



**Arch Capital Group Ltd.**  
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## **Financial Supplement**

### **Financial Information as of September 30, 2020**

The following financial supplement is provided to assist in your understanding of Arch Capital Group Ltd. (“Arch Capital”) and its subsidiaries (collectively, the “Company”).

This report is for informational purposes only. It should be read in conjunction with documents filed by Arch Capital with the U.S. Securities and Exchange Commission, including the most recent Annual Report on Form 10-K and the Quarterly Reports on Form 10-Q. Please refer to the Company’s website at [www.archcapgroup.com](http://www.archcapgroup.com) for further information describing Arch Capital.

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**Arch Capital Group Ltd. and Subsidiaries**  
**Table of Contents**

	<u>Page</u>
<b>I. Financial Highlights</b>	<a href="#"><u>3</u></a>
<b>II. Consolidated Financial Statements</b>	
a. Consolidated Statements of Income	<a href="#"><u>4</u></a>
b. Consolidated Balance Sheets	<a href="#"><u>5</u></a>
c. Consolidated Statements of Changes in Shareholders' Equity	<a href="#"><u>6</u></a>
d. Consolidated Statements of Cash Flows	<a href="#"><u>7</u></a>
<b>III. Segment Information</b>	
a. Overview	<a href="#"><u>8</u></a>
b. Consolidated Results	<a href="#"><u>10</u></a>
c. Insurance Segment Results	<a href="#"><u>14</u></a>
d. Reinsurance Segment Results	<a href="#"><u>16</u></a>
e. Mortgage Segment Results	<a href="#"><u>18</u></a>
f. Consolidated Results Excluding 'Other' Segment	<a href="#"><u>22</u></a>
g. Selected Information on Losses and Loss Adjustment Expenses	<a href="#"><u>23</u></a>
<b>IV. Investment Information</b>	
a. Investable Asset Summary and Investment Portfolio Metrics	<a href="#"><u>24</u></a>
b. Composition of Net Investment Income, Yield and Total Return	<a href="#"><u>25</u></a>
c. Composition of Fixed Maturities	<a href="#"><u>26</u></a>
d. Credit Quality Distribution and Maturity Profile	<a href="#"><u>27</u></a>
e. Analysis of Corporate Exposures	<a href="#"><u>28</u></a>
f. Structured Securities	<a href="#"><u>29</u></a>
<b>V. Other</b>	
a. Comments on Regulation G	<a href="#"><u>30</u></a>
b. Operating Income Reconciliation and Annualized Operating Return on Average Common Equity	<a href="#"><u>31</u></a>
c. Operating Income and Effective Tax Rate Calculations	<a href="#"><u>32</u></a>
d. Capital Structure and Share Repurchase Activity	<a href="#"><u>33</u></a>

**Arch Capital Group Ltd. and Subsidiaries**  
**Basis of Presentation**

**Basis of Presentation**

All financial information contained herein is unaudited, however, certain information relating to the consolidated balance sheet at December 31, 2019 is derived from or agrees to audited financial information. Unless otherwise noted, all data is in thousands, except for share and per share amounts and ratio information.

In March 2014, the Company invested \$100.0 million to acquire common equity and a warrant to purchase additional common equity of Watford Holdings Ltd. In accordance with GAAP, the Company consolidates the results of Watford Holdings Ltd. (“Watford”) in its financial statements, although it only owns approximately 13% of Watford’s outstanding common equity at September 30, 2020. Watford is considered a variable interest entity and the Company concluded that it is the primary beneficiary of Watford. **As such, 100% of the results of Watford are included in the Company’s consolidated financial statements.** The portion of Watford’s earnings owned by third parties is recorded in the consolidated statements of income as ‘amounts attributable to noncontrolling interests.’ In addition, the Company reflects Watford’s redeemable preference shares in the mezzanine section of the Company’s consolidated balance sheets as ‘redeemable noncontrolling interests’ because they have redemption features that are not solely within the control of Watford.

**Cautionary Note Regarding Forward-Looking Statements**

The Private Securities Litigation Reform Act of 1995 provides a “safe harbor” for forward-looking statements. This release or any other written or oral statements made by or on behalf of Arch Capital and its subsidiaries may include forward-looking statements, which reflect the Company’s current views with respect to future events and financial performance. All statements other than statements of historical fact included in or incorporated by reference in this release are forward-looking statements.

Forward-looking statements can generally be identified by the use of forward-looking terminology such as “may,” “will,” “expect,” “intend,” “estimate,” “anticipate,” “believe” or “continue” or their negative or variations or similar terminology. Forward-looking statements involve the Company’s current assessment of risks and uncertainties. Actual events and results may differ materially from those expressed or implied in these statements. A non-exclusive list of the important factors that could cause actual results to differ materially from those in such forward-looking statements includes the following: adverse general economic and market conditions; increased competition; pricing and policy term trends; fluctuations in the actions of rating agencies and the Company’s ability to maintain and improve the Company’s ratings; investment performance; the loss of key personnel; the adequacy of the Company’s loss reserves, severity and/or frequency of losses, greater than expected loss ratios and adverse development on claim and/or claim expense liabilities; greater frequency or severity of unpredictable natural and man-made catastrophic events; including pandemics such as COVID-19; the impact of acts of terrorism and acts of war; changes in regulations and/or tax laws in the United States or elsewhere; the Company’s ability to successfully integrate, establish and maintain operating procedures as well as integrate the businesses we have acquired or may acquire into the existing operations; changes in accounting principles or policies; material differences between actual and expected assessments for guaranty funds and mandatory pooling arrangements; availability and cost to the Company of reinsurance to manage gross and net exposures; the failure of others to meet their obligations to the Company; changes in the method for determining the London Inter-bank Offered Rate (“LIBOR”) and the potential replacement of LIBOR and other factors identified in the Company’s filings with the U.S. Securities and Exchange Commission.

The foregoing review of important factors should not be construed as exhaustive and should be read in conjunction with other cautionary statements that are included herein or elsewhere. All subsequent written and oral forward-looking statements attributable to the Company or persons acting on the Company’s behalf are expressly qualified in their entirety by these cautionary statements. The Company undertakes no obligation to publicly update or revise any forward-looking statement, whether as a result of new information, future events or otherwise.

**Arch Capital Group Ltd. and Subsidiaries**  
**Financial Highlights**

The following table presents financial highlights (1):

(U.S. Dollars in thousands, except share data)

	Three Months Ended			Nine Months Ended		
	September 30,			September 30,		
	2020	2019	Change	2020	2019	Change
<b>Underwriting results:</b>						
Gross premiums written	\$ 2,556,914	\$ 2,043,292	25.1 %	\$ 7,461,860	\$ 5,853,574	27.5 %
Net premiums written	1,726,828	1,457,705	18.5 %	5,239,829	4,163,105	25.9 %
Net premiums earned	1,625,061	1,312,191	23.8 %	4,763,285	3,847,372	23.8 %
Underwriting income (loss) (2)	104,877	235,705	(55.5)%	251,527	798,958	(68.5)%
Loss ratio	67.7 %	53.8 %	13.9	67.8 %	51.2 %	16.6
Acquisition expense ratio	13.8 %	14.3 %	(0.5)	14.3 %	14.0 %	0.3
Other operating expense ratio	12.4 %	14.1 %	(1.7)	13.0 %	14.5 %	(1.5)
Combined ratio	93.9 %	82.2 %	11.7	95.1 %	79.7 %	15.4
Net investment income	\$ 99,857	\$ 126,874	(21.3)%	\$ 313,916	\$ 371,161	(15.4)%
<i>Per diluted share</i>	\$ 0.24	\$ 0.31	(22.6)%	\$ 0.77	\$ 0.90	(14.4)%
Net income available to Arch common shareholders	\$ 408,636	\$ 382,050	7.0 %	\$ 830,768	\$ 1,278,726	(35.0)%
<i>Per diluted share</i>	\$ 1.00	\$ 0.92	8.7 %	\$ 2.02	\$ 3.11	(35.0)%
After-tax operating income available to Arch common shareholders (2)	\$ 120,321	\$ 260,952	(53.9)%	\$ 326,691	\$ 854,282	(61.8)%
<i>Per diluted share</i>	\$ 0.29	\$ 0.63	(54.0)%	\$ 0.80	\$ 2.08	(61.5)%
Comprehensive income (loss) available to Arch	\$ 455,907	\$ 397,340	14.7 %	\$ 1,036,243	\$ 1,700,369	(39.1)%
Net cash provided by operating activities	\$ 963,654	\$ 769,486	25.2 %	\$ 2,198,037	\$ 1,366,762	60.8 %
Weighted average common shares and common share equivalents outstanding — diluted	409,194,657	413,180,201	(1.0)%	410,314,897	410,807,402	(0.1)%
<b>Financial measures:</b>						
Change in book value per common share during period	4.1 %	3.9 %	0.2	8.8 %	19.0 %	(10.2)
Annualized return on average common equity	14.3 %	15.0 %	(0.7)	9.9 %	17.9 %	(8.0)
Annualized operating return on average common equity (2)	4.2 %	10.3 %	(6.1)	3.9 %	12.0 %	(8.1)
Total return on investments (3)	2.30 %	1.00 %	130 bps	5.19 %	6.20 %	-101 bps

- (1) Presented on a 'core' basis which excludes amounts related to the 'other' segment (*i.e.*, results of Watford). See 'Comments on Regulation G' for a further discussion of the presentation of 'core' results.
- (2) See 'Comments on Regulation G' for a further discussion of consolidated underwriting income or loss, after-tax operating income or loss available to Arch common shareholders and annualized operating return on average common equity.
- (3) Total return on investments includes net investment income, equity in net income (loss) of investment funds accounted for using the equity method, net realized gains and losses and the change in unrealized gains and losses and is calculated on a pre-tax basis and before investment expenses. See 'Comments on Regulation G' for a further discussion of the presentation of total return on investments.

**Arch Capital Group Ltd. and Subsidiaries**  
**Consolidated Statements of Income**

(U.S. Dollars in thousands, except share data)

	Three Months Ended				Nine Months Ended		
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
<b>Revenues</b>							
Net premiums written	\$ 1,874,144	\$ 1,668,311	\$ 2,137,246	\$ 1,455,453	\$ 1,613,457	\$ 5,679,701	\$ 4,583,614
Change in unearned premiums	(103,052)	(2,957)	(392,802)	60,429	(175,434)	(498,811)	(312,998)
Net premiums earned	1,771,092	1,665,354	1,744,444	1,515,882	1,438,023	5,180,890	4,270,616
Net investment income	128,512	131,485	145,153	154,263	161,488	405,150	473,475
Net realized gains (losses)	280,499	556,588	(366,960)	40,830	61,355	470,127	322,368
Other underwriting income	5,413	6,667	6,852	6,757	3,326	18,932	18,104
Equity in net income (loss) of investment funds accounted for using the equity method	126,735	(65,119)	(4,209)	27,139	17,130	57,407	96,533
Other income (loss)	919	(3,140)	8,548	(1,317)	1,338	6,327	3,550
<b>Total revenues</b>	<b>2,313,170</b>	<b>2,291,835</b>	<b>1,533,828</b>	<b>1,743,554</b>	<b>1,682,660</b>	<b>6,138,833</b>	<b>5,184,646</b>
<b>Expenses</b>							
Losses and loss adjustment expenses	(1,216,273)	(1,230,522)	(1,115,419)	(844,922)	(802,455)	(3,562,214)	(2,288,530)
Acquisition expenses	(247,942)	(254,789)	(247,283)	(221,888)	(211,120)	(750,014)	(619,057)
Other operating expenses	(215,686)	(209,249)	(234,544)	(204,408)	(196,512)	(659,479)	(596,589)
Corporate expenses	(17,937)	(17,920)	(20,796)	(26,837)	(17,061)	(56,653)	(53,274)
Amortization of intangible assets	(16,715)	(16,489)	(16,631)	(21,890)	(20,003)	(49,835)	(60,214)
Interest expense	(41,343)	(31,139)	(32,555)	(31,199)	(31,328)	(105,037)	(89,673)
Net foreign exchange gains (losses)	(44,885)	(39,211)	72,671	(52,306)	33,124	(11,425)	31,697
<b>Total expenses</b>	<b>(1,800,781)</b>	<b>(1,799,319)</b>	<b>(1,594,557)</b>	<b>(1,403,450)</b>	<b>(1,245,355)</b>	<b>(5,194,657)</b>	<b>(3,675,640)</b>
<b>Income (loss) before income taxes</b>	<b>512,389</b>	<b>492,516</b>	<b>(60,729)</b>	<b>340,104</b>	<b>437,305</b>	<b>944,176</b>	<b>1,509,006</b>
Income tax expense	(23,707)	(26,127)	(27,945)	(27,336)	(38,116)	(77,779)	(128,474)
<b>Net income (loss)</b>	<b>488,682</b>	<b>466,389</b>	<b>(88,674)</b>	<b>312,768</b>	<b>399,189</b>	<b>866,397</b>	<b>1,380,532</b>
Net (income) loss attributable to noncontrolling interests	(69,643)	(167,568)	232,791	13,616	(6,736)	(4,420)	(70,597)
<b>Net income (loss) attributable to Arch</b>	<b>419,039</b>	<b>298,821</b>	<b>144,117</b>	<b>326,384</b>	<b>392,453</b>	<b>861,977</b>	<b>1,309,935</b>
Preferred dividends	(10,403)	(10,403)	(10,403)	(10,403)	(10,403)	(31,209)	(31,209)
<b>Net income (loss) available to Arch common shareholders</b>	<b>\$ 408,636</b>	<b>\$ 288,418</b>	<b>\$ 133,714</b>	<b>\$ 315,981</b>	<b>\$ 382,050</b>	<b>\$ 830,768</b>	<b>\$ 1,278,726</b>
<b>Comprehensive income (loss) available to Arch</b>	<b>\$ 455,907</b>	<b>\$ 626,366</b>	<b>\$ (46,030)</b>	<b>\$ 326,760</b>	<b>\$ 397,340</b>	<b>\$ 1,036,243</b>	<b>\$ 1,700,369</b>
<b>Net income (loss) per common share and common share equivalent</b>							
Basic	\$ 1.01	\$ 0.72	\$ 0.33	\$ 0.78	\$ 0.95	\$ 2.06	\$ 3.19
Diluted	\$ 1.00	\$ 0.71	\$ 0.32	\$ 0.76	\$ 0.92	\$ 2.02	\$ 3.11
<b>Weighted average common shares and common share equivalents outstanding</b>							
Basic	402,850,485	402,503,687	403,892,161	402,941,290	402,564,121	403,081,266	401,419,153
Diluted	409,194,657	408,119,681	414,033,570	414,124,920	413,180,201	410,314,897	410,807,402

**Arch Capital Group Ltd. and Subsidiaries**  
**Consolidated Balance Sheets**

(U.S. Dollars in thousands, except share data)

	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019
<b>Assets</b>					
Investments:					
Fixed maturities available for sale, at fair value	\$ 18,452,888	\$ 17,207,731	\$ 16,841,571	\$ 16,894,526	\$ 16,470,523
Short-term investments available for sale, at fair value	2,039,097	2,277,866	944,531	956,546	751,989
Collateral received under securities lending, at fair value	64,259	473,790	182,284	388,376	430,263
Equity securities, at fair value	1,502,015	1,257,317	1,181,903	838,925	550,485
Investments accounted for using the fair value option	3,749,575	3,520,771	3,310,517	3,663,477	3,838,243
Investments accounted for using the equity method	1,883,702	1,727,302	1,676,055	1,660,396	1,575,832
<b>Total investments</b>	<b>27,691,536</b>	<b>26,464,777</b>	<b>24,136,861</b>	<b>24,402,246</b>	<b>23,617,335</b>
Cash	976,398	854,259	882,284	726,230	880,099
Accrued investment income	106,940	102,064	118,089	117,937	116,196
Securities pledged under securities lending, at fair value	62,749	464,503	177,442	379,868	420,415
Premiums receivable	2,225,311	2,203,753	2,155,204	1,778,717	1,618,186
Reinsurance recoverable on unpaid and paid losses and loss adjustment expenses	4,621,937	4,363,507	4,303,135	4,346,816	3,168,195
Contractholder receivables	2,185,614	2,179,124	2,140,724	2,119,460	2,094,683
Ceded unearned premiums	1,450,200	1,364,603	1,357,284	1,234,683	1,168,258
Deferred acquisition costs	750,901	714,531	708,848	633,400	622,028
Receivable for securities sold	158,674	167,281	221,573	24,133	50,615
Goodwill and intangible assets	713,777	688,490	705,450	738,083	624,500
Other assets	1,771,998	1,632,756	1,509,232	1,383,788	1,192,093
<b>Total assets</b>	<b>\$ 42,716,035</b>	<b>\$ 41,199,648</b>	<b>\$ 38,416,126</b>	<b>\$ 37,885,361</b>	<b>\$ 35,572,603</b>
<b>Liabilities</b>					
Reserve for losses and loss adjustment expenses	\$ 15,900,526	\$ 15,044,874	\$ 14,309,580	\$ 13,891,842	\$ 12,389,384
Unearned premiums	5,062,052	4,827,445	4,817,191	4,339,549	4,243,372
Reinsurance balances payable	873,067	793,467	737,597	667,072	601,891
Contractholder payables	2,191,515	2,185,414	2,149,762	2,119,460	2,094,683
Collateral held for insured obligations	221,957	208,449	211,597	206,698	205,449
Senior notes	2,860,811	2,860,733	1,871,869	1,871,626	1,871,386
Revolving credit agreement borrowings	210,687	335,587	500,587	484,287	490,720
Securities lending payable	64,251	473,783	182,274	388,366	430,255
Payable for securities purchased	382,236	275,257	327,359	87,579	176,130
Other liabilities	1,681,181	1,467,739	1,392,905	1,513,330	1,007,524
<b>Total liabilities</b>	<b>29,448,283</b>	<b>28,472,748</b>	<b>26,500,721</b>	<b>25,569,809</b>	<b>23,510,794</b>
<b>Redeemable noncontrolling interests</b>	<b>57,835</b>	<b>55,986</b>	<b>55,376</b>	<b>55,404</b>	<b>48,789</b>
<b>Shareholders' equity</b>					
Non-cumulative preferred shares	780,000	780,000	780,000	780,000	780,000
Common shares	642	642	642	638	638
Additional paid-in capital	1,950,782	1,935,514	1,921,487	1,889,683	1,864,468
Retained earnings	11,829,322	11,420,686	11,132,268	11,021,006	10,705,025
Accumulated other comprehensive income (loss), net of deferred income tax	386,357	349,488	21,944	212,091	211,714
Common shares held in treasury, at cost	(2,495,106)	(2,494,505)	(2,489,097)	(2,406,047)	(2,403,749)
<b>Total shareholders' equity available to Arch</b>	<b>12,451,997</b>	<b>11,991,825</b>	<b>11,367,244</b>	<b>11,497,371</b>	<b>11,158,096</b>
Non-redeemable noncontrolling interests	757,920	679,089	492,785	762,777	854,924
<b>Total shareholders' equity</b>	<b>13,209,917</b>	<b>12,670,914</b>	<b>11,860,029</b>	<b>12,260,148</b>	<b>12,013,020</b>
<b>Total liabilities, noncontrolling interests and shareholders' equity</b>	<b>\$ 42,716,035</b>	<b>\$ 41,199,648</b>	<b>\$ 38,416,126</b>	<b>\$ 37,885,361</b>	<b>\$ 35,572,603</b>
Common shares and common share equivalents outstanding, net of treasury shares	406,018,958	405,970,251	405,609,867	405,619,201	405,230,531
Book value per common share (1)	\$ 28.75	\$ 27.62	\$ 26.10	\$ 26.42	\$ 25.61

(1) Excludes the effects of stock options and restricted stock units outstanding.

**Arch Capital Group Ltd. and Subsidiaries**  
**Consolidated Statements of Changes in Shareholders' Equity**

(U.S. Dollars in thousands)

	Three Months Ended				Nine Months Ended		
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
<b>Non-cumulative preferred shares</b>							
Balance at beginning and end of period	\$ 780,000	\$ 780,000	\$ 780,000	\$ 780,000	\$ 780,000	\$ 780,000	\$ 780,000
<b>Common shares</b>							
Balance at beginning of period	642	642	638	638	638	638	634
Common shares issued, net	—	—	4	—	—	4	4
Balance at end of period	642	642	642	638	638	642	638
<b>Additional paid-in capital</b>							
Balance at beginning of period	1,935,514	1,921,487	1,889,683	1,864,468	1,847,949	1,889,683	1,793,781
Amortization of share-based compensation	14,662	13,160	28,050	11,862	12,775	55,872	52,290
All other	606	867	3,754	13,353	3,744	5,227	18,397
Balance at end of period	1,950,782	1,935,514	1,921,487	1,889,683	1,864,468	1,950,782	1,864,468
<b>Retained earnings</b>							
Balance at beginning of period	11,420,686	11,132,268	11,021,006	10,705,025	10,322,975	11,021,006	9,426,299
Cumulative effect of an accounting change (1)	—	—	(22,452)	—	—	(22,452)	—
Balance at beginning of period, as adjusted	11,420,686	11,132,268	10,998,554	10,705,025	10,322,975	10,998,554	9,426,299
Net income	488,682	466,389	(88,674)	312,768	399,189	866,397	1,380,532
Amounts attributable to noncontrolling interests	(69,643)	(167,568)	232,791	13,616	(6,736)	(4,420)	(70,597)
Preferred share dividends	(10,403)	(10,403)	(10,403)	(10,403)	(10,403)	(31,209)	(31,209)
Balance at end of period	11,829,322	11,420,686	11,132,268	11,021,006	10,705,025	11,829,322	10,705,025
<b>Accumulated other comprehensive income (loss), net of deferred income tax</b>							
Balance at beginning of period	349,488	21,944	212,091	211,714	206,827	212,091	(178,720)
Change in unrealized appreciation (decline) in value of available-for-sale investments	19,800	305,338	(145,337)	(24,707)	21,566	179,801	397,371
Change in foreign currency translation adjustments	17,069	22,206	(44,810)	25,084	(16,679)	(5,535)	(6,937)
Balance at end of period	386,357	349,488	21,944	212,091	211,714	386,357	211,714
<b>Common shares held in treasury, at cost</b>							
Balance at beginning of period	(2,494,505)	(2,489,097)	(2,406,047)	(2,403,749)	(2,401,037)	(2,406,047)	(2,382,167)
Shares repurchased for treasury	(601)	(5,408)	(83,050)	(2,298)	(2,712)	(89,059)	(21,582)
Balance at end of period	(2,495,106)	(2,494,505)	(2,489,097)	(2,406,047)	(2,403,749)	(2,495,106)	(2,403,749)
<b>Total shareholders' equity available to Arch</b>	<b>12,451,997</b>	<b>11,991,825</b>	<b>11,367,244</b>	<b>11,497,371</b>	<b>11,158,096</b>	<b>12,451,997</b>	<b>11,158,096</b>
Non-redeemable noncontrolling interests	757,920	679,089	492,785	762,777	854,924	757,920	854,924
<b>Total shareholders' equity</b>	<b>\$ 13,209,917</b>	<b>\$ 12,670,914</b>	<b>\$ 11,860,029</b>	<b>\$ 12,260,148</b>	<b>\$ 12,013,020</b>	<b>\$ 13,209,917</b>	<b>\$ 12,013,020</b>

(1) Adoption of ASU 2016-13, "Financial Instruments - Credit Losses (Topic 326)."

**Arch Capital Group Ltd. and Subsidiaries**  
**Consolidated Statements of Cash Flows**

(U.S. Dollars in thousands)

	Three Months Ended				Nine Months Ended		
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
<b>Operating Activities</b>							
Net income (loss)	\$ 488,682	\$ 466,389	\$ (88,674)	\$ 312,768	\$ 399,189	\$ 866,397	\$ 1,380,532
Adjustments to reconcile net income to net cash provided by operating activities:							
Net realized (gains) losses	(282,907)	(557,740)	362,964	(51,435)	(63,597)	(477,683)	(326,532)
Equity in net income or loss of investment funds accounted for using the equity method and other income or loss	(95,078)	96,350	29,034	24,899	6,808	30,306	(38,912)
Amortization of intangible assets	16,715	16,489	16,631	21,890	20,003	49,835	60,214
Share-based compensation	14,521	13,363	28,549	11,985	12,895	56,433	54,432
Changes in:							
Reserve for losses and loss adjustment expenses, net	509,623	652,389	506,057	112,907	222,678	1,668,069	377,074
Unearned premiums, net	103,052	2,957	392,802	(60,429)	175,434	498,811	312,998
Premiums receivable	1,872	(45,181)	(418,457)	91,013	(26,715)	(461,766)	(328,765)
Deferred acquisition costs	(14,801)	(17,302)	(75,135)	(8,654)	(13,816)	(107,238)	(38,606)
Reinsurance balances payable	73,459	52,354	79,807	(32,770)	75,487	205,620	214,902
Other items, net	194,732	31,058	(223,124)	83,146	22,249	2,666	(124,198)
Net cash provided by operating activities	<u>1,009,870</u>	<u>711,126</u>	<u>610,454</u>	<u>505,320</u>	<u>830,615</u>	<u>2,331,450</u>	<u>1,543,139</u>
<b>Investing Activities</b>							
Purchases of fixed maturity investments	(8,640,034)	(13,444,854)	(11,965,995)	(6,043,154)	(7,677,977)	(34,050,883)	(24,010,623)
Purchases of equity securities	(330,699)	(264,466)	(760,683)	(287,916)	(92,112)	(1,355,848)	(524,051)
Purchases of other investments	(340,194)	(273,221)	(228,471)	(455,620)	(337,862)	(841,886)	(1,014,925)
Proceeds from sales of fixed maturity investments	7,711,837	13,109,907	11,723,123	5,888,011	7,075,372	32,544,867	22,707,854
Proceeds from sales of equity securities	151,447	314,045	266,301	58,688	194,429	731,793	371,130
Proceeds from sales, redemptions and maturities of other investments	319,619	256,057	216,131	382,042	292,819	791,807	827,517
Proceeds from redemptions and maturities of fixed maturity investments	276,052	170,884	198,356	248,546	149,770	645,292	394,719
Net settlements of derivative instruments	12,819	(45,017)	195,488	(32,441)	4,722	163,290	92,423
Net (purchases) sales of short-term investments	164,012	(1,311,586)	(11,777)	(89,245)	(72,442)	(1,159,351)	129,078
Change in cash collateral related to securities lending	26,614	(405)	55,001	(69,183)	(600)	81,210	6,990
Purchases of fixed assets	(9,030)	(9,217)	(8,470)	(10,202)	(11,276)	(26,717)	(27,635)
Other	(140,671)	(33,821)	42,500	(145,533)	(28,375)	(131,992)	(202,953)
Net cash provided by (used for) investing activities	<u>(798,228)</u>	<u>(1,531,694)</u>	<u>(278,496)</u>	<u>(556,007)</u>	<u>(503,532)</u>	<u>(2,608,418)</u>	<u>(1,250,476)</u>
<b>Financing Activities</b>							
Purchases of common shares under share repurchase program	—	—	(75,486)	—	—	(75,486)	(2,871)
Proceeds from common shares issued, net	5	(5,134)	(4,527)	5,685	1,075	(9,656)	518
Proceeds from borrowings	13,875	988,618	16,300	—	137,283	1,018,793	200,083
Repayments of borrowings	(139,000)	(165,000)	—	(21,644)	—	(304,000)	(27,538)
Change in cash collateral related to securities lending	(26,614)	405	(55,001)	69,183	600	(81,210)	(6,990)
Change in third party investment in non-redeemable noncontrolling interests	—	—	(2,867)	(75,056)	—	(2,867)	—
Change in third party investment in redeemable noncontrolling interests	—	—	—	(8)	(161,874)	—	(161,874)
Dividends paid to redeemable noncontrolling interests	(1,001)	(1,359)	(1,181)	(1,107)	(2,414)	(3,541)	(11,408)
Other	57,891	(1,294)	(1,331)	(816)	(1,678)	55,266	(5,207)
Preferred dividends paid	(10,403)	(10,403)	(10,403)	(10,403)	(10,403)	(31,209)	(31,209)
Net cash provided by (used for) financing activities	<u>(105,247)</u>	<u>805,833</u>	<u>(134,496)</u>	<u>(34,166)</u>	<u>(37,411)</u>	<u>566,090</u>	<u>(46,496)</u>
Effects of exchange rate changes on foreign currency cash and restricted cash	15,895	8,981	(30,723)	26,076	(10,272)	(5,847)	(8,335)
Increase (decrease) in cash and restricted cash	122,290	(5,754)	166,739	(58,777)	279,400	283,275	237,832
Cash and restricted cash, beginning of period	1,064,683	1,070,437	903,698	962,475	683,075	903,698	724,643
Cash and restricted cash, end of period	<u>\$ 1,186,973</u>	<u>\$ 1,064,683</u>	<u>\$ 1,070,437</u>	<u>\$ 903,698</u>	<u>\$ 962,475</u>	<u>\$ 1,186,973</u>	<u>\$ 962,475</u>
Income taxes paid (received)	\$ 136,404	\$ 3,023	\$ 7,387	\$ 62,398	\$ 3,565	\$ 146,814	\$ 47,065
Interest paid	\$ 3,141	\$ 50,767	\$ 6,647	\$ 58,385	\$ 7,702	\$ 60,555	\$ 68,560
Net cash provided by operating activities, excluding the 'other' segment	\$ 963,654	\$ 648,427	\$ 585,956	\$ 443,298	\$ 769,486	\$ 2,198,037	\$ 1,366,762



## Arch Capital Group Ltd. and Subsidiaries Segment Information — Overview

The Company classifies its businesses into three underwriting segments — insurance, reinsurance and mortgage — and two other operating segments — ‘other’ and corporate (non-underwriting). The Company’s Insurance, Reinsurance and Mortgage segments each have managers who are responsible for the overall profitability of their respective segments and who are directly accountable to the Company’s chief operating decision makers, the President and Chief Executive Officer of Arch Capital and the Chief Financial Officer of Arch Capital. The chief operating decision makers do not assess performance, measure return on equity or make resource allocation decisions on a line of business basis. Management measures segment performance for its three core underwriting segments based on underwriting income or loss. The Company does not manage its assets by underwriting segment and, accordingly, investment income is not allocated to each underwriting segment.

The Company determined its reportable operating segments using the management approach described in accounting guidance regarding disclosures about segments of an enterprise and related information. The accounting policies of the segments are the same as those used for the preparation of the Company’s consolidated financial statements. Intersegment business is allocated to the segment accountable for the underwriting results.

### Insurance Segment

The insurance segment consists of the Company’s insurance underwriting units which offer specialty product lines on a worldwide basis. Product lines include:

- *Construction and national accounts*: primary and excess casualty coverages to middle and large accounts in the construction industry and a wide range of products for middle and large national accounts, specializing in loss sensitive primary casualty insurance programs (including large deductible, self-insured retention and retrospectively rated programs).
- *Excess and surplus casualty*: primary and excess casualty insurance coverages, including middle market energy business, and contract binding, which primarily provides casualty coverage through a network of appointed agents to small and medium risks.
- *Lenders products*: collateral protection, debt cancellation and service contract reimbursement products to banks, credit unions, automotive dealerships and original equipment manufacturers and other specialty programs that pertain to automotive lending and leasing.
- *Professional lines*: directors’ and officers’ liability, errors and omissions liability, employment practices liability, fiduciary liability, crime, professional indemnity and other financial related coverages for corporate, private equity, venture capital, real estate investment trust, limited partnership, financial institution and not-for-profit clients of all sizes and medical professional and general liability insurance coverages for the healthcare industry. The business is predominately written on a claims-made basis.
- *Programs*: primarily package policies, underwriting workers’ compensation and umbrella liability business in support of desirable package programs, targeting program managers with unique expertise and niche products offering general liability, commercial automobile, inland marine and property business with minimal catastrophe exposure.
- *Property, energy, marine and aviation*: primary and excess general property insurance coverages, including catastrophe-exposed property coverage, for commercial clients. Coverages for marine include hull, war, specie and liability. Aviation and stand alone terrorism are also offered.
- *Travel, accident and health*: specialty travel and accident and related insurance products for individual, group travelers, travel agents and suppliers, as well as accident and health, which provides accident, disability and medical plan insurance coverages for employer groups, medical plan members, students and other participant groups.
- *Other*: includes alternative market risks (including captive insurance programs), excess workers’ compensation and employer’s liability insurance coverages for qualified self-insured groups, associations and trusts, and contract and commercial surety coverages, including contract bonds (payment and performance bonds) primarily for medium and large contractors and commercial surety bonds for Fortune 1,000 companies and smaller transaction business programs.

## Arch Capital Group Ltd. and Subsidiaries Segment Information — Overview

### Reinsurance Segment

The reinsurance segment consists of the Company's reinsurance underwriting units which offer specialty product lines on a worldwide basis. Product lines include:

- *Casualty*: provides coverage to ceding company clients on third party liability and workers' compensation exposures from ceding company clients, primarily on a treaty basis. Exposures include, among others, executive assurance, professional liability, workers' compensation, excess and umbrella liability, excess motor and healthcare business.
- *Marine and aviation*: provides coverage for energy, hull, cargo, specie, liability and transit, and aviation business, including airline and general aviation risks. Business written may also include space business, which includes coverages for satellite assembly, launch and operation for commercial space programs.
- *Other specialty*: provides coverage to ceding company clients for proportional motor and other lines including surety, accident and health, workers' compensation catastrophe, agriculture, trade credit and political risk.
- *Property catastrophe*: provides protection for most catastrophic losses that are covered in the underlying policies written by reinsureds, including hurricane, earthquake, flood, tornado, hail and fire, and coverage for other perils on a case-by-case basis. Property catastrophe reinsurance provides coverage on an excess of loss basis when aggregate losses and loss adjustment expense from a single occurrence of a covered peril exceed the retention specified in the contract.
- *Property excluding property catastrophe*: provides coverage for both personal lines and commercial property exposures and principally covers buildings, structures, equipment and contents. The primary perils in this business include fire, explosion, collapse, riot, vandalism, wind, tornado, flood and earthquake. Business is assumed on both a proportional and excess of loss basis. In addition, facultative business is written which focuses on commercial property risks on an excess of loss basis.
- *Other*: includes life reinsurance business on both a proportional and non-proportional basis, casualty clash business and, in limited instances, non-traditional business which is intended to provide insurers with risk management solutions that complement traditional reinsurance.

### Mortgage Segment

The mortgage segment includes the Company's U.S. and international mortgage insurance and reinsurance operations as well as government sponsored enterprise ("GSE") credit-risk sharing transactions. Arch Mortgage Insurance Company and United Guaranty Residential Insurance Company (combined "Arch MI U.S.") are approved as eligible mortgage insurers by Fannie Mae and Freddie Mac.

### Corporate (Non-Underwriting) Segment

The corporate (non-underwriting) segment results include net investment income, other income (loss), corporate expenses, transaction costs and other, amortization of intangible assets, interest expense, items related to the Company's non-cumulative preferred shares, net realized gains or losses, equity in net income or loss of investment funds accounted for using the equity method, net foreign exchange gains or losses and income taxes. Such amounts exclude the results of the 'other' segment.

### Other Segment

The 'other' segment includes the results of Watford. Subsidiaries of the Company act as Watford's reinsurance and insurance underwriting managers while HPS Investment Partners, LLC manages Watford's non-investment grade credit portfolios and the Company manages Watford's investment grade portfolios, all under long term services agreements. Pursuant to generally accepted accounting principles, Watford is considered a variable interest entity and the Company concluded that it is the primary beneficiary of Watford. As such, the Company consolidates the results of Watford in its consolidated financial statements, although it only owns approximately 13% of Watford's common equity (listed on the Nasdaq Select Global Market under the ticker symbol "WTRE"). Watford has its own management and board of directors that is responsible for its own results and profitability. The portion of Watford's earnings attributable to third party investors is recorded in the consolidated statements of income as 'amounts attributable to noncontrolling interests.' Management measures segment performance for the 'other' segment based on net income or loss.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information**

(U.S. Dollars in thousands)

Three Months Ended  
September 30, 2020

	Insurance	Reinsurance	Mortgage	Sub-total (Core)	Other	Total
Gross premiums written (1)	\$ 1,206,328	\$ 1,004,590	\$ 346,248	\$ 2,556,914	\$ 197,480	\$ 2,681,032
Premiums ceded	(382,167)	(400,388)	(47,783)	(830,086)	(50,164)	(806,888)
Net premiums written	824,161	604,202	298,465	1,726,828	147,316	1,874,144
Change in unearned premiums	(105,007)	(49,704)	52,944	(101,767)	(1,285)	(103,052)
Net premiums earned	719,154	554,498	351,409	1,625,061	146,031	1,771,092
Other underwriting income (loss)	(31)	298	4,600	4,867	546	5,413
Losses and loss adjustment expenses	(525,321)	(422,084)	(153,055)	(1,100,460)	(115,813)	(1,216,273)
Acquisition expenses	(102,420)	(85,388)	(35,716)	(223,524)	(24,418)	(247,942)
Other operating expenses	(122,541)	(41,818)	(36,708)	(201,067)	(14,619)	(215,686)
<b>Underwriting income (loss)</b>	<b>\$ (31,159)</b>	<b>\$ 5,506</b>	<b>\$ 130,530</b>	<b>104,877</b>	<b>(8,273)</b>	<b>96,604</b>
Net investment income				99,857	28,655	128,512
Net realized gains (losses)				210,984	69,515	280,499
Equity in net income (loss) of investment funds accounted for using the equity method				126,735	—	126,735
Other income				919	—	919
Corporate expenses (2)				(16,263)	—	(16,263)
Transaction costs and other (2)				(1,674)	—	(1,674)
Amortization of intangible assets				(16,715)	—	(16,715)
Interest expense				(36,224)	(5,119)	(41,343)
Net foreign exchange gains (losses)				(38,681)	(6,204)	(44,885)
<b>Income (loss) before income taxes</b>				<b>433,815</b>	<b>78,574</b>	<b>512,389</b>
Income tax (expense) benefit				(23,638)	(69)	(23,707)
<b>Net income (loss)</b>				<b>410,177</b>	<b>78,505</b>	<b>488,682</b>
Dividends attributable to redeemable noncontrolling interests				(882)	(993)	(1,875)
Amounts attributable to nonredeemable noncontrolling interests				—	(67,768)	(67,768)
<b>Net income (loss) available to Arch</b>				<b>409,295</b>	<b>9,744</b>	<b>419,039</b>
Preferred dividends				(10,403)	—	(10,403)
<b>Net income (loss) available to Arch common shareholders</b>				<b>\$ 398,892</b>	<b>\$ 9,744</b>	<b>\$ 408,636</b>
<b>Underwriting Ratios</b>						
Loss ratio	73.0 %	76.1 %	43.6 %	67.7 %	79.3 %	68.7 %
Acquisition expense ratio	14.2 %	15.4 %	10.2 %	13.8 %	16.7 %	14.0 %
Other operating expense ratio	17.0 %	7.5 %	10.4 %	12.4 %	10.0 %	12.2 %
Combined ratio	104.2 %	99.0 %	64.2 %	93.9 %	106.0 %	94.9 %
Net premiums written to gross premiums written	68.3 %	60.1 %	86.2 %	67.5 %	74.6 %	69.9 %
Total investable assets				\$ 25,724,501	\$ 2,693,452	\$ 28,417,953
Total assets				39,105,137	3,610,898	42,716,035
Total liabilities				26,747,061	2,701,222	29,448,283

- (1) Certain amounts included in the gross premiums written of each segment are related to intersegment transactions and are included in the gross premiums written of each segment. Accordingly, the sum of gross premiums written for each segment does not agree to the total gross premiums written as shown in the table above due to the elimination of intersegment transactions in the total.
- (2) Certain expenses have been excluded from 'corporate expenses' and reflected in 'Transaction costs and other.' See 'Comments on Regulation G' for a further discussion of such items.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information**

(U.S. Dollars in thousands)

Three Months Ended  
September 30, 2019

	Insurance	Reinsurance	Mortgage	Sub-total (Core)	Other	Total
Gross premiums written (1)	\$ 1,005,874	\$ 662,572	\$ 375,092	\$ 2,043,292	\$ 249,960	\$ 2,181,121
Premiums ceded	(302,034)	(226,096)	(57,703)	(585,587)	(94,208)	(567,664)
Net premiums written	703,840	436,476	317,389	1,457,705	155,752	1,613,457
Change in unearned premiums	(98,504)	(72,621)	25,611	(145,514)	(29,920)	(175,434)
Net premiums earned	605,336	363,855	343,000	1,312,191	125,832	1,438,023
Other underwriting income (loss)	—	(1,208)	3,955	2,747	579	3,326
Losses and loss adjustment expenses	(422,782)	(270,379)	(13,080)	(706,241)	(96,214)	(802,455)
Acquisition expenses	(91,259)	(62,393)	(34,396)	(188,048)	(23,072)	(211,120)
Other operating expenses	(115,408)	(32,533)	(37,003)	(184,944)	(11,568)	(196,512)
<b>Underwriting income (loss)</b>	<b>\$ (24,113)</b>	<b>\$ (2,658)</b>	<b>\$ 262,476</b>	<b>235,705</b>	<b>(4,443)</b>	<b>231,262</b>
Net investment income				126,874	34,614	161,488
Net realized gains (losses)				80,014	(18,659)	61,355
Equity in net income (loss) of investment funds accounted for using the equity method				17,130	—	17,130
Other income (loss)				1,338	—	1,338
Corporate expenses (2)				(15,066)	—	(15,066)
Transaction costs and other (2)				(1,995)	—	(1,995)
Amortization of intangible assets				(20,003)	—	(20,003)
Interest expense				(23,237)	(8,091)	(31,328)
Net foreign exchange gains (losses)				29,794	3,330	33,124
<b>Income (loss) before income taxes</b>				<b>430,554</b>	<b>6,751</b>	<b>437,305</b>
Income tax (expense) benefit				(38,116)	—	(38,116)
<b>Net income (loss)</b>				<b>392,438</b>	<b>6,751</b>	<b>399,189</b>
Dividends attributable to redeemable noncontrolling interests				—	(6,600)	(6,600)
Amounts attributable to nonredeemable noncontrolling interests				—	(136)	(136)
<b>Net income (loss) available to Arch</b>				<b>392,438</b>	<b>15</b>	<b>392,453</b>
Preferred dividends				(10,403)	—	(10,403)
<b>Net income (loss) available to Arch common shareholders</b>				<b>\$ 382,035</b>	<b>\$ 15</b>	<b>\$ 382,050</b>
<b>Underwriting Ratios</b>						
Loss ratio	69.8 %	74.3 %	3.8 %	53.8 %	76.5 %	55.8 %
Acquisition expense ratio	15.1 %	17.1 %	10.0 %	14.3 %	18.3 %	14.7 %
Other operating expense ratio	19.1 %	8.9 %	10.8 %	14.1 %	9.2 %	13.7 %
Combined ratio	104.0 %	100.3 %	24.6 %	82.2 %	104.0 %	84.2 %
Net premiums written to gross premiums written	70.0 %	65.9 %	84.6 %	71.3 %	62.3 %	74.0 %
Total investable assets				\$ 21,566,088	\$ 2,730,247	\$ 24,296,335
Total assets				31,961,107	3,611,496	35,572,603
Total liabilities				20,912,352	2,598,442	23,510,794

- (1) Certain amounts included in the gross premiums written of each segment are related to intersegment transactions and are included in the gross premiums written of each segment. Accordingly, the sum of gross premiums written for each segment does not agree to the total gross premiums written as shown in the table above due to the elimination of intersegment transactions in the total.
- (2) Certain expenses have been excluded from 'corporate expenses' and reflected in 'Transaction costs and other.' See 'Comments on Regulation G' for a further discussion of such items.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information**

(U.S. Dollars in thousands)

Nine Months Ended  
September 30, 2020

	Insurance	Reinsurance	Mortgage	Sub-total (Core)	Other	Total
Gross premiums written (1)	\$ 3,444,335	\$ 2,934,174	\$ 1,084,337	\$ 7,461,860	\$ 590,309	\$ 7,831,554
Premiums ceded	(1,119,165)	(967,698)	(136,154)	(2,222,031)	(150,437)	(2,151,853)
Net premiums written	2,325,170	1,966,476	948,183	5,239,829	439,872	5,679,701
Change in unearned premiums	(202,188)	(388,321)	113,965	(476,544)	(22,267)	(498,811)
Net premiums earned	2,122,982	1,578,155	1,062,148	4,763,285	417,605	5,180,890
Other underwriting income (loss)	(31)	1,767	15,649	17,385	1,547	18,932
Losses and loss adjustment expenses	(1,550,632)	(1,235,586)	(444,721)	(3,230,939)	(331,275)	(3,562,214)
Acquisition expenses	(317,428)	(255,516)	(108,304)	(681,248)	(68,766)	(750,014)
Other operating expenses	(370,947)	(125,831)	(120,178)	(616,956)	(42,523)	(659,479)
<b>Underwriting income (loss)</b>	<b>\$ (116,056)</b>	<b>\$ (37,011)</b>	<b>\$ 404,594</b>	<b>251,527</b>	<b>(23,412)</b>	<b>228,115</b>
Net investment income				313,916	91,234	405,150
Net realized gains (losses)				523,964	(53,837)	470,127
Equity in net income (loss) of investment funds accounted for using the equity method				57,407	—	57,407
Other income (loss)				6,327	—	6,327
Corporate expenses (2)				(51,407)	—	(51,407)
Transaction costs and other (2)				(5,246)	—	(5,246)
Amortization of intangible assets				(49,835)	—	(49,835)
Interest expense				(86,599)	(18,438)	(105,037)
Net foreign exchange gains (losses)				(17,812)	6,387	(11,425)
<b>Income (loss) before income taxes</b>				<b>942,242</b>	<b>1,934</b>	<b>944,176</b>
Income tax (expense) benefit				(78,112)	333	(77,779)
<b>Net income (loss)</b>				<b>864,130</b>	<b>2,267</b>	<b>866,397</b>
Dividends attributable to redeemable noncontrolling interests				(1,873)	(3,125)	(4,998)
Amounts attributable to nonredeemable noncontrolling interests				—	578	578
<b>Net income (loss) available to Arch</b>				<b>862,257</b>	<b>(280)</b>	<b>861,977</b>
Preferred dividends				(31,209)	—	(31,209)
<b>Net income (loss) available to Arch common shareholders</b>				<b>\$ 831,048</b>	<b>\$ (280)</b>	<b>\$ 830,768</b>
<b>Underwriting Ratios</b>						
Loss ratio	73.0 %	78.3 %	41.9 %	67.8 %	79.3 %	68.8 %
Acquisition expense ratio	15.0 %	16.2 %	10.2 %	14.3 %	16.5 %	14.5 %
Other operating expense ratio	17.5 %	8.0 %	11.3 %	13.0 %	10.2 %	12.7 %
Combined ratio	105.5 %	102.5 %	63.4 %	95.1 %	106.0 %	96.0 %
Net premiums written to gross premiums written	67.5 %	67.0 %	87.4 %	70.2 %	74.5 %	72.5 %

- (1) Certain amounts included in the gross premiums written of each segment are related to intersegment transactions and are included in the gross premiums written of each segment. Accordingly, the sum of gross premiums written for each segment does not agree to the total gross premiums written as shown in the table above due to the elimination of intersegment transactions in the total.
- (2) Certain expenses have been excluded from 'corporate expenses' and reflected in 'Transaction costs and other.' See 'Comments on Regulation G' for a further discussion of such items.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information**

(U.S. Dollars in thousands)

Nine Months Ended  
September 30, 2019

	Insurance	Reinsurance	Mortgage	Sub-total (Core)	Other	Total
Gross premiums written (1)	\$ 2,867,753	\$ 1,890,974	\$ 1,095,607	\$ 5,853,574	\$ 598,627	\$ 6,196,809
Premiums ceded	(914,751)	(627,120)	(149,358)	(1,690,469)	(178,118)	(1,613,195)
Net premiums written	1,953,002	1,263,854	946,249	4,163,105	420,509	4,583,614
Change in unearned premiums	(201,719)	(186,450)	72,436	(315,733)	2,735	(312,998)
Net premiums earned	1,751,283	1,077,404	1,018,685	3,847,372	423,244	4,270,616
Other underwriting income (loss)	—	4,393	11,867	16,260	1,844	18,104
Losses and loss adjustment expenses	(1,168,677)	(751,147)	(50,226)	(1,970,050)	(318,480)	(2,288,530)
Acquisition expenses	(265,177)	(173,504)	(98,722)	(537,403)	(81,654)	(619,057)
Other operating expenses	(338,327)	(102,197)	(116,697)	(557,221)	(39,368)	(596,589)
<b>Underwriting income (loss)</b>	<b>\$ (20,898)</b>	<b>\$ 54,949</b>	<b>\$ 764,907</b>	<b>798,958</b>	<b>(14,414)</b>	<b>784,544</b>
Net investment income				371,161	102,314	473,475
Net realized gains (losses)				316,201	6,167	322,368
Equity in net income (loss) of investment funds accounted for using the equity method				96,533	—	96,533
Other income (loss)				3,550	—	3,550
Corporate expenses (2)				(47,911)	—	(47,911)
Transaction costs and other (2)				(5,363)	—	(5,363)
Amortization of intangible assets				(60,214)	—	(60,214)
Interest expense				(70,094)	(19,579)	(89,673)
Net foreign exchange gains (losses)				28,779	2,918	31,697
<b>Income (loss) before income taxes</b>				<b>1,431,600</b>	<b>77,406</b>	<b>1,509,006</b>
Income tax (expense) benefit				(128,454)	(20)	(128,474)
<b>Net income (loss)</b>				<b>1,303,146</b>	<b>77,386</b>	<b>1,380,532</b>
Dividends attributable to redeemable noncontrolling interests				—	(15,778)	(15,778)
Amounts attributable to nonredeemable noncontrolling interests				—	(54,819)	(54,819)
<b>Net income (loss) available to Arch</b>				<b>1,303,146</b>	<b>6,789</b>	<b>1,309,935</b>
Preferred dividends				(31,209)	—	(31,209)
<b>Net income (loss) available to Arch common shareholders</b>				<b>\$ 1,271,937</b>	<b>\$ 6,789</b>	<b>\$ 1,278,726</b>
<b>Underwriting Ratios</b>						
Loss ratio	66.7 %	69.7 %	4.9 %	51.2 %	75.2 %	53.6 %
Acquisition expense ratio	15.1 %	16.1 %	9.7 %	14.0 %	19.3 %	14.5 %
Other operating expense ratio	19.3 %	9.5 %	11.5 %	14.5 %	9.3 %	14.0 %
Combined ratio	101.1 %	95.3 %	26.1 %	79.7 %	103.8 %	82.1 %
Net premiums written to gross premiums written	68.1 %	66.8 %	86.4 %	71.1 %	70.2 %	74.0 %

- (1) Certain amounts included in the gross premiums written of each segment are related to intersegment transactions and are included in the gross premiums written of each segment. Accordingly, the sum of gross premiums written for each segment does not agree to the total gross premiums written as shown in the table above due to the elimination of intersegment transactions in the total.
- (2) Certain expenses have been excluded from 'corporate expenses' and reflected in 'Transaction costs and other.' See 'Comments on Regulation G' for a further discussion of such items.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information — Insurance Segment**

(U.S. Dollars in thousands)

	Three Months Ended				Nine Months Ended		
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
Gross premiums written	\$ 1,206,328	\$ 1,030,362	\$ 1,207,645	\$ 1,040,240	\$ 1,005,874	\$ 3,444,335	\$ 2,867,753
Premiums ceded	(382,167)	(358,101)	(378,897)	(351,516)	(302,034)	(1,119,165)	(914,751)
Net premiums written	824,161	672,261	828,748	688,724	703,840	2,325,170	1,953,002
Change in unearned premiums	(105,007)	15,648	(112,829)	(42,927)	(98,504)	(202,188)	(201,719)
Net premiums earned	719,154	687,909	715,919	645,797	605,336	2,122,982	1,751,283
Other underwriting income (loss)	(31)	—	—	—	—	(31)	—
Losses and loss adjustment expenses	(525,321)	(518,203)	(507,108)	(446,798)	(422,782)	(1,550,632)	(1,168,677)
Acquisition expenses	(102,420)	(107,671)	(107,337)	(96,437)	(91,259)	(317,428)	(265,177)
Other operating expenses	(122,541)	(118,757)	(129,649)	(116,443)	(115,408)	(370,947)	(338,327)
<b>Underwriting income (loss)</b>	<b>\$ (31,159)</b>	<b>\$ (56,722)</b>	<b>\$ (28,175)</b>	<b>\$ (13,881)</b>	<b>\$ (24,113)</b>	<b>\$ (116,056)</b>	<b>\$ (20,898)</b>
<b>Underwriting Ratios</b>							
Loss ratio	73.0 %	75.3 %	70.8 %	69.2 %	69.8 %	73.0 %	66.7 %
Acquisition expense ratio	14.2 %	15.7 %	15.0 %	14.9 %	15.1 %	15.0 %	15.1 %
Other operating expense ratio	17.0 %	17.3 %	18.1 %	18.0 %	19.1 %	17.5 %	19.3 %
Combined ratio	104.2 %	108.3 %	103.9 %	102.1 %	104.0 %	105.5 %	101.1 %
Catastrophic activity and prior year development:							
Current accident year catastrophic events, net of reinsurance and reinstatement premiums	10.3 %	12.5 %	6.9 %	0.9 %	4.3 %	9.9 %	1.6 %
Net (favorable) adverse development in prior year loss reserves, net of related adjustments	(0.2)%	(0.3)%	(0.1)%	(0.4)%	(0.6)%	(0.2)%	(0.4)%
Combined ratio excluding catastrophic activity and prior year development (1)	94.1 %	96.1 %	97.1 %	101.6 %	100.3 %	95.8 %	99.9 %
Net premiums written to gross premiums written	68.3 %	65.2 %	68.6 %	66.2 %	70.0 %	67.5 %	68.1 %

(1) See 'Comments on Regulation G' for further discussion.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information — Insurance Segment**

(U.S. Dollars in thousands)

	Three Months Ended										Nine Months Ended			
	September 30, 2020		June 30, 2020		March 31, 2020		December 31, 2019		September 30, 2019		September 30, 2020		September 30, 2019	
<b>Net premiums written</b>														
Property, energy, marine and aviation	\$ 152,193	18.5 %	\$ 159,801	23.8 %	\$ 127,585	15.4 %	\$ 95,849	13.9 %	\$ 97,966	13.9 %	\$ 439,579	18.9 %	\$ 272,271	13.9 %
Professional lines (1)	199,163	24.2 %	157,899	23.5 %	169,118	20.4 %	145,841	21.2 %	137,569	19.5 %	526,180	22.6 %	388,482	19.9 %
Programs	123,768	15.0 %	104,930	15.6 %	112,532	13.6 %	96,653	14.0 %	120,039	17.1 %	341,230	14.7 %	329,882	16.9 %
Construction and national accounts	88,790	10.8 %	57,144	8.5 %	115,999	14.0 %	114,437	16.6 %	98,522	14.0 %	261,933	11.3 %	254,765	13.0 %
Excess and surplus casualty (2)	78,889	9.6 %	64,703	9.6 %	65,419	7.9 %	61,549	8.9 %	62,843	8.9 %	209,011	9.0 %	166,474	8.5 %
Travel, accident and health	28,972	3.5 %	27,997	4.2 %	126,046	15.2 %	65,337	9.5 %	75,192	10.7 %	183,015	7.9 %	239,833	12.3 %
Lenders products	60,830	7.4 %	23,690	3.5 %	33,292	4.0 %	35,915	5.2 %	31,005	4.4 %	117,812	5.1 %	75,793	3.9 %
Other (3)	91,556	11.1 %	76,097	11.3 %	78,757	9.5 %	73,143	10.6 %	80,704	11.5 %	246,410	10.6 %	225,502	11.5 %
Total	\$ 824,161	100.0 %	\$ 672,261	100.0 %	\$ 828,748	100.0 %	\$ 688,724	100.0 %	\$ 703,840	100.0 %	\$ 2,325,170	100.0 %	\$ 1,953,002	100.0 %
<b>Underwriting location</b>														
United States	\$ 574,699	69.7 %	\$ 453,215	67.4 %	\$ 602,677	72.7 %	\$ 507,193	73.6 %	\$ 532,808	75.7 %	\$ 1,630,591	70.1 %	\$ 1,476,283	75.6 %
Europe	212,203	25.7 %	181,566	27.0 %	196,042	23.7 %	151,182	22.0 %	145,512	20.7 %	589,811	25.4 %	408,032	20.9 %
Other	37,259	4.5 %	37,480	5.6 %	30,029	3.6 %	30,349	4.4 %	25,520	3.6 %	104,768	4.5 %	68,687	3.5 %
Total	\$ 824,161	100.0 %	\$ 672,261	100.0 %	\$ 828,748	100.0 %	\$ 688,724	100.0 %	\$ 703,840	100.0 %	\$ 2,325,170	100.0 %	\$ 1,953,002	100.0 %
<b>Net premiums earned</b>														
Property, energy, marine and aviation	\$ 133,827	18.6 %	\$ 120,781	17.6 %	\$ 111,183	15.5 %	\$ 90,087	13.9 %	\$ 80,246	13.3 %	\$ 365,791	17.2 %	\$ 208,879	11.9 %
Professional lines (1)	168,502	23.4 %	154,812	22.5 %	151,700	21.2 %	133,423	20.7 %	135,343	22.4 %	475,014	22.4 %	365,801	20.9 %
Programs	104,861	14.6 %	108,464	15.8 %	108,878	15.2 %	109,498	17.0 %	104,432	17.3 %	322,203	15.2 %	304,605	17.4 %
Construction and national accounts	95,386	13.3 %	91,605	13.3 %	99,700	13.9 %	91,489	14.2 %	81,472	13.5 %	286,691	13.5 %	234,198	13.4 %
Excess and surplus casualty (2)	69,978	9.7 %	60,966	8.9 %	65,097	9.1 %	56,397	8.7 %	53,991	8.9 %	196,041	9.2 %	144,218	8.2 %
Travel, accident and health	36,726	5.1 %	52,117	7.6 %	77,375	10.8 %	67,922	10.5 %	81,952	13.5 %	166,218	7.8 %	237,163	13.5 %
Lenders products (4)	33,401	4.6 %	23,111	3.4 %	25,343	3.5 %	25,001	3.9 %	(5,724)	(0.9)%	81,855	3.9 %	41,078	2.3 %
Other (3)	76,473	10.6 %	76,053	11.1 %	76,643	10.7 %	71,980	11.1 %	73,624	12.2 %	229,169	10.8 %	215,341	12.3 %
Total	\$ 719,154	100.0 %	\$ 687,909	100.0 %	\$ 715,919	100.0 %	\$ 645,797	100.0 %	\$ 605,336	100.0 %	\$ 2,122,982	100.0 %	\$ 1,751,283	100.0 %

- (1) Includes professional liability, executive assurance and healthcare business.  
(2) Includes casualty and contract binding business.  
(3) Includes alternative markets, excess workers' compensation and surety business.  
(4) Reflects a change in earning patterns on certain business in the 2019 third quarter.



**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information — Reinsurance Segment**

(U.S. Dollars in thousands)

	Three Months Ended				Nine Months Ended		
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
Gross premiums written	\$ 1,004,590	\$ 807,065	\$ 1,122,519	\$ 432,249	\$ 662,572	\$ 2,934,174	\$ 1,890,974
Premiums ceded	(400,388)	(241,971)	(325,339)	(93,380)	(226,096)	(967,698)	(627,120)
Net premiums written	604,202	565,094	797,180	338,869	436,476	1,966,476	1,263,854
Change in unearned premiums	(49,704)	(84,897)	(253,720)	50,116	(72,621)	(388,321)	(186,450)
Net premiums earned	554,498	480,197	543,460	388,985	363,855	1,578,155	1,077,404
Other underwriting income (loss)	298	(651)	2,120	2,051	(1,208)	1,767	4,393
Losses and loss adjustment expenses	(422,084)	(383,433)	(430,069)	(260,182)	(270,379)	(1,235,586)	(751,147)
Acquisition expenses	(85,388)	(90,522)	(79,606)	(65,528)	(62,393)	(255,516)	(173,504)
Other operating expenses	(41,818)	(38,716)	(45,297)	(39,287)	(32,533)	(125,831)	(102,197)
<b>Underwriting income (loss)</b>	<b>\$ 5,506</b>	<b>\$ (33,125)</b>	<b>\$ (9,392)</b>	<b>\$ 26,039</b>	<b>\$ (2,658)</b>	<b>\$ (37,011)</b>	<b>\$ 54,949</b>
<b>Underwriting Ratios</b>							
Loss ratio	76.1 %	79.8 %	79.1 %	66.9 %	74.3 %	78.3 %	69.7 %
Acquisition expense ratio	15.4 %	18.9 %	14.6 %	16.8 %	17.1 %	16.2 %	16.1 %
Other operating expense ratio	7.5 %	8.1 %	8.3 %	10.1 %	8.9 %	8.0 %	9.5 %
Combined ratio	99.0 %	106.8 %	102.0 %	93.8 %	100.3 %	102.5 %	95.3 %
Catastrophic activity and prior year development:							
Current accident year catastrophic events, net of reinsurance and reinstatement premiums	23.3 %	25.3 %	12.7 %	6.4 %	11.5 %	20.2 %	5.0 %
Net (favorable) adverse development in prior year loss reserves, net of related adjustments	(7.4)%	(6.0)%	(2.0)%	(4.9)%	(4.0)%	(5.1)%	(2.3)%
Combined ratio excluding catastrophic activity and prior year development (1)	83.1 %	87.5 %	91.3 %	92.3 %	92.8 %	87.4 %	92.6 %
Net premiums written to gross premiums written	60.1 %	70.0 %	71.0 %	78.4 %	65.9 %	67.0 %	66.8 %

(1) See 'Comments on Regulation G' for further discussion.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information — Reinsurance Segment**

(U.S. Dollars in thousands)

	Three Months Ended						Nine Months Ended							
	September 30, 2020		June 30, 2020		March 31, 2020		December 31, 2019		September 30, 2019		September 30, 2020		September 30, 2019	
<b>Net premiums written</b>														
Property excluding property catastrophe	\$ 223,880	37.1 %	\$ 163,639	29.0 %	\$ 158,924	19.9 %	\$ 85,859	25.3 %	\$ 118,671	27.2 %	\$ 546,443	27.8 %	\$ 317,461	25.1 %
Property catastrophe	42,125	7.0 %	117,676	20.8 %	89,092	11.2 %	37,069	10.9 %	23,597	5.4 %	248,893	12.7 %	73,574	5.8 %
Other specialty (1)	159,969	26.5 %	117,375	20.8 %	284,952	35.7 %	103,254	30.5 %	94,072	21.6 %	562,296	28.6 %	363,723	28.8 %
Casualty (2)	142,401	23.6 %	105,049	18.6 %	190,880	23.9 %	85,063	25.1 %	178,802	41.0 %	438,330	22.3 %	425,311	33.7 %
Marine and aviation	27,839	4.6 %	32,372	5.7 %	49,785	6.2 %	11,921	3.5 %	10,181	2.3 %	109,996	5.6 %	41,758	3.3 %
Other (3)	7,988	1.3 %	28,983	5.1 %	23,547	3.0 %	15,703	4.6 %	11,153	2.6 %	60,518	3.1 %	42,027	3.3 %
Total	\$ 604,202	100.0 %	\$ 565,094	100.0 %	\$ 797,180	100.0 %	\$ 338,869	100.0 %	\$ 436,476	100.0 %	\$ 1,966,476	100.0 %	\$ 1,263,854	100.0 %
<b>Underwriting location</b>														
Bermuda	\$ 240,193	39.8 %	\$ 240,451	42.6 %	\$ 333,619	41.8 %	\$ 116,974	34.5 %	\$ 190,998	43.8 %	\$ 814,263	41.4 %	\$ 461,644	36.5 %
United States	189,135	31.3 %	162,027	28.7 %	187,466	23.5 %	119,003	35.1 %	145,231	33.3 %	538,628	27.4 %	410,940	32.5 %
Europe and other	174,874	28.9 %	162,616	28.8 %	276,095	34.6 %	102,892	30.4 %	100,247	23.0 %	613,585	31.2 %	391,270	31.0 %
Total	\$ 604,202	100.0 %	\$ 565,094	100.0 %	\$ 797,180	100.0 %	\$ 338,869	100.0 %	\$ 436,476	100.0 %	\$ 1,966,476	100.0 %	\$ 1,263,854	100.0 %
<b>Net premiums earned</b>														
Property excluding property catastrophe	\$ 163,081	29.4 %	\$ 124,019	25.8 %	\$ 112,652	20.7 %	\$ 103,212	26.5 %	\$ 90,358	24.8 %	\$ 399,752	25.3 %	\$ 259,629	24.1 %
Property catastrophe	69,524	12.5 %	55,226	11.5 %	53,000	9.8 %	31,048	8.0 %	22,617	6.2 %	177,750	11.3 %	59,886	5.6 %
Other specialty (1)	141,201	25.5 %	123,006	25.6 %	203,385	37.4 %	108,074	27.8 %	112,349	30.9 %	467,592	29.6 %	370,443	34.4 %
Casualty (2)	136,421	24.6 %	132,756	27.6 %	135,071	24.9 %	118,258	30.4 %	116,242	31.9 %	404,248	25.6 %	311,030	28.9 %
Marine and aviation	26,744	4.8 %	24,960	5.2 %	24,858	4.6 %	12,919	3.3 %	11,798	3.2 %	76,562	4.9 %	35,355	3.3 %
Other (3)	17,527	3.2 %	20,230	4.2 %	14,494	2.7 %	15,474	4.0 %	10,491	2.9 %	52,251	3.3 %	41,061	3.8 %
Total	\$ 554,498	100.0 %	\$ 480,197	100.0 %	\$ 543,460	100.0 %	\$ 388,985	100.0 %	\$ 363,855	100.0 %	\$ 1,578,155	100.0 %	\$ 1,077,404	100.0 %

(1) Includes proportional motor, surety, accident and health, workers' compensation catastrophe, agriculture, trade credit and other.

(2) Includes executive assurance, professional liability, workers' compensation, excess motor, healthcare and other.

(3) Includes life, casualty clash and other.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information — Mortgage Segment**

(U.S. Dollars in thousands)

	Three Months Ended					Nine Months Ended	
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
Gross premiums written	\$ 346,248	\$ 369,144	\$ 368,945	\$ 370,658	\$ 375,092	\$ 1,084,337	\$ 1,095,607
Premiums ceded	(47,783)	(44,044)	(44,327)	(55,151)	(57,703)	(136,154)	(149,358)
Net premiums written	298,465	325,100	324,618	315,507	317,389	948,183	946,249
Change in unearned premiums	52,944	40,613	20,408	32,148	25,611	113,965	72,436
Net premiums earned	351,409	365,713	345,026	347,655	343,000	1,062,148	1,018,685
Other underwriting income (1)	4,600	6,450	4,599	4,138	3,955	15,649	11,867
Losses and loss adjustment expenses	(153,055)	(224,100)	(67,566)	(3,287)	(13,080)	(444,721)	(50,226)
Acquisition expenses	(35,716)	(34,052)	(38,536)	(35,597)	(34,396)	(108,304)	(98,722)
Other operating expenses	(36,708)	(37,574)	(45,896)	(36,395)	(37,003)	(120,178)	(116,697)
<b>Underwriting income</b>	<b>\$ 130,530</b>	<b>\$ 76,437</b>	<b>\$ 197,627</b>	<b>\$ 276,514</b>	<b>\$ 262,476</b>	<b>\$ 404,594</b>	<b>\$ 764,907</b>
<b>Underwriting Ratios</b>							
Loss ratio	43.6 %	61.3 %	19.6 %	0.9 %	3.8 %	41.9 %	4.9 %
Acquisition expense ratio	10.2 %	9.3 %	11.2 %	10.2 %	10.0 %	10.2 %	9.7 %
Other operating expense ratio	10.4 %	10.3 %	13.3 %	10.5 %	10.8 %	11.3 %	11.5 %
Combined ratio	64.2 %	80.9 %	44.1 %	21.6 %	24.6 %	63.4 %	26.1 %
Net (favorable) adverse development in prior year loss reserves, net of related adjustments	(1.3)%	(0.1)%	(1.8)%	(9.4)%	(9.6)%	(1.0)%	(9.1)%
Combined ratio excluding prior year development (2)	65.5 %	81.0 %	45.9 %	31.0 %	34.2 %	64.4 %	35.2 %
Net premiums written to gross premiums written	86.2 %	88.1 %	88.0 %	85.1 %	84.6 %	87.4 %	86.4 %
<b>Net premiums written by underwriting location</b>							
United States	\$ 245,971	\$ 261,124	\$ 264,108	\$ 258,512	\$ 260,202	\$ 771,203	\$ 774,356
Other	52,494	63,976	60,510	56,995	57,187	176,980	171,893
Total	\$ 298,465	\$ 325,100	\$ 324,618	\$ 315,507	\$ 317,389	\$ 948,183	\$ 946,249
United States %	82.4 %	80.3 %	81.4 %	81.9 %	82.0 %	81.3 %	81.8 %
Other %	17.6 %	19.7 %	18.6 %	18.1 %	18.0 %	18.7 %	18.2 %

(1) Primarily related to income earned on various risk-sharing products offered to government sponsored enterprises and mortgage lenders.

(2) See 'Comments on Regulation G' for further discussion.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information — Mortgage Segment**

(U.S. Dollars in millions)	September 30, 2020		June 30, 2020		March 31, 2020		December 31, 2019		September 30, 2019	
<b>Insurance In Force (IIF) (1)</b>										
U.S. primary mortgage insurance	\$ 275,846	66.8 %	\$ 276,643	65.9 %	\$ 284,203	68.9 %	\$ 287,150	68.7 %	\$ 284,496	69.7 %
Mortgage reinsurance	28,421	6.9 %	27,457	6.5 %	24,335	5.9 %	26,768	6.4 %	25,440	6.2 %
Other (2)	108,786	26.3 %	115,803	27.6 %	103,731	25.2 %	104,346	24.9 %	98,054	24.0 %
Total	<u>\$ 413,053</u>	<u>100.0 %</u>	<u>\$ 419,903</u>	<u>100.0 %</u>	<u>\$ 412,269</u>	<u>100.0 %</u>	<u>\$ 418,264</u>	<u>100.0 %</u>	<u>\$ 407,990</u>	<u>100.0 %</u>
<b>Risk In Force (RIF) (3)</b>										
U.S. primary mortgage insurance	\$ 69,620	91.0 %	\$ 70,200	91.0 %	\$ 72,566	92.0 %	\$ 73,388	91.9 %	\$ 72,916	92.0 %
Mortgage reinsurance	2,145	2.8 %	2,116	2.7 %	1,961	2.5 %	2,129	2.7 %	2,086	2.6 %
Other (2)	4,750	6.2 %	4,795	6.2 %	4,387	5.6 %	4,380	5.5 %	4,216	5.3 %
Total	<u>\$ 76,515</u>	<u>100.0 %</u>	<u>\$ 77,111</u>	<u>100.0 %</u>	<u>\$ 78,914</u>	<u>100.0 %</u>	<u>\$ 79,897</u>	<u>100.0 %</u>	<u>\$ 79,218</u>	<u>100.0 %</u>
<b>Supplemental disclosures for U.S. primary mortgage insurance:</b>										
<b>Total RIF by credit quality (FICO score):</b>										
>=740	\$ 40,017	57.5 %	\$ 40,297	57.4 %	\$ 41,738	57.5 %	\$ 42,301	57.6 %	\$ 41,975	57.6 %
680-739	24,236	34.8 %	24,346	34.7 %	25,078	34.6 %	25,240	34.4 %	25,013	34.3 %
620-679	5,016	7.2 %	5,188	7.4 %	5,368	7.4 %	5,444	7.4 %	5,501	7.5 %
<620	351	0.5 %	369	0.5 %	382	0.5 %	403	0.5 %	427	0.6 %
Total	<u>\$ 69,620</u>	<u>100.0 %</u>	<u>\$ 70,200</u>	<u>100.0 %</u>	<u>\$ 72,566</u>	<u>100.0 %</u>	<u>\$ 73,388</u>	<u>100.0 %</u>	<u>\$ 72,916</u>	<u>100.0 %</u>
Weighted average FICO score	743		743		743		743		743	
<b>Total RIF by Loan-To-Value (LTV):</b>										
95.01% and above	\$ 8,789	12.6 %	\$ 8,859	12.6 %	\$ 9,060	12.5 %	\$ 9,064	12.4 %	\$ 8,948	12.3 %
90.01% to 95.00%	37,278	53.5 %	37,830	53.9 %	39,594	54.6 %	40,136	54.7 %	40,086	55.0 %
85.01% to 90.00%	19,870	28.5 %	20,071	28.6 %	20,619	28.4 %	20,890	28.5 %	20,708	28.4 %
85.00% and below	3,683	5.3 %	3,440	4.9 %	3,293	4.5 %	3,298	4.5 %	3,174	4.4 %
Total	<u>\$ 69,620</u>	<u>100.0 %</u>	<u>\$ 70,200</u>	<u>100.0 %</u>	<u>\$ 72,566</u>	<u>100.0 %</u>	<u>\$ 73,388</u>	<u>100.0 %</u>	<u>\$ 72,916</u>	<u>100.0 %</u>
Weighted average LTV	92.9 %		92.9 %		93.0 %		93.0 %		93.1 %	
<b>Total RIF by State:</b>										
Texas	\$ 5,536	8.0 %	\$ 5,560	7.9 %	\$ 5,683	7.8 %	\$ 5,678	7.7 %	\$ 5,599	7.7 %
California	5,019	7.2 %	4,948	7.0 %	5,106	7.0 %	5,187	7.1 %	4,984	6.8 %
Florida	3,648	5.2 %	3,737	5.3 %	3,863	5.3 %	3,887	5.3 %	3,821	5.2 %
Georgia	2,890	4.2 %	2,861	4.1 %	2,819	3.9 %	2,753	3.8 %	2,667	3.7 %
Illinois	2,670	3.8 %	2,643	3.8 %	2,621	3.6 %	2,616	3.6 %	2,602	3.6 %
Virginia	2,540	3.6 %	2,656	3.8 %	2,814	3.9 %	2,881	3.9 %	2,907	4.0 %
North Carolina	2,516	3.6 %	2,459	3.5 %	2,475	3.4 %	2,470	3.4 %	2,469	3.4 %
Minnesota	2,489	3.6 %	2,473	3.5 %	2,509	3.5 %	2,514	3.4 %	2,480	3.4 %
Massachusetts	2,344	3.4 %	2,345	3.3 %	2,409	3.3 %	2,432	3.3 %	2,424	3.3 %
Washington	2,222	3.2 %	2,291	3.3 %	2,426	3.3 %	2,474	3.4 %	2,466	3.4 %
Other	37,746	54.2 %	38,227	54.5 %	39,841	54.9 %	40,496	55.2 %	40,497	55.5 %
Total	<u>\$ 69,620</u>	<u>100.0 %</u>	<u>\$ 70,200</u>	<u>100.0 %</u>	<u>\$ 72,566</u>	<u>100.0 %</u>	<u>\$ 73,388</u>	<u>100.0 %</u>	<u>\$ 72,916</u>	<u>100.0 %</u>
Weighted average coverage (end of period RIF divided by IIF)	25.2 %		25.4 %		25.5 %		25.6 %		25.6 %	
U.S. mortgage insurance total RIF, net of reinsurance (4)	\$ 56,067		\$ 57,258		\$ 58,693		\$ 58,512		\$ 57,768	
Analysts' persistency (5)	62.5 %		66.6 %		72.6 %		75.7 %		78.6 %	
Risk-to-capital ratio -- Arch MI U.S. (6)	9.6:1		10.2:1		11.3:1		12.0:1		12.9:1	
PMIER sufficiency ratio -- Arch MI U.S. (7)	158 %		161 %		165 %		161 %		154 %	

(1) The aggregate dollar amount of each insured mortgage loan's current principal balance.

(2) Includes GSE credit risk-sharing transactions and international insurance business.

(3) The aggregate dollar amount of each insured mortgage loan's current principal balance multiplied by the insurance coverage percentage specified in the policy for insurance policies issued and after contract limits and/or loss ratio caps for risk-sharing or reinsurance transactions.

(4) Total RIF for the U.S. mortgage insurance operations (see note 3) after external reinsurance.

(5) Represents the % of IIF at the beginning of a 12-month period that remained in force at the end of the period.

(6) Represents current (non-delinquent) RIF, net of reinsurance, divided by statutory capital (estimate for September 30, 2020).

(7) Calculated as available assets divided by required assets as defined within PMIERS (estimate for September 30, 2020). There was approximately \$1.33 billion of excess available assets at September 30, 2020.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information — Mortgage Segment**

(U.S. Dollars in millions, except policy/loan/claim count)

	Three Months Ended									
	September 30, 2020		June 30, 2020		March 31, 2020		December 31, 2019		September 30, 2019	
<b>Supplemental disclosures for U.S. primary mortgage insurance:</b>										
Total new insurance written (NIW) (1)	\$ 32,787		\$ 24,551		\$ 16,778		\$ 24,051		\$ 25,313	
<u>Total NIW by credit quality (FICO score):</u>										
>=740	\$ 21,160	64.5 %	\$ 15,851	64.6 %	\$ 10,069	60.0 %	\$ 14,793	61.5 %	\$ 15,204	60.1 %
680-739	10,562	32.2 %	7,781	31.7 %	5,787	34.5 %	8,092	33.6 %	8,725	34.5 %
620-679	1,065	3.2 %	919	3.7 %	922	5.5 %	1,166	4.8 %	1,384	5.5 %
Total	\$ 32,787	100.0 %	\$ 24,551	100.0 %	\$ 16,778	100.0 %	\$ 24,051	100.0 %	\$ 25,313	100.0 %
<u>Total NIW by LTV:</u>										
95.01% and above	\$ 2,561	7.8 %	\$ 1,948	7.9 %	\$ 1,668	9.9 %	\$ 2,260	9.4 %	\$ 3,182	12.6 %
90.01% to 95.00%	13,967	42.6 %	9,403	38.3 %	7,199	42.9 %	10,059	41.8 %	10,409	41.1 %
85.01% to 90.00%	10,052	30.7 %	8,140	33.2 %	5,329	31.8 %	7,839	32.6 %	7,762	30.7 %
85.00% and below	6,207	18.9 %	5,060	20.6 %	2,582	15.4 %	3,893	16.2 %	3,960	15.6 %
Total	\$ 32,787	100.0 %	\$ 24,551	100.0 %	\$ 16,778	100.0 %	\$ 24,051	100.0 %	\$ 25,313	100.0 %
<u>Total NIW monthly vs. single:</u>										
Monthly	\$ 31,928	97.4 %	\$ 23,391	95.3 %	\$ 15,692	93.5 %	\$ 22,707	94.4 %	\$ 23,358	92.3 %
Single	859	2.6 %	1,160	4.7 %	1,086	6.5 %	1,344	5.6 %	1,955	7.7 %
Total	\$ 32,787	100.0 %	\$ 24,551	100.0 %	\$ 16,778	100.0 %	\$ 24,051	100.0 %	\$ 25,313	100.0 %
<u>Total NIW purchase vs. refinance:</u>										
Purchase	\$ 24,256	74.0 %	\$ 14,956	60.9 %	\$ 12,299	73.3 %	\$ 16,476	68.5 %	\$ 19,068	75.3 %
Refinance	8,531	26.0 %	9,595	39.1 %	4,479	26.7 %	7,575	31.5 %	6,245	24.7 %
Total	\$ 32,787	100.0 %	\$ 24,551	100.0 %	\$ 16,778	100.0 %	\$ 24,051	100.0 %	\$ 25,313	100.0 %
Ending number of policies in force (PIF) (2)	1,245,408		1,259,328		1,293,799		1,307,884		1,304,263	
<u>Rollforward of insured loans in default:</u>										
Beginning delinquent number of loans	64,667		18,414		20,163		19,243		18,761	
Plus: new notices	19,967		58,374		9,419		10,289		10,111	
Less: cures	(26,029)		(11,664)		(10,541)		(8,724)		(8,970)	
Less: paid claims	(243)		(457)		(627)		(645)		(659)	
Ending delinquent number of loans (2)	58,362		64,667		18,414		20,163		19,243	
Ending percentage of loans in default (2)	4.69 %		5.14 %		1.42 %		1.54 %		1.48 %	
<u>Losses:</u>										
Number of claims paid	243		457		627		645		659	
Total paid claims (in thousands)	\$ 9,420		\$ 20,101		\$ 26,038		\$ 25,253		\$ 26,082	
Average per claim (in thousands)	\$ 38.8		\$ 44.0		\$ 41.5		\$ 39.2		\$ 39.6	
Severity (3)	88.6 %		96.3 %		92.8 %		94.0 %		95.6 %	
Average case reserve per default (in thousands)	\$ 10.1		\$ 6.9		\$ 14.4		\$ 13.3		\$ 14.7	

(1) The original principal balance of all loans that received coverage during the period.

(2) Includes first lien primary and pool policies.

(3) Represents total paid claims divided by RIF of loans for which claims were paid.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information — Mortgage Segment**

**Supplemental disclosures for U.S. primary mortgage insurance:**

(U.S. Dollars in millions)

Policy year:	September 30, 2020						December 31, 2019					
	Loss Reserves, Net (1)	Primary IIF (2)		Primary RIF (3)		Delinquency Rate	Loss Reserves, Net (1)	Primary IIF (2)		Primary RIF (3)		Delinquency Rate
	% of Total	Total	% of Total	Total	% of Total		% of Total	Total	% of Total	Total	% of Total	
2010 and prior	27.8 %	\$ 14,603	5.3 %	3,320	4.8 %	11.59 %	58.2 %	\$ 17,251	6.0 %	3,990	5.4 %	8.79 %
2011	0.6 %	1,141	0.4 %	308	0.4 %	3.67 %	0.7 %	1,678	0.6 %	464	0.6 %	1.59 %
2012	1.5 %	4,467	1.6 %	1,228	1.8 %	2.92 %	1.3 %	6,293	2.2 %	1,753	2.4 %	0.89 %
2013	3.2 %	8,754	3.2 %	2,447	3.5 %	3.37 %	3.0 %	12,276	4.3 %	3,433	4.7 %	0.99 %
2014	2.5 %	9,613	3.5 %	2,647	3.8 %	4.02 %	2.4 %	13,714	4.8 %	3,778	5.1 %	1.16 %
2015	3.9 %	17,752	6.4 %	4,778	6.9 %	3.79 %	3.2 %	25,788	9.0 %	6,880	9.4 %	0.87 %
2016	9.5 %	29,299	10.6 %	7,753	11.1 %	4.89 %	7.6 %	40,898	14.2 %	10,670	14.5 %	1.03 %
2017	12.9 %	29,537	10.7 %	7,639	11.0 %	5.52 %	9.9 %	43,896	15.3 %	11,262	15.3 %	1.00 %
2018	16.1 %	32,788	11.9 %	8,304	11.9 %	6.66 %	11.2 %	51,776	18.0 %	13,086	17.8 %	0.86 %
2019	17.6 %	56,189	20.4 %	13,900	20.0 %	4.68 %	2.4 %	73,580	25.6 %	18,072	24.6 %	0.14 %
2020	4.6 %	71,703	26.0 %	17,296	24.8 %	1.01 %						
<b>Total</b>	<b>100.0 %</b>	<b>\$ 275,846</b>	<b>100.0 %</b>	<b>\$ 69,620</b>	<b>100.0 %</b>	<b>4.69 %</b>	<b>100.0 %</b>	<b>\$ 287,150</b>	<b>100.0 %</b>	<b>\$ 73,388</b>	<b>100.0 %</b>	<b>1.54 %</b>

- (1) Total reserves for losses and loss adjustment expenses, net of recoverables, was \$593.2 million at September 30, 2020, compared to \$278.7 million at December 31, 2019.
- (2) The aggregate dollar amount of each insured mortgage loan's current principal balance.
- (3) The aggregate dollar amount of each insured mortgage loan's current principal balance multiplied by the insurance coverage percentage specified in the policy for insurance policies issued and after contract limits and/or loss ratio caps for risk-sharing transactions.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information - Consolidated Excluding the 'Other' Segment (Sub-Total (Core))**

(U.S. Dollars in thousands)

	Three Months Ended				Nine Months Ended		
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
Gross premiums written	\$ 2,556,914	\$ 2,206,410	\$ 2,698,537	\$ 1,842,071	\$ 2,043,292	\$ 7,461,860	\$ 5,853,574
Premiums ceded	(830,086)	(643,955)	(747,991)	(498,971)	(585,587)	(2,222,031)	(1,690,469)
Net premiums written	1,726,828	1,562,455	1,950,546	1,343,100	1,457,705	5,239,829	4,163,105
Change in unearned premiums	(101,767)	(28,636)	(346,141)	39,337	(145,514)	(476,544)	(315,733)
Net premiums earned	1,625,061	1,533,819	1,604,405	1,382,437	1,312,191	4,763,285	3,847,372
Other underwriting income (loss)	4,867	5,799	6,719	6,189	2,747	17,385	16,260
Losses and loss adjustment expenses	(1,100,460)	(1,125,736)	(1,004,743)	(710,267)	(706,241)	(3,230,939)	(1,970,050)
Acquisition expenses	(223,524)	(232,245)	(225,479)	(197,562)	(188,048)	(681,248)	(537,403)
Other operating expenses	(201,067)	(195,047)	(220,842)	(192,125)	(184,944)	(616,956)	(557,221)
<b>Underwriting income (loss)</b>	<b>\$ 104,877</b>	<b>\$ (13,410)</b>	<b>\$ 160,060</b>	<b>\$ 288,672</b>	<b>\$ 235,705</b>	<b>\$ 251,527</b>	<b>\$ 798,958</b>
<b>Underwriting Ratios</b>							
Loss ratio	67.7 %	73.4 %	62.6 %	51.4 %	53.8 %	67.8 %	51.2 %
Acquisition expense ratio	13.8 %	15.1 %	14.1 %	14.3 %	14.3 %	14.3 %	14.0 %
Other operating expense ratio	12.4 %	12.7 %	13.8 %	13.9 %	14.1 %	13.0 %	14.5 %
Combined ratio	93.9 %	101.2 %	90.5 %	79.6 %	82.2 %	95.1 %	79.7 %
Catastrophic activity and prior year development:							
Current accident year catastrophic events, net of reinsurance and reinstatement premiums	12.5 %	13.5 %	7.4 %	2.2 %	5.2 %	11.1 %	2.2 %
Net (favorable) adverse development in prior year loss reserves, net of related adjustments	(2.9)%	(2.0)%	(1.1)%	(4.0)%	(3.9)%	(2.0)%	(3.2)%
Combined ratio excluding catastrophic activity and prior year development (1)	84.3 %	89.7 %	84.2 %	81.4 %	80.9 %	86.0 %	80.7 %
<b>Components of losses and loss adjustment expenses incurred (1)</b>							
Paid losses and loss adjustment expenses	\$ 618,638	\$ 550,481	\$ 530,012	\$ 627,929	\$ 508,364	\$ 1,699,131	\$ 1,433,456
Change in unpaid losses and loss adjustment expenses	481,822	575,255	474,731	82,338	197,877	1,531,808	536,594
Total losses and loss adjustment expenses	\$ 1,100,460	\$ 1,125,736	\$ 1,004,743	\$ 710,267	\$ 706,241	\$ 3,230,939	\$ 1,970,050
Net premiums written to gross premiums written	67.5 %	70.8 %	72.3 %	72.9 %	71.3 %	70.2 %	71.1 %

(1) See 'Comments on Regulation G' for further discussion.

**Arch Capital Group Ltd. and Subsidiaries**  
**Segment Information — Selected Information on Losses and Loss Adjustment Expenses**

(U.S. Dollars in thousands)

	Three Months Ended				Nine Months Ended		
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
<b>Estimated net (favorable) adverse development in prior year loss reserves, net of related adjustments (1)</b>							
Net impact on underwriting results:							
Insurance	\$ (1,136)	\$ (2,148)	\$ (776)	\$ (2,839)	\$ (3,934)	\$ (4,060)	\$ (7,054)
Reinsurance	(40,766)	(28,933)	(10,960)	(19,081)	(14,716)	(80,659)	(24,387)
Mortgage	(4,523)	(306)	(6,101)	(32,763)	(33,031)	(10,930)	(92,450)
Total	<u>\$ (46,425)</u>	<u>\$ (31,387)</u>	<u>\$ (17,837)</u>	<u>\$ (54,683)</u>	<u>\$ (51,681)</u>	<u>\$ (95,649)</u>	<u>\$ (123,891)</u>
Impact on losses and loss adjustment expenses:							
Insurance	\$ (2,282)	\$ (2,518)	\$ (1,115)	\$ (4,403)	\$ (4,354)	\$ (5,915)	\$ (11,387)
Reinsurance	(41,960)	(40,211)	(11,627)	(20,058)	(15,309)	(93,798)	(26,338)
Mortgage	(4,523)	(208)	(6,101)	(32,763)	(33,031)	(10,832)	(92,456)
Total	<u>\$ (48,765)</u>	<u>\$ (42,937)</u>	<u>\$ (18,843)</u>	<u>\$ (57,224)</u>	<u>\$ (52,694)</u>	<u>\$ (110,545)</u>	<u>\$ (130,181)</u>
Impact on acquisition expenses:							
Insurance	\$ 1,146	\$ 370	\$ 339	\$ 1,564	\$ 420	\$ 1,855	\$ 4,333
Reinsurance	1,194	11,278	667	977	593	13,139	1,951
Mortgage	—	(98)	—	—	—	(98)	6
Total	<u>\$ 2,340</u>	<u>\$ 11,550</u>	<u>\$ 1,006</u>	<u>\$ 2,541</u>	<u>\$ 1,013</u>	<u>\$ 14,896</u>	<u>\$ 6,290</u>
Impact on combined ratio:							
Insurance	(0.2)%	(0.3)%	(0.1)%	(0.4)%	(0.6)%	(0.2)%	(0.4)%
Reinsurance	(7.4)%	(6.0)%	(2.0)%	(4.9)%	(4.0)%	(5.1)%	(2.3)%
Mortgage	(1.3)%	(0.1)%	(1.8)%	(9.4)%	(9.6)%	(1.0)%	(9.1)%
Total	(2.9)%	(2.0)%	(1.1)%	(4.0)%	(3.9)%	(2.0)%	(3.2)%
Impact on loss ratio:							
Insurance	(0.3)%	(0.4)%	(0.2)%	(0.7)%	(0.7)%	(0.3)%	(0.7)%
Reinsurance	(7.6)%	(8.4)%	(2.1)%	(5.2)%	(4.2)%	(5.9)%	(2.4)%
Mortgage	(1.3)%	(0.1)%	(1.8)%	(9.4)%	(9.6)%	(1.0)%	(9.1)%
Total	(3.0)%	(2.8)%	(1.2)%	(4.1)%	(4.0)%	(2.3)%	(3.4)%
Impact on acquisition expense ratio:							
Insurance	0.1 %	0.1 %	0.1 %	0.3 %	0.1 %	0.1 %	0.3 %
Reinsurance	0.2 %	2.4 %	0.1 %	0.3 %	0.2 %	0.8 %	0.1 %
Mortgage	0.0 %	0.0 %	0.0 %	0.0 %	0.0 %	0.0 %	0.0 %
Total	0.1 %	0.8 %	0.1 %	0.1 %	0.1 %	0.3 %	0.2 %
<b>Estimated net losses incurred from current accident year catastrophic events (2)</b>							
Insurance	\$ 74,365	\$ 85,929	\$ 49,483	\$ 5,531	\$ 26,085	\$ 209,777	\$ 28,704
Reinsurance	128,939	121,263	68,953	24,831	41,948	319,155	54,361
Total	<u>\$ 203,304</u>	<u>\$ 207,192</u>	<u>\$ 118,436</u>	<u>\$ 30,362</u>	<u>\$ 68,033</u>	<u>\$ 528,932</u>	<u>\$ 83,065</u>
Impact on combined ratio:							
Insurance	10.3 %	12.5 %	6.9 %	0.9 %	4.3 %	9.9 %	1.6 %
Reinsurance	23.3 %	25.3 %	12.7 %	6.4 %	11.5 %	20.2 %	5.0 %
Total	12.5 %	13.5 %	7.4 %	2.2 %	5.2 %	11.1 %	2.2 %
<b>Estimated impact of COVID-19 event, net of reinsurance and reinstatement premiums, included in current accident year catastrophic events (3)</b>							
Insurance	\$ 3,442	\$ 78,059	\$ 35,946	\$ —	\$ —	\$ 117,447	\$ —
Reinsurance	8,449	95,039	50,700	—	—	154,188	—
Total	<u>\$ 11,891</u>	<u>\$ 173,098</u>	<u>\$ 86,646</u>	<u>\$ —</u>	<u>\$ —</u>	<u>\$ 271,635</u>	<u>\$ —</u>
Impact on combined ratio:							
Insurance	0.5 %	11.3 %	5.0 %	0.0 %	0.0 %	5.5 %	0.0 %
Reinsurance	1.5 %	19.8 %	9.3 %	0.0 %	0.0 %	9.8 %	0.0 %
Total	0.7 %	11.3 %	5.4 %	0.0 %	0.0 %	5.7 %	0.0 %

(1) Presented on a 'core' basis which excludes amounts related to the 'other' segment (*i.e.*, results of Watford). See 'Comments on Regulation G' for a further discussion of the presentation of 'core' results.

(2) Equals estimated losses from catastrophic events occurring in the current accident year (e.g. natural catastrophes, man-made events, pandemic events), net of reinsurance and reinstatement premiums. As regards the natural catastrophe estimates included within, amounts shown for the insurance segment are for named catastrophic events only, while amounts shown for the reinsurance segment include (i) named events with over \$5 million of losses incurred by its Bermuda and Europe operations and (ii) all catastrophe losses incurred by its U.S. operations. Amounts not applicable for the mortgage segment.

(3) Equals estimated losses for exposures through September 30, 2020 to the COVID-19 global pandemic, net of reinsurance and reinstatement premiums. The amounts represent a subset of the estimated losses for the current accident year catastrophic events.



**Arch Capital Group Ltd. and Subsidiaries**  
**Investment Information — Investable Asset Summary and Investment Portfolio Metrics**

The following table summarizes the Company's investable assets and portfolio metrics (1):

(U.S. Dollars in thousands)	September 30, 2020		June 30, 2020		March 31, 2020		December 31, 2019		September 30, 2019	
<b>Investable assets (1) (2):</b>										
Fixed maturities available for sale, at fair value	\$17,844,866	69.4 %	\$16,557,966	67.5 %	\$16,163,702	72.2 %	\$16,187,651	72.6 %	\$15,831,411	73.4 %
Fixed maturities—fair value option (3)	386,865	1.5 %	375,793	1.5 %	342,241	1.5 %	337,860	1.5 %	345,588	1.6 %
Fixed maturities pledged under securities lending agreements, at fair value	62,749	0.2 %	457,906	1.9 %	177,442	0.8 %	368,510	1.7 %	409,795	1.9 %
Total fixed maturities	<u>18,294,480</u>	<u>71.1 %</u>	<u>17,391,665</u>	<u>70.9 %</u>	<u>16,683,385</u>	<u>74.6 %</u>	<u>16,894,021</u>	<u>75.8 %</u>	<u>16,586,794</u>	<u>76.9 %</u>
Equity securities, at fair value	1,449,208	5.6 %	1,194,874	4.9 %	1,118,734	5.0 %	773,588	3.5 %	506,998	2.4 %
Equity securities—fair value option (3)	30,494	0.1 %	31,197	0.1 %	29,905	0.1 %	42,896	0.2 %	41,436	0.2 %
Equity securities pledged under securities lending agreements, at fair value	—	0.0 %	6,597	0.0 %	—	0.0 %	11,358	0.1 %	10,620	0.0 %
Total equity securities	<u>1,479,702</u>	<u>5.8 %</u>	<u>1,232,668</u>	<u>5.0 %</u>	<u>1,148,639</u>	<u>5.1 %</u>	<u>827,842</u>	<u>3.7 %</u>	<u>559,054</u>	<u>2.6 %</u>
Other investments—fair value option (3)	1,276,867	5.0 %	1,212,788	4.9 %	1,153,737	5.2 %	1,336,920	6.0 %	1,369,554	6.4 %
Investments accounted for using the equity method (4)	1,883,702	7.3 %	1,727,302	7.0 %	1,676,055	7.5 %	1,660,396	7.5 %	1,575,832	7.3 %
Short-term investments available for sale, at fair value	2,039,097	7.9 %	2,277,866	9.3 %	944,531	4.2 %	956,546	4.3 %	751,989	3.5 %
Short-term investments—fair value option (3)	118,313	0.5 %	14,317	0.1 %	52,548	0.2 %	47,711	0.2 %	33,369	0.2 %
Total short-term investments	<u>2,157,410</u>	<u>8.4 %</u>	<u>2,292,183</u>	<u>9.3 %</u>	<u>997,079</u>	<u>4.5 %</u>	<u>1,004,257</u>	<u>4.5 %</u>	<u>785,358</u>	<u>3.6 %</u>
Cash	781,065	3.0 %	746,606	3.0 %	785,704	3.5 %	623,793	2.8 %	799,709	3.7 %
Securities transactions entered into but not settled at the balance sheet date	(148,725)	(0.6)%	(72,018)	(0.3)%	(68,747)	(0.3)%	(61,553)	(0.3)%	(110,213)	(0.5)%
Total investable assets held by the Company	<u>\$25,724,501</u>	<u>100.0 %</u>	<u>\$24,531,194</u>	<u>100.0 %</u>	<u>\$22,375,852</u>	<u>100.0 %</u>	<u>\$22,285,676</u>	<u>100.0 %</u>	<u>\$21,566,088</u>	<u>100.0 %</u>
Average effective duration (in years)	3.21		3.18		3.19		3.40		3.64	
Average S&P/Moody's credit ratings (5)	AA/Aa2		AA/Aa2		AA/Aa2		AA/Aa2		AA/Aa2	
Embedded book yield (before investment expenses)	1.71 %		1.85 %		2.34 %		2.55 %		2.70 %	

(1) Presented on a 'core' basis which excludes amounts related to the 'other' segment (*i.e.*, results of Watford). See 'Comments on Regulation G' for a further discussion of the presentation of 'core' results. Such amounts are summarized as follows:

<b>Investable assets in 'other' segment:</b>					
Cash	\$ 195,333	\$ 107,653	\$ 96,580	\$ 102,437	\$ 80,390
Investments accounted for using the fair value option	1,937,036	1,886,676	1,732,086	1,898,090	2,048,296
Fixed maturities available for sale, at fair value	608,022	649,765	677,869	706,875	639,112
Equity securities, at fair value	52,807	62,443	63,169	65,337	43,487
Securities sold but not yet purchased	(24,909)	(29,289)	(30,076)	(66,257)	(65,736)
Securities transactions entered into but not settled at the balance sheet date	(74,837)	(35,958)	(37,039)	(1,893)	(15,302)
Total investable assets included in 'other' segment	<u>\$ 2,693,452</u>	<u>\$ 2,641,290</u>	<u>\$ 2,502,589</u>	<u>\$ 2,704,589</u>	<u>\$ 2,730,247</u>

(2) This table excludes the collateral received and reinvested and includes the securities pledged under securities lending agreements, at fair value.

(3) Represents investments which are carried at fair value under the fair value option and reflected as "investments accounted for using the fair value option" on the balance sheet.

(4) Changes in the carrying value of investment funds accounted for using the equity method are recorded as "equity in net income (loss) of investment funds accounted for using the equity method" rather than as an unrealized gain or loss component of accumulated other comprehensive income.

(5) Average credit ratings on the Company's investment portfolio on securities with ratings assigned by Standard & Poor's ("S&P") and Moody's Investors Service ("Moody's").

**Arch Capital Group Ltd. and Subsidiaries**  
**Investment Information — Composition of Net Investment Income, Yield and Total Return**

The following table summarizes the Company's net investment income, yield and total return (1):

(U.S. Dollars in thousands, except share data)

	Three Months Ended				Nine Months Ended		
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
<b>Composition of net investment income (1):</b>							
Fixed maturities	\$ 84,608	\$ 91,491	\$ 101,763	\$ 108,885	\$ 109,953	\$ 277,862	\$ 331,939
Equity securities (dividends)	6,659	6,023	5,630	4,134	3,581	18,312	9,321
Short-term investments	1,162	897	3,385	3,464	3,432	5,444	11,178
Other (2)	24,594	17,825	20,479	19,211	24,170	62,898	67,229
Gross investment income	117,023	116,236	131,257	135,694	141,136	364,516	419,667
Investment expenses	(17,166)	(15,205)	(18,229)	(15,788)	(14,262)	(50,600)	(48,506)
Net investment income	<u>\$ 99,857</u>	<u>\$ 101,031</u>	<u>\$ 113,028</u>	<u>\$ 119,906</u>	<u>\$ 126,874</u>	<u>\$ 313,916</u>	<u>\$ 371,161</u>
Per share	\$ 0.24	\$ 0.25	\$ 0.27	\$ 0.29	\$ 0.31	\$ 0.77	\$ 0.90
<b>Investment income yield, at amortized cost (1) (3):</b>							
Pre-tax	1.76 %	1.92 %	2.20 %	2.36 %	2.58 %	1.94 %	2.62 %
After-tax	1.57 %	1.68 %	1.91 %	2.07 %	2.31 %	1.70 %	2.35 %
<b>Total return on investments (1) (4)</b>	2.30 %	3.72 %	(0.86)%	1.07 %	1.00 %	5.19 %	6.20 %

- (1) Presented on a 'core' basis which excludes amounts related to the 'other' segment (*i.e.*, results of Watford). See 'Comments on Regulation G' for a further discussion of the presentation of 'core' results.
- (2) Amounts include dividends and other distributions on investment funds, term loan investments funds held balances, cash balances and other.
- (3) Presented on an annualized basis and excluding the impact of investments for which returns are not included within investment income, such as investments accounted for using the equity method and certain equities.
- (4) Total return on investments includes net investment income, equity in net income or loss of investment funds accounted for using the equity method, net realized gains and losses (excluding changes in allowance for credit losses on non-investment related financial assets) and the change in unrealized gains or losses and is calculated on a pre-tax basis and before investment expenses. See 'Comments on Regulation G' for a further discussion of the presentation of total return on investments.

**Arch Capital Group Ltd. and Subsidiaries**  
**Investment Information — Composition of Fixed Maturities**

The following table summarizes the Company's fixed maturities and fixed maturities pledged under securities lending agreements (1):

(U.S. Dollars in thousands)

	Fair Value	Gross Unrealized Gains	Gross Unrealized Losses	Net Unrealized Gains (Losses)	Allowance for Credit Losses	Amortized Cost	Fair Value / Amortized Cost	Fair Value % of Total
<b>At September 30, 2020</b>								
Corporates	\$ 8,137,582	\$ 382,992	\$ (35,491)	\$ 347,501	\$ (1,389)	\$ 7,791,470	104.4 %	44.5 %
U.S. government and government agencies	4,662,260	38,105	(4,388)	33,717	—	4,628,543	100.7 %	25.5 %
Municipal bonds	525,617	26,873	(877)	25,996	(62)	499,683	105.2 %	2.9 %
Non-U.S. government securities	2,196,827	81,050	(16,135)	64,915	—	2,131,912	103.0 %	12.0 %
Asset-backed securities	1,693,291	29,690	(15,536)	14,154	(1,537)	1,680,674	100.8 %	9.3 %
Commercial mortgage-backed securities	375,510	8,523	(4,660)	3,863	(256)	371,903	101.0 %	2.1 %
Residential mortgage-backed securities	703,393	12,456	(2,328)	10,128	(280)	693,545	101.4 %	3.8 %
Total	<u>\$ 18,294,480</u>	<u>\$ 579,689</u>	<u>\$ (79,415)</u>	<u>\$ 500,274</u>	<u>\$ (3,524)</u>	<u>\$ 17,797,730</u>	102.8 %	100.0 %
<b>At December 31, 2019</b>								
Corporates	\$ 6,561,354	\$ 189,917	\$ (12,752)	\$ 177,165	\$ —	\$ 6,384,189	102.8 %	38.8 %
U.S. government and government agencies	4,632,947	34,892	(9,997)	24,895	—	4,608,052	100.5 %	27.4 %
Municipal bonds	880,119	24,582	(2,213)	22,369	—	857,750	102.6 %	5.2 %
Non-U.S. government securities	1,995,813	45,019	(19,297)	25,722	—	1,970,091	101.3 %	11.8 %
Asset-backed securities	1,547,744	23,403	(4,028)	19,375	—	1,528,369	101.3 %	9.2 %
Commercial mortgage-backed securities	734,244	14,951	(2,330)	12,621	—	721,623	101.7 %	4.3 %
Residential mortgage-backed securities	541,800	9,651	(887)	8,764	—	533,036	101.6 %	3.2 %
Total	<u>\$ 16,894,021</u>	<u>\$ 342,415</u>	<u>\$ (51,504)</u>	<u>\$ 290,911</u>	<u>\$ —</u>	<u>\$ 16,603,110</u>	101.8 %	100.0 %

(1) Presented on a 'core' basis which excludes amounts related to the 'other' segment (*i.e.*, results of Watford). See 'Comments on Regulation G' for a further discussion of the presentation of 'core' results.

**Arch Capital Group Ltd. and Subsidiaries**  
**Investment Information — Credit Quality Distribution and Maturity Profile**

The following table summarizes the credit quality distribution and maturity profile of the Company's fixed maturities and fixed maturities pledged under securities lending agreements (1):

(U.S. Dollars in thousands)

	September 30, 2020		June 30, 2020		March 31, 2020		December 31, 2019		September 30, 2019	
<b>Credit quality distribution of total fixed maturities (2) (3):</b>										
U.S. government and government agencies (4)	\$ 5,360,798	29.3 %	\$ 5,566,339	32.0 %	\$ 4,804,048	28.8 %	\$ 5,215,489	30.9 %	\$ 5,403,271	32.6 %
AAA	3,352,902	18.3 %	3,035,513	17.5 %	3,486,700	20.9 %	3,392,341	20.1 %	3,240,708	19.5 %
AA	2,087,245	11.4 %	1,818,693	10.5 %	1,994,127	12.0 %	2,115,828	12.5 %	1,879,728	11.3 %
A	3,895,053	21.3 %	4,232,245	24.3 %	3,937,053	23.6 %	3,849,458	22.8 %	3,648,581	22.0 %
BBB	2,542,233	13.9 %	1,874,332	10.8 %	1,565,912	9.4 %	1,495,467	8.9 %	1,576,052	9.5 %
BB	504,570	2.8 %	406,342	2.3 %	366,759	2.2 %	355,803	2.1 %	362,117	2.2 %
B	231,774	1.3 %	211,638	1.2 %	205,181	1.2 %	216,663	1.3 %	210,824	1.3 %
Lower than B	54,118	0.3 %	51,273	0.3 %	51,712	0.3 %	56,865	0.3 %	61,205	0.4 %
Not rated	265,787	1.5 %	195,290	1.1 %	271,893	1.6 %	196,107	1.2 %	204,308	1.2 %
Total fixed maturities, at fair value	\$ 18,294,480	100.0 %	\$ 17,391,665	100.0 %	\$ 16,683,385	100.0 %	\$ 16,894,021	100.0 %	\$ 16,586,794	100.0 %
<b>Maturity profile of total fixed maturities (2):</b>										
Due in one year or less	\$ 314,243	1.7 %	\$ 350,520	2.0 %	\$ 459,191	2.8 %	\$ 443,914	2.6 %	\$ 571,738	3.4 %
Due after one year through five years	9,744,246	53.3 %	9,730,262	55.9 %	9,381,924	56.2 %	9,875,925	58.5 %	9,924,224	59.8 %
Due after five years through ten years	4,861,677	26.6 %	4,342,055	25.0 %	3,416,637	20.5 %	3,296,839	19.5 %	3,052,774	18.4 %
Due after 10 years	602,120	3.3 %	467,099	2.7 %	555,462	3.3 %	453,555	2.7 %	229,085	1.4 %
	15,522,286	84.8 %	14,889,936	85.6 %	13,813,214	82.8 %	14,070,233	83.3 %	13,777,821	83.1 %
Mortgage-backed securities	703,393	3.8 %	593,799	3.4 %	449,024	2.7 %	541,800	3.2 %	528,227	3.2 %
Commercial mortgage-backed securities	375,510	2.1 %	396,813	2.3 %	781,417	4.7 %	734,244	4.3 %	754,306	4.5 %
Asset-backed securities	1,693,291	9.3 %	1,511,117	8.7 %	1,639,730	9.8 %	1,547,744	9.2 %	1,526,440	9.2 %
Total fixed maturities, at fair value	\$ 18,294,480	100.0 %	\$ 17,391,665	100.0 %	\$ 16,683,385	100.0 %	\$ 16,894,021	100.0 %	\$ 16,586,794	100.0 %

- (1) Presented on a 'core' basis which excludes amounts related to the 'other' segment (*i.e.*, results of Watford). See 'Comments on Regulation G' for a further discussion of the presentation of 'core' results.
- (2) This table excludes the collateral received and reinvested and includes the fixed maturities pledged under securities lending agreements, at fair value.
- (3) For individual fixed maturities, S&P ratings are used. In the absence of an S&P rating, ratings from Moody's are used, followed by ratings from Fitch Ratings.
- (4) Includes U.S. government-sponsored agency mortgage backed securities and agency commercial mortgage backed securities.

**Arch Capital Group Ltd. and Subsidiaries**  
**Investment Information — Analysis of Corporate Exposures**

The following table summarizes the Company's corporate bonds by sector (1):

(U.S. Dollars in thousands)	September 30, 2020		June 30, 2020		March 31, 2020		December 31, 2019		September 30, 2019	
<b>Sector:</b>										
Industrials	\$ 5,303,089	65.2 %	\$ 4,650,615	63.6 %	\$ 3,903,927	58.5 %	\$ 3,639,891	55.5 %	\$ 3,588,041	55.2 %
Financials	2,156,871	26.5 %	2,164,859	29.6 %	2,400,415	35.9 %	2,645,393	40.3 %	2,612,883	40.2 %
Utilities	562,939	6.9 %	409,778	5.6 %	321,022	4.8 %	224,615	3.4 %	237,042	3.6 %
Covered bonds	2,072	0.0 %	1,974	0.0 %	2,662	0.0 %	3,520	0.1 %	2,543	0.0 %
All other (2)	112,611	1.4 %	82,190	1.1 %	49,981	0.7 %	47,935	0.7 %	54,145	0.8 %
<b>Total</b>	<b>\$ 8,137,582</b>	<b>100.0 %</b>	<b>\$ 7,309,416</b>	<b>100.0 %</b>	<b>\$ 6,678,007</b>	<b>100.0 %</b>	<b>\$ 6,561,354</b>	<b>100.0 %</b>	<b>\$ 6,494,654</b>	<b>100.0 %</b>
<b>Credit quality distribution (3):</b>										
AAA	\$ 291,154	3.6 %	\$ 76,923	1.1 %	\$ 86,420	1.3 %	\$ 95,559	1.5 %	\$ 95,340	1.5 %
AA	1,068,945	13.1 %	894,495	12.2 %	982,202	14.7 %	1,035,817	15.8 %	1,021,056	15.7 %
A	3,478,591	42.7 %	3,834,480	52.5 %	3,480,871	52.1 %	3,392,134	51.7 %	3,240,957	49.9 %
BBB	2,427,829	29.8 %	1,773,620	24.3 %	1,451,807	21.7 %	1,355,868	20.7 %	1,450,372	22.3 %
BB	478,445	5.9 %	388,112	5.3 %	348,848	5.2 %	334,264	5.1 %	339,952	5.2 %
B	224,644	2.8 %	205,342	2.8 %	198,828	3.0 %	207,713	3.2 %	201,352	3.1 %
Lower than B	30,423	0.4 %	27,865	0.4 %	22,869	0.3 %	22,233	0.3 %	26,969	0.4 %
Not rated	137,551	1.7 %	108,579	1.5 %	106,162	1.6 %	117,766	1.8 %	118,656	1.8 %
<b>Total</b>	<b>\$ 8,137,582</b>	<b>100.0 %</b>	<b>\$ 7,309,416</b>	<b>100.0 %</b>	<b>\$ 6,678,007</b>	<b>100.0 %</b>	<b>\$ 6,561,354</b>	<b>100.0 %</b>	<b>\$ 6,494,654</b>	<b>100.0 %</b>

- (1) Presented on a 'core' basis which excludes amounts related to the 'other' segment (*i.e.*, results of Watford). See 'Comments on Regulation G' for a further discussion of the presentation of 'core' results.
- (2) Includes sovereign securities, supranational securities and other.
- (3) For individual fixed maturities, S&P ratings are used. In the absence of an S&P rating, ratings from Moody's are used, followed by ratings from Fitch Ratings.

The following table summarizes the Company's top ten exposures to fixed income corporate issuers by fair value at September 30, 2020 (1):

(U.S. Dollars in thousands)	Fair Value	% of Asset Class	% of Investable Assets	Credit Quality (2)
<b>Issuer:</b>				
Bank of America Corporation	\$ 320,603	3.9 %	1.2 %	A-/A2
Wells Fargo & Company	259,752	3.2 %	1.0 %	BBB+/A2
Nestlé S.A.	228,219	2.8 %	0.9 %	AA-/Aa3
JPMorgan Chase & Co.	227,543	2.8 %	0.9 %	A-/A2
Johnson & Johnson	220,521	2.7 %	0.9 %	AAA/Aaa
Apple Inc.	169,793	2.1 %	0.7 %	AA+/Aa1
Citigroup Inc.	145,195	1.8 %	0.6 %	BBB+/A3
Morgan Stanley	134,680	1.7 %	0.5 %	BBB+/A3
Comcast Corporation	120,210	1.5 %	0.5 %	A-/A3
BP p.l.c.	120,177	1.5 %	0.5 %	A-/A1
<b>Total</b>	<b>\$ 1,946,693</b>	<b>23.9 %</b>	<b>7.6 %</b>	

- (1) Presented on a 'core' basis which excludes amounts related to the 'other' segment (*i.e.*, results of Watford). See 'Comments on Regulation G' for a further discussion of the presentation of 'core' results.
- (2) Average credit ratings assigned by S&P and Moody's, respectively.

**Arch Capital Group Ltd. and Subsidiaries**  
**Investment Information — Structured Securities**

The following table provides the composition of the Company's structured securities at September 30, 2020 (1):

(U.S. Dollars in thousands)

	<u>Agencies</u>	<u>AAA</u>	<u>AA</u>	<u>A</u>	<u>BBB</u>	<u>Non- Investment Grade</u>	<u>Total</u>
Residential mortgage-backed securities	\$ 669,672	\$ 3,148	\$ 320	\$ —	\$ 903	\$ 29,350	\$ 703,393
Commercial mortgage-backed securities	28,865	269,888	29,947	12,270	14,669	19,871	375,510
Asset-backed securities	—	1,171,008	100,096	256,038	52,024	114,125	1,693,291
Total	<u>\$ 698,537</u>	<u>\$ 1,444,044</u>	<u>\$ 130,363</u>	<u>\$ 268,308</u>	<u>\$ 67,596</u>	<u>\$ 163,346</u>	<u>\$ 2,772,194</u>

(1) Presented on a 'core' basis which excludes amounts related to the 'other' segment (*i.e.*, results of Watford). See 'Comments on Regulation G' for a further discussion of the presentation of 'core' results.

## Arch Capital Group Ltd. and Subsidiaries Comments on Regulation G

Throughout this financial supplement, the Company presents its operations in the way it believes will be the most meaningful and useful to investors, analysts, rating agencies and others who use the Company's financial information in evaluating the performance of the Company. This presentation includes the use of after-tax operating income available to Arch common shareholders, which is defined as net income available to Arch common shareholders, excluding net realized gains or losses (which includes changes in the allowance for credit losses on financial assets and net impairment losses recognized in earnings), equity in net income or loss of investment funds accounted for using the equity method, net foreign exchange gains or losses, and transaction costs and other, net of income taxes, and the use of annualized operating return on average common equity. The presentation of after-tax operating income available to Arch common shareholders and annualized operating return on average common equity are non-GAAP financial measures as defined in Regulation G. The reconciliation of such measures to net income available to Arch common shareholders and annualized return on average common equity (the most directly comparable GAAP financial measures) in accordance with Regulation G is included on the following page.

The Company believes that net realized gains or losses, equity in net income or loss of investment funds accounted for using the equity method, net foreign exchange gains or losses and transaction costs and other in any particular period are not indicative of the performance of, or trends in, the Company's business performance. Although net realized gains or losses, equity in net income or loss of investment funds accounted for using the equity method and net foreign exchange gains or losses are an integral part of the Company's operations, the decision to realize investment gains or losses, the recognition of the change in the carrying value of investments accounted for using the fair value option in net realized gains or losses, the recognition of equity in net income or loss of investment funds accounted for using the equity method and the recognition of foreign exchange gains or losses are independent of the insurance underwriting process and result, in large part, from general economic and financial market conditions. Furthermore, certain users of the Company's financial information believe that, for many companies, the timing of the realization of investment gains or losses is largely opportunistic. In addition, changes in the allowance for credit losses and net impairment losses recognized in earnings on the Company's investments represent other-than-temporary declines in expected recovery values on securities without actual realization. The use of the equity method on certain of the Company's investments in certain funds that invest in fixed maturity securities is driven by the ownership structure of such funds (either limited partnerships or limited liability companies). In applying the equity method, these investments are initially recorded at cost and are subsequently adjusted based on the Company's proportionate share of the net income or loss of the funds (which include changes in the fair value of the underlying securities in the funds). This method of accounting is different from the way the Company accounts for its other fixed maturity securities and the timing of the recognition of equity in net income or loss of investment funds accounted for using the equity method may differ from gains or losses in the future upon sale or maturity of such investments. Transaction costs and other include advisory, financing, legal, severance, incentive compensation and other transaction costs related to acquisitions and Watford's non-recurring listing expenses. The Company believes that transaction costs and other, due to their non-recurring nature, are not indicative of the performance of, or trends in, the Company's business performance. Due to these reasons, the Company excludes net realized gains or losses, equity in net income or loss of investment funds accounted for using the equity method, net foreign exchange gains or losses and transaction costs and other from the calculation of after-tax operating income or loss available to Arch common shareholders.

The Company believes that showing net income available to Arch common shareholders exclusive of the items referred to above reflects the underlying fundamentals of the Company's business since the Company evaluates the performance of and manages its business to produce an underwriting profit. In addition to presenting net income available to Arch common shareholders, the Company believes that this presentation enables investors and other users of the Company's financial information to analyze the Company's performance in a manner similar to how the Company's management analyzes performance. The Company also believes that this measure follows industry practice and, therefore, allows the users of the Company's financial information to compare the Company's performance with its industry peer group. The Company believes that the equity analysts and certain rating agencies which follow the Company and the insurance industry as a whole generally exclude these items from their analyses for the same reasons.

In addition, the Company's presentation includes the use of information prepared on a 'core' basis, which excludes amounts related to the 'other' segment (i.e., results of Watford). Information provided on a 'core' basis are non-GAAP financial measures as defined in Regulation G. Pursuant to generally accepted accounting principles, Watford is considered a variable interest entity and the Company concluded that it is the primary beneficiary of Watford. As such, the Company consolidates the results of Watford in its consolidated financial statements, although it only owns approximately 13% of Watford's outstanding common equity. Watford has its own management and board of directors that is responsible for its own results and profitability. In addition, the Company does not guarantee or provide credit support for Watford. Because Watford is an independent company, the assets of Watford can be used only to settle obligations of Watford and Watford is solely responsible for its own liabilities and commitments. The Company's financial exposure to Watford is limited to its investment in Watford's senior notes, common and preferred shares and counterparty credit risk (mitigated by collateral) arising from the reinsurance transactions. The Company believes that presenting information on a 'core' basis enables investors and other users of the Company's financial information to analyze the Company's performance in a manner similar to how the Company's management analyzes performance. See 'Segment Information' for a further discussion of segment results and a reconciliation of core and consolidated results.

The Company's segment information includes the presentation of consolidated underwriting income or loss and a subtotal of underwriting income or loss on a 'core' basis. Such measures represent the pre-tax profitability of the Company's underwriting operations and include net premiums earned plus other underwriting income, less losses and loss adjustment expenses, acquisition expenses and other operating expenses. Other operating expenses include those operating expenses that are incremental and/or directly attributable to the Company's individual underwriting operations. Underwriting income or loss does not incorporate items included in the Company's corporate (non-underwriting) segment. While these measures are presented in the Segment Information footnote to the Company's Consolidated Financial Statements, they are considered non-GAAP financial measures when presented elsewhere on a consolidated basis. The reconciliations of underwriting income or loss to income before income taxes (the most directly comparable GAAP financial measure) on a consolidated basis and a 'core' basis, in accordance with Regulation G, is shown on pages 10 to 13.

In addition, the Company's segment information includes the use of a combined ratio excluding catastrophic activity and prior year development, for the insurance and reinsurance segments, and a combined ratio excluding prior year development, for the mortgage segment. These ratios are non-GAAP financial measures as defined in Regulation G. The reconciliation of such measures to the combined ratio (the most directly comparable GAAP financial measure) in accordance with Regulation G are shown on the individual segment pages. The Company's management utilizes the adjusted combined ratios excluding current accident year catastrophic events and favorable or adverse development in prior year loss reserves in its analysis of the underwriting performance of each of its underwriting segments.

Total return on investments includes investment income, equity in net income or loss of investment funds accounted for using the equity method, net realized gains and losses (excluding changes in the allowance for credit losses on non-investment related financial assets) and the change in unrealized gains and losses generated by Arch's investment portfolio. Total return is calculated on a pre-tax basis and before investment expenses, excludes amounts reflected in the 'other' segment, and reflects the effect of financial market conditions along with foreign currency fluctuations. Management uses total return on investments as a key measure of the return generated to Arch common shareholders, and compares the return generated by the Company's investment portfolio against benchmark returns during the periods presented.

**Arch Capital Group Ltd. and Subsidiaries**  
**Operating Income Reconciliation and Annualized Operating Return on Average Common Equity**

The following table summarizes the Company's consolidated financial data, including a reconciliation of net income (loss) available to Arch common shareholders to after-tax operating income (loss) available to Arch common shareholders and related diluted per share results. Each line item reflects the impact of the Company's ownership of Watford's outstanding common equity:

(U.S. Dollars in thousands, except share data)

	Three Months Ended				Nine Months Ended		
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
Net income available to Arch common shareholders	\$ 408,636	\$ 288,418	\$ 133,714	\$ 315,981	\$ 382,050	\$ 830,768	\$ 1,278,726
Net realized (gains) losses	(219,726)	(406,645)	109,364	(32,966)	(77,959)	(517,007)	(316,882)
Equity in net (income) loss of investment funds accounted for using the equity method	(126,735)	65,119	4,209	(27,139)	(17,130)	(57,407)	(96,533)
Net foreign exchange (gains) losses	39,462	42,032	(64,491)	39,832	(30,160)	17,003	(29,100)
Transaction costs and other	1,674	977	2,595	9,081	1,995	5,246	5,363
Income tax expense (benefit) (1)	17,010	26,713	4,365	3,568	2,156	48,088	12,708
After-tax operating income available to Arch common shareholders	<u>\$ 120,321</u>	<u>\$ 16,614</u>	<u>\$ 189,756</u>	<u>\$ 308,357</u>	<u>\$ 260,952</u>	<u>\$ 326,691</u>	<u>\$ 854,282</u>
<b>Diluted per common share results:</b>							
Net income available to Arch common shareholders	\$ 1.00	\$ 0.71	\$ 0.32	\$ 0.76	\$ 0.92	\$ 2.02	\$ 3.11
Net realized (gains) losses	(0.54)	(1.00)	0.27	(0.08)	(0.19)	(1.25)	(0.77)
Equity in net (income) loss of investment funds accounted for using the equity method	(0.31)	0.16	0.01	(0.07)	(0.04)	(0.14)	(0.23)
Net foreign exchange (gains) losses	0.10	0.10	(0.16)	0.10	(0.07)	0.04	(0.07)
Transaction costs and other	0.00	0.00	0.01	0.02	0.00	0.01	0.01
Income tax expense (benefit) (1)	0.04	0.07	0.01	0.01	0.01	0.12	0.03
After-tax operating income available to Arch common shareholders	<u>\$ 0.29</u>	<u>\$ 0.04</u>	<u>\$ 0.46</u>	<u>\$ 0.74</u>	<u>\$ 0.63</u>	<u>\$ 0.80</u>	<u>\$ 2.08</u>
Weighted average common shares and common share equivalents outstanding - diluted	409,194,657	408,119,681	414,033,570	414,124,920	413,180,201	410,314,897	410,807,402
Beginning common shareholders' equity	\$ 11,211,825	\$ 10,587,244	\$ 10,717,371	\$ 10,378,096	\$ 9,977,352	\$ 10,717,371	\$ 8,659,827
Ending common shareholders' equity	11,671,997	11,211,825	10,587,244	10,717,371	10,378,096	11,671,997	10,378,096
Average common shareholders' equity	<u>\$ 11,441,911</u>	<u>\$ 10,899,535</u>	<u>\$ 10,652,308</u>	<u>\$ 10,547,734</u>	<u>\$ 10,177,724</u>	<u>\$ 11,194,684</u>	<u>\$ 9,518,962</u>
Annualized return on average common equity	14.3 %	10.6 %	5.0 %	12.0 %	15.0 %	9.9 %	17.9 %
Annualized operating return on average common equity	4.2 %	0.6 %	7.1 %	11.7 %	10.3 %	3.9 %	12.0 %

- (1) Income tax expense on net realized gains or losses (which includes changes in the allowance for credit losses on financial assets and net impairment losses recognized in earnings), equity in net income (loss) of investment funds accounted for using the equity method, net foreign exchange gains or losses and transaction costs and other reflects the relative mix reported by jurisdiction and the varying tax rates in each jurisdiction.



**Arch Capital Group Ltd. and Subsidiaries**  
**Operating Income and Effective Tax Rate Calculations**

The following table provides a reconciliation of income (loss) before income taxes to after-tax operating income (loss) available to Arch common shareholders and an analysis of the effective tax rate on pre-tax operating income (loss) available to Arch common shareholders:

(U.S. Dollars in thousands)

	Three Months Ended				Nine Months Ended		
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
<b>Arch Operating Income Components (1):</b>							
Income before income taxes	\$ 433,815	\$ 302,474	\$ 205,953	\$ 355,837	\$ 430,554	\$ 942,242	\$ 1,431,600
Net realized (gains) losses	(210,984)	(385,089)	72,109	(31,836)	(80,014)	(523,964)	(316,201)
Equity in net (income) loss of investment funds accounted for using the equity method	(126,735)	65,119	4,209	(27,139)	(17,130)	(57,407)	(96,533)
Net foreign exchange (gains) losses	38,681	42,438	(63,307)	38,031	(29,794)	17,812	(28,779)
Transaction costs and other	792	43	2,538	9,081	1,995	3,373	5,363
Pre-tax operating income	135,569	24,985	221,502	343,974	305,611	382,056	995,450
Arch share of 'other' segment operating income (loss) (2)	1,792	1,798	2,237	(1,450)	1,704	5,827	5,789
Pre-tax operating income available to Arch (b)	137,361	26,783	223,739	342,524	307,315	387,883	1,001,239
Income tax expense (a)	(6,637)	234	(23,580)	(23,764)	(35,960)	(29,983)	(115,748)
After-tax operating income available to Arch	130,724	27,017	200,159	318,760	271,355	357,900	885,491
Preferred dividends	(10,403)	(10,403)	(10,403)	(10,403)	(10,403)	(31,209)	(31,209)
After-tax operating income available to Arch common shareholders	\$ 120,321	\$ 16,614	\$ 189,756	\$ 308,357	\$ 260,952	\$ 326,691	\$ 854,282
Effective tax rate on pre-tax operating income (loss) available to Arch (a)/(b)	4.8 %	(0.9)%	10.5 %	6.9 %	11.7 %	7.7 %	11.6 %

(1) Line items are presented on a 'core' basis, excluding amounts related to the 'other' segment (*i.e.*, results of Watford). See 'Comments on Regulation G' for a further discussion of the presentation of 'core' results.

(2) Balances in the 'other' segment and a calculation of Arch's share of the 'other' segment operating income (loss) is as follows:

(U.S. Dollars in thousands)

	Three Months Ended				Nine Months Ended		
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020	September 30, 2019
<b>Balances in 'other' segment:</b>							
Underwriting income (loss)	\$ (8,273)	\$ (9,129)	\$ (6,010)	\$ (37,251)	\$ (4,443)	\$ (23,412)	\$ (14,414)
Net investment income	28,655	30,454	32,125	34,357	34,614	91,234	102,314
Interest expense	(5,119)	(6,009)	(7,310)	(7,558)	(8,091)	(18,438)	(19,579)
Preferred dividends	(993)	(1,036)	(1,096)	(1,131)	(6,600)	(3,125)	(15,778)
Pre-tax operating income (loss) available to common shareholders	14,270	14,280	17,709	(11,583)	15,480	46,259	52,543
Arch ownership	13 %	13 %	13 %	13 %	11 %	13 %	11 %
Arch share of 'Other' segment operating income (loss) (3)	\$ 1,792	\$ 1,798	\$ 2,237	\$ (1,450)	\$ 1,704	\$ 5,827	\$ 5,789

(3) Excludes amounts attributable to net realized gains or losses and net foreign exchange gains or losses in the 'other' segment (see 'Segment Information').

**Arch Capital Group Ltd. and Subsidiaries**  
**Capital Structure and Share Repurchase Activity**

The following table provides an analysis of the Company's capital structure (1):

(U.S. Dollars in thousands, except share data)

	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019
<b>Debt:</b>					
Arch Capital senior notes, due May 1, 2034 (\$300,000 principal, 7.35%)	\$ 300,000	\$ 300,000	\$ 300,000	\$ 300,000	\$ 300,000
Arch-U.S. senior notes, due Nov. 1, 2043 (\$500,000 principal, 5.144%) (2)	500,000	500,000	500,000	500,000	500,000
Arch Finance senior notes, due December 15, 2026 (\$500,000 principal, 4.011%) (3)	500,000	500,000	500,000	500,000	500,000
Arch Finance senior notes, due December 15, 2046 (\$450,000 principal, 5.031%) (3)	450,000	450,000	450,000	450,000	450,000
Arch Capital senior notes, due June 30, 2050 (\$1,000,000 principal, 3.635%)	1,000,000	1,000,000	—	—	—
Deferred debt costs on senior notes	(26,811)	(26,820)	(15,616)	(15,791)	(15,963)
Revolving credit agreement borrowings, due October 26, 2021 (variable)	—	—	—	—	—
<b>Total debt</b>	<b>\$ 2,723,189</b>	<b>\$ 2,723,180</b>	<b>\$ 1,734,384</b>	<b>\$ 1,734,209</b>	<b>\$ 1,734,037</b>
<b>Shareholders' equity available to Arch:</b>					
Series E non-cumulative preferred shares (5.25%)	450,000	450,000	450,000	450,000	450,000
Series F non-cumulative preferred shares (5.45%)	330,000	330,000	330,000	330,000	330,000
Common shareholders' equity (a)	11,671,997	11,211,825	10,587,244	10,717,371	10,378,096
<b>Total shareholders' equity available to Arch</b>	<b>\$ 12,451,997</b>	<b>\$ 11,991,825</b>	<b>\$ 11,367,244</b>	<b>\$ 11,497,371</b>	<b>\$ 11,158,096</b>
<b>Total capital available to Arch</b>	<b>\$ 15,175,186</b>	<b>\$ 14,715,005</b>	<b>\$ 13,101,628</b>	<b>\$ 13,231,580</b>	<b>\$ 12,892,133</b>
Common shares outstanding, net of treasury shares (b)	406,018,958	405,970,251	405,609,867	405,619,201	405,230,531
Book value per common share (4) (a)/(b)	<b>\$ 28.75</b>	<b>\$ 27.62</b>	<b>\$ 26.10</b>	<b>\$ 26.42</b>	<b>\$ 25.61</b>
<b>Leverage ratios:</b>					
Senior notes/total capital available to Arch	17.9 %	18.5 %	13.2 %	13.1 %	13.5 %
Revolving credit agreement borrowings/total capital available to Arch	— %	— %	— %	— %	— %
Debt/total capital available to Arch	17.9 %	18.5 %	13.2 %	13.1 %	13.5 %
Preferred/total capital available to Arch	5.1 %	5.3 %	6.0 %	5.9 %	6.1 %
Debt and preferred/total capital available to Arch	23.1 %	23.8 %	19.2 %	19.0 %	19.5 %

- (1) Presented on a 'core' basis which excludes amounts related to the 'other' segment (*i.e.*, results of Watford). See 'Comments on Regulation G' for a further discussion of the presentation of 'core' results.  
(2) Issued by Arch Capital Group (U.S.) Inc. ("Arch-U.S."), a wholly owned subsidiary of Arch Capital, and fully and unconditionally guaranteed by Arch Capital.  
(3) Issued by Arch Capital Finance LLC ("Arch Finance"), a wholly owned subsidiary of Arch U.S. MI Holdings Inc., and fully and unconditionally guaranteed by Arch Capital.  
(4) Excludes the effects of stock options, restricted and performance stock units outstanding.

The following table provides the impact of share repurchases under the Company's share repurchase program:

(U.S. Dollars in thousands except share data)

	Three Months Ended					Cumulative
	September 30, 2020	June 30, 2020	March 31, 2020	December 31, 2019	September 30, 2019	September 30, 2020
<b>Effect of share repurchases:</b>						
Aggregate cost of shares repurchased	\$ —	\$ —	\$ 75,486	\$ —	\$ —	\$ 4,043,780
Shares repurchased	—	—	2,599,388	—	—	388,941,368
Average price per share repurchased	\$ —	\$ —	\$ 29.04	\$ —	\$ —	\$ 10.40
Remaining share repurchase authorization (1)						<b>\$ 924,514</b>

- (1) Repurchases under the share repurchase authorization may be effected from time to time in open market or privately negotiated transactions through December 31, 2021.