

MGIC INVESTMENT CORP
Form 10-K
February 22, 2019

UNITED STATES
SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, D.C. 20549

FORM 10-K

ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE
SECURITIES EXCHANGE ACT OF 1934

For the fiscal year ended December 31, 2018
OR

TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE
SECURITIES EXCHANGE ACT OF 1934

For the transition period from ____ to ____

Commission file number 1-10816

MGIC INVESTMENT CORPORATION

(Exact name of registrant as specified in its charter)

WISCONSIN

39-1486475

(State or other jurisdiction of incorporation or organization) (I.R.S. Employer Identification No.)

MGIC PLAZA, 250 EAST KILBOURN AVENUE,

MILWAUKEE, WISCONSIN

53202

(Address of principal executive offices)

(Zip Code)

(414) 347-6480

(Registrant's telephone number, including area code)

Securities Registered Pursuant to Section 12(b) of the Act:

Title of Each Class: Common Stock, Par Value \$1 Per Share
Common Share Purchase Rights

Name of Each Exchange on Which Registered: New York Stock Exchange

Securities Registered Pursuant to Section 12(g) of the Act: None

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act.

Yes No

Indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or Section 15(d) of the Act. Yes No

Indicate by check mark whether the Registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the Registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes No

Indicate by check mark whether the registrant has submitted electronically every Interactive Data File required to be submitted and posted pursuant to Rule 405 of Regulation S-T during the preceding 12 months (or for such shorter period that the registrant was required to submit such files). Yes No

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Indicate by check mark if disclosure of delinquent filers pursuant to Item 405 of Regulation S-K is not contained herein, and will not be contained, to the best of Registrant's knowledge, in definitive proxy or information statements incorporated by reference in Part III of this Form 10-K or any amendment to this Form 10-K.

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, or a smaller reporting company. See the definitions of "large accelerated filer," "accelerated filer," and "smaller reporting company," and "emerging growth company" in Rule 12b-2 of the Exchange Act. (Check one):

Large accelerated filer Accelerated filer Non-accelerated filer
Smaller reporting company Emerging growth company

If an emerging growth company, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards provided pursuant to Section 13(a) of the Exchange Act.

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Act). Yes No

State the aggregate market value of the voting common stock held by non-affiliates of the Registrant as of June 30, 2018: Approximately \$3.9 billion*

* Solely for purposes of computing such value and without thereby admitting that such persons are affiliates of the Registrant, shares held by directors and executive officers of the Registrant are deemed to be held by affiliates of the Registrant. Shares held are those shares beneficially owned for purposes of Rule 13d-3 under the Securities Exchange Act of 1934 but excluding shares subject to stock options.

Indicate the number of shares outstanding of each of the Registrant's classes of common stock as of February 15, 2019:
355,636,284

The following documents have been incorporated by reference in this Form 10-K, as indicated:

Document	Part and Item Number of Form 10-K Into Which Incorporated*
Proxy Statement for the 2018 Annual Meeting of Shareholders, provided such Proxy Statement is filed within 120 days after December 31, 2018. If not so filed, the information provided in Items 10 through 14 of Part III will be included in an amended Form 10-K filed within such 120 day period.	Items 10 through 14 of Part III

* In each case, to the extent provided in the Items listed.

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Glossary of terms and acronyms

/ A

ARMs

Adjustable rate mortgages

ABS

Asset-backed securities

ASC

Accounting Standards Codification

Available Assets

Assets, as designated under the PMIERS, that are readily available to pay claims, and include the most liquid investments

/ B

Book or book year

A group of loans insured in a particular calendar year

BPMI

Borrower-paid mortgage insurance

/ C

CECL

Current expected credit losses

CFPB

Consumer Financial Protection Bureau

CLO

Collateralized loan obligations

CMBS

Commercial mortgage-backed securities

/ D

DAC

Deferred insurance policy acquisition costs

Debt-to-income ("DTI") ratio

The ratio, expressed as a percentage, of a borrower's total debt payments to gross income

Direct

When referring to insurance or risk written or in force, "direct" means before giving effect to reinsurance

/ E

ETFs

Exchange traded funds

/ F

Fannie Mae
Federal National Mortgage Association

FCRA
Fair Credit Reporting Act

FEMA
Federal Emergency Management Agency

FHA
Federal Housing Administration

FHFA
Federal Housing Finance Agency

FHLB
Federal Home Loan Bank of Chicago, of which MGIC is a member

FICO score
A measure of consumer credit risk provided by credit bureaus, typically produced from statistical models by Fair Isaac Corporation utilizing data collected by the credit bureaus

FOMC
Federal Open Market Committee

Freddie Mac
Federal Home Loan Mortgage Corporation

/ G
GAAP
Generally Accepted Accounting Principles in the United States

GSEs
Collectively, Fannie Mae and Freddie Mac

/ H
HAMP
Home Affordable Modification Program

HARP
Home Affordable Refinance Program

Home Re
Home Re 2018-1, Ltd., an unaffiliated special purpose insurer domiciled in Bermuda

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HOPA

Homeowners Protection Act

/ I

IADA

Individual Assistance Disaster Area

IBNR

Losses incurred but not reported

IIF

Insurance in force, which for loans insured by us, is equal to the unpaid principal balance, as reported to us

/ L

LAE

Loss adjustment expenses

Legacy book

Mortgage insurance policies written prior to 2009

Loan-to-value ("LTV") ratio

The ratio, expressed as a percentage, of the dollar amount of the first mortgage loan to the value of the property at the time the loan became insured and does not reflect subsequent housing price appreciation or depreciation. Subordinate mortgages may also be present

Long-term debt:

5% Notes

5% Convertible Senior Notes due on May 1, 2017, with interest payable semi-annually on May 1 and November 1 of each year

2% Notes

2% Convertible Senior Notes due on April 1, 2020, with interest payable semi-annually on April 1 and October 1 of each year

5.75% Notes

5.75% Senior Notes due on August 15, 2023, with interest payable semi-annually on February 15 and August 15 of each year

9% Debentures

9% Convertible Junior Subordinated Debentures due on April 1, 2063, with interest payable semi-annually on April 1 and October 1 of each year

FHLB Advance or the Advance

1.91% Fixed rate advance from the FHLB due on February 10, 2023, with interest payable monthly

Loss ratio

The ratio, expressed as a percentage, of the sum of incurred losses and loss adjustment expenses to NPE

Low down payment loans or mortgages

Loans with less than 20% down payments

LPMI

Lender-paid mortgage insurance

/ M

MBA

Mortgage Bankers Association

MBS

Mortgage-backed securities

MD&A

Management's discussion and analysis of financial condition and results of operations

MGIC

Mortgage Guaranty Insurance Corporation, a subsidiary of MGIC Investment Corporation

MAC

MGIC Assurance Corporation, a subsidiary of MGIC

Minimum Required Assets

The greater of \$400 million or the total of the minimum amount of Available Assets that must be held under the PMIERS based upon a percentage of RIF weighted by certain risk attributes

MPP

Minimum Policyholder Position, as required under certain state requirements. The "policyholder position" of a mortgage insurer is its net worth or surplus, contingency reserve and a portion of the reserves for unearned premiums

/ N

N/A

Not applicable for the period presented

NAIC

The National Association of Insurance Commissioners

NIW

New Insurance Written, is the aggregate original principal amount of the mortgages that are insured during a period

N/M

Data, or calculation, deemed not meaningful for the period presented

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NPE

The amount of premiums earned, net of premiums assumed and ceded under reinsurance agreements

NPL

Non-performing loan, which is a delinquent loan, at any stage in its delinquency

NPW

The amount of premiums written, net of premiums assumed and ceded under reinsurance agreements

/ O

OCI

Office of the Commissioner of Insurance of the State of Wisconsin

/ P

Persistency

The percentage of our insurance remaining in force from one year prior

PMI

Private Mortgage Insurance (as an industry or product type)

PMIERS

Private Mortgage Insurer Eligibility Requirements issued by the GSEs

Premium Yield

The ratio of NPE divided by the average IIF outstanding for the period measured

Primary

Insurance written on a flow and bulk basis

/ Q

QSR Transaction

Quota share reinsurance transaction

/ R

REMIC

Real Estate Mortgage Investment Conduit

RESPA

Real Estate Settlement Procedures Act

RIF

Risk in force, which for an individual loan insured by us, is equal to the unpaid loan principal balance, as reported to us, multiplied by the insurance coverage percentage. RIF is sometimes referred to as exposure

Risk-to-capital

Under certain state regulations, the ratio of RIF, net of quota share reinsurance and exposure on policies currently in default and for which loss reserves have been established, to the level of statutory capital

RMBS

Residential mortgage-backed securities

/ S

State Capital Requirements

Under certain state regulations, the minimum amount of statutory capital relative to risk in force (or similar measure)

/ T

Tax Act

The U.S. tax reform enacted on December 22, 2017 and commonly referred to as the "Tax Cuts and Jobs Act"

/ U

Underwriting Expense Ratio

The ratio, expressed as a percentage, of the underwriting and operating expenses, net and amortization of DAC of our combined insurance operations (which excludes underwriting and operating expenses of our non-insurance subsidiaries) to NPW

Underwriting profit

NPE minus incurred losses and underwriting expenses

USDA

U.S. Department of Agriculture

/ V

VA

U.S. Department of Veterans Affairs

VIE

Variable interest entity

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PART I

Item 1. Business

See the "[Glossary of terms and acronyms](#)" for definitions and descriptions of terms used throughout this annual report.

A. General

We are a holding company and through wholly-owned subsidiaries we provide private mortgage insurance, other mortgage credit risk management solutions, and ancillary services. In 2018, our net premiums written were \$1.0 billion and our primary NIW was \$50.5 billion. As of December 31, 2018, our direct primary IIF was \$209.7 billion and our direct primary RIF was \$54.1 billion. For further information about our results of operations, see our consolidated financial statements in Item 8 and our MD&A in Item 7. As of December 31, 2018, our principal mortgage insurance subsidiary, MGIC, was licensed in all 50 states of the United States, the District of Columbia, Puerto Rico and Guam. During 2018, we wrote new insurance in each of those jurisdictions.

BUSINESS STRATEGIES

Our business strategies are to 1) prudently grow IIF, 2) pursue new business opportunities that meet our return objectives, 3) preserve and expand our role and that of the PMI industry in housing finance policy, 4) manage and deploy capital to optimize the creation of shareholder value and 5) expand and develop the talents of our co-workers.

Following are several of our 2018 accomplishments that furthered our business strategies.

- Increased primary NIW from \$49.1 billion in 2017 to \$50.5 billion in 2018 and increased primary IIF by more than 7.6% year-over-year. The NIW is consistent with the Company's risk and return goals.

- Held leadership roles in key trade associations.

- Continued to enhance the reputation of the Company and the industry relative to changing housing finance policy and a broader role for PMI.

- Positioned ourselves for a successful launch in the first quarter 2019 of MiQ™, our loan level pricing system that establishes our premium rates based on a borrower's individual risk profile and loan attributes, and considers more attributes than were considered in 2018.

- Executed a \$318 million insurance linked note transaction, which allows the Company to better manage its risk profile and provides a new source of capital.

- Increased dividends from MGIC to our holding company from \$140 million in 2017 to \$220 million in 2018.

- Initiated ratings from A.M. Best and received an A- rating.

- Executed \$175 million in share repurchases for more than 4% of our common stock outstanding.

OVERVIEW OF THE PRIVATE MORTGAGE INSURANCE INDUSTRY AND ITS OPERATING ENVIRONMENT

We established the PMI industry in 1957 to provide a private market alternative to federal government insurance programs. PMI covers losses from homeowner defaults on residential mortgage loans, reducing, and in some instances eliminating, the loss to the insured institution.

Fannie Mae and Freddie Mac have been the major purchasers of the mortgage loans underlying new insurance written by private mortgage insurers. The GSEs purchase residential mortgage loans as part of their governmental mandate to provide liquidity in the secondary mortgage market. The GSEs cannot buy low down payment mortgage loans without certain forms of credit enhancement. Lenders generally have used private mortgage insurance to satisfy this credit

enhancement requirement. Therefore, PMI facilitates the sale of low down payment mortgages in the secondary mortgage market to the GSEs and plays an important role in the housing finance system by assisting consumers, especially first-time and lower net-worth homebuyers, to finance homes with low down payment mortgages. PMI also reduces the regulatory capital that depository institutions are required to hold against certain low down payment mortgages that they hold as assets. (GSE programs initiated in 2018 that provide loan level default coverage by various (re)insurers (which may include affiliates of private mortgage insurers) are discussed below.)

Because the GSEs have been the major purchasers of the mortgages underlying new insurance written by private mortgage insurers, the PMI industry in the U.S. is defined in large part by the requirements and practices of the GSEs. These requirements and practices, as well as those of the federal regulators that oversee the GSEs and lenders, impact the operating results and financial performance of private mortgage insurers. In 2008, the federal government took control of the GSEs through a conservatorship process. The FHFA is the conservator

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of the GSEs and has the authority to control and direct their operations. In the past, members of Congress have introduced several bills intended to change the business practices of the GSEs and the FHA, however, no legislation has been enacted.

The Administration issued a June 2018 report indicating that the conservatorship of the GSEs should end and that the GSEs should transition to fully private entities. It is unclear whether and when that would occur and how that would impact us. As a result of the matters referred to above, it is uncertain what role the GSEs, FHA and private capital, including private mortgage insurance, will play in the domestic residential housing finance system in the future. The timing and impact on our business or any resulting changes is uncertain. Some changes would require Congressional action to implement and it is difficult to estimate when any action would be final and how long any associated phase-in period may last. See our risk factor titled “Changes in the business practices of the GSEs, federal legislation that changes their charters or a restructuring of the GSEs could reduce our revenues or increase our losses” in [Item 1A](#).

The GSEs have private mortgage insurer eligibility requirements, or PMIERS, for private mortgage insurers that insure loans delivered to or purchased by the GSEs. The financial requirements of the PMIERS require a mortgage insurer’s Available Assets to equal or exceed its Minimum Required Assets. While on an overall basis, the amount of Available Assets MGIC must hold in order to continue to insure GSE loans is greater under the PMIERS than the amount state regulation currently requires, our reinsurance transactions mitigate the negative effect of the PMIERS on our returns. See "Regulation – Direct Regulation" below for information about our compliance with the financial requirements of the PMIERS.

The private mortgage insurance industry is greatly impacted by macroeconomic conditions that affect home loan originations and credit performance of home loans, including unemployment rates, home prices, restrictions on mortgage credit due to underwriting standards, interest rates, household formations and homeownership rates. During the last several years preceding the financial crisis, the mortgage lending industry increasingly made home loans with higher risk profiles. In certain sections of this Annual Report, we discuss our insurance written in 2005-2008 separately from our insurance written in earlier and later years. Beginning in 2007, job creation slowed and the housing markets began slowing in certain areas, with declines in certain other areas. In 2008 and 2009, employment in the U.S. decreased substantially and nearly all geographic areas in the U.S. experienced home price declines. Together, these conditions resulted in significant adverse developments for us and our industry. The operating environment for private

mortgage insurers has materially improved in recent years as the economy has recovered.

During 2018, \$292 billion of mortgages were insured with primary coverage by private mortgage insurers, compared to, \$270 billion in each of 2017 and 2016. Although the 2018 volume was significantly greater than the recent low in 2010 of \$70 billion, it remains below the volumes of 2001 through 2007 when, on average, approximately \$311 billion of mortgages were insured with primary coverage by private mortgage insurers.

For most of our business, we and other private mortgage insurers compete directly with federal and state governmental and quasi-governmental agencies that sponsor government-backed mortgage insurance programs, principally the FHA, VA and USDA. The publication *Inside Mortgage Finance* estimates that in 2018, the FHA accounted for 29.9% of low down payment residential mortgages that were subject to FHA, VA, USDA or primary private mortgage insurance, compared to 33.9% in 2017. In the prior ten years, the FHA’s market share has been as low as 29.9% in 2018 and as high as 66.8% in 2009. Factors that influence the FHA’s market share include relative rates and fees, underwriting guidelines and loan limits of the FHA, VA, USDA, private mortgage insurers and the

GSEs; lenders' perceptions of legal risks under FHA versus GSE programs; flexibility for the FHA to establish new products as a result of federal legislation and programs; returns obtained by lenders for Ginnie Mae securitization of FHA-insured loans compared to those obtained from selling loans to Fannie Mae or Freddie Mac for securitization; and differences in policy terms, such as the ability of a borrower to cancel insurance coverage under certain circumstances. We cannot predict how the factors listed above or the FHA's share of NIW will change in the future.

Inside Mortgage Finance estimates that in 2018, the VA accounted for 24.4% of all low down payment residential mortgages that were subject to FHA, VA, USDA or primary private mortgage insurance, compared to 24.7% in 2017. In the prior ten years, the VA's market share has been as high as 27.2% in 2016 and as low as 14.3% in 2009. We believe that the VA's market share has generally been increasing because of an increase in the number of borrowers that are eligible for the VA's program, which offers 100% LTV loans and charges a one-time funding fee that can be included in the loan amount, and because eligible borrowers have opted to use the VA program when refinancing their mortgages.

The private mortgage insurance industry also competes with alternatives to mortgage insurance, such as investors using risk mitigation and credit risk transfer techniques other than PMI, investors willing to hold credit risk on their own balance sheets without credit enhancement, and "piggyback loans," which combine a first lien loan with a second lien loan.

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In 2018, the GSE initiated programs with loan level mortgage default coverage provided by various (re)insurers that are not mortgage insurers governed by PMIERS, and that are not selected by the lenders. While we view these programs as competing with traditional private mortgage insurance, we have participated in them and may participate in future GSE or other programs.

The GSEs (and other investors) have also used other forms of credit enhancement that did not involve traditional private mortgage insurance, such as engaging in credit-linked note transactions executed in the capital markets, or using other forms of debt issuances or securitizations that transfer credit risk directly to other investors, including competitors and an affiliate of MGIC; and using other risk mitigation techniques in conjunction with reduced levels of private mortgage insurance coverage.

In addition to the FHA, VA, other governmental agencies and the alternatives to mortgage insurance discussed above, we also compete with other mortgage insurers. The level of competition, including price competition, within the private mortgage insurance industry has intensified over the past several years. See "Our Products and Services – Sales and Marketing and Competition – Competition" below for more information about the impact on our business of competition in the private mortgage insurance industry.

In addition to being subject to the requirements and practices of the GSEs, private mortgage insurers are subject to comprehensive, detailed regulation by state insurance departments. The insurance laws of 16 jurisdictions, including Wisconsin, MGIC's domiciliary state, require a mortgage insurer to maintain a minimum amount of statutory capital relative to the RIF (or a similar measure) in order for the mortgage insurer to continue to write new business. The NAIC plans to revise the minimum capital and surplus requirements for mortgage insurers that are provided for in its Mortgage Guaranty Insurance Model Act. A working group of state regulators has been considering since 2016 a risk-based capital framework to establish capital requirements for mortgage insurers, although no date has been established by which the NAIC must propose revisions to the capital requirements.

Due to the changing environment described above, as well as other factors discussed below, at this time the greatest uncertainty we face is whether private mortgage insurance will remain a significant credit enhancement alternative for low down payment single family mortgages. An increase in the use of alternatives to private mortgage insurance, such as GSE programs with loan level default coverage provided by (re)insurers that are not mortgage insurers subject to PMIERS, or a possible restructuring or change in the charters of the GSEs, could significantly affect our business. For additional information about this uncertainty, see our

risk factors titled "The amount of insurance we write could be adversely affected if lenders and investors select alternatives to private mortgage insurance" and "Changes in the business practices of the GSEs, federal legislation that changes their charters or a restructuring of the GSEs could reduce our revenues or increase our losses" in [Item 1A](#).

GENERAL INFORMATION ABOUT OUR COMPANY

We are a Wisconsin corporation organized in 1984. Our principal office is located at MGIC Plaza, 250 East Kilbourn Avenue, Milwaukee, Wisconsin 53202 (telephone number (414) 347-6480). As used in this annual report, "we," "our" and "us" refer to MGIC Investment Corporation's consolidated operations or to MGIC Investment Corporation, as a separate entity, as the context requires, and "MGIC" refers to Mortgage Guaranty Insurance Corporation.

Our revenues and losses may be materially affected by the risk factors that are included in [Item 1A](#) of this annual report. These risk factors are an integral part of this annual report. These risk factors may also cause actual results to differ materially from the results contemplated by forward looking statements that we may make. Forward looking

statements consist of statements which relate to matters other than historical fact. Among others, statements that include words such as we “believe,” “anticipate” or “expect,” or words of similar import, are forward looking statements. We are not undertaking any obligation to update any forward looking statements or other statements we may make even though these statements may be affected by events or circumstances occurring after the forward looking statements or other statements were made. No reader of this annual report should rely on these statements being current at any time other than the time at which this annual report was filed with the Securities and Exchange Commission.

B. Our Products and Services

MORTGAGE INSURANCE

In general, there are two principal types of private mortgage insurance: “primary” and “pool.”

Primary Insurance. Primary insurance provides mortgage default protection on individual loans and covers a percentage of the unpaid loan principal, delinquent interest and certain expenses associated with the default and subsequent foreclosure or sale approved by us (collectively, the “claim amount”). In addition to the loan principal, the claim amount is affected by the mortgage note rate and the time necessary to complete the foreclosure or sale process. The insurer generally pays the coverage percentage of the claim amount specified in the primary policy, but has the option to pay 100% of the claim amount and acquire title to the property. Primary insurance is generally written on first mortgage loans secured by owner

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occupied "single-family" homes, which are one-to-four family homes and condominiums. Primary insurance can be written on first liens secured by non-owner occupied single-family homes, which are referred to in the home mortgage lending industry as investor loans, and on vacation or second homes. Primary coverage can be used on any type of residential mortgage loan instrument approved by the mortgage insurer.

References in this document to amounts of insurance written or in force, risk written or in force and other historical data related to our insurance refer only to direct (before giving effect to reinsurance) primary insurance, unless otherwise indicated. Primary insurance may be written on a flow basis, in which loans are insured in individual, loan-by-loan transactions, or may be written on a bulk basis, in which each loan in a portfolio of loans is individually insured in a single, bulk transaction. Our new primary insurance written was \$50.5 billion in 2018, compared to \$49.1 billion in 2017 and \$47.9 billion in 2016. The 2018 increase compared to 2017 reflects an increase in the purchase mortgage originations we insured offsetting a decrease in the refinance originations we insured.

The following charts show, on a direct basis, our primary IIF and primary RIF as of December 31 for the years indicated.

Primary insurance and risk in force

(In billions)	2018	2017	2016	2015	2014
Primary IIF	\$209.7	\$194.9	\$182.0	\$174.5	\$164.9
Primary RIF	54.1	50.3	47.2	45.5	42.9

For loans sold to Fannie Mae or Freddie Mac, the coverage percentage must comply with the requirements established by the particular GSE to which the loan is delivered. The GSEs have different loan purchase programs that allow different levels of mortgage insurance coverage. Under the "charter coverage" program, on certain loans lenders may choose a mortgage insurance coverage percentage that is less than the GSEs' "standard coverage" and only the minimum required by the GSEs' charters, with the GSEs paying a lower price for such loans. In 2018, nearly all of our volume was on loans with GSE standard or higher coverage.

For loans that are not sold to the GSEs, the lender determines the coverage percentage from those that we offer. Higher coverage percentages generally result in increased severity, which is the amount paid on a claim. We charge higher premium rates for higher coverage percentages. However, there can be no assurance that the higher premium rates adequately reflect the risks associated with higher coverage percentages. In accordance with GAAP for the mortgage insurance industry, reserves for losses are only established for delinquent loans. Because, historically, relatively few

delinquencies occur in the early years of a book of business, the higher premium revenue from higher coverage has historically been recognized before any significant higher losses resulting from that higher coverage may be incurred. For more information, see "– Exposure to Catastrophic Loss; Defaults; Claims; Loss Mitigation – Claims."

In general, mortgage insurance coverage cannot be terminated by the insurer. However, subject to certain restrictions as are specified in our insurance policy, we may terminate or rescind coverage for, among other reasons, non-payment of premium, certain material misrepresentations made in connection with the application for the insurance policy or if the loan was never eligible for coverage under our policy. Mortgage insurance coverage is renewable at the option of the insured lender, at the renewal rate fixed when the loan was initially insured. Lenders may cancel insurance written on a flow basis at any time at their option or because of mortgage repayment, which may be accelerated because of the refinancing of mortgages. In the case of a loan purchased by Freddie Mac or Fannie Mae, a borrower meeting certain conditions may require the mortgage servicer to cancel insurance upon the borrower's request, generally when the

principal balance of the loan is 80% or less of the home's current value.

Mortgage insurance for loans secured by one-family, primary residences can be canceled under HOPA. In general, HOPA requires a servicer to cancel the mortgage insurance if a borrower requests cancellation when the principal balance of the loan is first scheduled to reach 80% of the original value, or reaches that percentage through payments, if 1) the borrower is current on the loan and has a "good payment history" (as defined by HOPA), 2) the borrower provides evidence as and if required by the mortgage owner that the value of the property has not declined below the original value, and 3) if required by the mortgage owner, the borrower's equity in the property is not subject to a subordinate lien. Additionally, HOPA requires mortgage insurance to terminate automatically when the principal balance of the loan is first scheduled to reach 78% of the original value and the borrower is current on loan payments or thereafter becomes current. Annually, servicers must inform borrowers of their right to cancel or terminate mortgage insurance. The provisions of HOPA described above apply only to borrower paid mortgage insurance, which is described below.

Coverage tends to continue for borrowers experiencing economic difficulties or living in areas experiencing home price depreciation. The persistency of coverage for those borrowers coupled with cancellation of coverage for other borrowers can increase the percentage of an insurer's portfolio covering loans with more credit risk. This development can also occur during periods of heavy mortgage refinancing because borrowers experiencing property value appreciation are less likely to require mortgage insurance at the time of

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refinancing, while borrowers not experiencing property value appreciation are more likely to continue to require mortgage insurance at the time of refinancing or not qualify for refinancing at all (including if they have experienced economic difficulties) and thus remain subject to the mortgage insurance coverage.

The percentage of NIW on loans representing refinances was 7% for 2018, compared to 11% for 2017 and 20% for 2016. When a borrower refinances a mortgage loan insured by us by paying it off in full with the proceeds of a new mortgage that is also insured by us, the insurance on that existing mortgage is cancelled, and insurance on the new mortgage is considered to be NIW. Therefore, continuation of our coverage from a refinanced loan to a new loan results in both a cancellation of insurance and NIW. When a lender and borrower modify a loan rather than replace it with a new one, or enter into a new loan pursuant to a loan modification program, our insurance continues without being cancelled, assuming that we consent to the modification or new loan. As a result, such modifications or new loans, including those modified under HARP, are not included in our NIW.

In addition to varying with the coverage percentage, our premium rates for insurance have varied depending upon the perceived risk of a claim on the insured loan and thus taken into account, among other things, the LTV ratio, the borrower's credit score and DTI ratio, whether the loan is a fixed payment loan or a non-fixed payment loan (a non-fixed payment loan is referred to in the home mortgage lending industry as an ARM), the number of borrowers the mortgage term and whether the property is the borrower's primary residence. We generally utilized a national, rather than a regional or local, premium rate policy. However, depending upon regional economic conditions, we have made, and may make, changes to our underwriting requirements to implement more restrictive standards in certain markets and for loan characteristics that we categorize as higher risk. In the first quarter of 2019 we introduced MiQ™, our loan level pricing system that establishes our premium rates based on more risk attributes than were considered in 2018. Premium rates cannot be changed after the issuance of coverage.

The borrower's mortgage loan instrument may require the borrower to pay the mortgage insurance premium. Our industry refers to the related mortgage insurance as "borrower-paid." If the borrower is not required to pay the premium and mortgage insurance is required in connection with the origination of the loan, then the premium is paid by the lender, who may recover the premium through an increase in the note rate on the mortgage or higher origination fees. Our industry refers to the related mortgage insurance as "lender-paid." Most of our primary IIF is borrower-paid mortgage insurance.

There are several payment plans available to the borrower, or lender, as the case may be. Under the single premium plan, the borrower or lender pays us in advance a single payment covering a specified term exceeding twelve months. Under the monthly premium plan, the borrower or lender pays us a monthly premium payment to provide only one month of coverage. Under the annual premium plan, an annual premium is paid to us in advance, with annual renewal premiums paid in advance thereafter.

During 2018, 2017 and 2016, the single premium plan represented approximately 17%, 19% and 19%, respectively, of our NIW. The monthly premium plan represented approximately 83%, 81% and 81%, respectively. The annual premium plan represented less than 1% of NIW in each of those years. Depending on the actual life of a single premium policy and its premium rate relative to that of a monthly premium policy, a single premium policy may generate more or less premium than a monthly premium policy over its life.

Pool and Other Insurance. Pool insurance is generally used as an additional "credit enhancement" for certain secondary market mortgage transactions. Pool insurance generally covers the amount of the loss on a defaulted mortgage loan that exceeds the claim payment under the primary coverage, if primary insurance is required on that mortgage loan, as

well as the total loss on a defaulted mortgage loan which did not require primary insurance. Pool insurance may have a stated aggregate loss limit for a pool of loans and may also have a deductible under which no losses are paid by the insurer until losses on the pool of loans exceed the deductible. As of December 31, 2018, less than 1% of our RIF was pool insurance.

In connection with the GSEs' credit risk transfer programs, we provide insurance and reinsurance covering portions of the credit risk related to certain reference pools of mortgages acquired by the GSEs.

GEOGRAPHIC DISPERSION

The following tables reflect the percentage of primary RIF in the top 10 jurisdictions and top 10 core-based statistical areas for the MGIC Book at December 31, 2018. We refer to the insurance that has been written by MGIC (including MGIC Indemnity Corporation, a subsidiary of MGIC, for portions of 2012 and 2013) as the "MGIC Book."

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Dispersion of Primary Risk in Force

Top 10 jurisdictions

California	8.6 %
Florida	7.0 %
Texas	6.2 %
Pennsylvania	5.2 %
Ohio	4.5 %
Illinois	4.2 %
Virginia	3.5 %
Georgia	3.3 %
Michigan	3.3 %
Minnesota	3.1 %
Total	48.9%

Top 10 core-based statistical areas

Chicago-Naperville-Arlington Heights	2.8 %
Washington-Arlington-Alexandria	2.6 %
Atlanta-Sandy Springs-Roswell	2.5 %
Minneapolis-St. Paul-Bloomington	2.1 %
Houston-Woodlands-Sugar Land	1.9 %
Philadelphia	1.9 %
Los Angeles-Long Beach-Glendale	1.9 %
Phoenix-Mesa-Scottsdale	1.9 %
Riverside-San Bernardino-Ontario	1.4 %
Cincinnati	1.3 %
Total	20.3%

The percentages shown above for various core-based statistical areas can be affected by changes, from time to time, in the federal government's definition of a core-based statistical area.

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INSURANCE IN FORCE BY POLICY YEAR

The following table sets forth for the MGIC Book the dispersion of our primary IIF and RIF as of December 31, 2018, by year(s) of policy origination since we began operations in 1985.

Primary insurance in force and risk in force by policy year

Policy Year	Insurance in Force		Risk in Force	
	Total (In millions)	Percent of Total	Total (In millions)	Percent of Total
2004 and prior	\$3,575	1.7 %	\$995	1.8 %
2005	3,408	1.6 %	969	1.8 %
2006	6,361	3.0 %	1,753	3.2 %
2007	14,052	6.7 %	3,619	6.7 %
2008	6,128	2.9 %	1,564	2.9 %
2009	812	0.4 %	186	0.3 %
2010	528	0.2 %	152	0.3 %
2011	1,089	0.5 %	314	0.6 %
2012	4,186	2.0 %	1,194	2.2 %
2013	7,256	3.5 %	2,048	3.8 %
2014	12,943	6.2 %	3,459	6.4 %
2015	23,408	11.2 %	6,138	11.4 %
2016	35,712	17.0 %	9,047	16.7 %
2017	43,325	20.7 %	10,853	20.1 %
2018	46,924	22.4 %	11,771	21.8 %
Total	\$209,707	100.0%	\$54,063	100.0%

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PRODUCT CHARACTERISTICS

The following table reflects, at the dates indicated and by the categories indicated, the total dollar amount of primary RIF for the MGIC Book and the percentage of that primary RIF, as determined on the basis of information available on the date of mortgage origination.

Characteristics of primary risk in force

	December 31, 2018	December 31, 2017		
Primary RIF (In millions):	\$54,063	\$50,319		
Loan-to-value ratios:				
95.01% and above	14.8	% 13.8	%	
90.01 - 95.00%	52.2	% 52.0	%	
85.01 - 90.00%	27.5	% 28.3	%	
80.01 - 85.00%	4.8	% 4.9	%	
80% and below	0.7	% 1.0	%	
Total	100.0	% 100.0	%	
Debt-to-income ratios:				
45.01% and above	14.3	% 12.6	%	
38.01% - 45.00%	33.3	% 33.3	%	
38% and below	52.4	% 54.1	%	
Total	100.0	% 100.0	%	
Loan Type:				
Fixed ⁽¹⁾	98.7	% 98.2	%	
ARMs ⁽²⁾	1.3	% 1.8	%	
Total	100.0	% 100.0	%	
Original Insured Loan Amount: ⁽³⁾				
Conforming loan limit and below	97.5	% 97.6	%	
Non-conforming	2.5	% 2.4	%	
Total	100.0	% 100.0	%	
Mortgage Term:				
15-years and under	1.6	% 2.1	%	
Over 15 years	98.4	% 97.9	%	
Total	100.0	% 100.0	%	
Property Type:				
Single-family detached	87.5	% 87.6	%	
Condominium/Townhouse/Other attached	11.7	% 11.7	%	
Other ⁽⁴⁾	0.8	% 0.7	%	
Total	100.0	% 100.0	%	
Occupancy Status:				
Owner occupied	97.5	% 97.3	%	
Second home	2.0	% 2.0	%	
Investor property	0.5	% 0.7	%	
Total	100.0	% 100.0	%	
Documentation:				
Reduced: ⁽⁵⁾				
Stated	1.5	% 2.0	%	

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No	0.3	%	0.4	%
Full documentation	98.2	%	97.6	%
Total	100.0	%	100.0	%

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Characteristics of primary risk in force

	December 31, 2018		December 31, 2017	
FICO Score: ⁽⁶⁾				
760 and greater	37.7	%	36.6	%
740 - 759	15.6	%	15.0	%
720 - 739	13.9	%	13.6	%
700 - 719	11.3	%	11.2	%
680 - 699	8.6	%	9.0	%
660 - 679	4.8	%	5.2	%
640 - 659	3.3	%	3.7	%
639 and less	4.8	%	5.7	%
Total	100.0	%	100.0	%

(1) Includes fixed rate mortgages with temporary buydowns (where in effect, the applicable interest rate is typically reduced by one or two percentage points during the first two years of the loan), ARMs in which the initial interest rate is fixed for at least five years, and balloon payment mortgages (a loan with a maturity, typically five to seven years, that is shorter than the loan's amortization period).

(2) Includes ARMs where payments adjust fully with interest rate adjustments. Also includes pay option ARMs and other ARMs with negative amortization features, which collectively at December 31, 2018 and 2017, represented 0.3% and 0.5%, respectively, of primary RIF. As indicated in note (1), does not include ARMs in which the initial interest rate is fixed for at least five years. As of December 31, 2018 and 2017, ARMs with LTV ratios in excess of 90% represented 0.3% and 0.4%, respectively, of primary RIF.

(3) Loans within the conforming loan limit have an original principal balance that does not exceed the maximum original principal balance of loans that the GSEs will purchase. The conforming loan limit for one unit properties was \$417,000 from 2007 through 2016, \$424,100 for 2017, \$453,100 for 2018 and \$484,350 for 2019. The limit for high cost communities has been higher and is \$726,525 for 2019. Non-conforming loans are loans with an original principal balance above the conforming loan limit.

(4) Includes cooperatives and manufactured homes deemed to be real estate.

(5) Reduced documentation loans were originated prior to 2009 under programs in which there was a reduced level of verification or disclosure compared to traditional mortgage loan underwriting, including programs in which the borrower's income and/or assets were disclosed

in the loan application but there was no verification of those disclosures ("stated" documentation) and programs in which there was no disclosure of income or assets in the loan application ("no" documentation). In accordance with industry practice, loans approved by GSE and other automated underwriting (AU) systems under "doc waiver" programs that did not require verification of borrower income are classified by us as "full documentation." Based in part on information provided by the GSEs, we estimate full documentation loans of this type were approximately 4% of 2007 NIW. Information for other periods is not available. We understand these AU systems granted such doc waivers for loans they judged to have higher credit quality. We also understand that the GSEs terminated their "doc waiver" programs in the second half of 2008.

- (6) Represents the FICO score at loan origination. The weighted average “decision FICO score” at loan origination for NIW in 2018 and 2017 was 745. The FICO score for a loan with multiple borrowers is the lowest of the borrowers’ decision FICO scores. A borrower’s “decision FICO score” is determined as follows: if there are three FICO scores available, the middle FICO score is used; if two FICO scores are available, the lower of the two is used; if only one FICO score is available, it is used. A FICO score is a score based on a borrower’s credit history generated by a model developed by Fair Isaac Corporation.

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OTHER PRODUCTS AND SERVICES

Contract Underwriting. A non-insurance subsidiary of ours performs contract underwriting services for lenders, underwriting loans to conform to prescribed guidelines. The guidelines might be the lender's own guidelines or the guidelines of Fannie Mae, Freddie Mac or a non-GSE investor. These services are provided for loans that require private mortgage insurance as well as for loans that do not require private mortgage insurance.

Under our contract underwriting agreements, we may be required to provide certain remedies to our customers if certain standards relating to the quality of our underwriting work are not met, and we have an established reserve for such future obligations. The related contract underwriting remedy expense for each of the years ended December 31, 2018, 2017 and 2016, was immaterial to our consolidated financial statements. Claims for remedies may be made a number of years after the underwriting work was performed.

Other. We provide various fee-based services for the mortgage finance industry, such as analysis of loan originations and portfolios, and mortgage lead generation.

We provide insurance and reinsurance related to certain mortgages under Fannie Mae and Freddie Mac credit risk transfer programs. The amount of risk associated with these transactions is currently \$53 million.

REINSURANCE AGREEMENTS

Quota Share Transactions. At each of December 31, 2018 and 2017, approximately 78% of our IIF was subject to quota share reinsurance transactions. In 2018, approximately 75% of our NIW was subject to quota share reinsurance transactions, compared to 84% in 2017.

We have in place QSR transactions with unaffiliated reinsurers that covers most of our insurance written from 2013 through 2018, and a portion of our insurance written prior to 2013. The structure of the transactions is a 30% quota share for all policies covered, with a 20% ceding commission as well as a profit commission. Generally, under the transactions, we will receive a profit commission provided that the loss ratio on the loans covered under the transactions remains below 60% (62% for the transaction covering 2018 NIW). We expect that in the first quarter of 2019, we will enter into a similar agreement covering most of our NIW in 2019, on terms no less favorable than our existing transactions. Although reinsuring against possible loan losses does not discharge us from liability to a policyholder, it reduces the amount of capital we are required to retain against potential future losses for PMIERS, rating agency and insurance regulatory purposes. The GSEs' approvals of the reinsurance transactions are subject to

several conditions and the transactions will be reviewed under the PMIERS at least annually by the GSEs. We may not receive full credit under the PMIERS for the risk ceded under our quota share reinsurance transactions.

Excess of Loss Transaction. On October 30, 2018, MGIC entered into a fully collateralized reinsurance agreement with an unaffiliated special purpose insurer that provides for up to \$318.6 million of aggregate excess-of-loss reinsurance coverage on a portfolio of mortgage insurance policies with in force dates on or after July 1, 2016 and before January 1, 2018. MGIC will retain the first layer of \$168.7 million of aggregate losses, and the reinsurer will then provide second layer coverage up to the outstanding reinsurance coverage amount. The aggregate coverage decreases over a ten-year period as the underlying covered mortgages amortize, principal is prepaid or mortgage insurance losses are paid. For further information about our reinsurance agreements, including the Company's early termination rights, see [Note 9 – “Reinsurance,”](#) to our consolidated financial statements in Item 8.

CUSTOMERS

Originators of residential mortgage loans such as savings institutions, commercial banks, mortgage brokers, credit unions, mortgage bankers and other lenders have historically determined the placement of mortgage insurance written on a flow basis and as a result are our customers. To obtain primary insurance from us written on a flow basis, a mortgage lender must first apply for and receive a mortgage guaranty master policy from us. Our top 10 customers, none of whom represented more than 10% of our consolidated revenues, generated 24% of our NIW on a flow basis in 2018, compared to 23% in 2017 and 24% in 2016. Our largest customer accounted for approximately 5%, 4% and 5% of our flow NIW in 2018, 2017 and 2016, respectively. Our relationships with our customers could be adversely affected by a variety of factors, including if our premium rates are higher than those of our competitors, our underwriting requirements result in our declining to insure some of the loans originated by our customers and our insurance policy rescissions and claim curtailments that affect the customer. Information about some of the other factors that can affect a mortgage insurer's relationship with its customers can be found in our risk factor titled "Competition or changes in our relationships with our customers could reduce our revenues, reduce our premium yields and/or increase our losses" in Item 1A.

SALES AND MARKETING AND COMPETITION

Sales and Marketing. Our employees sell our insurance products throughout all regions of the United States and in Puerto Rico and Guam.

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Competition. Our competition includes other mortgage insurers, governmental agencies and products designed to eliminate the need to purchase private mortgage insurance. For flow business, we and other private mortgage insurers compete directly with federal and state governmental and quasi-governmental agencies, principally the FHA and the VA. The FHA, VA and USDA sponsor government-backed mortgage insurance programs, and it is estimated that during 2018, 2017 and 2016, they accounted for a combined approximately 56.8%, 61.4% and 63.9%, respectively, of the total low down payment residential mortgages which were subject to FHA, VA, USDA or primary private mortgage insurance. For more information about the market share of the FHA and the VA, see “Overview of the Private Mortgage Insurance Industry and its Operating Environment” above.

In addition to competition from the FHA, VA and USDA, we and other private mortgage insurers face competition from state-supported mortgage insurance funds in several states. From time to time, other state legislatures and agencies consider expanding the authority of their state governments to insure residential mortgages.

The PMI industry is highly competitive. We believe that we currently compete with other private mortgage insurers based on premium rates, underwriting requirements, financial strength (including based on creditor financial strength ratings), customer relationships, name recognition, reputation, the strength of our management team and field organization, the ancillary products and services provided to lenders, and the effective use of technology and innovation in the delivery and servicing of our mortgage insurance products.

The U.S. PMI industry currently consists of six active mortgage insurers and their affiliates. The names of these mortgage insurers can be found in our risk factor titled “Competition or changes in our relationships with our customers could reduce our revenues, reduce our premium yields and/or increase our losses” in [Item 1A](#). Until 2010, the PMI industry had not had new entrants in many years. Since 2010, two public companies have been formed and begun writing business and a worldwide insurer and reinsurer with mortgage insurance operations in Europe completed the purchase of two competitors. Our market share (as measured by NIW) was 17.4% in 2018, compared to 18.3% in 2017 and 17.9% in 2016, in each case excluding HARP refinances. (source: Inside Mortgage Finance). If we are unable to compete effectively in the current or any future markets as a result of the financial strength ratings assigned to our insurance subsidiaries, our future new insurance written could be negatively affected. Substantially all of our insurance written since 2008 has been for loans purchased by the GSEs. The

GSEs' current PMIERS do not require an insurer to maintain minimum financial strength ratings. However, depending on the evolution of housing finance reform, the level of issuances of non-GSE MBS may increase in the future. Financial strength ratings may be considered by issuers of non-GSE MBS in determining whether to purchase private mortgage insurance for loans supporting such securities. In assigning financial strength ratings, in addition to considering the adequacy of the mortgage insurer's capital to withstand very high claim scenarios under assumptions determined by the rating agency, we believe rating agencies review a mortgage insurer's historical and projected operating performance, franchise risk, business outlook, competitive position, management, corporate strategy, and other factors. The rating agency issuing the financial strength rating can withdraw or change its rating at any time. At the time that this annual report was finalized, the financial strength of MGIC was rated Baa2 (with a stable outlook) by Moody's Investors Service, BBB+ (with a stable outlook) by Standard & Poor's Rating Services and A- (with a stable outlook) by A.M. Best.

RISK MANAGEMENT

Enterprise Risk Management. The Company has an enterprise risk management (“ERM”) framework that it believes is commensurate with the size, nature and complexity of the Company's business activities (all of which relate to insuring or reinsuring mortgage credit risk) and strategies. Among the key objectives of the ERM framework are to

have a clear and well documented shared understanding, by senior management and the Board, of the Company's risk management philosophy and overall appetite for risk, and that there are appropriate monitoring, management and reporting mechanisms to support the framework.

Risk Governance. The Company maintains a Senior Management Oversight Committee ("SMOC") that, at the management level, serves as its primary risk management governance organization. The SMOC seeks to maintain an enterprise-wide view of risk. The SMOC oversees the Company's ERM framework; oversees the risks associated with strategic and business issues critical to the Company, monitoring the Company's risk profile across the set of identified key risks (see "Risk Identification and Assessment" below); and supports the Risk Management Committee of the Company's Board of Directors ("RMC"). The SMOC, of which the CEO is a member, is chaired by the Company's Executive Vice President and Chief Risk Officer, who is the principal management liaison to the RMC.

Risk Management and Controls. The Company's management of risk uses the "three lines of defense" model. The front-line business units, whose activities create inherent risk exposures, represent the "first line of defense." Front-line business units are responsible for ensuring risks are taken and managed within the

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guidelines established by the Company's Risk Management ("RM") group.

RM, along with the Company's separate compliance program, comprise the "second line of defense" and are management and oversight functions that are primarily responsible for many aspects of the management of risk. RM is generally responsible for the ERM framework, for policies and metrics that dimension the risk tolerances of the Company's business activities and for measurement and assessment of all key risks and reporting of those risks to the SMOC and the RMC.

Internal Audit forms the "third line of defense" and serves in an independent assurance capacity. It reports to senior management and the Audit Committee of the Board regarding the effectiveness of the first and second lines of defense. Internal Audit is responsible for establishing a comprehensive audit plan that covers all functions and identified material risks of the Company, communication of any material deficiencies to the SMOC and the Audit Committee, and determining whether corrective actions fully remediate any noted deficiencies.

Risk Identification and Assessment. The Company completes an annual key risk identification and assessment process that is focused on identifying and assessing those risks with the potential to have the greatest impact on the Company's ability to accomplish its strategic goals. These key risks include both risks that are, at least in part, internal to the Company (e.g., mortgage credit risk) and therefore, at least in part, within management's direct control, as well as, risks that are external to the Company (e.g., business risk) and outside of management's direct control. The results of the identification and assessment are reviewed and approved annually by both the SMOC and the RMC.

Risk Appetite. The Company has established risk appetite statements for each of its key risks, as well as quantitative or qualitative metrics used as thresholds for dimensioning the risk appetite for each key risk. The resulting risk appetite statements and associated metrics are reviewed and approved annually by the SMOC and the RMC.

Risk Reporting and Communication. RM produces various analyses, reports and key risk indicators ("KRIs") that are reported to the SMOC, the RMC and the Board quarterly. For our largest risk exposure, mortgage credit risk, these KRIs include risk factors for the Company's NIW, IIF, quality control and claim activity.

Although the Company has in place the ERM framework discussed above, it may not be effective in identifying, or adequate in controlling or mitigating, the risks we face. For more information, see our Risk Factor titled "If our risk management programs are not effective in identifying, or adequate in controlling or mitigating, the risks we face, or if the models used in our businesses

are inaccurate, it could have a material adverse impact on our business, results of operations and financial condition" in Item 1A.

MORTGAGE CREDIT RISK

We believe that mortgage credit risk is materially affected by:

- the condition of the economy, including the direction of change in home prices and employment, in the area in which the property is located;
- the borrower's credit profile, including the borrower's credit history, DTI ratio and cash reserves, and the willingness of a borrower with sufficient resources to make mortgage payments when the mortgage balance exceeds the value of the home;
-

the loan product, which encompasses the LTV ratio, the type of loan instrument, including whether the instrument provides for fixed or variable payments and the amortization schedule, the type of property and the purpose of the loan;

• the origination practices of lenders and the percentage of coverage on insured loans; and

• the size of insured loans.

We believe that, excluding other factors, claim incidence increases:

- during periods of economic contraction and home price depreciation, including when these conditions may not be nationwide, compared to periods of economic expansion and home price appreciation;
- for loans to borrowers with lower FICO scores compared to loans to borrowers with higher FICO scores;
- for loans to borrowers with higher DTI ratios compared to loans to borrowers with lower DTI ratios;
- for loans with less than full underwriting documentation compared to loans with full underwriting documentation;
- for loans with higher LTV ratios compared to loans with lower LTV ratios;
- for ARMs when the reset interest rate significantly exceeds the interest rate at the time of loan origination;
- for loans that permit the deferral of principal amortization compared to loans that require principal amortization with each monthly payment;

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for loans in which the original loan amount exceeds the conforming loan limit compared to loans below that limit; and for cash out refinance loans compared to rate and term refinance loans.

Other types of loan characteristics relating to the individual loan or borrower may also affect the risk potential for a loan. The presence of a number of higher-risk characteristics in a loan materially increases the likelihood of a claim on such a loan unless there are other characteristics to mitigate the risk.

We charge higher premium rates to reflect the increased risk of claim incidence that we perceive is associated with a loan. Not all higher risk characteristics are reflected in our premium rates; however, in the first quarter of 2019 we introduced MiQ™, our loan level pricing system that establishes our premium rates based on more risk attributes than were considered in 2018. There can be no assurance that our premium rates adequately reflect the increased risk, particularly in a period of economic recession, high unemployment, slowing home price appreciation or home price declines. For additional information, see our risk factors in [Item 1A](#), including the one titled “The premiums we charge may not be adequate to compensate us for our liabilities for losses and as a result any inadequacy could materially affect our financial condition and results of operations.”

Underwriting Insurance Applications. Applications for mortgage insurance are submitted to us through both our delegated and non-delegated options. Under the delegated option, applications are submitted to us electronically and we rely upon the lender’s representations and warranties that the data submitted is true, accurate and consistent with the documents in the lender’s loan origination file, when making our insurance decision. If the loan data submitted meets the underwriting requirements, a commitment to insure the loan is immediately issued. If the requirements are not met, the loan is reviewed by one of our underwriters. Non-delegated applications are submitted with documents from the lender’s loan origination file. During loan set-up, data is entered from those application documents and electronically evaluated against our

underwriting requirements. An internally generated feedback report guides the mortgage insurance review as a full review of the mortgage documents is performed by one of our underwriters. If the loan meets the underwriting requirements, a commitment to insure the loan is issued.

Beginning in 2013, we aligned most of our underwriting requirements with Fannie Mae and Freddie Mac for loans that receive and are processed in accordance with certain approval recommendations from a GSE automated underwriting system. Our underwriting requirements are available on our website at <http://www.mgic.com/underwriting/index.html>. Our underwriters are authorized to approve loans that do not meet all of our underwriting requirements provided appropriate offsetting factors can be identified.

EXPOSURE TO CATASTROPHIC LOSSES; DELINQUENCIES; CLAIMS; LOSS MITIGATION

Exposure to Catastrophic Losses. The PMI industry experienced catastrophic losses in the mid-to-late 1980s, similar to the losses we experienced in 2007-2013. For background information about such losses in 2007-2013, refer to “General – Overview of Private Mortgage Insurance Industry and its Operating Environment” above.

Delinquencies. The claim cycle on PMI generally begins with the insurer’s receipt of notification of a delinquency on an insured loan from the loan servicer. We consider a loan to be delinquent when it is two or more payments past due. Most servicers report delinquent loans to us within this two month period. The incidence of delinquency is affected by a variety of factors, including the level of borrower income growth, unemployment, health issues, family status, the level of interest rates, rates of home price appreciation or depreciation and general borrower creditworthiness. Delinquencies that are not cured result in a claim to us. See “– Claims.” Delinquencies may be cured by the borrower

bringing current the delinquent loan payments or by a sale of the property and the satisfaction of all amounts due under the mortgage. In addition, when a policy is rescinded or a claim is denied we remove the loan from our delinquency inventory.

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The following table shows the number of insured primary and pool loans in the MGIC Book, the related number of delinquent loans and the percentage of delinquent loans, or delinquency rate, as of December 31, 2014-2018.

Delinquency statistics for the MGIC book

	December 31,				
	2018	2017	2016	2015	2014
Primary Insurance:					
Insured loans in force	1,058,292	1,023,951	998,294	992,188	968,748
Delinquent loans	32,898	46,556	50,282	62,633	79,901
Delinquency rate – all loans	3.1%	4.6%	5.0%	6.3%	8.3%
Defaulted loans in our claims received inventory	809	954	1,385	2,769	4,746
Pool Insurance:					
Insured loans in force	23,675	31,364	39,071	52,189	62,869
Delinquent loans	859	1,309	1,883	2,739	3,797
Delinquency rate	3.6%	4.2%	4.8%	5.3%	6.0%

Different geographical areas may experience different delinquency rates due to varying localized economic conditions from year to year and the amount of time it takes for foreclosures to be completed for uncured delinquencies. The following table shows the percentage of primary loans we insured that were delinquent as of December 31, 2018, 2017 and 2016 for the 15 jurisdictions for which we paid the most claims during 2018.

Jurisdiction delinquency rates

	December 31,		
	2018	2017	2016
New Jersey*	4.6 %	7.3 %	11.3 %
New York*	6.1	8.0	10.5
Florida*	3.9	9.5	6.6
Illinois*	3.3	4.1	5.5
Maryland	4.1	5.4	7.4
Pennsylvania*	3.2	4.2	5.3
California	2.2	2.6	3.1
Puerto Rico*	10.3	24.2	10.7
Ohio*	2.6	3.2	4.2
Massachusetts	3.2	4.1	6.1
Connecticut*	3.5	4.4	5.6
Virginia	2.1	2.8	3.8
Georgia	3.4	4.5	5.5
Texas	3.6	6.0	4.8
Michigan	2.3	2.9	3.4
All other jurisdictions	2.6	3.3	4.2

Note: Asterisk denotes jurisdictions in the table above that predominantly use a judicial foreclosure process, which generally increases the amount of time for a foreclosure to be completed.

We believe the increase in delinquency rates from 2016 to 2017 in Florida, Puerto Rico and Texas reflect the impact of the 2017 hurricanes experienced in those areas. Based on our analysis and past experience, we do not expect the

2017 hurricane activity to result in a material increase in our incurred losses or paid claims.

The primary delinquency inventory in those same jurisdictions as of December 31, 2018, 2017 and 2016 appears in a table found in “Management’s Discussion and Analysis – Consolidated Results of Operations – Losses and expenses – Loss Reserves,” in Item 7.

Claims. Claims result from delinquencies that are not cured or a short sale that we approve. Whether a claim results from an uncured delinquency depends, in large part, on the borrower’s equity in the home at the time of delinquency, the borrower’s or the lender’s ability to sell the home for an amount sufficient to satisfy all amounts due under the mortgage and the willingness and ability of the borrower and lender to enter into a loan modification that provides for a cure of the delinquency. Various factors affect the frequency and amount of claims, including local home prices and employment levels, and interest rates. If a delinquency goes to claim, any premium collected from the time of delinquency to the time of claim payment is returned to the servicer along with the claim payment.

Under the terms of our master policy, the lender is required to file a claim for primary insurance with us within 60 days after it has acquired title to the underlying property (typically through foreclosure). For the past several years, the average time it took to receive a claim associated with a delinquency increased significantly from our historical experience of approximately twelve months, in part, due to new loss mitigation protocols established by servicers and to changes in some state foreclosure laws that may include, for example, a requirement for additional review and/or mediation processes. Recently, the average time

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for servicers to process foreclosures has decreased, which has reduced the average time to receive a claim associated with new delinquent notices that do not cure. It is difficult to estimate how long it may take for current and future delinquencies that do not cure to develop into paid claims.

Within 60 days after a claim has been filed and all documents required to be submitted to us have been delivered, we have the option of either (1) paying the coverage percentage specified for that loan, with the insured retaining title to the underlying property and receiving all proceeds from the eventual sale of the property (we have elected this option for the vast majority of claim payments in the recent past), or (2) paying 100% of the claim amount in exchange for the lender's conveyance to us of good and marketable title to the property. After we receive title to a property, we sell it for our own account. If we fail to pay a claim timely, we would be subject to additional interest expense.

Claim activity is not evenly spread throughout the coverage period of a book of primary business. Relatively few claims are typically received during the first two years following issuance of coverage on a loan. This is typically followed by a period of rising claims which, based on industry experience, has historically reached its highest level in the third and fourth years after the year of loan origination. Thereafter, the number of claims typically received has historically declined at a gradual rate, although the rate of decline can be affected by conditions in the economy, including slowing home price appreciation or home price depreciation. Moreover, when a loan is refinanced, because the new loan replaces, and is a continuation of, an earlier loan, the pattern of claims frequency for that new loan may be different from the historical pattern for other loans. Persistency, the condition of the economy, including unemployment, and other factors can affect the pattern of claim activity. For example, a weak economy can lead to claims from older books of business increasing, continuing at stable levels or experiencing a lower rate of decline. As of December 31, 2018, 59% of our primary RIF was written subsequent to December 31, 2015, 70% of our primary RIF was written subsequent to December 31, 2014, and 76% of our primary RIF was written subsequent to December 31, 2013. See "Our Products and Services – Mortgage Insurance – Primary Insurance In Force and Risk In Force by Policy Year" above.

Another important factor affecting MGIC Book losses is the amount of the average claim size, which is generally referred to as claim severity. The main determinants of claim severity are the amount of the mortgage loan, the coverage percentage on the loan, loss mitigation efforts and local market conditions. For information about our primary average claim paid, see "Management's Discussion and Analysis – Consolidated Results of Operations – Net Losses and LAE Paid," in [Item 7](#).

Net losses paid and primary losses paid for the top 15 jurisdictions and all other jurisdictions for 2018, 2017 and 2016 appear in tables found in "Management's Discussion and Analysis – Consolidated Results of Operations – Losses and expenses – Net Losses and LAE Paid," in [Item 7](#).

Loss Mitigation.

Before paying a claim, we review the loan and servicing files to determine the appropriateness of the claim amount. Our insurance policies generally provide that we can reduce or deny a claim if the servicer did not comply with its obligations under our insurance policy, including the requirement to mitigate our loss by performing reasonable loss mitigation efforts or, for example, diligently pursuing a foreclosure or bankruptcy relief in a timely manner. We call such reduction of claims submitted to us "curtailments." In each of 2018 and 2017, curtailments reduced our average claim paid by approximately 5.8% and 5.6%, respectively.

When reviewing the loan file associated with a claim, we may determine that we have the right to rescind coverage on the loan. In our SEC reports, we refer to insurance rescissions and denials of claims as "rescissions" and variations of

this term. The circumstances in which we are entitled to rescind coverage narrowed under more restrictive policy terms beginning in 2012. As of December 31, 2018, approximately 82% of our IIF was written under the more restrictive terms. We expect a new version of our master policy, containing more restrictive terms to be effective for business beginning in the third or fourth quarter of 2019. For more information, see our Risk Factor titled "The mix of business we write affects our Minimum Required Assets under the PMIERS, our premium yields and the likelihood of losses occurring" in Item 1A. In recent quarters, an immaterial percentage of claims received in a quarter have been resolved by rescissions. We do not expect future rescissions will be a significant portion of the claims we resolve over the next few years.

Our loss reserving methodology incorporates our estimates of future rescissions, curtailments, and reversals of rescissions and curtailments. When we rescind coverage, we return all premiums previously paid to us under the policy and are relieved of our obligation to pay a claim under the policy. A variance between ultimate actual rescission, curtailment or reversal rates and our estimates, as a result of the outcome of litigation, settlements or other factors, could materially affect our losses.

When the insured disputes our right to rescind coverage or curtail a claim, we generally engage in discussions in an attempt to settle the dispute. If we are unable to reach a settlement, the outcome of a dispute ultimately may be determined by legal proceedings. Under ASC 450-20, until a liability associated with settlement discussions or legal proceedings becomes probable and

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can be reasonably estimated, we consider our claim payment or rescission resolved for financial reporting purposes and do not accrue an estimated loss. Where we have determined that a loss is probable and can be reasonably estimated, we have recorded our best estimate of our probable loss.

In addition to matters for which we have recorded a probable loss, we are involved in other discussions and/or proceedings with insureds with respect to our claims paying practices. Although it is reasonably possible that when these matters are resolved we will not prevail in all cases, we are unable to make a reasonable estimate or range of estimates of the potential liability. We estimate the maximum exposure associated with matters where a loss is reasonably possible to be approximately \$279 million, although we believe (but can give no assurance that) we will ultimately resolve these matters for significantly less than this amount. This estimate of our maximum exposure does not include interest or consequential or exemplary damages.

Although loan modification programs continued to mitigate our losses in 2018, their impact has decreased significantly from the impact we experienced in 2008-2012.

LOSS RESERVES

A significant period of time typically elapses between the time when a borrower becomes delinquent on a mortgage payment, which is the event triggering a potential future claim payment by us, the reporting of the delinquency to us, the acquisition of the property by the lender (typically through foreclosure) or the sale of the property with our approval, and the eventual payment of the claim related to the uncured delinquency or a rescission. To recognize the estimated liability for losses related to outstanding reported delinquencies, or delinquency inventory, we establish loss reserves. Loss reserves are established by estimating the number of loans in our delinquency inventory that will result in a claim payment, which is referred to as the claim rate, and further estimating the amount of the claim payment, which is referred to as claim severity. Our loss reserve estimates are established based upon historical experience, including rescission and curtailment activity. In accordance with GAAP for the mortgage insurance industry, we generally do not establish loss reserves for future claims on insured loans that are not currently delinquent.

We also establish reserves to provide for the estimated costs of settling claims, general expenses of administering the claims settlement process, legal fees and other fees (“loss adjustment expenses”), and for losses and loss adjustment expenses from delinquencies that have occurred, but which have not yet been reported to us.

Our reserving process bases our estimates of future events on our past experience. However, estimation of loss reserves is inherently judgmental and conditions that have affected the development of the loss reserves in the past may not necessarily affect development patterns in the future, in either a similar manner or degree. For further information, see our risk factors in [Item 1A](#), including the ones titled “Because we establish loss reserves only upon a loan delinquency rather than based on estimates of our ultimate losses on risk in force, losses may have a disproportionate adverse effect on our earnings in certain periods,” and “Because loss reserve estimates are subject to uncertainties, paid claims may be substantially different than our loss reserves.”

Our losses incurred from our RIF have declined in recent years in part due to the improving economy, the run-off of the insurance policies we wrote before the financial crisis and the credit quality of insurance policies written since the financial crisis. These factors resulted in fewer delinquent loans, as well as an improved cure rate on delinquent loans. Our losses incurred were \$36.6 million in 2018, compared to \$53.7 million in 2017 and \$240.2 million in 2016. For information about the decrease in losses incurred from 2016 to 2018, see “Management’s Discussion and Analysis – Consolidated Results of Operations – Losses and expenses – Losses incurred, net,” [in Item 7](#).

C. Investment Portfolio
POLICY AND STRATEGY

At December 31, 2018, the fair value of our investment portfolio was approximately \$5.2 billion. In addition, at December 31, 2018, our total assets included approximately \$152 million of cash and cash equivalents. At December 31, 2018, approximately \$248 million of investments and cash and cash equivalents was held by our parent company, and the remainder was held by our subsidiaries, primarily MGIC.

As of December 31, 2018, approximately 77% of our investment portfolio (excluding cash and cash equivalents) was managed by Wellington Management Company, LLP, although we maintain overall control of investment policy and strategy. We maintain direct management of the remainder of our investment portfolio. Unless otherwise indicated, the remainder of the discussion regarding our investment portfolio refers to our investment portfolio only and not to cash and cash equivalents.

The investment policy of our operating companies (primarily MGIC) emphasizes preservation of PMIERS assets, limiting portfolio volatility and maximizing total return with an emphasis on yield (subject to the other objectives). Our holding company investment policy emphasizes providing liquidity with minimal realized losses through holding high credit quality, low volatility

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assets. Consequently, our investment portfolio consists almost entirely of high-quality, investment grade, fixed income securities. Our investment portfolio strategy considers tax efficiency. The mix of tax-exempt municipal securities in our investment portfolio will be dependent upon their value, relative to taxable equivalent securities, determined in part by federal statutory tax rates. Our investment policies and strategies are subject to change depending upon regulatory, economic and market conditions and our existing or anticipated financial condition and operating requirements.

Our investment policies in effect at December 31, 2018 limit investments in the securities of a single issuer, other than the U.S. government, and generally limit the purchase of fixed income securities to those that are rated investment grade by at least one rating agency. They also limit the amount of investment in foreign governments and foreign domiciled securities and in any individual foreign country. In addition, the guidelines require maintenance of weighted average credit quality of at least an "A" rating.

The aggregate market value of the holdings of a single obligor, or type of investment, as applicable, is limited to:

U.S. government and GNMA securities	No limit
Pre-refunded municipals escrowed in Treasury securities	No limit
Individual U.S. government agencies ⁽¹⁾	10% of portfolio market value
Individual securities rated "AAA" or "AA"	3% of portfolio market value
Individual securities rated "BBB" or "A"	2% of portfolio market value
Foreign governments & foreign domiciled securities (in total) ⁽³⁾	20% of portfolio market value

(1) As used with respect to our investment portfolio, U.S. government agencies include all GSEs and Federal Home Loan Banks.

(2) For the holding company, individual securities with a rating of "AA" or "AAA" may represent a maximum 10% of the portfolio market value and individual securities with a rating of "BBB" or "A" may represent a maximum 5%.

(3) For the holding company, there is no maximum aggregate limit for foreign government or foreign domiciled securities.

For information about the credit ratings of securities in our investment portfolio, see "Balance Sheet Review" in Item 7.

Investment Operations

At December 31, 2018, the sectors of our investment portfolio were as shown in the table below:

Investment portfolio - sectors

	Percentage of Portfolio's Fair Value
1. Corporate	47%
2. Tax-Exempt Municipals	22
3. Asset-Backed	14
4. Taxable Municipals	11
5. U.S. government and agency debt	3
6. GNMA and other agency mortgage-backed securities	3
	100%

We had no derivative financial instruments in our investment portfolio. Securities with stated maturities due within up to one year, after one year and up to five years, after five years and up to ten years, and after ten years, represented

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9%, 32%, 19% and 23%, respectively, of the total fair value of our investment in fixed income debt securities. Asset-backed and mortgage-backed securities are not included in these maturity categories as the expected maturities may be different from the stated maturities depending on the periodic payments during the life of the security. Asset-backed securities represent 14% of the investment portfolio (CLOs represent 6%, CMBS represent 5% and other asset-backed securities represent 3%). GNMA and other agency mortgage-backed securities represent 3% of the investment portfolio. Our pre-tax yield was 3.1%, 2.7% and 2.6% for 2018, 2017, and 2016, respectively, and our after-tax yield was 2.6%, 2.0% and 1.9% for 2018, 2017, and 2016, respectively.

Our ten largest holdings at December 31, 2018 appear in the table below:

Investment portfolio - top ten largest holdings

	Fair Value (In thousands)
1. New York St Dorm Auth Rev	\$ 57,035
2. Goldman Sachs Group	51,400
3. JP Morgan Chase	38,678
4. Wells Fargo and Company	36,698
5. Chicago Ill Tran Auth and O Hare Apt	35,894
6. Pennsylvania St Turnpike Comm	35,033
7. Citigroup Inc	33,212
8. New York City NY Transitional	32,113
9. Metropolitan Trans Auth NY	31,459
10. Bank of America Corp	31,438
	\$ 382,960

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Note: This table excludes securities issued by the U.S. government or U.S. government agencies.

For further information concerning investment operations, see [Note 5 – “Investments,”](#) to our consolidated financial statements in Item 8.

D. Regulation

Direct Regulation

We are subject to comprehensive, detailed regulation by state insurance departments. These regulations are principally designed for the protection of our insured policyholders, rather than for the benefit of investors. Although their scope varies, state insurance laws generally grant broad supervisory powers to agencies or officials to examine insurance companies and enforce rules or exercise discretion affecting almost every significant aspect of the insurance business.

In general, regulation of our subsidiaries' businesses relates to:

- licenses to transact businesses;
- policy forms;
- premium rates;
- insurable loans;
- annual and other reports on financial condition;
- the basis upon which assets and liabilities must be stated;
- requirements regarding contingency reserves equal to 50% of premiums earned;
- minimum capital levels and adequacy ratios;
- reinsurance requirements;
- limitations on the types of investment instruments which may be held in an investment portfolio;
- privacy;
- deposits of securities;
- transactions among affiliates;
- cybersecurity
- limits on dividends payable;
- suitability of officers and directors; and
- claims handling.

Wisconsin has adopted the Risk Management and Own Risk and Solvency Assessment Act, which requires, among other things, that we:

- no less than annually, conduct an Own Risk and Solvency Assessment ("ORSA") to assess the material risks associated with our business and our current and estimated projected future solvency position;
- maintain a risk management framework to assess, monitor, manage and report on material risks;
- provide a confidential high-level ORSA Summary Report annually to the OCI; and
- Provide an Enterprise Risk Management Report annually to the OCI.

The insurance laws of 16 jurisdictions, including Wisconsin, our domiciliary state, require a mortgage insurer to maintain a minimum amount of statutory capital relative to the RIF (or a similar measure) in order for the mortgage insurer to continue to write new business. We refer to these requirements as the “State Capital Requirements.” While they vary among jurisdictions, currently the most common State Capital Requirements allow for a maximum risk-to-capital ratio of 25 to 1. Wisconsin does not regulate capital by using a risk-to-capital measure but instead requires a minimum policyholder position. The “policyholder position” of a mortgage insurer is its net worth or surplus,

contingency reserve and a portion of the reserves for unearned premiums.

At December 31, 2018, MGIC's risk-to-capital ratio was 9.0 to 1, below the maximum allowed by the jurisdictions with State Capital Requirements, and its policyholder position was \$2.6 billion above the required MPP of \$1.3 billion.

The NAIC plans to revise the minimum capital and surplus requirements for mortgage insurers that are provided for in its Mortgage Guaranty Insurance Model Act. A working group of state regulators has been considering since 2016 a risk-based framework to establish capital requirements for mortgage insurers, although no date has been established by which the NAIC must propose revisions to the capital requirements. See our risk factors "We may not continue to meet the GSEs' mortgage insurer eligibility requirements and our returns may decrease as we are required to maintain significantly more capital in order to maintain our eligibility" and "State Capital requirements may prevent us from continuing to write new insurance on an uninterrupted basis" in Item 1A, for information about regulations governing our capital adequacy and our expectations regarding our future capital position. See "Management's Discussion and Analysis – Liquidity and Capital Resources – Capital Adequacy" in Item 7 for information about our current capital position.

Most states also regulate transactions between insurance companies and their parents or affiliates and have restrictions on transactions that have the effect of inducing lenders to place business with the insurer. For a description of limits on dividends payable to us from MGIC, see Note 14 – "Statutory Information," to our consolidated financial statements in Item 8.

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Mortgage insurance premium rates are also subject to state regulation to protect policyholders against the adverse effects of excessive, inadequate or unfairly discriminatory rates and to encourage competition in the insurance marketplace. Any increase in premium rates must be justified, generally on the basis of the insurer's loss experience, expenses and future trend analysis. The general mortgage default experience may also be considered. Premium rates are subject to review and challenge by state regulators.

We are required to establish statutory accounting contingency loss reserves in an amount equal to 50% of net earned premiums. These amounts cannot be withdrawn for a period of 10 years, except as permitted by insurance regulations. With regulatory approval a mortgage guaranty insurance company may make early withdrawals from the contingency reserve when incurred losses exceed 35% of net premiums earned in a calendar year. For further information, see [Note 14 – "Statutory Information,"](#) to our consolidated financial statements in Item 8.

Mortgage insurers are generally single-line companies, restricted to writing residential mortgage insurance business only. Although we, as an insurance holding company, are prohibited from engaging in certain transactions with MGIC or our other insurance subsidiaries without submission to and, in some instances, prior approval by applicable insurance departments, we are not subject to insurance company regulation on our non-insurance businesses.

Wisconsin's insurance regulations generally provide that no person may acquire control of us unless the transaction in which control is acquired has been approved by the OCI. The regulations provide for a rebuttable presumption of control when a person owns or has the right to vote more than 10% of the voting securities. In addition, the insurance regulations of other states in which MGIC is licensed require notification to the state's insurance department a specified time before a person acquires control of us. If regulators in these states disapprove the change of control, our licenses to conduct business in the disapproving states could be terminated. For further information about regulatory proceedings applicable to us and our industry, see "We are involved in legal proceedings and are subject to the risk of additional legal proceedings in the future" in [Item 1A](#).

The CFPB was established by the Dodd-Frank Act to regulate the offering and provision of consumer financial products or services under federal law. The CFPB's rules implementing laws that require mortgage lenders to make ability-to-pay determinations prior to extending credit affect the characteristics of loans being originated and the volume of loans available to be insured. We are uncertain whether the CFPB will issue any other rules or regulations that affect our business.

Such rules and regulations could have a material adverse effect on us.

As the most significant purchasers and sellers of conventional mortgage loans and beneficiaries of private mortgage insurance, Freddie Mac and Fannie Mae impose financial and other requirements on private mortgage insurers in order for them to be eligible to insure loans sold to the GSEs (these requirements are referred to as the "PMIERS", as discussed above). These requirements are subject to change from time to time. Based on our interpretation of the financial requirements of the PMIERS, as of December 31, 2018, MGIC's Available Assets totaled \$4.8 billion, or \$1.4 billion in excess of its Minimum Required Assets. MGIC is in compliance with the requirements of the PMIERS and eligible to insure loans purchased by the GSEs. If MGIC ceases to be eligible to insure loans purchased by one or both of the GSEs, it would significantly reduce the volume of our new business writings. For information about matters that could negatively affect our compliance with the PMIERS, see our risk factor titled "We may not continue to meet the GSEs' mortgage insurer eligibility requirements and our returns may decrease as we are required to maintain significantly more capital in order to maintain our eligibility" in [Item 1A](#).

Revised PMIERS were published in September 2018 and will become effective March 31, 2019. If the revised PMIERS had been effective as of December 31, 2018, we estimate that MGIC's pro forma excess of Available Assets over Minimum Required Assets would have been approximately \$1 billion. The decrease in the pro forma excess from the reported excess of \$1.4 billion is primarily due to the elimination of any credit for future premiums that had previously been allowed for certain insurance policies.

The FHFA is the conservator of the GSEs and has the authority to control and direct their operations. The increased role that the federal government has assumed in the residential mortgage market through the GSE conservatorship may increase the likelihood that the business practices of the GSEs change, including through administrative action, in ways that have a material adverse effect on us and that the charters of GSEs are changed by new federal legislation. In the past, members of Congress introduced several bills intended to scale back the GSEs; however, no legislation has been enacted. The Administration issued a June 2018 report indicating that the conservatorship of the GSEs should end and that the GSEs should transition to fully private entities, competing on a level playing field with private issuers of mortgage-backed securities ("MBS") (such issuers, collectively with the GSEs, referred to in the report as the "guarantors"). The report further indicated that a federal entity should regulate the guarantors, including their capital adequacy, and that guarantors should have access to an explicit federal guarantee on the MBS that is exposed only after substantial losses

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are incurred by the private market, including the guarantors. It is unclear whether and when that would occur and how that would impact us. As a result of the matters referred to above, it is uncertain what role the GSEs, FHA and private capital, including private mortgage insurance, will play in the domestic residential housing finance system in the future or the impact of any such changes on our business. In addition, the timing of the impact of any resulting changes on our business is uncertain. Most meaningful changes would require Congressional action to implement and it is difficult to estimate when Congressional action would be final and how long any associated phase-in period may last. For additional information about the potential impact that any such changes in the GSE's roles may have on us, see the risk factor titled "Changes in the business practices of the GSEs, federal legislation that changes their charters or a restructuring of the GSEs could reduce our revenues or increase our losses" in [Item 1A](#).

In December 2013, the U.S. Treasury Department's Federal Insurance Office released a report that calls for federal standards and oversight for mortgage insurers to be developed and implemented. It is uncertain if and when the standards and oversight will become effective and what form they will take.

Indirect Regulation

We are also indirectly, but significantly, impacted by regulations affecting purchasers of mortgage loans, such as Freddie Mac and Fannie Mae, and regulations affecting governmental insurers, such as the FHA and the VA, and lenders. See our risk factor titled "Changes in the business practices of the GSEs, federal legislation that changes their charters or a restructuring of the GSEs could reduce our revenues or increase our losses" in Item 1A for a discussion of how potential changes in the GSEs' business practices could affect us. Private mortgage insurers, including MGIC, are highly dependent upon federal housing legislation and other laws and regulations to the extent they affect the demand for private mortgage insurance and the housing market generally. From time to time, those laws and regulations have been amended in ways that affect competition from government agencies. Proposals are discussed from time to time by Congress and certain federal agencies to reform or modify the FHA and the Government National Mortgage Association, which securitizes mortgages insured by the FHA.

Subject to certain exceptions, in general, RESPA prohibits any person from giving or receiving any "thing of value" pursuant to an agreement or understanding to refer settlement services.

The Office of the Comptroller of the Currency, the Federal Reserve Board, and the Federal Deposit Insurance Corporation have uniform guidelines on real estate lending by insured lending institutions under their

supervision. The guidelines specify that a residential mortgage loan originated with a loan-to-value ratio of 90% or greater should have appropriate credit enhancement in the form of mortgage insurance or readily marketable collateral, although no depth of coverage percentage is specified in the guidelines.

Lenders are subject to various laws, including the Home Mortgage Disclosure Act, the Community Reinvestment Act, the Equal Credit Opportunity Act, the Truth in Lending Act, the Fair Credit Reporting Act, the Gramm-Leach-Bliley Act, and the Fair Housing Act, and Fannie Mae and Freddie Mac are subject to various laws, including laws relating to government sponsored enterprises, which may impose obligations or create incentives for increased lending to low and moderate income persons, or in targeted areas.

There can be no assurance that other federal laws and regulations affecting these institutions and entities will not change, or that new legislation or regulations will not be adopted which will adversely affect the private mortgage insurance industry. In this regard, see the risk factor titled "Changes in the business practices of the GSEs, federal legislation that changes their charters or a restructuring of the GSEs could reduce our revenues or increase our losses"

in Item 1A.

E. Employees

At December 31, 2018, we had 793 full- and part-time employees, approximately 34% of whom were assigned to our field offices. The number of employees given above does not include “on-call” employees. The number of “on-call” employees can vary substantially, primarily as a result of changes in demand for contract underwriting services. In recent years, the number of “on-call” employees has ranged from fewer than 40 to more than 110.

F. Website Access

We make available, free of charge, through our Internet website our Annual Reports on Form 10-K, Quarterly Reports on Form 10-Q, Current Reports on Form 8-K, and amendments to those reports filed or furnished pursuant to Section 13(a) or 15(d) of the Securities Exchange Act of 1934 as soon as reasonably practicable after we electronically file these materials with the Securities and Exchange Commission. The address of our website is <http://mtg.mgic.com>, and such reports and amendments are accessible through the “Reports & Filings” link at such address. The inclusion of our website address in this report is an inactive textual reference only and is not intended to include or incorporate by reference the information on our website into this report.

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Item 1A. Risk Factors

As used below, “we,” “our” and “us” refer to MGIC Investment Corporation’s consolidated operations or to MGIC Investment Corporation, as the context requires; and “MGIC” refers to Mortgage Guaranty Insurance Corporation.

Our actual results could be affected by the risk factors below. These risk factors are an integral part of this annual report. These risk factors may also cause actual results to differ materially from the results contemplated by forward looking statements that we may make. Forward looking statements consist of statements which relate to matters other than historical fact, including matters that inherently refer to future events. Among others, statements that include words such as “believe,” “anticipate,” “will” or “expect,” or words of similar import, are forward looking statements. We are not undertaking any obligation to update any forward looking statements or other statements we may make even though these statements may be affected by events or circumstances occurring after the forward looking statements or other statements were made. No reader of this annual report should rely on these statements being current at any time other than the time at which this annual report was filed with the Securities and Exchange Commission.

Competition or changes in our relationships with our customers could reduce our revenues, reduce our premium yields and / or increase our losses.

Our private mortgage insurance competitors include:

▲ Arch Mortgage Insurance Company,
◆ Essent Guaranty, Inc.,
Ⓒ Genworth Mortgage Insurance Corporation,
Ⓝ National Mortgage Insurance Corporation, and
Ⓜ Radian Guaranty Inc.

The private mortgage insurance industry is highly competitive and is expected to remain so. We believe that we currently compete with other private mortgage insurers based on premium rates, underwriting requirements, financial strength (including based on credit or financial strength ratings), customer relationships, name recognition, reputation, the strength of our management team and field organization, the ancillary products and services provided to lenders and the effective use of technology and innovation in the delivery and servicing of our mortgage insurance products.

Much of the competition in the industry in the last few years has centered on pricing practices which have included: (i) reductions in standard filed rates for borrower-paid mortgage insurance policies (“BPMI”); (ii) use by competitors of a spectrum of filed rates to allow for formulaic, risk-based pricing that may be adjusted more frequently within certain parameters (referred to as “loan level pricing systems”); and (iii) use of customized rates (discounted from standard rates) that are made available to lenders that meet certain criteria.

We monitor various competitive and economic factors while seeking to balance both profitability and market share considerations in developing our pricing strategies. We reduced certain of our rates in 2018, which will reduce our premium yield (net premiums earned divided by the average insurance in force) over time as older insurance policies with higher premium rates run off and new insurance policies with lower premium rates are written.

In 2018, we continued to evolve our pricing from a standard rate card approach, where premium rates vary based on relatively few attributes, to a more granular approach, where more attributes are considered. In the first quarter of 2019, we introduced MiQ™, our loan level pricing system that establishes our premium rates based on more risk attributes than were considered in 2018. The widespread use of loan level pricing systems by the private mortgage industry will make it more difficult to compare our rates to those offered by our competitors. We may not be aware of industry changes until we observe that our volume of new insurance written (“NIW”) has changed and our volume may fluctuate more as a result.

There can be no assurance that our premium rates adequately reflect the risk associated with the underlying mortgage insurance policies. For additional information, see our risk factors titled “The premiums we charge may not be

adequate to compensate us for our liabilities for losses and as a result any inadequacy could materially affect our financial condition and results of operations" and "If our risk management programs are not effective in identifying, or adequate in controlling or mitigating, the risks we face, or if the models used in our businesses are inaccurate, it could have a material adverse impact on our business, results of operations and financial condition."

Our relationships with our customers, which may affect the amount of our new business written, could be adversely affected by a variety of factors, including if our premium rates are higher than those of our competitors, our underwriting requirements result in our declining to insure some of the loans originated by our customers, or our insurance policy rescissions and claim curtailments affect the customer. Regarding the concentration of our

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new business, our largest customer accounted for approximately 4% and 5% of our NIW in each of 2017 and 2018, respectively, and our top ten customers accounted for approximately 23% and 24% of our NIW, in each of 2017 and 2018, respectively.

Certain of our competitors have access to capital at a lower cost than we do (including, through off-shore reinsurance vehicles, which are tax-advantaged). As a result, they may be able to achieve higher after-tax rates of return on their NIW compared to us, which could allow them to leverage reduced premium rates to gain market share, and they may be better positioned to compete outside of traditional mortgage insurance, including by participating in alternative forms of credit enhancement pursued by Fannie Mae and Freddie Mac (the "GSEs") discussed in our risk factor titled "The amount of insurance we write could be adversely affected if lenders and investors select alternatives to private mortgage insurance."

Substantially all of our insurance written since 2008 has been for loans purchased by the GSEs. The current private mortgage insurer eligibility requirements ("PMIERS") of the GSEs require a mortgage insurer to maintain a minimum amount of assets to support its insured risk, as discussed in our risk factor titled "We may not continue to meet the GSEs' private mortgage insurer eligibility requirements and our returns may decrease as we are required to maintain more capital in order to maintain our eligibility." The PMIERS do not require an insurer to maintain minimum financial strength ratings; however, our financial strength ratings can affect us in the following ways:

- A downgrade in our financial strength ratings could result in increased scrutiny of our financial condition by the GSEs and/or our customers, potentially resulting in a decrease in the amount of our new insurance written.

- Our ability to participate in the non-GSE mortgage market (which has been limited since 2008, but may grow in the future), could depend on our ability to maintain and improve our investment grade ratings for our mortgage insurance subsidiaries. We could be competitively disadvantaged with some market participants because the financial strength ratings of our insurance subsidiaries are lower than those of some competitors. MGIC's financial strength rating from Moody's is Baa2 (with a stable outlook), from Standard & Poor's is BBB+ (with a stable outlook) and from A.M. Best is A- (with a stable outlook).

Financial strength ratings may also play a greater role if the GSEs no longer operate in their current capacities, for example, due to legislative or regulatory action. In addition, although the PMIERS do not require minimum financial strength ratings,

the GSEs consider financial strength ratings to be important when using forms of credit enhancement other than traditional mortgage insurance, as discussed in our risk factor titled "The amount of insurance we write could be adversely affected if lenders and investors select alternatives to private mortgage insurance."

If we are unable to compete effectively in the current or any future markets as a result of the financial strength ratings assigned to our insurance subsidiaries, our future new insurance written could be negatively affected.

The amount of insurance we write could be adversely affected if lenders and investors select alternatives to private mortgage insurance.

Alternatives to private mortgage insurance include:

- lenders using FHA, VA and other government mortgage insurance programs,
- investors using risk mitigation and credit risk transfer techniques other than private mortgage insurance,
- lenders and other investors holding mortgages in portfolio and self-insuring, and
- lenders originating mortgages using piggyback structures to avoid private mortgage insurance, such as a first mortgage with an 80% loan-to-value ratio and a second mortgage with a 10%, 15% or 20% loan-to-value ratio (referred to as 80-10-10, 80-15-5 or 80-20 loans, respectively) rather than a first mortgage with a 90%, 95% or 100% loan-to-value ratio that has private mortgage insurance.

In 2018, Freddie Mac and Fannie Mae initiated programs with loan level mortgage default coverage provided by various (re)insurers that are not mortgage insurers governed by PMIERS, and that are not selected by the lenders. Due to differences in policy terms, these programs offer premium rates that are generally below prevalent single premium

lender paid mortgage insurance ("LPMI") rates. While we view these programs as competing with traditional private mortgage insurance, we have participated in them and may participate in future GSE or other programs. The GSEs (and other investors) have also used other forms of credit enhancement that did not involve traditional private mortgage insurance, such as engaging in credit-linked note transactions executed in the capital markets, or using other forms of debt issuances or securitizations that transfer credit risk directly to other investors, including competitors and an affiliate of MGIC; using other risk mitigation techniques in conjunction with reduced levels of private mortgage insurance

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coverage; or accepting credit risk without credit enhancement.

The FHA's share of the low down payment residential mortgages that were subject to FHA, VA, USDA or primary private mortgage insurance was 29.9% in 2018, 33.9% in 2017 and 34.2% in 2016 (these figures exclude FHA's home equity conversion mortgages, or HECMs). In the past ten years, the FHA's share has been as low as 29.9% in 2018 and as high as 66.8% in 2009. Factors that influence the FHA's market share include relative rates and fees, underwriting guidelines and loan limits of the FHA, VA, private mortgage insurers and the GSEs; lenders' perceptions of legal risks under FHA versus GSE programs; flexibility for the FHA to establish new products as a result of federal legislation and programs; returns expected to be obtained by lenders for Ginnie Mae securitization of FHA-insured loans compared to those obtained from selling loans to the GSEs for securitization; and differences in policy terms, such as the ability of a borrower to cancel insurance coverage under certain circumstances. We cannot predict how the factors that affect the FHA's share of new insurance written will change in the future.

The VA's share of the low down payment residential mortgages that were subject to FHA, VA, USDA or primary private mortgage insurance was 24.4% in 2018, 24.7% in 2017 and 27.2% in 2016. In the past ten years, the VA's share has been as low as 14.3% in 2009 and as high as 27.2% in 2016. We believe that the VA's market share has generally been increasing because of an increase in the number of borrowers that are eligible for the VA's program, which offers 100% loan-to-value ratio ("LTV") loans and charges a one-time funding fee that can be included in the loan amount, and because eligible borrowers have opted to use the VA program when refinancing their mortgages. Changes in the business practices of the GSEs, federal legislation that changes their charters or a restructuring of the GSEs could reduce our revenues or increase our losses.

The GSEs' charters generally require credit enhancement for a low down payment mortgage loan (a loan amount that exceeds 80% of a home's value) in order for such loan to be eligible for purchase by the GSEs. Lenders generally have used private mortgage insurance to satisfy this credit enhancement requirement. (For information about GSE programs initiated in 2018 that provide loan level default coverage by various (re)insurers (which may include affiliates of private mortgage insurers), see our risk factor titled "The amount of insurance we write could be adversely affected if lenders and investors select alternatives to private mortgage insurance.") Because low down payment mortgages purchased by the GSEs have generally been insured with private mortgage insurance, the business

practices of the GSEs greatly impact our business and include:

- private mortgage insurer eligibility requirements of the GSEs, the financial requirements of which are discussed in our risk factor titled "We may not continue to meet the GSEs' private mortgage insurer eligibility requirements and our returns may decrease as we are required to maintain more capital in order to maintain our eligibility,"
- the capital and collateral requirements for participants in the GSEs' alternative forms of credit enhancement discussed in our risk factor titled "The amount of insurance we write could be adversely affected if lenders and investors select alternatives to private mortgage insurance,"
- the level of private mortgage insurance coverage, subject to the limitations of the GSEs' charters, when private mortgage insurance is used as the required credit enhancement on low down payment mortgages,
- the amount of loan level price adjustments and guaranty fees (which result in higher costs to borrowers) that the GSEs assess on loans that require private mortgage insurance,
- whether the GSEs influence the mortgage lender's selection of the mortgage insurer providing coverage,
 - the underwriting standards that determine which loans are eligible for purchase by the GSEs, which can affect the quality of the risk insured by the mortgage insurer and the availability of mortgage loans,
- the terms on which mortgage insurance coverage can be canceled before reaching the cancellation thresholds established by law,
- the programs established by the GSEs intended to avoid or mitigate loss on insured mortgages and the circumstances in which mortgage servicers must implement such programs,
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the terms that the GSEs require to be included in mortgage insurance policies for loans that they purchase, including limitations on the rescission rights of mortgage insurers, the extent to which the GSEs intervene in mortgage insurers' claims paying practices, rescission practices or rescission settlement practices with lenders, and

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the maximum loan limits of the GSEs compared to those of the FHA and other investors.

The Federal Housing Finance Agency ("FHFA") has been the conservator of the GSEs since 2008 and has the authority to control and direct their operations. The increased role that the federal government has assumed in the residential housing finance system through the GSE conservatorship may increase the likelihood that the business practices of the GSEs change, including through administrative action, in ways that have a material adverse effect on us and that the charters of the GSEs are changed by new federal legislation. In the past, members of Congress have introduced several bills intended to change the business practices of the GSEs and the FHA; however, no legislation has been enacted. The Administration issued a June 2018 report indicating that the conservatorship of the GSEs should end and that the GSEs should transition to fully private entities, competing on a level playing field with private issuers of mortgage-backed securities ("MBS") (such issuers, collectively with the GSEs, referred to in the report as the "guarantors"). The report further indicated that a federal entity should regulate the guarantors, including their capital adequacy, and that guarantors should have access to an explicit federal guarantee on the MBS that is exposed only after substantial losses are incurred by the private market, including the guarantors. The report also indicated that a fee on the outstanding volume of MBS would be transferred to the Department of Housing and Urban Development (of which the FHA is a part) to be used for affordable housing purposes. As a result of the matters referred to above, it is uncertain what role the GSEs, FHA and private capital, including private mortgage insurance, will play in the residential housing finance system in the future. The timing and impact on our business of any resulting changes is uncertain. Most meaningful changes would require Congressional action to implement and it is difficult to estimate when Congressional action would be final and how long any associated phase-in period may last.

We may not continue to meet the GSEs' private mortgage insurer eligibility requirements and our returns may decrease as we are required to maintain more capital in order to maintain our eligibility.

We must comply with the PMIERS to be eligible to insure loans delivered to or purchased by the GSEs. The PMIERS include financial requirements, as well as business, quality control and certain transaction approval requirements. The financial requirements of the PMIERS require a mortgage insurer's "Available Assets" (generally only the most liquid assets of an insurer) to equal or exceed its "Minimum Required Assets" (which are based on an insurer's book of insurance in force and are calculated from tables of factors with several risk dimensions and are subject to a floor amount).

Based on our interpretation of the PMIERS, as of December 31, 2018, MGIC's Available Assets totaled \$4.8 billion, or \$1.4 billion in excess of its Minimum Required Assets. MGIC is in compliance with the PMIERS and eligible to insure loans purchased by the GSEs. Revised PMIERS were published in September 2018 and will become effective March 31, 2019. If the revised PMIERS had been effective as of December 31, 2018, we estimate that MGIC's pro forma excess of Available Assets over Minimum Required Assets would have been approximately \$1 billion. The decrease in the pro forma excess from the reported excess of \$1.4 billion is primarily due to the elimination of any credit for future premiums that had previously been allowed for certain insurance policies.

In calculating our "Minimum Required Assets," we are allowed full credit for the risk ceded under our quota share reinsurance transactions with unaffiliated reinsurers and expect to be allowed full credit for our excess-of-loss reinsurance transaction entered into on October 30, 2018, discussed in our risk factor titled "The mix of business we write affects our Minimum Required Assets under the PMIERS, our premium yields and the likelihood of losses occurring." Our reinsurance transactions will be reviewed under the PMIERS at least annually and there is a risk we will not receive full credit in future periods for the risk ceded under them. If MGIC is not allowed certain levels of credit under the PMIERS, under certain circumstances, MGIC may terminate the reinsurance transactions, without penalty.

If MGIC ceases to be eligible to insure loans purchased by one or both of the GSEs, it would significantly reduce the volume of our new business writings. Factors that may negatively impact MGIC's ability to continue to comply with the financial requirements of the PMIERS include the following:

The GSEs may amend the PMIERS at any time and may make the PMIERS more onerous in the future. In June 2018, the FHFA issued a proposed rule on regulatory capital requirements for the GSEs ("Enterprise Capital Requirements"), which included a framework for determining the capital relief allowed to the GSEs for loans with private mortgage insurance. The GSEs have indicated that there may be potential future implications for PMIERS based upon feedback the FHFA receives on its proposed rule on Enterprise Capital Requirements (public comments were due by November 16, 2018). In addition, the PMIERS provide that the factors that determine Minimum Required Assets will be updated every two years and may be updated more frequently to reflect changes in macroeconomic conditions or loan performance. The GSEs have indicated that they will generally provide notice 180 days prior to the effective date of such updates.

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Our future operating results may be negatively impacted by the matters discussed in the rest of these risk factors. Such matters could decrease our revenues, increase our losses or require the use of assets, thereby creating a shortfall in Available Assets.

Should capital be needed by MGIC in the future, capital contributions from our holding company may not be available due to competing demands on holding company resources, including for repayment of debt.

While on an overall basis, the amount of Available Assets MGIC must hold in order to continue to insure GSE loans is greater under the PMIERS than what state regulation currently requires, our reinsurance transactions mitigate the negative effect of the PMIERS on our returns. However, reinsurance may not always be available to us or available on similar terms, it subjects us to counterparty credit risk and the GSEs may change the credit they allow under the PMIERS for risk ceded under our reinsurance transactions.

We are involved in legal proceedings and are subject to the risk of additional legal proceedings in the future.

Before paying an insurance claim, we review the loan and servicing files to determine the appropriateness of the claim amount. When reviewing the files, we may determine that we have the right to rescind coverage on the loan. In our SEC reports, we refer to insurance rescissions and denials of claims collectively as “rescissions” and variations of that term. In addition, our insurance policies generally provide that we can reduce or deny a claim if the servicer did not comply with its obligations under our insurance policy. We call such reduction of claims “curtailments.” In recent quarters, an immaterial percentage of claims received in a quarter have been resolved by rescissions. In 2017 and 2018, curtailments reduced our average claim paid by approximately 5.6% and 5.8%, respectively.

Our loss reserving methodology incorporates our estimates of future rescissions, curtailments, and reversals of rescissions and curtailments. A variance between ultimate actual rescission, curtailment and reversal rates and our estimates, as a result of the outcome of litigation, settlements or other factors, could materially affect our losses.

When the insured disputes our right to rescind coverage or curtail claims, we generally engage in discussions in an attempt to settle the dispute. If we are unable to reach a settlement, the outcome of a dispute ultimately may be determined by legal proceedings.

Under ASC 450-20, until a liability associated with settlement discussions or legal proceedings becomes probable and can be reasonably estimated, we consider

our claim payment or rescission resolved for financial reporting purposes and do not accrue an estimated loss. Where we have determined that a loss is probable and can be reasonably estimated, we have recorded our best estimate of our probable loss.

In addition to matters for which we have recorded a probable loss, we are involved in other discussions and/or proceedings with insureds with respect to our claims paying practices. Although it is reasonably possible that when these matters are resolved we will not prevail in all cases, we are unable to make a reasonable estimate or range of estimates of the potential liability. We estimate the maximum exposure associated with matters where a loss is reasonably possible to be approximately \$279 million. This estimate of maximum exposure is based upon currently available information and is subject to significant judgment, numerous assumptions and known and unknown uncertainties. The matters underlying the estimate of maximum exposure will change from time to time. This estimate of our maximum exposure does not include interest or consequential or exemplary damages.

Mortgage insurers, including MGIC, have been involved in litigation and regulatory actions related to alleged violations of the anti-referral fee provisions of the Real Estate Settlement Procedures Act, which is commonly known as RESPA, and the notice provisions of the Fair Credit Reporting Act, which is commonly known as FCRA. While these proceedings in the aggregate have not resulted in material liability for MGIC, there can be no assurance that the outcome of future proceedings, if any, under these laws would not have a material adverse effect on us. In addition, various regulators, including the CFPB, state insurance commissioners and state attorneys general may bring other actions seeking various forms of relief in connection with alleged violations of RESPA. The insurance law provisions of many states prohibit paying for the referral of insurance business and provide various mechanisms to enforce this

prohibition. While we believe our practices are in conformity with applicable laws and regulations, it is not possible to predict the eventual scope, duration or outcome of any such reviews or investigations nor is it possible to predict their effect on us or the mortgage insurance industry.

In addition to the matters described above, we are involved in other legal proceedings in the ordinary course of business. In our opinion, based on the facts known at this time, the ultimate resolution of these ordinary course legal proceedings will not have a material adverse effect on our financial position or results of operations.

We are subject to comprehensive regulation and other requirements, which we may fail to satisfy.

We are subject to comprehensive, detailed regulation by state insurance departments. These regulations are

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principally designed for the protection of our insured policyholders, rather than for the benefit of investors. Although their scope varies, state insurance laws generally grant broad supervisory powers to agencies or officials to examine insurance companies and enforce rules or exercise discretion affecting almost every significant aspect of the insurance business. State insurance regulatory authorities could take actions, including changes in capital requirements, that could have a material adverse effect on us. For more information about state capital requirements, see our risk factor titled “State capital requirements may prevent us from continuing to write new insurance on an uninterrupted basis.” To the extent that we are construed to make independent credit decisions in connection with our contract underwriting activities, we also could be subject to increased regulatory requirements under the Equal Credit Opportunity Act, commonly known as ECOA, FCRA, and other laws. For more details about the various ways in which our subsidiaries are regulated, see “Business - Regulation” in Item 1. In addition to regulation by state insurance regulators, the CFPB may issue additional rules or regulations, which may materially affect our business.

In December 2013, the U.S. Treasury Department’s Federal Insurance Office released a report that calls for federal standards and oversight for mortgage insurers to be developed and implemented. It is uncertain if and when the standards and oversight will become effective and what form they will take.

If our risk management programs are not effective in identifying, or adequate in controlling or mitigating, the risks we face, or if the models used in our businesses are inaccurate, it could have a material adverse impact on our business, results of operations and financial condition.

Our enterprise risk management program, described in "Business - Our Products and Services - Risk Management" in Item 1, may not be effective in identifying, or adequate in controlling or mitigating, the risks we face in our business. We employ proprietary and third party models to project returns, price products (including through our new loan level pricing system), calculate reserves, generate projections used to estimate future pre-tax income and to evaluate loss recognition testing, evaluate risk, determine internal capital requirements, perform stress testing, and for other uses. These models rely on estimates and projections that are inherently uncertain and may not operate as intended. In addition, from time to time we seek to improve certain models, and the conversion process may result in material changes to assumptions, including those about returns and financial results. The models we employ are complex, which increases our risk of error in their design, implementation or use. Also, the associated input data,

assumptions and calculations may not be correct, and the controls we have in place to mitigate that risk may not be effective in all cases. The risks related to our models may increase when we change assumptions and/or methodologies, or when we add or change modeling platforms. We have enhanced, and we intend to continue to enhance, our modeling capabilities. Moreover, we may use information we receive through enhancements to refine or otherwise change existing assumptions and/or methodologies.

Because we establish loss reserves only upon a loan delinquency rather than based on estimates of our ultimate losses on risk in force, losses may have a disproportionate adverse effect on our earnings in certain periods.

In accordance with accounting principles generally accepted in the United States, commonly referred to as GAAP, we establish reserves for insurance losses and loss adjustment expenses only when notices of default on insured mortgage loans are received and for loans we estimate are in default but for which notices of default have not yet been reported to us by the servicers (this is often referred to as “IBNR”). Because our reserving method does not take account of losses that could occur from loans that are not delinquent, such losses are not reflected in our financial statements, except in the case where a premium deficiency exists. As a result, future losses on loans that are not currently delinquent may have a material impact on future results as such losses emerge.

Because loss reserve estimates are subject to uncertainties, paid claims may be substantially different than our loss reserves.

When we establish reserves, we estimate the ultimate loss on delinquent loans using estimated claim rates and claim amounts. The estimated claim rates and claim amounts represent our best estimates of what we will actually pay on the loans in default as of the reserve date and incorporate anticipated mitigation from rescissions and curtailments.

The establishment of loss reserves is subject to inherent uncertainty and requires judgment by management. The actual amount of the claim payments may be substantially different than our loss reserve estimates. Our estimates could be affected by several factors, including a change in regional or national economic conditions, and a change in the length of time loans are delinquent before claims are received. The change in conditions may include changes in unemployment, affecting borrowers' income and thus their ability to make mortgage payments, and changes in home prices, which may affect borrower willingness to continue to make mortgage payments when the value of the home is below the mortgage balance. Changes to our estimates could have a material impact on our future results, even in a stable economic environment. In addition, historically, losses incurred have followed a

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seasonal trend in which the second half of the year has weaker credit performance than the first half, with higher new default notice activity and a lower cure rate.

We rely on our management team and our business could be harmed if we are unable to retain qualified personnel or successfully develop and/or recruit their replacements.

Our success depends, in part, on the skills, working relationships and continued services of our management team and other key personnel. The unexpected departure of key personnel could adversely affect the conduct of our business. In such event, we would be required to obtain other personnel to manage and operate our business. In addition, we will be required to replace the knowledge and expertise of our aging workforce as our workers retire. In either case, there can be no assurance that we would be able to develop or recruit suitable replacements for the departing individuals; that replacements could be hired, if necessary, on terms that are favorable to us; or that we can successfully transition such replacements in a timely manner. We currently have not entered into any employment agreements with our officers or key personnel. Volatility or lack of performance in our stock price may affect our ability to retain our key personnel or attract replacements should key personnel depart. Without a properly skilled and experienced workforce, our costs, including productivity costs and costs to replace employees may increase, and this could negatively impact our earnings.

If the volume of low down payment home mortgage originations declines, the amount of insurance that we write could decline.

The factors that may affect the volume of low down payment mortgage originations include:

- restrictions on mortgage credit due to more stringent underwriting standards, liquidity issues or risk-retention and/or capital requirements affecting lenders,
- the level of home mortgage interest rates,
- the health of the domestic economy as well as conditions in regional and local economies and the level of consumer confidence,
- housing affordability,
- new and existing housing availability,
- the rate of household formation, which is influenced, in part, by population and immigration trends,

- the rate of home price appreciation, which in times of heavy refinancing can affect whether refinanced loans have loan-to-value ratios that require private mortgage insurance, and
- government housing policy encouraging loans to first-time homebuyers.

A decline in the volume of low down payment home mortgage originations could decrease demand for mortgage insurance and decrease our new insurance written. For other factors that could decrease the demand for mortgage insurance, see our risk factor titled “The amount of insurance we write could be adversely affected if lenders and investors select alternatives to private mortgage insurance.”

State capital requirements may prevent us from continuing to write new insurance on an uninterrupted basis.

The insurance laws of 16 jurisdictions, including Wisconsin, MGIC's domiciliary state, require a mortgage insurer to maintain a minimum amount of statutory capital relative to its risk in force (or a similar measure) in order for the mortgage insurer to continue to write new business. We refer to these requirements as the “State Capital Requirements.”

While they vary among jurisdictions, the most common State Capital Requirements allow for a maximum risk-to-capital ratio of 25 to 1. A risk-to-capital ratio will increase if (i) the percentage decrease in capital exceeds the percentage decrease in insured risk, or (ii) the percentage increase in capital is less than the percentage increase in insured risk. Wisconsin does not regulate capital by using a risk-to-capital measure but instead requires a minimum policyholder position (“MPP”). The “policyholder position” of a mortgage insurer is its net worth or surplus, contingency reserve and a portion of the reserves for unearned premiums.

At December 31, 2018, MGIC's risk-to-capital ratio was 9.0 to 1, below the maximum allowed by the jurisdictions with State Capital Requirements, and its policyholder position was \$2.6 billion above the required MPP of \$1.3

billion. Our risk-to-capital ratio and MPP reflect full credit for the risk ceded under our quota share reinsurance transactions with unaffiliated reinsurers. It is possible that under the revised State Capital Requirements discussed below, MGIC will not be allowed full credit for the risk ceded under such transactions. If MGIC is not allowed an agreed level of credit under the State Capital Requirements, MGIC may terminate the reinsurance transactions, without penalty. At this time, we expect MGIC to continue to comply with the current State Capital Requirements; however, you should read the rest of these risk factors for information about matters that could negatively affect such compliance.

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At December 31, 2018, the risk-to-capital ratio of our combined insurance operations (which includes a reinsurance affiliate) was 9.8 to 1. Reinsurance transactions with our affiliate permit MGIC to write insurance with a higher coverage percentage than it could on its own under certain state-specific requirements.

The NAIC plans to revise the minimum capital and surplus requirements for mortgage insurers that are provided for in its Mortgage Guaranty Insurance Model Act. In May 2016, a working group of state regulators released an exposure draft of a risk-based capital framework to establish capital requirements for mortgage insurers, although no date has been established by which the NAIC must propose revisions to the capital requirements and certain items have not yet been completely addressed by the framework, including the treatment of ceded risk, minimum capital floors, and action level triggers. Currently we believe that the PMIERS contain more restrictive capital requirements than the draft Mortgage Guaranty Insurance Model Act in most circumstances.

While MGIC currently meets, and expects to continue to meet, the State Capital Requirements of Wisconsin and all other jurisdictions, it could be prevented from writing new business in the future in all jurisdictions if it fails to meet the State Capital Requirements of Wisconsin, or it could be prevented from writing new business in a particular jurisdiction if it fails to meet the State Capital Requirements of that jurisdiction, and in each case MGIC does not obtain a waiver of such requirements. It is possible that regulatory action by one or more jurisdictions, including those that do not have specific State Capital Requirements, may prevent MGIC from continuing to write new insurance in such jurisdictions. If we are unable to write business in a particular jurisdiction, lenders may be unwilling to procure insurance from us anywhere. In addition, a lender's assessment of the future ability of our insurance operations to meet the State Capital Requirements or the PMIERS may affect its willingness to procure insurance from us. In this regard, see our risk factor titled "Competition or changes in our relationships with our customers could reduce our revenues, reduce our premium yields and/or increase our losses." A possible future failure by MGIC to meet the State Capital Requirements or the PMIERS will not necessarily mean that MGIC lacks sufficient resources to pay claims on its insurance liabilities. While we believe MGIC has sufficient claims paying resources to meet its claim obligations on its insurance in force on a timely basis, you should read the rest of these risk factors for information about matters that could negatively affect MGIC's claims paying resources.

Downturns in the domestic economy or declines in the value of borrowers' homes from their value at the time their loans closed may result in more homeowners defaulting and our losses increasing, with a corresponding decrease in our returns.

Losses result from events that reduce a borrower's ability or willingness to continue to make mortgage payments, such as unemployment, health issues, family status, and whether the home of a borrower who defaults on his mortgage can be sold for an amount that will cover unpaid principal and interest and the expenses of the sale. In general, favorable economic conditions reduce the likelihood that borrowers will lack sufficient income to pay their mortgages and also favorably affect the value of homes, thereby reducing and in some cases even eliminating a loss from a mortgage default. A deterioration in economic conditions, including an increase in unemployment, generally increases the likelihood that borrowers will not have sufficient income to pay their mortgages and can also adversely affect home prices, which in turn can influence the willingness of borrowers with sufficient resources to make mortgage payments to do so when the mortgage balance exceeds the value of the home. Home prices may decline even absent a deterioration in economic conditions due to declines in demand for homes, which in turn may result from changes in buyers' perceptions of the potential for future appreciation, restrictions on and the cost of mortgage credit due to more stringent underwriting standards, higher interest rates generally, changes to the deductibility of mortgage interest for income tax purposes, decreases in the rate of household formations, or other factors. Changes in home prices and unemployment levels are inherently difficult to forecast given the uncertainty in the current market environment, including uncertainty about the effect of actions the federal government has taken and may take with respect to tax policies, mortgage finance programs and policies, and housing finance reform.

The mix of business we write affects our Minimum Required Assets under the PMIERS, our premium yields and the likelihood of losses occurring.

The Minimum Required Assets under the PMIERS are, in part, a function of the direct risk-in-force and the risk profile of the loans we insure, considering loan-to-value ratio, credit score, vintage, Home Affordable Refinance Program ("HARP") status and delinquency status; and whether the loans were insured under lender-paid mortgage insurance policies or other policies that are not subject to automatic termination consistent with the Homeowners Protection Act requirements for borrower paid mortgage insurance. Therefore, if our direct risk-in-force increases through increases in new insurance written, or if our mix of business changes to include loans with higher loan-to-value ratios or lower FICO scores, for example, or if we insure a higher percentage of loans under lender-paid mortgage insurance policies,

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all other things equal, we will be required to hold more Available Assets in order to maintain GSE eligibility. The minimum capital required by the risk-based capital framework contained in the exposure draft released by the NAIC in May 2016 would be, in part, a function of certain loan and economic factors, including property location, loan-to-value ratio and credit score; general underwriting quality in the market at the time of loan origination; the age of the loan; and the premium rate we charge. Depending on the provisions of the capital requirements when they are released in final form and become effective, our mix of business may affect the minimum capital we are required to hold under the new framework.

The percentage of our NIW from all single-premium policies (LPMI and BPPI, combined) has ranged from approximately 10% in 2013 to 19% in 2017 and was 17% in 2018. Depending on the actual life of a single premium policy and its premium rate relative to that of a monthly premium policy, a single premium policy may generate more or less premium than a monthly premium policy over its life.

We have in place quota share reinsurance ("QSR") transactions with unaffiliated reinsurers that cover most of our insurance written from 2013 through 2018, and a portion of our insurance written prior to 2013. Although the transactions reduce our premiums, they have a lesser impact on our overall results, as losses ceded under the transactions reduce our losses incurred and the ceding commissions we receive reduce our underwriting expenses. The blended pre-tax cost of reinsurance under our different transactions is less than 6% (but will decrease if losses are materially higher than we expect). This blended pre-tax cost is derived by dividing the reduction in our pre-tax income on loans covered by reinsurance by our direct (that is, without reinsurance) premiums from such loans. Although the pre-tax cost of the reinsurance under each transaction is generally constant, the effect of the reinsurance on the various components of pre-tax income will vary from period to period, depending on the level of ceded losses. We expect that in the first quarter of 2019, we will enter into an agreement covering most of our new insurance written in 2019, on terms no less favorable than our existing transactions.

On October 30, 2018, MGIC entered into a reinsurance agreement that provides for up to \$318.6 million of aggregate excess-of-loss reinsurance coverage for a portion of the risk associated with certain mortgage insurance policies having an insurance coverage in force date on or after July 1, 2016 and before January 1, 2018. For the reinsurance coverage period, MGIC will retain the first layer of \$168.7 million of aggregate losses, and the reinsurer will provide second layer coverage up to the outstanding reinsurance coverage amount. The reinsurance premiums ceded under this reinsurance

agreement reduced our net premiums by \$2.8 million in the fourth quarter of 2018.

In addition to the effect of reinsurance on our premiums, we expect a decline in our premium yield resulting from the premium rates themselves. An increasing percentage of our insurance in force is from book years with lower premium rates because premium rates have trended lower in recent periods and are expected to continue to trend lower into 2019.

The circumstances in which we are entitled to rescind coverage have narrowed for insurance we have written in recent years. During the second quarter of 2012, we began writing a portion of our new insurance under an endorsement to our then existing master policy (the "Gold Cert Endorsement"), which limited our ability to rescind coverage compared to that master policy. To comply with requirements of the GSEs, we introduced our current master policy in 2014. Our rescission rights under our current master policy are comparable to those under our previous master policy, as modified by the Gold Cert Endorsement. As of December 31, 2018, approximately 82% of our flow, primary insurance in force was written under our Gold Cert Endorsement or our current master policy. The revised PMIERS, which become effective March 31, 2019, include rescission relief principles that were provided as guidance to be used when drafting our new master policy. The principles will, among other things, further limit the circumstances under which we may rescind coverage, potentially resulting in higher losses than would be the case under our existing master policies. We expect a new version of our master policy, incorporating these rescission relief principles, to be effective for business written beginning in the third or fourth quarter of 2019, subject to state statutory approvals.

From time to time, in response to market conditions, we change the types of loans that we insure and the requirements under which we insure them. We also change our underwriting guidelines, in part through aligning some of them with Fannie Mae and Freddie Mac for loans that receive and are processed in accordance with certain approval recommendations from a GSE automated underwriting system. We also make exceptions to our underwriting requirements on a loan-by-loan basis and for certain customer programs. As a result of changes to our underwriting guidelines and requirements (including those related to debt to income ("DTI") ratios, credit scores, and the manner in which income levels and property values are determined) and other factors, our business written beginning in the second half of 2013 is expected to have a somewhat higher claim incidence than business written in 2009 through the first half of 2013, but materially below that on business written in 2005-2008. However, we believe this business presents an acceptable level of risk. Our underwriting requirements are available on our website at <http://www.mgic.com/underwriting/index.html>.

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Even when home prices are stable or rising, mortgages with certain characteristics have higher probabilities of claims. These characteristics include higher LTV ratios, lower FICO scores, limited underwriting, including limited borrower documentation, or higher DTI ratios, as well as loans having combinations of higher risk factors. As of December 31, 2018, mortgages with these characteristics in our primary risk in force included mortgages with LTV ratios greater than 95% (14.8%), loans with borrowers having FICO scores below 620 (2.3%), mortgages with borrowers having FICO scores of 620-679 (10.3%), mortgages with limited underwriting, including limited borrower documentation (2.2%), and mortgages with borrowers having DTI ratios greater than 45% (or where no ratio is available) (14.3%), each attribute as determined at the time of loan origination. An individual loan may have more than one of these attributes.

Beginning in 2017, the percentage of NIW that we have written on mortgages with LTV ratios greater than 95% and mortgages with DTI ratios greater than 45% has increased. In 2018, we started considering DTI ratios when setting our premium rates, and we changed our methodology for calculating DTI ratios for pricing and eligibility purposes to exclude the impact of mortgage insurance premiums. As a result of this change, we expect to insure certain loans that would not have previously met our guidelines and to offer premium rates for certain loans lower than would have been offered under our previous methodology.

Until our loan level pricing system (discussed in our risk factor titled "Competition or changes in our relationships with our customers could reduce our revenues, reduce our premium yields and / or increase our losses") is more broadly adopted by customers, we will be unable to adjust our rates as quickly as those competitors using loan level pricing systems for the majority of their business. During that time, there is an increased risk that we are adversely selected by lenders to insure certain loans, which may result in an increase in the credit risk we bear and/or a decrease in the volume of loans we insure.

As of December 31, 2018, approximately 1% of our primary risk in force consisted of adjustable rate mortgages which allow for adjustment of the initial interest rate during the five years after the mortgage closing ("ARMs"). We classify as fixed rate loans adjustable rate mortgages with an initial interest rate that is fixed during the five years after the mortgage closing and loans with temporary interest rate adjustments during the initial five years, commonly referred to as "buydowns," that convert to a fixed rate for the duration of the loan term. If interest rates should rise between the time of origination of such loans and when their interest rates may be reset, claim rates on such loans may be substantially higher than for loans without variable interest rate features. In addition, prior to 2011,

we insured "interest-only" loans, which may also be ARMs, and loans with negative amortization features, such as pay option ARMs. We believe claim rates on these loans will be substantially higher than on loans without scheduled payment increases that are made to borrowers of comparable credit quality.

If state or federal regulations or statutes are changed in ways that ease mortgage lending standards and/or requirements, or if lenders seek ways to replace business in times of lower mortgage originations, it is possible that more mortgage loans could be originated with higher risk characteristics than are currently being originated, such as loans with lower FICO scores and higher DTIs. Lenders could pressure mortgage insurers to insure such loans, which are expected to experience higher claim rates. Although we attempt to incorporate these higher expected claim rates into our underwriting and pricing models, there can be no assurance that the premiums earned and the associated investment income will be adequate to compensate for actual losses even under our current underwriting requirements. We do, however, believe that our insurance written beginning in the second half of 2008 will generate underwriting profits.

The premiums we charge may not be adequate to compensate us for our liabilities for losses and as a result any inadequacy could materially affect our financial condition and results of operations.

We set premiums at the time a policy is issued based on our expectations regarding likely performance of the insured risks over the long term. Our premiums are subject to approval by state regulatory agencies, which can delay or limit our ability to increase our premiums. Generally, we cannot cancel mortgage insurance coverage or adjust renewal

premiums during the life of a mortgage insurance policy. As a result, higher than anticipated claims generally cannot be offset by premium increases on policies in force or mitigated by our non-renewal or cancellation of insurance coverage. The premiums we charge, the investment income we earn and the amount of reinsurance we carry may not be adequate to compensate us for the risks and costs associated with the insurance coverage provided to customers. An increase in the number or size of claims, compared to what we anticipate, could adversely affect our results of operations or financial condition. Our premium rates are also based in part on the amount of capital we are required to hold against the insured risk. If the amount of capital we are required to hold increases from the amount we were required to hold when a policy was written, we cannot adjust premiums to compensate for this and our returns may be lower than we assumed.

The losses we have incurred on our 2005-2008 books of business have exceeded our premiums from those books. The incurred losses from those books, although declining, continue to generate a material portion of our

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total incurred losses. The ultimate amount of these losses will depend in part on general economic conditions, including unemployment, and the direction of home prices.

We are susceptible to disruptions in the servicing of mortgage loans that we insure.

We depend on reliable, consistent third-party servicing of the loans that we insure. Over the last several years, the mortgage loan servicing industry has experienced consolidation and an increase in the number of specialty servicers servicing delinquent loans. The resulting change in the composition of servicers could lead to disruptions in the servicing of mortgage loans covered by our insurance policies. Further changes in the servicing industry resulting in the transfer of servicing could cause a disruption in the servicing of delinquent loans which could reduce servicers' ability to undertake mitigation efforts that could help limit our losses. Future housing market conditions could lead to additional increases in delinquencies and transfers of servicing.

Changes in interest rates, house prices or mortgage insurance cancellation requirements may change the length of time that our policies remain in force.

The premium from a single premium policy is collected upfront and generally earned over the estimated life of the policy. In contrast, premiums from a monthly premium policy are received and earned each month over the life of the policy. In each year, most of our premiums earned are from insurance that has been written in prior years. As a result, the length of time insurance remains in force, which is generally measured by persistency (the percentage of our insurance remaining in force from one year prior), is a significant determinant of our revenues. Future premiums on our monthly premium policies in force represent a material portion of our claims paying resources and a low persistency rate will reduce those future premiums. In contrast, a higher than expected persistency rate will decrease the profitability from single premium policies because they will remain in force longer than was estimated when the policies were written.

Our persistency rate was 81.7% at December 31, 2018, 80.1% at December 31, 2017 and 76.9% at December 31, 2016. Since 2000, our year-end persistency ranged from a high of 84.7% at December 31, 2009 to a low of 47.1% at December 31, 2003.

Our persistency rate is primarily affected by the level of current mortgage interest rates compared to the mortgage coupon rates on our insurance in force, which affects the vulnerability of the insurance in force to refinancing. Our persistency rate is also affected by the mortgage insurance cancellation policies of mortgage investors along with the current value of the homes underlying the mortgages in the insurance in force. In

2018, the GSEs announced changes to various mortgage insurance termination requirements that are intended to further simplify the process of evaluating borrower-initiated requests for mortgage insurance termination and may reduce our persistency rate in the future.

Our holding company debt obligations materially exceed our holding company cash and investments.

At December 31, 2018, we had approximately \$248 million in cash and investments at our holding company and our holding company's debt obligations were \$815 million in aggregate principal amount, consisting of \$425 million of 5.75% Senior Notes due in 2023 ("5.75% Notes") and \$390 million of 9% Debentures (of which approximately \$133 million was purchased, and is held, by MGIC, and is eliminated on the consolidated balance sheet). Annual debt service on the 5.75% Notes and 9% Debentures outstanding as of December 31, 2018, is approximately \$60 million (of which approximately \$12 million will be paid to MGIC and will be eliminated on the consolidated statement of operations).

The 5.75% Senior Notes and 9% Debentures are obligations of our holding company, MGIC Investment Corporation, and not of its subsidiaries. The payment of dividends from our insurance subsidiaries which, other than investment income and raising capital in the public markets, is the principal source of our holding company cash inflow, is restricted by insurance regulation. MGIC is the principal source of dividend-paying capacity. In 2018 and 2017, MGIC paid a total of \$220 million and \$140 million, respectively, in dividends to our holding company. We expect MGIC to continue to pay quarterly dividends of at least the \$60 million amount paid in the fourth quarter of 2018,

subject to approval by its Board of Directors. We ask the OCI not to object before MGIC pays dividends. On April 26, 2018, our Board of Directors authorized a share repurchase program under which we may repurchase up to \$200 million of our common stock through the end of 2019. During 2018, we repurchased approximately 16.0 million shares of our common stock using approximately \$175 million of holding company resources. Repurchases may be made from time to time on the open market or through privately negotiated transactions. The repurchase program may be suspended for periods or discontinued at any time. If any additional capital contributions to our subsidiaries were required, such contributions would decrease our holding company cash and investments. As described in our Current Report on Form 8-K filed on February 11, 2016, MGIC borrowed \$155 million from the Federal Home Loan Bank of Chicago. This is an obligation of MGIC and not of our holding company.

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Your ownership in our company may be diluted by additional capital that we raise or if the holders of our outstanding convertible debt convert that debt into shares of our common stock.

As noted above under our risk factor titled “We may not continue to meet the GSEs’ private mortgage insurer eligibility requirements and our returns may decrease as we are required to maintain more capital in order to maintain our eligibility,” although we are currently in compliance with the requirements of the PMIERS, there can be no assurance that we would not seek to issue non-dilutive debt capital or to raise additional equity capital to manage our capital position under the PMIERS or for other purposes. Any future issuance of equity securities may dilute your ownership interest in our company. In addition, the market price of our common stock could decline as a result of sales of a large number of shares or similar securities in the market or the perception that such sales could occur.

At December 31, 2018, we had outstanding \$390 million principal amount of 9% Convertible Junior Subordinated Debentures due in 2063 (“9% Debentures”) (of which approximately \$133 million was purchased, and is held, by MGIC, and is eliminated on the consolidated balance sheet). The principal amount of the 9% Debentures is currently convertible, at the holder’s option, at an initial conversion rate, which is subject to adjustment, of 74.0741 common shares per \$1,000 principal amount of debentures. This represents an initial conversion price of approximately \$13.50 per share. We may redeem the 9% Debentures in whole or in part from time to time, at our option, at a redemption price equal to 100% of the principal amount of the 9% Debentures being redeemed, plus any accrued and unpaid interest, if the closing sale price of our common stock exceeds \$17.55 for at least 20 of the 30 trading days preceding notice of the redemption.

We have the right, and may elect, to defer interest payable under the debentures in the future. If a holder elects to convert its debentures, the interest that has been deferred on the debentures being converted is also convertible into shares of our common stock. The conversion rate for such deferred interest is based on the average price that our shares traded at during a 5-day period immediately prior to the election to convert the associated debentures. We may elect to pay cash for some or all of the shares issuable upon a conversion of the debentures.

For a discussion of the dilutive effects of our convertible securities on our earnings per share, see Note 4 – “Earnings Per Share” to our consolidated financial statements in Item 8. As noted above, during 2018, we repurchased shares of our common stock and may do so in the future. In addition, we have in the past, and may in the future, purchase our debt securities.

We could be adversely affected if personal information on consumers that we maintain is improperly disclosed and our information technology systems may become outdated and we may not be able to make timely modifications to support our products and services.

As part of our business, we maintain large amounts of personal information on consumers. While we believe we have appropriate information security policies and systems to prevent unauthorized disclosure, there can be no assurance that unauthorized disclosure, either through the actions of third parties or employees, will not occur. Unauthorized disclosure could adversely affect our reputation, result in a loss of business and expose us to material claims for damages.

We rely on the efficient and uninterrupted operation of complex information technology systems. All information technology systems are potentially vulnerable to damage or interruption from a variety of sources, including through the actions of third parties. Due to our reliance on our information technology systems, their damage or interruption could severely disrupt our operations, which could have a material adverse effect on our business, business prospects and results of operations.

In addition, we are in the process of upgrading certain of our information systems that have been in place for a number of years and are implementing our loan level pricing system. The implementation of these technological improvements, as well as their integration with customer systems when applicable, is complex, expensive and time consuming. If we fail to timely and successfully implement and integrate the new technology systems, or if the systems do not operate as expected, it could have an adverse impact on our business, business prospects and results of

operations.

Our success depends, in part, on our ability to manage risks in our investment portfolio.

Our investment portfolio is an important source of revenue and is our primary source of claims paying resources.

Although our investment portfolio consists mostly of highly-rated fixed income investments, our investment portfolio is affected by general economic conditions and tax policy, which may adversely affect the markets for credit and interest-rate-sensitive securities, including the extent and timing of investor participation in these markets, the level and volatility of interest rates and credit spreads and, consequently, the value of our fixed income securities, and as such, we may not achieve our investment objectives. Volatility or lack of liquidity in the markets in which we hold securities has at times reduced the market value of some of our investments, and if this worsens substantially it could have a material adverse effect on our liquidity, financial condition and results of operations.

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For the significant portion of our investment portfolio that is held by MGIC, to receive full capital credit under insurance regulatory requirements and under the PMIERS, we generally are limited to investing in investment grade fixed income securities whose yields reflect their lower credit risk profile. Our investment income depends upon the size of the portfolio and its reinvestment at prevailing interest rates. A prolonged period of low investment yields would have an adverse impact on our investment income as would a decrease in the size of the portfolio.

In addition, we structure our investment portfolio to satisfy our expected liabilities, including claim payments in our mortgage insurance business. If we underestimate our liabilities or improperly structure our investments to meet these liabilities, we could have unexpected losses resulting from the forced liquidation of fixed income investments before their maturity, which could adversely affect our results of operations.

Our financial results may be adversely impacted by natural disasters; certain hurricanes may impact our incurred losses, the amount and timing of paid claims, our inventory of notices of default and our Minimum Required Assets under PMIERS.

Natural disasters, such as hurricanes, tornadoes, wildfires and floods, could trigger an economic downturn in the affected areas, which could result in a decline in our business and an increased claim rate on policies in those areas. Natural disasters could lead to a decrease in home prices in the affected areas, which could result in an increase in claim severity on policies in those areas. If we were to attempt to limit our new insurance written in disaster-prone areas, lenders may be unwilling to procure insurance from us anywhere.

Natural disasters could also lead to increased reinsurance rates or reduced availability of reinsurance. This may cause us to retain more risk than we otherwise would retain and could negatively affect our compliance with the financial requirements of the PMIERS.

We insure mortgages for homes in areas that have been impacted by recent natural disasters, including 2017 and 2018 hurricanes. We do not expect those hurricanes to result in a material increase in our incurred losses or paid claims. However, the following factors could cause our actual results to differ from our expectation in the forward looking statement in the preceding sentence:

- Home values in hurricane-affected areas may decrease at the time claims are filed from their current levels thereby adversely affecting our ability to mitigate loss.

- Hurricane-affected areas may experience deteriorating economic conditions resulting in more borrowers defaulting on their loans in the future (or

failing to cure existing defaults) than we currently expect.

If an insured contests our claim denial or curtailment, there can be no assurance we will prevail. We describe how claims under our policy are affected by damage to the borrower's home in our Current Report on Form 8-K filed with the SEC on September 14, 2017.

Due to the suspension of certain foreclosures by the GSEs from time-to-time, our receipt of claims associated with foreclosed mortgages in hurricane-affected areas may be delayed.

The PMIERS require us to maintain significantly more "Minimum Required Assets" for delinquent loans than for performing loans; however, the increase in Minimum Required Assets is not as great for certain delinquent loans in areas that the Federal Emergency Management Agency has declared major disaster areas. An increase in delinquency notices resulting from hurricanes may result in an increase in "Minimum Required Assets" and a decrease in the level of our excess "Available Assets" which is discussed in our risk factor titled "We may not continue to meet the GSEs' private mortgage insurer eligibility requirements and our returns may decrease as we are required to maintain more capital in order to maintain our eligibility."

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Item 1B. Unresolved Staff Comments

None.

Item 2. Properties

At December 31, 2018, we leased office space in various cities throughout the United States under leases expiring between 2019 and 2021 and which required monthly rental payments that in the aggregate are immaterial.

We own our headquarters facility and an additional office/warehouse facility, both located in Milwaukee, Wisconsin, which contain an aggregate of approximately 310,000 square feet of space.

Item 3. Legal Proceedings

Certain legal proceedings arising in the ordinary course of business may be filed or pending against us from time to time. For information about such legal proceedings, you should review our risk factor titled “We are involved in legal proceedings and are subject to the risk of additional legal proceedings in the future” in Item 1A.

Item 4. Mine Safety Disclosures

Not Applicable.

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Executive Officers of the Registrant

Certain information with respect to our executive officers as of February 22, 2019 is set forth below:

Executive officers of the registrant

Name and Age	Title
Patrick Sinks, 62	President and Chief Executive Officer of MGIC Investment Corporation and MGIC; Director of MGIC Investment Corporation and MGIC
Timothy J. Mattke, 43	Executive Vice President and Chief Financial Officer of MGIC Investment Corporation and MGIC
James J. Hughes, 56	Executive Vice President – Sales and Business Development of MGIC
Stephen C. Mackey, 58	Executive Vice President and Chief Risk Officer of MGIC Investment Corporation and MGIC
Paula C. Maggio, 50	Executive Vice President, General Counsel and Secretary of MGIC Investment Corporation and MGIC
Salvatore A. Miosi, 52	Executive Vice President – Business Strategy and Operations of MGIC
Gregory A. Chi, 59	Senior Vice President – Information Services and Chief Information Officer of MGIC, until retirement in March 2019
Robert J. Candelmo, 55	Vice President – Chief Technology Officer of MGIC until March 2019. Senior Vice President and Chief Information Officer of MGIC, effective upon Mr. Chi’s retirement in March 2019

Mr. Sinks has served as our Chief Executive Officer since March 2015 and has been our and MGIC’s President since January 2006. He was Executive Vice President – Field Operations of MGIC from January 2004 to January 2006 and was Senior Vice President – Field Operations of MGIC from July 2002 to January 2004. From March 1985 to July 2002, he held various positions within MGIC’s finance and accounting organization, the last of which was Senior Vice President, Controller and Chief Accounting Officer. Mr. Sinks has been a director of MGIC Investment Corporation and MGIC since July 2014.

Mr. Mattke has been the Company’s Chief Financial Officer since March 2014. He served as the Company’s Controller from 2009 through March 2014. He joined the Company in 2006. Prior to his becoming Controller, he was Assistant Controller of MGIC beginning in August 2007 and prior to that was a manager in MGIC’s accounting department. Before joining MGIC, Mr. Mattke was an audit manager and an auditor with PricewaterhouseCoopers LLP, the Company’s independent registered accounting firm.

Mr. Hughes has served as Executive Vice President – Sales and Business Development of MGIC since January 2017. He served as Senior Vice President –

Sales and Business Development of MGIC from 2015 to January 2017, and Vice President, Managing Director in the sales area from 2001 to 2015. He joined MGIC in 1987 and prior to becoming Vice President, Managing Director, he had been an Account Manager and a Sales Manager.

Mr. Mackey joined MGIC in June 2015 and has served as Executive Vice President and Chief Risk Officer since September 2015. Before joining MGIC, Mr. Mackey was with JP Morgan Chase & Company from March 2011 until June 2015, where he held a number of senior leadership positions, including Managing Director, Firmwide Market Risk, Senior Vice President and Risk Management Executive in Mortgage Banking and Senior Vice President and

Controller in Mortgage Banking. He has a diverse professional background prior to JP Morgan that includes 13 years with Fannie Mae where he had been a Vice President.

Ms. Maggio joined the Company in July 2018 and has served as Executive Vice President, General Counsel and Secretary since July 2018. Prior to joining the Company, Ms. Maggio had been Executive Vice President, General Counsel and Secretary of Retail Properties of America, Inc. from 2016 to 2018, Executive Vice President, General Counsel and Secretary of Strategic Hotels & Resorts, Inc. (SHR) from 2012 to 2015, and in various other leadership roles with SHR since joining that firm in 2000. Prior to joining SHR, Ms. Maggio had been in private legal practice from 1994-2000.

Mr. Miosi has served as Executive Vice President – Business Strategy and Operations since January 2017. He served as Senior Vice President – Business Strategy and Operations of MGIC from 2015 to January 2017, and Vice President - Marketing from 2004 to 2015. Mr. Miosi joined the company in 1988 and has also held a variety of leadership positions in the operations, technology and marketing divisions.

Mr. Chi joined MGIC in February 2012, has served as MGIC's Senior Vice President – Information Services and Chief Information Officer since March 2012 and will retire in March 2019. Prior to joining MGIC, Mr. Chi had been Senior Vice President of Enterprise Delivery Services with SunTrust Bank since 2008. Prior to joining SunTrust, Mr. Chi held various senior management positions in the financial services industry.

Mr. Candelmo joined MGIC in October 2014 as its Vice President – Chief Technology Officer and will become its Senior Vice President and Chief Information Officer in March 2019, upon the retirement of Mr. Chi. Prior to joining MGIC, Mr. Candelmo had been Senior Vice President of Enterprise Information Services with SunTrust Bank since 2008. Prior to joining SunTrust, Mr. Candelmo had held various other leadership roles within the information technology discipline.

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PART II

Item 5. Market for Registrant’s Common Equity, Related Stockholder Matters and Issuer Purchases of Equity Securities

(a) Our Common Stock is listed on the New York Stock Exchange under the symbol “MTG.”

As of February 15, 2019, the number of shareholders of record was 294. In addition, we estimate there are approximately 46,000 beneficial owners of shares held by brokers and fiduciaries.

Information regarding equity compensation plans is contained in [Item 12](#).

(b) Not applicable.

(c) Issuer Purchases of Equity Securities

The following table provides information about purchases of MGIC Investment Corporation common stock by us during the three months ended December 31, 2018.

Share repurchases

Period Beginning	Period Ending	Total number of shares purchased	Average price paid per share	Total number of shares purchased as part of publicly announced plans or programs	Approximate dollar value of shares that may yet be purchased under the program ⁽¹⁾
October 1, 2018	October 31, 2018	565,061	\$ 11.67	565,061	\$93,345,524
November 1, 2018	November 30, 2018	3,739,659	\$ 11.61	3,739,659	\$49,940,971
December 1, 2018	December 31, 2018	2,478,919	\$ 10.09	2,478,919	\$24,940,973
		6,783,639	\$ 11.06	6,783,639	

(1) On April 26, 2018, our Board of Directors authorized a share repurchase program under which we may repurchase up to \$200 million of common stock through the end of 2019. Repurchases may be made from time to time on the open market or through privately negotiated transactions. The repurchase program may be suspended for periods or discontinued at any time.

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Item 6. Selected Financial Data

Summary of operations

(In thousands, except per share data)	As of and for the Years Ended December 31,				
	2018	2017	2016	2015	2014
Revenues:					
Net premiums written	\$992,262	\$997,955	\$975,091	\$1,020,277	\$881,962
Net premiums earned	975,162	934,747	925,226	896,222	844,371
Investment income, net	141,331	120,871	110,666	103,741	87,647
Realized investment (losses) gains, net including net impairment losses	(1,353) 231	8,921	28,361	1,357
Other revenue	8,708	10,205	17,670	12,964	9,259
Total revenues	1,123,848	1,066,054	1,062,483	1,041,288	942,634
Losses and expenses:					
Losses incurred, net	36,562	53,709	240,157	343,547	496,077
Change in premium deficiency reserve	—	—	—	(23,751) (24,710
Underwriting and other expenses	190,143	170,749	160,409	164,366	146,059
Interest expense	52,993	57,035	56,672	68,932	69,648
Loss on debt extinguishment	—	65	90,531	507	837
Total losses and expenses	279,698	281,558	547,769	553,601	687,911
Income before tax	844,150	784,496	514,714	487,687	254,723
Provision for (benefit from) income taxes ⁽¹⁾	174,053	428,735	172,197	(684,313) 2,774
Net income	\$670,097	\$355,761	\$342,517	\$1,172,000	\$251,949
Weighted average common shares outstanding	386,078	394,766	431,992	468,039	413,547
Diluted income per share	\$1.78	\$0.95	\$0.86	\$2.60	\$0.64
Balance sheet data					
Total investments	\$5,159,019	\$4,990,561	\$4,692,350	\$4,663,206	\$4,612,669
Cash and cash equivalents	151,892	99,851	155,410	181,120	197,882
Total assets	5,677,802	5,619,499	5,734,529	5,868,343	5,251,414
Loss reserves	674,019	985,635	1,438,813	1,893,402	2,396,807
Premium deficiency reserve	—	—	—	—	23,751
Short- and long-term debt	574,713	573,560	572,406	—	61,883
Convertible senior notes	—	—	349,461	822,301	830,015
Convertible junior subordinated debentures	256,872	256,872	256,872	389,522	389,522
Shareholders' equity	3,581,891	3,154,526	2,548,842		