



**Management's Discussion & Analysis of
Financial Condition and Results of Operations**

Quarter Ended December 31, 2019

Management's Discussion & Analysis of Financial Condition and Results of Operations

The following discussion highlights significant factors influencing results of operations and changes in financial position of Liberty Mutual Holding Company Inc., the parent corporation of the Liberty Mutual Insurance group of entities (the "Company" or "LMHC"), for the three and twelve months ended December 31, 2019 and 2018. This Management's Discussion & Analysis of Financial Condition and Results of Operations ("MD&A") should be read in conjunction with the Company's December 31, 2019 Audited Consolidated Financial Statements located on the Company's Investor Relations website at www.libertymutualgroup.com/investors. The Company's discussions related to net income are presented in conformity with U.S. generally accepted accounting principles ("GAAP") on an after-tax basis. All other discussions are presented on a pre-tax GAAP basis, unless otherwise noted. Further, the Company notes that it may make material information regarding the Company available to the public, from time to time, via the Company's Investor Relations website at www.libertymutualgroup.com/investors (or any successor site).

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Cautionary Statement Regarding Forward Looking Statements

This report contains forward looking statements that are intended to enhance the reader's ability to assess the Company's future financial and business performance. Forward looking statements include, but are not limited to, statements that represent the Company's beliefs concerning future operations, strategies, financial results or other developments, and contain words and phrases such as "may," "expects," "should," "believes," "anticipates," "estimates," "intends" or similar expressions. Because these forward-looking statements are based on estimates and assumptions that are subject to significant business, economic and competitive uncertainties, many of which are beyond the Company's control or are subject to change, actual results could be materially different.

Some of the factors that could cause actual results to differ include, but are not limited to the following: the occurrence of catastrophic events (including terrorist acts, hurricanes, hail, tornados, tsunamis, earthquakes, floods, snowfall and winter conditions); inadequacy of loss reserves; adverse developments involving asbestos, environmental or toxic tort claims and litigation; adverse developments in the cost, availability or ability to collect reinsurance; disruptions to the Company's relationships with its independent agents and brokers; financial disruption or a prolonged economic downturn; the performance of the Company's investment portfolios; a rise in interest rates; risks inherent in the Company's alternative investments in private limited partnerships ("LP"), limited liability companies ("LLC"), commercial mortgages and direct investments in natural resources; difficulty in valuing certain of the Company's investments; subjectivity in the determination of the amount of impairments taken on the Company's investments; unfavorable outcomes from litigation and other legal proceedings, including the effects of emerging claim and coverage issues and investigations by state and federal authorities; the Company's exposure to credit risk in certain of its business operations; the Company's inability to obtain price increases or maintain market share due to competition or otherwise; inadequacy of the Company's pricing models; changes to insurance laws and regulations; changes in the amount of statutory capital that the Company must hold to maintain its financial strength and credit ratings; regulatory restrictions on the Company's ability to change its methods of marketing and underwriting in certain areas; assessments for guaranty funds and mandatory pooling arrangements; a downgrade in the Company's claims-paying and financial strength ratings; the ability of the Company's subsidiaries to pay dividends to the Company; inflation, including inflation in medical costs and automobile and home repair costs; the cyclicity of the property and casualty insurance industry; political, legal, operational and other risks faced by the Company's international business; potentially high severity losses involving the Company's surety products; loss or significant restriction on the Company's ability to use credit scoring in the pricing and underwriting of personal lines policies; inadequacy of the Company's controls to ensure compliance with legal and regulatory standards; changes in federal or state tax laws; risks arising out of the Company's securities lending program; the Company's utilization of information technology systems and its implementation of technology innovations; difficulties with technology or data security; insufficiency of the Company's business continuity plan in the event of a disaster; the Company's ability to successfully integrate operations, personnel and technology from its acquisitions; insufficiency of the Company's enterprise risk management models and modeling techniques; the Company's ability to identify and accurately assess complex and emerging risks, and changing climate conditions. The Company's forward-looking statements speak only as of the date of this report or as of the date they are made and should be regarded solely as the Company's current plans, estimates and beliefs. For a detailed discussion of these and other cautionary statements, visit the Company's Investor Relations website at www.libertymutualgroup.com/investors. The Company undertakes no obligation to update these forward-looking statements.

The United Kingdom's withdrawal from the European Union occurred on January 31, 2020. That date also marks the beginning of a transition period during which the United Kingdom will remain in the EU's customs union and single market but will negotiate with the European Union regarding the terms of the future UK-EU relationship. The withdrawal could have a negative impact on economic conditions in the United Kingdom and could result in unintended consequences in other countries as well. The Company acknowledges that there are risks and uncertainties associated with the United Kingdom's withdrawal from the European Union and has developed a course of action related to the withdrawal but will continue to monitor the negotiations as they develop.

EXECUTIVE SUMMARY

The following highlights do not address all of the matters covered in the other sections of Management's Discussion & Analysis of Financial Condition and Results of Operations or contain all of the information that may be important to the investing public. This summary should be read in conjunction with the other sections of Management's Discussion & Analysis of Financial Condition and Results of Operations and the Company's 2019 Audited Consolidated Financial Statements.

Consolidated Results of Operations

\$ in Millions	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
Net written premium	\$9,751	\$9,406	3.7%	\$39,814	\$39,100	1.8%
Pre-tax operating (loss) income before partnerships, LLC and other equity method income	(417)	277	NM	581	1,453	(60.0)
Partnerships, LLC and other equity method income	145	285	(49.1)	701	978	(28.3)
Net realized gains (losses)	50	(139)	NM	443	(147)	NM
Unit linked life insurance	(34)	-	NM	(123)	-	NM
Ironshore Inc. ("Ironshore") acquisition & integration costs	(12)	(55)	(78.2)	(28)	(86)	(67.4)
Restructuring costs	(64)	(37)	73.0	(70)	(94)	(25.5)
Loss on extinguishment of debt	-	-	-	(49)	(8)	NM
Discontinued operations, net of tax	-	(2)	(100.0)	(50)	528	NM
Consolidated net (loss) income	(299)	249	NM	1,045	2,161	(51.6)
Less: Net income attributable to non-controlling interest	1	-	NM	1	1	-
Net (loss) income attributable to LMHC	(300)	249	NM	1,044	2,160	(51.7)
Net (loss) income attributable to LMHC excluding unrealized impact ¹	(383)	249	NM	768	2,160	(64.4)
Cash flow provided by continuing operations	\$438	\$1,136	(61.4%)	\$3,477	\$3,548	(2.0%)

¹ Excludes unrealized gains on equity securities, unit linked life insurance, and the corresponding tax impact.
NM = Not Meaningful

	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change (Points)	2019	2018	Change (Points)
Combined ratio before catastrophes ¹ , net incurred losses attributable to prior years ² , and current accident year re-estimation ³	97.3%	95.3%	2.0	95.4%	94.4%	1.0
Combined ratio ⁴	106.7%	100.4%	6.3	101.7%	99.2%	2.5

1 Catastrophes are defined as a natural catastrophe or terror event exceeding \$25 million in estimated ultimate losses, net of reinsurance, and before taxes. Catastrophe losses, where applicable, include the impact of accelerated earned catastrophe premiums and earned reinstatement premiums.

2 Net incurred losses attributable to prior years is defined as incurred losses attributable to prior years (including prior year losses related to catastrophes, prior year catastrophe reinstatement premium, and prior year commission expense) including earned premium attributable to prior years.

3 Re-estimation of the current accident year loss reserves for the nine months ended September 30, 2019.

4 The combined ratio, expressed as a percentage, is a measure of underwriting profitability. This measure should only be used in conjunction with, and not in lieu of, underwriting income and may not be comparable to other performance measures used by the Company's competitors. The combined ratio is computed as the sum of the following property and casualty ratios: the ratio of claims and claim adjustment expense less managed care income to earned premium; the ratio of insurance operating costs plus amortization of deferred policy acquisition costs less third-party administration income and fee income (primarily related to the Company's involuntary market servicing carrier operations) and installment charges to earned premium; and the ratio of policyholder dividends to earned premium. Provisions for uncollectible premium and reinsurance are not included in the combined ratio unless related to an asbestos and environmental commutation and certain other run off. Restructuring and Ironshore acquisition and integration costs are not included in the combined ratio.

	As of December 31,	As of December 31,	
\$ in Millions	2019	2018	Change
Short-term debt	\$-	\$-	-%
Long-term debt	8,200	8,233	(0.4)
Total debt	\$8,200	\$8,233	(0.4%)
Unassigned equity	\$24,957	\$24,114	3.5%
Accumulated other comprehensive loss	(1,366)	(3,379)	(59.6)
Non-controlling interest	28	27	3.7
Total equity	\$23,619	\$20,762	13.8%

Subsequent Events

On February 6, 2020, the Company's subsidiary, Liberty UK and Europe Holdings Limited ("UKH"), closed on the sale of its entire 99.99% interest in its Russian insurance affiliate, Liberty Insurance (JSC), to PJSC Sovcombank.

Management has assessed material subsequent events through February 27, 2020, the date the financial statements were available to be issued.

CONSOLIDATED RESULTS OF OPERATIONS

The Company has identified consolidated pre-tax operating income (“PTOI”), and PTOI before partnerships, LLC and other equity method income as non-GAAP financial measures. PTOI is defined by the Company as pre-tax income excluding net realized gains (losses), unit linked life insurance, loss on extinguishment of debt, discontinued operations, integration, other acquisition and restructuring related costs and cumulative effects of changes in accounting principles. PTOI before partnerships, LLC and other equity method income is defined as PTOI excluding LP and LLC results recognized on the equity method and revenue and expenses from direct investments in natural resources. PTOI before partnerships, LLC and other equity method income and PTOI are considered by the Company to be appropriate indicators of underwriting and operating results and are consistent with the way the Company internally evaluates performance. Net realized gains and partnerships, LLC and other equity method investment results are significantly impacted by both discretionary and economic factors and are not necessarily indicative of operating results, and the timing and amount of integration, other acquisition and restructuring related costs and the extinguishment of debt are not connected to the management of the insurance and underwriting aspects of the Company’s business. Income taxes are impacted by permanent differences. References to Net Written Premium (“NWP”) represent the amount of premium recorded for policies issued during a fiscal period including audits, retrospectively rated premium related to loss sensitive policies, and assumed premium, less ceded premium. Assumed and ceded reinsurance premiums include premium adjustments for reinstatement of coverage when a loss has used some portion of the reinsurance provided, generally under catastrophe treaties (“reinstatement premium”), and changes in estimated premium. In addition, the majority of workers compensation premium is adjusted to the “booked as billed” method through the Corporate and Other segment. The Company believes that NWP is a performance measure useful to investors as it generally reflects current trends in the Company’s sale of its insurance products.

The Company’s discussions related to net income are presented on an after-tax GAAP basis. All other discussions are presented on a pre-tax GAAP basis, unless otherwise noted.

On December 24, 2019, the Company’s subsidiary, UKH, entered into an agreement to sell its entire 99.99% interest in its Russian insurance affiliate, Liberty Insurance (JSC), to PJSC Sovcombank.

On November 5, 2019, the Company entered into a reinsurance transaction with National Indemnity Company (“NICO”), a subsidiary of Berkshire Hathaway Inc, on a combined aggregate excess of loss agreement for certain Global Retail Markets U.S. Business Lines and Global Risk Solutions National Insurance workers compensation liabilities, commercial auto liability and general liability excluding umbrella and warranty. This agreement is defined as the NICO Casualty Reinsurance Transaction. The first layer of the contract attaches at \$300 million below applicable held reserves at inception of \$8.341 billion of combined aggregate reserves. The second layer of the contract provides adverse development coverage for \$1.000 billion above a retention equal to \$8.741 billion. The contract includes a sublimit of \$100 million for certain general liability liabilities. At the closing of the NICO Casualty Reinsurance Transaction, but effective as of January 1, 2019, the Company ceded \$300 million of existing undiscounted liabilities, paid NICO total consideration of \$462 million and recorded a pre-tax loss of \$173 million. This contract is accounted for on a retroactive basis. See the Reinsurance section for additional detail.

On October 2, 2019 the Company completed the acquisition of the business and operations of Nationale Borg, Nationale Borg Reinsurance, and AmTrust Insurance Spain. The transaction is not material to the Company.

On September 27, 2019, Liberty Mutual Group Inc. (“LMGI”) exchanged \$1.25 billion par value of Senior Notes due 2050 (the “2050 Notes”) for \$78 million of its 7.00% Senior Notes due 2034, \$170 million of its 6.50% Senior Notes due 2035, \$480 million of its 6.50% Senior Notes due 2042, \$436 million of its 4.85% Senior Notes due 2044, \$67 million of its 7.80% Junior Subordinated Notes due 2087 (the “2087 Notes”) and \$17 million of its 10.75% Junior Subordinated Notes due 2088. LMGI paid an aggregate of \$411 million cash consideration, including accrued and unpaid interest, for the existing notes accepted for exchange. Interest on the 2050 Notes is payable semi-annually at a fixed rate of 3.951%. The 2050 Notes mature on October 15, 2050.

On August 23, 2019 the Company completed the sale of the Venezuelan business, Seguros Caracas de Liberty Mutual, which was previously deconsolidated in 2015.

During the second quarter, the Company completed a number of debt transactions, including the issuance of a new hybrid security, redemption of the Junior Subordinated notes due 2067, and completion of a tender offer for the 2087 Notes which was financed by cash along with a senior note issuance. These transactions are described further in “Liquidity and Capital Resources”.

On May 31, 2019, the Company completed the acquisition of the U.S. Surety business (“Insko Dico”) of AmTrust Financial Services, Inc.

On March 14, 2019, the Company concluded a strategic review of certain operations and reached an agreement to sell its investment in Pembroke Managing Agency Ltd., Visionary Underwriting Agency Ltd., Ironshore Europe Designated Activity Company, and Ironshore Corporate Capital 3 Ltd. (“certain international Ironshore entities”) to Hamilton Insurance Group. The transaction closed on August 20, 2019.

On January 28, 2019, LMGI exchanged \$1 billion par value of Senior Notes due 2029 (the “2029 Notes”) for \$270 million of its 5.00% Notes due 2021, \$277 million of its 4.95% Notes due 2022 and \$453 million of its 4.25% Notes due 2023. LMGI paid an aggregate of \$40 million cash consideration, including accrued and unpaid interest, for the existing notes accepted for exchange. Interest on the 2029 Notes is payable semi-annually at a fixed rate of 4.569%. The 2029 Notes mature on February 1, 2029.

On May 3, 2018, the Company’s Spanish subsidiary, Liberty Seguros Compania de Seguros y Reaseguros S.A., completed the sale of its entire 99.44% interest in its Turkish insurance affiliate, Liberty Sigorta A.S., to Talanx International.

On May 1, 2018, the Company completed the sale of Liberty Life Assurance Company of Boston (“LLAC”), which provides group disability, group life, individual life and annuity products, to Lincoln Financial Group. The results of LLAC are presented as discontinued operations in the accompanying Consolidated Statements of Operations.

In connection with the Company’s May 2018 sale of LLAC to Lincoln Financial Group, the Company agreed, pursuant to the master transaction agreement, to indemnify Protective Life Corporation and Protective Life Insurance Company (together with certain of their respective affiliates, “Protective”), Lincoln and other parties against certain liabilities. In late 2018, Protective initiated informal discussions with the Company regarding potential indemnification claims (the “Initial Claims”) and in 2019 the Company began an investigation and evaluation of such Initial Claims. This investigation is ongoing. On April 30, 2019, Protective delivered to the Company a formal demand for indemnification related to the Initial Claims and in addition, demands for indemnification including matters unrelated to the Initial Claims (the “New Claims”). The Company is in the very early stages of investigating the New Claims and whether they have any merit or significant monetary value. Based on the Company’s investigation to date of the claims generally, the Company has accrued a reserve of \$52 million, net of tax, in the first quarter of 2019 presented in discontinued operations in the Consolidated Statements of Operations, which is primarily related to the Initial Claims, and may be adjusted up or down as the Company’s investigation of all claims continues. The Company intends to vigorously defend all claims.

At this time, if the Initial Claims and all of the New Claims are ultimately determined to have merit and if the monetary value of those claims were equal to the amount alleged to be due, the aggregate potential liability represented by the claims would not have a material adverse effect on the financial condition of the Company, although such aggregate potential liability may be material relative to the Company’s results of operations for a single reporting period, depending on the facts and circumstances at such time.

The Company’s two businesses are as follows:

- Global Retail Markets combines the Company’s local expertise in growth markets outside the U.S. with strong and scalable U.S. capabilities in order to take advantage of opportunities to grow its business globally. Global Retail Markets is organized into the following segments: U.S., West, East, and Reinsurance.
- Global Risk Solutions offers a wide array of property, casualty, specialty and reinsurance coverage distributed through brokers and independent agents globally. Global Risk Solutions is organized into the

following market segments: Liberty Specialty Markets, National Insurance, North America Specialty, Global Surety, and Other Global Risk Solutions.

Overview – Consolidated

Consolidated NWP by significant line of business was as follows:

\$ in Millions	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
Private passenger automobile	\$3,357	\$ 3,323	1.0%	\$13,933	\$ 13,987	(0.4%)
Homeowners	1,547	1,560	(0.8)	6,435	6,546	(1.7)
Global Risk Solutions specialty insurance ¹	987	681	44.9	3,210	2,578	24.5
Commercial multiple-peril	527	532	(0.9)	2,292	2,215	3.5
Commercial automobile	541	513	5.5	2,159	2,088	3.4
Workers compensation	499	543	(8.1)	2,138	2,161	(1.1)
Global Risk Solutions casualty ²	569	527	8.0	1,996	2,157	(7.5)
Global Risk Solutions reinsurance	332	246	35.0	1,827	1,642	11.3
Commercial property	408	360	13.3	1,473	1,329	10.8
Surety	263	216	21.8	1,033	908	13.8
Global Retail Markets general liability	200	182	9.9	857	777	10.3
Global Risk Solutions inland marine	141	138	2.2	561	538	4.3
Global Risk Solutions other reinsurance ³	(30)	235	NM	271	939	(71.1)
Corporate reinsurance ⁴	3	(37)	NM	(30)	(350)	91.4
Other ⁵	407	387	5.2	1,659	1,585	4.7
Total NWP	\$ 9,751	\$ 9,406	3.7%	\$ 39,814	\$ 39,100	1.8%

1 Global Risk Solutions specialty insurance includes marine, energy, construction, aviation, warranty and indemnity, directors and officers, errors and omissions, trade credit, crisis management, contingent lines and other.

2 Global Risk Solutions casualty primarily includes general liability, excess & umbrella and environmental lines of business.

3 Global Risk Solutions other reinsurance includes new ceded global casualty program of \$96 million and \$408 million for the three and twelve months ended December 31, 2019.

4 NWP associated with internal reinsurance assumed into Corporate, net of corporate external placements.

5 Primarily includes NWP from allied lines, domestic inland marine, internal reinsurance, and life and health reported within Global Retail Markets.

NM = Not Meaningful

NWP for the three months ended December 31, 2019 was \$9.751 billion, an increase of \$345 million over the same period in 2018.

Significant changes by major line of business for the three months ended December 31, 2019 include:

- Private passenger automobile increased \$34 million. The increase reflects organic growth in Global Retail Markets' East and West segments, partially offset by the negative impacts of foreign exchange due to the strengthening of the U.S. dollar primarily versus the Brazilian real as compared to average rates in 2018.
- Global Risk Solutions specialty insurance NWP increased \$306 million. The increase reflects new business and positive rate, partially offset by lower premium from the disposal of certain international Ironshore entities and unfavorable foreign exchange due to the strengthening of the U.S. dollar versus the euro and British pound as compared to the average rates in 2018.
- Workers compensation NWP decreased \$44 million. The decrease reflects the impact of lower new business due to re-underwriting efforts.
- Global Risk Solutions casualty NWP increased \$42 million. The increase reflects growth due to increases in new business and positive rate, partially offset by the negative impact of re-underwriting efforts and lower premium due to the disposal of certain international Ironshore entities.
- Global Risk Solutions reinsurance NWP increased \$86 million. The increase reflects new business growth and favorable renewals, partially offset by unfavorable foreign exchange due to the strengthening of the U.S. dollar versus the euro and British pound as compared to the average rates in 2018.

- Commercial property NWP increased \$48 million. The increase reflects reinsurance benefits, primarily from the benefits of entering a new strategic partnership in Global Retail Markets and growth due to increases in rate in Global Risk Solutions, partially offset by lower premium due to the disposal of certain international Ironshore entities.
- Surety NWP increased \$47 million. The increase reflects growth, primarily within the contract bond business and from the Insko Dico and international AmTrust acquisitions.
- Global Risk Solutions other reinsurance NWP decreased \$265 million. The decrease reflects the new ceded global casualty program and other reinsurance structure changes.

NWP for the twelve months ended December 31, 2019 was \$39.814 billion, an increase of \$714 million over the same period in 2018.

Significant changes by major line of business for the twelve months ended December 31, 2019 include:

- Homeowners NWP decreased \$111 million. The decrease reflects increased purchases of property catastrophe protection through internal reinsurance within Global Retail Markets' U.S. segment (offset in the Corporate reinsurance line of business).
- Global Risk Solutions specialty insurance NWP increased \$632 million. The increase reflects lower reinsurance purchased in the current year, new business and positive rate, partially offset by lower premium from the disposal of certain international Ironshore entities and unfavorable foreign exchange due to the strengthening of the U.S. dollar versus the euro and British pound as compared to the average rates in 2018.
- Global Risk Solutions casualty NWP decreased \$161 million. The decrease reflects a new ceded global casualty program, the negative impact of re-underwriting efforts, and lower premium due to the disposal of certain international Ironshore entities, partially offset by positive rate.
- Global Risk Solutions reinsurance NWP increased \$185 million. The increase reflects new business growth and favorable renewals, partially offset by unfavorable foreign exchange due to the strengthening of the U.S. dollar versus the euro and British pound as compared to the average rates in 2018.
- Commercial property NWP increased \$144 million. The increase reflects growth due to increases in rate, new business and reinsurance structure changes in Global Risk Solutions, partially offset by lower premium due to the disposal of certain international Ironshore entities.
- Surety NWP increased \$125 million. The increase reflects growth within all bond businesses and from the Insko Dico and international AmTrust acquisitions.
- Global Retail Markets general liability NWP increased \$80 million. The increase reflects growth in Global Retail Markets due to increases in new business and retention.
- Global Risk Solutions other reinsurance decreased \$668 million. The decrease reflects the new ceded global casualty program and other reinsurance structure changes.
- Corporate reinsurance NWP increased \$320 million. The increase primarily reflects higher assumed premium due to increased property catastrophe protection purchased by the businesses from Corporate and shifting the purchase of homeowners quota share reinsurance treaties to Global Retail Markets.

More detailed explanations of the changes in NWP by line of business are included in the related discussion of financial results for each segment.

Consolidated NWP by business was as follows:

\$ in Millions	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
Global Retail Markets	\$6,682	\$6,607	1.1%	\$27,756	\$27,599	0.6%
Global Risk Solutions	3,076	2,840	8.3	12,063	11,856	1.7
Corporate and Other	(7)	(41)	82.9	(5)	(355)	98.6
Total NWP	\$9,751	\$9,406	3.7%	\$39,814	\$39,100	1.8%
Foreign exchange effect on growth			(0.8)			(1.0)
NWP growth excluding foreign exchange ¹			4.5%			2.8%

¹ Determined by assuming constant foreign exchange rates between periods.

Major drivers of NWP growth were as follows:

\$ in Millions	Three Months Ended December 31,				Twelve Months Ended December 31,			
	2019	2018	\$ Change	Points Attribution	2019	2018	\$ Change	Points Attribution
Components of growth:								
Domestic personal automobile	2,665	2,687	(22)	(0.2)	11,361	11,432	(71)	(0.2)
Domestic homeowners	1,489	1,507	(18)	(0.2)	6,226	6,339	(113)	(0.3)
Global Retail Markets East West (ex foreign exchange) ¹	1,147	1,043	104	1.1	4,429	4,201	228	0.6
Global Risk Solutions specialty insurance (ex foreign exchange) ¹	1,011	681	330	3.5	3,288	2,578	710	1.8
Domestic workers compensation	484	519	(35)	(0.4)	2,026	2,035	(9)	-
Global Risk Solutions casualty	569	527	42	0.4	1,996	2,157	(161)	(0.4)
Global Risk Solutions reinsurance (ex foreign exchange) ¹	340	246	94	1.0	1,870	1,642	228	0.6
Domestic commercial property	369	326	43	0.5	1,382	1,219	163	0.4
Surety	255	208	47	0.5	1,005	882	123	0.3
Global Risk Solutions inland marine (ex foreign exchange) ¹	145	138	7	0.1	574	538	36	0.1
Global Retail Markets Reinsurance (ex foreign exchange) ¹	16	-	16	0.2	57	-	57	0.1
Corporate reinsurance (ex foreign exchange) ^{1,2}	3	(37)	40	0.4	(30)	(350)	320	0.8
Other lines	1,336	1,561	(225)	(2.4)	6,004	6,427	(423)	(1.0)
Foreign exchange ¹	(78)	-	(78)	(0.8)	(374)	-	(374)	(1.0)
Total NWP	9,751	9,406	345	3.7	39,814	39,100	714	1.8

¹ Determined by assuming constant foreign exchange rates between periods.

² NWP associated with internal reinsurance assumed into Corporate, net of corporate external placements.

Consolidated NWP by geographic distribution channels was as follows:

\$ in Millions	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
U.S.	\$7,460	\$7,536	(1.0%)	\$31,241	\$31,137	0.3%
International excluding foreign exchange ¹	2,369	1,870	26.7	8,947	7,963	12.4
Foreign exchange ¹	(78)	-	NM	(374)	-	NM
Total NWP	\$9,751	\$9,406	3.7%	\$39,814	\$39,100	1.8%

¹ Determined by assuming constant foreign exchange rates between periods.

NM = Not Meaningful

For a more complete description of the Company's business operations, products and distribution channels, and other material information, please visit the Company's Investor Relations web site at www.libertymutualgroup.com/investors.

Results of Operations – Consolidated

\$ in Millions	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
Revenues	\$10,933	\$10,556	3.6%	\$43,228	\$41,568	4.0%
PTOI before catastrophes, net incurred losses attributable to prior years, current accident year re-estimation and partnerships, LLC and other equity method income	\$514	\$771	(33.3%)	\$2,964	\$3,285	(9.8%)
Catastrophes ¹	(280)	(534)	(47.6)	(1,477)	(1,903)	(22.4)
Net incurred losses attributable to prior years:						
- Asbestos and environmental ²	(275)	(2)	NM	(278)	(270)	3.0
- All other ³	(280)	42	NM	(628)	341	NM
Current accident year re-estimation ⁴	(96)	-	NM	-	-	-
Pre-tax operating (loss) income before partnerships, LLC and other equity method income	(417)	277	NM	581	1,453	(60.0)
Partnerships, LLC and other equity method income ⁵	145	285	(49.1)	701	978	(28.3)
Pre-tax operating (loss) income	(272)	562	NM	1,282	2,431	(47.3)
Net realized gains (losses)	50	(139)	NM	443	(147)	NM
Unit linked life insurance	(34)	-	NM	(123)	-	NM
Ironshore acquisition & integration costs	(12)	(55)	(78.2)	(28)	(86)	(67.4)
Restructuring costs	(64)	(37)	73.0	(70)	(94)	(25.5)
Loss on extinguishment of debt	-	-	-	(49)	(8)	NM
Pre-tax (loss) income	(332)	331	NM	1,455	2,096	(30.6)
Income tax (benefit) expense	(33)	80	NM	360	463	(22.2)
Consolidated net (loss) income from continuing operations	(299)	251	NM	1,095	1,633	(32.9)
Discontinued operations, net of tax	-	(2)	(100.0)	(50)	528	NM
Consolidated net (loss) income	(299)	249	NM	1,045	2,161	(51.6)
Less: Net income attributable to non-controlling interest	1	-	NM	1	1	-
Net (loss) income attributable to LMHC	(300)	249	NM	1,044	2,160	(51.7)
Net (loss) income attributable to LMHC excluding unrealized impact ⁶	(\$383)	\$249	NM	\$768	\$2,160	(64.4%)
Cash flow provided by continuing operations	\$438	\$1,136	(61.4%)	\$3,477	\$3,548	(2.0%)

1 Catastrophes are defined as a natural catastrophe or terror event exceeding \$25 million in estimated ultimate losses, net of reinsurance, and before taxes. Catastrophe losses, where applicable, include the impact of accelerated earned catastrophe premiums and earned reinstatement premiums.

2 Asbestos and environmental is gross of the related adverse development reinsurance (the “NICO Reinsurance Transaction”, which is described further in Reinsurance).

3 Net of earned premium and reinstatement premium attributable to prior years of \$29 million and \$24 million for the three and twelve months ended December 31, 2019, and (\$50) million and \$9 million for the same periods in 2018.

4 Re-estimation of the current accident year loss reserves for the nine months ended September 30, 2019.

5 Partnerships, LLC and other equity method income includes LP, LLC and other equity method income within net investment income in the accompanying Consolidated Statements of Operations and revenue and expenses from direct investments in natural resources.

6 Excludes unrealized gains on equity securities, unit linked life insurance, and the corresponding tax impact.

NM = Not Meaningful

Partnerships, LLC and Other Equity Method Income \$ in Millions	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
LP, LLC and other equity method income ¹	\$123	\$271	(54.6%)	\$675	\$930	(27.4%)
Direct investment in natural resources revenues ²	104	105	(1.0)	453	370	22.4
Direct investment in natural resources expenses ³	(82)	(91)	(9.9)	(427)	(322)	32.6
Partnerships, LLC and other equity method income	\$145	\$285	(49.1%)	\$701	\$978	(28.3%)

1 Included within net investment income in the accompanying Consolidated Statements of Operations.

2 Included within fee & other revenues in the accompanying Consolidated Statements of Operations.

3 Included within operating costs and expenses in the accompanying Consolidated Statements of Operations.

Net Investment Income \$ in Millions	Three Months Ended December 31,		Twelve Months Ended December 31,	
	2019	2018	2019	2018
Taxable interest income	\$454	\$445	\$1,832	\$1,686
Tax-exempt interest income	46	45	180	182
Dividends	18	32	67	80
LP, LLC and other equity method income	123	271	675	930
Commercial mortgage loans	21	21	83	75
Other investment income	3	2	9	8
Gross investment income	665	816	2,846	2,961
Investment expenses ¹	(68)	(64)	(254)	(239)
Total net investment income	\$597	\$752	\$2,592	\$2,722

1 Fees paid to external managers are included within the components of gross investment income.

Net Realized Gains (Losses) \$ in Millions	Sales & Settlements	Impairments	Unrealized Gains	Total
Three Months Ended December 31, 2019:				
Fixed maturities	\$68	(\$5)	\$-	\$63
Equities	25	-	112	137
Derivatives	(8)	-	37	29
Other	(89)	(93)	3	(179)
Total	(\$4)	(\$98)	\$152	\$50
Three Months Ended December 31, 2018:				
Fixed maturities	(\$52)	\$-	\$-	(\$52)
Equities	2	-	-	2
Derivatives	(23)	-	-	(23)
Other	19	(85)	-	(66)
Total	(\$54)	(\$85)	\$-	(\$139)

Net Realized Gains (Losses) \$ in Millions	Sales & Settlements	Impairments	Unrealized Gains	Total
<u>Twelve Months Ended December 31, 2019:</u>				
Fixed maturities	\$404	(\$10)	\$-	\$394
Equities	48	-	451	499
Derivatives	(115)	-	16	(99)
Other	(134)	(219)	2	(351)
Total	\$203	(\$229)	\$469	\$443
<u>Twelve Months Ended December 31, 2018:</u>				
Fixed maturities	(\$107)	(\$29)	\$-	(\$136)
Equities	15	(6)	-	9
Derivatives	4	-	-	4
Other	359	(383)	-	(24)
Total	\$271	(\$418)	\$ -	(\$147)

Unrealized Gains Related to Equity Securities \$ in Millions	Three Months Ended December 31,	Twelve Months Ended December 31,
	2019	2019
Net gains recognized during the period on equity securities	\$115	\$453
Less: Net (losses) gains recognized during the period on equity securities sold during the period	(11)	110
Unrealized gains recognized during the reporting period on equity securities still held at the reporting date	\$126	\$343

Fourth Quarter Results:

Pre-tax operating loss before partnerships, LLC and other equity method income for the three months ended December 31, 2019 was \$417 million versus pre-tax operating income before partnerships, LLC and other equity method income of \$277 million for the same period in 2018. The change reflects unfavorable net incurred losses attributable to prior years in 2019 as compared to a net immaterial impact from reserve movements across the businesses in 2018. This was primarily driven by unfavorable development in liability, specialty casualty, and asbestos and environmental, partially offset by favorable development in workers compensation and property and a benefit from the unwind of the existing loss on reinsurance related to the NICO Reinsurance Transaction. The change was also driven by higher current year loss activity, including resetting of the current accident year to a higher baseline based on prior year loss indications, primarily within liability lines. These decreases were partially offset by lower catastrophe losses, the profit margin on higher earned premium and lower employee salary and benefit expenses in Corporate.

Partnerships, LLC, and other equity method income, including operating income from direct investments in natural resources, for the three months ended December 31, 2019 was \$145 million, a decrease of \$140 million from the same period in 2018. The decrease reflects less favorable valuations and distributions in private capital investments and decreases in valuations in energy investments in 2019 as compared to increases in valuations in 2018.

Revenues for the three months ended December 31, 2019 were \$10.933 billion, an increase of \$377 million over the same period in 2018. The major components of revenues are net premium earned, net investment income, net realized gains (losses), and fee and other revenues.

Net premium earned for the three months ended December 31, 2019 was \$9.974 billion, an increase of \$335 million over the same period in 2018. The increase primarily reflects the premium earned associated with the changes in NWP previously discussed.

Net investment income for the three months ended December 31, 2019 was \$597 million, a decrease of \$155 million from the same period in 2018. The decrease reflects less favorable valuations and distributions in private capital investments and decreases in valuations in energy investments in 2019 as compared to increases in valuations in 2018.

Net realized gains for the three months ended December 31, 2019 were \$50 million versus net realized losses of \$139 million for the same period in 2018. The net realized gains in the current quarter were primarily driven by a \$112 million net change in unrealized gains due to a change in accounting standards and \$68 million net gains on fixed maturity sales. This was partially offset by \$105 million of foreign currency charges from the sale of various foreign entities and \$98 million of impairment charges primarily related to intangible assets. The prior period was impacted by \$85 million in impairments, primarily related to natural resources and company-owned real estate, and fixed maturity net losses.

Fee and other revenues for the three months ended December 31, 2019 were \$312 million, an increase of \$8 million over the same period in 2018. The increase primarily reflects higher natural resource revenues.

Claims, benefits and expenses for the three months ended December 31, 2019 were \$11.155 billion, an increase of \$1.022 billion over the same period in 2018. The increase reflects unfavorable incurred losses attributable to prior years in 2019 as compared to a net immaterial impact from reserve movements across the businesses in 2018. This was primarily driven by unfavorable development in liability, specialty casualty, and asbestos and environmental, partially offset by favorable development in workers compensation and property and a benefit from the unwind of the existing loss on reinsurance related to the NICO Reinsurance Transaction. The increase also reflects higher current year loss activity, including resetting of the current accident year to a higher baseline based on prior year loss indications, primarily within liability lines. The increase was also driven by higher insurance operating costs and losses associated with growth. These increases were partially offset by lower catastrophe losses and lower employee salary and benefit expenses in Corporate.

Income tax benefit on continuing operations for the three months ended December 31, 2019 was \$33 million, versus an income tax expense of \$80 million for the same period in 2018. The Company's effective tax rate on continuing operations for the three months ended December 31, 2019 was 10% compared to 24% for the same period in 2018. The Company reported an income tax benefit on a pre-tax loss for the three months ended December 31, 2019, compared to an income tax expense on pre-tax income for the three months ended December 31, 2018. The decrease in the effective tax rate on continuing operations from 2018 to 2019 was primarily driven by the impact of non-U.S. operations.

Net loss attributable to LMHC for the three months ended December 31, 2019 was \$300 million versus net income attributable to LMHC of \$249 million for the same period in 2018.

Cash flow provided by continuing operations for the three months ended December 31, 2019 was \$438 million, a decrease of \$698 million from the same period in 2018. The decrease reflects higher settlements on reinsurance contracts and unfavorable paid loss activity in Global Risk Solutions as well as the consideration paid related to the NICO Casualty Reinsurance Transaction in Corporate. These decreases were partially offset by favorable paid loss activity, higher premium collections, and favorable underwriting expense payments in Global Retail Markets.

Year-to-date Results:

Pre-tax operating income before partnerships, LLC and other equity method income for the twelve months ended December 31, 2019 was \$581 million, a decrease of \$872 million from the same period in 2018. The decrease reflects unfavorable net incurred losses attributable to prior years in 2019 as compared to a net immaterial impact from reserve movements across the businesses in 2018. This was primarily driven by unfavorable development in liability, specialty casualty, and asbestos and environmental, partially offset by favorable development in workers compensation and property and a benefit from the unwind of the existing loss on reinsurance related to the NICO Reinsurance Transaction. The decrease was also driven by higher current year loss activity including resetting of the current accident year to a higher baseline based on prior year loss indications, primarily within liability lines. This was partially offset by the profit margin on higher earned premium, lower catastrophe losses and lower employee salary and benefit expenses in Global Risk Solutions and Corporate.

Partnerships, LLC, and other equity method income, including operating income from direct investments in natural resources, for the twelve months ended December 31, 2019 was \$701 million, a decrease of \$277 million from the same period in 2018. The decrease reflects decreases in valuations in energy investments in 2019 as compared to

increases in valuations in 2018. The decrease was partially offset by more favorable valuations and distributions in private capital investments in 2019 as compared to the same period in 2018.

Revenues for the twelve months ended December 31, 2019 were \$43.228 billion, an increase of \$1.660 billion over the same period in 2018. The major components of revenues are net premium earned, net investment income, net realized gains, and fee and other revenues.

Net premium earned for the twelve months ended December 31, 2019 was \$38.964 billion, an increase of \$1.055 billion over the same period in 2018. The increase primarily reflects the premium earned associated with the changes in NWP previously discussed.

Net investment income for the twelve months ended December 31, 2019 was \$2.592 billion, a decrease of \$130 million from the same period in 2018. The decrease reflects decreases in valuations in energy investments in 2019 as compared to increases in valuations in 2018. The decrease was partially offset by more favorable valuations and distributions in private capital investments in 2019 as compared to 2018 and investment income from a higher net invested asset base in 2019 as compared to 2018.

Net realized gains for the twelve months ended December 31, 2019 were \$443 million versus net realized losses of \$147 million for the same period in 2018. The net realized gains in the current period were primarily driven by a \$451 million net change in unrealized gains primarily due to a change in accounting standards and \$404 million net gains on fixed maturity sales. This was partially offset by \$229 million of impairment charges primarily related to corporate real estate, natural resources, and intangible assets and \$105 million of foreign currency charges from the sale of various foreign entities. The prior period was impacted by impairments on natural resources and company-owned real estate, as well as fixed maturity net losses, partially offset by a \$162 million gain as a result of the acquisition of a previously held equity method investment and a \$148 million gain from the sale of a privately held equity security.

Fee and other revenues for the twelve months ended December 31, 2019 were \$1.229 billion, an increase of \$145 million over the same period in 2018. The increase primarily reflects higher natural resource revenues.

Claims, benefits and expenses for the twelve months ended December 31, 2019 were \$41.503 billion, an increase of \$2.219 billion over the same period in 2018. The increase reflects unfavorable incurred losses attributable to prior years in 2019 as compared to a net immaterial impact from reserve movements across the businesses in 2018. This was primarily driven by unfavorable development in liability, specialty casualty, and asbestos and environmental, partially offset by favorable development in workers compensation and property and a benefit from the unwind of the existing loss on reinsurance related to the NICO Reinsurance Transaction. The increase was also driven by higher current year loss activity, including resetting of the current accident year to a higher baseline based on prior year loss indications, primarily within liability lines. The increase was also driven by higher insurance operating costs and losses associated with growth and higher expenses related to natural resource investments. These increases were partially offset by lower catastrophe losses and lower employee salary and benefit expenses in Global Risk Solutions and Corporate.

Income tax expense on continuing operations for the twelve months ended December 31, 2019 was \$360 million, a decrease of \$103 million from the same period in 2018. The Company's effective tax rate on continuing operations for the twelve months ended December 31, 2019 was 25%, compared to 22% for the same period in 2018. The increase in the effective tax rate on continuing operations from 2018 to 2019 was primarily driven by the impact of non-U.S. operations. The Company's effective tax rate on continuing operations differs from the U.S. Federal statutory rate of 21% primarily due to the impact of non-U.S. operations, partially offset by tax-exempt investment income.

Discontinued operations, net of tax, for the twelve months ended December 31, 2019 were (\$50) million versus \$528 million for the same period in 2018. The change was driven by additional expense in 2019 related to the sale of LLAC versus the net gain recognized on the sale of LLAC in 2018.

Net income attributable to LMHC for the twelve months ended December 31, 2019 was \$1.044 billion, a decrease of \$1.116 billion from the same period in 2018.

Cash flow provided by continuing operations for the twelve months ended December 31, 2019 was \$3.477 billion, a decrease of \$71 million from the same period in 2018. The decrease reflects unfavorable catastrophe payments and underwriting expense payments in Global Retail Markets, consideration paid as part of the NICO Casualty Reinsurance Transaction, higher taxes paid and unfavorable expense payment timing in Corporate. These decreases were partially offset by higher premium collections in both Global Retail Markets and Global Risk Solutions and favorable catastrophe payments in Global Risk Solutions.

CONSOLIDATED	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change (Points)	2019	2018	Change (Points)
Combined ratio before catastrophes, net incurred losses attributable to prior years and current accident year re-estimation						
Claims and claim adjustment expense ratio	68.4%	66.1%	2.3	66.6%	64.8%	1.8
Underwriting expense ratio	28.9	29.1	(0.2)	28.8	29.6	(0.8)
Dividend ratio	-	0.1	(0.1)	-	-	-
Subtotal	97.3	95.3	2.0	95.4	94.4	1.0
Catastrophes ¹	2.8	5.5	(2.7)	3.8	5.0	(1.2)
Net incurred losses attributable to prior years:						
- Asbestos and environmental	2.8	-	2.8	0.9	0.7	0.2
- All other ²	2.8	(0.4)	3.2	1.6	(0.9)	2.5
Current accident year re-estimation ³	1.0	-	1.0	-	-	-
Total combined ratio⁴	106.7%	100.4%	6.3	101.7%	99.2%	2.5

1 Catastrophes are defined as a natural catastrophe or terror event exceeding \$25 million in estimated ultimate losses, net of reinsurance, and before taxes. Catastrophe losses, where applicable, include the impact of accelerated earned catastrophe premiums and earned reinstatement premiums.

2 Net of earned premium and reinstatement premium attributable to prior years.

3 Re-estimation of the current accident year loss reserves for the nine months ended September 30, 2019.

4 The combined ratio, expressed as a percentage, is a measure of underwriting profitability. This measure should only be used in conjunction with, and not in lieu of, underwriting income and may not be comparable to other performance measures used by the Company's competitors. The combined ratio is computed as the sum of the following property and casualty ratios: the ratio of claims and claim adjustment expense less managed care income to earned premium; the ratio of insurance operating costs plus amortization of deferred policy acquisition costs less third-party administration income and fee income (primarily related to the Company's involuntary market servicing carrier operations) and installment charges to earned premium; and the ratio of policyholder dividends to earned premium. Provisions for uncollectible premium and reinsurance are not included in the combined ratio unless related to an asbestos and environmental commutation and certain other run off. Restructuring and Ironshore acquisition and integration costs are not included in the combined ratio.

Fourth Quarter Results:

The consolidated combined ratio before catastrophes, net incurred losses attributable to prior years and current accident year re-estimation for the three months ended December 31, 2019 was 97.3%, an increase of 2.0 points over the same period in 2018. The increase in the claims and claim adjustment expense ratio reflects higher current year loss activity, including resetting of the current accident year to a higher baseline based on prior year loss indications, primarily within liability lines. The decrease in the underwriting expense ratio reflects earned premium growth and lower employee salary and benefit expenses in Corporate.

Including the impact of catastrophes, net incurred losses attributable to prior years and current accident year re-estimation, the total combined ratio for the three months ended December 31, 2019 was 106.7%, an increase of 6.3 points over the same period in 2018. The increase primarily reflects unfavorable net incurred losses attributable to prior years and the changes in the combined ratio previously discussed, partially offset by lower catastrophe losses.

Year-to-date Results:

The consolidated combined ratio before catastrophes and net incurred losses attributable to prior years for the twelve months ended December 31, 2019 was 95.4%, an increase of 1.0 points over the same period in 2018. The increase in the claims and claim adjustment expense ratio reflects higher current year loss activity, including the resetting of the current accident year to a higher baseline based on prior year loss indications primarily within liability lines. The decrease in the underwriting expense ratio reflects earned premium growth, and lower employee salary and benefit expenses in Global Risk Solutions and Corporate.

Including the impact of catastrophes and net incurred losses attributable to prior years, the total combined ratio for the twelve months ended December 31, 2019 was 101.7%, an increase of 2.5 points over the same period in 2018. The increase primarily reflects unfavorable net incurred losses attributable to prior years, partially offset by lower catastrophe losses and the changes in the combined ratio previously discussed.

GLOBAL RETAIL MARKETS

Overview – Global Retail Markets

Global Retail Markets combines the Company's local expertise in growth markets outside the U.S. with strong and scalable U.S. capabilities to take advantage of opportunities to grow its business globally. Global Retail Markets is comprised of four segments: U.S., West, East, and Reinsurance.

U.S. consists of Personal Lines and Business Lines. U.S. Personal Lines sells automobile, homeowners and other types of property and casualty insurance coverage to individuals in the United States. These products are distributed through approximately 1,880 licensed employee sales representatives, 840 licensed telesales counselors, independent agents, third-party producers, the Internet, and sponsored affinity groups. U.S. Business Lines serves small commercial customers through an operating model that combines local underwriting, market knowledge and service with the scale advantages of a national company.

West sells property and casualty, health and life insurance products and services to individuals and businesses in Brazil, Colombia, Chile, Ecuador, Spain, Portugal, and Ireland. Private passenger automobile insurance is the single largest line of business.

East sells property and casualty, health and life insurance products and services to individuals and businesses in Thailand, Singapore, Hong Kong, Vietnam, Malaysia, India, China, and Russia. Private passenger automobile insurance is the single largest line of business.

Global Retail Markets Reinsurance consists of certain internal reinsurance programs.

On May 3, 2018, the Company's Spanish subsidiary, Liberty Seguros Compania de Seguros y Reaseguros S.A., completed the sale of its entire 99.44% interest in its Turkish insurance affiliate, Liberty Sigorta A.S., to Talanx International.

On August 23, 2019, the Company completed the sale of its Venezuela operations. The Company previously deconsolidated the Venezuela operations as of September 30, 2015 due to restrictive exchange control regulations significantly impacting control of the operations.

On December 24, 2019, the Company's subsidiary, UKH, entered into an agreement to sell its entire 99.99% interest in its Russian insurance affiliate, Liberty Insurance (JSC), to PJSC Sovcombank. The transaction closed on February 6, 2020.

Global Retail Markets NWP by market segment was as follows:

\$ in Millions	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
U.S.	\$5,560	\$5,564	(0.1%)	\$23,509	\$23,398	0.5 %
West	772	768	0.5	2,972	3,095	(4.0)
East	335	275	21.8	1,230	1,106	11.2
Global Retail Markets Reinsurance	15	-	NM	45	-	NM
Total NWP	\$6,682	\$6,607	1.1%	\$27,756	\$27,599	0.6%
Foreign exchange effect on growth			(0.6)			(0.9)
NWP growth excluding foreign exchange ¹			1.7%			1.5%

¹ Determined by assuming constant foreign exchange rates between periods.
NM = Not Meaningful

Global Retail Markets NWP by line of business was as follows:

\$ in Millions	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
Private passenger automobile	\$3,357	\$3,323	1.0%	\$13,933	\$13,987	(0.4%)
Homeowners	1,547	1,560	(0.8)	6,435	6,546	(1.7)
Commercial multiple-peril	485	492	(1.4)	2,058	1,981	3.9
Commercial automobile	377	353	6.8	1,534	1,471	4.3
General liability	200	182	9.9	857	777	10.3
Workers compensation	160	178	(10.1)	764	736	3.8
Commercial property	140	125	12.0	481	484	(0.6)
Life and health	90	84	7.1	390	366	6.6
Other ¹	326	310	5.2	1,304	1,251	4.2
Total NWP	\$6,682	\$6,607	1.1%	\$27,756	\$27,599	0.6%

¹ Premium related to internal reinsurance and other personal and commercial lines including personal accident, bonds, small and medium enterprise, and marine and cargo lines of business.

Fourth Quarter Results:

NWP for the three months ended December 31, 2019 was \$6.682 billion, an increase of \$75 million over the same period in 2018. The increase was primarily driven by organic growth in the East and West segments, particularly private passenger automobile led by strong results in Brazil, Thailand, and India. The increase also reflects NWP retained through our internal reinsurance that was previously ceded to Corporate and reinsurance benefits in our U.S. business lines, primarily from the benefits of entering a new strategic partnership. This growth was partially offset by the negative impacts of foreign exchange due to the strengthening of the U.S. dollar primarily versus the Brazilian real as compared to average rates in 2018 and decreased policies in force in U.S. personal auto line due to lower retention.

Year-to-date Results:

NWP for the twelve months ended December 31, 2019 was \$27.756 billion, an increase of \$157 million over the same period in 2018. The increase was primarily driven by growth in U.S. business lines due to increases in net retained premium from higher retention and new business production, as well as organic growth in East and West private passenger automobile and accident and health lines. Additionally, the increase reflects NWP retained through our internal reinsurance, of which the largest programs are written on commercial property and homeowners. The increase was partially offset by foreign exchange due to the strengthening of the U.S. dollar versus multiple currencies, primarily the Brazilian real and the euro, as compared to average rates in 2018 and U.S. property results due to

increased purchases of property catastrophe protection through internal reinsurance and decreased policies in force in U.S. personal auto line due to lower retention.

Results of Operations – Global Retail Markets

\$ in Millions	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
Revenues	\$7,201	\$7,199	0.0%	\$28,678	\$28,337	1.2%
PTOI before catastrophes, net incurred losses attributable to prior years and current accident year re-estimation	\$642	\$838	(23.4%)	\$2,691	\$3,126	(13.9%)
Catastrophes ¹	(165)	(263)	(37.3)	(1,200)	(1,389)	(13.6)
Net incurred losses attributable to prior years	(26)	51	NM	48	253	(81.0)
Current accident year re-estimation ²	(38)	-	NM	-	-	-
PTOI	\$413	\$626	(34.0%)	\$1,539	\$1,990	(22.7%)

1 Catastrophes are defined as a natural catastrophe or terror event exceeding \$25 million in estimated ultimate losses, net of reinsurance, and before taxes. Catastrophe losses, where applicable, include the impact of accelerated earned catastrophe premiums and earned reinstatement premiums.

2 Re-estimation of the current accident year loss reserves for the nine months ended September 30, 2019.
NM = Not Meaningful

Fourth Quarter Results:

Pre-tax operating income for the three months ended December 31, 2019 was \$413 million, a decrease of \$213 million from the same period in 2018. The decrease was primarily driven by higher non-catastrophe losses including an increase in U.S. business liability lines loss ratios to align the current accident year to higher loss indications, which is reflected in unfavorable current accident year re-estimation, and an increase in U.S. personal homeowners line losses. Additionally, the decline reflects losses related to civil unrest in Chile and unfavorable change in net incurred losses attributable to prior years due to development on prior year catastrophe reserves and strengthening in the West. The decrease was partially offset by lower current accident year catastrophe losses due to lower severity.

Revenues for the three months ended December 31, 2019 were \$7.201 billion, an increase of \$2 million over the same period in 2018. The increase reflects the premium earned associated with the changes in NWP previously discussed and increases in net investment income and other revenues, partially offset by foreign currency losses from the sale of various foreign entities.

Claims, benefits and expenses for the three months ended December 31, 2019 were \$6.858 billion, an increase of \$288 million over the same period in 2018. The increase was driven by higher non-catastrophe losses including an increase in U.S. business liability lines loss ratios to align the current accident year to higher loss indications, an increase in U.S. personal homeowners line losses, and losses related to civil unrest in Chile. Furthermore, insurance operating costs in the U.S. were higher due to topline growth and an increase in technology and advertising spend, as well as the unfavorable change in incurred losses attributable to prior years driven development on prior year catastrophe reserves and strengthening in the West.

Year-to-date Results:

Pre-tax operating income for the twelve months ended December 31, 2019 was \$1.539 billion, a decrease of \$451 million from the same period in 2018. The decrease was primarily driven by higher non-catastrophe losses due to an increase in U.S. business liability lines loss ratios to align the current accident year to higher loss indications and the unfavorable change in net incurred losses attributable to prior years driven by development on prior year catastrophe reserves, partially offset by prior year liability strengthening in 2018 that did not recur in 2019. Additionally, the decrease reflects higher insurance operating costs from increased expenses consistent with topline growth and an increase in advertising spend. These were partially offset by lower current accident year catastrophe losses due to lower severity and profit margin on earned premium due to strong topline results in the U.S.

Revenues for the twelve months ended December 31, 2019 were \$28.678 billion, an increase of \$341 million over the same period in 2018. The increase reflects premium earned associated with growth and growth in unrealized and realized gains due to market valuation changes on unit linked life insurance where the policyholder bears the investment risk. Additionally, the increase reflects higher net investment income and other revenues. These were partially offset by foreign currency losses from the sale of various foreign entities.

Claims, benefits and expenses for the twelve months ended December 31, 2019 were \$27.134 billion, an increase of \$786 million over the same period in 2018. The increase was driven by higher non-catastrophe losses including an increase in U.S. business liability lines to align the current accident year to higher loss indications, higher insurance operating costs from increased expenses consistent with topline growth and an increase in advertising spend, and the unfavorable change in incurred losses attributable to prior years. Partially offsetting the increase was lower catastrophe losses due to lower severity.

	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change (Points)	2019	2018	Change (Points)
GLOBAL RETAIL MARKETS						
Combined ratio before catastrophes, net incurred losses attributable to prior years and current accident year re-estimation						
Claims and claim adjustment expense ratio	64.5%	62.5%	2.0	64.5%	62.9%	1.6
Underwriting expense ratio	29.0	27.7	1.3	28.4	28.0	0.4
Subtotal	93.5	90.2	3.3	92.9	90.9	2.0
Catastrophes ¹	2.4	3.8	(1.4)	4.4	5.1	(0.7)
Net incurred losses attributable to prior years	0.4	(0.7)	1.1	(0.2)	(0.9)	0.7
Current accident year re-estimation ²	0.5	-	0.5	-	-	-
Total combined ratio	96.8%	93.3%	3.5	97.1%	95.1%	2.0

1 Catastrophes are defined as a natural catastrophe or terror event exceeding \$25 million in estimated ultimate losses, net of reinsurance, and before taxes. Catastrophe losses, where applicable, include the impact of accelerated earned catastrophe premiums and earned reinstatement premiums.

2 Re-estimation of the current accident year loss reserves for the nine months ended September 30, 2019.

Fourth Quarter Results:

The Global Retail Markets combined ratio before catastrophes, net incurred losses attributable to prior years and current accident year re-estimation for the three months ended December 31, 2019 was 93.5%, an increase of 3.3 points over the same period in 2018. The increase was primarily driven by an increase in the claims and claim adjustment expense ratio due to higher non-catastrophe losses including an increase in U.S. business liability lines loss ratios to align the current accident year to higher loss indications, an increase in U.S. personal homeowners line losses, and losses related to civil unrest in Chile. The increase in the underwriting expense ratio was driven by an increase in technology and advertising spend.

Including the impact of catastrophes, net incurred losses attributable to prior years and current accident year re-estimation, the total combined ratio for the three months ended December 31, 2019 was 96.8%, an increase of 3.5 points over the same period in 2018. The increase was driven by the unfavorable change in net incurred losses attributable to prior years due to development on prior year catastrophe reserves, higher current accident year re-estimation from adverse development on U.S. business liability lines, and the changes to the combined ratio mentioned above. These results were partially offset by lower catastrophe losses due to lower severity.

Year-to-date Results:

The Global Retail Markets combined ratio before catastrophes and net incurred losses attributable to prior years for the twelve months ended December 31, 2019 was 92.9%, an increase of 2.0 points over the same period in 2018. The increase was primarily driven by the claims and claim adjustment expense ratio due to higher non-catastrophe losses primarily due to an increase in U.S. business liability lines loss ratios to align the current accident year to higher loss indications. The increase in the underwriting expense ratio was driven by an increase in advertising spend.

Including the impact of catastrophes and net incurred losses attributable to prior years, the total combined ratio for the twelve months ended December 31, 2019 was 97.1%, an increase of 2.0 points over the same period in 2018. The increase was driven by the unfavorable change to net incurred losses attributable to prior years due to development on prior year catastrophe reserves and the changes to the combined ratio mentioned above, partially offset by lower catastrophe losses due to lower severity.

GLOBAL RISK SOLUTIONS

Overview – Global Risk Solutions

Global Risk Solutions (“GRS”) offers a wide array of property, casualty, specialty and reinsurance coverage distributed through brokers and independent agents globally. The segments for Global Risk Solutions are as follows:

- Liberty Specialty Markets (“LSM”) – Includes most Global Risk Solutions business outside of North America and global reinsurance.
- National Insurance (“NI”) – Includes U.S. admitted and non-admitted property and casualty in excess of \$150 thousand annual premium.
- North America Specialty (“NAS”) – Primarily includes specialty lines and non-admitted property and casualty in North America.
- Global Surety – Leading global provider of contract and commercial surety bonds to businesses of all sizes.
- Other Global Risk Solutions primarily consists of internal reinsurance programs and Ironshore international entities.

On May 31, 2019, the Company completed the acquisition of Inco Dico of AmTrust Financial Services, Inc. The acquisition of the international surety and credit reinsurance operations of AmTrust Financial Services, Inc. closed on October 2, 2019.

On August 20, 2019, GRS disposed of certain international Ironshore entities.

Global Risk Solutions NWP by market segment was as follows:

\$ in Millions	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
Liberty Specialty Markets	\$1,140	\$801	42.3%	\$4,539	\$3,751	21.0%
National Insurance	1,023	963	6.2	3,852	3,794	1.5
North America Specialty	672	425	58.1	2,069	1,767	17.1
Global Surety	246	203	21.2	981	861	13.9
Other Global Risk Solutions ¹	(5)	448	NM	622	1,683	(63.0)
Total NWP	\$3,076	\$2,840	8.3%	\$12,063	\$11,856	1.7%
Foreign exchange effect on growth			(1.3)			(1.1)
NWP growth excluding foreign exchange ²			9.6%			2.8%

¹ Includes new ceded global casualty program of \$96 million and \$408 million for the three and twelve months ended December 31, 2019

² Determined by assuming constant foreign exchange rates between periods.

Global Risk Solutions NWP by line of business was as follows:

\$ in Millions	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
Specialty insurance ¹	\$987	\$681	45.0%	\$3,210	\$2,578	24.5%
Casualty ²	569	527	8.0	1,996	2,157	(7.5)
Reinsurance	332	246	35.0	1,827	1,642	11.3
Workers compensation	348	370	(5.9)	1,342	1,424	(5.8)
Surety	255	208	22.6	1,005	882	13.9
Commercial property	268	235	14.0	992	845	17.4
Commercial automobile	164	160	2.5	625	617	1.3
Inland marine ³	141	138	2.2	561	538	4.3
Other reinsurance ⁴	(30)	235	(112.8)	271	939	(71.1)
Commercial multiple-peril	42	40	5.0	234	234	-
Total NWP	\$3,076	\$2,840	8.3%	\$12,063	\$11,856	1.7%

1 Includes marine, energy, construction, aviation, warranty and indemnity, directors and officers, errors and omissions, trade credit, crisis management, contingent lines and other.

2 Primarily includes general liability, excess & umbrella and environmental lines of business.

3 Includes handset protection coverage for lost or damaged wireless devices.

4 Includes new ceded global casualty program of \$96 million and \$408 million for the three and twelve months ended December 31, 2019.

Fourth Quarter Results:

NWP for the three months ended December 31, 2019 was \$3.076 billion, an increase of \$236 million over the same period in 2018.

The increase was driven by:

- Positive rate in specialty insurance, casualty, commercial property, and commercial multiple peril;
- Reinsurance primarily due to new business growth and favorable renewals;
- Casualty primarily due to new business within NAS and LSM;
- New business, favorable LSM ultimate premium adjustments and reinsurance structure changes in specialty insurance; and
- Surety due to growth, primarily from the InSCO Dico and international AmTrust acquisitions

These increases were partially offset by:

- Other reinsurance primarily due to a new ceded global casualty program and other reinsurance structure changes;
- The negative impact of lower new business due to re-underwriting on casualty, commercial property, commercial automobile and workers compensation lines of business;
- Lower premium in specialty insurance, commercial property and casualty from the disposal of certain international Ironshore entities; and
- Foreign exchange due to the strengthening of the U.S. dollar versus the euro and British pound as compared to the average rates in 2018.

Additionally, certain internal reinsurance agreements were extended in 2019 and certain businesses have been internally transferred amongst segments and lines creating offsetting differences.

Year-to-date Results:

NWP for the twelve months ended December 31, 2019 was \$12.063 billion, an increase of \$207 million over the same period in 2018.

The increase was driven by:

- Positive rate in specialty insurance, casualty, commercial property, and commercial multiple peril;

- Specialty insurance due to reinsurance structure changes, new business and favorable renewals;
- Commercial property primarily due to new business and reinsurance structure changes within LSM;
- Casualty primarily due to new business within NAS and LSM;
- Surety due to growth within all bond businesses and the InSCO Dico and international AmTrust acquisitions; and
- Workers compensation driven by return premium on experience rated accounts.

These increases were partially offset by:

- Other reinsurance and casualty primarily due to a new ceded global casualty program and other reinsurance structure changes;
- The negative impact of lower new business due to re-underwriting on casualty, commercial property, commercial automobile and workers compensation lines of business;
- Lower premium in specialty insurance, commercial property and casualty from the disposal of certain international Ironshore entities;
- Lower involuntary business in workers compensation; and
- Foreign exchange due to the strengthening of the U.S. dollar versus the euro and British pound as compared to the average rates in 2018

Additionally, certain internal reinsurance agreements were extended in 2019 and certain businesses have been internally transferred amongst segments and lines creating offsetting differences.

Results of Operations – Global Risk Solutions

	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change	2019	2018	Change
\$ in Millions						
Revenues	\$3,307	\$3,139	5.4%	\$12,840	\$12,294	4.4%
PTOI before catastrophes, net incurred losses attributable to prior years and current accident year re-estimation	\$5	\$195	(97.4%)	\$706	\$1,021	(30.9%)
Catastrophes ¹	(137)	(274)	(50.0)	(299)	(535)	(44.1)
Net incurred losses attributable to prior years ²	(167)	(24)	NM	(543)	101	NM
Current accident year re-estimation ³	(58)	-	NM	-	-	-
Pre-tax operating (loss) income	(\$357)	(\$103)	NM	(\$136)	\$587	NM

1 Catastrophes are defined as a natural catastrophe or terror event exceeding \$25 million in estimated ultimate losses, net of reinsurance, and before taxes. Catastrophe losses, where applicable, include the impact of accelerated earned catastrophe premiums and earned reinstatement premiums.

2 Net of earned premium and reinstatement premium attributable to prior years of \$29 million and \$24 million for the three and twelve months ended December 31, 2019, and (\$50) million and \$9 million for the same periods in 2018.

3 Re-estimation of the current accident year loss reserves for the nine months ended September 30, 2019.

NM = Not Meaningful

Fourth Quarter Results:

Pre-tax operating loss for the three months ended December 31, 2019 was \$357 million, an increase of \$254 million over the same period in 2018. The increase reflects unfavorable net incurred losses attributable to prior years primarily driven by higher liability and specialty casualty losses, resetting of the current accident year to a higher baseline based on prior year loss indications primarily within liability lines, higher current year specialty casualty loss activity, unfavorable foreign exchange and an increase in the allowance for bad debt. Additionally, expenses were unfavorable due to a one-time reclassification of internally developed software (offset in Corporate) in 2018 and higher technology costs. This was partially offset by lower current year catastrophe losses and profit margin on higher earned premium.

Revenues for the three months ended December 31, 2019 were \$3.307 billion, an increase of \$168 million over the same period in 2018. The increase primarily reflects premium earned associated with the changes in NWP previously discussed, as well as favorable net investment income, partially offset by intangible assets write-offs.

Claims, benefits and expenses for the three months ended December 31, 2019 were \$3.728 billion, an increase of \$474 million over the same period in 2018. The increase reflects unfavorable incurred losses attributable to prior years primarily driven by higher liability and specialty casualty losses, resetting of the current accident year to a higher baseline based on prior year loss indications primarily within liability lines, higher current year specialty casualty loss activity, attritional losses associated with growth, as well as unfavorable expenses due to a one-time reclassification of internally developed software (offset in Corporate) in 2018 and higher technology costs. This was partially offset by lower current year catastrophe losses.

Year-to-date Results:

Pre-tax operating loss for the twelve months ended December 31, 2019 was (\$136) million versus pre-tax operating income of \$587 million for the same period in 2018. The change reflects unfavorable net incurred losses attributable to prior years primarily driven by higher liability, specialty casualty, and reinsurance losses in 2019 versus net reserve releases in 2018, resetting of the current accident year to a higher baseline based on prior year loss indications primarily within liability lines, higher current year specialty casualty loss activity, higher technology costs and unfavorable foreign exchange. These were partially offset by lower current year catastrophe losses, profit margin on higher earned premium, higher net investment income and lower expenses from expense management efforts and synergies achieved through the GRS structure.

Revenues for the twelve months ended December 31, 2019 were \$12.840 billion, an increase of \$546 million over the same period in 2018. The increase primarily reflects premium earned associated with the changes in NWP previously discussed, as well as favorable net investment income, partially offset by intangible assets write-offs.

Claims, benefits and expenses for the twelve months ended December 31, 2019 were \$13.063 billion, an increase of \$1.347 billion over the same period in 2018. The increase reflects unfavorable incurred losses attributable to prior years primarily driven by higher liability, specialty casualty, and reinsurance losses in 2019 versus net reserve releases in 2018, resetting of the current accident year to a higher baseline based on prior year loss indications primarily within liability lines, higher current year specialty casualty loss activity, attritional losses associated with growth and higher technology costs. This was partially offset by lower current year catastrophe losses and lower expenses from expense management efforts and synergies achieved through the GRS structure.

	Three Months Ended December 31,			Twelve Months Ended December 31,		
	2019	2018	Change (Points)	2019	2018	Change (Points)
GLOBAL RISK SOLUTIONS						
Combined ratio before catastrophes, net incurred losses attributable to prior years and current accident year re-estimation						
Claims and claim adjustment expense ratio	75.2%	72.5%	2.7	70.3%	67.6%	2.7
Underwriting expense ratio	30.8	28.8	2.0	30.7	30.9	(0.2)
Dividend ratio	0.1	0.1	-	0.1	0.1	-
Subtotal	106.1	101.4	4.7	101.1	98.6	2.5
Catastrophes ¹	4.6	9.5	(4.9)	2.6	4.8	(2.2)
Net incurred losses attributable to prior years ²	5.3	0.8	4.5	4.8	(0.9)	5.7
Current accident year re-estimation ³	1.9	-	1.9	-	-	-
Total combined ratio	117.9%	111.7%	6.2	108.5%	102.5%	6.0

1 Catastrophes are defined as a natural catastrophe or terror event exceeding \$25 million in estimated ultimate losses, net of reinsurance, and before taxes. Catastrophe losses, where applicable, include the impact of accelerated earned catastrophe premiums and earned reinstatement premiums.

2 Net of earned premium and reinstatement premium attributable to prior years.

3 Re-estimation of the current accident year loss reserves for the nine months ended September 30, 2019.

Fourth Quarter Results:

The Global Risk Solutions combined ratio before catastrophes, net incurred losses attributable to prior years and current accident year re-estimation for the three months ended December 31, 2019 was 106.1%, an increase of 4.7 points over the same period in 2018. The increase in the claims and claim adjustment expense ratio was primarily driven by resetting of the current accident year to a higher baseline based on prior year loss indications primarily within liability lines as well as higher current year specialty casualty loss activity. The increase in the underwriting expense ratio was primarily driven by a one-time reclassification of internally developed software (offset in Corporate) in 2018 and higher IT costs partially offset by higher earned premium.

Including the impact of catastrophes, net incurred losses attributable to prior years and current accident year-re-estimation, the total combined ratio for the three months ended December 31, 2019 was 117.9%, an increase of 6.2 points over the same period in 2018. The increase reflects unfavorable net incurred losses attributable to prior years primarily driven by higher liability and specialty casualty losses, current accident year re-estimation from the resetting of the current accident year to a higher baseline based on prior year loss indications primarily within liability lines and the changes to the combined ratio mentioned above, partially offset by lower current year catastrophe losses.

Year-to-date Results:

The Global Risk Solutions combined ratio before catastrophes and net incurred losses attributable to prior years for the twelve months ended December 31, 2019 was 101.1%, an increase of 2.5 points over the same period in 2018. The increase in the claims and claim adjustment expense ratio was primarily driven by resetting of the current accident year to a higher baseline based on prior year loss indications primarily within liability lines as well as higher current year specialty casualty loss activity. The decrease in the underwriting expense ratio was primarily driven by higher earned premium and expense management efforts and synergies achieved through the GRS structure, partially offset by higher technology costs.

Including the impact of catastrophes and net incurred losses attributable to prior years, the total combined ratio for the twelve months ended December 31, 2019 was 108.5%, an increase of 6.0 points over the same period in 2018. The increase reflects unfavorable net incurred losses attributable to prior years primarily driven by higher liability, specialty casualty, and reinsurance losses in 2019 versus net reserve releases in 2018 and the changes to the combined ratio mentioned above, partially offset by lower current year catastrophe losses.

CORPORATE AND OTHER

Overview – Corporate and Other

Corporate and Other includes the following significant items:

- Certain internal discontinued operations, which comprises: the run-off of certain commercial lines business, the run-off of the California workers compensation business of Golden Eagle Insurance Corporation and certain distribution channels related to Prudential Property and Casualty Insurance Company, Prudential General Insurance Company and Prudential Commercial Insurance Company (together, “PruPac”) and Liberty Re annuity business.
- Cessions related to certain retroactive reinsurance agreements, including the NICO Reinsurance Transaction and NICO Casualty Reinsurance Transaction, which are described further in “Reinsurance”.
- Effective January 1, 2015, Corporate began assuming certain pre-2014 voluntary and involuntary workers compensation claims from the businesses. The covered business materially aligns with the workers compensation business covered by the retroactive reinsurance agreement defined as the NICO Reinsurance Transaction, which is described further in “Reinsurance”.
- Effective January 1, 2019, Corporate began assuming certain U.S. workers compensation, commercial auto, and general liability claims from the businesses. The covered business materially aligns with the casualty business covered by the retroactive reinsurance agreement defined as the NICO Casualty Reinsurance Transaction, which is described further in “Reinsurance,” with two notable differences: 1) the internal treaty attaches at held reserves at inception and does not include a loss corridor, and 2) the internal treaty includes umbrella claims related to Business Lines within Global Retail Markets.
- Reserve changes on certain other casualty and property lines of business.
- Interest expense on the Company’s outstanding debt.
- Certain risks of its businesses that the Company reinsures as part of its risk management program and pre-2019 risks on U.S. homeowners business covered by externally ceded homeowners’ quota share reinsurance treaties.
- The Company reports its written premium on workers compensation contracts on the "booked as billed" method. The businesses report workers compensation written premium on the "booked at inception" method. Corporate and Other results reflect the difference between these two methods.
- The Company discounts the long-term indemnity portion of its settled unpaid workers compensation claims at risk-free discount rates. For 2018 and prior years, the businesses reported their discount based on statutory discount rates and Corporate and Other results reflected the difference between the statutory and risk-free rate.
- Costs associated with certain long-term compensation plans and other corporate costs not fully allocated to the businesses.
- Property and casualty operations’ investment income is allocated to the businesses based on planned ordinary investment income returns by investment category. The difference between allocated net investment income and actual net investment income is included in Corporate and Other.
- Investment-related realized gains (losses) and real estate impairments.
- Income related to LP, LLC and other equity method investments.
- Fee and other revenues include revenues from certain wholly owned non-insurance subsidiaries, including Liberty Energy, Liberty Metals and Mining and Liberty Mutual Agriculture and Timber. These subsidiaries generate revenue from the production and sale of oil, gas, and other natural resources related LP, LLC and other equity method investments.

- The results of LLAC presented as discontinued operations, including the net gain on the sale of LLAC.

Corporate and Other NWP by line of business was as follows:

\$ in Millions	Three Months Ended December 31,			Twelve Months ended December 31,		
	2019	2018	Change	2019	2018	Change
Reinsurance, net	\$3	(\$37)	NM	(\$30)	(\$350)	(91.4%)
Workers compensation ¹	(9)	(5)	80.0	32	1	NM
Other	(1)	1	NM	(7)	(6)	16.7
Total NWP	(\$7)	(\$41)	(82.9%)	(\$5)	(\$355)	(98.6%)

¹ Booked as billed adjustment.
NM = Not Meaningful

Fourth Quarter Results:

NWP for the three months ended December 31, 2019 was (\$7) million, an increase of \$34 million over the same period in 2018. The increase reflects the reinsurance line of business primarily due to shifting the purchase of the homeowners quota share reinsurance treaties to Global Retail Markets.

Year-to-date Results:

NWP for the twelve months ended December 31, 2019 was (\$5) million, an increase of \$350 million over the same period in 2018. The change reflects the reinsurance line of business primarily due to higher assumed premium from increased property catastrophe protection purchased by the businesses from Corporate and shifting the purchase of homeowners quota share reinsurance treaties to Global Retail Markets.

Results of Operations – Corporate and Other

\$ in Millions	Three Months Ended December 31,			Twelve Months ended December 31,		
	2019	2018	Change	2019	2018	Change
Revenues	\$425	\$218	95.0%	\$1,710	\$937	82.5%
Pre-tax operating loss before catastrophes, net incurred losses attributable to prior years, and partnerships, LLC and other equity method income	(\$133)	(\$262)	(49.2%)	(\$433)	(\$862)	(49.8%)
Catastrophes ¹	22	3	NM	22	21	(4.8)
Net incurred losses attributable to prior years:						
-Asbestos and environmental ²	(275)	(2)	NM	(278)	(270)	(3.0)
-All other ³	(87)	15	NM	(133)	(13)	NM
Pre-tax operating loss before partnerships, LLC and other equity method income	(473)	(246)	92.3	(822)	(1,124)	(26.9)
Partnerships, LLC and other equity method income ⁴	145	285	(49.1)	701	978	(28.3)
Pre-tax operating (loss) income	(\$328)	\$39	NM	(\$121)	(\$146)	(17.1%)

1 Catastrophes are defined as a natural catastrophe or terror event exceeding \$25 million in estimated ultimate losses, net of reinsurance, and before taxes. Catastrophe losses, where applicable, include the impact of accelerated earned catastrophe premiums and earned reinstatement premiums

2 Asbestos and environmental is gross of the NICO Reinsurance Transaction.

3 Net of earned premium attributable to prior years of zero for the three and twelve months ended December 31, 2019 and 2018.

4 Partnerships, LLC and other equity method income includes LP, LLC and other equity method income within net investment income in the accompanying Consolidated Statements of Income and revenue and expenses from the production and sale of oil and gas.

NM = Not Meaningful

Fourth Quarter Results:

Pre-tax operating loss for the three months ended December 31, 2019 was \$328 million versus pre-tax operating income of \$39 million in the same period in 2018. The change primarily reflects higher unfavorable net incurred losses attributable to prior years on casualty lines ceded from the businesses as a part of the internal reinsurance treaty established in conjunction with the NICO Casualty Reinsurance Transaction and unfavorable development in asbestos and environmental, partially offset by favorable development on workers compensation and property lines and a benefit from the unwind of the existing loss on reinsurance related to the NICO Reinsurance Transaction. The change was also partially offset by lower employee salary and benefit expenses.

Revenues for the three months ended December 31, 2019 were \$425 million, an increase of \$207 million over the same period in 2018. The major components of revenues are net premium earned, net investment income (including LP, LLC and other equity method investments), net realized gains (losses), and fee and other revenues.

Net premium earned for the three months ended December 31, 2019 was (\$6) million, an increase of \$83 million over the same period in 2018. The increase primarily reflects higher assumed premium due to increased property catastrophe protection purchased by the businesses from Corporate and shifting the purchase of the homeowners quota share reinsurance treaties to Global Retail Markets.

Net investment income for the three months ended December 31, 2019 was \$126 million, a decrease of \$194 million from the same period in 2018. The decrease reflects less favorable valuations and distributions in private capital investments and decreases in valuations in energy investments in 2019 as compared to increases in valuations in 2018.

Net realized gains for the three months ended December 31, 2019 were \$184 million versus net realized losses of \$130 million for the same period in 2018. The net realized gains in the current quarter were primarily driven by a net change

in unrealized gains due to a change in accounting standards and net gains on fixed maturity sales. The prior period was impacted by impairments, primarily related to natural resources and company-owned real estate, as well as fixed maturity losses.

Fee and other revenues for the three months ended December 31, 2019 were \$121 million, an increase of \$4 million over the same period in 2018. The increase was primarily driven by higher natural resource revenues.

Claims, benefits and expenses for the three months ended December 31, 2019 were \$569 million, an increase of \$260 million over the same period in 2018. The increase primarily reflects higher unfavorable incurred losses attributable to prior years on casualty lines ceded from the businesses as a part of the internal reinsurance treaty established in conjunction with the NICO Casualty Reinsurance Transaction and unfavorable development in asbestos and environmental, partially offset by favorable development on workers compensation and property lines and a benefit from the unwind of the existing loss on reinsurance related to the NICO Reinsurance Transaction. The change was also partially offset by lower employee salary and benefit expenses.

Year-to-date Results:

Pre-tax operating loss for the twelve months ended December 31, 2019 was (\$121) million, a decrease of \$25 million from the same period in 2018. The decrease reflects higher profit margin within the reinsurance segment due to higher earned premium and a lower reduction of prior year expected recoveries on external reinsurance treaties due to less favorable reserve releases for prior year catastrophes in the business and lower employee salary and benefit expenses. These were partially offset by higher unfavorable net incurred losses attributable to prior years on casualty lines ceded from the businesses as a part of the internal reinsurance treaty established in conjunction with the NICO Casualty Reinsurance Transaction and unfavorable development in asbestos and environmental, partially offset by favorable development on workers compensation and property lines and a benefit from the unwind of the existing loss on reinsurance related to the NICO Reinsurance Transaction. The decrease was further impacted by lower partnerships, LLC and other equity method income.

Revenues for the twelve months ended December 31, 2019 were \$1.710 billion, an increase of \$773 million over the same period in 2018. The major components of revenues are net premium earned, net investment income (including LP, LLC and other equity method investments), net realized gains, and fee and other revenues.

Net premium earned for the twelve months ended December 31, 2019 was (\$40) million, an increase of \$291 million over the same period in 2018. The increase primarily reflects higher assumed premium due to increased property catastrophe protection purchased by the businesses from Corporate and shifting the purchase of the homeowners quota share reinsurance treaties to Global Retail Markets.

Net investment income for the twelve months ended December 31, 2019 was \$719 million, a decrease of \$282 million from the same period in 2018. The decrease reflects decreases in valuations in energy investments in 2019 as compared to increases in valuations in 2018. The decrease was partially offset by more favorable valuations and distributions in private capital investments in 2019 as compared to the same period in 2018. The decrease is also partially offset by investment income from a higher net invested asset base in 2019 as compared to the same period in 2018.

Net realized gains for the twelve months ended December 31, 2019 were \$525 million versus net realized losses of \$137 million for the same period in 2018. The net realized gains in the current period were primarily driven by a change in unrealized gains primarily due to a change in accounting standards and net gains on fixed maturity sales. This was partially offset by impairment charges, primarily related to corporate real estate and natural resources. The prior period was impacted by impairments on natural resources and company-owned real estate, as well as fixed maturity net losses, partially offset by a \$162 million gain as a result of the acquisition of a previously held equity method investment and a \$148 million gain from the sale of a privately held equity security.

Fee and other revenues for the twelve months ended December 31, 2019 were \$506 million, an increase of \$102 million over the same period in 2018. The increase was primarily driven by higher natural resource revenues.

Claims, benefits and expenses for the twelve months ended December 31, 2019 were \$1.306 billion, an increase of \$86 million over the same period in 2018. The increase primarily reflects higher unfavorable incurred losses

attributable to prior years on casualty lines ceded from the businesses as a part of the internal reinsurance treaty established in conjunction with the NICO Casualty Reinsurance Transaction and unfavorable development in asbestos and environmental, partially offset by favorable development on workers compensation and property lines and a benefit from the unwind of the existing loss on reinsurance related to the NICO Reinsurance Transaction. The increase was also partially offset by a lower reduction of prior year expected recoveries on external reinsurance treaties due to less favorable reserve releases for prior year catastrophes in the businesses and lower employee salary and benefit expenses.

INVESTMENTS

General

The Company's investment strategy seeks long-term returns through disciplined security selection, portfolio diversity and an integrated approach to risk management. The Company selects and monitors investments to balance the goals of safety, stability, liquidity, growth and after-tax total return with its need to comply with regulatory investment requirements. A relatively safe and stable income stream is achieved by maintaining a broadly-based portfolio of investment grade bonds. These holdings are supplemented by investments in additional asset types with the objective of further enhancing the portfolio's diversification and expected returns. These additional asset types include commercial mortgages and other real estate financing investments, non-investment grade bonds, including leveraged loans, common and preferred stock, private equity and direct investments in natural resource ventures. Risk management is accomplished through asset liability management (including both interest rate risk and foreign currency risk), diversification, credit limits and a careful analytical review of each investment decision.

The Company's investment policy and strategy are reviewed and approved by the Investment Committee of its Board of Directors, which meets on a regular basis to review and consider investment activities, tactics and new investment classes. In addition, the Company predominantly uses a subsidiary investment advisor for managing and administering the investment portfolios of its domestic and foreign insurance operations.

Invested Assets (including cash and cash equivalents)

The following table summarizes the Company's invested assets by asset category as of December 31, 2019 and December 31, 2018:

Invested Assets by Type \$ in Millions	As of December 31, 2019		As of December 31, 2018	
	Carrying Value	% of Total	Carrying Value	% of Total
Fixed maturities, available for sale, at fair value	\$64,606	79.7%	\$57,706	76.6%
Equity securities, at fair value ¹	2,140	2.6	-	-
Equity securities, available for sale, at fair value ¹	-	-	3,511	4.6
LP, LLC and other equity method investments	6,811	8.4	6,148	8.2
Commercial mortgage loans	1,981	2.4	1,731	2.3
Short-term investments	222	0.3	416	0.6
Other investments	407	0.5	289	0.4
Cash and cash equivalents	4,969	6.1	5,466	7.3
Total invested assets	\$81,136	100.0%	\$75,267	100.0%

¹ Included in Equity securities, at fair value as of December 31, 2019 and Equity securities, available for sale, at fair value as of December 31, 2018, were \$0 million and \$936 million, respectively of investments in bond ETFs

Total invested assets as of December 31, 2019 were \$81.136 billion, an increase of \$5.869 billion or 7.8% over December 31, 2018. The increase was primarily related to an increase in fixed maturities partially offset by a decrease in equity securities.

Fixed maturities as of December 31, 2019 were \$64.606 billion, an increase of \$6.900 billion or 12.0% over December 31, 2018. The increase was primarily related to the reinvestment of proceeds from the sale of bond and equity ETFs and the favorable impact of the decrease in treasury rates and tightening credit spreads. As of December 31, 2019, included in fixed maturities are commitments to purchase various residential mortgage-backed securities at a cost and fair value of \$546 million and \$548 million, respectively.

Equity securities as of December 31, 2019 were \$2.140 billion (\$2.130 billion common stock and \$10 million preferred stock) versus \$3.511 billion as of December 31, 2018 (\$3.480 billion common stock and \$31 million preferred stock), a decrease of \$1.371 billion or 39.0% from December 31, 2018. Of the \$2.130 billion of common stock at December 31, 2019, \$701 million relates to securities associated with non-guaranteed unit linked life insurance where the policyholder bears the investment risk. The decrease in total equity securities is primarily due to the sale of ETFs.

The following table summarizes the Company's LP, LLC and other equity method investments as of December 31, 2019 and December 31, 2018:

LP, LLC and other equity method investments \$ in Millions	As of December 31, 2019		As of December 31, 2018	
	Carrying Value	% of Total	Carrying Value	% of Total
Traditional private equity	\$3,154	46.3%	\$2,727	44.4%
Natural resources – Energy	399	5.9	573	9.3
Natural resources – Other ¹	780	11.5	661	10.7
Real estate	1,134	16.6	978	15.9
Private credit	715	10.5	597	9.7
Other	629	9.2	612	10.0
Total LP, LLC and other equity method investments	\$6,811	100.0%	\$6,148	100.0%

¹ Included in Natural Resources – Other is \$183 million and \$184 million of investments in metals & mining as of December 31, 2019 and December 31, 2018 respectively, \$125 million and \$116 million of investments in agriculture and timber as of December 31, 2019 and December 31, 2018 respectively, and \$472 million and \$361 million of investments in power and renewables as of December 31, 2019 and December 31, 2018 respectively.

Commercial mortgage loans as of December 31, 2019 were \$1.981 billion (net of \$2 million of loan loss reserves or 0.10% of the outstanding loan portfolio), an increase of \$250 million or 14.4% over December 31, 2018. The increase is primarily driven by \$472 million in funding, partially offset by \$222 million in principal reductions. The entire commercial loan portfolio is U.S.-based. The number of loans in the portfolio decreased from 4,419 at December 31, 2018 to 4,090 at December 31, 2019.

Cash and cash equivalents as of December 31, 2019 were \$4.969 billion, a decrease of \$497 million or 9.1% from December 31, 2018. The decrease primarily reflects a decrease in cash from investing and financing activities.

The following tables summarize the Company's available for sale portfolio by security type as of December 31, 2019 and December 31, 2018:

\$ in Millions	As of December 31, 2019			
	Amortized Cost	Gross Unrealized Gains	Gross Unrealized Losses	Fair Value
U.S. government and agency securities	\$9,041	\$145	(\$6)	\$9,180
Residential MBS ¹	6,166	105	(6)	6,265
Commercial MBS	4,410	131	(5)	4,536
Other MBS and ABS ²	5,134	48	(31)	5,151
U.S. state and municipal	8,429	497	(7)	8,919
Corporate and other	24,784	844	(47)	25,581
Foreign government securities	4,756	230	(12)	4,974
Total securities available for sale	\$62,720	\$2,000	(\$114)	\$64,606

1 Mortgage-backed securities ("MBS")

2 Asset-backed securities ("ABS")

\$ in Millions	As of December 31, 2018			
	Amortized Cost	Gross Unrealized Gains	Gross Unrealized Losses	Fair Value
U.S. government and agency securities	\$6,497	\$47	(\$33)	\$6,511
Residential MBS	5,710	31	(95)	5,646
Commercial MBS	2,965	27	(36)	2,956
Other MBS and ABS	4,595	16	(77)	4,534
U.S. state and municipal	8,452	181	(64)	8,569
Corporate and other	24,633	168	(533)	24,268
Foreign government securities	5,108	154	(40)	5,222
Total fixed maturities	57,960	624	(878)	57,706
Common stock	3,673	100	(293)	3,480
Preferred stock	29	2	-	31
Total equity securities	3,702	102	(293)	3,511
Total securities available for sale	\$61,662	\$726	(\$1,171)	\$61,217

The following table summarizes the Company's mortgage and asset-backed fixed maturity portfolio by credit quality as of December 31, 2019:

Mortgage & Asset-Backed Fixed Maturities by Credit Quality ¹	As of December 31, 2019							
	AAA	AA	A	BBB	BB	B or Lower	Total	% of Total
\$ in Millions								
Residential MBS	\$6,250	\$-	\$11	\$-	\$-	\$4	\$6,265	39.3%
Commercial MBS	4,323	106	62	31	14	-	4,536	28.4%
Other MBS and ABS	3,433	494	373	541	258	52	5,151	32.3%
Total	\$14,006	\$600	\$446	\$572	\$272	\$56	\$15,952	100.0%
% of Total	87.8%	3.8%	2.8%	3.6%	1.7%	0.3%	100.0%	

¹ For purposes of this disclosure, credit quality is primarily based upon average credit ratings.

Approximately 66% of the Company's mortgage and asset-backed fixed maturity portfolio is explicitly backed by the U.S. government (SBA and GNMA) or by government-sponsored entities (FNMA and FHLMC). Approximately 88% of the holdings are rated AAA. Included in the commercial mortgage-backed securities at December 31, 2019, were \$3.346 billion in Agency CMBS and \$1.190 billion Non-agency CMBS. Included in the Other MBS and ABS at December 31, 2019 were \$1.028 billion AAA rated SBA Loans. The commercial mortgage-backed securities portfolio is well diversified and of high quality with approximately 95% rated AAA.

The following table summarizes the Company's U.S. state and municipal fixed maturity portfolio of securities which are obligations of states, municipalities and political subdivisions (collectively referred to as U.S. state and municipal bonds) by credit quality as of December 31, 2019 and December 31, 2018:

U.S. State and Municipal by Credit Quality ¹	As of December 31, 2019			As of December 31, 2018		
	Fair Value	% of Total	Average Credit Rating	Fair Value	% of Total	Average Credit Rating
\$ in Millions						
State general obligation	\$1,539	17.2%	AA	\$1,238	14.4%	AA
Local general obligation	1,365	15.3	AA	1,135	13.2	AA
Revenue	5,929	66.5	AA	6,143	71.8	AA
Pre-refunded	86	1.0	AAA	53	0.6	AAA
Total U.S. state and municipal	\$8,919	100.0%	AA	\$8,569	100.0%	AA

¹ For purposes of this disclosure, credit quality is primarily based upon average credit ratings.

The municipal bond portfolio (taxable and tax-exempt) includes general obligation and revenue bonds issued by states, cities, counties, school districts, hospitals, educational institutions, and similar issuers. Included in the municipal bond portfolio at December 31, 2019 and December 31, 2018 were \$86 million and \$53 million, respectively, of pre-refunded bonds, which are bonds for which states or municipalities have established irrevocable trusts, which were created to satisfy their responsibility for payments of principal and interest.

The following table summarizes the Company's allocation of fixed maturities by credit quality as of December 31, 2019 and December 31, 2018:

Fixed Maturities by Credit Quality ¹	As of December 31, 2019		As of December 31, 2018	
	Fair Value	% of Total	Fair Value	% of Total
\$ in Millions				
AAA	\$25,592	39.6%	\$20,539	35.6%
AA+, AA, AA-	9,419	14.6	8,541	14.8
A+, A, A-	12,163	18.8	11,617	20.1
BBB+, BBB, BBB-	13,696	21.2	13,708	23.8
Total investment grade	60,870	94.2	54,405	94.3
BB+, BB, BB-	2,030	3.2	2,007	3.4
B+, B, B-	1,449	2.2	1,048	1.8
CCC or lower	192	0.3	156	0.3
Unrated ²	65	0.1	90	0.2
Total below-investment grade	3,736	5.8	3,301	5.7
Total fixed maturities	\$64,606	100.0%	\$57,706	100.0%

1 For purposes of this disclosure, credit quality is primarily based upon average credit ratings.

2 Bank loans acquired as part of Ironshore acquisition.

The Company's holdings of below investment grade securities primarily consist of an actively managed diversified portfolio of high yield securities and leveraged loans within the domestic insurance portfolios and investments in emerging market sovereign and corporate debt primarily in support of the Company's international insurance operations. Overall, the average credit quality rating stands at A+ as of December 31, 2019.

The following table summarizes available for sale fixed maturity securities by contractual maturity at December 31, 2019 and December 31, 2018. Actual maturities may differ from contractual maturities because certain securities may be called or prepaid with or without call or prepayment penalties. Due to the potential for prepayment on MBS and ABS, they are not categorized by contractual maturity.

Fixed Maturity by Maturity Date	As of December 31, 2019		As of December 31, 2018	
	Fair Value	% of Total	Fair Value	% of Total
\$ in Millions				
One year or less	\$3,462	5.4%	\$2,970	5.1%
Over one year through five years	21,930	33.9	22,692	39.3
Over five years through ten years	15,309	23.7	12,346	21.4
Over ten years	7,953	12.3	6,562	11.4
MBS and ABS	15,952	24.7	13,136	22.8
Total fixed maturities	\$64,606	100.0%	\$57,706	100.0%

During 2019, after taking into consideration changes in investment opportunities and its view of the current and prospective business and economic environment, the Company has made only minor adjustments to the average duration of its investment portfolio. The average duration of the investment portfolio as of December 31, 2019 was 4.0 years.

The following tables summarize the Company's gross unrealized losses and fair value of fixed income and equity securities by the length of time that individual securities have been in a continuous unrealized loss position as of December 31, 2019 and December 31, 2018 that are not deemed to be other-than-temporarily impaired:

	As of December 31, 2019			
\$ in Millions	Less Than 12 Months		12 Months or Longer	
Unrealized Losses & Fair Value by Security Type	Unrealized Losses	Fair Value of Investments with Unrealized Losses	Unrealized Losses	Fair Value of Investments with Unrealized Losses
U.S. Government and agency securities	(\$5)	\$949	(\$1)	\$152
Residential MBS	(4)	575	(2)	493
Commercial MBS	(5)	409	-	43
Other MBS and ABS	(16)	1,204	(15)	534
U.S. state and municipal	(7)	681	-	4
Corporate and other	(28)	1,715	(19)	421
Foreign government securities	(11)	769	(1)	142
Total securities available for sale	(\$76)	\$6,302	(\$38)	\$1,789

	As of December 31, 2018			
\$ in Millions	Less Than 12 Months		12 Months or Longer	
Unrealized Losses & Fair Value by Security Type	Unrealized Losses	Fair Value of Investments with Unrealized Losses	Unrealized Losses	Fair Value of Investments with Unrealized Losses
U.S. Government and agency securities	(\$4)	\$827	(\$29)	\$1,749
Residential MBS	(12)	738	(83)	3,187
Commercial MBS	(5)	374	(31)	1,369
Other MBS and ABS	(38)	1,812	(39)	1,555
U.S. state and municipal	(4)	472	(60)	2,567
Corporate and other	(293)	10,771	(240)	6,852
Foreign government securities	(16)	754	(24)	913
Total fixed maturities	(372)	15,748	(506)	18,192
Common stock	(232)	2,184	(61)	881
Preferred stock	-	4	-	-
Total equity securities	(232)	2,188	(61)	881
Total securities available for sale	(\$604)	\$17,936	(\$567)	\$19,073

Unrealized losses for fixed maturity securities decreased from \$878 million as of December 31, 2018 to \$114 million as of December 31, 2019. The Company monitors the difference between the amortized cost and estimated fair value of fixed maturity securities to ascertain whether declines in value are temporary in nature. The Company currently does not have the intent to sell these securities and has determined it is not more likely than not that it would be required to sell these fixed maturity securities before they recover their fair value. The Company has concluded that the gross unrealized losses of fixed maturity securities as of December 31, 2019 are temporary.

The following tables summarize the Company's issuer and sector exposure¹ as of December 31, 2019:

Top 10 Issuers	As of December 31, 2019				
\$ in Millions	Fixed Maturity	Equity	Short-Term	Total Exposure	% of Invested Assets
Government of Brazil	\$667	\$-	\$-	\$667	0.82%
Government of United Kingdom	499	-	3	502	0.62
Government of Canada	429	-	4	433	0.54
New York State Dormitory Authority	405	-	-	405	0.50
Bank of America Corp	375	-	-	375	0.46
Government of Italy	368	-	-	368	0.45
Government of Spain	355	-	-	355	0.44
Citigroup Inc	327	-	-	327	0.40
JP Morgan Chase & Co	315	-	-	315	0.39
Morgan Stanley	284	-	-	284	0.35
Total	\$4,024	\$-	\$7	\$4,031	4.97%

Top 10 Sectors	As of December 31, 2019				
\$ in Millions	Fixed Maturity	Equity	Short-Term	Total Exposure	% of Invested Assets
Banking	\$5,200	\$2	\$146	\$5,348	6.59%
Foreign Government	3,897	-	37	3,934	4.85
US Municipal – State & US Territory	2,413	-	-	2,413	2.97
Technology	1,763	250	-	2,013	2.48
Electric Utility	1,646	299	1	1,946	2.40
US Municipal – Local Govt	1,700	-	-	1,700	2.10
REITS	563	1,118	-	1,681	2.07
Pharmaceuticals	1,211	46	14	1,271	1.56
Insurance	1,148	101	-	1,249	1.54
Healthcare	951	167	-	1,118	1.38
Total	\$20,492	\$1,983	\$198	\$22,673	27.94%

¹ Tables exclude U.S. Treasury and agency securities, mortgage-backed securities, ETFs, and municipal obligations that are pre-funded or escrowed to maturity.

As of December 31, 2019, investments in the energy sector accounted for \$2.615 billion or 3.2% of total invested assets. The energy sector is comprised of investments in the following sub-sectors: independent energy, integrated energy, midstream, oil field services, and refining (*classification per Bloomberg Barclays Industry Groups*). These individual energy sub-sectors are not material enough at an individual level to appear within the top 10 rankings in the sector table above. Energy investments consist of investment grade bonds of \$2.013 billion, bonds that were rated below investment grade of \$200 million, and natural resources partnerships and other equity method investments of \$402 million. In addition, the Company has direct investments in oil and gas wells of \$1.107 billion which are included in other assets on the Consolidated Balance Sheets. Agriculture and timber investments consist of natural resource partnerships of \$125 million. In addition, the Company has direct investments in agriculture and timber of \$376 million which are included in other assets on the Consolidated Balance Sheets.

The following table summarizes the Company's unfunded commitments as of December 31, 2019 and December 31, 2018:

Unfunded Commitments	As of December 31, 2019		As of December 31, 2018	
	Total	% of Total	Total	% of Total
\$ in Millions				
Traditional private equity	\$1,160	32.4%	\$980	32.5%
Natural resources – Energy	119	3.3	521	17.3
Natural resources – Other ¹	223	6.2	99	3.3
Real estate	796	22.2	687	22.8
Private credit	1,168	32.6	545	18.1
Other	116	3.3	181	6.0
Total unfunded commitments	\$3,582	100.0%	\$3,013	100.0%

¹ Includes power and renewables, and agriculture and timber commitments.

Unfunded commitments as of December 31, 2019 were \$3.582 billion, an increase of \$569 million over December 31, 2018. The increase was due to new commitments net of contributions, primarily related to private credit. The \$119 million unfunded energy investment commitments as of December 31, 2019 included \$96 million related to energy partnerships and \$23 million related to direct investments in oil and gas wells. The \$521 million unfunded energy investment commitments as of December 31, 2018 included \$160 million related to energy partnerships and \$361 million related to direct investments in oil and gas wells.

LIQUIDITY AND CAPITAL RESOURCES

The liquidity requirements of the insurance subsidiaries are met primarily by funds generated from operations, asset maturities and income received on investments. Cash provided from these sources is used primarily for claims, claim adjustment expenses and operating expenses (underwriting and corporate benefit costs). There are certain cash outflows such as catastrophes and continued settlements of asbestos reserves that are unpredictable in nature and could create increased liquidity needs. The Company believes that the insurance subsidiaries' future business liquidity needs will be met from all the above sources. However, the Company maintains back up borrowing facilities as an additional contingent source of funds. These include:

- A \$250 million repurchase agreement for a three-year period, which terminates December 1, 2020. At December 31, 2019, no funds were borrowed under the facility.
- A \$250 million repurchase agreement with an expiration date of November 24, 2020. At December 31, 2019, no funds were borrowed under the facility.
- LMIC, Peerless Insurance Company ("PIC"), Liberty Mutual Fire Insurance Company ("LMFIC"), Employers Insurance Company of Wausau ("EICOW"), Ironshore Specialty Insurance Company ("ISIC") and Ironshore Indemnity Insurance ("III") are members of the Federal Home Loan Bank. The Company has \$300 million of Federal Home Loan Bank borrowings with maturity dates in 2032. As of December 31, 2019, the outstanding Federal Home Loan Bank borrowings are fully collateralized.

Net cash flows are generally invested in marketable securities while keeping a certain amount in cash and short-term investments to meet unpredictable cash obligations. The Company monitors the duration of these investments, and purchases and sales are executed with the objective of having adequate cash available to satisfy its maturing liabilities. As the Company's investment strategy focuses on overall asset and liability durations, and not specific cash flows, asset sales may be required to satisfy obligations or rebalance asset portfolios. The Company's invested assets as of December 31, 2019 (including cash and cash equivalents) totaled \$81.136 billion.

Debt outstanding as of December 31, 2019 and December 31, 2018 was as follows:

Short-term debt:

\$ in Millions	As of December 31, 2019	As of December 31, 2018
Short-term debt	\$ -	\$ -

Long-term debt:

\$ in Millions	As of December 31, 2019	As of December 31, 2018
Junior Subordinated notes, due 2067 ¹	\$-	\$300
5.00% Notes, due 2021	330	600
4.95% Notes, due 2022	473	750
4.25% Notes, due 2023	547	1,000
1.75% €500 Million Notes, due 2024	561	572
8.50% Surplus notes, due 2025	140	140
2.75% €750 Million Notes, due 2026	842	857
7.875% Surplus notes, due 2026	227	227
7.625% Notes, due 2028	3	3
4.569% Notes, due 2029	1,000	-
3.91% - 4.25% Federal Home Loan Bank Borrowings, due 2032	300	300
7.00% Notes, due 2034	153	231
6.50% Notes, due 2035	301	471
7.50% Notes, due 2036	19	19
7.80% Junior Subordinated notes, due 2087 ²	437	700
10.75% Junior Subordinated notes, due 2088 ³	35	52
6.50% Notes, due 2042	270	750
4.85% Notes, due 2044	614	1,050
4.50% Notes, due 2049	350	-
3.951% Notes, due 2050	1,248	-
3.625% €500 Million Junior Subordinated notes, due 2059 ⁴	561	-
7.697% Surplus notes, due 2097	260	260
Subtotal	8,671	8,282
Unamortized discount	(431)	(11)
Long-term debt excluding unamortized debt issuance costs	8,240	8,271
Unamortized debt issuance costs	(40)	(38)
Total long-term debt	\$8,200	\$8,233

1 7.00% fixed rate became 6.324% starting March 15, 2017 through a swap. Bondholders were paid 3-month LIBOR + 2.905% at redemption on June 17, 2019.

2 The par value call date and final fixed rate interest payment date is March 15, 2037, subject to certain requirements.

3 The par value call date and final fixed rate interest payment date is June 15, 2038, subject to certain requirements.

4 The par value call date and final fixed rate interest payment date is May 23, 2024, subject to certain requirements.

As part of its overall capital strategy, the Company previously announced that it may issue, repurchase or exchange debt depending on market conditions. Debt repurchases may be executed through open market or other appropriate transactions. The Company continues to evaluate market conditions and may periodically affect transactions in its debt, subject to applicable limitations.

Debt Transactions

On September 27, 2019, LMGI exchanged \$1.25 billion par value of the 2050 Notes for \$78 million of its 7.00% Senior Notes due 2034, \$170 million of its 6.50% Senior Notes due 2035, \$480 million of its 6.50% Senior Notes due 2042, \$436 million of its 4.85% Senior Notes due 2044, \$67 million of the 2087 Notes and \$17 million of its 10.75% Junior Subordinated Notes due 2088. LMGI paid an aggregate of \$411 million cash consideration, including accrued and unpaid interest, for the existing notes accepted for exchange. Interest on the 2050 Notes is payable semi-annually at a fixed rate of 3.951%. The 2050 Notes mature on October 15, 2050.

On June 11, 2019, LMGI issued \$350 million of Senior Notes due 2049 (the "2049 Notes"). Interest is payable semi-annually at a fixed rate of 4.50%. The 2049 Notes mature on June 15, 2049.

On June 7, 2019, LMGI tendered \$196 million of the 2087 Notes. LMGI paid an aggregate of \$247 million cash consideration, including accrued and unpaid interest, for the tender of the 2087 Notes.

On May 23, 2019, LMGI redeemed \$300 million Junior Subordinated Notes due 2067 (the redeemed “2067 Notes”). LMGI terminated the two interest rate swap transactions with respect to the redeemed 2067 Notes. LMGI paid \$43 million for the early termination of the swap transactions.

On May 23, 2019, LMGI issued €500 million of Series D Junior Subordinated notes (the “Series D Notes”) scheduled for redemption on May 23, 2059. The Series D Notes have a par value call date of May 23, 2024 (the “First Call Date”) and may be redeemed in whole or in part on each date falling on the fifth anniversary thereafter (the “Reset Period”). Interest is payable annually at a fixed rate of 3.625% up to but excluding the first call date. In the event the Series D Notes are not redeemed on the First Call Date, interest will be payable annually at a rate equal to the relevant Euro 5 Year Swap rate plus 3.700% per year (the “Margin”) in respect of the Reset Period commencing on the First Call Date and each subsequent Reset Period, up to but excluding May 23, 2044 (the “Step-up Date”). In the event the Series D Notes are not redeemed on or before the Step-up Date, interest will be payable annually, including the Step-up Date but excluding the stated maturity, in respect of each Reset Period between the Step-up Date and the stated maturity, the relevant Euro 5 Year Swap Rate plus the Margin plus 1.00% per year. LMGI has the right to defer interest payments on the Series D Notes for a period up to ten years. Interest compounds during periods of deferral.

On January 28, 2019, LMGI exchanged \$1 billion par value of the 2029 Notes for \$270 million of its 5.00% Notes due 2021, \$277 million of its 4.95% Notes due 2022 and \$453 million of its 4.25% Notes due 2023. LMGI paid an aggregate of \$40 million cash consideration, including accrued and unpaid interest, for the existing notes accepted for exchange. Interest on the 2029 Notes is payable semi-annually at a fixed rate of 4.569%. The 2029 Notes mature on February 1, 2029.

Interest Expense

Consolidated interest expense for the three months and twelve months ended December 31, 2019 was \$107 million and \$438 million, respectively, a decrease of \$3 million from the same periods in 2018.

Holding Company Liquidity and Capital Resources

The Company conducts substantially all of its operations through its wholly owned insurance and service company subsidiaries, and therefore is primarily dependent on dividends, distributions, loans or other payments of funds from these entities to meet its current and future obligations. However, the subsidiaries are separate and distinct legal entities and have no obligation to make funds available to the Company, whether in the form of loans, dividends or other distributions. As of December 31, 2019, the Company, through its downstream subsidiaries LMGI and Liberty Mutual Finance Europe DAC (“LMFE”), had \$7.2 billion and \$561 million, respectively, of debt outstanding, excluding discount and issuance costs.

The insurance subsidiaries’ ability to pay dividends on preferred or common stock is restricted under applicable insurance laws and regulations and may be paid only from unassigned surplus. Under the insurance laws of the domiciliary states of the insurance subsidiaries, an insurer may make an ordinary dividend payment if its surplus as regards policyholders, following such dividend, is reasonable in relation to its outstanding liabilities, is adequate to meet its financial needs, and does not exceed the insurer’s unassigned surplus. However, no insurer may pay an extraordinary dividend without the approval or non-disapproval of the domiciliary insurance regulatory authority. Insurance subsidiaries owned directly by LMGI are LMIC, Liberty Mutual Personal Insurance Company (“LMPICO”), LMFIC and EICOW. Under the insurance laws of Massachusetts, the domiciliary state of LMIC and LMPICO, an extraordinary dividend is defined as a dividend whose fair market value, together with other dividends made within the preceding 12 months, exceeds the greater of 10% of the insurer’s surplus as regards policyholders as of the preceding December 31, or the insurer’s net income for the 12-month period ending on the preceding December 31. Under the insurance laws of Wisconsin, the domiciliary state of LMFIC and EICOW, an extraordinary dividend is defined as a dividend whose fair market value, together with other dividends paid within the preceding 12 months, exceeds the lesser of (a) 10% of the insurer’s surplus as regards policyholders as of the preceding December 31, or (b)

the greater of (1) the insurer’s net income for the preceding calendar year, minus realized capital gains for that calendar year, or (2) the aggregate of the insurer’s net income for the three preceding calendar years minus realized capital gains for those calendar years and minus dividends paid within the first two of the preceding three calendar years. Changes in the extraordinary dividend regulation of the domiciliary states of LMIC, LMFIC and EICOW could negatively affect LMGI’s ability to pay principal and interest on its debt, as could a redomestication or merger of LMIC, LMPICO, LMFIC or EICOW to a different domiciliary state.

The authorized control level risk-based capital (as of December 31, 2019) and 2020 available dividend capacity prior to needing regulatory approval for LMIC, LMFIC and EICOW were as follows:

\$ in Millions	RBC Ratio ¹		Dividend Capacity ²	Dividends Paid ³
	2019	2018	2020	2019
RBC Ratios and Dividend Capacity				
LMIC	388%	399%	\$1,641	\$65
LMFIC	502%	494%	\$183	\$15
EICOW	468%	454%	\$181	\$-

1 Authorized control level risk-based capital as defined by the NAIC.

2 Represents the estimated maximum allowable dividend without prior regulatory approval in the state of domicile.

3 Dividends paid represent amounts paid during the twelve months ended December 31, 2019. Available dividend capacity as of December 31, 2019 is calculated as 2020 dividend capacity less dividends paid for the preceding 12 months.

LMGI also has access to the following sources of funding:

- An unsecured revolving credit facility of \$1 billion with an expiration date of June 25, 2024. To date, no funds have been borrowed under the facility.
- A management services agreement with LMIC pursuant to which LMGI is entitled to collect certain costs plus a management fee for services rendered by LMGI employees.
- Investment management agreements with affiliated entities pursuant to which an LMGI subsidiary investment advisor is entitled to recover annual expenses for investment management services performed by its employees.
- Liberty Corporate Services LLC (“LCS”), which through its subsidiaries collects fees and other revenues, primarily for claims administration, agency and IT services rendered for affiliated and non-affiliated entities. For the three and twelve months ended December 31, 2019, LCS recorded \$99 million and \$407 million, respectively, in pre-tax income.
- Approximately \$80 million of annual dividends related to non-redeemable perpetual preferred stock issuances by LMIC and LMFIC.

\$ in Millions	As of December 31, 2019	As of December 31, 2018
Total debt	\$8,200	\$8,233
Unamortized discount and debt issuance costs	(471)	(49)
Total debt excluding unamortized discount and debt issuance costs	\$8,671	\$8,282
Total equity excluding accumulated other comprehensive loss	\$24,985	\$24,141
Total capital excluding accumulated other comprehensive loss ¹	\$33,656	\$32,423
Debt-to-capital capitalization excluding accumulated other comprehensive loss ¹	25.8%	25.5%
Statutory surplus	\$20,538	\$19,766

¹ Excludes unamortized discount and debt issuance costs

The total debt-to-capital capitalization ratio excluding accumulated other comprehensive loss is calculated by dividing (a) total debt excluding unamortized discount and debt issuance costs by (b) total capital excluding accumulated other comprehensive loss. Net unrealized gains and losses on investments can be significantly impacted by both interest rate movements and other economic factors. Accordingly, in the opinion of the Company's management, the debt-to-total capital ratio calculated on this basis provides another useful metric for investors to understand the Company's financial leverage position. The Company's ratio of debt-to-capital (excluding accumulated other comprehensive loss) of 25.8% at December 31, 2019 was within the Company's target range.

REINSURANCE

Reinsurance Recoverables

The Company reported reinsurance recoverables of \$15.928 billion and \$15.145 billion at December 31, 2019 and December 31, 2018, respectively, net of allowance for doubtful accounts of \$126 million and \$204 million, respectively. Included in these balances are \$1.063 billion and \$937 million of paid recoverables and \$14.991 billion and \$14.412 billion of unpaid recoverables (including retroactive reinsurance), respectively.

S&P Rating ¹	As of December 31, 2019			
	Gross Recoverables ²	Collateral Held ³	Net Recoverables ⁴	% of Total Net Recoverables
\$ in Millions				
<u>Rated Entities</u>				
AAA	\$ -	\$ -	\$ -	-
AA+, AA, AA-	6,462	5,970	2,156	22%
A+, A, A-	4,385	267	4,130	42%
BBB+, BBB, BBB-	(1)	-	(1)	-
BB+ or below	1	-	1	-
Subtotal	10,847	6,237	6,286	64%
<u>Pools & Associations</u>				
State mandated involuntary pools and associations	2,832	-	2,832	28%
Voluntary	187	119	182	2%
Subtotal	3,019	119	3,014	30%
<u>Non-Rated Entities⁵</u>				
Captives & fronting companies	1,381	1,499	247	2%
Other	807	1,310	390	4%
Subtotal	2,188	2,809	637	6%
Grand Total	\$16,054	\$9,165	\$9,937	100%

1 Standard & Poor's ratings are as of December 31, 2019.

2 Gross recoverables are defined as paid and unpaid claims and claim adjustment expense including IBNR and before both bad debt reserve set aside for potential uncollectible reinsurance and consideration of collateral.

3 Collateral refers to letters of credit, trust accounts, and funds held against outstanding and potential future claims and claim adjustment expenses related to reinsurance recoverable balances.

4 Net recoverables are defined as the difference between the amount of gross recoverables and collateral held for each reinsurer. If the collateral held for a reinsurer is greater than the gross recoverable, net recoverables are reported as \$0.

5 Reinsurers not rated by Standard & Poor's.

Reinsurance Groups ¹	As of December 31, 2019		
	Gross Recoverables ²	Collateral Held ³	Net Recoverables ⁴
\$ in Millions			
1. Berkshire Hathaway Insurance Group	\$4,047	\$5,150	\$176
2. Nationwide Group	1,322	-	1,321
3. Swiss Re Group	1,220	666	929
4. Everest Re Group	595	110	485
5. Munich Re Group	425	10	419
6. Alleghany Corp	397	-	397
7. Lloyd's of London	329	-	329
8. UPINSCO	317	386	-
9. CUMIS Insurance Society Group	276	-	276
10. Builders Reinsurance S.A.	269	344	-
11. Partner Re Group	249	30	219
12. Exchange Indemnity Company	244	116	130
13. Horseshoe Re Ltd.	242	521	3
14. Markel Corp	217	2	216
15. Hannover Re Group	170	23	148
State Mandated Involuntary pools and associations	2,832	-	2,832
Voluntary pools and associations	187	119	182
All Other	2,716	1,688	1,875
Total Reinsurance Recoverables	\$16,054	\$9,165	\$9,937

1 Reinsurance Groups are defined as all reinsurance subsidiaries owned by a common parent.

2 Gross recoverables are defined as paid and unpaid claims and claim adjustment expense including IBNR and before both bad debt reserve set aside for potential uncollectible reinsurance and consideration of collateral.

3 Collateral refers to letters of credit, trust accounts, and funds held against outstanding and potential future claims and claim adjustment expenses related to reinsurance recoverable balances.

4 Net recoverables are defined as the difference between the amount of gross recoverables and collateral held for each reinsurer. If the collateral held for a reinsurer is greater than the gross recoverable, net recoverables are reported as \$0.

Approximately 94% of the Company's reinsurance recoverable balance, net of collateral held and including voluntary and involuntary pools and associations, was from reinsurers rated A- or better from A.M. Best and Standard & Poor's, respectively, at December 31, 2019. Collateral held against outstanding gross reinsurance recoverable balances was \$9.165 billion at December 31, 2019.

The remaining 6% of the Company's net reinsurance recoverable balance is well diversified. No single reinsurer rated B++ or below by A.M. Best or below A- by Standard & Poor's accounts for more than 1% of GAAP equity. In addition, the average net reinsurance recoverable balance from individual reinsurers rated below A- or not rated by A.M. Best and Standard & Poor's was approximately \$1 million as of December 31, 2019.

The reinsurance recoverables from state mandated involuntary pools and associations primarily represent the Company's servicing carrier business. As a servicing carrier, the Company retains no direct underwriting risk but instead cedes 100% of the involuntary market premium and losses back to the pool. Payment of losses is shared by the pool participants in proportion to their pool participation. Reinsurer credit risk with respect to any such involuntary pool or association is a function of the creditworthiness of all the pool participants.

The Company's reinsurance recoverables from Nationwide Indemnity Company have been fully guaranteed by its parent, Nationwide Mutual Insurance Company, which has a financial strength rating of A+ from Standard & Poor's and A+ from A.M. Best.

Property Catastrophe Reinsurance

The Company has reinsurance coverage for its domestic business and certain specialty operations including: 1) hurricanes and earthquake reinsurance covering a substantial portion of \$3.1 billion of loss in excess of \$500 million of retained loss in the United States, Canada and the Caribbean, excluding certain reinsurance exposures; 2) aggregate

excess of loss programs; 3) quota share reinsurance programs; and 4) regional or country specific catastrophe reinsurance programs. These programs are structured to meet the Company's established tolerances under its Enterprise Risk Management Program.

Adverse Development Reinsurance

On November 5, 2019, LMIC entered into a reinsurance transaction with NICO, a subsidiary of Berkshire Hathaway Inc, on a combined aggregate excess of loss agreement for certain GRM U.S. Business Lines and GRS National Insurance workers compensation, commercial auto liability and general liability excluding umbrella and warranty liabilities. The first layer of the contract attaches at \$300 million below applicable held reserves at inception of \$8.341 billion of combined aggregate reserves. The second layer of the contract provides adverse development coverage for \$1.000 billion above a retention equal to \$8.741 billion. The contract includes a sublimit of \$100 million for certain general liability liabilities. At the closing of the NICO Casualty Reinsurance Transaction, but effective as of January 1, 2019, the Company ceded \$300 million of existing undiscounted liabilities, paid NICO total consideration of \$462 million and recorded a pre-tax loss of \$173 million. This contract is accounted for on a retroactive basis.

In general terms, the covered business includes post December 31, 2018 development for Global Retail Markets U.S. Business Lines and Global Risks Solutions National Insurance segment on: (1) certain workers compensation liabilities arising under policies on the books as of December 31, 2018 as respects injuries or accidents occurring after December 31, 2013 and prior to January 1, 2019; (2) commercial auto liabilities arising under policies on the books as of December 31, 2018 as respects injuries or accidents occurring prior to January 1, 2019; and (3) general liability excluding umbrella and warranty arising under policies on the books as of December 31, 2018 as respects injuries or accidents occurring prior to January 1, 2019.

Since the NICO Casualty Reinsurance Transaction is accounted for as retroactive reinsurance in the Company's GAAP Consolidated Financial Statements, to the extent there is unfavorable development of losses covered by this reinsurance, an additional reinsurance benefit is recognized in the Consolidated Statements of Income until those benefits exceed the loss on the transaction. Reinsurance benefits will be deferred and are amortized into earnings over the period when underlying claims are settled.

Subsequent to the transaction, the Company had net reserve strengthening across most lines of business. The strengthening offset the initial pre-tax loss of the NICO Casualty Reinsurance Transaction, resulting in a net contract position of zero as of December 31, 2019.

In conjunction with the Ironshore acquisition and effective May 1, 2017, the Company entered into a reinsurance transaction with NICO on a combined aggregate excess of loss agreement providing coverage for substantially all of Ironshore's reserves related to losses occurring prior to January 1, 2017. The first layer of the contract transfers \$400 million of held reserves at inception, for which the Company established reinsurance recoverables on the Consolidated Balance Sheet. The second layer of the contract provides adverse development coverage for 95% of \$500 million above a retention equal to \$3.0055 billion, minus paid losses between January 1, 2017 and May 1, 2017, which retention approximates the total held reserves on the covered business on Ironshore's opening balance sheet. The contract includes a sublimit of \$277 million for certain construction liability liabilities. The Company paid NICO consideration of \$550 million, including interest accrued at the time of the settlement. The contract is accounted for on a prospective basis.

On July 17, 2014, LMIC entered into a reinsurance transaction with NICO on a combined aggregate excess of loss agreement for substantially all of the Company's U.S. workers compensation, asbestos and environmental liabilities, attaching at \$12.522 billion of combined aggregate reserves, with an aggregate limit of \$6.500 billion and sublimits of \$3.100 billion for asbestos and environmental liabilities and \$4.507 billion for certain workers compensation liabilities. At the closing of the NICO Reinsurance Transaction, but effective as of January 1, 2014, the Company ceded \$3.320 billion of existing undiscounted liabilities under this retroactive reinsurance agreement. NICO will provide \$3.180 billion of additional aggregate adverse development reinsurance. The Company paid NICO total consideration of \$3.046 billion. With respect to the ceded asbestos and environmental business, NICO has been given authority to handle claims, subject to the Company's oversight and control. With respect to the ceded workers compensation business, the Company will continue to handle claims. This contract is accounted for on a retroactive basis.

In general terms, the covered business includes post December 31, 2013 development on: (1) asbestos and environmental liabilities arising under policies of insurance and reinsurance with effective dates prior to January 1, 2005; and (2) workers compensation liabilities arising out of policies on the books of the Company's former Commercial Insurance Strategic Business Unit as of December 31, 2013, as respects injuries or accidents occurring prior to January 1, 2014.

During 2019, the Company had net reserve strengthening driven by unfavorable development in asbestos and environmental, partially offset by favorable development in workers compensation. The Company reported the net position of the contract as a loss of \$13 million and \$117 million as of December 31, 2019 and 2018, respectively.

The Company reported deferred gain amortization of zero and (\$35) million at December 31, 2019 and 2018, respectively. As of December 31, 2019 and December 31, 2018, deferred gains were zero.

CRITICAL ACCOUNTING ESTIMATES

The preparation of financial statements in conformity with GAAP requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the financial statements, and the reported amounts of revenues and expenses during the reporting period. The Company's principal estimates include (1) unpaid claims and claim adjustment expense reserves, including asbestos and environmental liability reserves and loss sensitive premium attributable to prior years, (2) reinsurance recoverables and associated uncollectible allowance, (3) fair value determination and other-than-temporary impairments of the investment portfolio and direct investments in natural resources, (4) valuation of goodwill and intangible assets, (5) deferred income tax valuation allowance, and (6) pension and postretirement benefit obligations.

While the amounts included in the Consolidated Financial Statements reflect management's best estimates and assumptions, these amounts ultimately could vary.

For additional discussion, please refer to footnote 1 in the Company's December 31, 2019 Audited Consolidated Financial Statements.

Unpaid Claims and Claim Adjustment Expenses

Property and casualty insurance unpaid claims and claim adjustment expenses represent the Company's best estimate of amounts necessary to settle all outstanding claims, including claims that are incurred but not reported as of the reporting date. The Company's reserve projections are based primarily on detailed analysis of the facts in each case, experience with similar cases and various historical development patterns. Consideration is given to such historical patterns as field reserving trends and claims settlement practices, loss payments, pending levels of unpaid claims and product mix, as well as court decisions, economic conditions and public attitudes. All of these factors can affect the estimation of reserves.

Establishing loss reserves, including loss reserves for catastrophic events that have occurred, is an estimation process. Many factors can ultimately affect the final settlement of a claim and, therefore, the necessary reserve.

For additional discussion, please refer to footnote 6 in the Company's December 31, 2019 Audited Consolidated Financial Statements.

Asbestos and Environmental

As a result of the significant uncertainty inherent in determining a company's asbestos and environmental liabilities and establishing related reserves, the amount of reserves required to adequately fund the Company's asbestos and environmental claims cannot be accurately estimated using conventional reserving methodologies based on historical data and trends. As a result, the use of conventional reserving methodologies frequently has to be supplemented by subjective considerations including managerial judgment. In that regard, the estimation of asbestos claims and associated liabilities and the analysis of environmental claims considered prevailing applicable law and certain inconsistencies of court decisions as to coverage, plaintiffs' expanded theories of liability, and the risks inherent in major litigation and other uncertainties, the Company believes that in future periods it is possible that the outcome of the continued uncertainties regarding asbestos and environmental related claims could result in an aggregate liability that differs from current reserves and would be covered under the NICO Reinsurance Transaction.

For additional discussion, please refer to footnote 6 in the Company's December 31, 2019 Audited Consolidated Financial Statements.

Reinsurance Recoverables

Amounts recoverable from reinsurers are estimated in a manner consistent with the claim liability associated with the reinsured business. The Company evaluates and monitors the financial condition of its reinsurers under voluntary reinsurance arrangements to minimize its exposure to significant losses from reinsurer insolvencies. The Company reports its reinsurance recoverables net of an allowance for estimated uncollectible reinsurance recoverables. The allowance is based upon the Company's ongoing review of amounts outstanding, length of collection periods, changes

in reinsurer credit standing and other relevant factors. Accordingly, the establishment of reinsurance recoverables and the related allowance for uncollectible reinsurance recoverables is also an inherently uncertain process involving estimates. Changes in these estimates could result in additional charges to the accompanying Consolidated Statements of Income.

Ceded transactions that transfer risk but are retroactive are included in reinsurance recoverables. The excess of estimated liabilities for claims and claim costs over the consideration paid net of experience adjustments is established as a deferred credit at inception. The deferred amounts are subsequently amortized using the effective interest method over the expected settlement period. The periodic amortization is reflected in the accompanying Consolidated Statements of Income through benefits, claims and claim adjustment expenses. In transactions where the consideration paid exceeds the estimated liabilities for claims and claim costs a loss is recognized. If the adverse development net of experience adjustments exceeds the original loss, deferred gains are recorded. The deferred gains are subsequently recognized into earnings over the expected settlement period of the reserves.

For additional discussion, please refer to footnote 5 in the Company's December 31, 2019 Audited Consolidated Financial Statements.

Fair Value Determination

Fair value is the price that would be received to sell an asset or would be paid to transfer a liability in an orderly transaction between market participants at the measurement date. In determining fair value, the Company primarily uses the market approach, which generally utilizes market transaction data for identical or similar instruments.

The hierarchy level assigned to each security in the Company's investments portfolio is based on the Company's assessment of the transparency and reliability of the inputs used in the valuation of each instrument at the measurement date. Securities are classified into three hierarchy levels: Level 1, Level 2 or Level 3.

Regarding fair value measurements, as of December 31, 2019, excluding other assets, the Company reflected \$11.089 billion (16.5%) as level 1 (quoted prices in active markets) primarily consisting of U.S. Treasuries and common equity securities. The majority of the Company's invested assets are reported as level 2 (quoted prices from other observable inputs). As of December 31, 2019, the Company reported \$55.295 billion (82.1%) as level 2, consisting primarily of fixed maturity securities. Finally, the Company reported \$969 million (1.4%) as level 3 (unobservable inputs), primarily consisting of international and privately held securities for which a market price is not readily observable.

For additional discussion, please refer to footnote 10 in the Company's December 31, 2019 Audited Consolidated Financial Statements.

Impairment Losses on Investments

The Company reviews fixed maturity securities and other investments which include limited partnership and other equity method investments (primarily traditional private equity, natural resource and real estate) for impairment on a quarterly basis. These investments are reviewed for both quantitative and qualitative considerations including, but not limited to: (a) the extent of the decline in fair value below book value, (b) the duration of the decline, (c) significant adverse changes in the financial condition or near term prospects of the investment or issuer, (d) significant change in the business climate or credit ratings of the issuer, (e) general market conditions and volatility, (f) industry factors, (g) the past impairment of the security holding or the issuer, and (h) impact of foreign exchange rates on foreign currency denominated securities.

The Company is required to review its natural resource and other equity method investments when facts and circumstances indicate that carrying values may not be recoverable. In performing a quarterly review, the fair value of the Company's investment is estimated using indicators including, but not limited to, market comparables and analyses, commodity prices, and discounted cash flows and a realized loss is recognized for the excess, if any, of the investment's carrying value over its estimated fair value.

The Company is required to review its oil and gas properties when facts and circumstances indicate the possible existence of impairment. When a property's carrying value is greater than the expected future cash flows, impairment

expense is recognized to the extent that the carrying value of the property exceeds its estimated fair market value. In employing the discounted cash flow method described, key inputs include commodity prices, locational basis difference, production, project development costs and the discount rate which are based on management's expectations about outcomes with respect to these variables. Unproved properties are assessed at least annually to determine whether impairment has occurred.

For additional discussion, please refer to footnote 1 in the Company's December 31, 2019 Audited Consolidated Financial Statements.

Goodwill and Intangible Assets

Goodwill is tested for impairment at least annually using either a qualitative or a quantitative process. Election of the approach can be made at the reporting unit level. The reporting unit has the option to skip the qualitative test and move directly to completion of the quantitative process. As of December 31, 2019, the Company has two reporting units – Global Retail Markets and Global Risk Solutions.

Indefinite-lived intangible assets held by the Company are reviewed for impairment on at least an annual basis using a qualitative process. The classification of the asset as indefinite-lived is reassessed, and an impairment is recognized if the carrying amount of the asset exceeds its fair value.

In 2019, a goodwill impairment of \$33 million was recognized related to the sale of Pembroke Managing Agency Ltd. The Company recognized a syndicate capacity impairment of \$98 million in 2019. In addition, \$52 million of syndicate capacity was included in the sale of Pembroke Managing Agency Ltd. The Company had no material goodwill or intangible asset impairments recognized in 2018.

For additional discussion, please refer to footnote 1 in the Company's December 31, 2019 Audited Consolidated Financial Statements.

Deferred Income Taxes

The income tax provision is calculated under the liability method. Deferred income tax assets and liabilities are recorded based upon the difference between the financial statement and tax bases of assets and liabilities at the enacted tax rates. The principal assets and liabilities giving rise to such differences are insurance loss reserves, unearned premiums, net operating losses, employee benefits, accrued expenses, deferred policy acquisition costs, net unrealized gains and losses on investments, intangibles, equalization reserves and fixed assets.

No additional income taxes have been provided for any remaining undistributed foreign earnings not subject to the transition tax or any additional outside basis differences as these amounts continue to be indefinitely reinvested. Determining the amount of unrecognized deferred tax liability related to any remaining undistributed foreign earnings not subject to the transition tax or additional outside basis differences is not practicable.

As of December 31, 2019, the U.S. Treasury Department and the Internal Revenue Service ("IRS") are still in the process of issuing various regulations in accordance with the Tax Cuts and Jobs Act of 2017. Accordingly, future adjustments to the financial statements may be necessary as regulations are issued and the 2019 tax returns are filed with the IRS and foreign tax authorities.

Global intangible low-taxed income ("GILTI") is treated by the Company as a period expense.

For additional discussion, please refer to footnote 8 in the Company's December 31, 2019 Audited Consolidated Financial Statements.

Pension and Postretirement Benefit Obligations

On an annual basis, the Company reviews the discount rate assumption used to determine the benefit obligations and the composition of various yield curves to ensure that the assumed discount rate reflects the Company's best estimate

of the rate of return inherent in a portfolio of high-quality debt instruments that would provide the cash flows necessary to settle the Company's projected benefit payments.

The discount rate assumption used to determine the benefit obligations was based on a yield curve approach where the cash flows related to the benefit plans' liability stream were discounted at an interest rate specifically applicable to the timing of the cash flows. Effective January 1, 2016, service cost is calculated by discounting the future cash flows attributable to the current year of service using spot rates specifically applicable to the timing of the cash flows. Interest cost is determined by multiplying each benefit obligation cash flow by the spot rate applicable to that timing of the cash flow.

In choosing the expected long-term rate of return on plan assets, the Company's Retirement Committee considered the historical returns of equity and fixed income markets in conjunction with current economic and financial market conditions.

For additional discussion, please refer to footnote 9 in the Company's December 31, 2019 Audited Consolidated Financial Statements.

ABOUT THE COMPANY

Boston-based LMHC, the parent corporation of the Liberty Mutual Insurance group of entities, is a diversified global insurer and third largest property and casualty insurer in the U.S. based on 2018 direct written premium. The Company also ranks 75th on the Fortune 100 list of largest corporations in the U.S. based on 2018 revenue. As of December 31, 2019, LMHC had \$133.644 billion in consolidated assets, \$110.025 billion in consolidated liabilities, and \$43.228 billion in annual consolidated revenue.

LMHC, through its subsidiaries and affiliated companies, offers a wide range of property and casualty insurance products and services to individuals and businesses alike. In 2001 and 2002, the Company formed a mutual holding company structure, whereby the three principal mutual insurance companies, LMIC, LMFIC and EICOW, each became separate stock insurance companies under the ownership of LMHC.

Functionally, the Company conducts substantially all of its business through two business units, with each operating independently of the other in certain areas such as sales, underwriting, and claims, but, as appropriate, collaborating in other areas such as actuarial and financial. Management believes this structure provides increased synergy to the Company and permits each business unit to execute its business strategy and/or to make acquisitions without impacting or disrupting the operations of the other business unit.

LMHC employs over 45,000 people in 29 countries and economies around the world. For a full description of the Company's business operations, products and distribution channels, please visit Liberty Mutual's Investor Relations web site at www.libertymutualgroup.com/investors.