-SMB 2023-C A1A	.....	09/15/2024	PAYDOWN	.....	371,477	371,477	368,154	368,307	0	3,170	0	3,170	0	371,477	0	0	0	14,209	11/15/2052	1.A FE
..83404K-AD-5	SoFi Professional Loan P-SOFI 2017-E B	.....	09/25/2024	PAYDOWN	.....	420,441	420,441	403,360	403,467	0	16,973	0	16,973	0	420,441	0	0	0	9,790	11/26/2040	1.A FE
..83416W-AB-9	SOLAR STAR FUNDING LLC-SECURED	.....	09/30/2024	SINKING PAYMENT	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	1,885	06/30/2035	2.B FE
..83546D-AL-2	Sonic Capital LLC-SONIC 2020-1AW A21W	.....	08/20/2024	PAYDOWN	.....	17,500	17,500	17,806	17,775	0	(275)	0	(275)	0	17,500	0	0	0	347	01/20/2050	1.C FE
..83546D-AM-0	Sonic Capital LLC-SONIC 2020-1AW A21W	.....	08/20/2024	PAYDOWN	.....	43,750	43,750	46,495	45,388	0	(1,638)	0	(1,638)	0	43,750	0	0	0	701	01/20/2050	1.C FE
..83611M-MM-3	Soundview Home Loan Trus-SVHE 2005-B M2	.....	09/01/2024	PAYDOWN	.....	18,819	18,579	10,149	16,284	0	2,448	0	2,448	0	18,819	0	0	0	295	05/01/2035	1.A FM
..83611M-UX-7	Soundview Home Loan Trus-SVHE 2005-OPT4	.....	09/25/2024	PAYDOWN	.....	133,947	133,947	102,470	133,947	0	6,335	0	6,335	0	133,947	0	0	0	2,901	12/25/2035	1.A FM
..83612T-AR-3	Soundview Home Loan Trus-SVHE 2007-OPT1	.....	09/25/2024	PAYDOWN	.....	0	0	10,046	1,125	0	(35)	0	(35)	0	0	0	0	0	208	06/25/2037	6. FE
..841215-AA-4	Southaven Combined Cycle-SECURED	.....	08/15/2024	SINKING PAYMENT	.....	132,659	132,659	132,659	132,662	0	(3)	0	(3)	0	132,659	0	0	0	5,102	08/15/2033	1.D FE
..844741-BF-4	Southwest Airlines Co-SENIOR UNSECURED	.....	08/08/2024	VARIOUS	.....	14,166,619	15,000,000	14,920,200	14,948,838	0	4,753	0	4,753	0	14,953,591	0	(786,972)	(786,972)	386,896	02/10/2030	2.A FE
..85208N-AD-2	Sprint Spectrum Co LLC -FIRST LIEN	.....	09/20/2024	SINKING PAYMENT	.....	1,437,500	1,437,500	1,437,500	1,437,500	0	0	0	0	0	1,437,500	0	0	0	51,082	03/20/2025	1.F FE
..85235*-AA-6	St Louis County Control Trust Certificat	.....	09/15/2024	SINKING PAYMENT	.....	311,903	311,903	311,903	311,903	0	0	0	0	0	311,903	0	0	0	12,820	12/15/2036	1.F
..855541-AC-2	SUNTRUST ADJUSTABLE RATE-SERIES 2007-S1	.....	09/01/2024	PAYDOWN	.....	50,326	50,326	40,988	43,237	0	9,028	0	9,028	0	50,326	0	0	0	2,298	01/01/2037	1.A FM
..85571R-AA-8	Starwood Mortgage Reside-STAR 2022-3 A1	.....	09/01/2024	PAYDOWN	.....	98,422	98,422	97,763	98,412	0	10	0	10	0	98,422	0	0	0	2,872	03/01/2067	1.A FE
..85571R-AB-6	Starwood Mortgage Reside-STAR 2022-3 A2	.....	09/01/2024	PAYDOWN	.....	256,981	256,981	251,110	252,263	0	4,719	0	4,719	0	256,981	0	0	0	7,429	03/01/2067	1.C FE
..85571R-AC-4	Starwood Mortgage Reside-STAR 2022-3 A3	.....	09/01/2024	PAYDOWN	.....	239,993	239,993	233,837	235,044	0	4,949	0	4,949	0	239,993	0	0	0	6,938	03/01/2067	1.F FE
..85573J-AA-4	Starwood Mortgage Reside-STAR 2021-3 A1	.....	09/01/2024	PAYDOWN	.....	98,817	98,817	91,529	92,489	0	6,328	0	6,328	0	98,817	0	0	0	778	06/01/2056	1.A
..85573T-AA-2	Starwood Mortgage Reside-STARWOOD MORTGA	.....	09/01/2024	PAYDOWN	.....	1,393,789	1,393,789	1,393,766	1,393,779	0	0	0	0	0	1,393,789	0	0	0	22,696	12/01/2066	1.A FE
..86212V-AA-2	Store Master Funding I-V-STR 2016-1A A1	.....	09/20/2024	PAYDOWN	.....	61,849	61,849	61,816	61,836	0	13	0	13	0	61,849	0	0	0	1,634	10/20/2046	1.C FE
..86212V-AE-4	Store Master Funding I-V-SERIES 18-1A CL	.....	09/20/2024	PAYDOWN	.....	33,125	33,125	33,113	33,119	0	6	0	6	0	33,125	0	0	0	947	10/20/2048	1.A FE
..86212X-AM-2	Store Master Funding I-V-STR 2024-1A A2	.....	09/20/2024	PAYDOWN	.....	12,500	12,500	12,499	0	0	1	0	1	0	12,500	0	0	0	241	05/20/2054	1.A FE
..86213C-AB-1	STORE MASTER FUNDING LLC-SERIES 2015-1A	.....	09/20/2024	PAYDOWN	.....	26,875	26,875	26,739	26,835	0	40	0	40	0	26,875	0	0	0	747	04/20/2045	1.C FE
..863572-LV-3	Structured Asset Securit-SASC 1996-4 A	.....	09/01/2024	PAYDOWN	.....	1,048	1,048	983	1,022	0	26	0	26	0	1,048	0	0	0	49	09/01/2031	1.A FM
..863579-C3-0	Structured Adjustable Ra-SARM 2005-21 6A	.....	09/01/2024	PAYDOWN	.....	76,899	76,902	67,514	69,879	0	7,025	0	7,025	0	76,899	0	0	0	2,162	11/01/2035	1.A FM
..863579-U9-0	Structured Adjustable Ra-SARM 2005-22 1A	.....	09/01/2024	PAYDOWN	.....	17,541	17,541	11,902	17,527	0	6,096	0	6,096	0	17,541	0	0	0	133	12/01/2035	1.A FM
..863579-PP-5	Structured Adjustable Ra-SARM 2005-11 1A	.....	09/01/2024	PAYDOWN	.....	7,084	6,982	5,680	6,104	0	1,385	0	1,385	0	7,084	0	0	0	373	05/01/2035	1.A FM
..863579-SU-3	Structured Adjustable Ra-SARM 2005-12 3A	.....	08/01/2024	PAYDOWN	.....	21,021	21,021	16,145	17,997	0	3,024	0	3,024	0	21,021	0	0	0	803	06/01/2035	4.C FM
..863579-UL-0	Structured Adjustable Ra-SARM 2005-15 1A	.....	09/01/2024	PAYDOWN	.....	1,123	1,123	686	1,123	0	456	0	456	0	1,123	0	0	0	37	07/01/2035	1.A FM
..863579-UU-0	Structured Adjustable Ra-SARM 2005-15 4A	.....	09/01/2024	PAYDOWN	.....	24,694	18,713	16,359	15,690	0	6,752	0	6,752	0	24,694	0	0	0	1,018	07/01/2035	1.A FM
..863579-VH-8	Structured Adjustable Ra-SARM 2005-17 1A	.....	09/01/2024	PAYDOWN	.....	32,334	32,334	30,950	32,295	0	39	0	39	0	32,334	0	0	0	1,199	08/01/2035	1.A FM
..863579-VII-5	Structured Adjustable Ra-SARM 2005-17 5A	.....	09/25/2024	PAYDOWN	.....	14,060	14,237	9,949	7,597	0	6,584	0	6,584	0	14,060	0	0	0	471	08/25/2035	1.A FM
..863579-XC-7	Structured Adjustable Ra-SARM 2005 - 18	.....	09/01/2024	PAYDOWN	.....	53,070	45,913	30,655	30,485	0	18,774	0	18,774	0	53,070	0	0	0	1,416	09/01/2035	1.A FM
..863579-XR-4	Structured Adjustable Ra-SARM 2005-18 8A	.....	09/01/2024	PAYDOWN	.....	408,076	425,438	365,545	379,149	0	66,165	0	66,165	0	408,076	0	0	0	13,828	09/01/2035	1.A FM
..863579-ZL-5	Structured Adjustable Ra-SARM 2005-20 3A	.....	09/01/2024	PAYDOWN	.....	11,248	11,254	9,561	9,559	0	1,693	0	1,693	0	11,248	0	0	0	(233)	10/01/2035	1.A FM

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..86358R-DX-2	Structured Asset Securit-SASC 2001-SB1 A		09/01/2024	PAYDOWN		90,302	90,302	78,351	79,608	0	10,693	0	10,693	0	90,302	0	0	0	2,029	08/01/2031	1.A FM
..86358R-XY-8	Structured Asset Securit-SASC 2002-AL1 A		09/01/2024	PAYDOWN		22,571	22,868	14,685	20,523	0	2,481	306	2,175	0	22,571	0	0	0	510	02/01/2032	6.*
..86358R-XZ-5	Structured Asset Securit-SASC 2002-AL1 A		09/01/2024	PAYDOWN		22,586	20,203	6,475	8,886	125	18,390	8,411	10,104	0	22,586	0	0	0	300	02/01/2032	6.*
..86358R-YB-7	Structured Asset Securit-SASC 2002-AL1 A		07/01/2024	PAYDOWN		468	499	352	340	97	49	0	146	0	468	0	0	0	0	02/01/2032	6.*
..86359A-ME-0	Structured Asset Securit-SASC 2003-AL1 A		09/01/2024	PAYDOWN		24,772	24,772	21,602	23,678	0	1,095	0	1,095	0	24,772	0	0	0	592	04/01/2031	6.*
..86359A-MG-5	Structured Asset Securit-SASC 2003-AL1 A		09/01/2024	PAYDOWN		7,918	7,918	5,577	7,472	43	403	0	446	0	7,918	0	0	0	0	04/01/2031	6.*
..86359A-WR-0	Structured Asset Securit-SASC 2003-AL2 A		09/01/2024	PAYDOWN		84,843	84,843	73,630	75,581	0	9,262	0	9,262	0	84,843	0	0	0	1,881	01/01/2031	6.*
..86359A-WT-6	Structured Asset Securit-SASC 2003-AL2 A		09/25/2024	PAYDOWN		18,882	18,882	14,680	16,000	0	2,882	0	2,882	0	18,882	0	0	0	0	01/25/2031	6.*
..86359B-4U-2	Structured Asset Securit-SASC 2005-4XS 1		09/01/2024	PAYDOWN		85,192	85,192	79,654	85,192	0	0	0	0	0	85,192	0	0	0	3,466	03/01/2035	1.A FM
..86359B-LE-9	Structured Adjustable Ra-SARM 2004-2 4A1		09/01/2024	PAYDOWN		13,539	13,539	13,048	13,289	0	250	0	250	0	13,539	0	0	0	559	03/01/2034	1.A FM
..86359D-EY-9	STRUCTURED ASSET SECURIT-SASC 2005-RF2 A		09/25/2024	PAYDOWN		0	0	29,071	5,845	0	(587)	0	(587)	0	0	0	0	0	4	04/25/2035	5.A FE
..86359F-AB-8	Structured Asset Securit-SASC 2006-S2 A2		09/25/2024	PAYDOWN		1,035	1,035	804	425	0	610	0	610	0	1,035	0	0	0	24	06/25/2036	1.A FM
..86359L-NA-3	Structured Asset Mortgage-SAMI 2005-AR6 2		09/25/2024	PAYDOWN		72,517	72,517	51,038	76,066	0	(3,550)	0	(3,550)	0	72,517	0	0	0	2,757	09/25/2045	1.A FM
..86360B-AG-3	Structured Adjustable Ra-SARM 2006-4 4A1		09/01/2024	PAYDOWN		380,483	380,737	279,920	287,443	0	105,281	12,092	93,189	0	380,483	0	0	0	15,283	05/01/2036	1.A FM
..86360B-AJ-7	Structured Adjustable Ra-SARM 2006-4 5A1		09/01/2024	PAYDOWN		35,220	33,561	24,513	24,784	0	14,509	5,009	9,500	0	35,220	0	0	0	1,765	05/01/2036	1.A FM
..86363G-AF-1	Structured Adjustable Ra-SARM 2007-3 3A1		09/01/2024	PAYDOWN		203	71	32	32	0	110	0	110	0	203	0	0	0	2	04/01/2047	1.A FM
..863931-AA-9	Structured Carbon Level -SCLM3 2023-1 A		08/20/2024	PAYDOWN		4,738,570	4,738,570	4,643,040	4,645,213	0	93,357	0	93,357	0	4,738,570	0	0	0	231,497	09/20/2050	1.C PL
..86669P-AA-3	Sun Country Pass Through Series 2022-1A		09/15/2024	SINKING PAYMENT		1,286,188	1,286,188	1,286,188	1,286,188	0	0	0	0	0	1,286,188	0	0	0	62,252	03/15/2031	1.G PL
..86669Q-AA-1	Sun Country Pass Through Series 2022-1B		09/15/2024	SINKING PAYMENT		427,198	427,198	427,198	427,198	0	0	0	0	0	427,198	0	0	0	24,564	03/15/2029	2.B PL
..86744V-AA-9	Helios Issuer LLC-SNVA 2022-B A		09/20/2024	PAYDOWN		85,524	85,524	84,931	85,044	0	480	0	480	0	85,524	0	0	0	2,876	08/20/2049	1.G FE
..86744V-AB-7	Helios Issuer LLC-SNVA 2022-B B		09/20/2024	PAYDOWN		104,297	104,297	98,974	99,947	0	4,350	0	4,350	0	104,297	0	0	0	4,209	08/20/2049	2.C FE
..86744W-AA-7	Sunnova Helios X Issuer -SNVA 2022-C A		09/20/2024	PAYDOWN		178,406	178,406	168,803	170,831	0	7,576	0	7,576	0	178,406	0	0	0	5,803	11/22/2049	1.D FE
..86744Y-AA-3	Sunnova SOL VI Issuer LL-SNVA 2024-1A A		07/30/2024	PAYDOWN		35,304	35,304	34,028	0	0	1,276	0	1,276	0	35,304	0	0	0	427	01/30/2059	1.G FE
..86745C-AA-0	Sunnova Helios XIII Issu-SNVA 2024-A A		09/20/2024	PAYDOWN		148,070	148,070	144,993	0	0	3,077	0	3,077	0	148,070	0	0	0	3,271	02/20/2051	1.D FE
..86745Q-AA-9	Sunnova Sol III Issuer L-SNVA 2021-1 A		07/30/2024	PAYDOWN		195,145	195,145	164,211	0	0	30,933	0	30,933	0	195,145	0	0	0	3,801	04/28/2056	1.D FE
..86745X-AA-4	Sunnova Sol V Issuer LLC-SNVA 2023-1A A		07/30/2024	PAYDOWN		89,577	89,577	84,879	85,323	0	4,254	0	4,254	0	89,577	0	0	0	3,628	04/30/2058	1.G FE
..86745Y-AA-2	Sunnova Helios XII Issue-SNVA 2023-B A		09/20/2024	PAYDOWN		237,039	237,039	227,010	227,679	0	9,360	0	9,360	0	237,039	0	0	0	8,596	08/22/2050	1.D FE
..86746B-AA-1	Helios Issuer LLC-SNVA 2023-GRID1 1A		09/20/2024	PAYDOWN		316,343	316,343	311,793	241,291	0	4,468	0	4,468	0	316,343	0	0	0	12,164	12/20/2050	1.B FE
..86746F-AA-2	Sunnova Hestia II Issuer-SNVA 2024-GRID1		09/20/2024	PAYDOWN		263,991	263,991	263,981	0	0	9	0	9	0	263,991	0	0	0	2,395	07/20/2051	1.B FE
..86772R-AA-3	Sunrun Jupiter Issuer 20-SUNRN 2022-1A A		07/30/2024	PAYDOWN		67,579	67,579	67,029	67,112	0	467	0	467	0	67,579	0	0	0	2,412	07/30/2057	1.G FE
..86909#-AA-5	Susquehanna (18 Propert Trust Certifica		09/23/2024	SINKING PAYMENT		55,419	55,419	55,419	55,419	0	0	0	0	0	55,419	0	0	0	2,289	12/23/2036	1.G
..869507-AA-1	SUTTONPARK STRUCTURED SE-SERIES 17-1A QL		09/15/2024	PAYDOWN		130,799	130,799	122,755	52,555	0	8,038	0	8,038	0	130,799	0	0	0	3,195	01/15/2071	1.A FE
..872225-AD-9	TBW Mortgage-Backed Trus-TBW 2006-5 A3		09/01/2024	PAYDOWN		221,321	221,321	200,980	209,670	0	11,651	0	11,651	0	221,321	0	0	0	4,391	11/01/2036	1.A FM
..87222E-AB-4	TBW Mortgage-Backed Trus-TBW 2007-1 A2		09/25/2024	PAYDOWN		21,985	21,985	5,132	5,877	0	16,416	308	16,108	0	21,985	0	0	0	154	03/25/2037	1.A FM
..87222E-AC-2	TBW Mortgage-Backed Trus-TBW 2007-1 A3		09/01/2024	PAYDOWN		23,546	23,546	6,726	7,033	0	17,018	505	16,513	0	23,546	0	0	0	176	03/01/2037	1.A FM
..872480-AA-6	Tif Funding II LLC-SERIES 20-1A CLASS A		09/20/2024	PAYDOWN		26,667	26,667	24,323	0	0	2,344	0	2,344	0	26,667	0	0	0	70	08/20/2045	1.F FE
..872480-AE-8	TIF Funding II LLC-TIF 2021-1A A		09/20/2024	PAYDOWN		96,250	96,250	84,115	0	0	12,135	0	12,135	0	96,250	0	0	0	199	02/20/2046	1.E FE
..87264A-BF-1	T-Mobile USA Inc-FIRST LIEN		07/30/2024	NBB0010		5,395,266	5,000,000	5,620,500	5,434,447	0	(39,181)	0	(39,181)	0	5,395,266	0	0	0	153,385	04/15/2030	2.B FE
..87267C-AA-6	TRP 2021 LLC-TRP 2021-1 A		09/17/2024	PAYDOWN		512,131	512,131	447,647	387,029	0	51,344	0	51,344	0	512,131	0	0	0	6,641	06/19/2051	1.F FE
..87407R-AA-4	TAL Advantage VII LLC-TAL 2020-1A A		09/20/2024	PAYDOWN		307,388	307,388	270,283	275,933	0	307,388	0	31,454	0	307,388	0	0	0	4,733	09/20/2045	1.F FE
..87407R-AC-0	TAL Advantage VII LLC-TAL 2020-1A B		09/20/2024	PAYDOWN		111,563	111,563	110,421	110,703	0	859	0	859	0	111,563	0	0	0	2,757	09/20/2045	2.B FE
..875484-AL-1	Tanger Properties LP-SENIOR UNSECURED		09/16/2024	FTS		4,334,400	5,000,000	4,689,300	4,744,091	0	21,038	0	21,038	0	4,765,129	0	(430,729)	(430,729)	143,611	09/01/2031	2.C FE
..87819#-AA-2	TD Bank (Miami, FL) CTL Trust Certificat		09/15/2024	SINKING PAYMENT		47,240	47,240	47,240	0	0	0	0	0	0	47,240	0	0	0	2,388	01/15/2038	1.D
..880451-AZ-2	Tennessee Gas Pipeline C-SENIOR UNSECURE		09/16/2024	CITADELEQ		12,861,380	14,000,000	13,972,140	13,981,993	0	2,090	0	2,090	0	13,984,082	0	(1,122,702)	(1,122,702)	424,044	03/01/2030	2.B FE
..881561-LE-2	Terwin Mortgage Trust Se-TMTS 2004-1HE		09/25/2024	PAYDOWN		5,578	5,578	4,469	6,126	0	(548)	0	(548)	0	5,578	0	0	0	236	10/25/2035	1.A FM
..881561-LR-3	Terwin Mortgage Trust 20-TMTS 2004-19HE		09/25/2024	PAYDOWN		20,204	20,204	14,875	23,128	0	(2,923)	0	(2,923)	0	20,204	0	0	0	879	10/25/2034	1.A FM

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..881561-LS-1	Terwin Mortgage Trust 20-TMTS 2004-19HE .....	.....	09/30/2024	PAYDOWN	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	59	10/25/2034	1.A FM
..881561-VY-7	Terwin Mortgage Trust Se-TMTS 2005-12AL .....	.....	09/01/2024	PAYDOWN	.....	.....53,079	53,079	51,250	52,179	0	901	0	901	0	53,079	0	0	0	1,475	07/01/2036	1.A FM
..88156E-AB-2	Terwin Mortgage Trust 20-TMTS 2006-17HE .....	.....	09/25/2024	PAYDOWN	.....	.....214,195	214,195	184,819	246,634	0	(32,439)	0	(32,439)	0	214,195	0	0	0	7,639	01/25/2038	1.A FM
..88157V-AB-3	Terwin Mortgage Trust 20-TMTS 2007-6ALT .....	.....	09/25/2024	PAYDOWN	.....	.....15,405	15,405	8,011	13,469	0	1,936	0	1,936	0	15,405	0	0	0	157	08/25/2038	1.A FM
..88338Q-AA-8	Theorem Funding Trust 20-THRM 2023-1A A .....	.....	09/15/2024	PAYDOWN	.....	.....2,675,199	2,675,199	2,675,175	2,675,158	0	41	0	41	0	2,675,199	0	0	0	134,921	04/15/2029	1.G FE
..885220-DX-8	Thornburg Mortgage Secur-TMST 2003-4 M1 .....	.....	09/25/2024	PAYDOWN	.....	.....22,045	22,045	18,628	22,880	0	(835)	0	(835)	0	22,045	0	0	0	842	09/25/2043	1.A FM
..885220-GB-3	Thornburg Mortgage Secur-TMST 2004-4 1A .....	.....	09/25/2024	PAYDOWN	.....	.....3,031	3,031	2,891	2,960	0	72	0	72	0	3,031	0	0	0	116	12/25/2044	1.A FM
..885220-GK-3	Thornburg Mortgage Secur-TMST 2004-4 5A .....	.....	09/01/2024	PAYDOWN	.....	.....9,158	9,158	8,712	8,790	0	368	0	368	0	9,158	0	0	0	216	12/01/2044	1.A FM
..885220-HM-8	Thornburg Mortgage Secur-TMST 2005-2 A1 .....	.....	09/25/2024	PAYDOWN	.....	.....14,730	14,730	14,739	14,721	0	9	0	9	0	14,730	0	0	0	698	07/25/2045	1.A FM
..885220-KW-2	Thornburg Mortgage Secur-TMST 2006-2 A2B .....	.....	09/25/2024	PAYDOWN	.....	.....19,891	19,891	17,423	18,128	0	1,971	215	1,756	0	19,891	0	0	0	547	04/25/2036	1.A FM
..89171U-AG-4	Towd Point Mortgage Trus-TPMT 2015-4 M2 .....	.....	09/01/2024	PAYDOWN	.....	.....1,055,054	1,055,054	1,043,120	1,053,313	0	1,741	0	1,741	0	1,055,054	0	0	0	26,073	04/01/2055	1.A
..89441#-AA-4	Traverse City Control Tr Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT	.....	.....99,898	99,898	100,897	101,450	0	(1,552)	0	(1,552)	0	99,898	0	0	0	5,737	11/15/2039	1.A
..89609M-AA-7	Tribute Rail LLC-TRP 2022-1 A .....	.....	09/17/2024	PAYDOWN	.....	.....259,819	259,819	255,432	256,232	0	3,587	0	3,587	0	259,819	0	0	0	8,411	05/17/2052	1.F FE
..89655Y-AA-4	TRINITY RAIL LEASING L.P-SERIES 2009-1A .....	.....	09/30/2024	PAYDOWN	.....	......0	0	0	0	0	0	0	0	0	0	0	0	0	(9,343)	11/16/2039	2.C FE
..89656C-AA-1	Trinity Rail Leasing 201-TRL 2010-1A A .....	.....	09/16/2024	PAYDOWN	.....	.....581,838	581,838	609,647	596,346	0	(14,508)	0	(14,508)	0	581,838	0	0	0	20,422	10/16/2040	1.F FE
..89656R-AA-8	Trinity Rail Leasing 202-TRL 2022-1 A .....	.....	09/21/2024	PAYDOWN	.....	.....105,122	105,122	102,981	103,085	0	2,037	0	2,037	0	105,122	0	0	0	3,184	05/20/2052	1.F FE
..89657A-AC-0	Trinity Rail Leasing 201-TRL 2020-1A A .....	.....	09/17/2024	PAYDOWN	.....	.....140,331	140,331	140,297	140,309	0	22	0	22	0	140,331	0	0	0	1,839	10/17/2050	1.F FE
..89657B-AA-2	Trinity Rail Leasing 201-TRL 2019-1A A .....	.....	09/17/2024	PAYDOWN	.....	.....474,689	474,689	448,548	460,770	0	13,808	0	13,808	0	474,689	0	0	0	11,984	04/17/2049	1.F FE
..89657B-AB-0	Trinity Rail Leasing 201-TRL 2019-2A A1 .....	.....	09/17/2024	PAYDOWN	.....	.....506,174	506,174	506,054	506,119	0	55	0	55	0	8,096	0	0	0	8,096	10/18/2049	1.F FE
..89680H-AA-0	Triton Container Finance-TCF 2020-1A A .....	.....	09/20/2024	PAYDOWN	.....	.....777,963	777,963	670,347	659,301	0	99,544	0	99,544	0	777,963	0	0	0	12,954	09/20/2045	1.F FE
..89680H-AB-8	Triton Container Finance-TCF 2020-1A B .....	.....	09/20/2024	PAYDOWN	.....	.....68,000	68,000	62,560	63,455	0	4,545	0	4,545	0	68,000	0	0	0	2,113	09/20/2045	2.B FE
..89680H-AE-2	Triton Container Finance-TCF 2021-1A A .....	.....	09/20/2024	PAYDOWN	.....	.....481,780	481,780	419,839	80,816	0	61,833	0	61,833	0	481,780	0	0	0	3,717	03/20/2046	1.F FE
..89683L-AA-8	TRP - TRIP Rail Master F-TRP 2021-2 A .....	.....	09/17/2024	PAYDOWN	.....	.....498,101	498,101	438,082	341,703	0	52,889	0	52,889	0	498,101	0	0	0	6,095	06/19/2051	1.F FE
..90253#-AA-1	UA (Portland OR) CTL Pas Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT	.....	.....258,081	258,081	260,631	259,256	0	(1,175)	0	(1,175)	0	258,081	0	0	0	9,789	02/15/2032	3.B
..90272*-AA-0	UHC (Senior Note) CTL Pa Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT	.....	.....62,939	62,939	62,939	62,939	0	12	0	12	0	62,939	0	0	0	2,021	05/15/2033	1.F
..90319#-AA-1	UOA Fayetteville (Univer Senior Secured .....	.....	09/15/2024	SINKING PAYMENT	.....	.....116,178	116,178	117,340	117,113	0	(935)	0	(935)	0	116,178	0	0	0	3,137	03/15/2041	1.C
..90352W-AD-6	ITE Rail Fund Levered LP-SERIES 21-1A CL .....	.....	08/28/2024	PAYDOWN	.....	.....183,947	183,947	178,919	179,274	0	4,673	0	4,673	0	183,947	0	0	0	2,415	02/28/2051	1.F FE
..90378#-AA-1	U.S. Department of Agric Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT	.....	.....46,784	46,784	46,784	46,784	0	0	0	0	0	46,784	0	0	0	966	04/15/2038	1.B
..90783X-AA-9	Union Pacific Railroad C-FIRST LIEN .....	.....	07/02/2024	SINKING PAYMENT	.....	.....14,060	14,060	14,060	14,067	0	(7)	0	(7)	0	14,060	0	0	0	1,557	01/02/2031	1.C FE
..909319-AA-3	UNITED AIR 2013-1 A PTT-FIRST LIEN .....	.....	08/15/2024	SINKING PAYMENT	.....	.....174,521	174,521	174,521	174,543	0	(22)	0	(22)	0	174,521	0	0	0	7,504	08/15/2025	2.B FE
..90932Q-AA-4	UNITED AIR 2014-2 A PASS THRU TR-1ST LIE .....	.....	09/03/2024	SINKING PAYMENT	.....	.....108,247	108,247	108,247	108,272	0	(25)	0	(25)	0	108,247	0	0	0	4,059	09/03/2026	1.F FE
..91841#-AA-8	Virginia (Lafayette, IN) Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT	.....	.....78,222	78,222	78,222	78,222	0	0	0	0	0	78,222	0	0	0	2,028	08/15/2036	1.A
..91845#-AA-2	VZ (Senior Note) CTL Pas Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT	.....	.....107,740	107,740	107,740	107,743	0	(2)	0	(2)	0	107,740	0	0	0	2,740	05/15/2035	2.A
..91854*-AA-4	VZ (Irving TX)(Senior No Trust Certifica .....	.....	09/15/2024	SINKING PAYMENT	.....	.....98,102	98,102	98,102	98,102	0	0	0	0	0	98,102	0	0	0	2,078	08/15/2036	2.A
..91855*-AA-3	VA (Ponce, PR) CTL Trust Certificate .....	.....	09/15/2024	SINKING PAYMENT	.....	.....57,336	57,336	57,336	57,336	0	0	0	0	0	57,336	0	0	0	1,664	08/15/2042	1.A
..92121K-AA-4	Vantage Data Centers Iss-VDC 2019-1A A2 .....	.....	09/30/2024	PAYDOWN	.....	......0	0	0	0	0	0	0	0	0	0	0	0	0	3,385	07/15/2044	1.G FE
..92257B-AA-0	Velocity Commercial Capi-VCC 2022-3 A .....	.....	09/01/2024	PAYDOWN	.....	.....179,906	179,906	179,558	179,619	0	287	0	287	0	179,906	0	0	0	6,352	06/01/2052	1.A FE
..92257B-AE-2	Velocity Commercial Capi-VCC 2022-3 M4 .....	.....	09/01/2024	PAYDOWN	.....	.....559,272	559,272	511,073	523,476	0	35,796	0	35,796	0	559,272	0	0	0	29,103	06/01/2052	3.B FE
..92257C-AA-8	Velocity Commercial Capi-VCC 2019-1 A .....	.....	09/01/2024	PAYDOWN	.....	.....128,976	128,976	128,947	128,981	0	(4)	0	(4)	0	128,976	0	0	0	3,391	03/01/2049	1.A FE
..92257P-AA-9	Velocity Commercial Capi-VCC 2022-5 A .....	.....	09/01/2024	PAYDOWN	.....	.....228,865	228,865	230,402	230,386	0	(1,522)	0	(1,522)	0	228,865	0	0	0	10,446	10/01/2052	1.A FE
..92257P-AC-5	Velocity Commercial Capi-VCC 2022-5 M3 .....	.....	09/01/2024	PAYDOWN	.....	.....1,412,213	1,412,213	1,388,288	1,394,932	0	17,281	0	17,281	0	1,412,213	0	0	0	87,999	10/01/2052	2.B FE
..92257P-BA-8	Velocity Commercial Capi-VCC 2022-5 M2 .....	.....	09/01/2024	PAYDOWN	.....	.....131,055	131,055	128,338	129,051	0	2,004	0	2,004	0	131,055	0	0	0	7,372	10/01/2052	1.G FE
..92258X-AA-1	Velocity Commercial Capi-VCC 2022-1 A .....	.....	09/01/2024	PAYDOWN	.....	.....44,040	44,040	43,738	43,811	0	229	0	229	0	44,040	0	0	0	936	02/01/2052	1.A FE
..92258X-AB-9	Velocity Commercial Capi-VCC 2022-1 M1 .....	.....	09/01/2024	PAYDOWN	.....	.....372,816	372,816	369,670	370,356	0	2,461	0	2,461	0	372,816	0	0	0	9,104	02/01/2052	1.D FE
..92259K-AD-2	Velocity Commercial Capi-VCC 2022-4 M1 .....	.....	09/01/2024	PAYDOWN	.....	.....163,379	163,379	163,378	163,379	0	0	0	0	0	163,379	0	0	0	7,542	08/01/2052	1.D FE
..92259K-AG-5	Velocity Commercial Capi-VCC 2022-4 M2 .....	.....	09/01/2024	PAYDOWN	.....	.....30,373	30,373	30,368	30,369	0	3	0	3	0	30,373	0	0	0	1,588	08/01/2052	1.G FE

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/(Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..92259U-AA-6	Velocity Commercial Capi-VCC 2022-2 A .....	.....	09/01/2024	PAYDOWN	.....	42,796	42,796	42,788	42,790	0	6	0	6	0	42,796	0	0	0	1,295	04/01/2052	1.A FE
..92259U-AB-4	Velocity Commercial Capi-VCC 2022-2 M1 .....	.....	09/01/2024	PAYDOWN	.....	58,455	58,455	58,442	58,445	0	10	0	10	0	58,455	0	0	0	2,374	04/01/2052	1.D FE
..92259U-AC-2	Velocity Commercial Capi-VCC 2022-2 M2 .....	.....	09/01/2024	PAYDOWN	.....	52,386	52,386	52,383	52,384	0	2	0	2	0	52,386	0	0	0	2,216	04/01/2052	1.G FE
..92259U-AE-8	Velocity Commercial Capi-VCC 2022-2 M4 .....	.....	08/01/2024	PAYDOWN	.....	180,884	180,884	169,677	172,693	0	8,191	0	8,191	0	180,884	0	0	0	7,899	04/01/2052	3.A FE
..92259U-AF-5	Velocity Commercial Capi-VCC 2022-2 M5 .....	.....	08/01/2024	PAYDOWN	.....	86,411	86,411	77,192	79,607	0	6,804	0	6,804	0	86,411	0	0	0	3,763	04/01/2052	4.A FE
..92259V-AA-4	Velocity Commercial Capi-VCC 2023-1 A .....	.....	09/01/2024	PAYDOWN	.....	223,096	223,096	223,044	223,047	0	48	0	48	0	223,096	0	0	0	9,750	01/01/2053	1.A FE
..92259W-AA-2	Velocity Commercial Capi-VCC 2024-4 A .....	.....	09/01/2024	PAYDOWN	.....	51,452	51,452	51,450	0	0	2	0	2	0	51,452	0	0	0	258	08/01/2054	1.A FE
..92537M-AA-8	Verus Securitization Tru-VERUS 2019-INV3 .....	.....	09/01/2024	PAYDOWN	.....	722,915	722,915	714,782	722,350	0	565	0	565	0	722,915	0	0	0	18,080	11/01/2059	1.A FE
..92538K-AB-9	Verus Securitization Tru-VERUS 2021-5 A2 .....	.....	09/01/2024	PAYDOWN	.....	153,808	153,808	128,910	130,945	0	22,863	0	22,863	0	153,808	0	0	0	1,283	09/01/2066	1.B FE
..92538N-AC-1	Verus Securitization Tru-VERUS 2022-4 A3 .....	.....	09/01/2024	PAYDOWN	.....	13,866	13,866	13,550	0	0	316	0	316	0	13,866	0	0	0	55	04/01/2067	1.F FE
..92538Q-AA-8	Verus Securitization Tru-VERUS 2021-7 A1 .....	.....	09/01/2024	PAYDOWN	.....	192,284	192,284	177,682	181,177	0	11,107	0	11,107	0	192,284	0	0	0	2,382	10/01/2066	1.A FE
..92539A-AA-2	Verus Securitization Tru-VERUS 2022-6 A1 .....	.....	09/01/2024	PAYDOWN	.....	144,636	144,636	143,300	143,674	0	962	0	962	0	144,636	0	0	0	4,829	06/01/2067	1.A FE
..92539A-AB-0	Verus Securitization Tru-VERUS 2022-6 A2 .....	.....	09/01/2024	PAYDOWN	.....	147,205	147,205	143,777	144,504	0	2,701	0	2,701	0	147,205	0	0	0	4,915	06/01/2067	1.B FE
..92539B-AB-8	Verus Securitization Tru-VERUS 2023-1 A2 .....	.....	09/01/2024	PAYDOWN	.....	107,941	107,941	107,939	107,941	0	0	0	0	0	107,941	0	0	0	4,880	12/01/2067	1.C FE
..92539G-AB-7	Verus Securitization Tru-VERUS 2023-3 A2 .....	.....	09/01/2024	PAYDOWN	.....	226,970	226,970	226,967	226,968	0	2	0	2	0	226,970	0	0	0	10,116	03/01/2068	1.C FE
..92539J-AA-3	Verus Securitization Tru-VERUS 2022-INV1 .....	.....	09/01/2024	PAYDOWN	.....	86,183	86,183	86,182	86,183	0	0	0	0	0	86,183	0	0	0	2,873	08/01/2067	1.A FE
..92539J-AB-1	Verus Securitization Tru-VERUS 2022-INV1 .....	.....	09/01/2024	PAYDOWN	.....	77,566	77,566	77,565	77,566	0	0	0	0	0	77,566	0	0	0	2,976	08/01/2067	1.B FE
..92539J-AC-9	Verus Securitization Tru-VERUS 2022-INV1 .....	.....	09/01/2024	PAYDOWN	.....	86,184	86,184	85,291	85,739	0	445	0	445	0	86,184	0	0	0	3,318	08/01/2067	1.F FE
..92539N-AA-4	Verus Securitization Tru-VERUS 2022-7 A1 .....	.....	09/01/2024	PAYDOWN	.....	82,953	82,953	82,953	82,953	0	0	0	0	0	82,953	0	0	0	2,865	07/01/2067	1.A FE
..92539N-AB-2	Verus Securitization Tru-VERUS 2022-7 A2 .....	.....	09/01/2024	PAYDOWN	.....	95,397	95,397	94,200	94,479	0	918	0	918	0	95,397	0	0	0	3,421	07/01/2067	1.B FE
..92539X-AB-0	Verus Securitization Tru-VERUS 2023-6 A2 .....	.....	09/01/2024	PAYDOWN	.....	223,860	223,860	223,859	223,860	0	0	0	0	0	223,860	0	0	0	10,444	09/01/2068	1.C FE
..92540N-AB-9	Verus Securitization Tru-VERUS 2024-INV2 .....	.....	09/01/2024	PAYDOWN	.....	25,717	25,717	25,717	0	0	0	0	0	0	25,717	0	0	0	119	08/01/2069	1.C FE
..92839H-AA-4	Vista Point Securitizati-VSTA 2024-CES1 .....	.....	09/01/2024	PAYDOWN	.....	463,986	463,986	463,981	0	0	5	0	5	0	463,986	0	0	0	7,861	05/01/2054	1.A FE
..929227-4T-0	WalMu Mortgage Pass-Throu-WAMU 2003-SA 24 .....	.....	09/01/2024	PAYDOWN	.....	57,802	57,802	58,037	57,877	0	(75)	0	(75)	0	57,802	0	0	0	1,882	06/01/2033	1.A FM
..929227-R5-7	WalMu Mortgage Pass-Throu-WAMU 2003-AR5 A .....	.....	09/01/2024	PAYDOWN	.....	261,738	261,738	213,971	238,050	0	23,688	0	23,688	0	261,738	0	0	0	11,872	06/01/2033	1.A FM
..92922F-3N-6	WalMu Mortgage Pass-Throu-WAMU 2005-AR12 .....	.....	09/01/2024	PAYDOWN	.....	23,983	23,983	22,820	23,474	0	508	0	508	0	23,983	0	0	0	974	10/01/2035	1.A FM
..92922F-3Q-9	WalMu Mortgage Pass-Throu-WAMU 2005-AR12 .....	.....	09/01/2024	PAYDOWN	.....	1,236	1,236	1,203	1,236	0	0	0	0	0	1,236	0	0	0	41	09/01/2035	1.A FM
..92922F-7C-6	WalMu Mortgage Pass-Throu-WAMU 2005-AR16 .....	.....	09/01/2024	PAYDOWN	.....	104,770	104,770	67,143	67,810	0	22,252	0	22,252	0	104,770	0	0	0	2,774	12/01/2035	1.A FM
..92922F-8T-8	WalMu Mortgage Pass-Throu-WAMU 2005-AR18 .....	.....	09/01/2024	PAYDOWN	.....	13,274	13,389	12,971	13,349	0	313	0	313	0	13,274	0	0	0	479	01/01/2036	1.A FM
..92922F-GY-8	WalMu Mortgage Pass-Throu-WAMU 2003-S11 3 .....	.....	09/25/2024	PAYDOWN	.....	6,677	6,677	6,692	6,677	0	0	0	0	0	6,677	0	0	0	312	11/25/2033	1.A FM
..92922F-J5-8	WalMu Mortgage Pass-Throu-WAMU 2005-AR6 2 .....	.....	09/25/2024	PAYDOWN	.....	117,117	117,117	97,390	123,462	0	(6,346)	0	(6,346)	0	117,117	0	0	0	4,043	04/25/2045	1.A FM
..92925G-CC-4	WalMu Mortgage Pass-Throu-WAMU 2006-AR1 1 .....	.....	09/01/2024	PAYDOWN	.....	16,397	16,397	13,240	14,050	0	2,347	0	2,347	0	16,397	0	0	0	533	01/01/2046	1.A FM
..92925G-AD-5	WalMu Mortgage Pass-Throu-WAMU 2006-AR16 .....	.....	09/01/2024	PAYDOWN	.....	42,633	44,109	41,503	44,235	0	62	0	62	0	42,633	0	0	0	929	12/01/2036	3.C FM
..92925V-AF-7	WalMu Mortgage Pass-Throu-WAMU 2007-HY1 2 .....	.....	09/01/2024	PAYDOWN	.....	111,517	81,137	60,368	78,042	0	38,143	23,174	14,969	0	111,517	0	0	0	2,272	02/01/2037	1.A FM
..92925V-AP-5	WalMu Mortgage Pass-Throu-WAMU 2007-HY1 5 .....	.....	09/01/2024	PAYDOWN	.....	9,263	10,636	9,263	9,672	0	779	0	779	0	9,263	0	0	0	281	02/01/2037	4.B FM
..92927X-AC-8	WAMU MORTGAGE PASS-THROU-SERIES 2007-HY6 .....	.....	09/01/2024	PAYDOWN	.....	78,474	59,839	51,705	56,126	0	6,446	0	6,446	0	78,474	0	0	0	2,014	06/01/2037	3.C FM
..92977Y-BW-0	Wachovia Mortgage Loan T-WMLT 2005-B 244 .....	.....	09/01/2024	PAYDOWN	.....	37,003	37,003	34,361	35,657	0	1,357	0	1,357	0	37,003	0	0	0	1,314	10/01/2035	1.A FM
..92979D-AC-9	Wachovia Mortgage Loan T-WMLT 2007-A 241 .....	.....	09/01/2024	PAYDOWN	.....	42,751	42,048	37,434	37,376	0	5,849	1,010	4,839	0	42,751	0	0	0	1,376	03/01/2037	1.A FM
..92981#-AA-4	WEC 99J-73 LLC Senior Secured Note .....	.....	07/15/2024	CALL 100	.....	14,039	14,039	14,338	14,301	0	(6)	0	(6)	0	14,295	0	(257)	(257)	420	09/15/2039	2.B
..92981#-AA-6	WEC 99J-58 LLC Senior Secured Note .....	.....	09/15/2024	SINKING PAYMENT	.....	32,937	32,937	33,638	33,313	0	(376)	0	(376)	0	32,937	0	0	0	935	09/15/2030	2.B
..92982#-AA-3	WEC 99J-22 LLC Senior Secured Note .....	.....	08/16/2024	CALL 100	.....	12,280	12,280	12,542	12,510	0	(6)	0	(6)	0	12,504	0	(224)	(224)	349	09/15/2039	2.B
..92982#-AA-7	WEC 99J-27 LLC Senior Secured Note .....	.....	07/15/2024	CALL 100	.....	6,612	6,612	6,753	6,736	0	(3)	0	(3)	0	6,733	0	(121)	(121)	211	09/15/2039	2.B
..92982#-AA-5	Wec 2000B-CSF-11 LLC Senior Secured Note ....	.....	09/15/2024	SINKING PAYMENT	.....	33,872	33,872	34,594	34,259	0	(387)	0	(387)	0	33,872	0	0	0	961	09/15/2030	2.B
..92983*-AA-6	WEC 99J-4 LLC Senior Secured Note .....	.....	09/15/2024	SINKING PAYMENT	.....	20,235	20,235	20,666	20,532	0	(297)	0	(297)	0	20,235	0	0	0	574	09/15/2034	2.B
..92983#-AA-4	WEC 99J-72 LLC Senior Secured Note .....	.....	07/15/2024	CALL 100	.....	6,318	6,318	6,453	6,436	0	(3)	0	(3)	0	6,433	0	(115)	(115)	201	09/15/2039	2.B
..92990G-AD-5	WalMu Mortgage Pass-Throu-WAMU 2007-HY5 2 .....	.....	09/01/2024	PAYDOWN	.....	14,762	14,762	14,127	14,393	0	608	0	608	0	14,762	0	0	0	525	05/01/2037	1.A FM

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..92990G-AG-8	WaMu Mortgage Pass-Throu-WAMU 2007-HY5 2		09/01/2024	PAYDOWN		556,312	459,049	355,583	410,333	0	70,513	0	70,513	0	556,312	0	0	0	20,559	05/01/2037	5.B FM
..92990G-AJ-2	WaMu Mortgage Pass-Throu-WAMU 2007-HY5 3		09/01/2024	PAYDOWN		71,999	72,054	65,520	67,862	0	4,182	0	4,182	0	71,999	0	0	0	(3,847)	05/01/2037	1.A FM
..933636-AA-0	WaMu Mortgage Pass-Throu-WAMU 2007-HY4 1		09/01/2024	PAYDOWN		21,370	24,279	21,595	23,798	0	95	0	95	0	21,370	0	0	0	625	04/01/2037	3.B FM
..933636-AG-7	WaMu Mortgage Pass-Throu-WAMU 2007-HY4 3		09/01/2024	PAYDOWN		131,864	129,120	122,267	126,282	0	2,891	0	2,891	0	131,864	0	0	0	3,023	04/01/2037	3.C FM
..933636-AL-6	WAMU MORTGAGE PASS-THROU-SERIES 2007-HY4		09/01/2024	PAYDOWN		160,895	171,961	164,765	171,639	0	(289)	0	(289)	0	160,895	0	0	0	7,307	11/01/2036	2.B FM
..933638-AA-6	WaMu Mortgage Pass-Throu-WAMU 2006-AR19		09/01/2024	PAYDOWN		17,261	17,776	17,183	17,388	0	414	0	414	0	17,261	0	0	0	599	01/01/2047	1.B FM
..93363E-AB-1	WaMu Mortgage Pass-Throu-WAMU 2006-AR10		09/01/2024	PAYDOWN		13,716	13,972	13,393	14,064	0	(69)	0	(69)	0	13,716	0	0	0	392	09/01/2036	4.A FM
..93363N-AB-1	WaMu Mortgage Pass-Throu-WAMU 2006-AR12		09/01/2024	PAYDOWN		14,649	15,299	14,462	15,354	0	(106)	0	(106)	0	14,649	0	0	0	150	10/01/2036	4.A FM
..93363P-AA-8	WaMu Mortgage Pass-Throu-WAMU 2006-AR14		09/01/2024	PAYDOWN		16,633	20,882	19,433	19,566	0	1,006	0	1,006	0	16,633	0	0	0	615	11/01/2036	1.G FM
..93363P-AC-4	WaMu Mortgage Pass-Throu-WAMU 2006-AR14		09/01/2024	PAYDOWN		182,861	230,221	216,210	230,237	0	(3,058)	0	(3,058)	0	182,861	0	0	0	5,135	11/01/2036	2.C FM
..93363P-AD-2	WaMu Mortgage Pass-Throu-WAMU 2006-AR14		09/01/2024	PAYDOWN		2,470	3,200	2,929	3,016	0	122	0	122	0	2,470	0	0	0	102	11/01/2036	1.A FM
..93364F-AH-4	WaMu Mortgage Pass-Throu-WAMU 2007-HY7 3		09/01/2024	PAYDOWN		29,599	52,674	53,194	53,689	0	(861)	0	(861)	0	29,599	0	0	0	1,613	07/01/2037	5.A FM
..939336-TX-1	Washington Mutual MSC Mo-WAMMS 2003-MS7		09/01/2024	PAYDOWN	2	2	2	1	2	0	0	0	0	0	2	0	0	0	0	03/01/2033	1.A FM
..939336-X9-9	WaMu Mortgage Pass-Throu-WAMU 2005-AR1 A		09/25/2024	PAYDOWN		66,915	66,915	56,005	61,904	0	5,012	0	5,012	0	66,915	0	0	0	2,531	01/25/2045	1.A FM
..93934F-KP-6	Washington Mutual Mortga-WMALT 2006-1 3A		09/01/2024	PAYDOWN		1,477	2,057	2,063	2,167	0	(76)	0	(76)	0	1,477	0	0	0	67	02/01/2036	4.B FM
..93934F-MD-1	Washington Mutual Mortga-WMALT 2006-2 2C		09/01/2024	PAYDOWN		2,041	12,302	8,072	8,273	0	973	0	973	0	2,041	0	0	0	604	03/01/2036	3.A FM
..93934N-AC-9	Washington Mutual Mortga-WMALT 2006-5 1A		09/01/2024	PAYDOWN		1,346	4,472	3,754	4,083	0	150	113	37	0	1,346	0	0	0	177	07/01/2036	4.C FM
..93934N-AR-6	Washington Mutual Mortga-WMALT 2006-5 2C		09/25/2024	PAYDOWN		1,689	2,508	1,982	597	0	1,711	0	1,711	0	1,689	0	0	0	151	07/25/2036	1.A FM
..93936N-AA-1	Washington Mutual Mortga-WMALT 2007-4 1A		09/01/2024	PAYDOWN		7,610	6,839	6,624	6,624	0	(27)	0	(27)	0	7,610	0	0	0	184	06/01/2037	3.C FM
..94354K-AA-8	WAVE 2019-1 LLC-WAAV 2019-1 A		09/15/2024	PAYDOWN		106,516	106,516	106,511	106,446	0	69	0	69	0	106,516	0	0	0	2,547	09/15/2044	2.A FE
..94984D-AC-8	Wells Fargo Mortgage Bac-WFMB 2006-AR13		09/01/2024	PAYDOWN		129,644	20,946	16,386	19,667	0	31,191	0	31,191	0	129,644	0	0	0	1,087	09/01/2036	1.A FM
..94985A-AA-7	Wells Fargo Mortgage Bac-WFMB 2006-AR15		09/01/2024	PAYDOWN		5,326	5,591	5,192	5,616	0	(10)	17	(27)	0	5,425	0	(99)	(99)	342	10/01/2036	4.A FM
..94986C-AA-2	Wells Fargo Mortgage Bac-WFMB 2007-AR4		09/01/2024	PAYDOWN		231,814	26,547	20,283	24,216	0	81,085	(103)	81,188	0	231,814	0	0	0	1,611	08/01/2037	1.A FM
..94986M-AA-0	Wells Fargo Mortgage Bac-WFMB 2007-AR10		09/01/2024	PAYDOWN		1,860	4,034	4,057	4,068	0	40	0	40	0	1,860	0	0	0	202	01/01/2038	4.A FM
..94986M-AF-9	Wells Fargo Mortgage Bac-WFMB 2007-AR10		09/01/2024	PAYDOWN		14,961	15,031	12,413	13,209	0	(4)	0	(4)	0	13,140	0	1,821	1,821	565	01/01/2038	1.A FM
..94989D-AV-1	Wells Fargo Commercial M-WFCM 2015-C27 A		09/01/2024	PAYDOWN		340,154	340,154	333,179	339,201	0	953	0	953	0	340,154	0	0	0	7,805	02/01/2048	1.A
..94989N-BD-8	Wells Fargo Commercial M-WFCM 2015-C30 A		09/01/2024	PAYDOWN		53,564	53,564	53,338	53,507	0	57	0	57	0	53,564	0	0	0	1,370	09/01/2058	1.A
..94989Q-AV-2	Wells Fargo Commercial M-WFCM 2015-SG1 A		09/01/2024	PAYDOWN		142,471	142,471	146,768	143,140	0	(668)	0	(668)	0	142,471	0	0	0	4,049	09/01/2048	1.A
..94989Y-AY-9	Wells Fargo Commercial M-WFCM 2016-C32 A		08/01/2024	PAYDOWN		525,092	525,092	530,330	526,021	0	(930)	0	(930)	0	525,092	0	0	0	12,972	01/01/2059	1.A
..95002F-AA-2	Wells Fargo Mortgage Bac-WFMB 2019-4 A1		09/01/2024	PAYDOWN		69,843	69,843	71,087	71,687	0	(1,843)	0	(1,843)	0	69,843	0	0	0	1,596	09/01/2049	1.A
..95002K-AA-1	Wells Fargo Mortgage Bac-WFMB 2020-1 A1		09/01/2024	PAYDOWN		92,579	92,579	93,678	92,579	0	(2,211)	0	(2,211)	0	92,579	0	0	0	1,131	12/01/2049	1.A
..95040Q-AL-8	Welltower Inc-SENIOR UNSECURED		08/08/2024	VARIOUS	9,412,427	10,000,000	10,005,500	10,004,394	10,004,394	0	(362)	0	(362)	0	10,004,032	0	(591,606)	(591,606)	289,514	01/15/2031	2.A FE
..95058X-AE-8	Wendy's Funding LLC-WIEN 2018-1A A2II		09/15/2024	PAYDOWN		20,244	20,244	19,356	19,938	0	306	0	306	0	20,244	0	0	0	590	03/15/2048	2.B FE
..95058X-AG-3	Wendy's Funding LLC-WIEN 2019-1A A2I		09/15/2024	PAYDOWN		62,905	62,905	62,905	62,905	0	0	0	0	0	62,905	0	0	0	1,785	06/15/2049	2.B FE
..96034L-AA-9	Westgate Resorts 2020-1 -WESTR 2020-1A A		09/30/2024	PAYDOWN	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1,242	03/01/2034	1.A FE
..96038#-AA-8	Westin (St Louis MO) Lea Trust Certifica		09/15/2024	SINKING PAYMENT		28,372	28,372	28,372	28,372	0	0	0	0	0	28,372	0	0	0	981	07/15/2047	1.D PL
..96042#-AA-4	Westkin Portfolio (LAS & Trust Certifica		09/15/2024	SINKING PAYMENT		90,863	90,863	91,772	91,551	0	(689)	0	(689)	0	90,863	0	0	0	4,718	11/15/2038	1.D PL
..96928*-CQ-8	William Blair & Company, Trust Certificat		09/15/2024	SINKING PAYMENT		43,914	43,914	43,914	43,914	0	0	0	0	0	43,914	0	0	0	1,708	06/15/2033	3.A
..96928*-CR-6	William Blair & Company, Trust Certificat		09/15/2024	SINKING PAYMENT		53,766	53,766	53,766	53,766	0	0	0	0	0	53,766	0	0	0	2,092	05/15/2034	3.A
..96928*-CX-3	William Blair & Company, Trust Certifica		09/15/2024	SINKING PAYMENT		111,792	111,792	112,919	112,333	0	(541)	0	(541)	0	111,792	0	0	0	4,618	01/15/2035	1.F
..96928*-DA-2	William Blair & Company, Trust Certifica		09/15/2024	SINKING PAYMENT		216,521	216,521	218,854	217,282	0	(761)	0	(761)	0	216,521	0	0	0	7,763	08/15/2031	1.A
..96928*-DJ-3	William Blair & Company, Trust Certifica		09/15/2024	SINKING PAYMENT		151,987	151,987	151,987	151,987	0	0	0	0	0	151,987	0	0	0	5,328	09/15/2031	3.A
..96928*-DZ-7	William Blair & Company, Trust Certifica		09/15/2024	SINKING PAYMENT		213,351	213,351	213,317	213,351	0	(515)	0	(515)	0	213,351	0	0	0	7,980	10/15/2029	1.E
..96928*-EN-3	William Blair & Company, Trust Certifica		09/15/2024	SINKING PAYMENT		125,303	125,303	126,652	125,842	0	(539)	0	(539)	0	125,303	0	0	0	3,189	02/15/2034	1.A
..96928*-EZ-6	William Blair & Company, Trust Certifica		09/15/2024	SINKING PAYMENT		148,183	148,183	148,183	148,183	0	0	0	0	0	148,183	0	0	0	6,441	09/15/2033	2.A
..96928*-FH-5	William Blair & Company, Trust Certifica		09/15/2024	SINKING PAYMENT		400,750	400,750	400,750	400,750	0	0	0	0	0	400,750	0	0	0	16,929	04/15/2025	2.A

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-ign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..96928*-FK-8	William Blair & Company, Trust Certifica	.....	09/15/2024	SINKING PAYMENT	.....	136,379	136,379	136,379	136,385	0	(6)	0	(6)	0	136,379	0	0	0	7,826	11/15/2032	1.C
..96928*-FQ-5	William Blair & Company, Trust Certifica	.....	09/15/2024	SINKING PAYMENT	.....	154,125	154,125	154,125	154,125	0	0	0	0	0	154,125	0	0	0	4,125	09/15/2033	1.A
..96928*-FV-4	William Blair & Company, Trust Certifica	.....	09/15/2024	SINKING PAYMENT	.....	63,551	63,551	63,551	63,551	0	0	0	0	0	63,551	0	0	0	1,734	09/15/2044	1.E
..96928*-FX-0	William Blair & Company, Trust Certifica	.....	09/15/2024	SINKING PAYMENT	.....	238,521	238,521	238,521	238,521	0	0	0	0	0	238,521	0	0	0	6,378	02/15/2036	1.B
..96928*-FY-8	William Blair & Company, Trust Certifica	.....	09/15/2024	SINKING PAYMENT	.....	88,889	88,889	88,889	88,889	0	0	0	0	0	88,889	0	0	0	2,811	01/15/2035	3.A
..96930@-AA-9	William Blair & Company Trust Certificat	.....	09/15/2024	SINKING PAYMENT	.....	69,144	69,144	69,144	69,145	0	0	0	0	0	69,144	0	0	0	2,016	08/15/2035	3.A
..97063Q-AA-0	WILLIS ENGINE STRUCTURED-SERIES 17-A CLA	.....	09/15/2024	PAYDOWN	.....	118,616	118,616	118,515	118,560	56	56	56	56	0	118,616	0	0	0	3,712	08/15/2042	2.B FE
..97064E-AA-6	Willis Engine Structured-WESTF 2018-A A	.....	09/15/2024	PAYDOWN	.....	86,981	86,981	86,976	86,981	0	(1)	0	(1)	0	86,981	0	0	0	2,756	09/15/2043	1.G FE
..97064F-AA-3	Willis Engine Structured-WESTF 2020-A A	.....	09/15/2024	PAYDOWN	.....	149,822	149,822	149,820	149,822	0	0	0	0	0	149,822	0	0	0	3,226	03/15/2045	1.F FE
..97652P-AL-5	WinWater Mortgage Loan T-WIN 2014-1 A11	.....	09/01/2024	PAYDOWN	.....	27,551	27,551	27,379	27,381	0	170	0	170	0	27,551	0	0	0	643	06/01/2044	1.A
..97988R-AN-2	WDMNT 2022-9A D-WDMNT 2022-9A D	.....	09/05/2024	PAYDOWN	.....	8,500,000	8,500,000	8,500,000	8,500,000	0	0	0	0	0	8,500,000	0	0	0	633,506	04/25/2034	2.C FE
..97988R-AQ-5	WDMNT 2022-9A E-WDMNT 2022-9A E	.....	09/05/2024	PAYDOWN	.....	8,000,000	8,000,000	7,840,000	7,713,293	0	286,707	0	286,707	0	8,000,000	0	0	0	865,979	04/25/2034	3.C FE
..98920M-AA-0	ZAXBY'S FUNDING LLC-ZAXBY 2021-1A A2	.....	07/30/2024	PAYDOWN	.....	45,003	45,003	40,973	41,824	0	3,179	0	3,179	0	45,003	0	0	0	1,093	07/30/2051	2.B FE
..67256K-AB-0	Prop 2017-1 Ltd-ABS SSNR 5.30 03/15/42	.....	09/15/2024	PAYDOWN	.....	247,898	247,898	247,750	247,898	0	0	0	0	0	247,898	0	0	0	5,786	03/15/2042	2.B FE
..009088-AA-3	AIR CANADA 2015-2AA PTT-FIRST LIEN	A.....	08/09/2024	SINKING PAYMENT	.....	168,775	168,775	168,775	168,799	0	(24)	0	(24)	0	168,775	0	0	0	3,165	12/15/2027	1.E FE
..009088-AB-1	Air Canada 2015-2 Class -2ND LIEN	A.....	08/02/2024	SINKING PAYMENT	.....	58	58	58	58	0	(38)	0	(38)	0	58	0	0	0	88	12/15/2027	2.B FE
..009090-AA-9	AIR CANADA 2015-1A PTT-FIRST LIEN	A.....	09/15/2024	SINKING PAYMENT	.....	325,681	325,681	325,681	325,722	0	(41)	0	(41)	0	325,681	0	0	0	11,965	03/15/2027	1.F FE
..63002@-AA-2	NFM Cabin Intermediate # Senior Secured	.....	07/31/2024	SINKING PAYMENT	.....	633,817	633,817	652,571	652,571	0	0	0	0	0	652,571	(18,754)	0	(18,754)	0	07/31/2033	1.G FE
..00176@-AM-5	AMMC CLO XIII Ltd-AMMC 2013-13A B3LR	D.....	07/31/2024	BOFAM1SEC	.....	87,788	283,186	2,359	(35,475)	0	29,721	0	29,721	0	19,250	0	68,538	68,538	28,587	07/24/2029	6. FE
..00176D-AN-9	AMMC CLO XIII Ltd-AMMC 2013-13A B1LR	D.....	07/24/2024	PAYDOWN	.....	601,000	601,000	601,000	601,000	0	0	0	0	0	601,000	0	0	0	42,122	07/24/2029	1.D FE
..00205@-AB-3	APT Pipelines Ltd-SENIOR UNSECURED	D.....	09/16/2024	CA_CASH_CLOSE	.....	6,975,010	7,000,000	6,992,650	6,998,809	0	786	0	786	0	6,999,594	0	(24,584)	(24,584)	288,283	03/23/2025	2.B FE
..00900L-AS-3	AIMCO CLO Series 2015-A-AIMCO 2015-AA CR	D.....	09/03/2024	PAYDOWN	.....	3,750,000	3,750,000	3,750,000	3,750,000	0	0	0	0	0	3,750,000	0	0	0	217,125	10/17/2034	1.F FE
..01448Q-AA-8	ALESCO Preferred Funding-ALESC 4A A1	D.....	09/30/2024	PAYDOWN	.....	6,142	6,142	5,775	6,041	0	101	0	101	0	6,142	0	0	0	190	07/30/2034	1.C FE
..01448X-AA-3	ALESCO Preferred Funding-ALESC 6A A1	D.....	09/23/2024	PAYDOWN	.....	727,692	727,692	656,610	670,844	0	56,848	0	56,848	0	727,692	0	0	0	44,800	03/23/2035	1.D FE
..01449@-AB-5	ALESCO Preferred Funding-ALESC 14A A1	D.....	09/30/2024	PAYDOWN	.....	47,935	47,935	34,013	39,141	0	8,794	0	8,794	0	47,935	0	0	0	2,160	09/23/2037	1.B FE
..01449W-AA-4	ALESCO Preferred Funding-ALESC 10A A1	D.....	09/23/2024	PAYDOWN	.....	1,738,090	1,738,090	1,546,279	1,654,134	0	83,956	0	83,956	0	1,738,090	0	0	0	104,719	09/23/2036	1.A FE
..01450A-AA-8	ALESCO Preferred Funding-ALESC 11A A1A	D.....	09/23/2024	PAYDOWN	.....	235,714	235,714	177,375	183,375	0	52,339	0	52,339	0	235,714	0	0	0	14,354	12/23/2036	1.A FE
..01450B-AA-6	ALESCO Preferred Funding-ALESC 15A A1	D.....	09/23/2024	PAYDOWN	.....	936,923	936,923	857,530	905,197	0	31,726	0	31,726	0	936,923	0	0	0	49,128	12/23/2037	1.C FE
..03328W-AU-2	Anchorage Capital CLO 9 -ANCHC 2016-9A B	D.....	07/24/2024	PAYDOWN	.....	3,250,000	3,250,000	3,250,000	3,250,000	0	0	0	0	0	3,250,000	0	0	0	187,293	07/15/2032	1.C FE
..03330N-AJ-3	Anchorage Capital Clo 11-ANCHC 2019-11A	D.....	09/30/2024	PAYDOWN	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	35,312	07/22/2032	1.A FE
..03665L-AA-1	Antares CLO 2018-3 LTD-ANTR 2018-3A A1	D.....	08/22/2024	PAYDOWN	.....	6,638,440	6,638,440	6,638,440	6,638,894	0	(453)	0	(453)	0	6,638,440	0	0	0	389,578	01/20/2031	1.A FE
..0376@Q-AQ-1	Apidos CLO XXXII-APID 2019-32A E	D.....	09/30/2024	PAYDOWN	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	49,345	01/20/2033	3.C FE
..05682L-AJ-6	Bain Capital Credit CLO -BCC 2019-2A AR	D.....	07/17/2024	PAYDOWN	.....	2,600,000	2,600,000	2,529,800	2,532,132	0	67,868	0	67,868	0	2,600,000	0	0	0	132,730	10/17/2032	1.A FE
..05682Q-AL-0	Bain Capital Credit CLO -BCC 2017-1A C2	D.....	09/30/2024	PAYDOWN	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	36,393	07/20/2030	1.F FE
..09077C-AA-0	Birch Grove CLO 4 Ltd-BGLO 2022-4A A1	D.....	09/30/2024	PAYDOWN	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	126,901	04/15/2034	1.A FE
..10901U-AA-0	Brigade Debt Funding I L-BDF 2018-1A A	D.....	09/30/2024	PAYDOWN	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	(399)	04/25/2036	1.A FE
..12563E-AA-1	CIFC Funding 2021-I Ltd-CIFC 2021-1A A1	D.....	09/30/2024	PAYDOWN	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	127,208	04/25/2033	1.A FE
..12807C-AA-1	CAL Funding IV Ltd-CAI 2020-1A A	D.....	09/25/2024	PAYDOWN	.....	173,273	173,273	154,774	157,603	0	15,670	0	15,670	0	173,273	0	0	0	2,568	09/25/2045	1.F FE
..13876R-AJ-3	Canyon CLO 2020-3 Ltd-CANYC 2020-3A D	D.....	08/22/2024	PAYDOWN	.....	4,000,000	4,000,000	4,000,800	3,999,200	0	800	0	800	0	4,000,000	0	0	0	282,324	01/15/2034	2.C FE
..13876T-AA-8	Canyon CLO 2020-3 Ltd-CANYC 2020-3A E	D.....	08/22/2024	PAYDOWN	.....	1,000,000	1,000,000	899,500	899,478	0	100,522	0	100,522	0	1,000,000	0	0	0	111,027	01/15/2034	3.C FE
..13887T-AJ-6	Canyon Capital CLO 2019-CANYC 2019-1A A	D.....	07/15/2024	PAYDOWN	.....	4,200,000	4,200,000	4,1													

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-ign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..28851Q-AE-3	Ellington Clo I Ltd-EQLO 2017-1A AR	D.....	07/15/2024	PAYDOWN		2,189,791	2,189,791	2,189,791	2,189,791	0	0	0	0	0	2,189,791	0	0	0	140,360	10/15/2029	1.A FE
..28852L-AA-1	Ellington Clo III Ltd-EQLO 2018-3A A1	D.....	07/22/2024	PAYDOWN		1,888,564	1,888,564	1,888,564	1,889,505	0	(941)	0	(941)	0	1,888,564	0	0	0	112,189	07/20/2030	1.A FE
..29001X-AC-9	ELM17 2022-4A B-ELM17 2022-4A B	D.....	07/17/2024	PAYDOWN		9,000,000	9,000,000	9,000,000	9,000,000	0	0	0	0	0	9,000,000	0	0	0	506,604	07/17/2035	1.C FE
..29002H-AQ-2	Elmwood CLO III Ltd-ELMW3 2019-3A CR	D.....	09/30/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	62,984	10/20/2034	1.F FE
..29003B-AL-5	Elmwood CLO V Ltd-ELMW5 2020-2A AR	D.....	09/18/2024	PAYDOWN		20,000,000	20,000,000	19,470,000	19,199,420	0	800,580	0	800,580	0	20,000,000	0	0	0	1,037,304	10/20/2034	1.A FE
..30259A-AA-0	FDF I Ltd-SERIES 17-3A CLASS A1	D.....	07/25/2024	PAYDOWN		3,703,191	3,703,191	3,703,191	3,703,191	0	0	0	0	0	3,703,191	0	0	0	207,985	01/25/2036	1.A FE
..34960J-AS-4	Fortress Credit Opportun-FCO 2015-6A A1T	D.....	07/10/2024	PAYDOWN		3,924,636	3,924,636	3,669,535	3,917,391	0	7,245	0	7,245	0	3,924,636	0	0	0	188,140	07/10/2030	1.A FE
..34960J-BC-8	Fortress Credit Opportun-FCO 2015-6A BFR	D.....	08/14/2024	PAYDOWN		11,000,000	11,000,000	11,000,000	11,000,658	0	(658)	0	(658)	0	11,000,000	0	0	0	458,871	07/10/2030	1.C FE
..34961W-AC-9	Fortress Credit Opportun-FCO 2018-11A A1	D.....	07/15/2024	PAYDOWN		1,125,859	1,125,859	1,034,383	1,116,049	0	9,810	0	9,810	0	1,125,859	0	0	0	63,344	04/15/2031	1.A FE
..36321P-AE-0	Galaxy Pipeline Assets B-SECURED	D.....	09/30/2024	SINKING PAYMENT		18,494	18,494	16,748	16,976	0	1,518	0	1,518	0	18,494	0	0	0	272	09/30/2040	1.C FE
..36655L-AB-1	Garrison Funding 2018-2 -GRIMML 2018-2RA	D.....	08/20/2024	PAYDOWN		1,139,582	1,139,582	1,139,582	1,139,582	0	0	0	0	0	1,139,582	0	0	0	62,267	11/20/2029	1.A FE
..36655L-AD-7	Garrison Funding 2018-2 -GRIMML 2018-2RA	D.....	08/20/2024	PAYDOWN		1,225,000	1,225,000	1,195,141	1,213,823	0	11,177	0	11,177	0	1,225,000	0	0	0	75,046	11/20/2029	1.A FE
..37960J-AA-6	Global Aircraft Leasing -SR UNSECURED	D.....	08/28/2024	VARIOUS		2,603,500	2,603,500	2,227,600	2,363,546	0	138,915	0	138,915	0	2,599,960	0	3,540	3,540	76,622	09/15/2024	4.B FE
..38090A-AA-6	GoldenTree Loan Manageme-GLM 2022-16A XR	D.....	07/22/2024	PAYDOWN		312,500	312,500	312,500	312,500	0	0	0	0	0	312,500	0	0	0	19,894	01/20/2034	1.A FE
..38137V-AA-5	Goldentree Loan Manageme-GLM 2022-14A E	D.....	07/22/2024	PAYDOWN		4,400,000	4,400,000	4,356,000	4,304,762	0	95,238	0	95,238	0	4,400,000	0	0	0	441,347	07/20/2035	3.C FE
..38138D-AS-5	Goldentree Loan Manageme-GLM 2019-5A CR	D.....	08/05/2024	PAYDOWN		5,000,000	5,000,000	5,000,000	5,000,000	0	0	0	0	0	5,000,000	0	0	0	293,826	10/20/2032	1.F FE
..38138F-AG-6	Goldentree Loan Manageme-GLM 2022-12A B	D.....	08/21/2024	PAYDOWN		6,000,000	6,000,000	5,997,000	5,997,000	0	3,000	0	3,000	0	6,000,000	0	0	0	335,957	04/20/2034	1.C FE
..38138T-AC-5	Goldentree Loan Manageme-GLM 2021-10A A	D.....	09/26/2024	PAYDOWN		4,000,000	4,000,000	3,846,000	3,834,230	0	165,770	0	165,770	0	4,000,000	0	0	0	205,927	07/20/2034	1.A FE
..38172H-AA-2	Golub Capital Partners C-GOCAP 2019-45A	D.....	08/23/2024	PAYDOWN		7,278,697	7,278,697	7,278,697	7,278,697	0	0	0	0	0	7,278,697	0	0	0	408,052	10/20/2031	1.A FE
..38175D-AA-4	Golub Capital Partners C-GOCAP 2018-38A	D.....	07/12/2024	PAYDOWN		20,000,000	20,000,000	20,000,000	20,000,000	0	0	0	0	0	20,000,000	0	0	0	1,110,714	07/20/2030	1.C FE
..38175J-AA-5	Golub Capital Partners C-GOCAP 2013-17A	D.....	07/25/2024	PAYDOWN		2,860,087	2,860,087	2,860,087	2,860,087	0	0	0	0	0	2,860,087	0	0	0	166,028	10/25/2030	1.A FE
..38218J-AA-4	Goodgreen 2022-1-GOODG 2022-1A A	D.....	09/15/2024	PAYDOWN		425,861	425,861	425,718	425,861	0	0	0	0	0	425,861	0	0	0	8,177	10/15/2056	1.A FE
..38218J-AB-2	Goodgreen 2022-1-GOODG 2022-1A B	D.....	09/15/2024	PAYDOWN		48,545	48,545	48,476	48,528	0	16	0	16	0	48,545	0	0	0	1,114	10/15/2056	1.C FE
..390556-AN-8	Great Lakes CLO 2014-1 L-GRTLK 2014-1A B	D.....	07/15/2024	PAYDOWN		2,380,336	2,380,336	2,380,336	2,388,763	0	(8,427)	0	(8,427)	0	2,380,336	0	0	0	137,320	10/15/2029	1.A FE
..40170F-AA-4	Guggenheim MM CLO 2018-1-GPIM 2018-1A A1	D.....	07/15/2024	PAYDOWN		4,679,354	4,679,354	4,679,354	4,679,354	0	0	0	0	0	4,679,354	0	0	0	269,494	01/15/2031	1.A FE
..40170F-AJ-5	Guggenheim MM CLO 2018-1-GPIM 2018-1A A2	D.....	07/15/2024	PAYDOWN		1,497,393	1,497,393	1,497,393	1,497,393	0	(55)	0	(55)	0	1,497,393	0	0	0	51,099	01/15/2031	1.A FE
..45082D-AA-5	Iberia, Lineas Aereas De Senior Secured	D.....	07/15/2024	SINKING PAYMENT		170,998	170,998	170,998	170,998	0	0	0	0	0	170,998	0	0	0	6,226	10/15/2037	1.G PL
..45082E-AA-3	Iberia, Lineas Aereas De Senior Secured	D.....	07/15/2024	SINKING PAYMENT		127,505	127,505	127,505	127,505	0	0	0	0	0	127,505	0	0	0	5,700	04/15/2034	2.A Z
..456472-AB-5	Industrias Penoles SAB d-SENIOR UNSECURE	D.....	09/05/2024	MERRILL LYNCH INTERN		992,245	1,039,000	1,047,832	1,045,899	0	(738)	0	(738)	0	1,045,161	0	(52,916)	(52,916)	42,400	09/12/2029	2.B FE
..46651N-AA-2	JOL Air Ltd-JOLAR 2019-1 A	D.....	09/15/2024	PAYDOWN		304,300	304,300	304,988	304,357	0	(57)	0	(57)	0	304,300	0	0	0	8,042	04/15/2044	1.G FE
..48206K-AE-6	Juniper Valley Park CLO -JNPPK 2023-1A B	D.....	07/22/2024	PAYDOWN		10,000,000	10,000,000	10,000,000	10,000,000	0	0	0	0	0	10,000,000	0	0	0	892,732	07/20/2035	1.C FE
..49255P-AA-1	Kestrel Aircraft Funding-KSTRL 2018-1A A	D.....	09/15/2024	PAYDOWN		128,944	128,944	125,306	127,426	0	1,518	0	1,518	0	128,944	0	0	0	3,805	12/15/2038	2.B FE
..540543-AA-3	Logan CLO I Ltd-LOGN1 2021-1A A	D.....	09/30/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	18,230	07/20/2034	1.A FE
..55312H-AA-4	MMcapS Funding XVII Ltd-MMCAP 17A A1	D.....	09/03/2024	PAYDOWN		44,204	44,204	42,124	43,881	0	324	0	324	0	44,204	0	0	0	2,029	12/01/2035	1.A FE
..55446M-AA-5	MACH 1 Cayman 2019-1 Ltd	D.....	09/15/2024	PAYDOWN		528,244	528,244	528,227	528,240	0	4	0	4	0	528,244	0	0	0	10,912	10/15/2039	2.A FE
..55817A-AS-3	Madison Park Funding XXX-MDPK 2018-32A B	D.....	08/09/2024	PAYDOWN		4,750,000	4,750,000	4,578,430	4,562,528	0	187,472	0	187,472	0	4,750,000	0	0	0	269,107	01/22/2031	1.C FE
..55817E-AQ-9	Madison Park Funding XXX-MDPK 2019-37A B	D.....	09/30/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	20,112	07/15/2033	1.C FE
..55819M-AN-6	Madison Park Funding XXX-MDPK 2019-35A A	D.....	07/22/2024	PAYDOWN		11,918	11,918	11,744	11,716	0	203	0	203	0	11,918	0	0	0	604	04/20/2032	1.A FE
..55821L-AE-4	Madison Park Funding XXX-MDPK 2021-39A C	D.....	09/17/2024	PAYDOWN		3,900,000	3,900,000	3,900,000	3,900,000	0	0	0	0								

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-ign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
.67115L-AC-8	Oak Hill Credit Partners-OAKC 2021-16A B	D	09/24/2024	PAYDOWN		13,600,000	13,600,000	13,600,000	13,600,000	0	0	0	0	0	13,600,000	0	0	0	745,463	10/18/2034	1.C FE
.69688K-AA-7	Palmer Square CLO Ltd-PLMRS 2022-2A E	D	07/22/2024	PAYDOWN		6,000,000	6,000,000	5,938,307	5,897,421	0	102,579	0	102,579	0	6,000,000	0	0	0	606,437	07/20/2034	3.C FE
.69688N-AE-3	Palmer Square CLO Ltd-PLMRS 2022-2A C	D	07/22/2024	PAYDOWN		7,500,000	7,500,000	7,500,000	7,500,000	0	0	0	0	0	7,500,000	0	0	0	471,696	07/20/2034	1.F FE
.70018C-AA-4	Park Blue CLO 2022-II Lt-PKBLU 2022-2A A	D	07/22/2024	PAYDOWN		10,000,000	10,000,000	9,950,000	9,749,442	0	250,558	0	250,558	0	10,000,000	0	0	0	605,929	01/20/2035	1.A FE
.70469X-AN-4	Peaks CLO 2 Ltd-PEAKS 2017-2A A1AR	D	07/22/2024	PAYDOWN		2,938,670	2,938,670	2,703,576	2,902,413	0	36,257	0	36,257	0	2,938,670	0	0	0	174,530	07/20/2031	1.A FE
.70806U-AE-2	PennantPark CLO II Ltd-PNTPK 2020-2A B1	D	09/30/2024	PAYDOWN		0	0	0	0	0	0	0	0	0	0	0	0	0	15,925	01/15/2032	1.C FE
.74040T-AC-7	Preferred Term Securitie-PRETSL FLOAT 12	D	09/30/2024	PAYDOWN		7,280	7,280	6,950	7,071	0	209	0	209	0	7,280	0	0	0	288	12/23/2031	3.A FE
.74041E-AA-3	Preferred Term Securitie-SECURED	D	09/30/2024	PAYDOWN		518,815	518,815	430,351	476,654	0	42,161	0	42,161	0	518,815	0	0	0	12,607	03/23/2035	1.A FE
.74041N-AC-9	Preferred Term Securitie-SECURED	D	09/30/2024	PAYDOWN		37,361	37,361	35,960	36,374	0	987	0	987	0	37,361	0	0	0	1,220	12/24/2033	1.A FE
.74041N-AD-7	Preferred Term Securitie-SECURED	D	09/30/2024	PAYDOWN		105,857	105,857	101,887	102,780	0	3,077	0	3,077	0	105,857	0	0	0	3,457	12/24/2033	1.A FE
.74042D-AA-4	Preferred Term Securitie-SECURED	D	09/30/2024	PAYDOWN		490,822	490,822	451,863	458,482	0	32,340	0	32,340	0	490,822	0	0	0	15,179	03/22/2038	1.A FE
.74042E-AA-2	Preferred Term Securitie-SECURED	D	09/30/2024	PAYDOWN		62,300	62,300	50,137	52,984	0	9,316	0	9,316	0	62,300	0	0	0	2,922	06/23/2035	1.A FE
.74042F-AA-9	Preferred Term Securitie-SECURED	D	09/30/2024	PAYDOWN		39,413	39,413	31,621	34,537	0	4,876	0	4,876	0	39,413	0	0	0	1,197	06/22/2037	1.E FE
.74042H-AA-5	Preferred Term Securitie-SECURED	D	09/30/2024	PAYDOWN		45,476	45,476	35,079	38,855	0	6,620	0	6,620	0	45,476	0	0	0	1,395	12/22/2035	1.A FE
.74042H-AB-3	Preferred Term Securitie-SECURED	D	09/30/2024	PAYDOWN		13,539	13,539	11,517	13,539	0	0	0	0	0	13,539	0	0	0	421	12/22/2035	1.A FE
.74043A-AC-5	Preferred Term Securitie-FIRST LIEN	D	09/30/2024	PAYDOWN		14,909	14,909	17,144	12,886	0	2,023	0	2,023	0	14,909	0	0	0	446	12/22/2036	1.A FE
.74043A-AD-3	Preferred Term Securitie-SECURED	D	09/30/2024	PAYDOWN		191,198	191,198	177,455	184,546	0	6,652	0	6,652	0	191,198	0	0	0	5,825	12/22/2036	1.A FE
.74043C-AA-5	Preferred Term Securitie-SECURED	D	09/30/2024	PAYDOWN		50,322	50,322	38,439	42,107	0	8,215	0	8,215	0	50,322	0	0	0	1,530	03/22/2037	1.E FE
.75973H-AA-5	Renew 2023-1-RENEW 2023-1A A	C	09/20/2024	PAYDOWN		265,657	265,657	249,771	252,014	0	13,642	0	13,642	0	265,657	0	0	0	4,484	11/20/2058	1.A FE
.761923-AA-9	REVL 2023-2 Ltd-REVL 2023-2A A1	C	09/01/2024	PAYDOWN		553,447	553,447	553,447	553,447	0	0	0	0	0	553,447	0	0	0	36,659	10/01/2048	1.E PL
.761923-AB-7	REVL 2023-2 Ltd-REVL 2023-2A A2	C	08/01/2024	PAYDOWN		828,787	828,787	828,787	828,787	0	0	0	0	0	828,787	0	0	0	51,293	02/01/2049	1.E PL
.77879R-AB-2	Rotor Engines Securitiza-ROTOR 2011-1A A	D	09/15/2024	PAYDOWN		1,155,725	1,155,725	1,132,611	1,140,604	0	15,121	0	15,121	0	1,155,725	0	0	0	59,698	06/15/2046	5.A FE
.78110T-AG-4	RR 21 Ltd-RRAM 2022-21A B1	D	07/15/2024	PAYDOWN		5,000,000	5,000,000	5,000,000	5,000,000	0	0	0	0	0	5,000,000	0	0	0	325,923	07/15/2035	1.F FE
.83438J-AA-4	Soloso CDO 2007-1 Ltd-SERIES 2007-1A CLA	D	07/08/2024	PAYDOWN		58,256	58,256	53,669	54,379	0	3,877	0	3,877	0	58,256	0	0	0	2,751	10/07/2037	1.E FE
.85572R-AA-7	Start Ltd/Bermuda-STARR 2018-1 A	D	09/15/2024	PAYDOWN		415,818	415,818	414,542	415,160	0	658	0	658	0	415,818	0	0	0	11,245	05/15/2043	1.F FE
.85573L-AA-9	START Ireland-STARR 2019-1 A	D	09/15/2024	PAYDOWN		94,929	94,929	94,925	94,929	0	1	0	1	0	94,929	0	0	0	2,591	03/15/2044	1.F FE
.86271P-AE-5	Strata CLO II Ltd-STRTA 2021-1A B	D	07/09/2024	PAYDOWN		11,000,000	11,000,000	11,000,000	11,000,000	0	0	0	0	0	11,000,000	0	0	0	616,085	10/20/2033	1.C FE
.86271P-AG-0	Strata CLO II Ltd-STRTA 2021-1A C	D	07/09/2024	PAYDOWN		10,000,000	10,000,000	10,000,000	10,000,000	0	0	0	0	0	10,000,000	0	0	0	618,521	10/20/2033	1.F FE
.86271P-AJ-4	Strata CLO II Ltd-STRTA 2021-1A D	D	07/09/2024	PAYDOWN		9,000,000	9,000,000	8,910,000	8,847,973	0	152,027	0	152,027	0	9,000,000	0	0	0	655,294	10/20/2033	2.C FE
.870674-AA-6	Sweihan PV Power Co PJSC-SECURED	D	07/31/2024	SINKING PAYMENT		5,807	5,807	5,565	5,574	0	233	0	233	0	5,807	0	0	0	213	01/31/2049	2.A FE
.87168V-AA-4	SYMPHONY CLO LTD-SYMP 2022-36A E	D	09/27/2024	PAYDOWN		2,000,000	2,000,000	1,980,000	1,955,335	0	44,665	0	44,665	0	2,000,000	0	0	0	208,040	10/24/2035	3.C FE
.87244C-AJ-5	TIAA Churchill Middle Ma-CHMML 2016-1A A	D	07/19/2024	PAYDOWN		9,485,110	9,485,110	9,485,110	9,485,110	0	0	0	0	0	9,485,110	0	0	0	500,753	10/20/2030	1.A FE
.87244C-AL-0	TIAA Churchill Middle Ma-CHMML 2016-1A B	D	07/19/2024	PAYDOWN		7,200,000	7,200,000	7,200,000	7,200,000	0	0	0	0	0	7,200,000	0	0	0	423,988	10/20/2030	1.C FE
.87248K-AJ-3	TICP CLO V 2016-1 Ltd-TICP 2016-5A A1R	D	07/17/2024	PAYDOWN		3,441,028	3,441,028	3,351,561	3,380,275	0	60,753	0	60,753	0	3,441,028	0	0	0	172,241	07/17/2031	1.A FE
.87268R-AA-2	TruPS Financials Note Se-TFINS 2019-2A A	D	08/28/2024	PAYDOWN		310,345	310,345	310,345	310,345	0	0	0	0	0	310,345	0	0	0	18,696	02/28/2039	1.B FE
.88315L-AJ-7	Textainer Marine Contain-SERIES 2020-3A	D	09/20/2024	PAYDOWN		245,700	245,700	215,295	217,006	0	28,694	0	28,694	0	245,700	0	0	0	3,461	09/20/2045	1.F FE
.88315L-AL-2	Textainer Marine Contain-TMCL 2021-1A A	D	09/20/2024	PAYDOWN		145,833	145,833	128,601	52,448	0	17,164	0	17,164	0	145,833	0	0	0	981	02/20/2046	1.F FE
.88315L-AQ-1	Textainer Marine Contain-TMCL 2021-2A A	D	09/20/2024	PAYDOWN		185,800	185,800	162,451	162,637	0	23,163	0	23,163	0	185,800	0	0	0	2,762	04/20/2046	1.F FE
.88315L-AS-7	Textainer Marine Contain-TMCL 2021-3A A	C	09/20/2024	PAYDOWN		59,000	59,000	48,387	48,899	0	10,101	0	10,101	0	59,000	0	0	0	763	08/20/2046	1.F FE
.88606W-AA-0	Thunderbolt Aircraft Lea-SERIES 17-A CLA	D	07/15/2024	PAYDOWN		930,519	930,519	930,480	930,698	0	(178)	0	(178)	0	930,519	0	0	0	22,629	05/17/2032	2.A FE
.88607A-AA-7	Thunderbolt III Aircraft-TBOLT 2019-1 A	D	09/15/2024	PAYDOWN		161,104	161,104	161,098	161,103	0	2	0	2	0	161,104	0	0	0	4,089	11/15/2039	3.B FE
.89413C-AA-5	Trapeza CDO X Ltd-TRAP 2006-10A A1	D	07/08/2024	PAYDOWN		32,065	32,065	29,860	30,227	0	1,838										

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Identification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..98878C-AA-4	Z Capital Credit Partner-ZCCP 2018-1A A1	D	07/16/2024	PAYDOWN		3,886,294	3,886,294	3,886,294	3,886,294	0	0	0	0	0	3,886,294	0	0	0	226,178	01/16/2031	1.A FE
..98878C-AC-0	Z Capital Credit Partner-ZCCP 2018-1A A2	D	07/16/2024	PAYDOWN		1,036,345	1,036,345	1,019,504	1,053,186	0	(16,841)	0	(16,841)	0	1,036,345	0	0	0	58,598	01/16/2031	1.A FE
..98887T-AB-4	Zais Clo 6 Ltd-ZAIS6 2017-1A A2	D	07/15/2024	PAYDOWN		10,750,000	10,750,000	10,750,000	10,751,191	0	(1,191)	0	(1,191)	0	10,750,000	0	0	0	579,399	07/15/2029	2.A FE
..98887T-AQ-1	Zais Clo 6 Ltd-ZAIS6 2017-1A BR	D	07/15/2024	PAYDOWN		13,474,844	13,474,844	13,474,844	13,474,844	0	0	0	0	0	13,474,844	0	0	0	756,917	07/15/2029	1.A FE
..98944P-AB-3	Zephyrus Capital Aviatio-ZCAP 2018-1 A	C	09/15/2024	PAYDOWN		401,114	401,114	395,171	398,683	0	2,431	0	2,431	0	401,114	0	0	0	11,850	10/15/2038	2.B FE
..000000-00-0	CRANEMERE UK HLDGS I 12.50 PIK 6/30/24	D	09/30/2024	MATURITY		(2,985,650)	(2,985,650)	(2,985,650)	(2,985,650)	0	0	0	0	0	(2,985,650)	0	0	0	0	06/30/2025	5.B GI
..P4900*-AA-4	Gran Americas Usme Provi Senior Secured	D	08/31/2024	SINKING PAYMENT		168,303	168,303	168,303	168,303	0	0	0	0	0	168,303	0	0	0	5,655	03/31/2031	2.B PL
..P4900*-AB-2	Gran Americas Usme Provi Senior Secured	D	08/31/2024	SINKING PAYMENT		14,967	14,967	14,967	14,967	0	0	0	0	0	14,967	0	0	0	505	03/31/2031	2.B PL
..000000-00-0	Merrion Square Residenti-MERRI 2024-1A A	B	09/24/2024	PAYDOWN		482,236	482,236	466,831	0	0	2,845	0	2,845	0	469,676	12,561	0	12,561	0	03/24/2081	1.A FE
..Y5008*-AA-2	Knausen Holding LLC Senior Secured Notes	D	07/15/2024	SINKING PAYMENT		752,400	752,400	752,400	752,400	0	0	0	0	0	752,400	0	0	0	21,287	07/15/2027	2.B FE
..72303#-AA-7	Pinebridge Private Credit Rated Feeder, L.P.		07/05/2024	BUY		2,584,972	0	0	0	0	0	0	0	0	2,584,970	0	0	0	0	12/31/2031	1.E PL
1109999999. Subtotal - Bonds - Industrial and Miscellaneous (Unaffiliated)						1,528,692,426	1,574,815,442	1,552,530,315	1,494,729,539	5,638	7,879,986	183,360	7,702,264	0	1,566,472,446	(6,193)	(37,773,831)	(37,780,024)	64,865,274	XXX	XXX
..26441C-BG-9	Duke Energy Corp-DUKE ENERGY COR		09/16/2024	CALL 100		6,611,000	6,611,000	6,528,363	0	0	282	0	282	0	6,528,645	0	82,355	82,355	322,286	01/01/9999	2.C FE
..29336U-AH-0	ENLK Float PERP		09/17/2024	CALL 100		31,809,000	31,809,000	31,618,070	0	0	2,200	0	2,200	0	31,620,270	0	188,730	188,730	1,236,831	01/01/9999	3.B FE
..808513-BJ-3	Charles Schwab Corp/The-JR SUBORDINATED		09/16/2024	BNP PARIBAS		5,072,828	5,781,000	4,906,624	4,906,653	0	56	0	56	0	4,906,709	0	166,118	166,118	183,707	01/01/9999	2.C FE
..85747T-BA-0	State Street Corp-STT 5 5/8 PERP		09/16/2024	CALL 100		3,000,000	3,000,000	2,340,000	2,351,903	0	6,658	0	6,658	0	2,350,626	0	649,374	649,374	151,494	01/01/9999	2.A FE
..89832Q-AF-6	Truist Financial Corp-TFC 5.1 PERP		09/16/2024	SEAPORT GROUP		28,762,500	29,500,000	29,500,000	29,500,000	0	0	0	0	0	29,500,000	0	(737,500)	(737,500)	1,571,367	01/01/9999	2.C FE
..29250N-BC-8	Enbridge Inc-SUBORDINATED	A	08/23/2024	BARCLAYS CAPITAL INC		4,775,000	4,775,000	4,775,911	98	0	98	0	98	0	4,776,010	0	(1,010)	(1,010)	320,243	07/15/2080	2.C FE
..29250N-BP-9	Enbridge Inc-ENBON 7 5/8 01/15/2083	A	08/23/2024	JEFFERIESLLC		6,270,000	6,000,000	6,000,000	6,000,000	0	0	0	0	0	6,000,000	0	270,000	270,000	509,604	01/15/2083	2.C FE
..62582P-AA-8	Muenchener Rueckversiche-SUBORDINATED	D	09/17/2024	JP MORGAN SECURITIES		5,212,500	5,000,000	5,000,000	5,000,000	0	0	0	0	0	5,000,000	0	212,500	212,500	240,712	05/23/2042	1.F FE
..65557C-AN-3	NORDEA BANK AB-NDASS 6 1/8 PERP	D	09/23/2024	CALL 100		8,000,000	8,000,000	7,931,250	7,930,416	0	2,268	0	2,268	0	7,932,685	0	67,315	67,315	490,000	01/01/9999	2.B FE
1309999999. Subtotal - Bonds - Hybrid Securities						99,512,828	100,701,000	98,599,307	60,464,883	0	11,562	0	11,562	0	98,614,945	0	897,882	897,882	5,026,244	XXX	XXX
..06759U-AA-1	Barings Clo Ltd 2022-II-BABSN 2022-2A A	D	07/15/2024	PAYDOWN		5,000,000	5,000,000	4,895,000	4,881,478	0	118,522	0	118,522	0	5,000,000	0	0	0	270,944	07/15/2035	1.A
..06759U-AC-7	Barings Clo Ltd 2022-II-BABSN 2022-2A B1	D	07/15/2024	PAYDOWN		10,000,000	10,000,000	10,000,000	10,000,000	0	0	0	0	0	10,000,000	0	0	0	594,971	07/15/2035	1.C
..06759U-AE-3	Barings Clo Ltd 2022-II-BABSN 2022-2A C	D	07/15/2024	PAYDOWN		5,000,000	5,000,000	5,000,000	5,000,000	0	0	0	0	0	5,000,000	0	0	0	322,131	07/15/2035	1.F
..06759U-AG-8	Barings Clo Ltd 2022-II-BABSN 2022-2A D	D	07/15/2024	PAYDOWN		5,000,000	5,000,000	5,000,000	5,000,000	0	0	0	0	0	5,000,000	0	0	0	363,839	07/15/2035	2.C
..06761C-AL-3	Barings CLO Ltd 2016-II-BABSN 2016-2A AR	D	07/22/2024	PAYDOWN		1,690,337	1,690,337	1,653,995	1,657,147	0	33,190	0	33,190	0	1,690,337	0	0	0	86,633	01/20/2032	1.A
..06761K-AL-5	Barings CLO Ltd 2019-III-BABSN 2019-3A A	D	07/22/2024	PAYDOWN		81,380	81,380	80,183	79,965	0	1,414	0	1,414	0	81,380	0	0	0	4,171	04/20/2031	1.A
..06763C-AE-7	Babson CLO Ltd/Cayman Is-BABSN LP-2A D	D	07/20/2024	PAYDOWN		2,882,570	2,882,570	2,882,570	2,882,570	0	0	0	0	0	2,882,570	0	0	0	48,702	01/20/2034	2.C
..067930-AA-5	Barings Private Credit C-BPCC 2023-1A A1	D	09/17/2024	PAYDOWN		20,200,856	20,200,856	20,200,856	20,200,856	0	0	0	0	0	20,200,856	0	0	0	1,421,352	07/15/2031	1.A
..067930-AC-1	Barings Private Credit C-BPCC 2023-1A A2	D	09/17/2024	PAYDOWN		8,000,000	8,000,000	8,000,000	8,000,000	0	0	0	0	0	8,000,000	0	0	0	632,910	07/15/2031	1.C
1509999999. Subtotal - Bonds - Parent, Subsidiaries and Affiliates						57,855,143	57,855,143	57,712,604	57,702,016	0	153,126	0	153,126	0	57,855,143	0	0	0	3,745,653	XXX	XXX
..00177#-AA-1	AMF Levered II, LLC - Revolver		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	3,904	03/26/2031	1.C PL
..00221*-AB-9	ASC Communications LLC 2022 Term Loan		09/30/2024	VARIOUS		0	0	0	0	0	0	0	0	0	0	0	0	0	10,108	07/15/2027	4.B
..00228*-AA-4	AMERICAN TECHNOLOGIES LLC - TERM LOAN		07/23/2024	CA_CASH_CLOSE		5,569	5,569	5,569	5,569	0	0	0	0	0	5,569	0	0	0	302	07/31/2026	1.G PL
..00228*-AB-2	ATI RESTORATION LLC - INITIAL DDTL		07/23/2024	CA_CASH_CLOSE		1,931	1,931	1,931	1,931	0	0	0	0	0	1,931	0	0	0	873	07/31/2026	1.G PL
..00241#-AA-5	AMF ENDEAVOUR, LLC, - Senior Secured Loa		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	1,283	10/02/2033	1.F PL
..00242*-AC-2	AirX Climate Solutions Inc - Term Loan		09/20/2024	VARIOUS		583,420	583,711	569,119	569,119	0	0	0	0	0	569,119	0	14,301	14,301	63,582	11/07/2029	4.C Z
..00452#-AA-7	Accommodations Plus Technologies LLC/Ter		07/23/2024	VARIOUS		6,340	6,340	6,340	6,340	0	0	0	0	0	6,340	0	0	0	(1,465)	05/11/2025	4.B PL
..00453#-AB-6	Accurus Aerospace Corporation - 2022 A-1		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	276	04/05/2028	5.A
..00463#-AA-6	Accuserve Solutions, Inc. - Term Loan		09/30/2024	CA_CASH_CLOSE		9,526	9,526	9,526	9,526	0	0	0	0	0	9,526	0	0	0	0	08/11/2029	4.B PL
..00517#-AA-2	AD BIDCO INC INITIAL TERM LN		09/18/2024	VARIOUS		586,101	599,592	584,602	0	0	0	0	0	0	584,602	0	1,499	1,499	38,229	03/13/2030	5.B GI
..00751#-AA-7	ADVANCED BIOLOGICS LLC TERM A LN		09/23/2024	VARIOUS		436,014	436,014	425,114	425,114	0	0	0	0	0	425,114	0	10,900	10,900	35,679	10/18/2028	4.C Z
..00777Y-AC-0	Adviser Investments - 2022 Delayed Draw		09/30/2024	CA_CASH_CLOSE		453	453	453	453	0	0	0	0	0	453	0	0	0	47	08/31/2028	4.B
..00777Y-AD-8	Adviser Investments - 2022 1st Lien Term		09/30/2024	CA_CASH_CLOSE		1,095	1,095	1,073	1,073	0	0	0	0	0	1,073	0	22	22	140	08/31/2028	4.B
..00797*-AA-5	Aero Operating LLC/Term Loan 1/20		07/01/2024	CA_CASH_CLOSE		3,119	3,119	3,119	3,119	0	0	0	0	0	3,119	0	0	0	614	02/07/2026	3.B PL
..00797*-AB-3	Aero Operating LLC/Delayed Draw Term Loa		07/01/2024	CA_CASH_CLOSE		318	318	318	318	0	0	0	0	0	318	0	0	0	70	02/07/2026	3.B PL
..00843#-AA-7	AffiniPay Midco, LLC/Term Loan 2/20		09/06/2024	CA_CASH_CLOSE		282,560	282,560	282,560	282,560	0	0	0	0	0	282,560	0	0	0	46,860	03/02/2026	3.B PL

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-ign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..008430-AB-5	AFFINIPAY MIDCO LLC - INCREMENTAL TERM .....	.....	09/06/2024	VARIOUS .....	.....	28,629	28,629	28,629	28,629	0	0	0	0	0	28,629	0	0	0	5,774	03/02/2026	3.B PL
..008430-AC-3	AFFINIPAY MIDCO LLC - 2ND AMENDMENT TL .....	.....	09/06/2024	CA_CASH_CLOSE .....	.....	71,271	71,271	71,271	71,271	0	0	0	0	0	71,271	0	0	0	13,453	03/02/2026	3.B PL
..00910#-AG-0	Air Comm Corporation LLC - 2021 Incremen .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	330	06/01/2027	4.B PL
..00911*-AA-6	Air Comm Corporation LLC - 2023 Increme .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	.....	07/01/2027	4.B PL
..02124T-AA-1	Qatar Airways Senior Term Loa .....	.....	08/15/2024	CA_CASH_CLOSE .....	.....	589,366	589,366	587,016	587,016	0	0	0	0	0	587,016	0	2,350	2,350	21,729	05/06/2031	1.D PL
..03233*-AA-1	Amtech Software - Term Loan .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	41,834	11/02/2027	5.A
..03233*-AC-7	Amtech Software - Delayed Draw Term Loan .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	18,114	11/02/2027	5.A
..03272*-AB-1	ANAQUA PARENT HOLDINGS INC. - DELAYED D .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	5	04/10/2026	3.B PL
..04940J-AB-9	Atlas Securitized Products Funding 1 LP .....	.....	07/31/2024	VARIOUS .....	.....	64,860,411	66,235,787	64,860,411	0	0	0	0	0	0	64,860,411	0	0	0	(67,495)	05/25/2063	1.G PL
..04940J-AC-7	Atlas Securitized Products Funding 1 LP .....	.....	07/31/2024	VARIOUS .....	.....	32,135,670	32,413,257	32,135,670	0	0	0	0	0	0	32,135,670	0	0	0	(335,837)	05/25/2063	1.G PL
..04941*-AA-2	Atlas Securitized Products Funding 1 LP .....	.....	09/19/2024	CA_CASH_CLOSE .....	.....	30,686,384	30,686,384	30,305,620	0	0	0	0	0	0	30,305,620	0	380,764	380,764	34,289	05/25/2063	1.D PL
..04941*-AB-0	Atlas Securitized Products Funding 1 LP .....	.....	09/19/2024	CA_CASH_CLOSE .....	.....	15,016,741	15,016,741	14,942,470	0	0	0	0	0	0	14,942,470	0	74,271	74,271	21,492	05/25/2063	1.D PL
..04941*-AC-8	Atlas Securitized Products Funding 1 LP .....	.....	09/19/2024	CA_CASH_CLOSE .....	.....	30,686,384	30,686,384	30,305,620	0	0	0	0	0	0	30,305,620	0	380,764	380,764	44,029	05/25/2063	1.G PL
..04941*-AD-6	Atlas Securitized Products Funding 1 LP .....	.....	09/19/2024	CA_CASH_CLOSE .....	.....	15,016,741	15,016,741	14,942,470	0	0	0	0	0	0	14,942,470	0	74,271	74,271	25,806	05/25/2063	1.G PL
..049650-AA-1	Atreides Funding Trust - Pass-Through In .....	.....	09/18/2024	CA_CASH_CLOSE .....	.....	2,092,657	2,092,657	2,092,657	2,092,657	0	0	0	0	0	2,092,657	0	0	0	15,339	11/18/2083	1.G PL
..054640-AA-2	Axiom Merger Sub Inc./Facility B Term Lo .....	.....	07/23/2024	VARIOUS .....	.....	3,516	3,389	3,439	0	0	0	0	0	0	3,439	0	77	77	441	04/10/2026	3.B PL
..05631*-AB-2	BREDIF MM LSA LLC - Term Loan Series 202 .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	28,041	10/20/2027	1.E PL
..05631*-AC-0	BREDIF MM LSA LLC - Term Loan Series 202 .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	44,811	10/20/2027	1.E PL
..05631*-AD-8	BREDIF MM LSA LLC - Term Loan Series 202 .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	11,424	10/01/2025	1.E PL
..056340-AB-7	BS13 Hold Teal Inc. - First Lien Term Lo .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	2,482	08/21/2028	2.C PL
..066830-AA-7	BANYAN SOFTWARE HOLDINGS LLC - TERM LOA .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	2,100	2,100	2,100	2,100	0	0	0	0	0	2,100	0	0	0	359	10/30/2026	3.B PL
..066830-AB-5	BANYAN SOFTWARE HOLDINGS LLC - DELAYED .....	.....	07/23/2024	VARIOUS .....	.....	600	600	600	600	0	0	0	0	0	600	0	0	0	(10,271)	10/30/2026	3.B PL
..07363*-AD-8	BEACON MOBILITY CORP AMEND NO 4 DDTL .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	26,403	26,403	26,403	26,403	0	0	0	0	0	26,403	0	0	0	4,684	12/31/2025	4.C
..088900-AB-0	Beyond Risk - Delayed Draw Term Loan .....	.....	09/18/2024	VARIOUS .....	.....	3,107,783	3,171,207	3,107,899	1,181,193	0	0	0	0	0	3,107,899	0	(116)	(116)	223,219	10/08/2027	4.C
..10483*-AC-9	BRAGG LIVE FOOD PRODUCTS LLC - TERM LOAN .....	.....	09/25/2024	CA_CASH_CLOSE .....	.....	134,277	134,277	134,277	134,277	0	0	0	0	0	134,277	0	0	0	16,711	12/29/2025	3.A PL
..10947U-AC-2	BrightSign - Term Loan .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	5,580	5,580	5,524	5,526	0	0	0	0	0	5,526	0	54	54	1,181	10/14/2027	3.A PL
..124640-AA-0	CAI Software - Term Loan .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	281	12/10/2028	5.A
..12721#-AB-7	CVP Holdco, Inc./Delayed Draw Term Loan .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	511,634	511,634	511,634	511,634	0	0	0	0	0	511,634	0	0	0	38,113	10/31/2025	3.B PL
..12721#-AB-5	CVP Holdco Inc./Term Loan 10/19 .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	555,922	555,922	555,922	555,922	0	0	0	0	0	555,922	0	0	0	31,523	10/31/2025	3.B PL
..12721#-AC-3	CVP HOLDCO INC. - DELAYED DRAW TERM LOA .....	.....	07/31/2024	CA_CASH_CLOSE .....	.....	440,299	440,299	440,299	440,299	0	0	0	0	0	440,299	0	0	0	34,436	10/31/2025	3.B PL
..127560-AA-7	Cogency Global - Term Loan .....	.....	09/18/2024	VARIOUS .....	.....	3,935,625	3,935,625	3,856,913	3,856,913	0	0	0	0	0	3,856,913	0	78,713	78,713	446,103	02/14/2028	4.C Z
..127560-AB-5	CGI PARENT LLC 1st AMEND TERM LOAN .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	85	02/14/2028	4.C
..12758#-AD-7	CMFT RE Lending Sub MM, LLC - Term Loan .....	.....	07/12/2024	CA_CASH_CLOSE .....	.....	160,000	160,000	160,000	160,000	0	0	0	0	0	160,000	0	0	0	4,049	09/06/2027	1.F PL
..12758#-AA-2	CELF SPV LLC - Revolving Senior Secured .....	.....	07/19/2024	CA_CASH_CLOSE .....	.....	42,857,143	42,857,143	42,857,143	7,142,857	0	0	0	0	0	42,857,143	0	0	0	576,134	12/20/2029	1.F PL
..127810-AB-4	CRE II LENDER SUB I, LLC - Term Loan Ser .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	17,294	02/07/2028	1.F PL
..16117L-BW-8	Charter Communications O-CHTR TL B1 1L U .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	607	04/30/2025	2.C FE
..16117L-CB-3	Charter Communications I TL B-4 due Dece .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	1	11/30/2030	2.C FE
..185390-AA-6	Cleaver-Brooks Inc - 2022 Term Loan .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	76,342	07/14/2028	5.A
..185390-AA-8	Cleaver-Brooks Inc - 2022 Fixed PIK Term .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	11,133	07/14/2029	5.B GI
..186852-MM-5	CLIFFWATER ENHANCED LENDING FUND-Senior .....	.....	09/03/2024	CA_CASH_CLOSE .....	.....	5,749,129	5,749,129	5,749,129	0	0	0	0	0	0	5,749,129	0	0	0	62,658	07/19/2029	1.F Z
..19076*-AA-7	COBALT BUYER SUB INC. - CLOSING DATE TE .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	703	703	703	703	0	0	0	0	0	703	0	0	0	42	10/02/2028	3.A PL
..19076*-AB-5	COBALT BUYER SUB INC. - DELAYED DRAW TE .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	233	233	233	233	0	0	0	0	0	233	0	0	0	27	10/02/2028	3.A PL
..20470*-AB-5	Comply365 - 2023 Incremental Term Loan .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	4	12/21/2029	4.C Z
..212570-AC-8	Convey Health Solutions Inc./Term Loan .....	.....	09/03/2024	CA_CASH_CLOSE .....	.....	423,831	423,831	423,831	423,831	0	0	0	0	0	423,831	0	0	0	42,968	09/04/2026	3.A PL
..23344U-AC-4	DS Admiral Bidco LLC-DSADBI TL 1L USD .....	.....	09/19/2024	CA_CASH_CLOSE .....	.....	2,182,500	2,182,500	2,182,500	2,182,500	0	0	0	0	0	2,182,500	0	0	0	344,579	03/16/2028	3.A PL
..23345U-AB-5	Disa Holdings Corp. - Delayed Draw Term .....	.....	07/01/2024	CA_CASH_CLOSE .....	.....	400	400	400	400	0	0	0	0	0	400	0	0	0	35	09/09/2028	3.A PL

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Identification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..23345U-AD-1	Disa Holdings Corp. - Term Loan A		07/03/2024	CA_CASH_CLOSE		1,066	1,066	1,034	1,034	0	0	0	0	0	1,034	0	32	32	154	09/09/2028	3.A PL
..23345U-AE-9	DISA Holdings Corp. - 2024 2nd Amendment		07/01/2024	CA_CASH_CLOSE		707	707	696	696	0	0	0	0	0	696	0	11	11	23	09/09/2028	4.C Z
..23363#-AB-5	DRS Holdings III Inc./Term Loan 11/19		08/30/2024	CA_CASH_CLOSE		11,697	11,697	11,697	11,697	0	0	0	0	0	11,697	0	0	0	632	11/01/2025	4.A PL
..23363#-AC-3	DRS HOLDINGS III INC. - 2021 TERM LOAN		08/30/2024	CA_CASH_CLOSE		8,475	8,475	8,475	8,475	0	0	0	0	0	8,475	0	0	0	799	11/01/2025	3.A PL
..239426-AD-1	DAWSON RATED FUND 6-R1 LP - Secured Clas		09/16/2024	CA_CASH_CLOSE		1,226,206	1,226,206	1,226,206	0	0	0	0	0	0	1,226,206	0	0	0	0	06/15/2034	1.G PL
..239426-AF-6	DAWSON RATED FUND 6-R1 LP - Secured Clas		09/16/2024	CA_CASH_CLOSE		153,276	153,276	153,276	0	0	0	0	0	0	153,276	0	0	0	0	06/15/2034	2.C PL
..24360#-AC-6	DECOPAC INC. - TERM B LOAN		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	62	05/15/2028	3.B PL
..24823#-AA-1	DENALI HOLDCO LLC		07/17/2024	CA_CASH_CLOSE		366,579	366,579	366,579	366,579	0	0	0	0	0	366,579	0	0	0	74,736	09/15/2027	3.B PL
..26745L-AC-2	Dwyer Instruments Inc - Term Loan		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	585	07/01/2027	5.A
..26745L-AE-8	Dwyer Instruments Inc - 2023 Incremental		09/30/2024	CA_CASH_CLOSE		899	899	881	881	0	0	0	0	0	881	0	18	18	64	07/21/2027	5.A
..26745L-AF-5	Dwyer Instruments Inc - 2022 Upsize Dela		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	24	07/21/2027	4.C Z
..26789#-AA-6	DYNAMIC NC AEROSPACE HOLDINGS LLC - TER		07/01/2024	CA_CASH_CLOSE		4,456	4,456	4,456	4,456	0	0	0	0	0	4,456	0	0	0	382	12/30/2026	2.C PL
..26869#-AA-1	Standard Elevator Systems - Term Loan		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	214	12/02/2027	5.B GI
..26869#-AB-9	Standard Elevator Systems - Delayed Draw		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	55	12/02/2027	5.B GI
..26887#-AA-9	EP HEALTH ADVISORS LLC - TERM LOAN		07/26/2024	CA_CASH_CLOSE		490,826	490,826	490,826	490,826	0	0	0	0	0	490,826	0	0	0	43,994	09/04/2026	1.G PL
..28619*-AA-2	ELEMICA PARENT INC. - DELAYED DRAW TERM		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	4,404	09/18/2025	3.B PL
..28619*-AB-0	Elemica Parent Inc./Term Loan 9/19		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	20,328	09/18/2025	3.B PL
..28619*-AC-8	ELEMICA PARENT INC. - AMENDMENT NO. 1 T		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	2,469	09/18/2025	3.B PL
..28619*-AD-6	ELEMICA PARENT INC. - AMENDMENT NO. 1 D		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	7,308	09/18/2025	5.B GI
..28622#-AA-5	ELEVATION SERVICES PARENT HOLDINGS LLC		07/23/2024	CA_CASH_CLOSE		450	450	450	450	0	0	0	0	0	450	0	0	0	41	12/18/2026	3.A PL
..28622#-AB-3	ELEVATION SERVICES PARENT HOLDINGS LLC		07/23/2024	CA_CASH_CLOSE		600	600	600	600	0	0	0	0	0	600	0	0	0	69	12/18/2026	3.A PL
..28931#-AB-9	Macon County Georgia School District - B		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	112,017	03/06/2025	3.B PL
..29251#-AB-9	Encina Business Credit SPV LLC Revolving		09/04/2024	CA_CASH_CLOSE		6,240,000	6,240,000	6,240,000	0	0	0	0	0	0	6,240,000	0	0	0	352,555	07/07/2028	2.B PL
..29643*-AC-6	EShipping LLC DDTL		09/30/2024	CA_CASH_CLOSE		737	737	737	737	0	0	0	0	0	737	0	0	0	1,106	11/05/2027	4.B
..29668#-AA-6	ESSENTIAL SERVICES HOLDING CORPORATION -		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	812	11/16/2026	3.B PL
..29668#-AB-4	ESSENTIAL SERVICES HOLDING CORPORATION -		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	1,400	11/16/2026	3.B PL
..29668#-AC-2	ESSENTIAL SERVICES HOLDING CORPORATION -		08/26/2024	CA_CASH_CLOSE		52	52	52	52	0	0	0	0	0	52	0	0	0	134,791	11/16/2026	3.B PL
..30319*-AA-1	FSS Buyer LLC Initial Term Loan		09/30/2024	CA_CASH_CLOSE		18,633	18,633	18,260	18,278	0	0	0	0	0	18,278	0	355	355	3,689	08/31/2028	3.B PL
..31168#-AA-9	Fasanara Apex 3 12/22/25		07/15/2024	CA_CASH_CLOSE		4,518,272	4,518,272	4,522,152	4,522,152	0	0	0	0	0	4,522,152	0	(3,880)	(3,880)	415,044	12/22/2025	2.C PL
..32013#-AA-2	FIRST EAGLE DIRECT LENDING V-B, LLC - Se		09/25/2024	CA_CASH_CLOSE		9,533,085	9,533,085	9,533,085	9,533,085	0	0	0	0	0	9,533,085	0	0	0	612,282	06/16/2029	1.D PL
..34960#-AC-7	Fortis Payment Systems LLC - 2022 Term L		09/20/2024	VARIOUS		1,211,773	1,232,980	1,189,483	1,189,483	0	0	0	0	0	1,189,483	0	22,290	22,290	135,667	02/13/2026	4.C
..34960#-AD-5	FORTIS PAYMENT SYSTEMS LLC 10TH AMEND DD		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	30	02/13/2026	4.C
..34960#-AE-3	Fortis Payment Systems LLC 10TH AMEND TE		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	1	02/13/2026	4.C
..34962B-AB-6	Fortis Payment Systems LLC - 2022 Delaye		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	74	02/13/2026	4.C
..35042#-AC-6	FOUNDATION CONSUMER BRANDS LLC - TERM L		09/10/2024	CA_CASH_CLOSE		11,933	11,933	11,933	11,933	0	0	0	0	0	11,933	0	0	0	851	10/01/2026	2.C PL
..35042#-AA-2	Foundation Finance Trust - Fixed Class A		09/15/2024	CA_CASH_CLOSE		4,567,163	4,567,163	4,553,416	4,553,416	0	0	0	0	0	4,553,416	0	13,747	13,747	246,180	10/15/2042	1.A PL
..36152#-AA-4	GB EAGLE BUYER INC INITIAL TERM LN		09/30/2024	CA_CASH_CLOSE		5,085	5,242	5,085	5,085	0	0	0	0	0	5,085	0	157	157	614	12/01/2028	4.C
..36457W-AD-3	GALWAY BORROWER LLC - CLOSING DATE TERM		07/02/2024	CA_CASH_CLOSE		938	938	938	938	0	0	0	0	0	938	0	0	0	133	09/29/2028	3.B PL
..38870#-AG-8	GraphPad Software Inc. ProteinMetrics In		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	89,497	04/27/2027	5.A
..38870#-AH-6	GraphPad Software Inc. DDTL		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	22,277	04/27/2027	4.C Z
..40348#-AB-9	Gutter Buyer, Inc. - Term Loan Tranche A		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	407,942	03/08/2025	3.B PL
..40476#-AB-5	Hanley Wood LLC - 2021 Incremental Term		08/19/2024	CA_CASH_CLOSE		19,761	19,761	19,366	19,371	0	0	0	0	0	19,371	0	391	391	2,455	12/10/2024	4.C
..40476#-AC-3	Hanley Wood LLC - 2021 Delayed Draw Term		08/19/2024	CA_CASH_CLOSE		3,333	3,333	3,333	3,333	0	0	0	0	0	3,333	0	0	0	413	12/10/2024	4.C
..40481#-AA-8	HH - STELLA INC. - INITIAL TERM LOAN		07/23/2024	CA_CASH_CLOSE		1,204	1,204	1,204	1,204	0	0	0	0	0	1,204	0	0	0	290	04/24/2028	3.B PL
..40481#-AB-6	HH - STELLA INC. - DELAYED DRAW TERM LO		07/23/2024	VARIOUS		213	213	213	213	0	0	0	0	0	213	0	0	0	(713)	04/24/2028	3.B PL
..40487*-AC-2	HV Voyage L.P. - 1st Lien Term Loan (Par		09/05/2024	CA_CASH_CLOSE		148,026	148,026	148,026	148,026	0	0	0	0	0	148,026	0	0	0	16,616	03/15/2028	1.F PL

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-ign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..40490#-AF-8	HTI Technology & Industries - 2023 Delay ....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	2	07/27/2025	5.A
..40494#-AA-3	HXSG Intermediary 2 LLC - Term Loan .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	84	11/28/2029	4.C Z
..40494#-AB-1	HXSG INTERMEDIARY 2 LLC INITIAL DDTL .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	2	11/28/2029	4.C Z
..42258#-AA-7	HEAVY CONSTR SYS SPECIALISTS LLC INITIAL .....	.....	09/18/2024	VARIOUS .....	.....	1,990,947	1,994,937	1,955,038	1,955,821	4	0	0	4	0	1,955,821	35,125	35,125	218,812	11/16/2028	5.A	
..42328D-AG-3	Helios Software Holdings EUR TLB (Mar'21) .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	2,902	03/11/2028	4.B FE	
..42981#-AA-9	HIGH STREET BUYER INC. - DELAYED DRAW T .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	24	04/14/2028	3.B PL
..42983#-AA-7	HIGH STREET BUYER INC. - TERM LOAN B .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....700	700	700	700	0	0	0	0	0	700	0	0	0	139	04/14/2028	3.B PL
..42983#-AB-5	HIGH STREET BUYER INC. - DELAYED DRAW T .....	.....	07/02/2024	CA_CASH_CLOSE .....	.....	.....405	405	405	405	0	0	0	0	0	405	0	0	0	58	04/14/2028	3.B PL
..42983#-AC-3	HIGH STREET BUYER INC. - DELAYED DRAW T .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....921	921	921	921	0	0	0	0	0	921	0	0	0	204	04/14/2028	3.B PL
..44961*-AB-1	Implus Footcare LLC/Initial Term Loan 0 .....	.....	07/26/2024	CA_CASH_CLOSE .....	.....	.....4,409	4,409	4,409	4,409	0	0	0	0	0	4,409	0	0	0	1,025	07/31/2025	3.C PL
..45054#-AA-6	ITI Intermodal - Term Loan .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....3,237	3,237	3,168	3,168	0	0	0	0	0	3,168	0	69	69	427	12/20/2027	3.A PL
..45054#-AB-4	ITI Intermodal INC - Delayed Draw Term L .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	9	12/21/2027	3.A PL
..45054#-AD-0	ITI Intermodal Inc. - 2023 Incremental T .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	19	12/20/2027	3.A PL
..45054#-AE-8	ITI Intermodal Inc. - 2023 Columbia Dela .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....499	499	499	499	0	0	0	0	0	499	0	0	0	91	12/21/2027	3.A PL
..45321*-AA-5	Implus Footcare LLC/Spenco Incremental .....	.....	07/26/2024	CA_CASH_CLOSE .....	.....	.....686	686	684	688	0	(2)	(2)	(2)	0	686	0	0	0	128	07/31/2025	3.C PL
..45686#-AB-0	Infrasripe LLC .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	5,485	10/31/2024	3.A PL
..45686#-AC-8	Infrasripe LLC Delayed Draw .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	4,285	10/31/2024	3.A PL
..46126#-AA-6	IntraPac International LLC/U.S. Term Loa .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	139	01/11/2026	3.B PL
..46126#-AB-4	INTRAPAC PARENT INC. - FIRST AMENDMENT T .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	2,305	01/11/2026	3.B PL
..47236#-AA-2	JEFFERIES DIRECT LENDING FUND II SPE LLC .....	.....	09/04/2024	CA_CASH_CLOSE .....	.....	3,028,382	3,028,382	3,028,382	3,028,382	0	0	0	0	0	3,028,382	0	0	0	50,483	06/17/2031	2.C PL
..47236#-AA-1	JEFFERIES DIRECT LENDING OFFSHORE FD II .....	.....	09/11/2024	CA_CASH_CLOSE .....	.....	3,005,309	3,005,309	3,005,309	3,005,309	0	0	0	0	0	3,005,309	0	0	0	56,792	06/17/2031	2.C PL
..47236*-AA-5	JEFFERIES DIRECT LENDING OFFSHORE FUND I .....	.....	09/11/2024	CA_CASH_CLOSE .....	.....	871,315	871,315	871,315	871,315	0	0	0	0	0	19,060	0	0	0	19,060	06/17/2031	2.C PL
..47236#-AA-3	JEFFERIES DIRECT LENDING FD II C SPE LLC .....	.....	09/04/2024	CA_CASH_CLOSE .....	.....	532,304	532,304	532,304	532,304	0	0	0	0	0	532,304	0	0	0	10,118	06/17/2031	2.C PL
..47237#-AA-0	JEFFERIES DIRECT LENDING OFFSHORE FUND I .....	.....	09/11/2024	CA_CASH_CLOSE .....	.....	2,964,672	2,964,672	2,964,672	2,964,672	0	0	0	0	0	2,964,672	0	0	0	35,958	06/17/2031	2.B PL
..48458#-AD-6	Kano Laboratories LLC - 2024 Incremental .....	.....	09/18/2024	VARIOUS .....	.....	872,733	874,832	857,335	0	0	0	0	0	0	857,335	0	15,397	15,397	79,786	11/19/2026	5.A
..48773#-AA-8	Kellermeyer Bergensons Services LLC/Ter .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	4,390	11/07/2026	4.A PL
..48773#-AB-6	Kellermeyer Bergensons Services LLC/202 .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	966	11/07/2026	4.A PL
..48773#-AC-4	KELLERMAYER BERGENSONS SERVICES LLC - 2 .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	69,821	11/07/2026	4.A PL
..48773#-AD-2	KELLERMAYER BERGENSONS SERVICES LLC - A .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	72,989	11/07/2026	4.B PL
..48773#-AH-3	Kellermeyer Bergensons Services, LLC - 2 .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	4,958	4,958	4,958	0	0	0	0	0	0	4,958	0	0	0	0	11/06/2028	4.A Z
..48881#-AB-5	Kene Acquisition Inc./Term Loan 8/19 .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	37,438	08/10/2026	3.B PL
..49375#-AA-0	DistroKid Senior Term Loa .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	1,414	10/01/2027	5.A
..50050#-AC-6	KONA BUYER LLC 2022 INCREMENTAL TERM LN .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	1,458,512	1,458,512	1,429,342	1,429,342	0	0	0	0	0	1,429,342	29,170	29,170	106,830	12/11/2027	4.B	
..50050#-AD-4	KONA BUYER LLC 2024 INCREMENTAL TERM LN .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	1,037,500	1,037,500	1,021,938	1,021,938	0	0	0	0	0	1,021,938	15,563	15,563	15,563	15,563	12/11/2027	4.B
..50541#-AA-5	Laboratories Bidco LLC/Term Loan 9/19 .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	1,133	1,133	1,133	1,133	0	0	0	0	0	1,133	0	0	0	90	07/23/2027	3.C PL
..50541#-AB-3	Laboratories Bidco LLC/Second Amendment .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	180	180	180	180	0	0	0	0	0	180	0	0	0	20	07/23/2027	3.C PL
..50541#-AC-1	LABORATORIES BIDCO LLC - THIRD AMENDMENT .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	1,151	1,151	1,151	1,151	0	0	0	0	0	1,151	0	0	0	123	07/23/2027	3.C PL
..50541#-AD-9	LABORATORIES BIDCO LLC - TL .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	5,443	5,443	5,443	5,443	0	0	0	0	0	5,443	0	0	0	630	07/23/2027	3.C PL
..50541#-AE-7	LABORATORIES BIDCO LLC - DELAYED DRAW TE .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	395	395	395	395	0	0	0	0	0	395	0	0	0	57	07/23/2027	5.B GI
..51206#-AA-9	LAKERS BUYER INC. - TERM LOAN .....	.....	07/03/2024	CA_CASH_CLOSE .....	.....	1,177	1,177	1,177	1,177	0	0	0	0	0	1,177	0	0	0	174	03/22/2027	3.C PL
..51206#-AB-7	LAKERS BUYER INC. - INITIAL DELAYED DRA .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	559	559	559	559	0	0	0	0	0	559	0	0	0	95	03/22/2027	3.C PL
..51513#-AA-7	LANDMARK EQUITY PARTNERS XV-D, LLC - C1 .....	.....	08/20/2024	CA_CASH_CLOSE .....	.....	672,954	672,954	672,954	672,954	0	0	0	0	0	672,954	0	0	0	17,972	07/14/2030	1.G PL
..52172*-AA-1	LeadsOnline - Term Loan .....	.....	09/18/2024	VARIOUS .....	.....	2,098,156	2,108,673	2,071,764	2,072,185	0	0	0	0	0	2,071,764	0	26,393	26,393	231,246	02/07/2028	5.A
..53173#-AA-4	LIDO ADVISORS LLC - INITIAL TERM LOAN .....	.....	07/17/2024	CA_CASH_CLOSE .....	.....	217,738	217,738	217,738	217,738	0	0	0	0	0	217,738	0	0	0	12,693	06/15/2027	2.C PL
..53173#-AB-2	LIDO ADVISORS LLC - DELAYED DRAW TERM L .....	.....	07/17/2024	CA_CASH_CLOSE .....	.....	276,550	276,550	276,550	276,550	0	0	0	0	0	276,550	0	0	0	16,133	06/15/2027	2.C PL
..53186*-AB-1	LIFE EXTENSION INSTITUTE INC RESTATEMENT .....	.....	09/30/2024	VARIOUS .....	.....	.....0	0	0	0	0	0	0	0	0	0	0	0	0	28,428	02/19/2026	5.A

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..55268@-AA-3	MB PURCHASER LLC INITIAL TERM LOAN		07/01/2024	CA_CASH_CLOSE		2,644	2,644	2,591	0	0	0	0	0	0	2,591	0	53	53	157	01/03/2030	5.B GI
..55314V-AR-7	MI OPCO HOLDINGS INC Term Loan TL-B		09/30/2024	CA_CASH_CLOSE		81,666	81,666	73,499	0	0	0	0	0	0	73,499	0	8,167	8,167	0	03/31/2028	4.B FE
..55343@-AC-2	MJX VENTURE SENIOR TL L+1.682 04/30/2031		07/20/2024	CA_CASH_CLOSE		813,061	813,061	813,061	813,146	0	0	0	0	0	813,146	0	(85)	(85)	30,047	04/30/2031	1.D PL
..55343@-AF-5	MJX Venture Mgmt III LLC Senior TL		07/31/2024	CA_CASH_CLOSE		12,500	12,500	12,500	12,500	0	0	0	0	0	12,500	0	0	0	1,198	07/30/2032	1.F PL
..55343@-AG-3	MJX Venture Mgmt III LLC Senior TL		07/20/2024	CA_CASH_CLOSE		172,629	172,629	172,629	172,613	0	0	0	0	0	172,613	0	16	16	24,439	10/15/2031	1.C PL
..55371*-AU-9	MRI Software LLC/Term Loan 2/20		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	24,850	02/10/2026	4.A PL
..55371*-AY-1	MRI SOFTWARE LLC - SECOND AMENMENT TERM		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	321	02/10/2026	4.A PL
..57233#-AB-1	Marshall Excelsior - Term Loan		07/19/2024	CA_CASH_CLOSE		446,253	446,253	438,444	438,444	0	0	0	0	0	438,444	0	7,809	7,809	49,383	02/18/2028	4.C
..57780@-AA-2	MAVERICK ACQUISITION INC. - TERM LOAN		07/23/2024	CA_CASH_CLOSE		780	780	780	780	0	0	0	0	0	780	0	0	0	138	06/01/2027	5.B PL
..57780@-AB-0	MAVERICK ACQUISITION INC. - DELAYED DRA		07/23/2024	CA_CASH_CLOSE		177	177	175	175	0	0	0	0	0	175	0	2	2	17	06/01/2027	5.B PL
..58522#-AA-1	MEGAWATT ACQUISITIONCO INC INITIAL TERM		09/18/2024	VARIOUS		991,433	1,009,355	989,168	0	0	0	0	0	0	989,168	0	2,266	2,266	35,288	03/01/2030	4.C Z
..59509#-AA-6	Micromeritics Instrument Corp./Term Loan		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	849	12/18/2025	2.B PL
..60937@-AA-8	MONICA HOLDOO (US) INC. - TERM LOAN		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	117	01/07/2028	2.C PL
..62900*-AA-9	NCWS INTERMEDIATE INC. - DELAYED DRAW T		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	15	12/29/2026	3.A PL
..62900*-AB-7	NCWS INTERMEDIATE INC. - CLOSING DATE T		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	4,058	12/29/2026	3.A PL
..62903@-AA-4	NAW Buyer LLC - Term Loan		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	61	09/13/2029	4.C Z
..62907@-AA-0	NEFCO Holding Company, LLC - Term Loan		07/01/2024	CA_CASH_CLOSE		1,308	1,308	1,282	1,282	0	0	0	0	0	1,282	0	26	26	310	08/05/2028	4.C
..62907@-AB-8	NEFCO Holding Company, LLC - Delayed Dra		07/01/2024	CA_CASH_CLOSE		198	198	198	198	0	0	0	0	0	198	0	0	0	24	08/05/2028	4.C
..62907@-AC-6	NEFCO Holding Company, LLC - Delayed Dra		07/01/2024	CA_CASH_CLOSE		198	198	198	198	0	0	0	0	0	198	0	0	0	36	08/05/2028	4.C
..62907@-AD-4	NEFCO Holding Company, LLC - Delayed Dra		07/01/2024	CA_CASH_CLOSE		238	238	238	238	0	0	0	0	0	238	0	0	0	49	08/05/2028	4.C
..62907@-AF-9	NEFCO Holding Company LLC - 2023 Amendme		07/01/2024	CA_CASH_CLOSE		84	84	82	82	0	0	0	0	0	82	0	2	2	5	08/05/2028	4.C Z
..62907@-AG-7	NEFCO Holding Company LLC - 2023 Delayed		07/01/2024	CA_CASH_CLOSE		452	452	452	0	0	0	0	0	0	452	0	0	0	23	08/05/2028	4.C Z
..62931*-AA-2	NMC Skincare Intermediate Holdings II L		07/10/2024	CA_CASH_CLOSE		1,459	1,459	1,459	1,459	0	0	0	0	0	1,459	0	0	0	12	10/31/2024	3.B PL
..62931*-AC-8	NMC Skincare Intermediate Holdings II L		07/10/2024	CA_CASH_CLOSE		487	487	487	487	0	0	0	0	0	487	0	0	0	19	10/31/2024	3.B PL
..63086*-AA-3	Narda-MITEQ - Incremental Term Loan		09/30/2024	BANK LOANS BARINGS		0	0	0	0	0	0	0	0	0	0	0	0	0	18,393	12/06/2027	5.B GI
..64027*-AA-3	NELIPAK HOLDINGS US TL L+425 07/02/2026		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	22,974	07/02/2026	3.A PL
..64027*-AB-1	NELIPAK HOLDING INC TL L+425 07/02/2026		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	3,424	07/02/2026	3.A PL
..65172*-AA-3	NEWPOINT JV SUB MM, LLC, - Term Loan Ser		09/18/2024	CA_CASH_CLOSE		213,852	213,852	213,852	213,852	0	0	0	0	0	213,852	0	0	0	5,796	01/08/2028	1.E PL
..65172*-AB-1	NEWPOINT JV SUB MM, LLC, - Term Loan Ser		09/18/2024	CA_CASH_CLOSE		36,148	36,148	36,148	36,148	0	0	0	0	0	36,148	0	0	0	953	02/27/2028	1.E PL
..65343@-AA-5	NEXT HOLDOO LLC CLOSING DT TERM LN		09/18/2024	VARIOUS		1,839,241	1,839,241	1,811,653	1,811,653	0	0	0	0	0	1,811,653	0	27,589	27,589	162,497	11/09/2030	3.B PL
..65412@-AA-1	NICOLA SP WAREHOUSE LENDER 1, LP - Senio		09/19/2024	CA_CASH_CLOSE		4,019,296	4,019,296	4,019,296	4,019,296	0	0	0	0	0	4,019,296	0	0	0	224,552	10/05/2028	1.F PL
..65412@-AB-9	NICOLA SP WAREHOUSE LENDER 1, LP - Senio		09/19/2024	CA_CASH_CLOSE		1,556,256	1,556,256	1,556,256	1,556,256	0	0	0	0	0	1,556,256	0	0	0	73,815	11/24/2028	1.F PL
..65412@-AC-7	NICOLA SP WAREHOUSE LENDER 1, LP - Senio		09/19/2024	CA_CASH_CLOSE		1,582,000	1,582,000	1,582,000	1,582,000	0	0	0	0	0	1,582,000	0	0	0	63,991	04/21/2028	1.F PL
..65412@-AD-5	NICOLA SP WAREHOUSE LENDER 1, LP - Senio		09/19/2024	CA_CASH_CLOSE		1,118,601	1,118,601	1,118,601	1,118,601	0	0	0	0	0	1,118,601	0	0	0	52,598	04/21/2028	1.F PL
..65716*-AB-4	NORTH AMERICAN SCIENCE ASSOCIATES INC.		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	15	09/15/2027	2.C PL
..65716@-AA-4	NORTH AMERICAN SCIENCE ASSOCIATES INC.		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	28	09/15/2027	2.C PL
..65716@-AB-2	NORTH AMERICAN SCIENCE ASSOCIATES INC.		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	4	09/15/2027	2.C PL
..67100#-AA-2	OC III LVS XXVI LP - Secured Loan Facili		07/25/2024	CA_CASH_CLOSE		1,256,456	1,256,456	1,256,456	1,256,456	0	0	0	0	0	1,256,456	0	0	0	132,672	11/20/2030	1.F PL
..67115E-AC-4	Omega Holdings - Senior Term Loan		09/30/2024	CA_CASH_CLOSE		2,030	2,030	1,989	1,989	0	0	0	0	0	1,989	0	41	41	234	03/31/2029	4.C
..67117*-AA-7	OA BUYER INC INITIAL TERM LN		09/30/2024	CA_CASH_CLOSE		9,361	9,361	9,174	9,174	0	0	0	0	0	9,174	0	187	187	934	12/20/2028	4.C
..68687@-AA-3	ORO Funding I LLC - Term Loan		09/16/2024	CA_CASH_CLOSE		139,052	139,052	139,052	139,052	0	0	0	0	0	139,052	0	0	0	3,121	05/25/2029	1.E PL
..69398*-AD-7	PDI TA Holdings Inc. - 2019 1st Lien Ter		09/30/2024	CA_CASH_CLOSE		14,000	14,000	13,992	13,992	0	0	0	0	0	13,992	0	8	8	0	10/24/2024	5.A
..69429@-AA-4	PDQ (PDQ TOPCO LP) First Lien Term		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	187	08/27/2027	5.A
..69429@-AB-2	PDQ (PDQ TOPCO LP) DDTL		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	141	08/27/2027	5.A
..69451*-AA-7	PPW AERO BUYER INC INITIAL TERM LN		09/18/2024	VARIOUS		1,510,011	1,510,011	1,449,611	1,449,611	0	0	0	0	0	1,449,611	0	60,400	60,400	196,899	02/15/2029	5.B GI
..69451*-AC-3	PPW AERO BUYER INC INCREMENTAL DDTL		08/07/2024	CA_CASH_CLOSE		58,859	58,859	58,859	0	0	0	0	0	0	58,859	0	0	0	441	02/15/2029	4.C Z

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22	
										11	12	13	14	15								
CUSIP Ident-ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol	
..70476X-AJ-4	PetVet Care Centers, LLC - 2020 Incremen		08/27/2024	CA_CASH_CLOSE		(370,313)	(370,313)	(370,313)	0	0	0	0	0	0	(370,313)	0	0	0	0	0	02/14/2025	4.B FE
..70559@-AA-4	Pegasus Global Enterprise Holdings LLC/		08/29/2024	CA_CASH_CLOSE		1,572,845	1,572,845	1,532,296	1,549,777	0	46	0	46	0	1,549,777	0	23,067	23,067	157,596	05/29/2025	3.A PL	
..70559@-AB-2	Pegasus Global Enterprise Holdings LLC/		08/29/2024	CA_CASH_CLOSE		458,599	458,599	458,599	458,599	0	0	0	0	0	458,599	0	0	0	58,399	05/29/2025	3.A PL	
..70559@-AD-8	Pegasus Global Enterprise Holdings LLC		08/29/2024	CA_CASH_CLOSE		460,287	460,287	460,287	460,287	0	0	0	0	0	460,287	0	0	0	61,261	05/29/2025	3.A PL	
..70559@-AE-6	PEGASUS GLOBAL ENTERPRISE HOLDINGS LLC		08/29/2024	CA_CASH_CLOSE		431,155	431,155	431,155	431,155	0	0	0	0	0	431,155	0	0	0	57,386	05/29/2025	3.A PL	
..70559@-AF-3	PEGASUS GLOBAL ENTERPRISE HOLDINGS LLC		08/29/2024	CA_CASH_CLOSE		204,312	204,312	204,312	204,312	0	0	0	0	0	204,312	0	0	0	37,251	05/29/2025	3.A PL	
..72305@-AA-7	PINEBRIDGE PRIVATE CREDIT III HOLDINGS L		07/22/2024	CA_CASH_CLOSE		684,452	684,452	684,452	684,452	0	0	0	0	0	684,452	0	0	0	18,931	12/31/2031	1.G PL	
..73103@-AA-9	Polara - Term Loan		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	1,514	12/03/2027	5.A	
..73103@-AB-7	Polara - 2022 Incremental Term Loan		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	1,448	12/03/2027	5.A	
..73112@-AB-6	Policy Services Company, 1L PIK Toggle T		07/25/2024	PIK NOTE BUY UP		0	0	0	0	0	0	0	0	0	0	0	0	0	(94)	06/21/2026	5.B Z	
..73112@-AC-4	Policy Services Company, 1L PIK Toggle D		07/25/2024	BANK LOANS BARINGS		0	0	0	0	0	0	0	0	0	0	0	0	0	(28,684)	06/21/2026	5.B Z	
..74066*-AA-4	PREMIER SPECIALTIES INC. - TERM LOAN		09/30/2024	CA_CASH_CLOSE		1,474	1,474	1,474	1,474	0	0	0	0	0	1,474	0	0	0	273	08/20/2027	3.B PL	
..74140@-AA-0	Project Potter Buyer LLC - Term Loan		09/30/2024	CA_CASH_CLOSE		6,838	6,838	6,838	6,838	0	0	0	0	0	6,838	0	0	0	411	04/23/2027	3.C PL	
..74140@-AB-8	PROJECT POTTER BUYER LLC - 2020 INCREME		07/23/2024	CA_CASH_CLOSE		751	751	751	751	0	0	0	0	0	751	0	0	0	44	04/23/2027	3.C PL	
..74140@-AC-6	PROJECT POTTER BUYER LLC - TERM LOAN		09/30/2024	CA_CASH_CLOSE		1,708	1,708	1,708	1,708	0	0	0	0	0	1,708	0	0	0	91	04/23/2027	3.C PL	
..74140@-AD-4	PROJECT POTTER BUYER LLC - DELAYED DRAW		09/30/2024	CA_CASH_CLOSE		579	579	579	579	0	0	0	0	0	579	0	0	0	34	04/23/2027	3.C PL	
..74273J-AE-3	Pro Mach Inc. First Lien Term		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	19,707	08/31/2028	4.C FE	
..74276@-AC-0	Process Insights - Term Loan		07/01/2024	CA_CASH_CLOSE		1,139	1,139	1,111	1,111	0	0	0	0	0	1,111	0	28	28	113	06/30/2029	5.B GI	
..74309@-AA-7	Production Resource Group, LLC - 2020 De		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	325	08/21/2029	4.C PL	
..74309@-AC-3	PRODUCTION RESOURCE GROUP L.L.C. - DELA		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	11	08/21/2029	5.B GI	
..74354@-AA-1	PROJECT ESSENTIAL BIDCO LLC - TERM LOAN		08/29/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	18	04/20/2028	3.C PL	
..74588@-AB-6	Puma Buyer TL 2029		07/31/2024	CA_CASH_CLOSE		50,000	50,000	46,500	46,500	0	0	0	0	0	46,500	0	3,500	3,500	18,216	07/14/2029	4.B PL	
..74923@-AB-3	RoadOne Intermodalogistics - Term Loan		09/30/2024	CA_CASH_CLOSE		3,062	3,062	2,945	2,945	0	0	0	0	0	2,945	0	116	116	600	12/30/2028	4.B PL	
..74923@-AC-1	R1 HLDGS LLC DELAYED DRAW TERM LN		09/30/2024	CA_CASH_CLOSE		236	236	236	236	0	0	0	0	0	236	0	0	0	45	12/30/2028	4.B PL	
..74972@-AB-0	RPX CORP Term Loan		09/30/2024	CA_CASH_CLOSE		3,966	3,966	3,906	3,906	0	0	0	0	0	3,906	0	59	59	0	08/02/2030	4.B Z	
..75279*-AA-4	RANDYS HLDGS INC INITIAL TERM LN		09/18/2024	VARIOUS		1,629,851	1,629,851	1,580,956	1,580,956	0	0	0	0	0	1,580,956	0	48,896	48,896	259,151	11/01/2028	4.C Z	
..75279*-AB-2	RANDYS HLDGS INC DELAYED DRAW TERM LOAN		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	1	11/01/2028	4.C Z	
..75445@-AA-1	RAWLINGS SPORTING GOODS COMPANY INC - T		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	63	12/31/2026	3.B PL	
..75645@-AA-9	Red Cedar Holdings BLP Cl A Ln		08/16/2024	CA_CASH_CLOSE		4,773,738	4,773,738	4,773,738	4,773,738	0	0	0	0	0	4,773,738	0	0	0	269,614	08/10/2030	1.D PL	
..76027@-AF-4	REP HS ACQ CORP / HEMASOURCE INITIAL TER		09/17/2024	BANK LOANS BARINGS		613,071	615,533	600,145	600,145	0	0	0	0	0	600,145	0	12,926	12,926	71,718	08/31/2029	4.C Z	
..78013@-AA-5	ROYAL BUYER LLC INITIAL TERM LN		09/30/2024	CA_CASH_CLOSE		4,550	4,550	4,459	4,459	0	0	0	0	0	4,459	0	91	91	1,176	08/31/2028	5.B GI	
..78029@-AF-6	ROYAL HOLDCO CORP DDTL A		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	(98)	12/30/2027	2.C PL	
..78432@-AB-8	SFE Intermediate Holdco LLC/Incremental		09/30/2024	CA_CASH_CLOSE		909	909	891	901	0	0	0	0	0	901	0	8	8	177	07/31/2026	2.B PL	
..7845@-AC-4	SEI HLDG I CORP/SINGER EQUITIES INC CLOS		08/30/2024	CA_CASH_CLOSE		726	726	726	726	0	0	0	0	0	726	0	0	0	120	03/27/2028	4.C Z	
..78486@-AC-1	SSE Buyer, Inc - 2022 2nd Lien Term Loan		09/30/2024	CA_CASH_CLOSE		344,299	344,299	344,299	0	0	0	0	0	0	344,299	0	0	0	0	12/01/2026	4.A PL	
..78494*-AA-7	SPC RECEIVABLES FDG II TR SECD REV LN FA		07/22/2024	CA_CASH_CLOSE		2,501,569	2,501,569	2,501,569	2,501,569	0	0	0	0	0	2,501,569	0	0	0	232,294	10/19/2029	1.G PL	
..78503@-AA-8	SPV FACILITY I LLC - Senior Secured Revo		09/03/2024	CA_CASH_CLOSE		14,000,000	14,000,000	14,000,000	0	0	0	0	0	0	14,000,000	0	0	0	108,704	03/31/2033	1.G PL	
..78642@-AA-4	SAFE HOME SECURITY INC. - TERM LOAN		08/04/2024	VARIOUS		555,819	555,819	555,819	555,819	0	0	0	0	0	555,819	0	0	0	64,443	08/04/2024	2.C PL	
..78642@-AB-2	SAFE HOME SECURITY INC. - DELAYED DRAW T		08/04/2024	VARIOUS		43,716	43,716	43,716	43,716	0	0	0	0	0	43,716	0	0	0	7,133	08/04/2024	2.B Z	
..79400@-AA-6	Saldon Holdings Inc./First Amendment Te		09/30/2024	CA_CASH_CLOSE		875	875	866	870	0	0	0	0	0	870	0	5	5	86	03/13/2025	3.B PL	
..79400@-AB-4	Saldon Holdings Inc./Term Loan 3/19		09/30/2024	CA_CASH_CLOSE		10,852	10,852	10,580	10,707	0	0	0	0	0	10,707	0	145	145	964	03/13/2025	3.B PL	
..79400@-AC-2	SALDON HOLDINGS INC. - SECOND AMENMENT		09/30/2024	CA_CASH_CLOSE		469	469	469	469	0	0	0	0	0	469	0	0	0	42	03/13/2025	5.B GI	
..80586@-AA-8	Scaled Agile Inc. - 2021 Delayed Draw Te		09/30/2024	CA_CASH_CLOSE		425	425	425	425	0	0	0	0	0	425	0	0	0	78	12/15/2028	2.C PL	
..80586@-AB-6	Scaled Agile Inc. - 2021 Unitranche Term		09/30/2024	CA_CASH_CLOSE		8,740	8,740	8,565	8,566	0	0	0	0	0	8,566	0	174	174	1,205	12/16/2028	2.C PL	
..816307-A@-1	SelectQuote Inc./Term Loan 10/19		09/30/2024	CA_CASH_CLOSE		8,665	8,665	8,665	8,665	0	0	0	0	0	8,665	0	0	0	4,140	11/05/2024	3.C PL	
..82419*-AB-9	Shermco Intermediate Holdings Inc. - 201		07/01/2024	CA_CASH_CLOSE		1,558	1,558	1,519	1,519	0	0	0	0	0	1,519	0	39	39	125	06/05/2026	3.B PL	

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident-ification	Description	For-ign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid-eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor-tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn-ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con-tractual Maturity Date	NAIC Desig-nation, NAIC Desig-nation Modifier and SVO Admini-strative Symbol
..82419*-AC-7	Shermco Intermediate Holdings Inc. - 202 ....	.....	07/01/2024	CA_CASH_CLOSE .....	.....	112	112	112	0	0	0	0	0	0	112	0	0	0	3	03/06/2025	3.B PL
..83176*-AA-2	Smartling Inc. - Term Loan .....	.....	09/18/2024	VARIOUS .....	.....	2,958,565	2,958,565	2,958,565	2,958,565	0	0	0	0	0	2,958,565	0	0	0	308,252	11/08/2027	4.B
..83176*-AB-0	Smartling Inc. - Delayed Draw Term Loan .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	73	11/08/2027	4.C Z
..83425*-AA-1	SOLO BUYER LP INITIAL TERM LN .....	.....	09/18/2024	VARIOUS .....	.....	2,218,986	2,232,380	2,176,571	2,176,571	0	0	0	0	0	2,176,571	0	42,415	42,415	391,471	12/01/2029	5.B GI
..84724*-AA-3	Sparus Holdings LLC - 1st Lien Term Loan .....	.....	09/10/2024	VARIOUS .....	.....	1,232,167	1,259,884	1,231,537	1,231,537	0	0	0	0	0	1,231,537	0	630	630	132,049	03/19/2027	4.C
..84724*-AB-1	Sparus Holdings LLC - Delayed Draw Term ....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	821	821	821	821	0	0	0	0	0	821	0	0	0	143	03/19/2027	4.C
..84724*-AA-5	Spatial Business Systems - Senior Term L .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	2,539	2,539	2,476	2,476	0	0	0	0	0	2,476	0	63	63	344	09/30/2028	5.A
..84724*-AB-3	Spatial Business Systems - Delayed Draw .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	2,344	2,344	2,344	2,344	0	0	0	0	0	2,344	0	0	0	348	10/03/2028	4.C Z
..84967*-AA-9	SPRING INSURANCE SOLUTIONS LLC - INITIA .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	1,108	1,108	1,108	1,108	0	0	0	0	0	1,108	0	0	0	189	11/24/2025	3.A PL
..84967*-AB-7	SPRING INSURANCE SOLUTIONS LLC - DELAYE .....	.....	07/23/2024	CA_CASH_CLOSE .....	.....	188	188	188	188	0	0	0	0	0	188	0	0	0	7	11/24/2025	3.A PL
..85789*-AA-2	STEALTH HOLDING LLC - U.S. INITIAL TERM .....	.....	07/01/2024	CA_CASH_CLOSE .....	.....	572	572	572	572	0	0	0	0	0	572	0	0	0	66	03/02/2026	4.A PL
..85789*-AB-0	STEALTH HOLDING LLC - DELAYED DRAW TERM .....	.....	07/01/2024	VARIOUS .....	.....	(259)	(259)	(259)	(259)	0	0	0	0	0	(259)	0	0	0	1,137	03/02/2026	4.A PL
..86602*-AH-2	Summit Buyer L.L.C. ....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	16,846	01/14/2026	3.B PL
..86614*-AK-4	Summit Materials Cos I L New Incremental .....	.....	07/01/2024	CA_CASH_CLOSE .....	.....	11,905	11,905	11,875	11,875	0	0	0	0	0	11,875	0	30	30	199	11/30/2028	2.C FE
..86662*-AA-2	SUN ACQUIRER CORP .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	4,968	4,968	4,968	4,968	0	0	0	0	0	4,968	0	0	0	330	09/08/2028	3.B Z
..86662*-AB-0	SUN ACQUIRER CORP .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	3,428	3,428	3,428	3,428	0	0	0	0	0	3,428	0	0	0	162	09/08/2028	3.B Z
..86822*-AA-1	SUPERJET BUYER LLC INITIAL TERM LN .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	208	12/30/2027	5.A
..87300*-AB-0	THG Acquisition LLC - 2019 Term Loan .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	1,063	1,063	1,063	1,063	0	0	0	0	0	1,063	0	0	0	71	12/02/2026	4.C
..87300*-AC-8	THG ACQUISITION LLC Delayed Draw Term Ln ....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	298	298	298	298	0	0	0	0	0	298	0	0	0	22	12/02/2026	4.C
..87300*-AE-4	THG Acquisition LLC - 2020 Delayed Draw .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	82	12/02/2026	3.A PL
..87304*-AA-6	TOP HAWKER INTER LLC 2ND INCREMENTAL TER .....	.....	07/02/2024	CA_CASH_CLOSE .....	.....	376	376	376	376	0	0	0	0	0	376	0	0	0	30	08/30/2026	3.B PL
..87304*-AB-4	TOP HAWKER INTERMEDIATE LLC - DELAYED DR .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	836	836	836	836	0	0	0	0	0	836	0	0	0	67	08/28/2026	3.B PL
..87326*-AA-8	TA/WEG HOLDINGS LLC - DELAYED DRAW INCR .....	.....	07/01/2024	VARIOUS .....	.....	(441)	(441)	(441)	(441)	0	0	0	0	0	(441)	0	0	0	24,826	10/04/2027	3.B PL
..87326*-AB-6	TA/WEG HOLDINGS LLC - 2021 DELAYED DRAW .....	.....	07/01/2024	VARIOUS .....	.....	606	606	606	606	0	0	0	0	0	606	0	0	0	1,860	10/04/2027	3.B PL
..87326*-AC-4	TA/WEG HOLDINGS LLC - AUGUST 2021 DELAY .....	.....	07/01/2024	VARIOUS .....	.....	392	392	392	392	0	0	0	0	0	392	0	0	0	15,518	10/04/2027	3.B PL
..87338*-AA-8	TSYL Corp Buyer Inc Initial Term Ln A .....	.....	08/30/2024	CA_CASH_CLOSE .....	.....	1,494	1,494	1,464	1,464	0	0	0	0	0	1,464	0	30	30	236	12/19/2028	5.B GI
..87338*-AB-6	TSYL Corp Buyer Inc Initial Term Ln B .....	.....	08/30/2024	CA_CASH_CLOSE .....	.....	99	99	97	97	0	0	0	0	0	97	0	2	2	18	12/19/2028	5.B GI
..87338*-AC-4	Technosylva - Delayed Draw Term Loan .....	.....	08/30/2024	CA_CASH_CLOSE .....	.....	3,606	3,606	3,606	3,606	0	0	0	0	0	3,606	0	0	0	407	12/19/2028	4.B Z
..87339*-AA-5	TS OPCO HLDG LLC / TRYSTAR LLC 5TH AMEN .....	.....	08/06/2024	CA_CASH_CLOSE .....	.....	673,865	673,865	657,018	657,018	0	0	0	0	0	657,018	0	16,847	16,847	62,122	09/28/2027	4.C
..87339*-AB-3	TS OPCO HLDG LLC/TRYSTAR LLC 6TH AMEND T .....	.....	08/06/2024	CA_CASH_CLOSE .....	.....	703,686	703,686	686,094	686,094	0	0	0	0	0	686,094	0	17,592	17,592	69,966	09/28/2027	4.C
..87339*-AC-1	TS Opcro Hldg LLC 7th AMEND TERM LN .....	.....	08/06/2024	CA_CASH_CLOSE .....	.....	1,112,703	1,112,703	1,090,449	1,090,449	0	0	0	0	0	1,090,449	0	22,254	22,254	72,225	09/28/2027	4.C Z
..87583*-AN-8	Tank Holding Corp. - 2022 Term Loan .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	11,846	11,846	11,579	11,579	0	0	0	0	0	11,579	0	267	267	1,778	03/31/2028	4.B PL
..88033*-AA-0	Tencarva Machinery Company - Senior Term ....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	167	12/20/2027	5.A
..88033*-AB-8	Tencarva Machinery Company .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	1,007	1,007	1,007	1,007	0	0	0	0	0	1,007	0	0	0	204	12/20/2027	4.C
..000000-00-0	Tencarva Machinery Company LLC - 2024 In .....	.....	07/01/2024	CA_CASH_CLOSE .....	.....	4,099	4,099	4,017	4,017	0	0	0	0	0	4,017	0	82	82	0	12/20/2027	4.B Z
..88167*-AA-8	Tetragon Financial Group (Delaware) LLC .....	.....	09/12/2024	CA_CASH_CLOSE .....	.....	5,000,000	5,000,000	5,000,000	5,000,000	0	0	0	0	0	5,000,000	0	0	0	169,737	07/15/2032	1.F PL
..88233*-AF-6	Vistra Operations Co LLC-VST TL B3 1L US .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	0	0	0	0	0	0	0	0	0	0	0	0	0	489	12/20/2030	2.C FE
..88675*-AA-3	TIKEHAU GREEN DIAMOND CFO LLC - Class A .....	.....	07/05/2024	CA_CASH_CLOSE .....	.....	(1,000,000)	(1,000,000)	(1,000,000)	(1,000,000)	0	0	0	0	0	(1,000,000)	0	0	0	(41,721)	12/21/2030	1.F PL
..88675*-AB-1	TIKEHAU GREEN DIAMOND CFO LLC - Class B .....	.....	07/05/2024	CA_CASH_CLOSE .....	.....	166,667	166,667	166,667	166,667	0	0	0	0	0	166,667	0	0	0	8,512	12/21/2030	2.C PL
..88732*-AA-4	TIMECLOCK PLUS LLC - DELAYED DRAW TERM .....	.....	07/26/2024	CA_CASH_CLOSE .....	.....	418	418	418	418	0	0	0	0	0	418	0	0	0	12	08/28/2026	4.B PL
..88732*-AC-0	TimeClock Plus LLC/Term Loan 8/19 .....	.....	07/31/2024	CA_CASH_CLOSE .....	.....	2,007	2,007	1,967	1,980	0	0	0	0	0	1,980	0	27	27	105	08/28/2026	4.B PL
..89617*-AB-4	Trident Maritime Systems Inc. - 2021 Ter .....	.....	07/01/2024	CA_CASH_CLOSE .....	.....	6,068	6,068	5,977	5,977	0	0	0	0	0	5,977	0	91	91	517	02/26/2027	4.C
..89617*-AD-0	Trident Maritime Systems Inc. - 2023 Inc .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	864	864	845	845	0	0	0	0	0	845	0	19	19	49	02/26/2027	4.C
..89668*-AA-2	Trintech Inc - 2023 Term Loan .....	.....	07/31/2024	CA_CASH_CLOSE .....	.....	3,132	3,132	3,038	3,038	0	0	0	0	0	3,038	0	94	94	374	07/25/2029	4.B PL
..89899*-AF-1	Portfolio Group - Agency 1st Lien Term L .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	3,503	3,503	3,433	3,435	0	0	0	0	0	3,435	0	68	68	606	12/02/2025	4.C PL
..89899*-AG-9	TURBO BUYER INC AMEND NO 4 DDTL .....	.....	09/30/2024	CA_CASH_CLOSE .....	.....	2,627	2,627	2,627	2,627	0	0	0	0	0	2,627	0	0	0	306	12/02/2025	4.C PL

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recogn- ized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
..89989#-AH-7	TURBO BUYER INC AMEND NO 5 - Delayed Dra		09/30/2024	CA_CASH_CLOSE		525	525	525	525	0	0	0	0	0	525	0	0	0	99	12/02/2025	4.C PL
..90139#-AA-1	Twin Brook Capital Funding XIII WSPV, LL		08/16/2024	CA_CASH_CLOSE		2,494,746	2,494,746	2,494,746	2,494,746	0	0	0	0	0	2,494,746	0	0	0	79,570	10/18/2028	1.E PL
..90140*-AA-0	Twin Brook Capital Funding XIV WSPV, LLC		08/16/2024	CA_CASH_CLOSE		1,418,104	1,418,104	1,418,104	1,418,104	0	0	0	0	0	1,418,104	0	0	0	46,592	10/18/2028	1.E PL
..90380#-AA-7	US SALT INVESTORS LLC - INITIAL TERM LO		09/03/2024	CA_CASH_CLOSE		72,737	72,737	72,737	72,737	0	0	0	0	0	72,737	0	0	0	3,998	07/19/2028	3.B PL
..90385P-AC-4	Ultimus Group Midco LLC-/ULTGRP TL 1L US		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	16,152	02/01/2026	4.B PL
..91867#-AA-7	VPC LEGAL FINANCE FUND HOLDINGS - Secure		07/08/2024	CA_CASH_CLOSE		4,242,857	4,242,857	4,242,857	4,242,857	0	0	0	0	0	4,242,857	0	0	0	157,908	10/14/2030	2.B PL
..928432-AB-0	Visual Edge Technology, Inc./Last Out T		09/30/2024	CA_CASH_CLOSE		14,228	14,228	14,228	14,228	0	0	0	0	0	14,228	0	0	0	439	12/31/2025	5.B PL
..92846*-AB-1	VITAL BUYER LLC 2023 INCREMENTAL TERM LO		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	354	06/01/2028	4.C
..92943H-AB-5	W.R. Grace & Co. TL B		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	129	09/22/2028	4.A FE
..92974*-AA-7	WSHP FC ACQUISITION 2A TL L+625 03/30/20		07/23/2024	CA_CASH_CLOSE		3,329	3,329	3,329	3,329	0	0	0	0	0	3,329	0	0	0	184	03/30/2027	3.B PL
..92974*-AB-5	WSHP FC ACQUISITION LLC - SECOND AMENDME		07/31/2024	CA_CASH_CLOSE		2,080	2,080	2,080	2,080	0	0	0	0	0	2,080	0	0	0	270	03/30/2027	3.B PL
..92974*-AC-3	WSHP FC Acquisition LLC/Third Amendment		09/30/2024	CA_CASH_CLOSE		996	996	996	996	0	0	0	0	0	996	0	0	0	191	03/30/2027	3.B PL
..92974*-AD-1	WSHP FC ACQUISITION 1A TL L+650 03/30/20		07/23/2024	CA_CASH_CLOSE		417	417	403	411	0	0	0	0	0	411	0	6	6	36	03/30/2027	3.B PL
..92974*-AE-9	WSHP FC ACQUISITION 1A DOTL L+625 03/30/		07/31/2024	CA_CASH_CLOSE		521	521	521	521	0	0	0	0	0	521	0	0	0	118	03/30/2028	3.B PL
..92975#-AA-4	TA/WEG Holdings LLC/Term Loan 9/19		07/01/2024	VARIOUS		3,131	3,131	3,131	3,131	0	0	0	0	0	3,131	0	0	0	34,441	10/02/2025	3.B PL
..92975#-AB-2	TA/WEG Holdings LLC/Initial Delayed Dra		07/01/2024	VARIOUS		11	11	11	11	0	0	0	0	0	11	0	0	0	8,095	10/02/2025	3.B PL
..92991#-AA-2	W50 Holdings LLC		09/18/2024	BANK LOANS BARINGS		1,965,348	2,001,780	1,961,744	0	0	0	0	0	0	1,961,744	0	3,603	3,603	0	03/15/2030	4.B PL
..93000#-AA-9	WIEEC Holdings II Corp - Term Loan		09/30/2024	CA_CASH_CLOSE		4,503	4,503	4,391	4,391	0	0	0	0	0	4,391	0	113	113	756	10/03/2028	4.C
..93279#-AA-3	WALNUT PARENT INC. - INITIAL TERM LOAN		08/30/2024	CA_CASH_CLOSE		1,231	1,231	1,231	1,231	0	0	0	0	0	1,231	0	0	0	91	11/09/2027	3.C PL
..94184#-AA-5	WATERMILL EXPRESS LLC - TERM LOAN FACIL		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	82	04/20/2027	3.B PL
..94979#-AA-6	WELLNESS ACQUISITIONCO INC. - TERM LOAN		09/30/2024	CA_CASH_CLOSE		2,143	2,143	2,143	2,143	0	0	0	0	0	2,143	0	0	0	358	01/20/2027	2.C PL
..95483#-AA-0	WEST NR ACQUISITIONCO LLC 2ND AMEND TERM		09/30/2024	CA_CASH_CLOSE		231	231	226	231	0	0	0	0	0	226	0	5	5	28	12/27/2027	4.C Z
..95483#-AB-8	WEST NR ACQUISITIONCO LLC 2ND AMEND FUND		07/01/2024	CA_CASH_CLOSE		585	585	573	573	0	0	0	0	0	573	0	12	12	49	12/27/2027	4.C Z
..96222#-AA-4	WHLP IV (RP), LP Senior Secured		09/09/2024	CA_CASH_CLOSE		784,535	784,535	784,535	784,535	0	0	0	0	0	784,535	0	0	0	33,928	03/31/2026	1.G PL
..96524K-AD-2	WHITEHORSE LIQUIDITY PARTNERS V-R LP, -C		09/16/2024	CA_CASH_CLOSE		402,570	402,570	402,570	402,570	0	0	0	0	0	402,570	0	0	0	10,178	12/15/2032	1.G PL
..96811*-AB-3	Wildcat BuyerCo Inc./Delayed Draw Term		07/23/2024	CA_CASH_CLOSE		322	322	322	322	0	0	0	0	0	322	0	0	0	41	02/27/2026	3.A PL
..97383*-AA-1	WINEBOW HOLDINGS INC. (VINTNER GROUP I		08/14/2024	CA_CASH_CLOSE		43,605	43,605	43,605	43,605	0	0	0	0	0	43,605	0	0	0	3,903	07/01/2025	4.A PL
..97959#-AA-3	Woodland Foods Inc - Term Loan		09/30/2024	CA_CASH_CLOSE		4,353	4,353	4,267	4,267	0	0	0	0	0	4,267	0	86	86	505	12/02/2027	5.A
..97959#-AC-9	Woodland Foods Inc - 2024 Incremental Te		07/01/2024	CA_CASH_CLOSE		368	368	360	0	0	0	0	0	0	360	0	7	7	6	12/01/2027	5.B Z
..98415D-A#-3	XIFIN Inc./Term Loan 02/20		07/26/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	20	02/06/2026	3.A PL
..98876*-AB-1	ZB Holdco LLC - Delayed Draw Term Loan		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	17	02/09/2028	5.A
..98876*-AD-7	ZB Holdco LLC - 2023 Incremental Term Lo		09/30/2024	VARIOUS		0	0	0	0	0	0	0	0	0	0	0	0	0	1,199	02/09/2028	4.C Z
..98876*-AE-5	ZB Holdco LLC - 2023 Incremental Delayed		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	18	02/09/2028	3.B PL
..000000-00-0	Kings III - Delayed Draw Term Loan		09/30/2024	CA_CASH_CLOSE		530	530	530	530	0	0	0	0	0	530	0	0	0	107	08/31/2028	5.B GI
..000000-00-0	NP Inc. - NP Line of Credit First Lien R		08/27/2024	CA_CASH_CLOSE		217,173	217,173	217,173	217,173	0	0	0	0	0	217,173	0	0	0	24,640	05/08/2026	6. *
..000000-00-0	CyrusOne LP Senior Term Lo		07/15/2024	CA_CASH_CLOSE		9,770,793	9,770,793	9,477,669	0	0	0	0	0	0	9,477,669	0	293,124	293,124	224,955	04/15/2025	2.B Z
..86522#-NM-7	AirX Climate Solutions Inc		09/20/2024	BANK LOANS BARINGS		477,353	484,622	477,353	0	0	0	0	0	0	477,353	0	0	0	0	11/07/2029	4.C Z
..C9300#-AA-9	UCIT Online Security Inc.-CAD Term Loan		07/01/2024	CA_CASH_CLOSE		703	703	703	703	0	0	0	0	0	703	0	0	0	36	03/02/2026	4.A PL
..G3165#-AB-0	CCO I CREDIT BACKED LOANS LTD. - Senior		07/15/2024	CA_CASH_CLOSE		1,054,839	1,054,839	1,054,839	1,054,839	0	0	0	0	0	1,054,839	0	0	0	40,273	12/17/2031	1.G PL
..G3930#-AA-8	GLOBAL CRITICAL LOGISTICS LTD GBP 7TH AM		09/30/2024	CA_CASH_CLOSE		457	457	451	0	0	0	0	0	0	451	0	7	7	18	07/31/2026	4.C Z
..G7740#-AA-7	SCL XL I FUND L.P. - Senior Secured Revo		09/13/2024	CA_CASH_CLOSE		6,894,737	6,894,737	6,894,737	6,894,737	0	0	0	0	0	6,894,737	0	0	0	270,440	10/05/2029	1.G PL
..G9152#-AA-6	290419 LTD USD FIRST AMENDMENT UK INCREM		09/18/2024	VARIOUS		1,538,293	1,547,579	1,516,627	1,516,627	0	0	0	0	0	1,516,627	0	21,666	21,666	111,890	12/21/2029	4.C Z
..G9341J-AN-0	Veritas US Inc. - 2021 USD Term Loan B		09/30/2024	VARIOUS		0	0	0	0	0	0	0	0	0	0	0	0	0	10,080	09/01/2025	5.A FE
..14741#-AA-1	Cascade Services - Term Loan		09/30/2024	CA_CASH_CLOSE		1,084	1,084	1,057	1,057	0	0	0	0	0	1,057	0	27	27	87	09/30/2029	4.C Z
..14741#-AB-9	Cascade Services - Delayed Draw Term Loa		09/30/2024	CA_CASH_CLOSE		193	193	193	0	0	0	0	0	0	193	0	0	0	16	09/30/2029	4.C Z
..25822C-C#-3	Dorel Industries Inc. - Asset Backed Fir	A	07/02/2024	CA_CASH_CLOSE		18,750	18,750	18,750	18,750	0	0	0	0	0	18,750	0	0	0	0	12/08/2026	4.A PL

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22	
										11	12	13	14	15								
CUSIP Ident-ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recog- nized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol	
..C4800#-AA-5	IntraPac Canada Corporation/Canadian Ter		09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	71	01/11/2026	3.B PL	
..C8655*-AA-6	Syntax Systems Ltd - Senior Term Loan	A	09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	12,080	10/29/2028	4.C	
..03979*-AA-9	RTI Surgical	C	09/30/2024	CA_CASH_CLOSE		7,767	7,767	7,767	7,767	0	0	0	0	0	7,767	0	0	0	999	07/20/2026	3.B PL	
..62994*-AA-6	NF Holdco LLC - Term Loan	C	09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	44	04/02/2029	4.C Z	
..67116#-AA-4	OSP HAMILTON PURCHASER LLC INITIAL TERM	C	09/18/2024	VARIOUS		4,230,261	4,298,173	4,212,209	4,212,366	0	0	0	0	0	4,212,366	0	17,895	17,895	488,664	12/28/2029	5.A	
..D0423#-AA-9	APOLLO 5 GMBH EURO FAC B2 LN	B	08/29/2024	CA_CASH_CLOSE		1,111,500	1,111,500	859,455	981,930	0	0	0	0	(122,475)	859,455	127,001	125,044	252,045	60,666	03/06/2026	4.C	
..G3166*-AA-5	CIP VIII Holdings SPV L.P - Term Loan	C	09/27/2024	CA_CASH_CLOSE		2,889,503	2,889,503	2,889,503	2,889,503	0	0	0	0	0	2,889,503	0	0	0	256,395	12/14/2026	1.F PL	
..G4288#-AC-0	HARBOURVEST DOVER STR X INVT LP 2ND AIE	C	09/30/2024	CA_CASH_CLOSE		113,178	113,178	113,178	113,178	0	0	0	0	0	113,178	0	0	0	0	01/05/2028	1.G PL	
..G4701#-AA-1	IFM USIDF (INTERMEDIATE) B, L.P. - Secur	D	09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	8,492	11/01/2035	1.G PL	
..G6684#-AA-9	OHA Credit Solutions Master Fund I SPV,	C	09/12/2024	VARIOUS		8,542,942	8,542,942	8,542,942	8,542,942	0	0	0	0	0	8,542,942	0	0	0	254,180	12/16/2032	1.F PL	
..L0421#-AD-6	Auris Luxembourg III S.A EUR TLB1 (Jul'1	B	09/30/2024	BANK LOANS BARINGS		0	0	0	0	0	0	0	0	0	0	0	0	0	43,801	02/27/2026	4.C FE	
..L5581#-AA-9	ION Trading Technologies EUR TLB (Mar'21	B	09/30/2024	CA_CASH_CLOSE		0	0	0	0	0	0	0	0	0	0	0	0	0	57	04/01/2028	5.B GI	
..W8000#-AE-4	Samh-nillsbyggnadsbolaget i Norden AB - T	D	09/30/2024	BANK LOANS BARINGS		0	0	0	0	0	0	0	0	0	0	0	0	0	356,250	07/21/2027	4.A PL	
..BGS16B-7K-0	WMEC Holdings II Corp		09/30/2024	PRINCIPAL REPAYMENT		971	0	0	0	0	0	0	0	0	971	0	0	0	0	10/03/2028	4.C	
1909999999. Subtotal - Bonds - Unaffiliated Bank Loans						406,161,325	408,110,730	404,084,265	135,113,599	0	48	0	48	(122,475)	404,103,977	127,001	1,930,349	2,057,350	12,232,316	XXX	XXX	
2509999997. Total - Bonds - Part 4						2,140,413,410	2,189,609,017	2,165,201,956	1,798,764,186	5,638	8,208,059	183,360	8,030,337	(122,475)	2,175,911,983	120,808	(35,619,382)	(35,498,574)	87,928,451	XXX	XXX	
2509999998. Total - Bonds - Part 5						XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX
2509999999. Total - Bonds						2,140,413,410	2,189,609,017	2,165,201,956	1,798,764,186	5,638	8,208,059	183,360	8,030,337	(122,475)	2,175,911,983	120,808	(35,619,382)	(35,498,574)	87,928,451	XXX	XXX	
..30767E-40-6	Farm Credit Bank of Texa-FARM CREDIT BAN		09/16/2024	CALL 100	6,383,000	22,289,800	6,383,000	647,875	0	0	0	0	0	0	22,445,109	0	(155,309)	(155,309)	15,507	0	2.B FE	
..333333-ZA-3	Mandatory Redeemable Pfd		09/30/2024	VARIOUS	0.000	0	0.00	0	0	0	0	0	0	0	(3,381,074)	0	3,381,074	3,381,074	0	0	5.B GI	
..333333-ZB-1	Perpetual Pfd		09/30/2024	VARIOUS	0.000	0	0.00	0	0	0	0	0	0	0	(700,000)	0	700,000	700,000	0	0	5.B GI	
4019999999. Subtotal - Preferred Stocks - Industrial and Miscellaneous (Unaffiliated) Perpetual Preferred						22,289,800	XXX	647,875	0	0	0	0	0	0	18,364,035	0	3,925,765	3,925,765	15,507	XXX	XXX	
..45822P-20-4	Integrays Holding Inc		08/08/2024	VARIOUS	0.000	0	0.00	0	0	0	0	0	0	0	0	0	0	0	150,000	0	2.B FE	
4029999999. Subtotal - Preferred Stocks - Industrial and Miscellaneous (Unaffiliated) Redeemable Preferred						0	XXX	0	0	0	0	0	0	0	0	0	0	0	150,000	XXX	XXX	
4509999997. Total - Preferred Stocks - Part 4						22,289,800	XXX	647,875	0	0	0	0	0	0	18,364,035	0	3,925,765	3,925,765	165,507	XXX	XXX	
4509999998. Total - Preferred Stocks - Part 5						XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX
4509999999. Total - Preferred Stocks						22,289,800	XXX	647,875	0	0	0	0	0	0	18,364,035	0	3,925,765	3,925,765	165,507	XXX	XXX	
..03743Q-10-8	APA Corp-COMMON STOCK		09/11/2024	BLOOMBERG TRADEBOOK	7,764,000	183,279	275,420	278,572	(3,152)	0	0	0	(3,152)	0	275,420	0	(92,141)	(92,141)	5,823	0	0	
..039483-10-2	Archer-Daniels-Midland C-COMMON STOCK		09/11/2024	BLOOMBERG TRADEBOOK	3,000,000	175,971	234,350	216,660	17,690	0	0	0	17,690	0	234,350	0	(58,379)	(58,379)	4,500	0	0	
..25179M-10-3	DEVON ENERGY CORP-COMMON STOCK		09/11/2024	BLOOMBERG TRADEBOOK	3,101,000	123,475	153,469	140,475	12,993	0	0	0	12,993	0	153,469	0	(29,994)	(29,994)	3,298	0	0	
..29273V-10-0	ENERGY TRANSFER EQUITY L P LTD PARTNERSH		09/30/2024	RILY	0.000	0	0	0	0	0	0	0	0	0	0	0	0	0	20,355	0	0	
..293792-10-7	ENTERPRISE PRODS PARTNERS L P COMMON UNI		08/21/2024	BLOOMBERG TRADEBOOK	21,337,000	955,601	559,875	562,230	(2,355)	0	0	0	(2,355)	0	892,693	0	62,908	62,908	33,179	0	0	
..553530-10-6	MSC Industrial Direct Co-COMMON STOCK		09/11/2024	BLOOMBERG TRADEBOOK	770,000	59,561	77,023	77,970	(947)	0	0	0	(947)	0	77,023	0	(17,462)	(17,462)	1,917	0	0	
..626717-10-2	MURPHY OIL CORP-COMMON STOCK		09/11/2024	BLOOMBERG TRADEBOOK	2,000,000	67,587	87,620	85,320	2,300	0	0	0	2,300	0	87,620	0	(20,033)	(20,033)	1,800	0	0	
..67058H-10-2	NUSTAR ENERGY LP-COMMON STOCK LTD PART		09/30/2024	MERGER	0.000	0	0	0	0	0	0	0	0	0	0	0	0	0	(39,440)	0	0	
..67098H-10-4	O-I Glass Inc-COMMON STOCK		07/17/2024	BLOOMBERG TRADEBOOK	5,500,000	64,373	61,050	90,090	(1,629)	0	0	0	(1,629)	0	61,050	0	3,323	3,323	0	0	0	
..76150W-10-7	Reverse Mortgage Investm-COMMON STOCK		09/05/2024	DIRECT	1,000	944,466	0	0	0	0	0	0	0	0	332,818	0	611,648	611,648	0	0	0	
..38059T-10-6	GOLD FIELDS LTD-ADR	C	09/11/2024	BLOOMBERG TRADEBOOK	16,000,000	215,552	283,370	0	0	0	0	0	0	0	283,370	0	(67,817)	(67,817)	0	0	0	
..000000-00-0	TCS Squeeze Out Share Warrant	B	09/30/2024	VARIOUS	3,956,000	0	0	0	0	7,051	0	6,780	271	(352)	0	0	0	0	0	0	0	
..86563T-10-4	Sumitomo Metal Mining Co-ADR	C	09/11/2024	BLOOMBERG TRADEBOOK	34,000,000	203,654	278,925	0	0	0	0	0	0	0	278,925	0	(75,271)	(75,271)	0	0	0	
..749999-ZA-9	QUIBI LLC CLASS C		09/30/2024	VARIOUS	0.000	0	0	0	0	0	0	0	0	0	(500,000)	0	500,000	500,000	0	0	0	
5019999999. Subtotal - Common Stocks - Industrial and Miscellaneous (Unaffiliated) Publicly Traded						2,993,518	XXX	2,011,102	1,451,317	31,951	0	34,191	(2,240)	(352)	2,176,737	0	816,782	816,782	31,432	XXX	XXX	
..652935-MM-6	NEXT.E.GO NV Warrants	D	09/20/2024	DIRECT	0.000	0	0	0	0	(63,525)	0	0	(63,525)	0	0	0	0	0	0	XXX	XXX	
5029999999. Subtotal - Common Stocks - Industrial and Miscellaneous (Unaffiliated) Other						0	XXX	0	0	(63,525)	0	0	(63,525)	0	0	0	0	0	0	XXX	XXX	

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE D - PART 4

Show All Long-Term Bonds and Stock Sold, Redeemed or Otherwise Disposed of During the Current Quarter

1	2	3	4	5	6	7	8	9	10	Change In Book/Adjusted Carrying Value					16	17	18	19	20	21	22
										11	12	13	14	15							
CUSIP Ident- ification	Description	For- eign	Disposal Date	Name of Purchaser	Number of Shares of Stock	Consid- eration	Par Value	Actual Cost	Prior Year Book/ Adjusted Carrying Value	Unrealized Valuation Increase/ (Decrease)	Current Year's (Amor- tization)/ Accretion	Current Year's Other Than Temporary Impairment Recog- nized	Total Change in Book/ Adjusted Carrying Value (11 + 12 - 13)	Total Foreign Exchange Change in Book /Adjusted Carrying Value	Book/ Adjusted Carrying Value at Disposal Date	Foreign Exchange Gain (Loss) on Disposal	Realized Gain (Loss) on Disposal	Total Gain (Loss) on Disposal	Bond Interest/ Stock Dividends Received During Year	Stated Con- tractual Maturity Date	NAIC Desig- nation, NAIC Desig- nation Modifier and SVO Admini- strative Symbol
5989999997. Total - Common Stocks - Part 4						2,993,518	XXX	2,011,102	1,451,317	(31,574)	0	34,191	(65,765)	(352)	2,176,737	0	816,782	816,782	31,432	XXX	XXX
5989999998. Total - Common Stocks - Part 5						XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX	XXX
5989999999. Total - Common Stocks						2,993,518	XXX	2,011,102	1,451,317	(31,574)	0	34,191	(65,765)	(352)	2,176,737	0	816,782	816,782	31,432	XXX	XXX
5999999999. Total - Preferred and Common Stocks						25,283,318	XXX	2,658,977	1,451,317	(31,574)	0	34,191	(65,765)	(352)	20,540,772	0	4,742,547	4,742,547	196,939	XXX	XXX
6009999999 - Totals						2,165,696,729	XXX	2,167,860,933	1,800,215,503	(25,936)	8,208,059	217,551	7,964,572	(122,827)	2,196,452,756	120,808	(30,876,835)	(30,756,027)	88,125,390	XXX	XXX

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
0079999999. Subtotal - Purchased Options - Hedging Effective Excluding Variable Annuity Guarantees Under SSAP No.108										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0149999999. Subtotal - Purchased Options - Hedging Effective Variable Annuity Guarantees Under SSAP No.108										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
180473 Call Options - S&P Equal Weight Energy - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.01/05/2024	.01/06/2025	.....	46,576,850	1291.44000000	.....	3,074,072	 (2,244,157)	 829,915	.....	8,408,904	 0	 0	 (2,244,157)	.....	0	.....	.....
180474 Call Options - S&P U.S. Retiree Spending Index - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	UBS AG BFM8T61CT2L10CEM1K50	.01/05/2024	.01/06/2025	.....	8,456,288	516.20000000	.....	524,290	 (382,746)	 141,544	.....	756,650	 0	 0	 (382,746)	.....	0	.....	.....
180481 Call Options - SPDR Gold shares - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	GOLDMAN SACHS INTERNATIONAL W22LR0WP21HZNB6K528	.01/05/2024	.01/06/2025	.....	37,091,436	189.35000000	.....	2,918,735	 (2,130,757)	 787,978	.....	2,255,337	 0	 0	 (2,130,757)	.....	0	.....	.....
180499 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUJISFPUBMPR08K5P83	.01/05/2024	.01/06/2025	.....	47,881,518	4697.24000000	.....	4,037,848	 (2,947,741)	 1,090,108	.....	1,399,501	 0	 0	 (2,947,741)	.....	0	.....	.....
180503 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUJISFPUBMPR08K5P83	.01/05/2024	.01/06/2025	.....	43,258,847	4697.24000000	.....	3,648,451	 (2,663,470)	 984,981	.....	1,611,940	 0	 0	 (2,663,470)	.....	0	.....	.....
180510 Call Options - iShares U.S. Real Estate - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/05/2024	.01/06/2025	.....	1,835	89.66000000	.....	1,365,317	 (997,731)	 367,585	.....	847,212	 0	 0	 (997,731)	.....	0	.....	.....
180524 Call Options - iShares MSCI EAFE - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/05/2024	.01/06/2025	.....	151	74.17000000	.....	74,712	 (54,597)	 20,115	.....	60,751	 0	 0	 (54,597)	.....	0	.....	.....
180526 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.01/05/2024	.01/06/2025	.....	35,316,640	4697.24000000	.....	2,983,465	 (2,178,012)	 805,453	.....	3,022,211	 0	 0	 (2,178,012)	.....	0	.....	.....
180537 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/05/2024	.07/03/2025	.....	7	4697.24000000	.....	340,312	 (167,017)	 173,295	.....	73,948	 0	 0	 (167,017)	.....	0	.....	.....
180539 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.01/05/2024	.01/06/2025	.....	24,767,973	4697.24000000	.....	1,079,471	 (788,044)	 291,428	.....	660,138	 0	 0	 (788,044)	.....	0	.....	.....
180544 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZIWZ7FF32TWEFA76	.01/05/2024	.01/05/2029	.....	60,445,980	4697.24000000	.....	3,348,707	 (2,467,951)	 880,756	.....	4,641,059	 0	 0	 (2,467,951)	.....	0	.....	.....
180545 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/05/2024	.01/06/2025	.....	143	4697.24000000	.....	5,427,422	 (3,966,193)	 1,461,229	.....	1,263,831	 0	 0	 (3,966,193)	.....	0	.....	.....
180551 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZIWZ7FF32TWEFA76	.01/05/2024	.01/06/2031	.....	102,482,500	4697.24000000	.....	5,913,240	 (4,357,977)	 1,555,263	.....	7,128,903	 0	 0	 (4,357,977)	.....	0	.....	.....
180558 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.01/05/2024	.01/06/2025	.....	17,094,461	4697.24000000	.....	459,841	 (335,697)	 124,144	.....	927,789	 0	 0	 (335,697)	.....	0	.....	.....
180560 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/05/2024	.01/06/2025	.....	127	4697.24000000	.....	4,820,158	 (3,522,423)	 1,297,735	.....	1,275,394	 0	 0	 (3,522,423)	.....	0	.....	.....
180562 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/05/2024	.01/06/2025	.....	216	4697.24000000	.....	8,197,134	 (5,990,213)	 2,206,921	.....	4,618,247	 0	 0	 (5,990,213)	.....	0	.....	.....
180572 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/05/2024	.01/06/2025	.....	97	4697.24000000	.....	3,668,284	 (2,680,669)	 987,615	.....	2,623,593	 0	 0	 (2,680,669)	.....	0	.....	.....
180579 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/05/2024	.01/06/2025	.....	110	4697.24000000	.....	4,174,940	 (3,050,918)	 1,124,022	.....	5,237,465	 0	 0	 (3,050,918)	.....	0	.....	.....
145280 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZIWZ7FF32TWEFA76	.01/06/2022	.01/06/2027	.....	840,780	4696.05000000	.....	40,249	 19,939	 15,427	.....	5,353	 27,054	 0	 0	 (14,911)	.....	0	.....
145291 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZIWZ7FF32TWEFA76	.01/06/2022	.01/05/2029	.....	2,075,217	4696.05000000	.....	109,154	 54,229	 40,367	.....	14,559	 61,172	 0	 0	 (40,554)	.....	0	.....
163351 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZIWZ7FF32TWEFA76	.01/06/2023	.01/06/2028	.....	11,272,223	3895.08000000	.....	516,268	 541,593	 513,951	.....	145,345	 850,303	 0	 0	 (404,735)	.....	0	.....
163356 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZIWZ7FF32TWEFA76	.01/06/2023	.01/04/2030	.....	13,719,968	3895.08000000	.....	684,626	 720,137	 619,829	.....	193,254	 824,981	 0	 0	 (538,136)	.....	0	.....
180698 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.01/12/2024	.01/12/2025	.....	939,135	4783.45000000	.....	41,437	 (29,500)	 11,938	.....	134,439	 0	 0	 (29,500)	.....	0	.....	.....
180796 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/19/2024	.01/17/2025	.....	95	4839.81000000	.....	3,559,539	 (2,484,775)	 1,074,764	.....	1,746,248	 0	 0	 (2,484,775)	.....	0	.....	.....
180815 Call Options - S&P 500 - USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/19/2024	.01/17/2025	.....	125	4839.81000000	.....	4,698,722	 (3,279,994)	 1,418,728	.....	2,725,870	 0	 0	 (3,279,994)	.....	0	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
180824 Call Options – S&P 500 – USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/19/2024	.01/17/2025	95	 45,749,030	..4839.81000000	.....	..... 3,554,669	(2,481,376)	 1,073,293	.....	..... 2,464,331	 0	 0	(2,481,376)	.....	..... 0	.....	.....
180835 Call Options – S&P 500 – USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/19/2024	.01/17/2025	 151	 73,255,364	..4839.81000000	.....	..... 5,691,893	(3,973,288)	 1,718,605	.....	..... 6,262,340	 0	 0	(3,973,288)	.....	..... 0	.....	.....
180848 Call Options – S&P 500 – USD	Liability Hedge	Exhibit 5 ...	Equity/Index	MORGAN STANLEY & CO. INTERNATIONAL PLC 4PQUHN3JPFGFNF3BB653	.01/19/2024	.01/17/2025	.....	..... 58,808,525	..4839.81000000	.....	..... 4,495,870	(3,134,620)	 1,361,250	.....	..... 1,239,429	 0	 0	(3,134,620)	.....	..... 0	.....	.....
180849 Call Options – S&P 500 – USD	Liability Hedge	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.01/19/2024	.01/19/2029	.....	..... 30,600,543	..4839.81000000	 0	 1,621,829	(1,133,058)	 488,770	.....	..... 2,689,484	 0	 0	(1,133,058)	.....	..... 0	.....	.....
180854 Call Options – S&P 500 – USD	Liability Hedge	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.01/19/2024	.01/17/2031	.....	..... 77,737,735	..4839.81000000	 0	 4,361,087	(3,046,787)	 1,314,300	.....	..... 7,281,047	 0	 0	(3,046,787)	.....	..... 0	.....	.....
180856 Call Options – S&P 500 – USD	Liability Hedge	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A. KB1H1DSPRFMVMCJFXTO9	.01/19/2024	.01/17/2025	.....	..... 14,339,415	..4839.81000000	.....	......421,579	(293,934)	127,645	.....	..... 1,012,041	 0	 0	(293,934)	.....	..... 0	.....	.....
180859 Call Options – S&P 500 – USD	Liability Hedge	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC MORGAN STANLEY & CO. INTERNATIONAL PLC 4PQUHN3JPFGFNF3BB653	.01/19/2024	.01/17/2025	.....	..... 18,784,706	..4839.81000000	.....	......779,957	(543,804)	236,154	.....	......489,179	 0	 0	(543,804)	.....	..... 0	.....	.....
180863 Call Options – S&P 500 – USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/19/2024	.01/17/2025	.....	..... 43,099,400	..4839.81000000	.....	..... 3,294,918	(2,297,290)	997,628	.....	..... 1,236,454	 0	 0	(2,297,290)	.....	..... 0	.....	.....
180867 Call Options – SPDR Gold shares – USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/19/2024	.01/17/2025	 1,573	 29,564,873	..187.93000000	.....	..... 2,243,362	(1,566,004)	677,359	.....	..... 1,835,042	 0	 0	(1,566,004)	.....	..... 0	.....	.....
180876 Call Options – iShares U.S. Real Estate – USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/19/2024	.01/17/2025	 1,750	 15,451,876	..88.32000000	.....	..... 1,217,675	(850,011)	367,664	.....	......787,902	 0	 0	(850,011)	.....	..... 0	.....	.....
180882 Call Options – iShares MSCI EAFE – USD	Liability Hedge	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/19/2024	.01/17/2025	 228	 1,687,951	..73.93000000	.....	..... 114,159	(79,690)	34,469	.....	..... 108,291	 0	 0	(79,690)	.....	..... 0	.....	.....
180892 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/19/2024	.07/18/2025	6	2,903,886	..4839.81000000	.....	......292,128	(135,573)	156,555	.....	......53,928	 0	 0	(135,573)	.....	..... 0	.....	.....
180896 Call Options – S&P U.S. Retiree Spending Index – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG BFM8T61CT2L10CEMIK50	.01/19/2024	.01/17/2025	.....	..... 5,554,494	..515.69000000	.....	......341,601	(238,172)	103,429	.....	......511,252	 0	 0	(238,172)	.....	..... 0	.....	.....
180897 Call Options – S&P Equal Weight Energy – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A. KB1H1DSPRFMVMCJFXTO9	.01/19/2024	.01/17/2025	.....	..... 30,326,908	..1331.27000000	.....	..... 1,992,478	(1,389,200)	603,278	.....	..... 4,526,973	 0	 0	(1,389,200)	.....	..... 0	.....	.....
180900 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.01/19/2024	.01/17/2025	 122	 59,045,682	..4839.81000000	.....	..... 4,587,810	(3,202,571)	 1,385,239	.....	..... 1,093,819	 0	 0	(3,202,571)	.....	..... 0	.....	.....
145768 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUJFSFPU8MPRO8K5P83	.01/20/2022	.01/20/2027	.....	..... 1,067,105	..4482.73000000	 53,186	26,401	20,944	 8,100	.....	......38,131	 0	 0	(19,735)	.....	..... 0	.....	.....
145772 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUJFSFPU8MPRO8K5P83	.01/20/2022	.01/19/2029	.....	..... 2,284,303	..4482.73000000	 130,052	64,947	52,510	 19,927	.....	......88,727	 0	 0	(48,530)	.....	..... 0	.....	.....
163922 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.01/20/2023	.01/20/2028	.....	......5,705,912	..3972.61000000	263,613	276,749	263,287	84,884	.....	......421,005	 0	 0	(206,309)	.....	..... 0	.....	.....
163924 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUJFSFPU8MPRO8K5P83	.01/20/2023	.01/18/2030	.....	..... 18,090,591	..3972.61000000	 891,866	939,596	857,318	288,184	.....	..... 1,289,304	 0	 0	(700,282)	.....	..... 0	.....	.....
146459 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.02/04/2022	.02/05/2027	.....	......875,187	..4500.53000000	46,034	22,908	18,459	7,970	.....	......30,843	 0	 0	(17,111)	.....	..... 0	.....	.....
146461 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUJFSFPU8MPRO8K5P83	.02/04/2022	.02/06/2029	.....	..... 2,205,498	..4500.53000000	 122,524	61,077	47,877	21,249	.....	......76,500	 0	 0	(45,612)	.....	..... 0	.....	.....
164600 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.02/06/2023	.02/04/2028	.....	......5,580,626	..4111.08000000	257,825	270,297	249,977	95,496	.....	......379,358	 0	 0	(200,938)	.....	..... 0	.....	.....
164603 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.02/06/2023	.02/06/2030	.....	..... 20,840,541	..4111.08000000	 1,025,355	 1,079,134	969,617	381,245	.....	..... 1,267,466	 0	 0	(801,829)	.....	..... 0	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
181308 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/06/2024	02/06/2025	2,448	46,148,103	188.55000000	3,404,509	(2,201,271)	1,203,237		2,803,763	0	0	(2,201,271)		0		
181340 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/06/2024	02/06/2025	2,753	23,818,090	86.52000000	1,932,536	(1,249,530)	683,006		1,302,920	0	0	(1,249,530)		0		
181352 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/06/2024	02/06/2025	324	2,439,683	75.21000000	162,840	(105,288)	57,552		166,830	0	0	(105,288)		0		
181363 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/06/2024	02/06/2025	158	78,276,834	4954.23000000	6,082,052	(3,932,505)	2,149,547		1,412,458	0	0	(3,932,505)		0		
181370 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/06/2024	02/06/2025	135	66,882,105	4954.23000000	5,196,690	(3,360,052)	1,836,638		1,357,845	0	0	(3,360,052)		0		
181379 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/06/2024	02/06/2025	96	47,560,608	4954.23000000	3,695,424	(2,389,370)	1,306,054		1,311,746	0	0	(2,389,370)		0		
181385 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	MORGAN STANLEY & CO. INTERNATIONAL PLC	4PQUHNSJPFQFNF3BB653	02/06/2024	02/06/2025		25,062,639	4954.23000000	390,977	(252,417)	138,561		629,896	0	0	(252,417)		0		
181386 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/06/2024	02/06/2025	107	52,929,755	4954.23000000	4,112,603	(2,659,108)	1,453,495		2,046,697	0	0	(2,659,108)		0		
181399 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/06/2024	02/06/2025	120	59,450,760	4954.23000000	4,619,280	(2,986,713)	1,632,567		3,260,990	0	0	(2,986,713)		0		
181400 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGOFU57RNE97	02/06/2024	02/06/2029		41,505,951	4954.23000000	0	2,137,556	749,609		3,502,826	0	0	(1,387,948)		0		
181402 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGOFU57RNE97	02/06/2024	02/06/2031		79,357,783	4954.23000000	0	4,317,063	1,513,929		7,084,708	0	0	(2,803,134)		0		
181403 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/06/2024	02/06/2025	76	37,756,682	4954.23000000	2,933,666	(1,896,836)	1,036,830		2,689,024	0	0	(1,896,836)		0		
181411 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/06/2024	02/06/2025	132	65,395,836	4954.23000000	5,081,208	(3,285,384)	1,795,824		5,871,165	0	0	(3,285,384)		0		
181417 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	BFMBT61CT2L1QCEMIK50	02/06/2024	02/06/2025		8,110,491	515.55000000	502,039	(324,119)	177,921		768,061	0	0	(324,119)		0		
181418 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYMCUFXT09	02/06/2024	02/06/2025		51,199,691	1362.57000000	3,368,940	(2,175,002)	1,193,937		6,487,764	0	0	(2,175,002)		0		
181419 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E57ODZVZ7FF32TWEFA76	02/06/2024	02/06/2025		22,087,163	4954.23000000	700,163	(452,028)	248,135		1,193,033	0	0	(452,028)		0		
181421 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSFPUBMPRO8K5P83	02/06/2024	08/06/2025		3,694,660	4954.23000000	392,151	(169,093)	223,058		70,106	0	0	(169,093)		0		
181425 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSFPUBMPRO8K5P83	02/06/2024	02/06/2025		99,871,911	4954.23000000	8,132,570	(5,250,423)	2,882,147		4,460,254	0	0	(5,250,423)		0		
181468 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSFPUBMPRO8K5P83	02/09/2024	02/09/2025		1,119,734	4993.90739631	52,631	(33,440)	19,191		118,482	0	0	(33,440)		0		
165308 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSFPUBMPRO8K5P83	02/17/2023	02/18/2028		8,592,432	4079.09000000	391,815	409,629	364,405		411,055	0	0	(304,086)		0		
165310 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSFPUBMPRO8K5P83	02/17/2023	02/20/2030		16,958,688	4079.09000000	827,584	869,947	774,224		1,051,867	0	0	(645,218)		0		
147150 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSFPUBMPRO8K5P83	02/18/2022	02/19/2027		1,589,414	4348.87000000	85,480	42,558	33,600		58,411	0	0	(31,769)		0		
147153 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSFPUBMPRO8K5P83	02/18/2022	02/20/2029		2,507,570	4348.87000000	139,306	69,435	54,227		84,800	0	0	(51,823)		0		
181776 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/20/2024	02/20/2025	95	47,267,345	4975.51000000	3,795,535	(2,308,517)	1,487,018		1,299,506	0	0	(2,308,517)		0		
181779 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGOFU57RNE97	02/20/2024	02/20/2029		27,738,664	4975.51000000	0	1,398,029	(854,138)		543,891	0	0	(854,138)		0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
181784 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	02/20/2024	02/20/2031		55,268,008	4975.51000000	0	2,956,838	(1,806,507)	1,150,332		4,319,546	0	0	(1,806,507)		0		
181787 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	02/20/2024	02/20/2025	2,131	39,946,857	187.47000000		2,959,737	(1,800,169)	1,159,568		2,318,737	0	0	(1,800,169)		0		
181793 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	02/20/2024	02/20/2025	109	54,248,981	4975.51000000		4,356,156	(2,649,497)	1,706,658		2,029,855	0	0	(2,649,497)		0		
181808 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	02/20/2024	02/20/2025	2,435	21,178,304	86.96000000		1,719,398	(1,045,771)	673,627		1,044,035	0	0	(1,045,771)		0		
181814 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	02/20/2024	02/20/2025	200	99,641,454	4975.51000000		8,001,140	(4,866,447)	3,134,693		4,331,253	0	0	(4,866,447)		0		
181828 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	02/20/2024	08/20/2025	6	2,985,306	4975.51000000		307,188	(124,901)	182,287		55,952	0	0	(124,901)		0		
181830 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	02/20/2024	02/20/2025	69	34,297,584	4975.51000000		2,754,072	(1,675,080)	1,078,993		1,899,926	0	0	(1,675,080)		0		
181832 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	02/20/2024	02/20/2025	123	61,198,773	4975.51000000		4,914,219	(2,988,922)	1,925,297		1,217,999	0	0	(2,988,922)		0		
181844 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	02/20/2024	02/20/2025	146	1,113,790	76.38000000		79,036	(48,071)	30,965		63,506	0	0	(48,071)		0		
181853 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	02/20/2024	02/20/2025		20,721,749	4975.51000000		955,273	(579,987)	375,286		530,357	0	0	(579,987)		0		
181867 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	02/20/2024	02/20/2025		6,980,531	517.24000000		439,773	(267,005)	172,768		648,335	0	0	(267,005)		0		
181868 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BANK OF AMERICA, N.A.	02/20/2024	02/20/2025		42,729,051	1368.74000000		2,875,665	(1,745,940)	1,129,726		5,191,037	0	0	(1,745,940)		0		
181869 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	02/20/2024	02/20/2025		16,234,929	4975.51000000		451,331	(274,022)	177,309		820,199	0	0	(274,022)		0		
181878 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	02/20/2024	02/20/2025		65,276,252	4975.51000000		5,508,010	(3,344,149)	2,163,861		1,172,740	0	0	(3,344,149)		0		
181884 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	02/20/2024	02/20/2025		62,395,362	4975.51000000		5,241,210	(3,182,163)	2,059,047		5,147,803	0	0	(3,182,163)		0		
147912 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	03/04/2022	03/04/2027		2,313,933	4328.87000000	132,195	66,011	52,909	28,030		88,617	0	0	(49,216)		0		
147914 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	03/04/2022	03/02/2029		3,147,487	4328.87000000	190,357	95,281	75,546	40,458		113,021	0	0	(71,001)		0		
165863 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	03/06/2023	03/06/2028		9,177,411	4048.42000000	431,338	452,539	414,119	194,596		675,792	0	0	(334,757)		0		
165865 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	03/06/2023	03/06/2030		13,812,465	4048.42000000	661,617	693,367	597,489	298,156		693,653	0	0	(513,033)		0		
182202 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	03/06/2024	03/06/2029		43,838,652	5104.76000000	0	2,183,165	(1,244,105)	939,060		2,546,140	0	0	(1,244,105)		0		
182204 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	03/06/2024	03/06/2031		73,621,521	5104.76000000	0	3,857,768	(2,198,399)	1,659,369		3,778,699	0	0	(2,198,399)		0		
182206 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	03/06/2024	03/06/2025	2,268	45,093,299	198.81000000		3,472,554	(1,974,776)	1,497,777		2,636,396	0	0	(1,974,776)		0		
182220 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	03/06/2024	03/06/2025	172	1,349,120	78.58000000		87,904	(49,989)	37,915		61,559	0	0	(49,989)		0		
182231 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	03/06/2024	09/05/2025	4	2,041,904	5104.76000000		211,540	(80,053)	131,487		35,887	0	0	(80,053)		0		
182240 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	03/06/2024	03/06/2025	148	75,550,448	5104.76000000		6,059,120	(3,445,708)	2,613,412		1,315,892	0	0	(3,445,708)		0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
182248 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.03/06/2024	.03/06/2025	 131	 66,872,356	..5104.76000000	.....	..... 5,363,140	 (3,049,918)	 2,313,222	.....	..... 1,298,800	 0	 0	 (3,049,918)	.....	..... 0	.....	.....
182249 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA ES71P3U3RH1G71XBU11	.03/06/2024	.03/06/2025	.....	..... 50,269,144	..5104.76000000	.....	..... 4,252,770	 (2,413,417)	 1,839,352	.....	..... 2,573,952	 0	 0	 (2,413,417)	.....	..... 0	.....	.....
182256 Call Options – iShares U.S. Real Estate – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	GOLDMAN SACHS INTERNATIONAL W22LRO1P21H2NB6K528	.03/06/2024	.03/06/2025	.....	..... 24,154,215	..89.65000000	.....	..... 2,171,705	 (1,232,428)	 939,277	.....	..... 1,113,977	 0	 0	 (1,232,428)	.....	..... 0	.....	.....
182257 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.03/06/2024	.03/06/2025	 93	 47,474,268	..5104.76000000	.....	..... 3,807,420	 (2,165,209)	 1,642,211	.....	..... 1,265,142	 0	 0	 (2,165,209)	.....	..... 0	.....	.....
182262 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.03/06/2024	.03/06/2025	 116	 58,971,208	..5104.76000000	.....	..... 4,729,471	 (2,689,562)	 2,039,909	.....	..... 2,154,715	 0	 0	 (2,689,562)	.....	..... 0	.....	.....
182272 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.03/06/2024	.03/06/2025	 191	 97,276,307	..5104.76000000	.....	..... 7,801,526	 (4,436,582)	 3,364,944	.....	..... 7,392,217	 0	 0	 (4,436,582)	.....	..... 0	.....	.....
182279 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA ES71P3U3RH1G71XBU11	.03/06/2024	.03/06/2025	.....	..... 133,854,538	..5104.76000000	.....	..... 11,324,094	 (6,426,345)	 4,897,749	.....	..... 5,766,258	 0	 0	 (6,426,345)	.....	..... 0	.....	.....
182292 Call Options – S&P U.S. Retiree Spending Index – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG BFM6T61CT2L10CEMIK50	.03/06/2024	.03/06/2025	.....	..... 8,863,281	..520.97000000	.....	..... 557,500	 (316,378)	 241,123	.....	..... 770,664	 0	 0	 (316,378)	.....	..... 0	.....	.....
182293 Call Options – S&P Equal Weight Energy – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A. KB1H1DSPRFMYMCUFXT09	.03/06/2024	.03/06/2025	.....	..... 48,914,664	..1398.28000000	.....	..... 3,291,957	 (1,868,163)	 1,423,794	.....	..... 5,067,372	 0	 0	 (1,868,163)	.....	..... 0	.....	.....
182296 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA ES71P3U3RH1G71XBU11	.03/06/2024	.03/06/2025	.....	..... 25,715,456	..5104.76000000	.....	..... 1,445,209	 (820,146)	 625,063	.....	..... 651,564	 0	 0	 (820,146)	.....	..... 0	.....	.....
182300 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMJWSFPU8MPR08K5P83	.03/06/2024	.03/06/2025	.....	..... 18,264,456	..5104.76000000	.....	..... 503,551	 (285,762)	 217,789	.....	..... 733,875	 0	 0	 (285,762)	.....	..... 0	.....	.....
182519 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BANK OF AMERICA, N.A. B4TYDEB6GKMZ0031MB27	.03/15/2024	.03/14/2025	.....	..... 1,396,661	..5160.01000000	.....	..... 60,554	 (32,800)	 27,754	.....	..... 125,818	 0	 0	 (32,800)	.....	..... 0	.....	.....
148494 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.03/18/2022	.03/19/2027	.....	..... 3,484,463	..4463.12000000	 203,186	 101,363	 74,867	 46,929	.....	..... 110,053	 0	 0	 (75,540)	.....	..... 0	.....	.....
148496 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.03/18/2022	.03/20/2029	.....	..... 2,690,653	..4463.12000000	 164,848	 82,387	 59,734	 38,143	.....	..... 70,125	 0	 0	 (61,367)	.....	..... 0	.....	.....
166386 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.03/20/2023	.03/20/2028	.....	..... 10,912,967	..3951.57000000	 538,009	 568,681	 560,106	 266,339	.....	..... 750,369	 0	 0	 (418,788)	.....	..... 0	.....	.....
166390 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.03/20/2023	.03/20/2030	.....	..... 13,135,985	..3951.57000000	 650,231	 685,913	 643,999	 321,248	.....	..... 1,125,220	 0	 0	 (505,400)	.....	..... 0	.....	.....
182744 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A. KB1H1DSPRFMYMCUFXT09	.03/20/2024	.03/20/2025	.....	..... 80,854,470	..5224.62000000	.....	..... 6,904,972	 (3,652,216)	 3,252,755	.....	..... 1,358,544	 0	 0	 (3,652,216)	.....	..... 0	.....	.....
182753 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A. KB1H1DSPRFMYMCUFXT09	.03/20/2024	.03/20/2025	.....	..... 85,327,218	..5224.62000000	.....	..... 7,304,010	 (3,863,278)	 3,440,732	.....	..... 6,510,242	 0	 0	 (3,863,278)	.....	..... 0	.....	.....
182764 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A. KB1H1DSPRFMYMCUFXT09	.03/20/2024	.03/20/2025	.....	..... 1,573,725	..5224.62000000	.....	..... 135,026	 (71,419)	 63,607	.....	..... 159,043	 0	 0	 (71,419)	.....	..... 0	.....	.....
182767 Call Options – SPDR Gold shares – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.03/20/2024	.03/20/2025	 2,103	 42,516,432	..202.18000000	.....	..... 3,141,733	 (1,665,809)	 1,475,924	.....	..... 2,334,282	 0	 0	 (1,665,809)	.....	..... 0	.....	.....
182777 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.03/20/2024	.03/20/2025	.....	..... 18,424,934	..5224.62000000	.....	..... 521,426	 (275,795)	 245,630	.....	..... 763,971	 0	 0	 (275,795)	.....	..... 0	.....	.....
182780 Call Options – iShares U.S. Real Estate – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.03/20/2024	.03/20/2025	 3,062	 27,184,699	..88.79000000	.....	..... 1,781,901	 (944,799)	 837,102	.....	..... 1,284,193	 0	 0	 (944,799)	.....	..... 0	.....	.....
182781 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.03/20/2024	.03/20/2029	.....	..... 23,117,461	..5224.62000000	 0	 1,246,031	 (662,274)	 583,757	.....	..... 1,328,248	 0	 0	 (662,274)	.....	..... 0	.....	.....
182784 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.03/20/2024	.03/20/2031	.....	..... 71,515,666	..5224.62000000	 0	 3,954,816	 (2,102,012)	 1,852,804	.....	..... 4,844,928	 0	 0	 (2,102,012)	.....	..... 0	.....	.....
182789 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.03/20/2024	.03/20/2025	 93	 48,536,302	..5224.62000000	.....	..... 3,936,325	 (2,087,117)	 1,849,208	.....	..... 1,640,419	 0	 0	 (2,087,117)	.....	..... 0	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)	
182790 Call Options - Ishares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	03/20/2025	157	1,252,607	79.85000000		80,474	(42,669)		37,805		53,510	0	0	(42,669)	0		
182804 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	03/20/2025	260	135,800,674	5224.62000000		11,013,521	(5,839,587)		5,173,934		5,590,246	0	0	(5,839,587)	0		
182824 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	03/20/2025	98	50,960,630	5224.62000000		4,132,939	(2,191,366)		1,941,573		2,571,462	0	0	(2,191,366)	0		
182831 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	BFM8T61CT2L1QCEMIK50	03/20/2024	03/20/2025		8,437,055	521.83000000		534,066	(282,481)		251,585		733,592	0	0	(282,481)	0		
182832 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMJOUFXTO9	03/20/2024	03/20/2025		53,119,497	1426.80000000		3,617,438	(1,913,356)		1,704,082		4,586,959	0	0	(1,913,356)	0		
182833 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RHHG71XBU11	03/20/2024	03/20/2025		22,696,844	5224.62000000		1,066,752	(564,232)		502,519		551,895	0	0	(564,232)	0		
182837 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	09/19/2025	7	3,657,234	5224.62000000		384,013	(135,493)		248,520		62,247	0	0	(135,493)	0		
182839 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	03/20/2025	99	51,723,738	5224.62000000		4,194,828	(2,224,181)		1,970,647		968,905	0	0	(2,224,181)	0		
182843 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	03/20/2025	91	47,544,042	5224.62000000		3,855,852	(2,044,449)		1,811,403		1,247,208	0	0	(2,044,449)	0		
183356 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	2,419	52,037,123	215.14000000		4,104,629	(1,989,779)		2,114,851		2,733,098	0	0	(1,989,779)	0		
183364 Call Options - Ishares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	257	2,029,902	78.97000000		134,693	(65,294)		69,398		112,859	0	0	(65,294)	0		
183381 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	10/06/2025	3	1,561,302	5204.34000000		167,997	(53,845)		114,152		26,391	0	0	(53,845)	0		
183385 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	241	125,424,594	5204.34000000		10,535,556	(5,107,264)		5,428,292		2,130,623	0	0	(5,107,264)	0		
183395 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	107	55,686,438	5204.34000000		4,677,612	(2,267,540)		2,410,072		1,365,301	0	0	(2,267,540)	0		
183413 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	04/05/2024	04/04/2025		648,438	266.23000000		18,610	(8,995)		9,615		33,366	0	0	(8,995)	0		
183416 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RHHG71XBU11	04/05/2024	04/04/2025		28,624,148	5204.34000000		1,385,409	(669,614)		715,795		643,231	0	0	(669,614)	0		
183421 Call Options - IShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	MORGAN STANLEY & CO. INTERNATIONAL PLC	4PQUHN3JPF6FNF3BB653	04/05/2024	04/04/2025		30,140,606	87.19000000		2,772,424	(1,340,005)		1,432,419		1,477,410	0	0	(1,340,005)	0		
183427 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	BFM8T61CT2L1QCEMIK50	04/05/2024	04/04/2025		11,325,091	520.20000000		715,746	(345,944)		369,802		1,040,973	0	0	(345,944)	0		
183430 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUWISFPU8MPRO8K5P83	04/05/2024	04/04/2025		56,267,973	1422.99000000		3,809,342	(1,841,182)		1,968,160		4,947,830	0	0	(1,841,182)	0		
183443 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32WIFA76	04/05/2024	04/04/2025		21,346,269	5204.34000000		593,426	(286,823)		306,604		625,042	0	0	(286,823)	0		
183449 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGOFU57RNE97	04/05/2024	04/06/2029		30,875,127	5204.34000000	0	1,664,169	(811,568)		852,602		2,081,825	0	0	(811,568)	0		
183452 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32WIFA76	04/05/2024	04/04/2031		78,645,201	5204.34000000	0	4,294,028	(2,094,074)		2,199,954		3,904,850	0	0	(2,094,074)	0		
183455 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	97	50,483,139	5204.34000000		4,240,539	(2,055,663)		2,184,876		1,669,837	0	0	(2,055,663)	0		
183467 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	341	177,434,166	5204.34000000		14,904,314	(7,225,083)		7,679,231		7,288,628	0	0	(7,225,083)	0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
183475 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	04/05/2024	04/04/2025	97	50,482,098	5204.34000000		4,240,452	(2,055,621)	2,184,831		2,528,640	0	0	(2,055,621)		0		
183477 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	04/05/2024	04/04/2025	99	51,498,818	5204.34000000		4,325,856	(2,097,021)	2,228,834		3,574,089	0	0	(2,097,021)		0		
183483 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	04/05/2024	04/04/2025	100	52,043,400	5204.34000000		4,371,600	(2,119,197)	2,252,403		4,302,075	0	0	(2,119,197)		0		
141932 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	04/06/2021	04/06/2028		2,560,103	4073.94000000	182,785	60,400	55,167	76,202		65,356	0	0	(45,039)		0		
141936 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	04/06/2021	04/06/2026		643,934	4073.94000000	44,408	14,655	13,619	18,511		20,018	0	0	(10,932)		0		
149383 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROMUJISFPUBMPRO8K5P83	04/06/2022	04/06/2029		1,256,634	4481.15000000	76,495	38,234	28,232	19,692		37,036	0	0	(28,449)		0		
149385 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	04/06/2022	04/06/2027		3,034,169	4481.15000000	161,388	80,480	69,862	41,450		119,942	0	0	(59,931)		0		
167376 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	04/06/2023	10/04/2024		3,676,167	4105.02000000	433,677		(217,206)	3,201		100,935	0	0	(217,206)		0		
167410 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	04/06/2023	04/06/2028		17,613,170	4105.02000000	864,807	913,857	903,869	470,564		1,213,141	0	0	(670,748)		0		
167414 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	04/06/2023	04/05/2030		19,509,223	4105.02000000	963,756	1,016,922	966,146	523,639		1,173,952	0	0	(746,764)		0		
183621 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	04/12/2024	04/12/2025		1,480,638	5161.54000000		74,423	(34,428)	39,995		145,394	0	0	(34,428)		0		
183798 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROMUJISFPUBMPRO8K5P83																		
183826 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	04/19/2024	04/17/2025	1,812	40,042,378	221.03000000		3,387,741	(1,515,073)	1,872,668		2,057,210	0	0	(1,515,073)		0		
183827 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	04/19/2024	10/20/2025	4	1,986,892	4967.23000000		224,520	(66,205)	158,315		35,033	0	0	(66,205)		0		
183836 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	04/19/2024	04/17/2025		23,508,611	81.99000000		2,234,826	(996,023)	1,238,803		1,423,298	0	0	(996,023)		0		
183840 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	04/19/2024	04/17/2025	91	45,201,793	4967.23000000		3,991,351	(1,785,021)	2,206,330		1,271,712	0	0	(1,785,021)		0		
183844 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	04/19/2024	04/20/2029		28,050,131	4967.23000000	0	1,528,732	(686,882)	841,850		2,086,693	0	0	(686,882)		0		
183849 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	04/19/2024	04/18/2031		75,745,710	4967.23000000	0	4,196,312	(1,885,466)	2,310,846		3,905,123	0	0	(1,885,466)		0		
183851 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	04/19/2024	04/17/2025	128	63,769,299	4967.23000000		5,630,875	(2,518,253)	3,112,623		3,333,882	0	0	(2,518,253)		0		
183858 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	04/19/2024	04/17/2025		167,728	261.21000000		4,797	(2,138)	2,659		11,298	0	0	(2,138)		0		
183863 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	04/19/2024	04/17/2025		102,060,018	4967.23000000		9,372,172	(4,177,013)	5,195,159		1,791,631	0	0	(4,177,013)		0		
183868 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	04/19/2024	04/17/2025	245	1,862,047	76.12000000		104,208	(47,080)	57,128		114,277	0	0	(47,080)		0		
183875 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	04/19/2024	04/17/2025		7,633,998	514.38000000		490,866	(218,770)	272,096		803,215	0	0	(218,770)		0		
183876 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	04/19/2024	04/17/2025		19,724,534	4967.23000000		968,854	(431,801)	537,053		482,864	0	0	(431,801)		0		
	LIABILITY HEDGE	Exhibit 5	Equity/Index	BANK OF AMERICA, N.A.	04/19/2024	04/17/2025		48,817,145	1366.11000000		3,353,738	(1,494,702)	1,859,036		6,342,062	0	0	(1,494,702)		0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5		6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse		Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
183880 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.04/19/2024	.04/17/2025	.....	.....31,442	... 261.21000000	.....	.....899	 (401)	498	.....	..... 2,201	 0	 0	 (401)	.....	..... 0	.....	.....
183883 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYMCJFXTO9	.04/19/2024	.04/17/2025	.....	..... 14,850,913	.. 4967.23000000	.....	.....374,243	 (166,794)	207,449	.....	..... 1,145,010	 0	 0	 (166,794)	.....	..... 0	.....	.....
183885 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	SOCIETE GENERAL ...	O2RNE81BXP4ROT8PU41	.04/19/2024	.04/17/2025	.....	..... 41,158,209	.. 4967.23000000	.....	.....3,786,555	 (1,687,601)	2,098,954	.....	..... 1,477,289	 0	 0	 (1,687,601)	.....	..... 0	.....	.....
183893 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.04/19/2024	.04/17/2025	.....	..... 87,088,826	.. 4967.23000000	.....	.....8,000,342	 (3,565,612)	 4,434,730	.....	..... 3,856,163	 0	 0	 (3,565,612)	.....	..... 0	.....	.....
183899 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.04/19/2024	.04/17/2025	.....	..... 48,490,412	.. 4967.23000000	.....	.....4,454,854	 (1,985,450)	2,469,404	.....	..... 2,807,564	 0	 0	 (1,985,450)	.....	..... 0	.....	.....
183905 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	SOCIETE GENERAL ...	O2RNE81BXP4ROT8PU41	.04/19/2024	.04/17/2025	.....	..... 69,345,795	.. 4967.23000000	.....	.....6,379,813	 (2,843,371)	3,536,442	.....	..... 5,588,383	 0	 0	 (2,843,371)	.....	..... 0	.....	.....
141931 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGOFU57RNE97	.04/20/2021	.04/20/2028	.....	.....2,131,255	.. 4134.94000000	166,598	 55,334	 50,935	69,483	.....	..... 96,668	 0	 0	 (41,180)	.....	..... 0	.....	.....
141935 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGOFU57RNE97	.04/20/2021	.04/20/2026	.....	.....1,033,297	.. 4134.94000000	 75,627	 24,990	21,818	31,516	.....	..... 38,690	 0	 0	 (18,626)	.....	..... 0	.....	.....
150021 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUB8MPRO8K5P83	.04/20/2022	.04/20/2027	.....	.....3,978,366	.. 4459.45000000	247,661	123,893	90,834	68,560	.....	.....148,317	 0	 0	 (92,084)	.....	..... 0	.....	.....
150023 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUB8MPRO8K5P83	.04/20/2022	.04/20/2029	.....	.....2,397,649	.. 4459.45000000	150,675	 75,491	 57,885	41,775	.....	..... 83,613	 0	 0	 (56,075)	.....	..... 0	.....	.....
167991 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	.04/20/2023	.04/20/2028	.....	..... 15,613,951	.. 4129.79000000	757,277	798,024	764,335	441,535	.....	..... 1,081,570	 0	 0	 (584,710)	.....	..... 0	.....	.....
167995 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	.04/20/2023	.04/18/2030	.....	..... 14,700,848	.. 4129.79000000	721,812	760,581	 711,388	420,818	.....	.....911,246	 0	 0	 (557,295)	.....	..... 0	.....	.....
168016 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.04/20/2023	.10/18/2024	 9	 3,716,811	.. 4129.79000000	422,226	.....	..... (211,474)	 13,920	.....	..... 85,919	 0	 0	 (211,474)	.....	..... 0	.....	.....
170976 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	.05/05/2023	.05/05/2028	.....	..... 15,646,372	.. 4136.25000000	 765,108	806,870	775,057	479,587	.....	..... 1,013,599	 0	 0	 (589,307)	.....	..... 0	.....	.....
170979 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUB8MPRO8K5P83	.05/05/2023	.05/06/2030	.....	..... 15,930,319	.. 4136.25000000	 767,841	807,742	755,520	480,110	.....	.....912,398	 0	 0	 (590,592)	.....	..... 0	.....	.....
171015 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/05/2023	.11/06/2024	 9	3,722,625	.. 4136.25000000	418,419	.....	..... (207,917)	28,251	.....	..... 97,815	 0	 0	 (207,917)	.....	..... 0	.....	.....
141929 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUB8MPRO8K5P83	.05/06/2021	.05/06/2026	.....	.....2,934,227	.. 4201.62000000	207,762	67,890	60,203	87,234	.....	.....86,926	 0	 0	 (50,575)	.....	..... 0	.....	.....
141934 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUB8MPRO8K5P83	.05/06/2021	.05/06/2028	.....	.....3,525,201	.. 4201.62000000	272,205	 89,247	78,351	114,470	.....	.....85,544	 0	 0	 (66,384)	.....	..... 0	.....	.....
150452 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	.05/06/2022	.05/06/2027	.....	.....2,560,850	.. 4123.34000000	155,622	78,041	62,418	46,607	.....	.....91,747	 0	 0	 (57,927)	.....	..... 0	.....	.....
150453 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	.05/06/2022	.05/04/2029	.....	.....1,806,435	.. 4123.34000000	116,192	58,345	44,077	34,845	.....	.....52,698	 0	 0	 (43,282)	.....	..... 0	.....	.....
184304 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RHIGC71XBUI1	.05/06/2024	.05/06/2025	.....	.....27,071,786	.. 5180.74000000	.....	.....1,248,009	 (498,516)	749,493	.....	.....645,187	 0	 0	 (498,516)	.....	..... 0	.....	.....
184318 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUB8MPRO8K5P83	.05/06/2024	.05/06/2025	.....	..... 18,406,314	.. 5180.74000000	.....	.....517,217	 (206,602)	310,615	.....	.....637,692	 0	 0	 (206,602)	.....	..... 0	.....	.....
184324 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	.05/06/2024	.05/04/2029	.....	.....28,800,434	.. 5180.74000000	 0	1,558,103	 (627,510)	930,593	.....	.....1,670,082	 0	 0	 (627,510)	.....	..... 0	.....	.....
184326 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	BFBMT61CT2L1QCEMIK50	.05/06/2024	.05/06/2025	.....	..... 10,958,068	.. 520.85000000	.....	.....701,316	 (280,140)	421,176	.....	..... 1,032,009	 0	 0	 (280,140)	.....	..... 0	.....	.....
184328 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYMCJFXTO9	.05/06/2024	.05/06/2025	.....	..... 51,255,630	.. 1412.21000000	.....	.....3,459,755	 (1,381,996)	2,077,759	.....	..... 5,209,674	 0	 0	 (1,381,996)	.....	..... 0	.....	.....
184329 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	.05/06/2024	.05/06/2031	.....	..... 80,553,405	.. 5180.74000000	 0	4,406,271	 (1,774,580)	2,631,691	.....	.....4,068,405	 0	 0	 (1,774,580)	.....	..... 0	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5		6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse		Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
184330 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5I70UK5573	.05/06/2024	.05/06/2025	.....	86,118	264.16000000	.....	2,472	(987)	1,484	.....	5,156	0	0	(987)	.....	0	.....	.....
184331 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/06/2024	.11/06/2025	5	2,590,370	5180.74000000	.....	272,505	(72,602)	199,903	.....	43,479	0	0	(72,602)	.....	0	.....	.....
184342 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/06/2024	.05/06/2025	217	112,422,058	5180.74000000	.....	9,049,985	(3,629,939)	5,420,046	.....	1,871,916	0	0	(3,629,939)	.....	0	.....	.....
184349 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/06/2024	.05/06/2025	74	38,337,476	5180.74000000	.....	3,086,170	(1,237,859)	1,848,311	.....	972,791	0	0	(1,237,859)	.....	0	.....	.....
184350 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5I70UK5573	.05/06/2024	.05/06/2025	.....	1,049,935	264.15660000	.....	30,133	(12,037)	18,096	.....	61,257	0	0	(12,037)	.....	0	.....	.....
184355 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5I70UK5573	.05/06/2024	.05/06/2025	.....	29,255,040	84.67000000	.....	2,624,464	(1,048,340)	1,576,124	.....	1,599,612	0	0	(1,048,340)	.....	0	.....	.....
184366 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/06/2024	.05/06/2025	146	75,799,407	5180.74000000	.....	6,101,859	(2,447,449)	3,654,410	.....	2,694,691	0	0	(2,447,449)	.....	0	.....	.....
184367 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/06/2024	.05/06/2025	138	71,580,212	5180.74000000	.....	5,762,213	(2,311,217)	3,450,996	.....	3,544,663	0	0	(2,311,217)	.....	0	.....	.....
184379 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/06/2024	.05/06/2025	2,325	50,043,555	215.20000000	.....	4,018,367	(1,611,763)	2,406,605	.....	2,780,533	0	0	(1,611,763)	.....	0	.....	.....
184382 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/06/2024	.05/06/2025	109	56,349,873	5180.74000000	.....	4,536,169	(1,819,453)	2,716,717	.....	3,032,692	0	0	(1,819,453)	.....	0	.....	.....
184390 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/06/2024	.05/06/2025	162	83,678,535	5180.74000000	.....	6,736,129	(2,701,854)	4,034,275	.....	3,550,232	0	0	(2,701,854)	.....	0	.....	.....
184391 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/06/2024	.05/06/2025	163	84,461,604	5180.74000000	.....	6,799,166	(2,727,138)	4,072,028	.....	6,310,166	0	0	(2,727,138)	.....	0	.....	.....
184409 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/06/2024	.05/06/2025	275	2,181,605	79.46000000	.....	144,690	(58,035)	86,655	.....	123,772	0	0	(58,035)	.....	0	.....	.....
184503 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUWSPU8MPRO8K5P83	.05/10/2024	.05/09/2025	.....	1,373,169	5187.45000000	.....	67,888	(26,212)	41,675	.....	140,405	0	0	(26,212)	.....	0	.....	.....
171609 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32WIEFA76	.05/19/2023	.05/20/2030	.....	20,432,234	4191.98000000	.....	974,618	1,023,562	942,683	.....	1,040,689	0	0	(747,063)	.....	0	.....	.....
171636 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUWSPU8MPRO8K5P83	.05/19/2023	.11/20/2024	.....	2,088,258	4191.98000000	.....	243,742	(121,042)	22,725	.....	59,758	0	0	(121,042)	.....	0	.....	.....
171734 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32WIEFA76	.05/19/2023	.05/19/2028	.....	15,669,739	4191.98000000	.....	756,848	796,105	741,925	.....	902,624	0	0	(580,601)	.....	0	.....	.....
139414 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUWSPU8MPRO8K5P83	.05/20/2021	.05/20/2026	.....	3,238,121	4159.12000000	.....	233,956	78,390	70,034	.....	96,108	0	0	(58,357)	.....	0	.....	.....
141933 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUWSPU8MPRO8K5P83	.05/20/2021	.05/19/2028	.....	4,387,198	4159.12000000	.....	347,178	117,072	104,882	.....	108,756	0	0	(86,984)	.....	0	.....	.....
151098 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUWSPU8MPRO8K5P83	.05/20/2022	.05/20/2027	.....	5,069,803	3901.36000000	.....	351,866	182,144	151,251	.....	224,335	0	0	(134,645)	.....	0	.....	.....
151099 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUWSPU8MPRO8K5P83	.05/20/2022	.05/18/2029	.....	1,272,358	3901.36000000	.....	90,354	46,752	36,775	.....	45,334	0	0	(34,565)	.....	0	.....	.....
184782 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5I70UK5573	.05/20/2024	.05/20/2025	.....	22,448,288	5308.13000000	.....	1,009,346	(364,254)	645,092	.....	522,388	0	0	(364,254)	.....	0	.....	.....
184796 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGOFU57RNE97	.05/20/2024	.05/20/2025	.....	14,507,073	5308.13000000	.....	427,959	(154,442)	273,516	.....	788,586	0	0	(154,442)	.....	0	.....	.....
184810 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	84	44,415,512	5308.13000000	.....	3,486,633	(1,264,383)	2,222,249	.....	2,138,378	0	0	(1,264,383)	.....	0	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5		6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse		Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
184811 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.05/20/2024	.05/20/2025	.....	1,231,860	266.77780000	.....	35,354	(12,759)	22,596	.....	62,396	0	0	(12,759)	.....	0	.....	.....
184823 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUBMPRO8K5P83	.05/20/2024	.05/20/2025	.....	20,077,220	87.72000000	.....	1,741,498	(628,475)	1,113,024	.....	1,069,477	0	0	(628,475)	.....	0	.....	.....
184825 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	88	46,688,188	5308.13000000	.....	3,665,039	(1,329,080)	2,335,959	.....	2,428,245	0	0	(1,329,080)	.....	0	.....	.....
184840 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	96	50,726,985	5308.13000000	.....	3,982,085	(1,444,053)	2,538,033	.....	2,809,535	0	0	(1,444,053)	.....	0	.....	.....
184853 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	176	93,341,449	5308.13000000	.....	7,327,335	(2,657,166)	4,670,170	.....	6,184,414	0	0	(2,657,166)	.....	0	.....	.....
184854 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUBMPRO8K5P83	.05/20/2024	.05/18/2029	.....	28,210,224	5308.13000000	0	1,514,889	(552,001)	962,888	.....	1,505,357	0	0	(552,001)	.....	0	.....	.....
184861 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	.05/20/2024	.05/20/2031	.....	74,371,308	5308.13000000	0	4,082,985	(1,487,773)	2,595,212	.....	3,413,964	0	0	(1,487,773)	.....	0	.....	.....
184871 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	78	41,246,506	5308.13000000	.....	3,237,865	(1,174,171)	2,063,694	.....	1,095,840	0	0	(1,174,171)	.....	0	.....	.....
184872 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	BFM8T61CT2L1QCENIK50	.05/20/2024	.05/20/2025	.....	8,660,981	525.47000000	.....	555,169	(200,350)	354,819	.....	749,853	0	0	(200,350)	.....	0	.....	.....
184873 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BANK OF AMERICA, N.A.	B4TYDEB6KMZ0031MB27	.05/20/2024	.05/20/2025	.....	46,276,498	1439.08000000	.....	3,169,940	(1,143,973)	2,025,967	.....	3,870,294	0	0	(1,143,973)	.....	0	.....	.....
184881 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	1,977	44,396,630	224.56000000	.....	3,681,267	(1,334,965)	2,346,302	.....	2,191,322	0	0	(1,334,965)	.....	0	.....	.....
184885 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	165	87,603,891	5308.13000000	.....	6,876,935	(2,493,834)	4,383,101	.....	3,134,976	0	0	(2,493,834)	.....	0	.....	.....
184895 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	91	48,549,219	5308.13000000	.....	3,811,130	(1,382,058)	2,429,072	.....	2,204,532	0	0	(1,382,058)	.....	0	.....	.....
184903 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	214	1,746,988	81.70000000	.....	111,833	(40,555)	71,278	.....	75,135	0	0	(40,555)	.....	0	.....	.....
184909 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.11/20/2025	4	2,123,252	5308.13000000	.....	220,184	(53,037)	167,147	.....	34,528	0	0	(53,037)	.....	0	.....	.....
184913 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	201	106,693,413	5308.13000000	.....	8,375,469	(3,037,258)	5,338,211	.....	1,715,557	0	0	(3,037,258)	.....	0	.....	.....
142030 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUBMPRO8K5P83	.06/04/2021	.06/05/2026	.....	3,793,322	4229.89000000	273,975	91,734	81,991	115,545	.....	109,470	0	0	(68,256)	.....	0	.....	.....
142031 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUBMPRO8K5P83	.06/04/2021	.06/06/2028	.....	3,756,297	4229.89000000	293,447	98,537	86,601	123,949	.....	84,687	0	0	(73,199)	.....	0	.....	.....
151704 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUBMPRO8K5P83	.06/06/2022	.06/04/2027	.....	4,053,241	4121.43000000	287,336	147,779	120,232	100,804	.....	127,306	0	0	(109,025)	.....	0	.....	.....
151705 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUBMPRO8K5P83	.06/06/2022	.06/06/2029	.....	1,853,944	4121.43000000	130,682	67,058	50,839	45,742	.....	20,454	0	0	(49,536)	.....	0	.....	.....
172334 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	.06/06/2023	.06/06/2028	.....	19,270,434	4283.85000000	920,163	966,730	898,215	659,368	.....	1,062,525	0	0	(703,159)	.....	0	.....	.....
172337 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUJISFPUBMPRO8K5P83	.06/06/2023	.06/06/2030	.....	17,649,477	4283.85000000	831,290	871,424	789,688	594,368	.....	865,138	0	0	(634,624)	.....	0	.....	.....
172357 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/06/2023	.12/06/2024	10	4,283,850	4283.85000000	472,080	.....	(235,505)	57,718	.....	109,722	0	0	(235,505)	.....	0	.....	.....
185335 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.06/06/2024	.06/06/2025	.....	22,233,527	87.13000000	.....	1,877,040	(582,350)	1,294,690	.....	1,189,354	0	0	(582,350)	.....	0	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
185341 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.06/06/2024	.06/06/2025	.....	23,072,006	5352.96000000	.....	582,352	(180,674)	401,678	.....	509,975	0	0	(180,674)	.....	0	.....	.....
185345 Call Options – First Trust Barclays Edge Index – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC BNP PARIBAS LONDON G5GSEF7VJP5170UK5573	.06/06/2024	.06/06/2025	.....	2,327,162	264.85400000	.....	66,790	(20,721)	46,068	.....	131,532	0	0	(20,721)	.....	0	.....	.....
185349 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROMUIISFPUBM8PRO8K5P83	.06/06/2024	.12/05/2025	.....	2,339,008	5352.96000000	.....	258,694	(53,359)	205,336	.....	37,340	0	0	(53,359)	.....	0	.....	.....
185357 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	SOCIETE GENERAL ... 02RNE81BXP4ROTD8PU41	.06/06/2024	.06/06/2025	.....	43,764,515	5352.96000000	.....	3,632,455	(1,126,967)	2,505,488	.....	0	0	0	(1,126,967)	.....	0	.....	.....
185367 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.06/06/2024	.06/06/2025	.....	15,733,852	5352.96000000	.....	464,149	(144,002)	320,147	.....	266,891	0	0	(144,002)	.....	0	.....	.....
185369 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	89	47,801,023	5352.96000000	.....	3,728,472	(1,177,951)	2,550,521	.....	2,101,470	0	0	(1,177,951)	.....	0	.....	.....
185370 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROMUIISFPUBM8PRO8K5P83	.06/06/2024	.06/06/2029	.....	31,638,823	5352.96000000	0	1,695,841	(538,952)	1,156,889	.....	1,922,637	0	0	(538,952)	.....	0	.....	.....
185372 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.06/06/2024	.06/06/2031	.....	92,684,199	5352.96000000	0	5,069,826	(1,611,232)	3,458,593	.....	4,329,588	0	0	(1,611,232)	.....	0	.....	.....
185378 Call Options – SPDR Gold shares – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	2,351	51,587,980	219.43000000	.....	4,107,196	(1,297,603)	2,809,593	.....	2,812,124	0	0	(1,297,603)	.....	0	.....	.....
185393 Call Options – iShares MSCI EAFE – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	354	2,910,682	82.16000000	.....	183,512	(57,978)	125,534	.....	125,047	0	0	(57,978)	.....	0	.....	.....
185407 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	96	51,351,481	5352.96000000	.....	4,005,407	(1,265,445)	2,739,963	.....	2,442,982	0	0	(1,265,445)	.....	0	.....	.....
185410 Call Options – S&P U.S. Retiree Spending Index – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG BFM8T61CT2L10CEMIK50	.06/06/2024	.06/06/2025	.....	9,212,548	523.47000000	.....	584,997	(181,495)	403,502	.....	851,807	0	0	(181,495)	.....	0	.....	.....
185415 Call Options – S&P Equal Weight Energy – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUIISFPUBM8PRO8K5P83	.06/06/2024	.06/06/2025	.....	56,652,620	1449.93000000	.....	3,846,713	(1,193,440)	2,653,273	.....	4,410,549	0	0	(1,193,440)	.....	0	.....	.....
185416 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	222	118,835,712	5352.96000000	.....	9,269,166	(2,928,445)	6,340,721	.....	1,870,230	0	0	(2,928,445)	.....	0	.....	.....
185418 Call Options – First Trust Barclays Edge Index – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.06/06/2024	.06/06/2025	.....	245,158	264.85400000	.....	7,036	(2,183)	4,853	.....	14,284	0	0	(2,183)	.....	0	.....	.....
185425 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	209	111,675,486	5352.96000000	.....	8,710,670	(2,751,997)	5,958,672	.....	3,917,018	0	0	(2,751,997)	.....	0	.....	.....
185434 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	95	51,005,893	5352.96000000	.....	3,978,451	(1,256,928)	2,721,523	.....	2,637,585	0	0	(1,256,928)	.....	0	.....	.....
185444 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	115	61,522,105	5352.96000000	.....	4,798,714	(1,516,077)	3,282,637	.....	3,377,737	0	0	(1,516,077)	.....	0	.....	.....
185455 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	145	77,403,802	5352.96000000	.....	6,037,484	(1,907,447)	4,130,037	.....	5,229,005	0	0	(1,907,447)	.....	0	.....	.....
185735 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUIISFPUBM8PRO8K5P83	.06/14/2024	.06/13/2025	.....	1,090,737	5417.66000000	.....	49,658	(14,346)	35,312	.....	81,290	0	0	(14,346)	.....	0	.....	.....
153001 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.06/17/2022	.06/18/2027	.....	3,972,298	3674.84000000	261,765	135,127	115,700	96,241	.....	149,418	0	0	(99,766)	.....	0	.....	.....
153006 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.06/17/2022	.06/20/2029	.....	1,273,169	3674.84000000	86,044	44,550	39,082	31,729	.....	49,747	0	0	(32,852)	.....	0	.....	.....
142042 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUIISFPUBM8PRO8K5P83	.06/18/2021	.06/19/2026	.....	4,246,800	4166.45000000	309,339	103,647	91,301	130,440	.....	135,590	0	0	(77,084)	.....	0	.....	.....
142043 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUIISFPUBM8PRO8K5P83	.06/18/2021	.06/20/2028	.....	5,895,992	4166.45000000	470,057	158,509	140,243	198,823	.....	204,595	0	0	(117,608)	.....	0	.....	.....
172868 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUIISFPUBM8PRO8K5P83	.06/20/2023	.06/20/2028	.....	17,848,623	4388.71000000	846,025	887,362	806,648	639,274	.....	922,354	0	0	(644,445)	.....	0	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
172870 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A. E570DZIWZ7F32TWIFA76	.06/20/2023	.06/20/2030	.....	9,849,798	..4388.71000000	459,001	480,894	439,484	346,447	.....	435,030	0	0	(349,485)	.....	.....0	.....	.....
172889 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/20/2023	.12/20/2024	8	3,510,968	..4388.71000000	390,416	(194,747)	.....	57,707	.....	103,548	0	0	(194,747)	.....	.....0	.....	.....
186119 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.06/20/2024	.06/20/2025	.....	13,491,957	..5473.17000000	.....	.....399,362	(108,414)	290,948	.....	561,434	0	0	(108,414)	.....	.....0	.....	.....
186120 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUISFPUBMPRO8K5P83	.06/20/2024	.06/20/2029	.....	22,181,244	..5473.17000000	0	1,191,133	(332,865)	858,268	.....	1,307,281	0	0	(332,865)	.....	.....0	.....	.....
186121 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMUISFPUBMPRO8K5P83	.06/20/2024	.06/20/2031	.....	70,189,078	..5473.17000000	0	3,828,814	(1,069,970)	2,758,844	.....	3,543,077	0	0	(1,069,970)	.....	.....0	.....	.....
186123 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	1,951	42,563,236	..218.16000000	.....	.....3,392,807	(941,411)	2,451,396	.....	2,222,786	0	0	(941,411)	.....	.....0	.....	.....
186136 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	212	1,667,313	..78.50000000	.....	.....111,296	(30,882)	80,414	.....	93,660	0	0	(30,882)	.....	.....0	.....	.....
186144 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/20/2024	.12/19/2025	4	2,189,268	..5473.17000000	.....	.....223,304	(41,307)	181,997	.....	33,948	0	0	(41,307)	.....	.....0	.....	.....
186148 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	186	101,800,962	..5473.17000000	.....	.....7,920,066	(2,197,601)	5,722,465	.....	1,535,335	0	0	(2,197,601)	.....	.....0	.....	.....
186157 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.06/20/2024	.06/20/2025	.....	18,593,960	..86.77000000	.....	.....1,564,228	(424,638)	1,139,590	.....	940,204	0	0	(424,638)	.....	.....0	.....	.....
186158 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	75	40,876,370	..5473.17000000	.....	.....3,180,162	(882,408)	2,297,754	.....	1,033,313	0	0	(882,408)	.....	.....0	.....	.....
186173 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.06/20/2024	.06/20/2025	.....	1,692,734	..265.05730000	.....	.....48,581	(13,188)	35,393	.....	94,509	0	0	(13,188)	.....	.....0	.....	.....
186183 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA ES71P3U3RH1GC71XB11	.06/20/2024	.06/20/2025	.....	23,141,444	..5473.17000000	.....	.....1,087,648	(295,262)	792,386	.....	463,911	0	0	(295,262)	.....	.....0	.....	.....
186192 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	82	44,941,239	..5473.17000000	.....	.....3,496,407	(970,157)	2,526,250	.....	2,312,898	0	0	(970,157)	.....	.....0	.....	.....
186203 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	87	47,416,261	..5473.17000000	.....	.....3,688,962	(1,023,586)	2,665,377	.....	2,047,236	0	0	(1,023,586)	.....	.....0	.....	.....
186213 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	97	53,268,667	..5473.17000000	.....	.....4,144,277	(1,149,923)	2,994,354	.....	2,493,998	0	0	(1,149,923)	.....	.....0	.....	.....
186221 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG BFM8T61CT2L1QCEMIK50	.06/20/2024	.06/20/2025	.....	7,539,960	..522.02000000	.....	.....477,279	(129,566)	347,713	.....	730,286	0	0	(129,566)	.....	.....0	.....	.....
186222 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	104	56,794,319	..5473.17000000	.....	.....4,418,571	(1,226,032)	3,192,539	.....	3,659,720	0	0	(1,226,032)	.....	.....0	.....	.....
186223 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BANK OF AMERICA, N.A. B4TYDEB6KIMZ0031MB27	.06/20/2024	.06/20/2025	.....	48,963,458	..1479.53000000	.....	.....3,373,582	(915,820)	2,457,762	.....	3,184,706	0	0	(915,820)	.....	.....0	.....	.....
186226 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.06/20/2024	.06/20/2025	.....	86,399	..265.05730000	.....	.....2,480	(673)	1,806	.....	5,004	0	0	(673)	.....	.....0	.....	.....
186231 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	236	129,260,130	..5473.17000000	.....	.....10,056,376	(2,790,368)	7,266,008	.....	4,356,125	0	0	(2,790,368)	.....	.....0	.....	.....
186663 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.07/05/2024	.07/06/2029	.....	25,733,818	..5567.19000000	0	1,373,929	(327,484)	1,046,444	.....	1,446,804	0	0	(327,484)	.....	.....0	.....	.....
186667 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.07/05/2024	.07/03/2031	.....	65,925,769	..5567.19000000	0	3,598,888	(857,817)	2,741,071	.....	3,713,658	0	0	(857,817)	.....	.....0	.....	.....
186670 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.07/05/2024	.07/03/2025	84	46,764,396	..5567.19000000	.....	.....3,638,292	(848,935)	2,789,357	.....	1,119,955	0	0	(848,935)	.....	.....0	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
186672 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	07/05/2024	07/03/2025		19,804,094	87.47000000		1,652,058	(381,952)	1,270,106		1,022,393	0	0	(381,952)		0		
186684 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	07/05/2024	07/03/2025	230	128,003,059	5567.19000000		9,958,698	(2,323,696)	7,635,002		3,911,456	0	0	(2,323,696)		0		
186692 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	07/05/2024	07/03/2025		1,425,602	263.91770000		40,772	(9,426)	31,346		84,803	0	0	(9,426)		0		
186695 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	07/05/2024	01/06/2026		1,416,098	5567.19000000		154,539	(23,492)	131,047		21,194	0	0	(23,492)		0		
186710 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	07/05/2024	07/03/2025	100	55,754,740	5567.19000000		4,337,745	(1,012,140)	3,325,604		2,376,035	0	0	(1,012,140)		0		
186711 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	07/05/2024	07/03/2025	2,313	51,104,639	220.93000000		4,061,909	(947,779)	3,114,130		2,711,231	0	0	(947,779)		0		
186718 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	07/05/2024	07/03/2025		8,284,757	521.97000000		515,312	(119,139)	396,173		813,529	0	0	(119,139)		0		
186725 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	07/05/2024	07/03/2025	111	61,549,294	5567.19000000		4,788,564	(1,117,332)	3,671,232		3,014,670	0	0	(1,117,332)		0		
186726 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BANK OF AMERICA, N.A.	07/05/2024	07/03/2025		61,684,934	1505.15000000		4,163,733	(962,646)	3,201,087		3,357,138	0	0	(962,646)		0		
186729 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	07/05/2024	07/03/2025		42,527	263.91770000		1,216	(281)	935		2,632	0	0	(281)		0		
186731 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	07/05/2024	07/03/2025	355	2,842,708	80.09000000		181,019	(42,238)	138,781		123,199	0	0	(42,238)		0		
186732 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	07/05/2024	07/03/2025		17,520,175	5567.19000000		560,646	(129,620)	431,026		223,031	0	0	(129,620)		0		
186738 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	07/05/2024	07/03/2025	150	83,507,850	5567.19000000		6,496,950	(1,515,955)	4,980,995		4,543,421	0	0	(1,515,955)		0		
186747 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	07/05/2024	07/03/2025	94	52,331,586	5567.19000000		4,071,422	(949,998)	3,121,424		3,336,386	0	0	(949,998)		0		
186748 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	07/05/2024	07/03/2025	235	130,828,965	5567.19000000		10,178,555	(2,353,259)	7,825,296		1,891,964	0	0	(2,353,259)		0		
186773 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	07/05/2024	07/03/2025		22,246,975	5567.19000000		1,112,349	(257,173)	855,176		410,621	0	0	(257,173)		0		
142044 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	07/06/2021	07/06/2026		4,766,527	4343.54000000		342,979	114,919	103,577		148,397	0	0	(85,414)		0		
142045 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	07/06/2021	07/06/2028		3,597,757	4343.54000000		273,908	92,070	81,640		115,950	0	0	(68,343)		0		
153829 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	07/06/2022	07/06/2029		4,331,917	3845.08000000		317,612	164,879	132,392		126,019	0	0	(121,240)		0		
153837 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	07/06/2022	07/06/2027		4,143,069	3845.08000000		293,781	152,637	133,068		162,685	0	0	(112,195)		0		
173539 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	07/06/2023	07/06/2028		16,509,643	4411.59000000		789,161	827,414	736,263		722,143	0	0	(599,367)		0		
173541 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	07/06/2023	07/05/2030		14,571,363	4411.59000000		690,683	723,693	644,162		553,089	0	0	(524,461)		0		
173543 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	07/06/2023	01/06/2025	9	3,970,431	4411.59000000		447,867	(222,974)	79,947		92,967	0	0	(222,974)		0		
186887 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	07/12/2024	07/11/2025		1,203,242	5633.42000000		51,482	(10,868)	40,613		53,312	0	0	(10,868)		0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
187077 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWEFA76	.07/19/2024	.07/20/2029	45,282,432	5505.00000000	0	2,404,497	(480,899)	1,923,598		2,281,105	0	0	(480,899)		0		
187079 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWEFA76	.07/19/2024	.07/18/2031	61,765,444	5505.00000000	0	3,353,864	(670,773)	2,683,091		2,786,444	0	0	(670,773)		0		
187088 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	GOLDMAN SACHS INTERNATIONAL	W22LROWP21HZNB6K528	.07/19/2024	.07/18/2025	15,404,072	92.91000000		1,301,645	(249,482)	1,052,163		695,344	0	0	(249,482)		0		
187091 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	82,676,732	5505.00000000		6,614,139	(1,282,520)	5,331,619		2,541,974	0	0	(1,282,520)		0		
187104 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.07/19/2024	.07/18/2025	878,199	267.55680000		25,204	(4,831)	20,373		42,926	0	0	(4,831)		0		
187109 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	52,523,205	5505.00000000		4,201,856	(814,764)	3,387,092		2,206,397	0	0	(814,764)		0		
187120 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	50,567,168	5505.00000000		4,045,373	(784,421)	3,260,952		2,581,175	0	0	(784,421)		0		
187131 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	50,095,500	5505.00000000		4,007,640	(777,105)	3,230,535		2,895,271	0	0	(777,105)		0		
187134 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.07/19/2024	.07/18/2025	19,457,970	5505.00000000		899,439	(172,392)	727,046		389,864	0	0	(172,392)		0		
187135 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	52,297,500	5505.00000000		4,183,800	(811,263)	3,372,537		3,650,811	0	0	(811,263)		0		
187141 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWEFA76	.07/19/2024	.07/18/2025	10,014,011	5505.00000000		281,394	(53,934)	227,460		499,037	0	0	(53,934)		0		
187144 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	38,947,939	221.73000000		3,103,820	(601,849)	2,501,972		1,982,071	0	0	(601,849)		0		
187156 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	BFMBT61CT2L10CEMIK50	.07/19/2024	.07/18/2025	6,400,300	533.56000000		392,978	(75,321)	317,658		498,106	0	0	(75,321)		0		
187157 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	2,270,091	79.53000000		144,146	(27,951)	116,196		104,722	0	0	(27,951)		0		
187158 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BANK OF AMERICA, N.A.	B4TYDEB6KMZ0031MB27	.07/19/2024	.07/18/2025	44,005,564	1488.34000000		2,965,535	(568,394)	2,397,141		2,801,973	0	0	(568,394)		0		
187161 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.07/19/2024	.07/18/2025	101,666	267.55680000		2,918	(559)	2,359		5,180	0	0	(559)		0		
187166 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/19/2024	.01/20/2026	1,651,500	5505.00000000		170,106	(21,769)	148,337		25,040	0	0	(21,769)		0		
187174 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	107,898,000	5505.00000000		8,631,840	(1,673,764)	6,958,076		1,595,313	0	0	(1,673,764)		0		
187192 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	43,489,500	5505.00000000		3,479,160	(674,629)	2,804,531		1,097,023	0	0	(674,629)		0		
142024 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWEFA76	.07/20/2021	.07/20/2026	4,182,637	4323.06000000	291,144	97,629	95,465	122,720		129,880	0	0	(72,504)		0		
142025 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWEFA76	.07/20/2021	.07/20/2028	2,039,052	4323.06000000	148,573	49,861	45,908	62,653		63,535	0	0	(37,016)		0		
154458 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUWSPU8MPR08K5P83	.07/20/2022	.07/20/2027	2,557,974	3959.90000000	184,369	95,601	77,312	76,737		71,793	0	0	(70,246)		0		
154462 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUWSPU8MPR08K5P83	.07/20/2022	.07/20/2029	1,734,536	3959.90000000	128,937	66,943	52,585	53,733		17,554	0	0	(49,158)		0		
174172 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWEFA76	.07/20/2023	.07/20/2028	10,400,394	4534.87000000		527,761	256,382	422,209		503,572	502,339	0	0	(607,891)		0	
174176 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWEFA76	.07/20/2023	.07/19/2030	12,993,512	4534.87000000		671,567	334,752	537,254		571,585	637,981	0	0	(772,295)		0	

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
174182 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	07/20/2023	01/17/2025	8	3,549,896	4534.87000000	383,032		(191,726)	76,466		88,325	0	0	(191,726)		0		
174697 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/04/2023	02/06/2025	11	4,925,833	4478.03000000	548,735		(271,679)	128,938		127,623	0	0	(271,679)		0		
174777 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	08/04/2023	08/04/2028		18,175,824	4478.03000000	885,163	929,958	841,240	784,609		971,391	0	0	(669,171)		0		
174779 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	08/04/2023	08/06/2030		12,413,995	4478.03000000	615,734	647,970	588,290	546,692		618,071	0	0	(465,658)		0		
155031 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	08/05/2022	08/06/2029		2,584,672	4145.19000000	183,241	95,151	82,127	80,546		108,538	0	0	(69,763)		0		
155103 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	08/05/2022	08/06/2027		1,336,139	4145.19000000	97,484	50,699	42,969	42,917		57,833	0	0	(37,141)		0		
142046 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	08/06/2021	08/06/2026		4,064,101	4436.52000000	280,227	93,517	81,264	117,724		130,075	0	0	(69,567)		0		
142047 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	08/06/2021	08/04/2028		3,826,358	4436.52000000	286,658	96,125	82,318	120,780		127,830	0	0	(71,343)		0		
187653 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	08/06/2024	08/06/2025		13,653,767	5240.03000000		368,652	(53,825)	314,827		646,983	0	0	(53,825)		0		
187656 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	08/06/2024	08/06/2029		50,386,964	5240.03000000	0	2,610,045	(393,294)	2,216,750		3,011,027	0	0	(393,294)		0		
187658 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	08/06/2024	08/06/2031		95,861,892	5240.03000000	0	5,090,266	(767,026)	4,323,240		5,364,792	0	0	(767,026)		0		
187688 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/06/2024	08/06/2025	2,146	47,368,201	220.70000000		3,790,315	(562,299)	3,228,015		2,431,854	0	0	(562,299)		0		
187698 Call Options - S&P U.S. Retiree	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	08/06/2024	08/06/2025		7,383,782	538.91000000		427,521	(62,420)	365,101		518,689	0	0	(62,420)		0		
Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	08/06/2024	08/06/2025		54,891,289	1434.10000000		3,485,597	(508,916)	2,976,681		5,397,951	0	0	(508,916)		0		
187702 Call Options - S&P Equal Weight	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/06/2024	08/06/2025	275	2,074,045	75.45000000		150,365	(22,307)	128,058		126,425	0	0	(22,307)		0		
187705 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	08/06/2024	08/06/2025		100,521	271.64580000		2,905	(424)	2,481		4,058	0	0	(424)		0		
187706 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/06/2024	02/06/2026	5	2,620,015	5240.03000000		279,555	(27,547)	252,008		42,252	0	0	(27,547)		0		
187713 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	SOCIETE GENERAL	08/06/2024	08/06/2025		18,740,199	94.84000000		1,630,397	(238,047)	1,392,350		790,758	0	0	(238,047)		0		
187718 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/06/2024	08/06/2025	220	115,310,214	5240.03000000		9,974,276	(1,479,700)	8,494,576		3,947,541	0	0	(1,479,700)		0		
187728 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	08/06/2024	08/06/2025		2,571,268	271.64580000		74,310	(10,850)	63,460		100,778	0	0	(10,850)		0		
187738 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/06/2024	08/06/2025	101	52,917,281	5240.03000000		4,577,319	(679,053)	3,898,266		2,504,603	0	0	(679,053)		0		
187742 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/06/2024	08/06/2025	99	51,876,297	5240.03000000		4,487,274	(665,694)	3,821,580		3,359,205	0	0	(665,694)		0		
187750 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	08/06/2024	08/06/2025		113,273,266	5240.03000000		10,333,920	(1,508,809)	8,825,111		1,787,882	0	0	(1,508,809)		0		
187756 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	08/06/2024	08/06/2025		61,997,513	5240.03000000		5,656,033	(825,812)	4,830,221		1,655,181	0	0	(825,812)		0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
187769 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	08/06/2024	08/06/2025		53,870,958	5240.03000000		5,144,677	(751,151)	4,393,525		3,076,910	0	0	(751,151)		0		
187782 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	08/06/2024	08/06/2025		54,963,870	5240.03000000		5,001,712	(730,278)	4,271,435		4,303,004	0	0	(730,278)		0		
187784 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	08/06/2024	08/06/2025		24,037,695	5240.03000000		1,348,515	(196,891)	1,151,624		530,821	0	0	(196,891)		0		
187845 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	08/09/2024	08/08/2025		1,175,627	5206.04000000		82,648	(11,020)	71,628		146,139	0	0	(11,020)		0		
175362 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	08/18/2023	08/18/2028		22,097,696	4369.71000000	1,082,787	1,138,529	1,039,621	1,004,248		980,329	0	0	(816,585)		0		
175364 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	08/18/2023	08/20/2030		14,097,552	4369.71000000	696,419	732,879	671,604	646,440		537,344	0	0	(525,278)		0		
175426 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/18/2023	02/20/2025	9	3,932,739	4369.71000000	458,955		(227,165)	119,546		97,811	0	0	(227,165)		0		
155746 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	08/19/2022	08/20/2027		1,556,207	4228.48000000	112,181	57,556	46,125	50,929		38,514	0	0	(42,168)		0		
155753 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	08/19/2022	08/20/2029		1,396,739	4228.48000000	103,203	52,995	41,707	46,893		10,424	0	0	(38,798)		0		
142048 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	08/20/2021	08/20/2026		1,809,340	4441.67000000	123,509	41,055	34,538	51,739		45,084	0	0	(30,555)		0		
142049 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	08/20/2021	08/18/2028		2,137,781	4441.67000000	164,799	55,071	47,538	69,293		58,758	0	0	(40,803)		0		
188217 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	08/20/2024	08/20/2025		11,425,022	5597.12000000		342,751	(36,824)	305,926		474,632	0	0	(36,824)		0		
188219 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	08/20/2024	08/20/2029		52,218,175	5597.12000000	0	2,642,240	(296,800)	2,345,440		2,814,813	0	0	(296,800)		0		
188221 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	08/20/2024	08/20/2031		73,254,695	5597.12000000	0	3,787,268	(425,419)	3,361,849		3,139,043	0	0	(425,419)		0		
188223 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/20/2024	02/20/2026	3	1,679,136	5597.12000000		163,380	(11,926)	151,454		24,540	0	0	(11,926)		0		
188229 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/20/2024	08/20/2025	162	90,673,344	5597.12000000		6,954,660	(764,248)	6,190,412		1,282,760	0	0	(764,248)		0		
188237 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/20/2024	08/20/2025	90	50,374,080	5597.12000000		3,863,700	(424,582)	3,439,118		1,191,714	0	0	(424,582)		0		
188249 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/20/2024	08/20/2025	125	69,964,000	5597.12000000		5,366,250	(589,698)	4,776,552		4,613,916	0	0	(589,698)		0		
188253 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/20/2024	08/20/2025	148	82,848,570	5597.12000000		6,354,499	(682,715)	5,671,784		2,491,489	0	0	(682,715)		0		
188263 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/20/2024	08/20/2025	84	47,190,438	5597.12000000		3,619,514	(397,749)	3,221,765		2,002,364	0	0	(397,749)		0		
188275 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	08/20/2024	08/20/2025	125	70,152,959	5597.12000000		5,380,743	(591,290)	4,789,453		3,681,345	0	0	(591,290)		0		
188292 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	08/20/2024	08/20/2025		32,488,180	232.46000000		2,678,877	(287,813)	2,391,064		1,350,356	0	0	(287,813)		0		
188299 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	08/20/2024	08/20/2025		5,833,128	544.83000000		337,738	(36,286)	301,452		360,299	0	0	(36,286)		0		
188302 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	08/20/2024	08/20/2025		40,428,115	1480.78000000		2,522,714	(271,035)	2,251,679		2,787,404	0	0	(271,035)		0		
188303 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	08/20/2024	08/20/2025		14,816,346	96.35000000		1,096,410	(117,796)	978,614		589,924	0	0	(117,796)		0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5		6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse		Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
188304 Call Options – First Trust Barclays Edge Index – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.08/20/2024	.08/20/2025	.....	76,410	... 274.86270000	.....	... 2,208	 (237)	 1,971	.....	2,542	 0	 0	 (237)	.....	..... 0	.....	.....
188311 Call Options – Ishares MSCI EAFE – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	BFM8T61CT2L1QCEMIK50	.08/20/2024	.08/20/2025	.....	2,541,627	... 81.06000000	.....	... 162,664	 (17,476)	 145,188	.....	133,275	 0	 0	 (17,476)	.....	..... 0	.....	.....
188328 Call Options – First Trust Barclays Edge Index – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.08/20/2024	.08/20/2025	.....	1,559,116	... 274.86270000	.....	... 45,058	 (4,841)	 40,217	.....	50,604	 0	 0	 (4,841)	.....	..... 0	.....	.....
188330 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.08/20/2024	.08/20/2025	.....	20,138,302	... 5597.12000000	.....	... 948,721	 (101,929)	 846,793	.....	390,100	 0	 0	 (101,929)	.....	..... 0	.....	.....
142050 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGQFU57RNE97	.09/03/2021	.09/04/2026	.....	1,540,167	... 4535.43000000	... 127,053	... 42,366	... 24,873	... 53,291	.....	39,004	 0	 0	 (31,507)	.....	..... 0	.....	.....
142051 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGQFU57RNE97	.09/03/2021	.09/06/2028	.....	2,111,925	... 4535.43000000	... 180,586	... 60,459	... 37,798	... 75,953	.....	46,706	 0	 0	 (44,866)	.....	..... 0	.....	.....
156500 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWIFA76	.09/06/2022	.09/06/2027	.....	1,564,291	... 3908.19000000	... 110,816	... 57,413	... 47,198	... 53,634	.....	58,835	 0	 0	 (42,026)	.....	..... 0	.....	.....
156505 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGQFU57RNE97	.09/06/2022	.09/06/2029	.....	987,646	... 3908.19000000	... 73,017	... 37,910	... 30,219	... 35,415	.....	59,623	 0	 0	 (27,714)	.....	..... 0	.....	.....
175981 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/06/2023	.03/06/2025	... 9	4,018,932	... 4465.48000000	... 450,117	.....	... (225,233)	... 129,429	.....	112,614	 0	 0	... (225,233)	.....	..... 0	.....	.....
176071 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWIFA76	.09/06/2023	.09/06/2028	.....	17,149,201	... 4465.48000000	... 874,609	... 923,452	... 860,199	... 862,598	.....	892,753	 0	 0	... (657,505)	.....	..... 0	.....	.....
176074 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWIFA76	.09/06/2023	.09/06/2030	.....	18,278,088	... 4465.48000000	... 939,494	... 993,144	... 935,008	... 927,695	.....	850,783	 0	 0	... (706,365)	.....	..... 0	.....	.....
188736 Call Options – Ishares MSCI EAFE – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/06/2024	.09/05/2025	... 304	2,422,651	... 79.80000000	.....	... 183,976	... (10,702)	... 173,274	.....	127,991	 0	 0	... (10,702)	.....	..... 0	.....	.....
188745 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/06/2024	.03/06/2026	... 3	1,622,526	... 5408.42000000	.....	... 164,037	... (6,344)	... 157,693	.....	24,933	 0	 0	... (6,344)	.....	..... 0	.....	.....
188751 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/06/2024	.09/05/2025	... 85	45,971,570	... 5408.42000000	.....	... 3,760,485	... (218,754)	... 3,541,731	.....	1,163,760	 0	 0	... (218,754)	.....	..... 0	.....	.....
188769 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/06/2024	.09/05/2025	... 186	100,399,637	... 5408.42000000	.....	... 8,212,713	... (477,748)	... 7,734,966	.....	3,179,464	 0	 0	... (477,748)	.....	..... 0	.....	.....
188780 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/06/2024	.09/05/2025	... 90	48,482,159	... 5408.42000000	.....	... 3,965,852	... (230,701)	... 3,735,151	.....	2,083,556	 0	 0	... (230,701)	.....	..... 0	.....	.....
188792 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/06/2024	.09/05/2025	... 100	54,230,498	... 5408.42000000	.....	... 4,436,067	... (258,054)	... 4,178,013	.....	2,831,485	 0	 0	... (258,054)	.....	..... 0	.....	.....
188805 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	MORGAN STANLEY & CO. INTERNATIONAL PLC	4PQUHN3JPFQFNF3BB653	.09/06/2024	.09/05/2025	.....	12,958,226	... 5408.42000000	.....	... 382,268	... (21,237)	... 361,031	.....	582,390	 0	 0	... (21,237)	.....	..... 0	.....	.....
188807 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGQFU57RNE97	.09/06/2024	.09/05/2025	.....	24,045,861	... 5408.42000000	.....	... 529,020	... (29,390)	... 499,630	.....	554,700	 0	 0	... (29,390)	.....	..... 0	.....	.....
188815 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWIFA76	.09/06/2024	.09/06/2029	.....	39,950,611	... 5408.42000000	 0	... 1,973,560	... (129,768)	... 1,843,792	.....	2,171,821	 0	 0	... (129,768)	.....	..... 0	.....	.....
188817 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZIWZ7FF32TWIFA76	.09/06/2024	.09/05/2031	.....	96,706,819	... 5408.42000000	 0	... 4,806,329	... (316,033)	... 4,490,296	.....	4,936,097	 0	 0	... (316,033)	.....	..... 0	.....	.....
188826 Call Options – S&P U.S. Retiree Spending Index – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	BFM8T61CT2L1QCEMIK50	.09/06/2024	.09/05/2025	.....	8,607,761	... 548.77000000	.....	... 476,870	... (26,493)	... 450,377	.....	491,578	 0	 0	... (26,493)	.....	..... 0	.....	.....
188827 Call Options – S&P Equal Weight Energy – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BANK OF AMERICA, N.A.	B4TYDEB6KMZ0031MB27	.09/06/2024	.09/05/2025	.....	50,791,159	... 1455.61000000	.....	... 3,133,815	... (174,101)	... 2,959,714	.....	4,361,529	 0	 0	... (174,101)	.....	..... 0	.....	.....
188828 Call Options – SPDR Gold shares – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.09/06/2024	.09/05/2025	.....	38,577,710	... 230.63000000	.....	... 3,044,013	... (169,112)	... 2,874,901	.....	1,609,274	 0	 0	... (169,112)	.....	..... 0	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5		6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse		Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
188829 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.09/06/2024	.09/05/2025	.....	162,441	... 277.16230000	.....	... 4,695	 (261)	 4,434	.....	... 4,719	 0	 0	 (261)	.....	... 0	.....	.....
188837 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	SOCIETE GENERAL ...	02RNE81BX4R0TD8PU41	.09/06/2024	.09/05/2025	.....	18,603,314	...99.40000000	.....	... 1,482,684	 (82,371)	 1,400,313	.....	... 651,111	 0	 0	 (82,371)	.....	... 0	.....	.....
188848 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.09/06/2024	.09/05/2025	.....	3,015,303	... 277.16230000	.....	... 87,142	 (4,841)	 82,301	.....	... 85,082	 0	 0	 (4,841)	.....	... 0	.....	.....
188851 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYMCUFXT09	.09/06/2024	.09/05/2025	.....	103,280,866	...5408.42000000	.....	... 8,897,647	 (494,314)	 8,403,333	.....	... 1,555,314	 0	 0	 (494,314)	.....	... 0	.....	.....
188855 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BANK OF AMERICA, N.A.	B4TYDEB6GKMZ0031MB27	.09/06/2024	.09/05/2025	.....	56,472,783	...5408.42000000	.....	... 4,879,248	 (271,069)	 4,608,179	.....	... 3,422,580	 0	 0	 (271,069)	.....	... 0	.....	.....
188857 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BANK OF AMERICA, N.A.	B4TYDEB6GKMZ0031MB27	.09/06/2024	.09/05/2025	.....	81,588,840	...5408.42000000	.....	... 7,049,276	 (391,626)	 6,657,649	.....	... 6,091,565	 0	 0	 (391,626)	.....	... 0	.....	.....
189082 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.09/13/2024	.09/12/2025	.....	701,130	...5553.94000000	.....	... 39,781	 (1,437)	 38,344	.....	... 50,833	 0	 0	 (1,437)	.....	... 0	.....	.....
142217 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUWSPFUBMPRO8K5P83	.09/20/2021	.09/18/2026	.....	1,174,913	...4357.73000000	.....	... 79,948	 26,637	 22,605	.....	... 33,492	 0	 0	 (19,811)	.....	... 0	.....	.....
142219 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUWSPFUBMPRO8K5P83	.09/20/2021	.09/20/2028	.....	1,873,140	...4357.73000000	.....	... 136,949	 45,813	 38,372	.....	... 57,538	 0	 0	 (33,994)	.....	... 0	.....	.....
156979 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGOFU57RNE97	.09/20/2022	.09/20/2027	.....	1,181,616	...3855.93000000	.....	... 92,347	 48,258	 40,124	.....	... 46,932	 0	 0	 (35,087)	.....	... 0	.....	.....
156984 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGOFU57RNE97	.09/20/2022	.09/20/2029	.....	908,253	...3855.93000000	.....	... 71,167	 37,190	 30,771	.....	... 36,168	 0	 0	 (27,040)	.....	... 0	.....	.....
176735 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/20/2023	.03/20/2025	...14	6,163,080	...4402.20000000	.....	... 687,190	 (343,830)	 215,219	.....	... 141,102	 0	 0	 (343,830)	.....	... 0	.....	.....
176794 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZIVZ7FF32WEFA76	.09/20/2023	.09/20/2028	.....	19,904,336	...4402.20000000	...1,100,710	... 1,173,710	... 1,151,030	... 1,141,354	.....	... 892,706	 0	 0	 (825,471)	.....	... 0	.....	.....
176797 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	E570DZIVZ7FF32WEFA76	.09/20/2023	.09/20/2030	.....	16,076,508	...4402.20000000	...901,892	... 963,369	... 950,524	... 936,807	.....	... 603,647	 0	 0	 (676,419)	.....	... 0	.....	.....
189363 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.09/20/2024	.09/19/2025	.....	43,928,755	...5702.55000000	.....	... 3,497,472	 (58,291)	... 3,439,181	.....	... 2,080,324	 0	 0	 (58,291)	.....	... 0	.....	.....
189371 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	BFMBT61CT2L10CEMIK50	.09/20/2024	.09/19/2025	.....	52,237,042	...5702.55000000	.....	... 4,160,680	 (69,345)	... 4,091,336	.....	... 2,816,071	 0	 0	 (69,345)	.....	... 0	.....	.....
189374 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	BFMBT61CT2L10CEMIK50	.09/20/2024	.09/19/2025	.....	51,158,461	...5702.55000000	.....	... 4,092,677	 (68,211)	... 4,024,466	.....	... 3,215,656	 0	 0	 (68,211)	.....	... 0	.....	.....
189383 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RH1GC71XBU11	.09/20/2024	.09/19/2025	.....	23,305,878	...5702.55000000	.....	... 1,083,723	 (18,062)	... 1,065,661	.....	... 368,832	 0	 0	 (18,062)	.....	... 0	.....	.....
189388 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGOFU57RNE97	.09/20/2024	.09/19/2025	.....	11,787,450	...5702.55000000	.....	... 330,049	 (5,501)	... 324,548	.....	... 255,061	 0	 0	 (5,501)	.....	... 0	.....	.....
189390 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RH1GC71XBU11	.09/20/2024	.09/20/2029	.....	56,564,285	...5702.55000000	 0	... 2,703,773	... (74,076)	... 2,629,697	.....	... 2,680,977	 0	 0	 (74,076)	.....	... 0	.....	.....
189395 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RH1GC71XBU11	.09/20/2024	.09/19/2031	.....	77,291,126	...5702.55000000	 0	... 3,671,329	... (100,584)	... 3,570,744	.....	... 3,656,720	 0	 0	 (100,584)	.....	... 0	.....	.....
189400 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/20/2024	.09/19/2025	 1,399	33,878,087	...242.21000000	.....	... 2,611,386	 (50,636)	... 2,560,750	.....	... 1,006,370	 0	 0	 (50,636)	.....	... 0	.....	.....
189422 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/20/2024	.09/19/2025	 192	1,578,513	...82.26000000	.....	... 94,795	 (1,838)	... 92,957	.....	... 66,785	 0	 0	 (1,838)	.....	... 0	.....	.....
189432 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/20/2024	.03/20/2026	 3	1,710,765	...5702.55000000	.....	... 161,154	 (2,077)	... 159,077	.....	... 23,981	 0	 0	 (2,077)	.....	... 0	.....	.....
189436 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/20/2024	.09/19/2025	 154	87,819,270	...5702.55000000	.....	... 6,542,536	 (126,864)	... 6,415,672	.....	... 1,148,902	 0	 0	 (126,864)	.....	... 0	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
189467 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	09/20/2024	09/19/2025		7,462,432	553.92000000		400,733	(6,679)	394,054		378,353	0	0	(6,679)		0		
189469 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	09/20/2024	09/19/2025		82,526	279.60270000		2,393	(40)	2,353		2,062	0	0	(40)		0		
189471 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	09/20/2024	09/19/2025		17,458,846	102.27000000		1,128,201	(18,803)	1,109,398		520,579	0	0	(18,803)		0		
189480 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	09/20/2024	09/19/2025		2,731,652	279.60270000		79,218	(1,320)	77,898		66,438	0	0	(1,320)		0		
189484 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	09/20/2024	09/19/2025		129,994,882	5702.55000000		10,360,592	(172,677)	10,187,916		3,372,726	0	0	(172,677)		0		
189492 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	09/20/2024	09/19/2025		42,887,451	1499.51000000		2,624,729	(43,745)	2,580,984		2,908,279	0	0	(43,745)		0		
189495 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	09/20/2024	09/19/2025		43,607,605	5702.55000000		3,471,601	(57,860)	3,413,741		1,709,220	0	0	(57,860)		0		
142231 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	10/06/2021	10/06/2026		1,802,792	4363.55000000		124,817	(31,046)	10,548		70,719	0	0	(31,046)		0		
142232 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	10/06/2021	10/06/2028		2,272,939	4363.55000000		175,701	(43,829)	14,831		96,418	0	0	(43,829)		0		
158076 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	10/06/2022	10/06/2027		2,932,137	3744.52000000		282,047	(108,276)	1,976		179,429	0	0	(108,276)		0		
158083 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	10/06/2022	10/05/2029		2,188,606	3744.52000000		222,688	(85,678)	1,563		89,668	0	0	(85,678)		0		
177507 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	10/06/2023	04/04/2025	10	4,308,500	4308.50000000		388,200	(193,835)	133,220		92,641	0	0	(193,835)		0		
177511 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	10/06/2023	10/04/2024	106	45,670,100	4308.50000000		4,114,920	(3,096,992)	45,721		940,350	0	0	(3,096,992)		0		
177514 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	10/06/2023	10/04/2024	118	50,840,300	4308.50000000		4,580,760	(3,447,595)	50,897		1,377,028	0	0	(3,447,595)		0		
177523 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	10/06/2023	10/04/2024	124	53,425,400	4308.50000000		4,813,680	(3,622,897)	53,485		1,917,002	0	0	(3,622,897)		0		
177526 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	10/06/2023	10/04/2024		42,905,021	1214.70000000		2,990,480	(2,250,618)	33,320		10,424,840	0	0	(2,250,618)		0		
177529 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	10/06/2023	10/04/2024		8,828,621	494.62000000		583,572	(439,193)	6,502		1,084,929	0	0	(439,193)		0		
177531 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	10/06/2023	10/04/2024	99	42,837,649	4308.50000000		3,859,713	(2,904,917)	42,886		1,686,848	0	0	(2,904,917)		0		
177546 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	10/06/2023	10/04/2024	108	46,746,622	4308.50000000		4,211,916	(3,169,994)	46,799		1,980,988	0	0	(3,169,994)		0		
177560 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	10/06/2023	10/04/2024	122	52,369,214	4308.50000000		4,718,517	(3,551,274)	52,428		2,569,980	0	0	(3,551,274)		0		
177570 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	10/06/2023	10/04/2024	108	46,423,097	4308.50000000		4,182,766	(3,148,055)	46,475		2,825,674	0	0	(3,148,055)		0		
177579 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	10/06/2023	10/04/2024	114	49,266,836	4308.50000000		4,438,989	(3,340,895)	49,322		4,791,121	0	0	(3,340,895)		0		
177590 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	10/06/2023	10/04/2024	184	79,276,400	4308.50000000		7,142,880	(5,375,911)	79,365		8,929,675	0	0	(5,375,911)		0		
177593 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	10/06/2023	10/04/2024		73,931,298	4308.50000000		6,877,000	(5,175,590)	76,624		1,462,474	0	0	(5,175,590)		0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
177594 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	10/06/2023	10/06/2028	28,835,985	4308.50000000	1,603,281		(1,203,559)	21,963		2,306,086	0	0	(1,203,559)		0		
177597 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	10/06/2023	10/04/2030	27,912,359	4308.50000000	1,599,378		(1,200,629)	21,909		1,911,291	0	0	(1,200,629)		0		
177598 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC MORGAN STANLEY & CO. INTERNATIONAL PLC	G5GSEF7VJP5170UK5573	10/06/2023	10/04/2024	31,934,184	4308.50000000	1,669,317		(1,256,318)	18,600		918,793	0	0	(1,256,318)		0		
177600 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	PLC	4PQUH3JPGFNF3BB653	10/06/2023	10/04/2024	15,614,459	4308.50000000	424,713		(319,637)	4,732		1,855,138	0	0	(319,637)		0		
177479 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/09/2023	10/04/2024	2,242	169.70000000	3,083,286		(2,340,222)	34,164		2,705,107	0	0	(2,340,222)		0		
177488 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/09/2023	10/04/2024	2,775	76.77000000	1,814,733		(1,377,387)	20,108		1,250,750	0	0	(1,377,387)		0		
177499 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/09/2023	10/04/2024	232	1,588,530	127,277		(96,604)	1,410		101,833	0	0	(96,604)		0		
177770 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYMCJFXTO9	10/13/2023	10/13/2024	1,367,847	4375.57485903	68,096		(50,952)	2,445		253,338	0	0	(50,952)		0		
142242 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	10/20/2021	10/20/2026	2,142,631	4536.19000000	151,478		(37,665)	12,756		73,268	0	0	(37,665)		0		
142243 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	10/20/2021	10/20/2028	2,133,408	4536.19000000	162,937		(40,601)	13,715		74,149	0	0	(40,601)		0		
158729 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	E570DZVZ7FF32TWEFA76	10/20/2022	10/20/2027	6,530,815	3665.78000000	659,610		(253,952)	17,610		520,088	0	0	(253,952)		0		
158732 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSPFUBMPROBK5P83	10/20/2022	10/19/2029	3,668,206	3665.78000000	382,590		(147,318)	10,215		142,692	0	0	(147,318)		0		
177903 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/20/2023	10/18/2024	1,637	30,045,998	183.59000000		(1,998,334)	132,441		2,122,270	0	0	(1,998,334)		0		
177925 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/20/2023	10/18/2024	86	574,398	46,162		(34,730)	2,302		32,096	0	0	(34,730)		0		
177932 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/20/2023	04/17/2025	10	4,224,160	4224.16000000		(250,436)	183,631		211,314	0	0	(250,436)		0		
177939 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/20/2023	10/18/2024	138	58,293,408	4224.16000000		(4,087,384)	270,894		1,620,105	0	0	(4,087,384)		0		
177949 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/20/2023	10/18/2024	104	44,033,320	4224.16000000		(3,087,504)	204,626		1,635,935	0	0	(3,087,504)		0		
177959 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/20/2023	10/18/2024	147	61,983,381	4224.16000000		(4,346,116)	288,041		2,648,493	0	0	(4,346,116)		0		
177970 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/20/2023	10/18/2024	104	43,750,470	4224.16000000		(3,067,671)	203,312		3,106,485	0	0	(3,067,671)		0		
177971 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGFU57PNE97	10/20/2023	10/18/2024	35,345,118	1196.46000000	2,445,882		(1,839,787)	122,294		9,323,971	0	0	(1,839,787)		0		
177974 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	BFBMT61CT2L10CEMIK50	10/20/2023	10/18/2024	7,651,762	492.53000000	501,956		(377,570)	25,098		993,958	0	0	(377,570)		0		
177980 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSPFUBMPROBK5P83	10/20/2023	10/20/2028	25,497,560	4224.16000000	1,455,911		(1,092,930)	75,787		2,308,955	0	0	(1,092,930)		0		
177984 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSPFUBMPROBK5P83	10/20/2023	10/18/2030	30,461,212	4224.16000000	1,812,442		(1,360,573)	94,346		2,447,544	0	0	(1,360,573)		0		
177987 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYMCJFXTO9	10/20/2023	10/18/2024	13,212,998	4224.16000000	402,996		(303,133)	20,150		1,809,192	0	0	(303,133)		0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
177990 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	10/20/2023	10/18/2024		16,480,710	74.75000000	1,573,907		(1,183,889)	78,695		1,017,233	0		(1,183,889)		0		
178004 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	10/20/2023	10/18/2024		72,956,407	4224.16000000	7,035,916		(5,292,400)	351,796		1,467,136	0		(5,292,400)		0		
178011 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	10/20/2023	10/18/2024		52,541,392	4224.16000000	5,067,092		(3,811,455)	253,355		2,745,815	0		(3,811,455)		0		
178025 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BANK OF AMERICA, N.A.	10/20/2023	10/18/2024		48,792,077	4224.16000000	4,586,455		(3,449,922)	229,323		4,869,357	0		(3,449,922)		0		
178031 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BANK OF AMERICA, N.A.	10/20/2023	10/18/2024		80,679,356	4224.16000000	7,583,859		(5,704,562)	379,193		9,142,845	0		(5,704,562)		0		
178036 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	10/20/2023	10/18/2024		23,572,584	4224.16000000	1,308,278		(984,084)	65,414		806,591	0		(984,084)		0		
159834 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	11/04/2022	11/05/2027		11,680,363	3770.55000000	1,019,060		(392,342)	48,685		1,207,105	0		(392,342)		0		
159838 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	11/04/2022	11/06/2029		7,664,623	3770.55000000	708,308		(272,799)	33,851		796,523	0		(272,799)		0		
143735 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/05/2021	11/06/2028		3,225,894	4697.53000000	236,840		(59,004)	19,861		128,895	0		(59,004)		0		
143737 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/05/2021	11/06/2026		1,317,530	4697.53000000	90,049		(22,395)	7,550		50,838	0		(22,395)		0		
178390 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	11/06/2023	05/06/2025		4,703,317	4365.98000000	536,507		(267,959)	214,603		221,740	0		(267,959)		0		
178397 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/06/2023	11/06/2024		51,696,594	4365.98000000	4,562,224		(3,412,902)	463,743		1,876,834	0		(3,412,902)		0		
178406 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/06/2023	11/06/2024		49,921,490	4365.98000000	4,405,571		(3,295,713)	447,819		2,029,434	0		(3,295,713)		0		
178421 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/06/2023	11/06/2024		43,057,215	4365.98000000	3,799,799		(2,842,548)	386,243		1,975,804	0		(2,842,548)		0		
178431 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/06/2023	11/06/2024		51,713,051	4365.98000000	4,564,711		(3,414,762)	463,995		2,863,128	0		(3,414,762)		0		
178435 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/06/2023	11/06/2024		33,391,840	4365.98000000	2,947,498		(2,204,959)	299,608		2,197,925	0		(2,204,959)		0		
178444 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	11/06/2023	11/06/2024		18,621,821	4365.98000000	601,485		(449,958)	61,140		2,052,835	0		(449,958)		0		
178447 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	11/06/2023	11/06/2028		37,538,719	4365.98000000	2,102,168		(1,578,066)	207,337		3,133,917	0		(1,578,066)		0		
178450 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	11/06/2023	11/06/2030		43,943,432	4365.98000000	2,561,902		(1,923,181)	252,681		3,378,272	0		(1,923,181)		0		
178461 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/06/2023	11/06/2024	1,872	34,326,457	183.35000000	2,804,529		(2,098,788)	284,295		2,385,066	0		(2,098,788)		0		
178469 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/06/2023	11/06/2024	2,602	20,548,884	78.97000000	1,831,887		(1,370,906)	185,698		1,227,833	0		(1,370,906)		0		
178477 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/06/2023	11/06/2024	146	1,011,407	69.31000000	79,237		(59,298)	8,032		66,075	0		(59,298)		0		
178503 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	11/06/2023	11/06/2024		31,886,501	4365.98000000	1,543,307		(1,154,514)	156,875		1,053,375	0		(1,154,514)		0		
178508 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/06/2023	11/06/2024	134	58,504,132	4365.98000000	4,996,190		(3,738,933)	506,463		1,147,477	0		(3,738,933)		0		
178509 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	11/06/2023	11/06/2024		42,250,102	1225.02000000	2,847,657		(2,130,271)	289,460		10,034,745	0		(2,130,271)		0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
178510 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	11/06/2023	11/06/2024		11,133,582	499.30000000	722,569		(540,539)	73,448		1,307,006	0	0	(540,539)		0		
178512 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/06/2023	11/06/2024	134	58,504,132	4365.98000000	4,996,190		(3,738,933)	506,463		1,193,783	0	0	(3,738,933)		0		
178514 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/06/2023	11/06/2024	187	81,643,826	4365.98000000	6,972,295		(5,217,765)	706,781		2,272,144	0	0	(5,217,765)		0		
178519 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/06/2023	11/06/2024	183	80,027,278	4365.98000000	6,834,244		(5,114,453)	692,786		7,734,613	0	0	(5,114,453)		0		
178527 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/06/2023	11/06/2024	113	49,335,574	4365.98000000	4,213,205		(3,152,981)	427,092		5,369,287	0	0	(3,152,981)		0		
178529 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/06/2023	11/06/2024	95	41,476,810	4365.98000000	3,542,075		(2,650,736)	359,060		4,888,366	0	0	(2,650,736)		0		
178677 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/10/2023	11/08/2024		1,175,658	4377.9609682	54,090		(40,651)	5,860		239,893	0	0	(40,651)		0		
160843 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/18/2022	11/19/2027		12,068,585	3965.34000000	1,195,890		(460,153)	80,611		969,669	0	0	(460,153)		0		
160847 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/18/2022	11/20/2029		7,589,428	3965.34000000	781,510		(301,235)	52,771		586,801	0	0	(301,235)		0		
143909 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/19/2021	11/20/2026		1,146,967	4697.96000000	78,046		(19,406)	6,519		42,768	0	0	(19,406)		0		
143911 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	11/19/2021	11/20/2028		2,303,354	4697.96000000	177,394		(44,263)	14,833		96,775	0	0	(44,263)		0		
178947 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	11/20/2024	1,753	32,143,147	183.37000000	2,555,746		(1,912,342)	357,104		2,040,845	0	0	(1,912,342)		0		
178958 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	11/20/2024	1,852	15,246,725	82.34000000	1,257,290		(940,770)	175,676		883,269	0	0	(940,770)		0		
178976 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	11/20/2024	188	1,355,545	72.12000000	89,655		(67,085)	12,527		94,281	0	0	(67,085)		0		
178984 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	11/20/2024	110	49,839,921	4547.38000000	4,091,859		(3,061,742)	571,739		2,175,558	0	0	(3,061,742)		0		
178986 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	05/20/2025	7	3,183,166	4547.38000000	337,099		(168,596)	143,236		64,876	0	0	(168,596)		0		
179006 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	11/20/2024	111	50,348,319	4547.38000000	4,133,598		(3,092,974)	577,571		2,596,284	0	0	(3,092,974)		0		
179012 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	11/20/2024	156	70,939,128	4547.38000000	5,824,104		(4,357,898)	813,779		1,387,080	0	0	(4,357,898)		0		
179022 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	11/20/2024	122	55,478,036	4547.38000000	4,554,748		(3,408,100)	636,417		1,133,819	0	0	(3,408,100)		0		
179023 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	11/20/2024	90	40,736,340	4547.38000000	3,344,454		(2,502,495)	467,307		2,937,190	0	0	(2,502,495)		0		
179025 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	11/20/2024	105	47,878,455	4547.38000000	3,930,822		(2,941,246)	549,238		1,771,537	0	0	(2,941,246)		0		
179037 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	11/20/2024	121	55,149,715	4547.38000000	4,527,793		(3,387,931)	632,651		5,775,067	0	0	(3,387,931)		0		
179038 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	11/20/2023	11/20/2028		36,129,319	4547.38000000	2,066,597		(1,551,363)	283,095		2,991,939	0	0	(1,551,363)		0		
179048 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	11/20/2023	11/20/2030		57,521,044	4547.38000000	3,416,750		(2,564,903)	468,048		4,395,643	0	0	(2,564,903)		0		
179049 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	11/20/2023	11/20/2024	83	37,743,254	4547.38000000	3,098,722		(2,318,625)	432,972		4,336,890	0	0	(2,318,625)		0		
179053 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	11/20/2023	11/20/2024		13,914,188	4547.38000000	414,643		(310,098)	58,096		1,323,740	0	0	(310,098)		0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
179057 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	11/20/2023	11/20/2024		27,764,868	4547.38000000	1,266,078		(946,860)	177,390		724,889	0	0	(946,860)		0		
179061 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	11/20/2023	11/20/2024		34,534,766	1259.07000000	2,317,283		(1,733,022)	324,674		7,111,175	0	0	(1,733,022)		0		
179063 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	11/20/2023	11/20/2024		9,381,654	503.00000000	607,931		(454,652)	85,177		1,042,968	0	0	(454,652)		0		
179101 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	11/20/2023	11/20/2024		59,596,710	4547.38000000	5,062,591		(3,786,151)	709,319		1,635,561	0	0	(3,786,151)		0		
144235 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	12/06/2021	12/04/2026		729,148	4591.67000000	49,819		(12,382)	4,141		24,319	0	0	(12,382)		0		
144237 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	12/06/2021	12/06/2028		752,619	4591.67000000	55,909		(13,923)	4,653		26,592	0	0	(13,923)		0		
161965 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	12/06/2022	12/06/2027		8,250,589	3941.26000000	804,247		(309,541)	74,561		734,711	0	0	(309,541)		0		
161970 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	12/06/2022	12/06/2029		10,495,862	3941.26000000	1,078,741		(415,840)	100,166		1,078,764	0	0	(415,840)		0		
179446 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	1,842	34,595,845	187.84000000	2,875,006		(2,150,885)	527,741		2,202,409	0	0	(2,150,885)		0		
179457 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	1,878	16,182,101	86.18000000	1,370,728		(1,025,486)	251,613		950,102	0	0	(1,025,486)		0		
179467 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	06/06/2025	7	3,184,538	4549.34000000	335,972		(167,707)	152,938		69,338	0	0	(167,707)		0		
179472 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	142	64,600,628	4549.34000000	5,277,856		(3,948,535)	968,812		1,242,625	0	0	(3,948,535)		0		
179479 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	132	60,051,288	4549.34000000	4,906,176		(3,670,469)	900,586		1,657,668	0	0	(3,670,469)		0		
179487 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	107	48,701,595	4549.34000000	3,978,909		(2,976,750)	730,375		1,812,928	0	0	(2,976,750)		0		
179507 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	118	53,709,463	4549.34000000	4,388,050		(3,282,842)	805,478		2,332,291	0	0	(3,282,842)		0		
179521 Call Options - S&P Equal Weight Energy - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	12/06/2023	12/06/2024		39,056,540	1260.04000000	2,597,260		(1,941,784)	478,067		8,054,709	0	0	(1,941,784)		0		
179522 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	111	50,336,263	4549.34000000	4,112,461		(3,076,665)	754,890		2,551,342	0	0	(3,076,665)		0		
179525 Call Options - S&P U.S. Retiree Spending Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	12/06/2023	12/06/2024		8,884,743	509.49000000	561,516		(419,805)	103,356		884,134	0	0	(419,805)		0		
179527 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	12/06/2023	12/06/2024		22,348,709	4549.34000000	1,041,450		(778,617)	191,695		588,801	0	0	(778,617)		0		
179531 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	108	49,132,872	4549.34000000	4,014,144		(3,003,111)	736,843		2,884,242	0	0	(3,003,111)		0		
179535 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	79	36,066,986	4549.34000000	2,946,664		(2,204,495)	540,895		3,367,857	0	0	(2,204,495)		0		
179541 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	12/06/2023	12/06/2028		46,937,687	4549.34000000	2,651,979		(1,990,801)	479,536		4,042,452	0	0	(1,990,801)		0		
179546 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	146	66,420,364	4549.34000000	5,426,528		(4,059,761)	996,102		7,331,810	0	0	(4,059,761)		0		
179547 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CITIBANK N.A.	12/06/2023	12/06/2030		70,330,138	4549.34000000	4,128,379		(3,099,112)	746,501		5,610,252	0	0	(3,099,112)		0		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
179554 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	MORGAN STANLEY & CO. INTERNATIONAL PLC	12/06/2023	12/06/2024	.....	48,669,647	4549.34000000	4,172,792	.....	(3,119,696)	768,069	.....	987,713	0	0	(3,119,696)	.....	0	.....	.....
179558 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	MORGAN STANLEY & CO. INTERNATIONAL PLC	12/06/2023	12/06/2024	.....	14,728,925	4549.34000000	447,760	.....	(334,758)	82,417	.....	1,257,781	0	0	(334,758)	.....	0	.....	.....
179559 Call Options – iShares MSCI EAFE – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A.	12/06/2023	12/06/2024	.....	676,641	72.57000000	47,839	.....	(35,765)	8,805	.....	45,099	0	0	(35,765)	.....	0	.....	.....
179783 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	12/15/2023	12/15/2024	.....	1,990,571	4685.23984322	99,532	.....	(74,285)	20,896	.....	304,770	0	0	(74,285)	.....	0	.....	.....
144701 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	12/20/2021	12/18/2026	.....	1,060,073	4568.02000000	72,432	.....	(18,003)	5,998	.....	36,877	0	0	(18,003)	.....	0	.....	.....
144703 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	12/20/2021	12/20/2028	.....	1,687,120	4568.02000000	130,889	.....	(32,638)	10,866	.....	62,453	0	0	(32,638)	.....	0	.....	.....
162533 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	12/20/2022	12/20/2027	.....	6,695,471	3821.62000000	659,185	.....	(253,583)	74,039	.....	532,621	0	0	(253,583)	.....	0	.....	.....
162536 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	12/20/2022	12/20/2029	.....	10,151,085	3821.62000000	1,043,108	.....	(402,032)	117,382	.....	784,871	0	0	(402,032)	.....	0	.....	.....
180049 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	12/20/2023	12/20/2024	91	42,627,566	4698.35000000	3,567,910	.....	(2,668,895)	791,783	.....	1,612,719	0	0	(2,668,895)	.....	0	.....	.....
180063 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	12/20/2023	12/20/2024	219	102,901,758	4698.35000000	8,612,836	.....	(6,442,638)	1,911,342	.....	4,762,989	0	0	(6,442,638)	.....	0	.....	.....
180068 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	12/20/2023	12/20/2024	.....	22,808,684	4698.35000000	1,050,879	.....	(785,446)	233,849	.....	615,662	0	0	(785,446)	.....	0	.....	.....
180077 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	12/20/2023	12/20/2024	96	45,104,160	4698.35000000	3,775,200	.....	(2,823,954)	837,784	.....	2,606,949	0	0	(2,823,954)	.....	0	.....	.....
180078 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A.	12/20/2023	12/20/2024	.....	16,386,355	4698.35000000	504,700	.....	(377,222)	112,310	.....	1,468,853	0	0	(377,222)	.....	0	.....	.....
180081 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	12/20/2023	12/20/2024	72	33,828,684	4698.35000000	2,831,447	.....	(2,118,001)	628,349	.....	3,008,958	0	0	(2,118,001)	.....	0	.....	.....
180082 Call Options – SPDR Gold shares – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	12/20/2023	12/20/2024	1,722	32,395,250	188.10000000	2,640,187	.....	(1,974,933)	585,905	.....	2,100,456	0	0	(1,974,933)	.....	0	.....	.....
180094 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	12/20/2023	12/20/2024	107	50,272,345	4698.35000000	4,207,775	.....	(3,147,532)	933,780	.....	5,375,329	0	0	(3,147,532)	.....	0	.....	.....
180100 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	12/20/2023	12/20/2028	.....	54,736,341	4698.35000000	3,065,235	.....	(2,301,026)	671,832	.....	4,389,289	0	0	(2,301,026)	.....	0	.....	.....
180105 Call Options – iShares U.S. Real Estate – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	12/20/2023	12/20/2024	1,794	16,082,971	89.63000000	1,309,893	.....	(979,836)	290,689	.....	847,554	0	0	(979,836)	.....	0	.....	.....
180106 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CITIBANK N.A.	12/20/2023	12/20/2030	.....	76,504,302	4698.35000000	4,414,298	.....	(3,313,747)	967,517	.....	5,653,583	0	0	(3,313,747)	.....	0	.....	.....
180124 Call Options – S&P Equal Weight Energy – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	12/20/2023	12/20/2024	.....	39,590,854	1292.08000000	2,632,792	.....	(1,967,796)	585,869	.....	7,045,756	0	0	(1,967,796)	.....	0	.....	.....
180127 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	12/20/2023	06/20/2025	7	3,288,845	4698.35000000	338,422	.....	(168,914)	162,715	.....	65,077	0	0	(168,914)	.....	0	.....	.....
180129 Call Options – S&P U.S. Retiree Spending Index – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	12/20/2023	12/20/2024	.....	9,155,039	514.87000000	566,697	.....	(423,559)	126,106	.....	824,785	0	0	(423,559)	.....	0	.....	.....
180133 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	12/20/2023	12/20/2024	127	59,669,045	4698.35000000	4,994,275	.....	(3,735,855)	1,108,319	.....	1,128,753	0	0	(3,735,855)	.....	0	.....	.....
180136 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	12/20/2023	12/20/2024	149	70,005,415	4698.35000000	5,859,425	.....	(4,383,011)	1,300,311	.....	1,518,757	0	0	(4,383,011)	.....	0	.....	.....

SCHEDULE DB - PART A - SECTION 1

E06.24

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
180149 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	12/20/2023	12/20/2024	93	43,694,655	4698.35000000	3,657,225	(2,735,705)	811,603		1,294,770	0	0	(2,735,705)		0		
180157 Call Options - Ishares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RH1GC71XBU11	12/20/2023	12/20/2024		924,215	73.47000000	68,854	(51,463)	15,322		62,042	0	0	(51,463)		0		
0159999999. Subtotal - Purchased Options - Hedging Other - Call Options and Warrants										401,217,527	1,042,622,305	(622,557,936)	690,797,327	XXX	995,694,155	1,140,320	0	(675,748,184)	0	0	XXX	XXX
0219999999. Subtotal - Purchased Options - Hedging Other										401,217,527	1,042,622,305	(622,557,936)	690,797,327	XXX	995,694,155	1,140,320	0	(675,748,184)	0	0	XXX	XXX
0289999999. Subtotal - Purchased Options - Replications										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0359999999. Subtotal - Purchased Options - Income Generation										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0429999999. Subtotal - Purchased Options - Other										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0439999999. Total Purchased Options - Call Options and Warrants										401,217,527	1,042,622,305	(622,557,936)	690,797,327	XXX	995,694,155	1,140,320	0	(675,748,184)	0	0	XXX	XXX
0449999999. Total Purchased Options - Put Options										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0459999999. Total Purchased Options - Caps										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0469999999. Total Purchased Options - Floors										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0479999999. Total Purchased Options - Collars										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0489999999. Total Purchased Options - Other										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0499999999. Total Purchased Options										401,217,527	1,042,622,305	(622,557,936)	690,797,327	XXX	995,694,155	1,140,320	0	(675,748,184)	0	0	XXX	XXX
0569999999. Subtotal - Written Options - Hedging Effective Excluding Variable Annuity Guarantees Under SSAP No.108										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0639999999. Subtotal - Written Options - Hedging Effective Variable Annuity Guarantees Under SSAP No.108										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
167377 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUWISFPUBMIPRO8K5P83	04/06/2023	10/04/2024		3,777,261	4217.90805000	(372,359)	186,495	(2,748)		0	0	0	186,495				
168018 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/20/2023	10/18/2024	9	3,803,041	4225.60112800	(368,739)	184,684	(12,156)		0	0	0	184,684				
171017 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	05/05/2023	11/06/2024	9	3,821,275	4245.86062500	(358,227)	178,007	(24,187)		0	0	0	178,007				
171637 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMUWISFPUBMIPRO8K5P83	05/19/2023	11/20/2024		2,148,818	4313.54742000	(206,236)	102,417	(19,229)		0	0	0	102,417				
172359 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	06/06/2023	12/06/2024	10	4,395,658	4395.65848500	(401,140)	200,115	(49,044)		0	0	0	200,115				
172893 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	06/20/2023	12/20/2024	8	3,617,350	4521.68791300	(323,112)	161,175	(47,759)		0	0	0	161,175				
173547 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	07/06/2023	01/06/2025	9	4,066,515	4518.35000000	(385,812)	192,079	(68,870)		0	0	0	192,079				
174186 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	07/20/2023	01/17/2025	8	3,642,196	4652.78000000	(323,289)	161,822	(64,539)		0	0	0	161,822				
174701 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	08/04/2023	02/06/2025	11	5,059,813	4599.83000000	(463,023)	229,243	(108,798)		0	0	0	229,243				
175427 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	08/18/2023	02/20/2025	9	4,035,384	4483.76000000	(394,659)	195,341	(102,798)		0	0	0	195,341				
175982 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	09/06/2023	03/06/2025	9	4,138,290	4598.10000000	(375,039)	187,665	(107,841)		0	0	0	187,665				
176737 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	09/20/2023	03/20/2025	14	6,312,838	4509.17000000	(594,622)	297,514	(186,228)		0	0	0	297,514				
177509 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/06/2023	04/04/2025	10	4,406,730	4406.73000000	(327,970)	163,761	(112,551)		0	0	0	163,761				
177512 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/06/2023	10/04/2024	106	46,610,956	4397.26000000	(3,523,440)	2,651,830	(39,149)		0	0	0	2,651,830				
177516 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/06/2023	10/04/2024	118	52,218,068	4425.26000000	(3,722,074)	2,801,327	(41,356)		0	0	0	2,801,327				
177525 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/06/2023	10/04/2024	124	55,343,432	4463.18000000	(3,632,456)	2,733,878	(40,361)		0	0	0	2,733,878				
177539 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/06/2023	10/04/2024	99	44,525,404	4478.25000000	(2,825,585)	2,126,606	(31,395)		0	0	0	2,126,606				
177551 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	10/06/2023	10/04/2024	108	48,728,674	4491.18000000	(3,002,590)	2,259,825	(33,362)		0	0	0	2,259,825				

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
177564 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/06/2023	10/04/2024	122	54,940,575	4520.05000000	(3,168,407)		2,384,623	(35,205)		0	0	0	2,384,623				
177573 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/06/2023	10/04/2024	108	49,250,288	4570.89000000	(2,509,228)		1,888,508	(27,880)		0	0	0	1,888,508				
177584 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/06/2023	10/04/2024	114	54,060,533	4727.72000000	(1,797,322)		1,352,710	(19,970)		0	0	0	1,352,710				
177592 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/06/2023	10/04/2024	184	88,210,888	4794.07000000	(2,390,344)		1,799,033	(26,559)		0	0	0	1,799,033				
177595 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5I70UK5573	10/06/2023	10/04/2024		75,395,167	4393.81000000	(5,955,076)		4,481,756	(66,352)		0	0	0	4,481,756				
177601 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5I70UK5573	10/06/2023	10/04/2024		32,853,853	4432.58000000	(1,121,326)		843,904	(12,494)		0	0	0	843,904				
177483 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/09/2023	10/04/2024	2,242	40,759,916	181.77000000	(1,791,669)		1,359,882	(19,852)		0	0	0	1,359,882				
177493 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/09/2023	10/04/2024	2,775	22,553,742	81.28000000	(1,148,776)		871,924	(12,729)		0	0	0	871,924				
177502 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/09/2023	10/04/2024	232	1,691,233	72.95000000	(70,014)		53,141	(776)		0	0	0	53,141				
177906 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/20/2023	10/18/2024	1,637	32,176,827	196.61000000	(1,718,410)		1,292,823	(85,683)		0	0	0	1,292,823				
177928 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/20/2023	10/18/2024	86	606,582	70.30000000	(27,525)		20,708	(1,372)		0	0	0	20,708				
177934 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/20/2023	04/17/2025	10	4,448,890	4448.89000000	(365,680)		183,107	(134,263)		0	0	0	183,107				
177940 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/20/2023	10/18/2024	138	59,919,738	4342.01000000	(4,414,482)		3,321,175	(220,113)		0	0	0	3,321,175				
177954 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/20/2023	10/18/2024	104	45,675,750	4381.72000000	(3,088,887)		2,323,882	(154,017)		0	0	0	2,323,882				
177964 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/20/2023	10/18/2024	147	64,642,520	4405.38000000	(4,146,009)		3,119,193	(206,726)		0	0	0	3,119,193				
177975 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E 529900RLNSGA90UPEH54	10/20/2023	10/18/2024	104	46,869,851	4525.34000000	(2,243,473)		1,687,846	(111,863)		0	0	0	1,687,846				
177995 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRJUGQFU57RNE97	10/20/2023	10/18/2024		17,501,522	79.38000000	(1,053,116)		792,152	(52,656)		0	0	0	792,152				
178006 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON ROMUIWSPUBM8MPRO8K5P83	10/20/2023	10/18/2024		74,430,160	4309.49000000	(6,102,803)		4,590,515	(305,140)		0	0	0	4,590,515				
178020 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON ROMUIWSPUBM8MPRO8K5P83	10/20/2023	10/18/2024		55,299,835	4445.93000000	(3,396,801)		2,555,066	(169,840)		0	0	0	2,555,066				
178028 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BANK OF AMERICA, N.A. B4TYDEB6GKMZ0031MB27	10/20/2023	10/18/2024		53,685,884	4647.84000000	(1,858,978)		1,398,319	(92,949)		0	0	0	1,398,319				
178033 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BANK OF AMERICA, N.A. B4TYDEB6GKMZ0031MB27	10/20/2023	10/18/2024		89,868,700	4705.29000000	(2,605,943)		1,960,185	(130,297)		0	0	0	1,960,185				
178037 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A. KB1H1DSPRFMYMCJFXTO9	10/20/2023	10/18/2024		24,381,131	4369.05000000	(832,112)		625,913	(41,606)		0	0	0	625,913				
178395 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA ES71P3U3RHIGC71XBU11	11/06/2023	05/06/2025		4,943,180	4588.64000000	(392,727)		196,148	(157,091)		0	0	0	196,148				
178399 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON ROMUIWSPUBM8MPRO8K5P83	11/06/2023	11/06/2024		53,593,842	4526.21000000	(3,384,576)		2,531,928	(344,037)		0	0	0	2,531,928				
178412 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON ROMUIWSPUBM8MPRO8K5P83	11/06/2023	11/06/2024		51,973,243	4545.42000000	(3,141,060)		2,349,759	(319,284)		0	0	0	2,349,759				

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
178428 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON ROMUISFPUBM8PRO8K5P83	11/06/2023	11/06/2024		45,055,055	4568.56000000	(2,579,558)		1,929,712	(262,208)		0	0	0	1,929,712				
178434 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON ROMUISFPUBM8PRO8K5P83	11/06/2023	11/06/2024		54,608,924	4610.47000000	(2,823,533)		2,112,224	(287,007)		0	0	0	2,112,224				
178439 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON ROMUISFPUBM8PRO8K5P83	11/06/2023	11/06/2024		35,615,703	4656.75000000	(1,636,534)		1,224,256	(166,351)		0	0	0	1,224,256				
178464 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/06/2023	11/06/2024	1,872	36,728,466	196.18000000	(1,692,453)	1,266,559	(171,564)		0	0	0	1,266,559				
178474 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/06/2023	11/06/2024	2,602	21,790,092	83.74000000	(1,215,187)	909,393	(123,183)		0	0	0	909,393				
178484 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/06/2023	11/06/2024	146	1,080,284	74.03000000	(40,713)	30,468	(4,127)		0	0	0	30,468				
178506 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A. KB1H1DSPRFMYMCJFXT09	11/06/2023	11/06/2024		32,945,129	4510.93000000	(918,331)		686,984	(93,347)		0	0	0	686,984				
178511 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/06/2023	11/06/2024	134	59,662,562	4452.43000000	(4,259,056)	3,187,294	(431,740)		0	0	0	3,187,294				
178513 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/06/2023	11/06/2024	134	59,709,328	4455.92000000	(4,230,380)	3,165,834	(428,833)		0	0	0	3,165,834				
178515 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/06/2023	11/06/2024	187	83,937,942	4488.66000000	(5,528,094)	4,136,987	(560,382)		0	0	0	4,136,987				
178524 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/06/2023	11/06/2024	183	87,853,894	4792.97000000	(2,520,706)	1,886,388	(255,524)		0	0	0	1,886,388				
178528 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/06/2023	11/06/2024	113	54,772,343	4847.11000000	(1,308,314)	979,086	(132,624)		0	0	0	979,086				
178530 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/06/2023	11/06/2024	95	46,429,160	4887.28000000	(960,165)	718,546	(97,332)		0	0	0	718,546				
178951 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	11/20/2024	1,753	34,202,819	195.12000000	(1,572,362)	1,176,523	(219,700)		0	0	0	1,176,523				
178972 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	11/20/2024	1,852	16,148,493	87.21000000	(798,074)	597,160	(111,512)		0	0	0	597,160				
178980 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	11/20/2024	188	1,455,350	77.43000000	(37,028)	27,706	(5,174)		0	0	0	27,706				
178989 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	11/20/2024	110	52,057,815	4749.74000000	(2,717,238)	2,033,179	(379,669)		0	0	0	2,033,179				
178990 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	05/20/2025	7	3,254,153	4648.79000000	(292,215)	146,148	(124,165)		0	0	0	146,148				
179011 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	11/20/2024	111	52,996,616	4786.57000000	(2,515,877)	1,882,510	(351,533)		0	0	0	1,882,510				
179017 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	11/20/2024	156	72,350,772	4637.87000000	(4,909,632)	3,673,643	(686,003)		0	0	0	3,673,643				
179024 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	11/20/2024	122	56,632,034	4641.97000000	(3,808,596)	2,849,790	(532,160)		0	0	0	2,849,790				
179029 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	11/20/2024	90	43,738,591	4882.52000000	(1,589,901)	1,189,647	(222,151)		0	0	0	1,189,647				
179032 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	11/20/2024	105	49,683,512	4718.82000000	(2,796,133)	2,092,213	(390,693)		0	0	0	2,092,213				
179041 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	11/20/2024	121	61,078,269	5036.22000000	(1,351,765)	1,011,461	(188,877)		0	0	0	1,011,461				
179052 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	11/20/2023	11/20/2024	83	42,204,504	5084.88000000	(782,773)	585,712	(109,374)		0	0	0	585,712				

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
179059 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	11/20/2023	11/20/2024		28,495,108	4666.98000000	(819,064)		612,552	(114,759)		0	0	0	612,552				
179102 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	11/20/2023	11/20/2024		61,265,462	4674.71000000	(3,998,194)		2,990,122	(560,186)		0	0	0	2,990,122				
179453 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	1,842	36,828,073	199.96000000	(1,854,664)		1,387,534	(340,445)		0	0	0	1,387,534				
179462 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	1,878	17,192,309	91.56000000	(852,480)		637,768	(156,483)		0	0	0	637,768				
179470 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	06/06/2025	7	3,260,964	4658.52000000	(288,078)		143,800	(131,136)		0	0	0	143,800				
179473 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	142	65,873,232	4638.96000000	(4,457,380)		3,334,710	(818,204)		0	0	0	3,334,710				
179481 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	132	61,750,788	4678.09000000	(3,824,040)		2,860,888	(701,947)		0	0	0	2,860,888				
179494 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	107	50,561,944	4723.12000000	(2,813,969)		2,105,221	(516,537)		0	0	0	2,105,221				
179513 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	118	56,104,898	4752.24000000	(2,906,753)		2,174,636	(533,568)		0	0	0	2,174,636				
179526 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	111	52,958,776	4786.36000000	(2,513,306)		1,880,285	(461,347)		0	0	0	1,880,285				
179530 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	12/06/2023	12/06/2024		22,943,172	4670.35000000	(679,401)		507,939	(125,055)		0	0	0	507,939				
179534 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	108	52,100,496	4824.12000000	(2,233,548)		1,670,990	(409,994)		0	0	0	1,670,990				
179540 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	79	39,551,086	4988.81000000	(1,025,402)		767,137	(188,225)		0	0	0	767,137				
179548 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/06/2023	12/06/2024	146	74,032,074	5070.69000000	(1,437,370)		1,075,343	(263,846)		0	0	0	1,075,343				
179555 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	MORGAN STANLEY & CO. INTERNATIONAL PLC	12/06/2023	12/06/2024		49,682,015	4643.97000000	(3,520,620)		2,632,115	(648,026)		0	0	0	2,632,115				
179565 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	12/06/2023	12/06/2024		725,965	77.86000000	(25,103)		18,768	(4,621)		0	0	0	18,768				
180055 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/20/2023	12/20/2024	91	44,311,311	4883.93000000	(2,524,801)		1,888,621	(560,298)		0	0	0	1,888,621				
180069 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/20/2023	12/20/2024	219	107,882,200	4925.75000000	(5,582,300)		4,175,714	(1,238,812)		0	0	0	4,175,714				
180070 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	12/20/2023	12/20/2024		23,431,337	4826.61000000	(675,904)		505,183	(150,407)		0	0	0	505,183				
180079 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/20/2023	12/20/2024	96	47,837,472	4983.07000000	(2,155,104)		1,612,077	(478,256)		0	0	0	1,612,077				
180087 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/20/2023	12/20/2024	72	37,008,545	5139.99000000	(1,096,002)		819,840	(243,222)		0	0	0	819,840				
180095 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/20/2023	12/20/2024	107	55,993,314	5233.02000000	(1,258,748)		941,578	(279,339)		0	0	0	941,578				
180099 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/20/2023	12/20/2024	1,722	34,530,822	200.50000000	(1,668,846)		1,248,343	(370,347)		0	0	0	1,248,343				
180122 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/20/2023	12/20/2024	1,794	17,057,316	95.06000000	(805,674)		602,666	(178,793)		0	0	0	602,666				
180128 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	12/20/2023	06/20/2025	7	3,361,855	4802.65000000	(292,474)		145,980	(140,623)		0	0	0	145,980				

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
180134 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	12/20/2023	12/20/2024	127	60,844,557	4790.91000000	(4,239,514)	3,171,273	(940,824)		0	0	0	3,171,273				
180137 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	12/20/2023	12/20/2024	149	71,587,497	4804.53000000	(4,848,609)	3,626,893	(1,075,993)		0	0	0	3,626,893				
180151 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	12/20/2023	12/20/2024	93	45,044,829	4843.53000000	(2,807,391)	2,100,006	(623,010)		0	0	0	2,100,006				
180161 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RH1G71XB11	12/20/2023	12/20/2024		992,396	78.89000000	(32,070)	23,970	(7,137)		0	0	0	23,970				
180490 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	GOLDMAN SACHS INTERNATIONAL	W22LR0WP21HZNB6K528	01/05/2024	01/06/2025		39,395,081	201.11000000	(1,895,753)	1,383,952	(511,801)		0	0	0	1,383,952				
180501 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJFSFPU8MPR08K5P83	01/05/2024	01/06/2025		49,351,528	4841.45000000	(3,114,693)	2,273,811	(840,881)		0	0	0	2,273,811				
180509 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJFSFPU8MPR08K5P83	01/05/2024	01/06/2025		44,954,577	4881.37000000	(2,598,126)	1,896,704	(701,423)		0	0	0	1,896,704				
180519 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/05/2024	01/06/2025	1,835	17,440,821	95.04000000	(851,488)	622,241	(229,247)		0	0	0	622,241				
180531 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/05/2024	01/06/2025	151	1,189,662	78.98000000	(37,356)	27,298	(10,057)		0	0	0	27,298				
180538 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	01/05/2024	01/06/2025		38,526,930	5124.22000000	(1,208,098)	881,945	(326,153)		0	0	0	881,945				
180543 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/05/2024	07/03/2025	7	3,371,585	4816.55000000	(288,197)	141,440	(146,757)		0	0	0	141,440				
180547 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/05/2024	01/06/2025	143	68,493,854	4789.78000000	(4,579,718)	3,346,717	(1,233,001)		0	0	0	3,346,717				
180548 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	01/05/2024	01/06/2025		25,436,732	4824.07000000	(675,506)	493,138	(182,368)		0	0	0	493,138				
180561 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/05/2024	01/06/2025	127	60,991,242	4802.46000000	(3,967,734)	2,899,498	(1,068,236)		0	0	0	2,899,498				
180565 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/05/2024	01/06/2025	216	106,318,475	4922.71000000	(5,230,711)	3,822,442	(1,408,268)		0	0	0	3,822,442				
180576 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/05/2024	01/06/2025	97	48,173,078	4984.24000000	(2,022,998)	1,478,345	(544,653)		0	0	0	1,478,345				
180580 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/05/2024	01/06/2025	110	57,275,790	5206.89000000	(1,218,360)	890,340	(328,020)		0	0	0	890,340				
180800 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/19/2024	01/17/2025	95	47,689,965	5038.24000000	(2,389,496)	1,668,014	(721,482)		0	0	0	1,668,014				
180819 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/19/2024	01/17/2025	125	63,412,070	5075.02000000	(2,896,577)	2,021,987	(874,590)		0	0	0	2,021,987				
180829 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/19/2024	01/17/2025	95	48,411,652	5121.49000000	(1,954,808)	1,364,575	(590,233)		0	0	0	1,364,575				
180842 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	01/19/2024	01/17/2025	151	80,112,124	5292.82000000	(1,920,758)	1,340,806	(579,952)		0	0	0	1,340,806				
180850 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	MORGAN STANLEY & CO. INTERNATIONAL PLC	4PQUH3JPF6GFNF3B8653	01/19/2024	01/17/2025		60,131,769	4948.71000000	(3,643,146)	2,540,082	(1,103,064)		0	0	0	2,540,082				
180862 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	01/19/2024	01/17/2025		19,282,482	4968.06000000	(479,026)	333,988	(145,039)		0	0	0	333,988				
180865 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	MORGAN STANLEY & CO. INTERNATIONAL PLC	4PQUH3JPF6GFNF3B8653	01/19/2024	01/17/2025		44,422,532	4988.39000000	(2,454,480)	1,711,318	(743,162)		0	0	0	1,711,318				

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
180871 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.01/19/2024	01/17/2025	1,573	31,441,683	199.86000000	(1,356,086)	946,631	(409,455)		0	0	0	946,631				
180877 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.01/19/2024	01/17/2025	1,750	16,356,385	93.49000000	(762,796)	532,478	(230,318)		0	0	0	532,478				
180889 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.01/19/2024	01/17/2025	228	1,813,298	79.42000000	(47,490)	33,151	(14,339)		0	0	0	33,151				
180894 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.01/19/2024	07/18/2025	6	2,966,610	4944.35000000	(252,342)	117,109	(135,233)		0	0	0	117,109				
180901 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.01/19/2024	01/17/2025	122	60,214,808	4935.64000000	(3,830,800)	2,674,132	(1,156,668)		0	0	0	2,674,132				
181322 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/06/2024	02/06/2025	2,448	49,031,288	200.33000000	(2,019,209)	1,305,571	(713,638)		0	0	0	1,305,571				
181346 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/06/2024	02/06/2025	2,753	25,299,150	91.90000000	(1,194,759)	772,501	(422,257)		0	0	0	772,501				
181357 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/06/2024	02/06/2025	324	2,642,747	81.47000000	(59,038)	38,172	(20,865)		0	0	0	38,172				
181365 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/06/2024	02/06/2025	158	79,818,914	5051.83000000	(5,094,236)	3,293,807	(1,800,429)		0	0	0	3,293,807				
181372 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/06/2024	02/06/2025	135	68,366,835	5064.21000000	(4,250,340)	2,748,165	(1,502,175)		0	0	0	2,748,165				
181381 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/06/2024	02/06/2025	96	49,001,664	5104.34000000	(2,790,336)	1,804,162	(986,174)		0	0	0	1,804,162				
181390 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	MORGAN STANLEY & CO. INTERNATIONAL PLC	4PQUHNSJPFQGNF3BB653	.02/06/2024	02/06/2025		25,709,259	5082.05000000		0	0		0	0	0					
181391 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/06/2024	02/06/2025	107	55,189,902	5165.78000000	(2,728,523)	1,764,196	(964,327)		0	0	0	1,764,196				
181401 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/06/2024	02/06/2025	120	63,071,280	5255.94000000	(2,489,160)	1,609,429	(879,731)		0	0	0	1,609,429				
181407 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/06/2024	02/06/2025	76	40,765,874	5349.08000000	(1,243,687)	804,138	(439,550)		0	0	0	804,138				
181412 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/06/2024	02/06/2025	132	72,059,724	5459.07000000	(1,564,200)	1,011,373	(552,827)		0	0	0	1,011,373				
181422 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUWSPUBM8MPRO8K5P83	.02/06/2024	.08/06/2025		3,777,790	5065.70000000	(339,650)	146,455	(193,195)		0	0	0	146,455				
181430 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUWSPUBM8MPRO8K5P83	.02/06/2024	02/06/2025		104,795,525	5198.47000000	(5,156,387)	3,328,986	(1,827,401)		0	0	0	3,328,986				
181780 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/20/2024	02/20/2025	95	48,708,970	5127.26000000	(2,888,950)	1,757,115	(1,131,835)		0	0	0	1,757,115				
181800 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/20/2024	02/20/2025	2,131	42,335,529	198.68000000	(1,777,121)	1,080,879	(696,242)		0	0	0	1,080,879				
181801 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/20/2024	02/20/2025	109	56,511,177	5182.99000000	(2,963,054)	1,802,186	(1,160,868)		0	0	0	1,802,186				
181817 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/20/2024	02/20/2025	2,435	22,381,396	91.90000000	(1,110,546)	675,455	(435,091)		0	0	0	675,455				
181823 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/20/2024	02/20/2025	200	104,484,033	5217.32000000	(5,059,665)	3,077,385	(1,982,280)		0	0	0	3,077,385				
181829 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CB0E	529900RLNSGA90UPEH54	.02/20/2024	08/20/2025	6	3,052,476	5087.46000000	(264,978)	107,738	(157,240)		0	0	0	107,738				

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
181836 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/20/2024	123	62,545,131	5084.97000000		(4,054,326)	2,465,919	(1,588,407)		0	0	0	2,465,919				
181839 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/20/2024	69	36,430,916	5284.99000000		(1,496,049)	909,925	(586,123)		0	0	0	909,925				
181850 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	02/20/2024	146	1,192,242	81.76000000		(37,330)	22,705	(14,625)		0	0	0	22,705				
181854 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYMCUFXT09	02/20/2024		21,266,748	5106.37000000		(629,941)	382,464	(247,477)		0	0	0	382,464				
181879 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMJUSFPUMPRO8K5P83	02/20/2024		66,568,786	5074.03000000		(4,678,349)	2,840,426	(1,837,923)		0	0	0	2,840,426				
181887 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYMCUFXT09	02/20/2024		68,266,823	5443.71000000		(2,046,568)	1,242,559	(804,009)		0	0	0	1,242,559				
182214 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/06/2024	2,268	47,885,404	211.12000000		(2,168,361)	1,233,107	(935,255)		0	0	0	1,233,107				
182225 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/06/2024	172	1,438,570	83.79000000		(44,982)	25,580	(19,402)		0	0	0	25,580				
182233 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/06/2024	4	2,086,008	5215.02000000		(184,056)	69,652	(114,404)		0	0	0	69,652				
182242 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/06/2024	148	77,046,284	5205.83000000		(5,113,992)	2,908,232	(2,205,760)		0	0	0	2,908,232				
182251 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/06/2024	131	68,350,298	5217.58000000		(4,433,564)	2,521,285	(1,912,279)		0	0	0	2,521,285				
182253 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RH1GC71XBU11	03/06/2024		53,290,358	5411.56000000		(2,490,836)	1,413,532	(1,077,304)		0	0	0	1,413,532				
182258 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/06/2024	93	48,917,442	5259.94000000		(2,912,574)	1,656,326	(1,256,248)		0	0	0	1,656,326				
182267 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/06/2024	116	61,436,217	5318.14000000		(3,235,194)	1,839,794	(1,395,399)		0	0	0	1,839,794				
182268 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	GOLDMAN SACHS INTERNATIONAL	W22LR0WP21HZNB6K528	03/06/2024		25,520,215	94.72000000		(1,449,495)	822,579	(626,917)		0	0	0	822,579				
182278 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/06/2024	191	106,021,486	5563.68000000		(3,058,297)	1,739,197	(1,319,101)		0	0	0	1,739,197				
182286 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RH1GC71XBU11	03/06/2024		140,574,064	5361.02000000		(7,319,166)	4,153,576	(3,165,590)		0	0	0	4,153,576				
182298 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RH1GC71XBU11	03/06/2024		26,404,642	5241.57000000		(1,038,904)	589,571	(449,333)		0	0	0	589,571				
182746 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYMCUFXT09	03/20/2024		82,447,380	5327.55000000		(5,902,376)	3,121,918	(2,780,458)		0	0	0	3,121,918				
182759 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYMCUFXT09	03/20/2024		93,493,096	5724.62000000		(2,935,256)	1,552,532	(1,382,724)		0	0	0	1,552,532				
182765 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYMCUFXT09	03/20/2024		1,786,177	5929.94000000		(33,363)	17,647	(15,716)		0	0	0	17,647				
182772 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	2,103	45,033,604	214.15000000		(1,922,051)	1,019,109	(902,941)		0	0	0	1,019,109				
182785 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	3,062	28,740,035	93.87000000		(1,028,726)	545,451	(483,275)		0	0	0	545,451				
182797 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	157	1,358,965	86.63000000		(27,609)	14,639	(12,970)		0	0	0	14,639				
182800 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	93	50,477,709	5433.60000000		(2,757,899)	1,462,292	(1,295,606)		0	0	0	1,462,292				

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
182808 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	03/20/2025	260	142,468,517	5481.15000000	(7,038,755)	3,722,978	(3,315,777)		0	0	0	3,722,978				
182827 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	03/20/2025	98	54,059,067	5542.28000000	(2,331,484)	1,236,199	(1,095,285)		0	0	0	1,236,199				
182834 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RH1GC71XBU11	03/20/2024	03/20/2025		23,300,559	5363.59000000	(710,411)	375,755	(334,657)		0	0	0	375,755				
182838 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	09/19/2025	7	3,736,229	5337.47000000	(334,894)	118,162	(216,732)		0	0	0	118,162				
182840 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	03/20/2025	99	52,851,348	5338.52000000	(3,487,275)	1,849,022	(1,638,253)		0	0	0	1,849,022				
182844 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	03/20/2024	03/20/2025	91	49,008,414	5385.54000000	(2,951,130)	1,564,748	(1,386,383)		0	0	0	1,564,748				
183360 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	2,419	55,358,075	228.87000000	(2,585,650)	1,253,432	(1,332,219)		0	0	0	1,253,432				
183376 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	257	2,177,190	84.70000000	(58,864)	28,535	(30,329)		0	0	0	28,535				
183383 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	10/06/2025	3	1,594,869	5316.23000000	(147,060)	47,135	(99,925)		0	0	0	47,135				
183386 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	241	127,908,099	5307.39000000	(8,971,466)	4,349,049	(4,622,417)		0	0	0	4,349,049				
183397 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	107	57,290,154	5354.22000000	(3,684,117)	1,785,929	(1,898,188)		0	0	0	1,785,929				
183417 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RH1GC71XBU11	04/05/2024	04/04/2025		29,334,039	5333.41000000	(961,771)	464,856	(496,915)		0	0	0	464,856				
183418 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	04/05/2024	04/04/2025		739,238	303.51000000	(454)	219	(235)		0	0	0	219				
183431 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	MORGAN STANLEY & CO. INTERNATIONAL PLC	4PQUHNGJPF6GNF3B8653	04/05/2024	04/04/2025		31,886,335	92.24000000	(1,898,347)	917,534	(980,812)		0	0	0	917,534				
183461 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	97	52,462,077	5408.35000000	(3,037,036)	1,472,247	(1,564,788)		0	0	0	1,472,247				
183470 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	341	186,146,078	5459.87000000	(9,712,556)	4,708,303	(5,004,253)		0	0	0	4,708,303				
183476 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	97	53,531,196	5518.68000000	(2,466,031)	1,195,444	(1,270,587)		0	0	0	1,195,444				
183480 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	99	55,912,247	5650.35000000	(1,903,867)	922,927	(980,940)		0	0	0	922,927				
183484 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/05/2024	04/04/2025	100	57,497,500	5749.75000000	(1,523,300)	738,442	(784,858)		0	0	0	738,442				
183812 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/19/2024	04/17/2025	1,812	42,834,095	236.44000000	(2,146,777)	960,087	(1,186,691)		0	0	0	960,087				
183832 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/19/2024	10/20/2025	4	2,029,808	5074.52000000	(198,036)	58,395	(139,641)		0	0	0	58,395				
183839 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/19/2024	04/17/2025	91	46,652,788	5126.68000000	(3,103,100)	1,387,775	(1,715,325)		0	0	0	1,387,775				
183841 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	UBS AG	BFBMT61CT2L10CEMIK50	04/19/2024	04/17/2025		25,065,530	87.42000000	(1,446,816)	644,821	(801,996)		0	0	0	644,821				
183855 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	04/19/2024	04/17/2025		191,024	297.49000000	(117)	52	(65)		0	0	0	52				
183856 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	04/19/2024	04/17/2025	128	67,614,537	5266.75000000	(3,391,928)	1,516,946	(1,874,982)		0	0	0	1,516,946				

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
183862 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	04/19/2024	04/17/2025		104,080,783	5065.58000000		(8,108,669)	3,613,891	(4,494,778)		0	0	0	3,613,891				
183874 Call Options - Ishares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	04/19/2024	04/17/2025	245	1,992,185	81.44000000		(37,916)	16,957	(20,959)		0	0	0	16,957				
183879 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	04/19/2024	04/17/2025		20,229,478	5094.39000000		(670,224)	298,707	(371,517)		0	0	0	298,707				
183888 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	SOCIETE GENERAL	04/19/2024	04/17/2025		42,849,786	5171.38000000		(2,766,243)	1,232,866	(1,533,377)		0	0	0	1,232,866				
183896 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	04/19/2024	04/17/2025		91,495,489	5218.57000000		(5,386,807)	2,400,805	(2,986,001)		0	0	0	2,400,805				
183902 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	04/19/2024	04/17/2025		51,724,682	5298.54000000		(2,594,277)	1,156,224	(1,438,053)		0	0	0	1,156,224				
183908 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	SOCIETE GENERAL	04/19/2024	04/17/2025		75,926,709	5438.62000000		(2,815,439)	1,254,792	(1,560,647)		0	0	0	1,254,792				
184309 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	05/06/2024	05/06/2025		27,786,474	5317.51000000		(831,104)	331,984	(499,120)		0	0	0	331,984				
184334 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/06/2024	11/06/2025	5	2,646,065	5292.13000000		(238,210)	63,465	(174,745)		0	0	0	63,465				
184345 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/06/2024	05/06/2025	217	114,648,044	5283.32000000		(7,659,232)	3,072,110	(4,587,122)		0	0	0	3,072,110				
184351 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/06/2024	05/06/2025	74	39,499,128	5337.72000000		(2,373,846)	952,147	(1,421,699)		0	0	0	952,147				
184352 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	05/06/2024	05/06/2025		1,201,441	302.27440000		(630)	252	(378)		0	0	0	252				
184361 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	05/06/2024	05/06/2025		31,127,749	90.09000000		(1,664,901)	665,043	(999,858)		0	0	0	665,043				
184374 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/06/2024	05/06/2025	138	75,903,703	5493.66000000		(3,262,652)	1,308,646	(1,954,006)		0	0	0	1,308,646				
184375 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/06/2024	05/06/2025	146	79,043,685	5402.48000000		(4,158,423)	1,667,939	(2,490,484)		0	0	0	1,667,939				
184385 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/06/2024	05/06/2025	109	60,063,321	5522.15000000		(2,414,650)	968,513	(1,446,136)		0	0	0	968,513				
184396 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/06/2024	05/06/2025	162	87,979,612	5447.03000000		(4,202,388)	1,685,573	(2,516,815)		0	0	0	1,685,573				
184397 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/06/2024	05/06/2025	163	92,375,733	5666.18000000		(2,571,798)	1,031,545	(1,540,253)		0	0	0	1,031,545				
184406 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/06/2024	05/06/2025	2,325	53,522,419	230.16000000		(2,437,065)	977,504	(1,459,561)		0	0	0	977,504				
184412 Call Options - Ishares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/06/2024	05/06/2025	275	2,340,023	85.23000000		(62,598)	25,108	(37,490)		0	0	0	25,108				
184783 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	05/20/2024	05/20/2025		23,038,662	5447.73000000		(655,336)	236,499	(418,837)		0	0	0	236,499				
184816 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	05/20/2024	05/20/2025		1,411,465	305.67400000		(739)	267	(472)		0	0	0	267				
184818 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/20/2024	05/20/2025	84	47,147,066	5634.58000000		(1,885,438)	683,730	(1,201,707)		0	0	0	683,730				
184832 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	05/20/2024	05/20/2025	88	49,806,932	5662.71000000		(1,859,566)	674,348	(1,185,218)		0	0	0	674,348				
184836 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	05/20/2024	05/20/2025		21,409,293	93.54000000		(1,066,703)	384,953	(681,749)		0	0	0	384,953				

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
184849 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	96	..54,353,952	..5687.66000000	(1,906,325)	..691,305	(1,215,020)		0	0	0	691,305				
184858 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	176	101,527,441	..5773.65000000	(2,833,937)	1,027,692	(1,806,246)		0	0	0	1,027,692				
184880 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	78	42,611,772	..5483.83000000	(2,386,924)	865,588	(1,521,336)		0	0	0	865,588				
184891 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	165	91,546,135	..5547.00000000	(4,480,100)	1,624,652	(2,855,448)		0	0	0	1,624,652				
184894 Call Options – SPDR Gold shares – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	1,977	47,668,648	...241.11000000	(2,245,929)	814,458	(1,431,471)		0	0	0	814,458				
184900 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	91	51,355,364	..5614.94000000	(2,151,735)	780,300	(1,371,436)		0	0	0	780,300				
184906 Call Options – Ishares MSCI EAFE – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	214	1,860,531	87.01000000	(51,961)	18,843	(33,118)		0	0	0	18,843				
184910 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.11/20/2025	4	2,168,900	..5422.25000000	(191,516)	46,132	(145,384)		0	0	0	46,132				
184914 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.05/20/2024	.05/20/2025	201	108,805,923	..5413.23000000	(7,024,749)	2,547,436	(4,477,313)		0	0	0	2,547,436				
185340 Call Options – Ishares U.S. Real Estate – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5I70UK5573	.06/06/2024	.06/06/2025		23,703,343	92.89000000	(1,143,334)	354,718	(788,615)		0	0	0	354,718				
185346 Call Options – First Trust Barclays Edge Index – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5I70UK5573	.06/06/2024	.06/06/2025		2,666,928	303.52270000	(1,396)	433	(963)		0	0	0	433				
185350 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMJWSFPUMPR08K5P83	.06/06/2024	.12/05/2025		2,389,297	..5468.05000000	(226,767)	46,773	(179,994)		0	0	0	46,773				
185355 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	JPMORGAN CHASE BANK, N.A.	7H6GLXDRUGOFU57RNE97	.06/06/2024	.06/06/2025		23,674,175	..5492.67000000	(215,507)	66,861	(148,646)		0	0	0	66,861				
185362 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	SOCIETE GENERAL	02RNE81BXP4ROT8PU41	.06/06/2024	.06/06/2025		45,204,348	..5529.07000000	(2,726,529)	845,904	(1,880,625)		1,129,436	0	0	845,904				
185377 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	89	50,535,247	..5659.15000000	(2,098,421)	662,963	(1,435,458)		0	0	0	662,963				
185384 Call Options – SPDR Gold shares – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	2,351	55,431,864	...235.78000000	(2,390,966)	755,388	(1,635,579)		0	0	0	755,388				
185403 Call Options – Ishares MSCI EAFE – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	354	3,111,553	87.83000000	(78,294)	24,736	(53,558)		0	0	0	24,736				
185417 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	96	54,545,503	..5685.91000000	(2,120,267)	669,865	(1,450,402)		0	0	0	669,865				
185419 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	222	121,188,690	..5458.95000000	(7,756,458)	2,450,529	(5,305,929)		0	0	0	2,450,529				
185429 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	209	116,712,081	..5594.38000000	(5,622,829)	1,776,443	(3,846,386)		0	0	0	1,776,443				
185439 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	95	54,489,623	..5718.57000000	(1,950,969)	616,377	(1,334,591)		0	0	0	616,377				
185448 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	115	66,019,355	..5744.26000000	(2,212,996)	699,161	(1,513,835)		0	0	0	699,161				
185459 Call Options – S&P 500 – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/06/2024	.06/06/2025	145	84,540,390	..5846.50000000	(2,128,657)	672,515	(1,456,141)		0	0	0	672,515				
186127 Call Options – SPDR Gold shares – USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	1,951	45,534,625	...233.39000000	(2,062,218)	572,209	(1,490,009)		0	0	0	572,209				

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
186140 Call Options - Ishares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	212	1,779,245	83.77000000	(52,887)	14,675	(38,212)		0	0	0	14,675				
186146 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/20/2024	.12/19/2025	4	2,236,556	5591.39000000	(193,092)	35,718	(157,374)		0	0	0	35,718				
186149 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	186	103,816,644	5581.54000000	(6,607,836)	1,833,493	(4,774,343)		0	0	0	1,833,493				
186163 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	75	42,253,935	5657.62000000	(2,306,198)	639,907	(1,666,292)		0	0	0	639,907				
186165 Call Options - IShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.06/20/2024	.06/20/2025		19,766,127	92.24000000	(985,958)	267,656	(718,302)		0	0	0	267,656				
186175 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.06/20/2024	.06/20/2025		1,935,134	303.01350000	(1,016)	276	(740)		0	0	0	276				
186187 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RHIGC71XBU11	.06/20/2024	.06/20/2025		23,743,111	5615.47000000	(717,385)	194,747	(522,638)		0	0	0	194,747				
186198 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	82	48,208,471	5871.07000000	(1,595,845)	442,803	(1,153,042)		0	0	0	442,803				
186208 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	87	50,266,000	5802.11000000	(1,980,107)	549,425	(1,430,681)		0	0	0	549,425				
186216 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	97	56,763,092	5832.21000000	(2,075,885)	576,001	(1,499,884)		0	0	0	576,001				
186227 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	104	62,127,299	5987.10000000	(1,487,419)	412,718	(1,074,701)		0	0	0	412,718				
186236 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.06/20/2024	.06/20/2025	236	135,180,215	5723.84000000	(6,391,955)	1,773,592	(4,618,363)		0	0	0	1,773,592				
186673 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/05/2024	.07/03/2025	84	48,345,024	5755.36000000	(2,634,744)	614,774	(2,019,970)		0	0	0	614,774				
186681 Call Options - IShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSFPUBMPRO8K5P83	.07/05/2024	.07/03/2025		21,105,952	93.22000000	(998,918)	230,948	(767,971)		0	0	0	230,948				
186694 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.07/05/2024	.07/03/2025		1,635,166	302.71360000	(713)	165	(548)		0	0	0	165				
186702 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/05/2024	.07/03/2025	230	133,609,526	5811.03000000	(6,475,809)	1,511,022	(4,964,787)		0	0	0	1,511,022				
186703 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	BNP PARIBAS LONDON	ROMUJSFPUBMPRO8K5P83	.07/05/2024	.01/06/2026		1,446,686	5687.44000000	(135,138)	20,543	(114,595)		0	0	0	20,543				
186719 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/05/2024	.07/03/2025	2,313	54,972,243	237.65000000	(2,405,686)	561,327	(1,844,359)		0	0	0	561,327				
186720 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/05/2024	.07/03/2025	100	59,222,692	5913.47000000	(2,267,569)	529,099	(1,738,470)		0	0	0	529,099				
186730 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/05/2024	.07/03/2025	111	66,023,875	5971.92000000	(2,186,821)	510,258	(1,676,563)		0	0	0	510,258				
186739 Call Options - Ishares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/05/2024	.07/03/2025	355	3,058,156	86.16000000	(68,503)	15,984	(52,519)		0	0	0	15,984				
186744 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/05/2024	.07/03/2025	150	90,397,200	6026.48000000	(2,594,700)	605,430	(1,989,270)		0	0	0	605,430				
186749 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/05/2024	.07/03/2025	94	57,632,810	6131.15000000	(1,222,000)	285,133	(936,867)		0	0	0	285,133				
186750 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5	Equity/Index	CBOE	529900RLNSGA90UPEH54	.07/05/2024	.07/03/2025	235	133,419,370	5677.42000000	(8,489,610)	1,980,909	(6,508,701)		0	0	0	1,980,909				

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
186775 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.07/05/2024	.07/03/2025	.....	22,820,932	..5710.82000000	.....	..... (756,397)	 174,877	 (581,520)	.....	..... 0	 0	 0	 174,877	.....	.....	.....	.....
187095 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	GOLDMAN SACHS INTERNATIONAL W22LR0WP21HZNB86K528	.07/19/2024	.07/18/2025	.....	16,410,451	98.98000000	.....	..... (825,659)	158,251	 (667,408)	.....	..... 0	 0	 0	158,251	.....	.....	.....	.....
187098 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	 150	86,190,456	..5738.96000000	.....	..... (4,438,111)	 860,576	 (3,577,535)	.....	..... 0	 0	 0	 860,576	.....	.....	.....	.....
187110 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.07/19/2024	.07/18/2025	.....	1,000,181	...304.72040000	.....	..... (615)	118	 (497)	.....	..... 0	 0	 0	118	.....	.....	.....	.....
187116 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	95	55,653,607	..5833.10000000	.....	..... (2,330,962)	451,987	 (1,878,975)	.....	..... 0	 0	 0	451,987	.....	.....	.....	.....
187125 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	92	54,283,878	..5909.62000000	.....	..... (1,893,720)	367,203	 (1,526,517)	.....	..... 0	 0	 0	367,203	.....	.....	.....	.....
187133 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	91	54,323,542	..5969.62000000	.....	..... (1,625,624)	315,218	 (1,310,406)	.....	..... 0	 0	 0	315,218	.....	.....	.....	.....
187136 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	95	57,877,610	..6092.38000000	.....	..... (1,226,925)	237,908	 (989,017)	.....	..... 0	 0	 0	237,908	.....	.....	.....	.....
187138 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.07/19/2024	.07/18/2025	.....	19,959,989	..5647.03000000	.....	..... (591,030)	113,281	 (477,749)	.....	..... 0	 0	 0	113,281	.....	.....	.....	.....
187151 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	1,757	41,826,921	...238.12000000	.....	..... (1,842,619)	357,295	 (1,485,324)	.....	..... 0	 0	 0	357,295	.....	.....	.....	.....
187162 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	285	2,434,789	85.30000000	.....	..... (61,084)	11,845	 (49,239)	.....	..... 0	 0	 0	11,845	.....	.....	.....	.....
187171 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.07/19/2024	.01/20/2026	3	1,687,008	..5623.36000000	.....	..... (147,645)	18,894	 (128,751)	.....	..... 0	 0	 0	18,894	.....	.....	.....	.....
187176 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	196	110,034,400	..5614.00000000	.....	..... (7,251,804)	1,406,167	 (5,845,637)	.....	..... 0	 0	 0	1,406,167	.....	.....	.....	.....
187195 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.07/19/2024	.07/18/2025	79	44,981,178	..5693.82000000	.....	..... (2,540,640)	492,645	 (2,047,995)	.....	..... 0	 0	 0	492,645	.....	.....	.....	.....
187701 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.08/06/2024	.08/06/2025	2,146	50,868,769	...237.01000000	.....	..... (2,275,047)	337,507	 (1,937,540)	.....	..... 0	 0	 0	337,507	.....	.....	.....	.....
187709 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.08/06/2024	.08/06/2025	275	2,226,059	80.98000000	.....	..... (76,419)	11,337	 (65,082)	.....	..... 0	 0	 0	11,337	.....	.....	.....	.....
187719 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.08/06/2024	.02/06/2026	5	2,676,345	..5352.69000000	.....	..... (244,995)	24,142	 (220,853)	.....	..... 0	 0	 0	24,142	.....	.....	.....	.....
187725 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	SOCIETE GENERAL ... 02RNE81BXP4ROTDBPU41	.08/06/2024	.08/06/2025	.....	19,969,258	...101.06000000	.....	..... (1,032,584)	150,763	 (881,821)	.....	..... 0	 0	 0	150,763	.....	.....	.....	.....
187734 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.08/06/2024	.08/06/2025	220	120,337,842	..5468.50000000	.....	..... (6,893,267)	1,022,627	 (5,870,639)	.....	..... 0	 0	 0	1,022,627	.....	.....	.....	.....
187741 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.08/06/2024	.08/06/2025	.....	2,936,902	...310.27380000	.....	..... (1,800)	263	 (1,537)	.....	..... 0	 0	 0	263	.....	.....	.....	.....
187747 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.08/06/2024	.08/06/2025	101	56,145,217	..5559.67000000	.....	..... (2,658,573)	394,404	 (2,264,170)	.....	..... 0	 0	 0	394,404	.....	.....	.....	.....
187752 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE 529900RLNSGA90UPEH54	.08/06/2024	.08/06/2025	99	56,285,757	..5685.43000000	.....	..... (1,984,257)	294,368	 (1,689,889)	.....	..... 0	 0	 0	294,368	.....	.....	.....	.....
187758 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMJWSFPUBM8MPRO8K5P83	.08/06/2024	.08/06/2025	.....	115,516,021	..5343.78000000	.....	..... (8,911,208)	1,301,085	 (7,610,122)	.....	..... 0	 0	 0	1,301,085	.....	.....	.....	.....
187762 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON ROMJWSFPUBM8MPRO8K5P83	.08/06/2024	.08/06/2025	.....	64,092,993	..5417.14000000	.....	..... (4,352,845)	635,539	 (3,717,306)	.....	..... 0	 0	 0	635,539	.....	.....	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
187776 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A.	08/06/2024	08/06/2025	.....	57,857,386	..5627.79000000	.....	..... (2,833,612)	413,723	 (2,419,889)	.....	.....0	0	0	413,723	.....	.....	.....	.....
187783 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA	08/06/2024	08/06/2025	.....	60,817,489	..5798.09000000	.....	..... (1,836,893)	268,196	 (1,568,696)	.....	.....0	0	0	268,196	.....	.....	.....	.....
187785 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA	08/06/2024	08/06/2025	.....	24,665,057	..5376.79000000	.....	..... (968,719)	141,438	 (827,281)	.....	.....0	0	0	141,438	.....	.....	.....	.....
188225 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	08/20/2024	02/20/2026	3	1,715,238	..5717.46000000	.....	..... (140,427)	10,250	 (130,177)	.....	.....0	0	0	10,250	.....	.....	.....	.....
188230 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	08/20/2024	08/20/2025	162	92,468,628	..5707.94000000	.....	..... (5,785,020)	635,716	 (5,149,304)	.....	.....0	0	0	635,716	.....	.....	.....	.....
188239 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	08/20/2024	08/20/2025	90	52,096,860	..5788.54000000	.....	..... (2,771,100)	304,516	 (2,466,584)	.....	.....0	0	0	304,516	.....	.....	.....	.....
188250 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	08/20/2024	08/20/2025	125	77,541,125	..6203.29000000	.....	..... (1,389,500)	152,692	 (1,236,808)	.....	.....0	0	0	152,692	.....	.....	.....	.....
188258 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	08/20/2024	08/20/2025	148	86,493,859	..5843.39000000	.....	..... (4,088,608)	449,298	 (3,639,311)	.....	.....0	0	0	449,298	.....	.....	.....	.....
188270 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	08/20/2024	08/20/2025	84	50,177,612	..5951.42000000	.....	..... (1,840,868)	202,293	 (1,638,575)	.....	.....0	0	0	202,293	.....	.....	.....	.....
188281 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	08/20/2024	08/20/2025	125	75,821,352	..6049.37000000	.....	..... (2,154,428)	236,750	 (1,917,678)	.....	.....0	0	0	236,750	.....	.....	.....	.....
188298 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	08/20/2024	08/20/2025	.....	34,999,634	..250.43000000	.....	..... (1,644,129)	176,642	 (1,467,487)	.....	.....0	0	0	176,642	.....	.....	.....	.....
188307 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	08/20/2024	08/20/2025	.....	15,811,279	..102.82000000	.....	..... (622,287)	66,857	 (555,429)	.....	.....0	0	0	66,857	.....	.....	.....	.....
188324 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	08/20/2024	08/20/2025	.....	2,787,763	..88.91000000	.....	..... (50,833)	5,461	 (45,371)	.....	.....0	0	0	5,461	.....	.....	.....	.....
188329 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	08/20/2024	08/20/2025	.....	1,781,290	..314.03060000	.....	..... (1,091)	117	 (974)	.....	.....0	0	0	117	.....	.....	.....	.....
188333 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	08/20/2024	08/20/2025	.....	20,684,043	..5748.80000000	.....	..... (614,828)	66,056	 (548,772)	.....	.....0	0	0	66,056	.....	.....	.....	.....
188741 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	09/06/2024	09/05/2025	304	2,618,467	..86.25000000	.....	..... (83,791)	4,874	 (78,917)	.....	.....0	0	0	4,874	.....	.....	.....	.....
188749 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	09/06/2024	03/06/2026	3	1,657,410	..5524.70000000	.....	..... (142,053)	5,494	 (136,559)	.....	.....0	0	0	5,494	.....	.....	.....	.....
188754 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	09/06/2024	09/05/2025	85	47,525,370	..5591.22000000	.....	..... (2,787,235)	162,138	 (2,625,097)	.....	.....0	0	0	162,138	.....	.....	.....	.....
188774 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	09/06/2024	09/05/2025	186	104,676,686	..5638.82000000	.....	..... (5,569,260)	323,974	 (5,245,286)	.....	.....0	0	0	323,974	.....	.....	.....	.....
188787 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	09/06/2024	09/05/2025	90	51,328,023	..5725.89000000	.....	..... (2,257,813)	131,341	 (2,126,472)	.....	.....0	0	0	131,341	.....	.....	.....	.....
188799 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	09/06/2024	09/05/2025	100	58,178,448	..5802.15000000	.....	..... (2,129,144)	123,856	 (2,005,288)	.....	.....0	0	0	123,856	.....	.....	.....	.....
188810 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	JPMORGAN CHASE BANK, N.A.	09/06/2024	09/05/2025	.....	24,735,970	..5563.64000000	.....	..... (120,232)	6,680	 (113,552)	.....	.....0	0	0	6,680	.....	.....	.....	.....
188833 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	09/06/2024	09/05/2025	.....	41,489,898	..248.04000000	.....	..... (1,813,383)	100,744	 (1,712,640)	.....	.....0	0	0	100,744	.....	.....	.....	.....
188842 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	SOCIETE GENERAL ...	09/06/2024	09/05/2025	.....	19,819,829	..105.90000000	.....	..... (909,702)	50,539	 (859,163)	.....	.....0	0	0	50,539	.....	.....	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5		6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse		Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
188850 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.09/06/2024	.09/05/2025	.....	3,424,781	314.80090000	.....	(2,412)	134	(2,278)	.....	0	0	0	134	.....	.....	.....	.....
188852 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	WELLS FARGO BANK, N.A.	KB1H1DSPRFMYM0JFXT09	.09/06/2024	.09/05/2025	.....	105,325,890	5515.51000000	.....	(7,591,144)	421,730	(7,169,413)	.....	0	0	0	421,730	.....	.....	.....	.....
188856 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BANK OF AMERICA, N.A.	B4TYDEB6GKMZ0031MB27	.09/06/2024	.09/05/2025	.....	61,278,652	5868.68000000	.....	(2,145,966)	119,220	(2,026,745)	.....	0	0	0	119,220	.....	.....	.....	.....
188858 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BANK OF AMERICA, N.A.	B4TYDEB6GKMZ0031MB27	.09/06/2024	.09/05/2025	.....	90,416,737	5993.61000000	.....	(2,300,805)	127,823	(2,172,983)	.....	0	0	0	127,823	.....	.....	.....	.....
189367 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.09/20/2024	.09/19/2025	.....	47,390,334	6151.91000000	.....	(1,512,771)	25,213	(1,487,558)	.....	0	0	0	25,213	.....	.....	.....	.....
189372 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	BFMBT61CT2L1QCEMIK50	.09/20/2024	.09/19/2025	.....	57,032,365	6226.04000000	.....	(1,514,874)	25,248	(1,489,626)	.....	0	0	0	25,248	.....	.....	.....	.....
189376 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	UBS AG	BFMBT61CT2L1QCEMIK50	.09/20/2024	.09/19/2025	.....	56,985,406	6352.07000000	.....	(1,099,907)	18,332	(1,081,575)	.....	0	0	0	18,332	.....	.....	.....	.....
189385 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	ROYAL BANK OF CANADA	ES71P3U3RH1GC71XBU11	.09/20/2024	.09/19/2025	.....	23,900,198	5847.97000000	.....	(720,152)	12,003	(708,149)	.....	0	0	0	12,003	.....	.....	.....	.....
189415 Call Options - SPDR Gold shares - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/20/2024	.09/19/2025	.....	1,399	36,443,316	260.55000000	(1,551,166)	30,078	(1,521,088)	.....	0	0	0	30,078	.....	.....	.....	.....
189426 Call Options - iShares MSCI EAFE - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/20/2024	.09/19/2025	.....	192	1,706,122	88.91000000	(29,935)	580	(29,355)	.....	0	0	0	580	.....	.....	.....	.....
189435 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/20/2024	03/20/2026	.....	3	1,747,545	5825.15000000	(137,544)	1,773	(135,771)	.....	0	0	0	1,773	.....	.....	.....	.....
189438 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	CBOE	529900RLNSGA90UPEH54	.09/20/2024	.09/19/2025	.....	154	89,558,084	5815.46000000	(5,402,628)	104,760	(5,297,868)	.....	0	0	0	104,760	.....	.....	.....	.....
189475 Call Options - iShares U.S. Real Estate - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.09/20/2024	.09/19/2025	.....	18,633,353	109.15000000	.....	(606,182)	10,103	(596,079)	.....	0	0	0	10,103	.....	.....	.....	.....
189482 Call Options - First Trust Barclays Edge Index - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BARCLAYS BANK PLC	G5GSEF7VJP5170UK5573	.09/20/2024	.09/19/2025	.....	3,102,337	317.54480000	.....	(2,185)	36	(2,149)	.....	0	0	0	36	.....	.....	.....	.....
189489 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMJWSFPUBMPRO8K5P83	.09/20/2024	.09/19/2025	.....	135,168,645	5929.51000000	.....	(7,097,721)	118,295	(6,979,425)	.....	0	0	0	118,295	.....	.....	.....	.....
189498 Call Options - S&P 500 - USD	LIABILITY HEDGE	Exhibit 5 ...	Equity/Index	BNP PARIBAS LONDON	ROMJWSFPUBMPRO8K5P83	.09/20/2024	.09/19/2025	.....	46,337,444	6059.53000000	.....	(1,838,497)	30,642	(1,807,855)	.....	0	0	0	30,642	.....	.....	.....	.....
0649999999. Subtotal - Written Options - Hedging Other - Call Options and Warrants											(194,446,545)	(517,442,995)	343,783,889	(340,256,253)	XXX	1,129,436	0	0	343,783,889	0	0	XXX	XXX
0709999999. Subtotal - Written Options - Hedging Other											(194,446,545)	(517,442,995)	343,783,889	(340,256,253)	XXX	1,129,436	0	0	343,783,889	0	0	XXX	XXX
0779999999. Subtotal - Written Options - Replications											0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0849999999. Subtotal - Written Options - Income Generation											0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0919999999. Subtotal - Written Options - Other											0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0929999999. Total Written Options - Call Options and Warrants											(194,446,545)	(517,442,995)	343,783,889	(340,256,253)	XXX	1,129,436	0	0	343,783,889	0	0	XXX	XXX
0939999999. Total Written Options - Put Options											0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0949999999. Total Written Options - Caps											0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0959999999. Total Written Options - Floors											0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0969999999. Total Written Options - Collars											0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0979999999. Total Written Options - Other											0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
0989999999. Total Written Options											(194,446,545)	(517,442,995)	343,783,889	(340,256,253)	XXX	1,129,436	0	0	343,783,889	0	0	XXX	XXX
1049999999. Subtotal - Swaps - Hedging Effective Excluding Variable Annuity Guarantees Under SSAP No.108											0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1109999999. Subtotal - Swaps - Hedging Effective Variable Annuity Guarantees Under SSAP No.108											0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
Interest Rate Swap /169502 /Pay USD[Quarterly] SOFR [1.11727%]/ Receive USDQuarterly FIXED 2.434%	Portfolio Hedge	Exhibit 5 ...	Interest ...	MORGAN STANLEY CAPITAL SERVICES / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	.06/04/2015	.06/23/2030	.....	.....71,000,000	.. 2.434% [SOFR]	19,376	.....	.....(1,775,975)	(3,415,395)	.....	.....(3,415,395)	1,264,944	.....	.....	.....	.....850,520	.....	.....
Interest Rate Swap /169504 /Pay USD[Quarterly] SOFR [1.11727%]/ Receive USDQuarterly FIXED 1.618%	Portfolio Hedge	Exhibit 5 ...	Interest ...	MORGAN STANLEY CAPITAL SERVICES / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	.10/06/2016	.06/23/2030	.....	.....159,000,000	.. 1.618% [SOFR]	47,172	.....	.....(5,049,429)	(12,357,955)	.....	.....(12,357,955)	3,700,607	.....	.....	.....	.....1,904,685	.....	.....
Interest Rate Swap /169501 /Pay USD[Quarterly] SOFR [4.58867%]/ Receive USDQuarterly FIXED 2.233%	Portfolio Hedge	Exhibit 5 ...	Interest ...	MORGAN STANLEY CAPITAL SERVICES / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	.10/25/2017	.10/25/2025	.....	.....61,000,000	.. 2.233% [SOFR]	8,967	.....	.....(1,674,451)	(725,638)	.....	.....(725,638)	1,295,104	.....	.....	.....	.....316,965	.....	.....
Interest Rate Swap /169503 /Pay USD[Quarterly] SOFR [1.11727%]/ Receive USDQuarterly FIXED 2.4175%	Portfolio Hedge	Exhibit 5 ...	Interest ...	MORGAN STANLEY CAPITAL SERVICES / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	.10/25/2017	.06/23/2030	.....	.....65,000,000	.. 2.4175% [SOFR]	17,735	.....	.....(1,630,673)	(3,008,432)	.....	.....(3,008,432)	1,162,360	.....	.....	.....	.....778,645	.....	.....
Interest Rate Swap /145478 /Pay USD[Annual] SOFR [3.87156%]/ Receive USDAnnual FIXED 1.481%	Portfolio Hedge	Exhibit 5 ...	Interest ...	CITIBANK N.A. / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	.01/13/2022	.01/18/2030	.....	.....286,000,000	.. 1.481% [SOFR]	0	.....	.....(8,571,588)	 (24,777,265)	.....	.... (24,777,265)	6,023,522	.....	.....	.....	.....3,295,212	.....	.....
Interest Rate Swap /162729 /Pay USD[Annual] FIXED [3.28%]/ Receive USDAnnual SOFR 4.28787%	Portfolio Hedge	Exhibit 5 ...	Interest ...	THE TORONTO-DOMINION BANK / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	.12/21/2022	.12/23/2042	.....	.....240,000,000	.. SOFR [3.28%]	0	.....	.....3,899,084	5,100,139	.....	.....5,100,139	(1,390,870)	.....	.....	.....	.....5,124,998	.....	.....
Interest Rate Swap /162730 /Pay USD[Annual] FIXED [3.36%]/ Receive USDAnnual SOFR 4.28787%	Portfolio Hedge	Exhibit 5 ...	Interest ...	THE TORONTO-DOMINION BANK / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	.12/21/2022	.12/23/2032	.....	.....280,000,000	.. SOFR [3.36%]	0	.....	.....4,378,442	(1,160,154)	.....	.....(1,160,154)	(3,039,979)	.....	.....	.....	.....4,018,756	.....	.....
Interest Rate Swap /162731 /Pay USD[Annual] SOFR [4.28787%]/ Receive USDAnnual FIXED 4.2535%	Portfolio Hedge	Exhibit 5 ...	Interest ...	CITIBANK N.A. / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	.12/21/2022	.12/23/2024	.....	.....855,000,000	.. 4.2535% [SOFR]	0	.....	.....(7,555,434)	(1,087,151)	.....	.....(1,087,151)	3,198,254	.....	.....	.....	.....2,094,314	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
Interest Rate Swap /162732 /Pay USD[Annual] FIXED [3.354%]/ Receive USDAnnual SOFR 4.2878%	Portfolio Hedge	Exhibit 5 ...	Interest	CITIBANK N.A. / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	12/21/2022	12/23/2032	.....	195,000,000	SOFR [3.354%]	0 .....	.....	3,058,177	 (723,942)	.....	..... (723,942)	 (2,122,768)	.....	.....	.....	2,798,777	.....	.....
Interest Rate Swap /162733 /Pay USD[Annual] FIXED [3.276%]/ Receive USDAnnual SOFR 4.2878%	Portfolio Hedge	Exhibit 5 ...	Interest	THE TORONTO-DOMINION BANK / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	12/21/2022	12/23/2042	.....	240,000,000	SOFR [3.276%]	0 .....	.....	3,906,390	 5,230,388	.....	..... 5,230,388	 (1,393,468)	.....	.....	.....	5,124,998	.....	.....
Interest Rate Swap /162735 /Pay USD[Annual] FIXED [3.3545%]/ Receive USDAnnual SOFR 4.2878%	Portfolio Hedge	Exhibit 5 ...	Interest	THE TORONTO-DOMINION BANK / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	12/21/2022	12/23/2032	.....	400,000,000	SOFR [3.3545%]	0 .....	.....	6,271,661	 (1,499,372)	.....	..... (1,499,372)	 (4,353,431)	.....	.....	.....	5,741,080	.....	.....
Interest Rate Swap /162736 /Pay USD[Annual] FIXED [3.354%]/ Receive USDAnnual SOFR 4.2878%	Portfolio Hedge	Exhibit 5 ...	Interest	JPMORGAN CHASE BANK, N.A. / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	12/21/2022	12/23/2032	.....	190,000,000	SOFR [3.354%]	0 .....	.....	2,979,762	 (705,380)	.....	..... (705,380)	 (2,068,338)	.....	.....	.....	2,727,013	.....	.....
Interest Rate Swap /179971 /Pay USD[Annual] FIXED [3.468%]/ Receive USDAnnual SOFR 4.30162%	Portfolio Hedge .....	.....	Interest	CITIBANK N.A. / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	12/20/2023	12/22/2035	.....	410,000,000	SOFR [3.468%]	0 .....	.....	6,085,507	 (4,052,794)	.....	..... (4,052,794)	 (3,953,245)	.....	.....	.....	6,872,852	.....	.....
Interest Rate Swap /179972 /Pay USD[Annual] SOFR [4.30162%]/ Receive USDAnnual FIXED 3.8165%	Portfolio Hedge .....	.....	Interest	CITIBANK N.A. / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	12/20/2023	12/22/2026	.....	1,400,000,000	3.8165% [SOFR]	0 .....	.....	(17,066,318)	 11,896,286	.....	..... 11,896,286	 8,827,875	.....	.....	.....	10,453,229	.....	.....
Interest Rate Swap /179973 /Pay USD[Annual] SOFR [4.30162%]/ Receive USDAnnual FIXED 3.5615%	Portfolio Hedge .....	.....	Interest	MUFG SECURITIES EMEA PLC / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	12/20/2023	12/22/2028	.....	1,090,000,000	3.5615% [SOFR]	0 .....	.....	(15,402,856)	 12,222,436	.....	..... 12,222,436	 9,851,645	.....	.....	.....	11,222,237	.....	.....
Interest Rate Swap /179974 /Pay USD[Annual] FIXED [3.482%]/ Receive USDAnnual SOFR 4.30162%	Portfolio Hedge .....	.....	Interest	MUFG SECURITIES EMEA PLC / MORGAN STANLEY/CLEARED THROUGH CME 9R7GPTS07KV3UQJZ0078	12/20/2023	12/22/2038	.....	425,000,000	SOFR [3.482%]	0 .....	.....	6,262,861	 (3,456,013)	.....	..... (3,456,013)	 (3,514,256)	.....	.....	.....	8,016,068	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
Interest Rate Swap /179975 /Pay USD[Annual] FIXED [3.4655%]/ Receive USDAnnual SOFR 4.30162%	Portfolio Hedge .....	.....	Interest	JPMORGAN CHASE BANK, N.A. / MORGAN STANLEY/CLEARED THROUGH CME	12/20/2023	12/22/2035	.....	100,000,000	SOFR [3.4655%]	 0	.....	1,486,173	 (965,124)	.....	..... (965,124)	 (965,219)	.....	.....	.....	1,676,305	.....	.....
Interest Rate Swap /179976 /Pay USD[Annual] SOFR [4.30162%]/ Receive USDAnnual FIXED 3.5585%				JPMORGAN CHASE BANK, N.A. / MORGAN STANLEY/CLEARED THROUGH CME	12/20/2023	12/22/2028	.....	210,000,000	3.5585% [SOFR]	 0	.....	(2,972,318)	 2,301,347	.....	..... 2,301,347	 1,873,064	.....	.....	.....	2,162,082	.....	.....
1119999999. Subtotal - Swaps - Hedging Other - Interest Rate										93,250	0	(23,370,985)	(21,184,020)	XXX	(21,184,020)	14,395,802	0	0	0	75,178,736	XXX	XXX
Currency Swap /154919 /Pay EUR[Semi-Annual] FIXED [3.33%]/ Receive USDSemi-Annual FIXED 5.214%	ASSET HEDGE	Schedule D ..	Currency.....	WELLS FARGO BANK, N.A.	08/04/2022	08/20/2027	.....	22,972,500	5.214% [3.33%]	 0	.....	287,402	 (1,871,488)	.....	..... (1,871,488)	 (170,499)	.....	.....	.....	195,266	.....	.....
Currency Swap /156715 /Pay GBP[Semi-Annual] FIXED [6.66%]/ Receive USDSemi-Annual FIXED 6.78%	ASSET HEDGE	Schedule D ..	Currency.....	WELLS FARGO BANK, N.A.	09/09/2022	09/20/2032	.....	19,669,000	6.78% [6.66%]	 0	.....	(84,186)	 (3,308,125)	.....	..... (3,308,125)	 (328,560)	.....	.....	.....	277,640	.....	.....
Currency Swap /158392 /Pay EUR[Semi-Annual] FIXED [6.04%]/ Receive USDSemi-Annual FIXED 7.672%	ASSET HEDGE	Schedule D ..	Currency.....	ROYAL BANK OF CANADA	10/13/2022	10/30/2027	.....	21,802,500	7.672% [6.04%]	 0	.....	146,427	 (3,554,637)	.....	..... (3,554,637)	 (14,678)	.....	.....	.....	191,626	.....	.....
Currency Swap /158652 /Pay EUR[Quarterly] FIXED [6.408%]/ Receive USDQuarterly FIXED 7.7987%	ASSET HEDGE	Schedule D ..	Currency.....	CITIBANK N.A.	10/20/2022	10/19/2027	.....	4,895,000	7.7987% [6.408%]	 0	.....	21,222	 (1,017,860)	.....	..... (1,017,860)	 45,683	.....	.....	.....	42,744	.....	.....
Currency Swap /158899 /Pay GBP[Semi-Annual] FIXED [6.22%]/ Receive USDSemi-Annual FIXED 6.2485%	ASSET HEDGE	Schedule D ..	Currency.....	ROYAL BANK OF CANADA	10/25/2022	01/31/2030	.....	27,528,000	6.22% [6.2485%]	 0	.....	(139,701)	 (4,782,468)	.....	..... (4,782,468)	 (632,911)	.....	.....	.....	317,767	.....	.....
Currency Swap /159089 /Pay GBP[Semi-Annual] FIXED [9.2279%]/ Receive USDSemi-Annual FIXED 9.495%	ASSET HEDGE	Schedule D ..	Currency.....	WELLS FARGO BANK, N.A.	10/26/2022	05/02/2025	.....	5,785,000	9.495% [9.2279%]	 0	.....	(36,508)	 (907,905)	.....	..... (907,905)	 (283,448)	.....	.....	.....	22,218	.....	.....
Currency Swap /159089 /Pay GBP[Semi-Annual] FIXED [6.07%]/ Receive USDSemi-Annual FIXED 6.282%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A.	10/27/2022	11/09/2037	.....	18,528,000	6.282% [6.07%]	 0	.....	(57,114)	 (2,867,010)	.....	..... (2,867,010)	 (68,221)	.....	.....	.....	335,428	.....	.....
Currency Swap /159812 /Pay EUR[Quarterly] FIXED [5.01%]/ Receive USDQuarterly FIXED 6.691%	ASSET HEDGE	Schedule D ..	Currency.....	WELLS FARGO BANK, N.A.	11/07/2022	01/31/2030	.....	20,000,000	6.691% [5.01%]	 0	.....	115,402	 (2,468,923)	.....	..... (2,468,923)	 16,385	.....	.....	.....	230,868	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
Currency Swap /161475 /Pay EUR[Semi-Annual] FIXED [5.08%]/ Receive USDSemi-Annual FIXED 6.418%	ASSET HEDGE	Schedule D ..	Currency.....	MORGAN STANLEY CAPITAL SERVICES .. 17331LVCZKQKX5T7XV54	.12/02/2022	.06/27/2030	.....	..... 18,445,000	6.418% [5.08%]	 0	.....	.....163,050	 (1,328,864)	.....	..... (1,328,864)	54,296	.....	.....	.....	.....220,955	.....	.....
Currency Swap /162602 /Pay EUR[Semi-Annual] FIXED [5.478%]/ Receive USDSemi-Annual FIXED 6.6425%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.12/21/2022	.01/04/2032	.....	..... 21,180,000	 6.6425% [5.478%]	 0	.....	.....148,576	 (1,888,992)	.....	..... (1,888,992)	33,292	.....	.....	.....	.....285,341	.....	.....
Currency Swap /166905 /Pay GBP[Semi-Annual] FIXED [6.2%]/ Receive USDSemi-Annual FIXED 6.13%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.03/28/2023	.08/23/2029	.....	..... 17,262,000	.. 6.13% [6.2%]	 0	.....	.....(37,684)	 (1,476,619)	.....	..... (1,476,619)	(419,633)	.....	.....	.....	.....191,055	.....	.....
Currency Swap /166906 /Pay GBP[Semi-Annual] FIXED [6.26%]/ Receive USDSemi-Annual FIXED 6.2675%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.03/28/2023	.08/23/2031	.....	..... 11,097,000	 6.2675% [6.26%]	 0	.....	.....(17,954)	 (949,573)	.....	..... (949,573)	(199,294)	.....	.....	.....	.....145,853	.....	.....
Currency Swap /166959 /Pay GBP[Semi-Annual] FIXED [6.11%]/ Receive USDSemi-Annual FIXED 6.055%	ASSET HEDGE	Schedule D ..	Currency.....	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.03/30/2023	.06/29/2030	.....	..... 24,760,000	6.055% [6.11%]	 0	.....	.....(45,746)	 (2,018,109)	.....	..... (2,018,109)	(508,581)	.....	.....	.....	.....296,862	.....	.....
Currency Swap /167021 /Pay EUR[Semi-Annual] FIXED [6.01%]/ Receive USDSemi-Annual FIXED 6.839%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.03/31/2023	.06/30/2028	.....	..... 27,175,000	6.839% [5.62%]	 0	.....	.....168,787	 (1,278,486)	.....	..... (1,278,486)	61,739	.....	.....	.....	.....263,121	.....	.....
Currency Swap /167275 /Pay EUR[Semi-Annual] FIXED [4.57%]/ Receive USDSemi-Annual FIXED 5.219%	ASSET HEDGE	Schedule D ..	Currency.....	WELLS FARGO BANK, N.A. KB1H1DSPRFMYMCJFT09	.04/05/2023	.06/19/2029	.....	..... 24,046,000	5.219% [4.57%]	 0	.....	.....121,505	 (1,323,489)	.....	..... (1,323,489)	63,981	.....	.....	.....	.....261,206	.....	.....
Currency Swap /167714 /Pay EUR[Semi-Annual] FIXED [4.7%]/ Receive USDSemi-Annual FIXED 5.471%	ASSET HEDGE	Schedule D ..	Currency.....	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.04/18/2023	.06/07/2029	.....	..... 21,880,000	5.471% [4.7%]	 0	.....	.....131,366	 (1,067,706)	.....	..... (1,067,706)	79,427	.....	.....	.....	.....236,921	.....	.....
Currency Swap /167928 /Pay GBP[Semi-Annual] FIXED [7.16%]/ Receive USDSemi-Annual FIXED 6.791%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.04/20/2023	.05/12/2030	.....	..... 18,690,000	6.791% [7.16%]	 0	.....	.....(76,561)	 (1,733,703)	.....	..... (1,733,703)	(393,489)	.....	.....	.....	.....221,538	.....	.....
Currency Swap /170669 /Pay GBP[Annual] FIXED [6.24%]/ Receive USDAnnual FIXED 5.9265%	ASSET HEDGE	Schedule D ..	Currency.....	MORGAN STANLEY CAPITAL SERVICES .. 17331LVCZKQKX5T7XV54	.04/27/2023	.05/16/2033	.....	..... 25,563,500	 5.9265% [6.24%]	 0	.....	.....(89,980)	 (2,460,540)	.....	..... (2,460,540)	(259,992)	.....	.....	.....	.....375,488	.....	.....
Currency Swap /171291 /Pay EUR[Semi-Annual] FIXED [4.27%]/ Receive USDSemi-Annual FIXED 5.08%	ASSET HEDGE	Schedule D ..	Currency.....	BNP PARIBAS LONDON ROMUJSPFUB8MPR08K5P83	.05/11/2023	.06/20/2030	.....	..... 18,018,000	5.08% [4.27%]	 0	.....	.....112,058	 (967,976)	.....	..... (967,976)	43,538	.....	.....	.....	.....215,464	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
Currency Swap /171895 /Pay DKK[Semi-Annual] FIXED [5.26%]/ Receive USDSemi-Annual FIXED 6.34%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.05/25/2023	.06/30/2030	.....	..... 24,446,362	6.34% [5.26%]	 0	.....	.....184,977	(1,884,861)	.....	.....(1,884,861)	(90,926)	.....	.....	.....	.....293,356	.....	.....
Currency Swap /171910 /Pay CAD[Semi-Annual] FIXED [5.96%]/ Receive USDSemi-Annual FIXED 6.152%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.05/26/2023	.06/30/2033	.....	..... 14,684,288	6.152% [5.96%]	 0	.....	.....20,499	(661,278)	.....	.....(661,278)	287,667	.....	.....	.....	.....217,184	.....	.....
Currency Swap /176821 /Pay EUR[Annual] FIXED [5.194%]/ Receive USDAnnual FIXED 6.8%	ASSET HEDGE	Schedule D ..	Currency.....	MORGAN STANLEY CAPITAL SERVICES .. 17331LVCZKQKX5T7XV54	.09/21/2023	.09/28/2030	.....	..... 10,650,000	6.8% [5.194%]	 0	.....	.....120,381	(506,328)	.....	.....(506,328)	18,890	.....	.....	.....	.....130,435	.....	.....
Currency Swap /177781 /Pay GBP[Quarterly] SONIA [6.2199%]/ Receive USDQuarterly SOFR 6.5667%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.10/16/2023	.07/13/2027	.....	..... 24,400,000	 6.5667% [6.2199%]	 0	.....	.....(2,412)	(2,435,101)	.....	.....(2,435,101)	(1,283,470)	.....	.....	.....	.....203,780	.....	.....
Currency Swap /180765 /Pay EUR[Quarterly] FIXED [5.629%]/ Receive USDQuarterly FIXED 7.3215%	ASSET HEDGE	Schedule D ..	Currency.....	CITIBANK N.A. E570DZIWZ7FF32TWEFA76	.01/19/2024	.10/19/2027	.....	..... 14,520,000	 7.3215% [5.629%]	 0	.....	.....	.....34,091	.....	.....34,091	34,091	.....	.....	.....	.....126,790	.....	.....
Currency Swap /181109 /Pay CAD[Semi-Annual] FIXED [5.583%]/ Receive USDSemi-Annual FIXED 5.8805%	ASSET HEDGE	Schedule D ..	Currency.....	CITIBANK N.A. E570DZIWZ7FF32TWEFA76	.01/31/2024	.07/31/2033	.....	..... 14,720,066	 5.8805% [5.583%]	 0	.....	.....41,680	(120,800)	.....	.....(120,800)	(120,800)	.....	.....	.....	.....218,830	.....	.....
Currency Swap /182949 /Pay EUR[Semi-Annual] FIXED [4.07%]/ Receive USDSemi-Annual FIXED 5.815%	ASSET HEDGE	Schedule D ..	Currency.....	CREDIT AGRICOLE ... 1VUV7VQFKUQGSJ21A208	.03/27/2024	.07/18/2031	.....	..... 21,642,000	5.815% [4.07%]	 0	.....	.....73,240	(270,273)	.....	.....(270,273)	(270,273)	.....	.....	.....	.....282,177	.....	.....
Currency Swap /182950 /Pay EUR[Semi-Annual] FIXED [4.79%]/ Receive USDSemi-Annual FIXED 6.5675%	ASSET HEDGE	Schedule D ..	Currency.....	CREDIT AGRICOLE ... 1VUV7VQFKUQGSJ21A208	.03/27/2024	.04/17/2031	.....	..... 27,050,000	 6.5675% [4.79%]	 0	.....	.....215,273	(396,760)	.....	.....(396,760)	(396,760)	.....	.....	.....	.....346,145	.....	.....
Currency Swap /183595 /Pay EUR[Semi-Annual] FIXED [4.88%]/ Receive USDSemi-Annual FIXED 6.8425%	ASSET HEDGE	Schedule D ..	Currency.....	CREDIT AGRICOLE ... 1VUV7VQFKUQGSJ21A208	.04/10/2024	.05/07/2034	.....	..... 26,875,000	 6.8425% [4.88%]	 0	.....	.....202,937	(490,063)	.....	.....(490,063)	(490,063)	.....	.....	.....	.....416,563	.....	.....
Currency Swap /184052 /Pay EUR[Semi-Annual] FIXED [4.67%]/ Receive USDSemi-Annual FIXED 6.709%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.04/26/2024	.07/15/2031	.....	..... 21,440,000	6.709% [4.67%]	 0	.....	.....80,677	(422,022)	.....	.....(422,022)	(422,022)	.....	.....	.....	.....279,338	.....	.....
Currency Swap /184056 /Pay EUR[Semi-Annual] FIXED [5.12%]/ Receive USDSemi-Annual FIXED 7.12%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGQFU57RNE97	.04/26/2024	.05/08/2031	.....	..... 37,450,000	7.12% [5.12%]	 0	.....	.....282,167	(512,742)	.....	.....(512,742)	(512,742)	.....	.....	.....	.....481,418	.....	.....

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
Currency Swap /184476 /Pay GBP[Semi-Annual] /FIXED [5.51%]/ Receive USDSemi-Annual /FIXED 5.9145%	ASSET HEDGE	Schedule D ..	Currency.....	CREDIT AGRICOLE ... 1VUV7VQFKUOQSJ21A208	.05/10/2024	.05/15/2029	.....	37,590,000	5.9145% [5.51%]	.....	0	31,285	(1,882,143)	.....	.....(1,882,143)	(1,882,143)	.....	.....	.....	.....404,420	.....	.....
Currency Swap /185019 /Pay DKK[Semi-Annual] /FIXED [4.27%]/ Receive USDSemi-Annual /FIXED 6.1525%	ASSET HEDGE	Schedule D ..	Currency.....	CREDIT AGRICOLE ... 1VUV7VQFKUOQSJ21A208	.05/23/2024	.06/11/2029	.....	24,345,930	6.1525% [4.27%]	.....	0	137,204	(497,876)	.....	.....(497,876)	(497,876)	.....	.....	.....	.....263,904	.....	.....
Currency Swap /185230 /Pay EUR[Semi-Annual] /FIXED [5.05%]/ Receive USDSemi-Annual /FIXED 6.782%	ASSET HEDGE	Schedule D ..	Currency.....	CREDIT AGRICOLE ... 1VUV7VQFKUOQSJ21A208	.05/30/2024	.07/02/2029	.....	19,512,000	6.782% [5.05%]	.....	0	80,123	(368,921)	.....	.....(368,921)	(368,921)	.....	.....	.....	.....212,851	.....	.....
Currency Swap /185245 /Pay EUR[Semi-Annual] /FIXED [4.04%]/ Receive USDSemi-Annual /FIXED 5.6875%	ASSET HEDGE	Schedule D ..	Currency.....	THE TORONTO-DOMINION BANK PT3QB789TSUIDF371261	.05/31/2024	.11/21/2029	.....	21,702,000	5.6875% [4.04%]	.....	0	.....	.....175,716	.....	.....175,716	175,716	.....	.....	.....	.....246,009	.....	.....
Currency Swap /185683 /Pay EUR[Semi-Annual] /FIXED [5.82%]/ Receive USDSemi-Annual /FIXED 7.4075%	ASSET HEDGE	Schedule D ..	Currency.....	CREDIT AGRICOLE ... 1VUV7VQFKUOQSJ21A208	.06/13/2024	.07/15/2034	.....	21,540,000	7.4075% [5.82%]	.....	0	83,938	(784,668)	.....	.....(784,668)	(784,668)	.....	.....	.....	.....337,154	.....	.....
Currency Swap /186337 /Pay EUR[Semi-Annual] /FIXED [4.57%]/ Receive USDSemi-Annual /FIXED 6.139%	ASSET HEDGE	Schedule D ..	Currency.....	WELLS FARGO BANK, N.A. KB1H1DSPRFMYMCUFXT09	.06/26/2024	.06/30/2031	.....	24,541,000	6.139% [4.57%]	.....	0	72,541	(1,039,746)	.....	.....(1,039,746)	(1,039,746)	.....	.....	.....	.....318,797	.....	.....
Currency Swap /186965 /Pay EUR[Semi-Annual] /FIXED [4.88%]/ Receive USDSemi-Annual /FIXED 6.3%	ASSET HEDGE	Schedule D ..	Currency.....	CREDIT AGRICOLE ... 1VUV7VQFKUOQSJ21A208	.07/15/2024	.08/28/2027	.....	10,910,000	6.3% [4.88%]	.....	0	13,342	(255,896)	.....	.....(255,896)	(255,896)	.....	.....	.....	.....93,215	.....	.....
Currency Swap /189509 /Pay GBP[Semi-Annual] /FIXED [5.87%]/ Receive USDSemi-Annual /FIXED 5.5665%	ASSET HEDGE	Schedule D ..	Currency.....	CREDIT AGRICOLE ... 1VUV7VQFKUOQSJ21A208	.09/24/2024	.11/26/2029	.....	16,725,000	5.5665% [5.87%]	.....	0	.....	.....(28,882)	.....	.....(28,882)	(28,882)	.....	.....	.....	.....189,959	.....	.....
Currency Swap /189510 /Pay GBP[Semi-Annual] /FIXED [6.02%]/ Receive USDSemi-Annual /FIXED 5.792%	ASSET HEDGE	Schedule D ..	Currency.....	JPMORGAN CHASE BANK, N.A. 7H6GLXDRUGOFU57RNE97	.09/24/2024	.11/26/2031	.....	8,362,500	5.792% [6.02%]	.....	0	.....	.....(11,485)	.....	.....(11,485)	(11,485)	.....	.....	.....	.....111,883	.....	.....
1139999999. Subtotal - Swaps - Hedging Other - Foreign Exchange										0	0	2,468,214	(49,632,510)	XXX	(49,632,510)	(10,821,271)	0	0	0	9,501,569	XXX	XXX
1169999999. Subtotal - Swaps - Hedging Other										93,250	0	(20,902,771)	(70,816,530)	XXX	(70,816,530)	3,574,530	0	0	0	84,680,305	XXX	XXX
1229999999. Subtotal - Swaps - Replication										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1289999999. Subtotal - Swaps - Income Generation										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1349999999. Subtotal - Swaps - Other										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1359999999. Total Swaps - Interest Rate										93,250	0	(23,370,985)	(21,184,020)	XXX	(21,184,020)	14,395,802	0	0	0	75,178,736	XXX	XXX
1369999999. Total Swaps - Credit Default										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1379999999. Total Swaps - Foreign Exchange										0	0	2,468,214	(49,632,510)	XXX	(49,632,510)	(10,821,271)	0	0	0	9,501,569	XXX	XXX
1389999999. Total Swaps - Total Return										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1399999999. Total Swaps - Other										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
1409999999. Total Swaps										93,250	0	(20,902,771)	(70,816,530)	XXX	(70,816,530)	3,574,530	0	0	0	84,680,305	XXX	XXX
REC 25630044.84 USD PAY [23032031.67] EUR /166475	Asset Hedge	Schedule BA	Currency.....	WELLS FARGO BANK, N.A.	03/21/2023	03/27/2026		25,630,045	1.11280000	0		0	(522,874)		(522,874)	129,508				156,427		
REC 3815000.00 GBP PAY [4837269.31] USD /186395	Asset Hedge	Schedule BA, D	Currency.....	BANK OF AMERICA, N.A.	07/01/2024	10/02/2024		4,837,269	1.26796050		0	0	279,528		279,528	279,528				2,419		
REC 15817205.23 USD PAY [14641000.00] EUR /186413	Asset Hedge	Schedule BA, D	Currency.....	BARCLAYS BANK PLC G5GSEF7VJP5I70UK5573	07/01/2024	10/02/2024		15,817,205	1.08033640		0	0	(481,757)		(481,757)	(481,757)				7,909		
REC 5524641.48 USD PAY [5118000.00] EUR /186442	Asset Hedge	Schedule BA, D	Currency.....	BANK OF AMERICA, N.A.	07/01/2024	10/02/2024		5,524,641	1.07945320		0	0	(177,999)		(177,999)	(177,999)				2,762		
REC 24058598.66 USD PAY [22319000.00] EUR /186490	Asset Hedge	Schedule BA, D	Currency.....	MORGAN STANLEY CAPITAL SERVICES ..	07/02/2024	10/03/2024		24,058,599	1.07794250		0	0	(790,031)		(790,031)	(790,031)				12,029		
REC 31865448.73 USD PAY [337610000.00] SEK /186509	Asset Hedge	Schedule BA, D	Currency.....	BANK OF AMERICA, N.A.	07/02/2024	10/03/2024		31,865,449	0.9438538		0	0	(1,424,866)		(1,424,866)	(1,424,866)				15,933		
REC 22912481.16 USD PAY [21153000.00] EUR /186572	Asset Hedge	Schedule BA, D	Currency.....	ROYAL BANK OF CANADA	07/03/2024	10/04/2024		22,912,481	1.08317880		0	0	(713,279)		(713,279)	(713,279)				11,456		
REC 5072805.47 USD PAY [4669000.00] EUR /186778	Asset Hedge	Schedule BA, D	Currency.....	THE TORONTO- DOMINION BANK	07/09/2024	10/10/2024		5,072,805	1.08648650		0	0	(143,242)		(143,242)	(143,242)				4,393		
REC 4838977.00 EUR PAY [5285077.93] USD /186855	Asset Hedge	Schedule BA, D	Currency.....	BANK OF AMERICA, N.A.	07/11/2024	10/04/2024		5,285,078	1.09218910		0	0	107,075		107,075	107,075				2,643		
REC 346166.54 USD PAY [317000.00] EUR /186969	Asset Hedge	Schedule BA, D	Currency.....	THE TORONTO- DOMINION BANK	07/16/2024	10/10/2024		346,167	1.09200801		0	0	(7,978)		(7,978)	(7,978)				300		
REC 131633.54 USD PAY [181000.00] CAD /187237	Asset Hedge	Schedule BA, D	Currency.....	THE TORONTO- DOMINION BANK	07/24/2024	10/25/2024		131,634	72725713		0	0	(2,394)		(2,394)	(2,394)				174		
REC 12252225.94 USD PAY [11277000.00] EUR /187334	Asset Hedge	Schedule BA, D	Currency.....	ROYAL BANK OF CANADA	07/29/2024	10/30/2024		12,252,226	1.08647920		0	0	(355,103)		(355,103)	(355,103)				17,327		
REC 233117.42 USD PAY [356000.00] AUD /187399	Asset Hedge	Schedule BA, D	Currency.....	WELLS FARGO BANK, N.A.	07/30/2024	10/31/2024		233,117	65482421		0	0	(13,256)		(13,256)	(13,256)				330		
REC 15912147.99 USD PAY [12391000.00] GBP /187440	Asset Hedge	Schedule BA, D	Currency.....	ROYAL BANK OF CANADA	08/01/2024	11/04/2024		15,912,148	1.28416980		0	0	(659,274)		(659,274)	(659,274)				23,868		
REC 1847922.75 USD PAY [1455000.00] GBP /187540	Asset Hedge	Schedule BA, D	Currency.....	CANADIAN IMPERIAL BANK OF COMMERCE ..	08/06/2024	11/04/2024		1,847,923	1.27005000		0	0	(96,867)		(96,867)	(96,867)				2,772		
REC 253374.56 USD PAY [199000.00] GBP /187619	Asset Hedge	Schedule BA, D	Currency.....	THE TORONTO- DOMINION BANK	08/07/2024	10/02/2024		253,375	1.27323899		0	0	(12,986)		(12,986)	(12,986)				127		
REC 36665247.11 USD PAY [33418000.00] EUR /187849	Asset Hedge	Schedule BA, D	Currency.....	BNP PARIBAS LONDON ROMUJISFPUBMPRO8K5P83	08/12/2024	11/13/2024		36,665,247	1.09717060		0	0	(676,827)		(676,827)	(676,827)				63,506		
REC 322113.41 USD PAY [441000.00] CAD /187936	Asset Hedge	Schedule BA, D	Currency.....	THE TORONTO- DOMINION BANK	08/13/2024	11/14/2024		322,113	73041590		0	0	(4,621)		(4,621)	(4,621)				558		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amortization)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
REC 3225513.94 USD PAY [2518000.00] GBP /187940	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON	.08/13/2024	.11/14/2024		3,225,514	1.28098250		0	0	(150,145)		(150,145)	(150,145)				5,587		
REC 279100.43 USD PAY [217000.00] GBP /188029	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON	.08/14/2024	.11/04/2024		279,100	1.28617710		0	0	(11,842)		(11,842)	(11,842)				419		
REC 5435460.20 USD PAY [8200000.00] AUD /188057	Asset Hedge	Schedule BA, D	Currency	CITIBANK N.A.	.08/14/2024	.10/28/2024		5,435,460	.66286100		0	0	(254,650)		(254,650)	(254,650)				7,687		
REC 5299902.40 USD PAY [8000000.00] AUD /188063	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON	.08/15/2024	.10/28/2024		5,299,902	.66248780		0	0	(251,624)		(251,624)	(251,624)				7,495		
REC 3896708.93 USD PAY [5880000.00] AUD /188072	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON	.08/15/2024	.11/15/2024		3,896,709	.66270560		0	0	(184,065)		(184,065)	(184,065)				7,025		
REC 936159.08 USD PAY [840000.00] EUR /188143	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON	.08/20/2024	.11/21/2024		836,159	1.11447510		0	0	(2,859)		(2,859)	(2,859)				1,751		
REC 16064044.09 USD PAY [14414000.00] EUR /188148	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON	.08/20/2024	.11/21/2024		16,064,044	1.11447510		0	0	(49,058)		(49,058)	(49,058)				30,053		
REC 558525.25 USD PAY [500000.00] EUR /188200	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON	.08/21/2024	.11/13/2024		558,525	1.11705050		0	0	(265)		(265)	(265)				967		
REC 3437338.00 USD PAY [3069000.00] EUR /188375	Asset Hedge	Schedule BA, D	Currency	MORGAN STANLEY CAPITAL SERVICES	.08/26/2024	.11/13/2024		3,437,338	1.12001890		0	0	14,538		14,538	14,538				5,954		
REC 358000.00 EUR PAY [399226.35] USD /188469	Asset Hedge	Schedule BA, D	Currency	MORGAN STANLEY CAPITAL SERVICES	.08/28/2024	.11/13/2024		399,226	1.11515740		0	0	34		34	34				691		
REC 12266731.40 USD PAY [11000000.00] EUR /188470	Asset Hedge	Schedule BA, D	Currency	MORGAN STANLEY CAPITAL SERVICES	.08/28/2024	.11/13/2024		12,266,731	1.11515740		0	0	(1,056)		(1,056)	(1,056)				21,247		
REC 266856.29 USD PAY [203000.00] GBP /188594	Asset Hedge	Schedule BA, D	Currency	THE TORONTO-DOMINION BANK	.09/03/2024	.10/02/2024		266,856	1.31456300		0	0	(4,863)		(4,863)	(4,863)				133		
REC 10097940.00 USD PAY [15000000.00] AUD /188615	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON	.09/04/2024	.10/28/2024		10,097,940	.67319600		0	0	(312,105)		(312,105)	(312,105)				14,281		
REC 2965513.40 USD PAY [2665000.00] EUR /188682	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON	.09/06/2024	.12/09/2024		2,965,513	1.11276300		0	0	(15,512)		(15,512)	(15,512)				6,463		
REC 1949258.30 USD PAY [1761000.00] EUR /188729	Asset Hedge	Schedule BA, D	Currency	CANADIAN IMPERIAL BANK OF COMMERCE	.09/09/2024	.11/13/2024		1,949,258	1.10690420		0	0	(14,291)		(14,291)	(14,291)				3,376		
REC 5752535.75 USD PAY [5194000.00] EUR /188860	Asset Hedge	Schedule BA, D	Currency	ROYAL BANK OF CANADA	.09/10/2024	.12/13/2024		5,752,536	1.10753480		0	0	(63,799)		(63,799)	(63,799)				12,863		
REC 807916.96 USD PAY [618000.00] GBP /188861	Asset Hedge	Schedule BA, D	Currency	BARCLAYS BANK PLC	.09/10/2024	.12/09/2024		807,917	1.30730900		0	0	(18,430)		(18,430)	(18,430)				1,761		
REC 6682326.48 USD PAY [10059000.00] AUD /188927	Asset Hedge	Schedule BA, D	Currency	MORGAN STANLEY CAPITAL SERVICES	.09/11/2024	.12/16/2024		6,682,326	.66431320		0	0	(280,428)		(280,428)	(280,428)				15,311		
REC 27941796.76 USD PAY [25214000.00] EUR /188943	Asset Hedge	Schedule BA, D	Currency	BARCLAYS BANK PLC	.09/12/2024	.12/16/2024		27,941,797	1.10818580		0	0	(208,952)		(208,952)	(208,952)				64,023		

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amorti-zation)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Reference Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
REC 5253872.40 USD PAY [8550000.00] NZD /188946	Asset Hedge	Schedule BA, D	Currency	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.09/12/2024	.12/16/2024		5,253,872	.61448800		0	0	(184,991)		(184,991)	(184,991)				12,038		
REC 4655788.50 USD PAY [4201000.00] EUR /188949	Asset Hedge	Schedule BA, D	Currency	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.09/12/2024	.12/16/2024		4,655,789	1.10825720		0	0	(46,149)		(46,149)	(46,149)				10,668		
REC 4683944.33 USD PAY [6997000.00] AUD /188977	Asset Hedge	Schedule BA, D	Currency	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.09/12/2024	.12/16/2024		4,683,944	.66942180		0	0	(159,309)		(159,309)	(159,309)				10,732		
REC 5179085.83 USD PAY [3939000.00] GBP /189013	Asset Hedge	Schedule BA, D	Currency	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.09/13/2024	.12/16/2024		5,179,086	1.31482250		0	0	(102,641)		(102,641)	(102,641)				11,867		
REC 964684.98 USD PAY [731000.00] GBP /189148	Asset Hedge	Schedule BA, D	Currency	THE TORONTO-DOMINION BANK PT30B789TSUIDF371261	.09/17/2024	.12/18/2024		964,685	1.31967850		0	0	(13,420)		(13,420)	(13,420)				2,262		
REC 144749.52 USD PAY [234000.00] NZD /189149	Asset Hedge	Schedule BA, D	Currency	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.09/17/2024	.12/16/2024		144,750	.61858769		0	0	(3,909)		(3,909)	(3,909)				332		
REC 44510654.16 USD PAY [39890000.00] EUR /189150	Asset Hedge	Schedule BA, D	Currency	MORGAN STANLEY CAPITAL SERVICES .. I7331LVCZKQKX5T7XV54	.09/17/2024	.12/18/2024		44,510,654	1.11583490		0	0	(33,987)		(33,987)	(33,987)				104,387		
REC 1307167.04 USD PAY [8731000.00] DKK /189229	Asset Hedge	Schedule BA, D	Currency	BANK OF AMERICA, N.A. B4TYDEB6KMZ0031MB27	.09/17/2024	.12/20/2024		1,307,167	.14971562		0	0	(3,217)		(3,217)	(3,217)				3,066		
REC 4638218.66 USD PAY [4153000.00] EUR /189277	Asset Hedge	Schedule BA, D	Currency	SOCIETE GENERAL ... 02RNE81BX4R0TD8PU41	.09/19/2024	.12/09/2024		4,638,219	1.11683570		0	0	1,989		1,989	1,989				10,109		
REC 15828662.41 USD PAY [14158000.00] EUR /189331	Asset Hedge	Schedule BA, D	Currency	ROYAL BANK OF CANADA ES71P3U3RHI1G71XBU11	.09/20/2024	.12/20/2024		15,828,662	1.11800130		0	0	(31,132)		(31,132)	(31,132)				37,122		
REC 6495334.76 USD PAY [5820000.00] EUR /189333	Asset Hedge	Schedule BA, D	Currency	ROYAL BANK OF CANADA ES71P3U3RHI1G71XBU11	.09/20/2024	.10/30/2024		6,495,335	1.11603690		0	0	(12,001)		(12,001)	(12,001)				9,186		
REC 3409000.00 GBP PAY [4562094.25] USD /189591	Asset Hedge	Schedule BA, D	Currency	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.09/30/2024	.01/02/2025		4,562,094	1.33825000		0	0	(3,435)		(3,435)	(3,435)				11,631		
REC 14641000.00 EUR PAY [16383279.00] USD /189594	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON ROMUJISFPUBM8MPR08K5P83	.09/30/2024	.10/02/2024		16,383,279	1.11900000		0	0	(48,932)		(48,932)	(48,932)				8,192		
REC 16814392.70 USD PAY [14971000.00] EUR /189595	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON ROMUJISFPUBM8MPR08K5P83	.09/30/2024	.01/02/2025		16,814,393	1.12313090		0	0	48,880		48,880	48,880				42,868		
REC 4552680.63 USD PAY [3401000.00] GBP /189621	Asset Hedge	Schedule BA, D	Currency	BARCLAYS BANK PLC G5GSEF7VJP5170UK5573	.09/30/2024	.10/02/2024		4,552,681	1.33863000		0	0	3,672		3,672	3,672				2,276		
REC 5823057.84 USD PAY [5195000.00] EUR /189631	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON ROMUJISFPUBM8MPR08K5P83	.09/30/2024	.01/02/2025		5,823,058	1.12089660		0	0	5,516		5,516	5,516				14,846		
REC 5195000.00 EUR PAY [5801360.40] USD /189632	Asset Hedge	Schedule BA, D	Currency	BNP PARIBAS LONDON ROMUJISFPUBM8MPR08K5P83	.09/30/2024	.10/02/2024		5,801,360	1.11672000		0	0	(5,546)		(5,546)	(5,546)				2,901		
REC 9450000.00 AUD PAY [6547149.00] USD /189664	Asset Hedge	Schedule BA, D	Currency	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.09/30/2024	.10/02/2024		6,547,149	.69282000		0	0	8,786		8,786	8,786				3,274		
REC 6549769.49 USD PAY [9450000.00] AUD /189665	Asset Hedge	Schedule BA, D	Currency	CITIBANK N.A. E570DZVZ7FF32TWEFA76	.09/30/2024	.10/28/2024		6,549,769	.69309730		0	0	(8,804)		(8,804)	(8,804)				9,263		
1439999999. Subtotal - Forwards - Hedging Other										0	0	0	(8,094,752)	XXX	(8,094,752)	(7,442,370)	0	0	0	839,040	XXX	XXX

SCHEDULE DB - PART A - SECTION 1

Showing all Options, Caps, Floors, Collars, Swaps and Forwards Open as of Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Exchange, Counterparty or Central Clearinghouse	Trade Date	Date of Maturity or Expiration	Number of Contracts	Notional Amount	Strike Price, Rate or Index Received (Paid)	Cumulative Prior Year(s) Initial Cost of Un-discounted Premium (Received) Paid	Current Year Initial Cost of Un-discounted Premium (Received) Paid	Current Year Income	Book/ Adjusted Carrying Value	Code	Fair Value	Unrealized Valuation Increase/ (Decrease)	Total Foreign Exchange Change in B./A.C.V.	Current Year's (Amorti-zation)/ Accretion	Adjustment to Carrying Value of Hedged Item	Potential Exposure	Credit Quality of Refer-ence Entity	Hedge Effectiveness at Inception and at Quarter-end (b)
1479999999. Subtotal - Forwards										0	0	0	(8,094,752)	XXX	(8,094,752)	(7,442,370)	0	0	0	839,040	XXX	XXX
1509999999. Subtotal - SSAP No. 108 Adjustments										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1689999999. Subtotal - Hedging Effective Excluding Variable Annuity Guarantees Under SSAP No.108										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1699999999. Subtotal - Hedging Effective Variable Annuity Guarantees Under SSAP No.108										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1709999999. Subtotal - Hedging Other										206,864,232	525,179,310	(299,676,818)	271,629,792	XXX	917,912,309	(2,727,519)	0	(331,964,295)	0	85,519,345	XXX	XXX
1719999999. Subtotal - Replication										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1729999999. Subtotal - Income Generation										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1739999999. Subtotal - Other										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1749999999. Subtotal - Adjustments for SSAP No. 108 Derivatives										0	0	0	0	XXX	0	0	0	0	0	0	XXX	XXX
1759999999 - Totals										206,864,232	525,179,310	(299,676,818)	271,629,792	XXX	917,912,309	(2,727,519)	0	(331,964,295)	0	85,519,345	XXX	XXX

(a)	Code	Description of Hedged Risk(s)

(b)	Code	Financial or Economic Impact of the Hedge at the End of the Reporting Period

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART B - SECTION 1

Futures Contracts Open as of the Current Statement Date

1	2	3	4	5	6	7	8	9	10	11	12	13	14	Highly Effective Hedges			18	19	20	21	22
														15	16	17					
Ticker Symbol	Number of Contracts	Notional Amount	Description	Description of Item(s) Hedged, Used for Income Generation or Replicated	Schedule/ Exhibit Identifier	Type(s) of Risk(s) (a)	Date of Maturity or Expiration	Exchange	Trade Date	Transaction Price	Reporting Date Price	Fair Value	Book/ Adjusted Carrying Value	Cumulative Variation Margin	Deferred Variation Margin	Change in Variation Margin Gain (Loss) Used to Adjust Basis of Hedged Item	Cumulative Variation Margin for All Other Hedges	Change in Variation Margin Gain (Loss) Recognized in Current Year	Potential Exposure	Hedge Effectiveness at Inception and at Quarter-end (b)	Value of One (1) Point
TYZ4	91	9,100,000	Long /US 10Y NOTE FUTURE 11 /188934 ...	LIABILITY HEDGE	Schedule BA, D	Interest	12/31/2024	CBOT LCZ7XYGSLJUHFXNXND88	.09/11/2024	115.3438	114.2800	(96,935)	(96,935)				(96,935)	(96,935)	182,000		1,000
TYZ4	1,201	120,100,000	Long /US 10Y NOTE FUTURE 11 /189573 ...	LIABILITY HEDGE	Schedule BA, D	Interest	12/31/2024	CBOT LCZ7XYGSLJUHFXNXND88	.09/26/2024	114.4531	114.2800	(209,689)	(209,689)				(209,689)	(209,689)	2,402,000		1,000
TUZ4	21	4,200,000	Long /US 2YR NOTE FUTURE 11 /189572 ...	LIABILITY HEDGE	Schedule BA, D	Interest	12/31/2024	CBOT LCZ7XYGSLJUHFXNXND88	.09/26/2024	104.2070	104.1200	(3,663)	(3,663)				(3,663)	(3,663)	24,150		2,000
FVZ4	977	97,700,000	Long /US 5YR NOTE FUTURE 11 /189574 ...	LIABILITY HEDGE	Schedule BA, D	Interest	12/31/2024	CBOT LCZ7XYGSLJUHFXNXND88	.09/26/2024	110.0234	109.8800	(139,902)	(139,902)				(139,902)	(139,902)	1,270,100		1,000
1539999999. Subtotal - Long Futures - Hedging Other												(450,189)	(450,189)	0	0	0	(450,189)	(450,189)	3,878,250	XXX	XXX
1579999999. Subtotal - Long Futures												(450,189)	(450,189)	0	0	0	(450,189)	(450,189)	3,878,250	XXX	XXX
1649999999. Subtotal - Short Futures												0	0	0	0	0	0	0	0	XXX	XXX
1679999999. Subtotal - SSAP No. 108 Adjustments												0	0	0	0	0	0	0	0	XXX	XXX
1689999999. Subtotal - Hedging Effective Excluding Variable Annuity Guarantees Under SSAP No.108												0	0	0	0	0	0	0	0	XXX	XXX
1699999999. Subtotal - Hedging Effective Variable Annuity Guarantees Under SSAP No.108												0	0	0	0	0	0	0	0	XXX	XXX
1709999999. Subtotal - Hedging Other												(450,189)	(450,189)	0	0	0	(450,189)	(450,189)	3,878,250	XXX	XXX
1719999999. Subtotal - Replication												0	0	0	0	0	0	0	0	XXX	XXX
1729999999. Subtotal - Income Generation												0	0	0	0	0	0	0	0	XXX	XXX
1739999999. Subtotal - Other												0	0	0	0	0	0	0	0	XXX	XXX
1749999999. Subtotal - Adjustments for SSAP No. 108 Derivatives												0	0	0	0	0	0	0	0	XXX	XXX
1759999999 - Totals												(450,189)	(450,189)	0	0	0	(450,189)	(450,189)	3,878,250	XXX	XXX

Broker Name	Beginning Cash Balance	Cumulative Cash Change	Ending Cash Balance
Total Net Cash Deposits			

- (a)

Code	Description of Hedged Risk(s)
- (b)

Code	Financial or Economic Impact of the Hedge at the End of the Reporting Period

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART D - SECTION 1

Counterparty Exposure for Derivative Instruments Open as of Current Statement Date

1	2	3	Counterparty Offset		Book/Adjusted Carrying Value			Fair Value			12	13
			4	5	6	7	8	9	10	11		
Description of Exchange, Counterparty or Central Clearinghouse	Master Agreement (Y or N)	Credit Support Annex (Y or N)	Fair Value of Acceptable Collateral	Present Value of Financing Premium	Contracts With Book/Adjusted Carrying Value >0	Contracts With Book/Adjusted Carrying Value <0	Exposure Net of Collateral	Contracts With Fair Value >0	Contracts With Fair Value <0	Exposure Net of Collateral	Potential Exposure	Off-Balance Sheet Exposure
0199999999 - Aggregate Sum of Exchange Traded Derivatives	XXX	XXX	XXX		392,783,359	(245,307,521)	392,783,359	454,133,520	(450,188)	454,133,520	3,878,250	3,878,250
Bank of America, N.A. ISDA Uncleared	Y	Y	174,840,000		28,319,134	(6,029,055)	0	53,147,505	(1,606,081)	0	26,823	
Barclays Bank PLC	Y	Y					0			0		
Barclays Bank PLC ISDA Uncleared	Y	Y	62,060,000		29,187,739	(19,368,386)	0	28,045,710	(875,792)	0	98,664	
BNP Paribas London	Y	Y					0			0		
BNP Paribas London ISDA Uncleared	Y	Y	149,670,000		65,947,986	(31,812,439)	0	89,538,374	(2,676,755)	0	421,818	
Canadian Imperial Bank of Commerce ISDA Uncleared	Y	Y				(111,158)	0			0	6,148	
Citibank N.A. ISDA Uncleared	Y	Y	119,413,237		58,078,085	(4,821,709)	0	127,472,567	(4,821,709)	3,237,621	976,944	
Credit Agricole ISDA Uncleared	Y	Y				(4,975,481)	0		(4,975,481)	0	2,546,388	
Goldman Sachs International ISDA Uncleared	Y	Y	63,940,000		2,779,418	(1,806,126)	0	4,064,658		0		
JPMorgan Chase Bank, N.A. ISDA Uncleared	Y	Y	73,750,000		19,910,942	(17,018,247)	0	78,384,161	(16,121,873)	0	3,029,295	
Morgan Stanley & Co. International PLC ISDA Uncleared	Y	Y	9,915,000		5,146,106	(3,475,064)	0	9,266,211		0		
Morgan Stanley Capital Services	Y	Y					0			0		
Morgan Stanley Capital Services ISDA Uncleared	Y	Y			14,573	(5,401,234)	0	14,573	(5,401,234)	0	886,497	
Royal Bank of Canada ISDA Uncleared	Y	Y	84,440,000		23,468,624	(20,225,416)	0	25,757,566	(10,171,692)	0	621,215	
Societe General ISDA Uncleared	Y	Y	378,260,000		10,935,537	(6,715,634)	0	8,509,529	1,129,436	0	10,109	
The Toronto-Dominion Bank	Y	Y					0			0		
The Toronto-Dominion Bank ISDA Uncleared	Y	Y	270,000		175,716	(189,505)	0	175,716	(189,505)	0	253,956	
UBS AG ISDA Uncleared	Y	Y	27,530,000		18,771,448	(5,441,484)	0	28,123,613		593,613		
Wells Fargo Bank, N.A. ISDA Uncleared	Y	Y	79,470,337		35,958,487	(26,415,067)	0	89,740,278	(11,455,807)	0	1,462,752	
0299999999. Total NAIC 1 Designation			1,223,558,574	0	298,693,794	(153,806,007)	0	542,240,461	(57,277,652)	3,831,234	10,340,609	0
0899999999. Aggregate Sum of Central Clearinghouses (Excluding Exchange Traded)					36,750,596	(57,934,616)	0	36,750,596	(57,934,616)	0	75,178,736	53,994,716
0999999999 - Gross Totals			1,223,558,574	0	728,227,749	(457,048,144)	392,783,359	1,033,124,576	(115,662,455)	457,964,754	89,397,595	57,872,966
1. Offset per SSAP No. 64												
2. Net after right of offset per SSAP No. 64					728,227,749	(457,048,144)						

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE DB - PART D - SECTION 2

Collateral for Derivative Instruments Open as of Current Statement Date

Collateral Pledged by Reporting Entity

1	2	3	4	5	6	7	8	9
Exchange, Counterparty or Central Clearinghouse	Type of Asset Pledged	CUSIP Identification	Description	Fair Value	Par Value	Book/Adjusted Carrying Value	Maturity Date	Type of Margin (I, V or IV)
Canadian Imperial Bank of Commerce	21G119DL770XOHC3ZE78 ..	Cash.....	Cash Collateral	100,000	100,000	100,000		V.....
Credit Agricole Corporate and Investment Bank	1VUV7VQFKUQGSJ21A208 ..	Cash.....	Cash Collateral	4,200,000	4,200,000	4,200,000		V.....
Morgan Stanley & Co. LLC	9R7GPTS07KV3UQJZQ078 ..	Cash.....	Cash Collateral	93,014,139	93,014,139	93,014,139		I.....
Morgan Stanley & Co. LLC CME	9R7GPTS07KV3UQJZQ078 ..	Cash.....	Cash Collateral	37,323,646	37,323,646	37,323,646		V.....
Morgan Stanley Capital Services	17331LVCZKQKX5T7XV54 ..	Cash.....	Cash Collateral	5,520,000	5,520,000	5,520,000		V.....
Morgan Stanley & Co. LLC	9R7GPTS07KV3UQJZQ078 ..	Cash.....	Cash Collateral	450,188	450,188	450,188		V.....
Morgan Stanley & Co. LLC	9R7GPTS07KV3UQJZQ078 ..	Corporate.....	Comcast Corporation	33,626,732	38,000,000	23,538,712	04/01/2040 ...	I.....
.....								
.....								
.....								
.....								
0199999999 - Total				174,234,705	178,607,973	164,146,685	XXX	XXX

Collateral Pledged to Reporting Entity

1	2	3	4	5	6	7	8	9
Exchange, Counterparty or Central Clearinghouse	Type of Asset Pledged	CUSIP Identification	Description	Fair Value	Par Value	Book/Adjusted Carrying Value	Maturity Date	Type of Margin (I, V or IV)
Bank Of America NA	B4TYDEB6GKMZ0031MB27 ..	Cash.....	Cash Collateral	174,840,000	174,840,000	XXX.....		V.....
Barclays Bank Plc	G5GSEF7VJP517OUK5573 ..	Cash.....	Cash Collateral	62,060,000	62,060,000	XXX.....		V.....
BNP Paribas	ROMUWSPU8MPRO8K5P83 ..	Cash.....	Cash Collateral	149,670,000	149,670,000	XXX.....		V.....
Citibank NA	E57ODZVZ7FF32TIEFA76 ..	Cash.....	Cash Collateral	119,413,237	119,413,237	XXX.....		V.....
Goldman Sachs International	W22LR0WP21HZNB6K528 ..	Cash.....	Cash Collateral	63,940,000	63,940,000	XXX.....		V.....
JPMorgan Chase Bank, N.A.	7H6GLXDRUGGFU57RNE97 ..	Cash.....	Cash Collateral	73,750,000	73,750,000	XXX.....		V.....
Morgan Stanley & Co International PLC	4PQUHNSJPFGFNF3BB653 ..	Cash.....	Cash Collateral	9,915,000	9,915,000	XXX.....		V.....
Royal Bank of Canada	ES71P3U3RH1G071XBU11 ..	Cash.....	Cash Collateral	84,440,000	84,440,000	XXX.....		V.....
Societe Generale	02RNE81BXP4ROTDBPU41 ..	Cash.....	Cash Collateral	378,260,000	378,260,000	XXX.....		V.....
Toronto Dominion Bank	PT3QB789TSUIDF371261 ..	Cash.....	Cash Collateral	270,000	270,000	XXX.....		V.....
UBS AG	BFM8T61CT2L1QCEM1K50 ..	Cash.....	Cash Collateral	27,530,000	27,530,000	XXX.....		V.....
Wells Fargo Bank NA	KB1H1DSPPFMYMCUFXT09 ..	Cash.....	Cash Collateral	79,470,337	79,470,337	XXX.....		V.....
0299999999 - Total				1,223,558,574	1,223,558,574	XXX	XXX	XXX

Schedule DB - Part E - Derivatives Hedging Variable Annuity Guarantees

N O N E

Schedule DL - Part 1 - Reinvested Collateral Assets Owned

N O N E

Schedule DL - Part 2 - Reinvested Collateral Assets Owned

N O N E

SCHEDULE E - PART 1 - CASH

Month End Depository Balances

1	2	3	4	5	Book Balance at End of Each Month During Current Quarter			9
					6	7	8	
					First Month	Second Month	Third Month	
Depository	Code	Rate of Interest	Amount of Interest Received During Current Quarter	Amount of Interest Accrued at Current Statement Date				*
Bank of New York Mellon New York, NY .....	.....	.....	.....	.....	..... 51,349,772	 35,006,458	 109,616,532	..XXX.
PNC Bank Pittsburgh, PA .....	.....	.....	.....	.....	..... (211,183,876)	 (171,009,240)	 (176,944,462)	..XXX.
Wells Fargo Bank / Norwest Bank Phoenix, AZ .....	.....	.....	.....	.....	..... 95,213	 65,275	 104,256	..XXX.
FHLB Cincinnati, OH .....	.....	.. 4.300	 491,595	.....	..... 45,519,697	 58,612,925	 14,877,678	..XXX.
State Street Global Services Kansas City, MO .....	.....	.....	.....	.....	..... 21,267,475	 11,700,629	 16,280,799	..XXX.
0199998. Deposits in ... depositories that do not exceed the allowable limit in any one depository (See instructions) - Open Depositories	XXX	XXX						XXX
0199999. Totals - Open Depositories	XXX	XXX	491,595	0	(92,951,719)	(65,623,953)	(36,065,197)	XXX
0299998. Deposits in ... depositories that do not exceed the allowable limit in any one depository (See instructions) - Suspended Depositories	XXX	XXX						XXX
0299999. Totals - Suspended Depositories	XXX	XXX	0	0	0	0	0	XXX
0399999. Total Cash on Deposit	XXX	XXX	491,595	0	(92,951,719)	(65,623,953)	(36,065,197)	XXX
0499999. Cash in Company's Office	XXX	XXX	XXX	XXX				XXX
.....								
.....								
.....								
.....								
.....								
.....								
.....								
.....								
.....								
0599999. Total - Cash	XXX	XXX	491,595	0	(92,951,719)	(65,623,953)	(36,065,197)	XXX

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE E - PART 2 - CASH EQUIVALENTS

Show Investments Owned End of Current Quarter

1	2	3	4	5	6	7	8	9
CUSIP	Description	Code	Date Acquired	Rate of Interest	Maturity Date	Book/Adjusted Carrying Value	Amount of Interest Due and Accrued	Amount Received During Year
0109999999	Total - U.S. Government Bonds					0	0	0
0309999999	Total - All Other Government Bonds					0	0	0
0509999999	Total - U.S. States, Territories and Possessions Bonds					0	0	0
0709999999	Total - U.S. Political Subdivisions Bonds					0	0	0
0909999999	Total - U.S. Special Revenues Bonds					0	0	0
.....	AT&T INC COMMERCIAL PAPER .....	.....	09/30/2024 .....	.....	10/16/2024	49,897,708	0	0
.....	AGILENT TECHNOLOGIES INC COMMERCIAL PAPE .....	.....	09/26/2024 .....	.....	10/24/2024	49,842,086	0	34,197
.....	ALIMENTATION COUCHE-TARD INC COMMERCIAL .....	.....	09/16/2024 .....	.....	10/09/2024	47,543,389	0	105,784
.....	AMCOR FLEXIBLES NORTH AMERICA INC COMMER .....	.....	09/23/2024 .....	.....	10/03/2024	19,994,483	0	22,038
.....	AMCOR FLEXIBLES NORTH AMERICA INC COMMER .....	.....	09/26/2024 .....	.....	10/07/2024	14,987,742	0	10,200
.....	AMCOR FINANCE (USA) INC COMMERCIAL PAPER .....	.....	09/25/2024 .....	.....	10/04/2024	10,995,505	0	8,980
.....	AMEREN CORPORATION COMMERCIAL PAPER .....	.....	09/19/2024 .....	.....	10/23/2024	29,908,548	0	49,648
.....	AMEREN CORPORATION COMMERCIAL PAPER .....	.....	09/30/2024 .....	.....	11/01/2024	14,936,321	0	0
.....	AMERICAN ELECTRIC POWER COMPANY INC COMM .....	.....	09/16/2024 .....	.....	10/17/2024	24,941,316	0	54,767
.....	AMERICAN HONDA FINANCE CORPORATION COMME .....	.....	07/18/2024 .....	.....	10/10/2024	30,956,808	0	350,620
.....	AMERICAN HONDA FINANCE CORPORATION COMME .....	.....	09/16/2024 .....	.....	12/11/2024	15,837,456	0	33,919
.....	ARCHER DANIELS MIDLAND CO COMMERCIAL PAP .....	.....	09/26/2024 .....	.....	10/11/2024	26,963,751	0	18,088
.....	AVANGRID INC COMMERCIAL PAPER .....	.....	09/26/2024 .....	.....	11/07/2024	19,898,592	0	13,625
.....	AVANGRID INC COMMERCIAL PAPER .....	.....	09/19/2024 .....	.....	11/08/2024	29,842,060	0	45,410
.....	AVERY DENNISON CORPORATION COMMERCIAL PA .....	.....	08/15/2024 .....	.....	10/04/2024	29,986,506	0	209,839
.....	AVERY DENNISON CORPORATION COMMERCIAL PA .....	.....	09/24/2024 .....	.....	11/08/2024	14,922,353	0	12,187
.....	BECTON DICKINSON AND COMPANY COMMERCIAL .....	.....	09/27/2024 .....	.....	10/30/2024	44,823,367	0	24,254
.....	BELL TELEPHONE COMPANY OF CANADA OR BELL .....	.....	09/19/2024 .....	.....	10/21/2024	24,930,440	0	41,551
.....	BELL TELEPHONE COMPANY OF CANADA OR BELL .....	.....	09/23/2024 .....	.....	10/23/2024	32,699,666	0	36,333
.....	BROWN-FORMAN CORPORATION COMMERCIAL PAPE .....	.....	09/27/2024 .....	.....	10/24/2024	13,956,507	0	7,537
.....	BROWN-FORMAN CORPORATION COMMERCIAL PAPE .....	.....	09/30/2024 .....	.....	11/05/2024	18,411,856	0	2,506
.....	CRH AMERICA FINANCE INC COMMERCIAL PAPER .....	.....	08/30/2024 .....	.....	10/29/2024	9,957,901	0	41,746
.....	CANADIAN PACIFIC RAILWAY COMPANY COMMER .....	.....	09/24/2024 .....	.....	10/08/2024	9,790,635	0	9,347
.....	CANADIAN PACIFIC RAILWAY COMPANY COMMER .....	.....	09/30/2024 .....	.....	10/15/2024	15,869,636	0	2,164
.....	CARGILL INC COMMERCIAL PAPER .....	.....	09/25/2024 .....	.....	10/02/2024	34,995,330	0	27,996
.....	CARGILL INC COMMERCIAL PAPER .....	.....	09/26/2024 .....	.....	10/03/2024	24,993,329	0	16,662
.....	CENTERPOINT ENERGY INC COMMERCIAL PAPER .....	.....	09/26/2024 .....	.....	10/17/2024	23,249,431	0	15,758
.....	CENTERPOINT ENERGY INC COMMERCIAL PAPER .....	.....	09/30/2024 .....	.....	10/21/2024	19,945,667	0	0
.....	CINTAS NO 2 CORP COMMERCIAL PAPER .....	.....	09/18/2024 .....	.....	10/02/2024	8,998,715	0	16,670
.....	CINTAS NO 2 CORP COMMERCIAL PAPER .....	.....	09/16/2024 .....	.....	10/03/2024	9,997,094	0	21,744
.....	CINTAS NO 2 CORP COMMERCIAL PAPER .....	.....	09/04/2024 .....	.....	10/04/2024	14,993,273	0	60,273
.....	CINTAS NO 2 CORP COMMERCIAL PAPER .....	.....	09/24/2024 .....	.....	10/09/2024	9,989,102	0	8,158
.....	DTE ELECTRIC COMPANY COMMERCIAL PAPER .....	.....	09/04/2024 .....	.....	10/10/2024	12,982,641	0	51,801
.....	DTE ELECTRIC COMPANY COMMERCIAL PAPER .....	.....	09/18/2024 .....	.....	10/25/2024	29,900,836	0	49,336
.....	DOLLAR TREE INC COMMERCIAL PAPER .....	.....	09/12/2024 .....	.....	10/10/2024	29,960,214	0	83,647
.....	DOMINION ENERGY INC COMMERCIAL PAPER .....	.....	09/26/2024 .....	.....	10/01/2024	20,000,000	0	10,911
.....	DOVER CORP COMMERCIAL PAPER .....	.....	09/26/2024 .....	.....	10/01/2024	50,000,000	0	33,889
.....	DUKE ENERGY CORP COMMERCIAL PAPER .....	.....	09/19/2024 .....	.....	10/10/2024	19,975,460	0	32,627
.....	DUKE ENERGY CORP COMMERCIAL PAPER .....	.....	09/24/2024 .....	.....	10/22/2024	24,928,327	0	23,800
.....	EIDP INC COMMERCIAL PAPER .....	.....	09/18/2024 .....	.....	12/09/2024	34,662,677	0	58,002
.....	ENBRIDGE (US) INC COMMERCIAL PAPER .....	.....	09/16/2024 .....	.....	10/02/2024	14,997,799	0	32,933
.....	ENBRIDGE (US) INC COMMERCIAL PAPER .....	.....	09/26/2024 .....	.....	10/29/2024	29,883,268	0	16,602
.....	ENTERGY CORPORATION COMMERCIAL PAPER .....	.....	09/24/2024 .....	.....	10/16/2024	14,969,221	0	14,321
.....	ENTERGY CORPORATION COMMERCIAL PAPER .....	.....	07/24/2024 .....	.....	10/24/2024	11,957,541	0	125,594
.....	EVERGY KANSAS CENTRAL INC COMMERCIAL PAP .....	.....	09/30/2024 .....	.....	10/01/2024	38,900,000	0	5,284
.....	EVERSOURCE ENERGY COMMERCIAL PAPER .....	.....	09/30/2024 .....	.....	10/09/2024	19,977,997	0	2,747
.....	EVERSOURCE ENERGY COMMERCIAL PAPER .....	.....	09/30/2024 .....	.....	10/30/2024	26,891,250	0	0
.....	EXELON CORPORATION COMMERCIAL PAPER .....	.....	09/25/2024 .....	.....	10/09/2024	46,948,676	0	38,420
.....	FORTIVE CORP COMMERCIAL PAPER .....	.....	09/05/2024 .....	.....	10/01/2024	35,000,000	0	134,983
.....	HUBBELL INCORPORATED COMMERCIAL PAPER .....	.....	09/11/2024 .....	.....	10/15/2024	44,907,004	0	119,004
.....	INTERCONTINENTAL EXCHANGE INC COMMERCIAL .....	.....	09/20/2024 .....	.....	10/10/2024	22,971,437	0	34,814

STATEMENT AS OF SEPTEMBER 30, 2024 OF THE MassMutual Ascend Life Insurance Company

SCHEDULE E - PART 2 - CASH EQUIVALENTS

Show Investments Owned End of Current Quarter

1	2	3	4	5	6	7	8	9
CUSIP	Description	Code	Date Acquired	Rate of Interest	Maturity Date	Book/Adjusted Carrying Value	Amount of Interest Due and Accrued	Amount Received During Year
	INTERCONTINENTAL EXCHANGE INC COMMERCIAL		09/30/2024		10/15/2024	6,986,523	0	961
	KEURIG DR PEPPER INC COMMERCIAL PAPER		09/23/2024		10/07/2024	42,964,845	0	46,784
	L3HARRIS TECHNOLOGIES INC COMMERCIAL PAPER		09/27/2024		10/23/2024	21,932,875	0	12,161
	MAGNA INTERNATIONAL INC COMMERCIAL PAPER		09/19/2024		10/03/2024	29,991,820	0	48,987
	MAGNA INTERNATIONAL INC COMMERCIAL PAPER		08/22/2024		10/22/2024	9,968,369	0	59,699
	MAGNA INTERNATIONAL INC COMMERCIAL PAPER		08/23/2024		10/24/2024	11,958,434	0	69,827
	MAGNA INTERNATIONAL INC COMMERCIAL PAPER		09/26/2024		10/29/2024	19,924,037	0	13,504
	MARRIOTT INTERNATIONAL INC COMMERCIAL PAPER		09/11/2024		10/03/2024	9,997,041	0	29,491
	MARRIOTT INTERNATIONAL INC COMMERCIAL PAPER		09/18/2024		10/16/2024	29,935,631	0	55,564
	MARRIOTT INTERNATIONAL INC COMMERCIAL PAPER		09/19/2024		10/21/2024	34,903,786	0	57,475
	MCCORMICK & COMPANY INCORPORATED COMMERCIAL PAPER		09/26/2024		10/07/2024	24,979,736	0	16,861
	MCCORMICK & COMPANY INCORPORATED COMMERCIAL PAPER		09/18/2024		10/15/2024	19,959,959	0	31,348
	MICROCHIP TECHNOLOGY INCORPORATED COMMERCIAL PAPER		09/30/2024		10/15/2024	5,489,539	0	746
	MICROCHIP TECHNOLOGY INCORPORATED COMMERCIAL PAPER		09/30/2024		10/24/2024	3,987,476	0	543
	MICROCHIP TECHNOLOGY INCORPORATED COMMERCIAL PAPER		09/24/2024		11/04/2024	9,753,955	0	9,426
	MICROCHIP TECHNOLOGY INCORPORATED COMMERCIAL PAPER		09/27/2024		11/08/2024	27,855,099	0	15,166
	MOHAWK INDUSTRIES INC COMMERCIAL PAPER		09/27/2024		10/18/2024	21,949,275	0	11,901
	MOHAWK INDUSTRIES INC COMMERCIAL PAPER		09/30/2024		10/28/2024	24,908,112	0	3,390
	MONDELEZ INTERNATIONAL INC COMMERCIAL PAPER		09/18/2024		10/03/2024	24,992,764	0	46,931
	MONDELEZ INTERNATIONAL INC COMMERCIAL PAPER		09/23/2024		10/22/2024	2,991,416	0	3,257
	MONDELEZ INTERNATIONAL INC COMMERCIAL PAPER		09/17/2024		10/24/2024	18,936,750	0	38,294
	MOSAIC CO/THE COMMERCIAL PAPER		09/19/2024		10/03/2024	64,982,095	0	107,220
	NEXTERA ENERGY CAPITAL HOLDINGS INC COMMERCIAL PAPER		08/22/2024		10/30/2024	30,864,589	0	184,845
	NISOURCE INC COMMERCIAL PAPER		09/26/2024		10/02/2024	41,994,255	0	35,528
	NORTHERN ILLINOIS GAS COMPANY COMMERCIAL PAPER		09/30/2024		10/30/2024	34,861,828	0	4,745
	NUTRIEN LTD COMMERCIAL PAPER		09/11/2024		10/18/2024	20,947,486	0	61,446
	NUTRIEN FINANCIAL US LLC COMMERCIAL PAPER		09/26/2024		10/30/2024	21,210,543	0	14,494
	OGE ENERGY CORPORATION COMMERCIAL PAPER		09/23/2024		10/03/2024	22,493,743	0	24,993
	OGE ENERGY CORPORATION COMMERCIAL PAPER		09/26/2024		10/09/2024	29,966,777	0	20,727
	PPG INDUSTRIES INC COMMERCIAL PAPER		09/30/2024		11/13/2024	44,735,550	0	0
	PENSKE TRUCK LEASING CO LP COMMERCIAL PAPER		07/17/2024		10/15/2024	15,965,312	0	185,712
	PUBLIC SERVICE ENTERPRISE GROUP INCORPORATED COMMERCIAL PAPER		09/25/2024		10/02/2024	48,943,333	0	33,309
	PUBLIC SERVICE ENTERPRISE GROUP INCORPORATED COMMERCIAL PAPER		09/30/2024		10/07/2024	24,979,542	0	0
	RECKITT BENCKISER TREASURY SERVICES PLC		09/09/2024		10/22/2024	45,110,996	0	138,152
	RELX INC(PRE-REINCORPORATION) COMMERCIAL PAPER		09/30/2024		10/01/2024	30,000,000	0	4,083
	RELX INC(PRE-REINCORPORATION) COMMERCIAL PAPER		09/12/2024		10/11/2024	4,992,618	0	13,965
	REPUBLIC SERVICES INC COMMERCIAL PAPER		09/20/2024		10/04/2024	69,971,666	0	103,694
	ROCKWELL AUTOMATION INC COMMERCIAL PAPER		09/09/2024		10/01/2024	24,000,000	0	77,293
	ROCKWELL AUTOMATION INC COMMERCIAL PAPER		09/30/2024		10/21/2024	25,929,213	0	3,529
	RYDER SYSTEM INC COMMERCIAL PAPER		09/25/2024		10/11/2024	39,944,955	0	32,955
	RYDER SYSTEM INC COMMERCIAL PAPER		09/30/2024		10/28/2024	14,944,305	0	2,055
	SHERWIN-WILLIAMS COMPANY (THE) COMMERCIAL PAPER		09/09/2024		10/09/2024	12,984,785	0	41,660
	SHERWIN-WILLIAMS COMPANY (THE) COMMERCIAL PAPER		09/12/2024		10/21/2024	19,942,063	0	54,730
	SOUTHERN COMPANY (THE) COMMERCIAL PAPER		09/30/2024		10/31/2024	24,896,236	0	3,444
	SOUTHERN POWER COMPANY COMMERCIAL PAPER		09/16/2024		10/16/2024	19,956,573	0	43,239
	SPIRE INC COMMERCIAL PAPER		09/10/2024		10/08/2024	14,984,464	0	46,414
	SPIRE INC COMMERCIAL PAPER		09/20/2024		10/18/2024	43,796,189	0	66,911
	SPIRE INC COMMERCIAL PAPER		09/27/2024		10/22/2024	19,941,868	0	11,035
	SYSCO CORPORATION COMMERCIAL PAPER		09/30/2024		10/01/2024	19,000,000	0	2,560
	TAMPA ELECTRIC COMPANY COMMERCIAL PAPER		09/19/2024		10/10/2024	14,981,482	0	24,620
	TAMPA ELECTRIC COMPANY COMMERCIAL PAPER		09/24/2024		10/15/2024	56,889,059	0	55,309
	VII CREDIT INC COMMERCIAL PAPER		09/10/2024		10/09/2024	24,970,464	0	77,200
	VII CREDIT INC COMMERCIAL PAPER		09/11/2024		10/10/2024	10,785,648	0	31,758
	VOLVO TREASURY NORTH AMERICA LP COMMERCIAL PAPER		09/26/2024		10/28/2024	9,963,676	0	6,698
	VULCAN MATERIALS COMPANY COMMERCIAL PAPER		09/19/2024		10/10/2024	45,443,372	0	75,285
	WPP CP LLC COMMERCIAL PAPER		09/16/2024		10/17/2024	34,915,967	0	78,415

SCHEDULE E - PART 2 - CASH EQUIVALENTS

Show Investments Owned End of Current Quarter

1	2	3	4	5	6	7	8	9
CUSIP	Description	Code	Date Acquired	Rate of Interest	Maturity Date	Book/Adjusted Carrying Value	Amount of Interest Due and Accrued	Amount Received During Year
.....	WRKCO INC COMMERCIAL PAPER .....	.....	..... 09/12/2024 .....	.....	..... 10/01/2024	 15,000,000	 0	 42,038
.....	WRKCO INC COMMERCIAL PAPER .....	.....	..... 09/24/2024 .....	.....	..... 10/18/2024	 24,941,743	 0	 23,909
.....	WISCONSIN GAS LLC COMMERCIAL PAPER .....	.....	..... 09/24/2024 .....	.....	..... 10/02/2024	 46,993,632	 0	 44,500
1019999999. Subtotal - Bonds - Industrial and Miscellaneous (Unaffiliated) - Issuer Obligations						2,800,464,390	0	4,521,502
1109999999. Total - Industrial and Miscellaneous (Unaffiliated) Bonds						2,800,464,390	0	4,521,502
1309999999. Total - Hybrid Securities						0	0	0
1509999999. Total - Parent, Subsidiaries and Affiliates Bonds						0	0	0
1909999999. Subtotal - Unaffiliated Bank Loans						0	0	0
2419999999. Total - Issuer Obligations						2,800,464,390	0	4,521,502
2429999999. Total - Residential Mortgage-Backed Securities						0	0	0
2439999999. Total - Commercial Mortgage-Backed Securities						0	0	0
2449999999. Total - Other Loan-Backed and Structured Securities						0	0	0
2459999999. Total - SVO Identified Funds						0	0	0
2469999999. Total - Affiliated Bank Loans						0	0	0
2479999999. Total - Unaffiliated Bank Loans						0	0	0
2509999999. Total Bonds						2,800,464,390	0	4,521,502
09248U-71-8	BLACKROCK LIQUIDITY FUND-EXEMPT MONEY MA .....	.....	..... 09/30/2024 .....	.....	.....	265,000,000	0	0
825252-40-6	INVESCO ADVISERS TREASURY PORT INSTL CL .....	.....	..... 09/30/2024 .....	.....	.....	11,357,421	0	17,558
8209999999. Subtotal - Exempt Money Market Mutual Funds - as Identified by the SVO						276,357,421	0	17,558
8609999999 - Total Cash Equivalents						3,076,821,811	0	4,539,060