

**Meeting Between Federal Reserve Board Staff
and Fair Isaac Corporation (FICO)
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(Federal Reserve Board)

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Summary: Representatives of FICO met with Federal Reserve Board staff to discuss issues related to the implementation of section 941 of the Dodd-Frank Act. Specifically, representatives of FICO raised concerns regarding the proposed definition of “qualified residential mortgage” (“QRM”) and expressed the view that standards relating to the definition must be predictive and rely on credit scores. As part of this discussion, FICO presented its views regarding the credit history standards proposed in the 941 rulemaking and data regarding the use of FICO scores in creating a QRM standard. In addition, representatives of FICO made a presentation to Federal Reserve Board staff that proposed incorporating empirically derived credit scoring models into the definition of QRM. The contents of the presentation are attached to this summary.

FICOTM



Analysis of Proposed QRM Risk Criteria and Solution

The Dodd-Frank Wall Street Reform and Consumer Protection Act include regulations designed to encourage responsible lending and protect credit markets from unreasonable risk. One important mechanism for providing such protection is a rule that requires lenders to retain 5% of the credit risk on residential mortgages they underwrite.

A proposed exception to this rule would enable lenders to securitize and sell 100% of mortgages that meet a yet-to-be-finalized Qualified Residential Mortgage (QRM) standard. This standard is meant to ensure that qualifying mortgages are of extremely high quality and low risk.

Determining which loans earn QRM status

- To help gauge the riskiness of a mortgage, the proposed QRM standard includes several criteria related to the credit history of a borrower.
- Unfortunately, insufficient research was conducted by regulators to determine the predictive value of the criteria that were included in the proposed QRM credit history standard.
- The proposed standard does not use credit scores, which are the most accurate measures of credit risk and are used to underwrite nearly every mortgage in the U.S.

Instead of empirically derived credit scores, the proposed judgmental criteria include a number of items from a borrower's credit history, including 30-day payment delinquencies, short sales, and other derogatory factors. These factors make up less than one-third of the predictive information assessed by the FICO® Score. And unlike credit scores, this judgmental approach does not allow for compensating factors or the careful weighting of data points.

The danger of using arbitrary and unproven criteria to assess risk

FICO analyzed over 10 million consumer credit files* for mortgage loans originated from 2005-2008 to understand how the proposed QRM risk criteria would have performed. The results of this study indicate that the current QRM proposal would bring more risk into mortgage securitization than regulators and legislators intended, while preventing highly qualified buyers from entering the housing market.

- Buyers with FICO scores up to 827 (on a scale of 300-850) could be denied QRM loans. The scientifically validated creditworthiness of these people is in the top 5% of U.S. borrowers.
- Buyers with FICO scores as low as 493 could qualify for QRM loans. The creditworthiness of these buyers is only in the lowest 6% of U.S. borrowers.

Working toward a specific goal

A logical way to determine the QRM standard is to define the desired outcome, and then establish rules to achieve that outcome. Such an approach would be vendor-neutral and not rely on credit scores from any specific vendor to ensure lender compliance.

- As one approach, regulators could set a specific targeted national default rate for loans that qualify under QRM.
- Alternatively, regulators could set a specific targeted percentage of the national population of residential mortgage loans which would qualify under QRM.

Provided with such a target, lenders could use credit scores to quickly determine which mortgages should be given QRM status. It is impossible to achieve this level of precision and control with a judgmental approach that relies on isolated data points such as a 30-day delinquency on a credit report.

A simple, inexpensive and highly accurate solution

Lenders already generate credit scores for every person who applies for a mortgage. Based on those credit scores, lenders know the probability that a borrower will default. And while these probabilities may shift over time, lenders routinely review the correlation between default rates and credit scores in their mortgage portfolios so they can adjust their minimum score requirements for new loans and thereby maintain desired risk levels. In this way lenders could comply consistently and routinely with a national risk standard established for QRM.

FICO's analysis of mortgages originated from 2005-2008 found that:

- The default rate on such mortgages could have been limited to 2% if lenders had required a minimum FICO score of 650.
- Alternatively, setting a 25% volume standard for such mortgages would correspond to a minimum FICO score of 650 for successful applicants.
- When only the derogatory factors of the proposed QRM credit risk standard are used to judge risk, the resulting default rate is closer to an equivalent FICO® Score of 620 than to the FICO® Score of 690 seemingly targeted by regulators.

The importance of smart public policy

A QRM standard pegged to a default rate of 2.4% (which corresponds to a FICO Score of 620) would have resulted in the same general default rate as the proposed QRM risk criteria, but with the added benefit of allowing approximately 830,000 more mortgages to qualify for QRM status.

It also would prevent significant losses. Industry experts have estimated that each mortgage default costs an average of \$50,000. Based on that estimate, the elimination of just 20,000 defaults would save \$1 billion in losses. A QRM standard based on a default rate of 2% (which corresponds to a FICO Score of 650) would have prevented 48 thousand more defaults than the proposed QRM risk criteria when applied to mortgages originated between 2005-2008. That translates into a loss prevention of \$2.4 billion.

This analysis showed that by allowing lenders to use credit scores to satisfy the risk assessment of any proposed QRM standard, regulators can:

- Confidently control the volume of QRM loans that default;
- Significantly increase the number of mortgages that qualify for QRM status.

FICO examined data from real mortgages to assess the effectiveness of possible QRM standards. The results are clear and unambiguous. The most reliable, convenient and objective way to set a risk threshold for the QRM standard is either through the use of default rates tied to credit scores, or by setting a percentage of the national population of residential mortgage loans which would qualify under QRM based on credit scores. Such regulation can be vendor-neutral because different commercial credit scoring models could be used to comply with such a standard, just as businesses comply today with Reg B of the Equal Credit Opportunity Act.

*CoreLogic provided loan characteristics and performance data for this study. The CoreLogic LoanPerformance databases contain information on more than 85% of all outstanding mortgage loans. The study dataset was constructed by identifying the loans within CoreLogic's databases that had sufficient information to calculate default rates based on the proposed QRM standard.

**THE IMPORTANCE OF PREDICTIVE ANALYTICS vs. MANUAL REVIEW
IN CREDIT HISTORY STANDARDS**

THE PROPOSED CREDIT RISK RETENTION RULE WILL NOT IMPROVE THE HOUSING MARKET

QRM CREDIT HISTORY STANDARDS NEED TO BE PREDICTIVE AND RELY ON CREDIT SCORES

OVERVIEW:

Starting in the late 1950s, Fair Isaac sparked a revolution by pioneering credit risk scoring for the financial services industry. This new approach to lending enabled financial institutions to improve their business performance and expand consumers' access to credit. While the FICO score provides the most reliable and objective evaluation for a borrower's repayment risk, it is only one risk factor among many that lenders consider when making decisions about consumer credit – the three C's – 1) credit score, 2) capacity and 3) collateral. FICO believes that, in order to get our economy back on track and ensure a properly functioning securitization market, there must be transparent, reliable and objective criteria by which credit risk is determined. Sound underwriting standards must include analytically derived, statistically sound credit scores that provide predictive and objective measurements of credit risk across all market cycles.

THE ISSUE:

The proposed credit risk retention rule, recently issued in accordance with Section 941 of the Dodd-Frank Act, contains an exemption from risk retention requirements for those loans that meet the standards of a "Qualified Residential Mortgage" (QRM). However, the proposed QRM credit history standards, if adopted as proposed, would undermine Congress' legislative intent to create a pool of high quality loans that merit exclusion from risk retention requirements. The credit history requirements fail to include the accepted industry standard use of predictive analytics in the form of credit scores in favor of a manual review of derogatory factors in the borrower's credit file that research has shown is not sufficiently predictive of credit risk and that will have significant negative unintended consequences.

As outlined in the Federal Reserve Board's 2007 Report to Congress on "*Credit Scoring and Its Effects on the Availability and Affordability of Credit*," credit scoring not only is accurate and promotes a more efficient marketplace but it also provides valuable benefits to consumers:

"Credit scoring...increases the consistency and objectivity of credit evaluation and thus may diminish the possibility that credit decisions will be influenced by personal characteristics or other factors prohibited by law, including race or ethnicity. In addition, quicker decision-making also promotes increased competition because, by receiving information on a timelier basis, consumers can more easily shop for credit. Finally, credit scoring is accurate; that is, individuals with lower (worse) credit scores are more likely to default on their loans than individuals with higher (better) scores. [p. O-5]"

WHY THE PROPOSED QRM CREDIT HISTORY STANDARDS WILL NOT WORK

1. ***The proposed credit history standards are not sufficiently predictive.*** FICO has conducted research examining:
 - a. the proposed QRM derogatory factors (no 60+ day delinquency within past 24 months, no current 30+ day delinquency and no bankruptcies, foreclosures, deed-in-lieu of foreclosures or judgments of any unpaid debt) as well as
 - b. the proposed QRM derogatory factors (same as above) coupled with the proposed non-credit QRM criteria.

FICO reviewed the performance of mortgage origination data between the years of 2005 and 2008 and compared the QRM criteria to analytically derived credit scores. The research revealed that the minimum FICO score that met the proposed QRM delinquency standards was as low as 472 and the maximum FICO score that failed to meet the proposed QRM delinquency standards was as high 845 – a distorted outcome allowing consumers with low FICO scores in and leaving consumers with high FICO scores out. In addition, when studying both the proposed derogatory factors in combination with the other non-credit QRM criteria, FICO saw the same distorted outcomes with borrowers qualifying for QRM with FICO scores as low as 493 while those with scores up to 827 being denied a QRM loan. To place this in perspective, the FICO score range is 300 to 850, with lower scores indicating higher risk. The median FICO score of the US consumer today is 713 and the minimum FICO score threshold for an FHA loan is 580. This demonstrates that the proposed approach of using derogatory credit history standards for QRM loans could lead to the inclusion of many high-risk borrowers as well as the exclusion of excellent credit risks – precisely the wrong result on both counts.

2. ***“Empirically Derived, Demonstrably and Statistically Sound” vs. Subjective Decision-Making.*** Regulation B (implementing the provisions of the Equal Credit Opportunity Act) details lenders’ use of approved credit scoring models that are “empirically derived, demonstrably and statistically sound.” The proposed rules fall far short of this standard. Under the proposed rules, there would be a shift away from credit scores, which threatens a return to the days marked by subjective decision-making. The mortgage industry’s adoption of credit scores not only served as an advanced method of predicting credit risk but removed the subjectivity and bias that too often was associated with the lending process. Compliance with Regulation B standards is evidence of an objective assessment of a borrower’s credit risk. The mortgage industry has complied with Regulation B through the widespread adoption of FICO® scores which are also the credit risk underwriting standard for FHA-insured loans as well as loans sold to Fannie Mae and Freddie Mac. The proposed QRM credit history standards will bring an element of subjectivity back into the process, once again creating an environment that in the past has fostered discrimination.
3. ***QRM credit history standards will face implementation challenges.*** The credit history standards include a requirement that lenders ensure that a borrower has not had a short sale or repossession in the past three years. However, today the credit report does not provide dates for these actions. In

addition, allowing credit reports to be verified as far out as 90 days from the closing date exposes investors unnecessarily to increased credit risk exposure compared to current requirements where credit scores are pulled just days prior to the funding date of the loan to assure the highest degree of accuracy in assessing consumer credit risk

4. *A manual review of credit files raises costs, delays, errors and transparency concerns.*

The proposed method of examining the credit file for derogatory factors represents a shift away from automated underwriting to a manual approach that will impose increased expense on lenders, slower loan processing times, less accuracy and decreased transparency in the securitization market where credit scores today are shared seamlessly between originators, issuers and investors for decision making.

5. *A “check the box” solution may have unintended consequences for small and medium lenders.*

Requiring a new and ineffective set of QRM credit history standards will not only impose additional compliance costs on lenders but also likely force many small and medium banks to choose the “check the box” requirement over the continued use of predictive analytics – exposing the lender and the potential investor to greater credit risk exposure.

CONCLUSION:

Credit scores are not only the market standard among lenders for assessing consumer credit risk but their use is supported by a large body of research that concludes that they are the most accurate predictors of default. Reliance on predictive analytics is already the accepted practice in the marketplace and has helped transform an industry that relied on manual underwriting decades ago to an automated system today that is marked by efficiency, objectivity and accuracy. As a result, credit scores should be part of the credit history standards in the final rule and can be implemented in a vendor-neutral manner leveraging existing federal regulatory oversight.

FICO® Score Trends Service
Validation Chart



BEACON® 5.0

Observation Date: April 2010
Performance Date: April 2012 (24 Months Performance)

BASE CATEGORY: Real Estate Loans
NEGATIVE PERFORMANCE: 90+/Any Derog
APPLICATION: Acquisitions
REGION: National

Score Range	EVALUATING PERFORMANCE BY REPORT						EVALUATING PERFORMANCE BY TRADE LINE					
	BASE CATEGORY		NEGATIVE CATEGORY		% NEGATIVE TO BASE (REPORTS)	REPORT ODDS (VALUE to 1)	BASE CATEGORY		NEGATIVE PERFORMANCE		% NEGATIVE TO BASE (TRADES)	TRADE ODDS (VALUE to 1)
	# OF CONSUMER REPORTS	CUMULATIVE %	# OF CONSUMER REPORTS	CUMULATIVE %			# OF TRADES	CUMULATIVE %	# OF TRADES	CUMULATIVE %		
300-499	397	0.3	112	4.4	28.2	2.5	425	0.3	116	4.4	27.3	2.7
500-519	278	0.5	60	6.7	21.6	3.6	284	0.5	61	6.7	21.5	3.7
520-539	383	0.8	71	9.5	18.5	4.4	415	0.8	75	9.5	18.1	4.5
540-559	498	1.2	78	12.5	15.7	5.4	537	1.1	82	12.6	15.3	5.5
560-579	788	1.7	93	16.2	11.8	7.5	852	1.7	100	16.4	11.7	7.5
580-599	1,346	2.7	130	21.3	9.7	9.4	1,479	2.7	135	21.5	9.1	10.0
600-619	2,377	4.5	211	29.5	8.9	10.3	2,603	4.5	218	29.7	8.4	10.9
620-639	4,042	7.5	322	42.1	8.0	11.6	4,445	7.6	338	42.5	7.6	12.2
640-659	5,747	11.7	291	53.5	5.1	18.7	6,307	11.9	303	53.9	4.8	19.8
660-679	7,293	17.1	266	63.9	3.6	26.4	7,978	17.3	270	64.1	3.4	28.5
680-699	8,833	23.7	229	72.8	2.6	37.6	9,585	23.9	236	73.0	2.5	39.6
700-719	9,892	31.0	187	80.1	1.9	51.9	10,750	31.2	194	80.4	1.8	54.4
720-739	10,692	38.9	151	86.0	1.4	69.8	11,589	39.2	153	86.1	1.3	74.7
740-759	13,169	48.7	128	91.0	1.0	101.9	14,230	48.9	135	91.2	0.9	104.4
760-779	18,226	62.2	93	94.7	0.5	195.0	19,713	62.4	95	94.8	0.5	206.5
780-799	27,373	82.4	88	98.1	0.3	310.1	29,525	82.6	89	98.2	0.3	330.7
800-850	23,747	100.0	48	100.0	0.2	493.7	25,441	100.0	48	100.0	0.2	529.0
Total	135,081	100.0	2,558	100.0	1.9	51.8	146,158	100.0	2,648	100.0	1.8	54.2

This chart represents the performance of real estate loans opened within 3 months following the observation date.

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QRM CREDIT PROFILES



While the QRM proposed rule's derogatory factors may be indicators of risky credit behavior, these factors represent only approximately 35% of the analytical inputs used by FICO in its credit risk models. Other factors not considered by the QRM credit history standards include amounts owed, length of credit history, new credit, types of credit, utilization of current credit, and recent credit-seeking activity. As a result, reliance on derogatory factors alone results in an inaccurate measurement of credit risk.

Relocated Father with Lost Bank Bill

I am a middle-aged married father of three. My job requires me to travel four times a month. I've had credit since I was in college 27 years ago. My company is moving my job to an adjacent state to cut down on travel expenses. I'm selling our home and have moved into an apartment in our new city. I'm hoping to buy a house here soon. I have no history of collections and no adverse public records. My wife and I are careful with money. I have successfully repaid two car loans, have two bank credit cards and a retail card, and keep my card balances low. I am currently reported as 30 days past due on my retail card because the card issuer didn't send my last bill to our new address, and the post office didn't forward it. My FICO score is around 700, but I am not eligible for a QRM. Now, we'll have to pay a significantly higher interest rate on our new home.

Elderly Woman with Health Problems

I am a 62 year old woman with no history of collections; no adverse public records; never missed a payment on a mortgage account; demonstrated history of successfully paying a variety of different types of credit obligations (revolving, auto, mortgage, etc.); low revolving balances; very low revolving utilization ratio; long credit history (25+ years); and few recently opened accounts. Recently I had an unexpected health problem that caused me to be 60 days delinquent 23 months ago, which I paid off in full a few days thereafter. I could have a FICO score above 800, but would not be eligible for a QRM.

Unmarried Man with Bad Credit History

I am a 35-year-old unmarried man. I haven't held a steady job in 10 years and stay afloat through get-rich schemes and borrowing from friends. I've had three foreclosures between 3 and 3 1/2 years ago, the result of a failed pyramid scheme and an investment property that I abandoned. I also have five separate collection accounts. A little over two years ago my finances forced me to stop paying the balances on four credit cards for six months, resulting in 180-day past-due delinquencies before I was able to resume making the minimum payments. All four cards are currently maxed out. Because I am tapped out, in the past two months I have applied for three new credit cards. I could have a FICO score around 550, but would be eligible for a QRM.

Credit-Worthy College Professor

I'm a woman in my late 30s, am unmarried and a college professor. I have no history of collections and no adverse public records. I've paid off both my student and auto loan. The car I bought new and still has over 230,000 miles because I am meticulous about routine maintenance. I have carefully managed a bank credit card for 17 years and have a retail store card. A year and a half ago she bought an electric mixer with her retail store card. When its motor immediately burnt out, I tried to return it to the store. Both the store and the manufacturer refused to accept the return, so I refused to pay my retail card bill for the purchase for two months. I finally gave up my fight and immediately paid the past-due amount. I have not been late with a payment since. I could have a FICO score around 700, but I would not be eligible for a QRM.

Recent College Grad Careless with Credit

I am a 23-year-old recent college graduate. I was very recently, but not currently, 30 days past due on several accounts. I have no 60+ day delinquencies in the past 2 years, but had 90-180 days past due delinquencies just over 2 years ago. I also have numerous 3rd party collections accounts, have maxed out on several revolving accounts, a relatively short credit history (~ 10 years), and a large number of recent new accounts and applications for credit. I could have a FICO score below 500, but I would be eligible for a QRM.

QRM Study Parameters

FICO

- » Examined pool of new mortgages opened between 2005-2008
- » Merged loan-level information with Credit Bureau files to more fully explore the outcomes of the proposed QRM definition
- » QRM "non-credit" criteria applied to dataset
 - » Back-end DTI <= 36%
 - » Origination Loan-to-Value
 - » Purchase <= 80%
 - » Refinance <= 75%
 - » Cash out Refinance <= 70%
 - » Owner occupied
 - » First lien
- » After applying QRM "non-credit" criteria, ~29% new mortgages originated between 2005-2008 remained
- » All subsequent credit analyses are based on the new mortgages which satisfied the QRM "non-credit" criteria
- » Files with new mortgage that satisfy all aspects of QRM criteria ~25%

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FICO Score Stats – a wide range of credit both qualifies and fails under the proposed rules

FICO

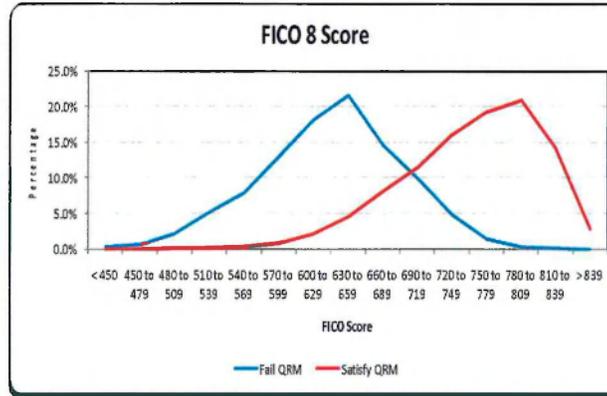
Score Version	Files that Fail QRM "Credit" Criteria							
	Min	Max	Mean	Median	Percentiles			
					1 st	5 th	95 th	99 th
FICO 8	438	827	630	634	481	523	727	760
FICO 8 Mortgage	332	850	624	630	409	475	749	791
Prior FICO	396	782	619	625	470	509	710	738

Score Version	Files that Satisfy QRM "Credit" Criteria							
	Min	Max	Mean	Median	Percentiles			
					1 st	5 th	95 th	99 th
FICO 8	493	850	752	761	598	644	833	848
FICO 8 Mortgage	407	850	752	761	561	616	850	850
Prior FICO	492	818	746	760	599	642	809	816

The proposed QRM rules will result in consumers with good credit not qualifying for the QRM exemption while those with poorer credit qualifying, potentially resulting in disparate pricing and terms.

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Proposed QRM Score Distribution



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QRM Criteria and Comparable FICO Score Cut-off (bad rate held fixed)



90+ Bad Rate on New Mortgage Accounts

QRM/Score	Score Cut-off	Above Cut-off	Below Cut-off
QRM Criteria	-	2.4%	9.5%
FICO 8	620	2.4%	15.2%
FICO 8 Mortgage	580	2.4%	20.1%
Prior FICO	620	2.4%	14.0%

Overall 90+ Bad Rate on New Mortgage Accounts – 3.4%

Resulting Volumes by FICO Scores

QRM/Score	Score Cut-off	Above Cut-off	Below Cut-off
QRM Criteria	-	86%	14%
FICO 8	620	92%	8%
FICO 8 Mortgage	580	95%	5%
Prior FICO	620	91%	9%

Data Summary: The proposed QRM standards would result in an overall 2.4% 90+ dpd rate for the QRM qualified population. The corresponding FICO 8 score that would result in the same 90+ dpd rate is a 620.

Applying FICO® 8 score of 620 instead of the QRM criteria on the ~47.8 million new mortgages booked between 2005-2008 would have resulted in ~832,000 more QRM qualified consumers while still holding the bad rate of the QRM qualified population fixed at 2.4%.

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QRM Criteria and Comparable FICO Score Cut-off (volume held fixed)



Corresponding FICO Score Cut-off Analysis

QRM/Score	Score Cut-off	Above Cut-off	Below Cut-off
QRM Criteria	-	86%	14%
FICO 8	650	86%	14%
FICO 8 Mortgage	635	86%	14%
Prior FICO	645	86%	14%

90+ Bad Rate on New Mortgage Accounts

QRM/Score	Score Cut-off	Above Cut-off	Below Cut-off
QRM Criteria	-	2.4%	9.5%
FICO 8	650	2.0%	11.8%
FICO 8 Mortgage	635	1.7%	13.4%
Prior FICO	645	2.0%	12.0%

Overall 90+ Bad Rate on New Mortgage Accounts – 3.4%

Data Summary: The proposed QRM credit criteria allowed for 86% of the new mortgage population to qualify for the QRM exemption. The corresponding FICO® Score that would allow for the same percentage of population to qualify for QRM is a 650. The resulting 90+ dpd rate for the QRM credit criteria is 2.4% vs 2.0% for the FICO® 8 650 Score.

Applying a Score rather than the QRM criteria on the ~47.8 million new mortgages booked between 2005-2008 would have resulted in ~48,000 fewer 90+ dpd accounts qualified for the QRM exemption. Assuming ~\$50k loss per bad mortgage, use of a Score would correspond to a reduction in losses of ~\$2.4 billion within the QRM qualified loans.

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In the matter of: Credit Risk Retention Proposed Rule

Federal Register / Vol. 76, No. 83 / Friday, April 29, 2011 / Proposed Rules

DEPARTMENT OF THE TREASURY
Office of the Comptroller of the Currency
12 CFR Part 43
[Docket No. OCC-2011-0002]
RIN 1557-AD40

FEDERAL RESERVE SYSTEM
12 CFR Part 244
[Docket No. 2011-1411]
RIN 7100-AD-70

FEDERAL DEPOSIT INSURANCE CORPORATION
12 CFR Part 373
RIN 3064-AD74

FEDERAL HOUSING FINANCE AGENCY
12 CFR Part 1234
RIN 2590-AA43

SECURITIES AND EXCHANGE COMMISSION
17 CFR Part 246
[Release No. 34-64148; File No. S7-14-11]
RIN 3235-AK96

DEPARTMENT OF HOUSING AND URBAN DEVELOPMENT
24 CFR Part 267
RIN 2501-AD53

Proposal: Require the use of credit scoring models in the QRM Definition in place of the proposed “derogatory factors” to assess credit risk

On April 29, 2011, the OCC, Board, FDIC, Commission, FHFA, and HUD (the “Agencies”) proposed rules to implement the credit risk retention requirements of section 15G of the Securities Exchange Act of 1934, as added by section 941 of the Dodd-Frank Wall Street Reform and Consumer Protection Act (the “Proposed Rule”). In response to the Agencies’ request for comments on the Proposed Rule, Fair Isaac Corporation (FICO) respectfully submitted comments, which presented comprehensive research that demonstrated the Agencies’ “derogatory factors”, included in the definition of qualified residential mortgage (QRM), are not sufficiently predictive to accurately assess a mortgage borrower’s credit risk for purposes of qualifying for the QRM exemption. The research revealed that the derogatory factors are not an adequate substitute for the use of a credit risk score, which is the method used currently by all mortgage lenders to assess credit risk in the mortgage underwriting process.

In its comment letter, FICO proposed a different approach: mandate the use of credit scoring models on a vendor-neutral basis, within the existing regulatory structure. We recommended that regulators require the use of credit risk models to make the critical credit risk analysis of mortgage applicants, subject to certain constraints. In response to our comment letter, FICO was asked by several of the Agencies to suggest practical ways to implement this approach.

Below are four potential credit history rule solutions, each with its own advantages. Any one of the four solutions would be considerably more predictive than the “derogatory factors” approach in the Proposed Rule, and would therefore be fairer to consumers and lenders alike. By assuring that the QRM exemption applies only to those mortgage originations that present the least credit risk, each of these solutions helps achieve Congress’s goal of protecting the securitization market and its investors.

Guiding Principles

The proposed solutions are guided by five principles:

- » *Reliable analytics* – the model must accurately rank order credit risk;
- » *Vendor neutral* – the solution cannot prefer one credit scoring model builder;
- » *Regulatory oversight* – regulators should have the power to assure compliance, but they should not need to frequently calibrate the compliance process;
- » *Simple way to comply* – creditors should be able to comply with minimal burden; and
- » *Minimize market disruption* – the credit model approach works today.

Each proposed solution requires the use of a credit risk model that is “empirically derived, demonstrably and statistically sound” (“EDDSS”), as that phrase is defined in Regulation B, which implements the Equal Credit Opportunity Act. This approach assures quality, consistency, and objective standards by which to judge the effectiveness of the model. EDDSS requirements are well-established, so there would be no need to invent a new test or determine how the regulatory oversight would work. EDDSS requires model validation at inception and “within a reasonable period of time” thereafter.

Such credit scoring models could be subject to standards similar to the Supervisory Guidance on Model Risk Management, OCC 2011-12 and SR Letter 11-7 (“Guidance”), published by Federal Reserve Board and the Office of the Comptroller of the Currency on April 4, 2011. The Agencies could incorporate the Guidance by reference into its rule, or propose a variation of it. The Guidance explains the role of risk models and sets compliance standards; prescribes the need for banks that rely on quantitative analysis and models to demonstrate expertise in model development, implementation, use, and validation; and requires banks to establish a process of governance, policies, and controls over its own models, and those it uses from third party vendors and contractors. The Guidance, which is a compilation and update of past statements by the OCC on model risk management, would not impose new burdens on banks or require a new regulatory structure by the bank regulators and the Consumer Financial Protection Bureau (CFPB) to administer and audit for compliance.

Two Distinct Approaches

The Proposed Rule should use credit scoring models to more accurately determine which mortgage loans qualify for the QRM exemption from the 5% skin-in-the-game retention requirements. First, however, the Agencies must determine: (1) whether the QRM exemption should apply to all mortgage borrowers whose credit risk profile represents a predetermined **level of credit risk**, irrespective of how

many borrowers qualify under that test; or (2) whether the QRM exemption should apply to a predetermined **percentage** of all mortgage borrowers whose credit risk profiles are the least risky of all such borrowers, irrespective of the actual level of credit risk presented by those who qualify for the acceptable percentage. The use of either approach would result in a considerably more accurate assessment of the borrower's credit risk, which would permit the QRM definition to rely less heavily on certain non-credit history criteria such as the borrower's debt-to-income [§(d)(8)], loan-to-value [§(d)(9)], and amount of downpayment [§(d)(10)].

Setting a Level of Credit Risk (Options 1-3). The Agencies would predetermine a specific credit risk *default rate* that would qualify a mortgage loan for QRM status. The default rate would be a permissible ratio that indicated the borrower's *odds-of-default* on the mortgage. The mortgage lender would use an EDDSS credit scoring model that, when the mortgage borrower's credit profile is an input to the model, is capable of rank ordering the credit risk presented by each mortgage borrower over the spectrum of all mortgage borrowers. In order for a certain mortgage loan to qualify for the QRM exemption, a securitizer would be required to demonstrate that the credit risk score on that mortgage borrower produced by the model indicated an odds-of-default ratio that was less than or equal to the Agencies' predetermined odds-of-default ratio.

- The creditor would be required to use a qualified third party's EDDSS model in Option #1, which would be certified annually by the third party.
- The creditor could use either a qualified third party's model or its own proprietary model in Option #2, but the creditor would have to annually validate whatever model it selected on its own book of business.
- The creditor could use either a qualified third party's model or its own proprietary model in Option #3; if the creditor selected the third party model, the creditor could rely on the annual certification by the third party, but if the creditor selected its own proprietary model, that model would have to be annually validated on the creditor's own book of business.

Setting a Percentage of Loans (Option 4). The Agencies would predetermine a specific *percentage of loans* that qualifies for QRM status—say the least credit risky 20% of all residential mortgages issued by mortgage originators would be targeted for QRM status. The mortgage lender would be required to use a qualified third party's EDDSS credit scoring model that, when the mortgage borrower's credit profile is an input to the model, is capable of rank ordering the credit risk presented by each mortgage borrower over the spectrum of all mortgage borrowers. In order for a certain mortgage loan to qualify for the QRM exemption, a securitizer would be required to demonstrate that the borrower has a credit risk score that places the borrower in the least credit risky 20% of mortgage borrowers.

There is no option presented herein that would allow a mortgage originator to comply with the QRM exemption by relying on its own proprietary EDDSS model. This is because the percentage approach would result in significantly different results among creditors using their own models, even if the models were EDDSS, due to the regional and lender-by-lender variances in the quality of mortgage loans written by such creditors. Therefore, the only option presented under the percentage approach is to require all

mortgage securitizers to use credit scoring models built using data from a consumer reporting agency that compiles and maintains files on consumers on a nationwide basis.

Proposed Credit History Rule Options 1– 3

Option #1 (Setting a Level of Credit Risk): Odds-of-default, certification on national database

A borrower’s loan would qualify for the QRM exemption if the borrower’s credit score indicated an acceptable odds-of-default credit risk. The mortgage lender would comply by using a qualified third party’s EDDSS credit risk model. For QRM purposes, the creditor need not validate the model on its own database, but may rely on the third party’s annual certification that the model is still EDDSS and accurately rank orders mortgage credit risk. A recent example of this approach is the Federal Reserve’s Risk-Based Pricing Rule, 12 CFR Part 222, which requires credit bureaus and credit scoring model developers to provide the content for certain mandated consumer notices (providing information about the national distribution of credit scores) on an annual basis, and entitles lenders to rely on that information.

This option does not allow creditors to develop and use their own credit scoring models for QRM purposes (see Option #2), but does relieve creditors from their burden of validation and annual revalidation of the models for QRM purposes. Since all mortgage securitizers under this option must use credit scoring models built by third party credit score developers using data from a consumer reporting agency that compiles and maintains files on consumers on a nationwide basis, this option also adds consistency to the odds-of-default approach.

- » The creditor must use a model that:
 - » accurately rank orders mortgage credit risk
 - » is built on a nationwide database of consumers
 - » assigns a cut-off score that represents the predetermined odds-of-default ratio (established by the Agencies) for that model
 - » is periodically revalidated to preserve its status as EDDSS and to determine if the cut-off score needs to change to meet the predetermined odds-of-default ratio
 - » is subject to examination by the CFPB
- » Agencies may reset the qualifying odds-of-default ratio

For guidance, the following table generally matches a borrower’s odds-of-default with the corresponding FICO 8 score (calculated on performance from Oct 2008 - Oct 2010):

<i>Odds-of Default</i>	<i>FICO 8 Score</i>
5:1	610
10:1	645

20:1	685
30:1	705
40:1	720
50:1	735
100:1	770

Option #2 (Setting a Level of Credit Risk): Odds-of-default, validation on creditor’s own database

Like Option #1, a borrower’s loan would qualify for the QRM exemption if the borrower’s credit score indicated an acceptable odds-of-default credit risk. Unlike Option #1, Option #2 would allow creditors to develop and use their own credit scoring models for QRM purposes. A creditor would comply either by developing and using its own EDDSS credit risk model or by using a qualified third party’s EDDSS credit risk model. In either case, however, the creditor would be required to validate and annually revalidate on its own book of business that the credit risk model selected (either a proprietary model or a model created by the third party) is EDDSS. Unlike Option #1, the creditor cannot rely on the third party’s annual certification that the model is still EDDSS and accurately rank orders mortgage credit risk.

- » The creditor must assure that the model it uses:
 - » accurately rank orders mortgage credit risk
 - » assigns a cut-off score that represents the predetermined odds-of-default ratio (established by the Agencies) for that model based on a validation on the creditor’s own book of business
 - » is periodically revalidated to preserve its status as EDDSS and to determine if the cut-off score needs to change to meet the predetermined odds-of-default ratio
 - » is subject to examination by CFPB
- » Agencies may reset the qualifying odds-of-default ratio

For guidance, the following table generally matches a borrower’s odds-of-default with the corresponding FICO 8 score (calculated on performance from Oct 2008 - Oct 2010). Of course, the range of scores and odds-of-default will vary with each model as creditors develop and validate their own credit scoring models.

<i>Odds-of Default</i>	<i>FICO 8 Score</i>
5:1	610
10:1	645
20:1	685
30:1	705
40:1	720
50:1	735
100:1	770

Option #3 (Setting a Percentage of Loans): Odds-of-default, validation or certification depending on the option selected by creditor

Like Options #1 and #2, a borrower's loan would qualify for the QRM exemption if the borrower's credit score indicated an acceptable odds-of-default credit risk. Unlike Option #1, but like Option #2, Option #3 would allow creditors to develop and use their own credit scoring models for QRM purposes. A creditor would comply either by developing and using its own EDDSS credit risk model or by using a qualified third party's EDDSS credit risk model. If the creditor chose to use a qualified third party's EDDSS credit risk model, for QRM purposes, the creditor would not need to validate the model on its own database, but could rely on the third party's annual certification that the model is still EDDSS and accurately rank orders mortgage credit risk. If the mortgage lender chose to use its own credit scoring model for compliance, the creditor would be required to validate and annually revalidate on its own book of business that the credit risk model used is EDDSS.

For guidance, the following table generally matches a borrower's odds-of-default with the corresponding FICO 8 score (calculated on performance from Oct 2008 - Oct 2010). Of course, the range of scores and odds-of-default will vary with each model as creditors develop and validate their own credit scoring models.

<i>Odds-of Default</i>	<i>FICO 8 Score</i>
5:1	610
10:1	645
20:1	685
30:1	705
40:1	720
50:1	735
100:1	770

Option #4 (Setting a Percentage of Loans): Percentage of least risky borrowers, certification on national database

A borrower's loan would qualify for the QRM exemption if the borrower's credit score placed the borrower in the acceptable percentage of least credit risky borrowers. The mortgage lender would comply by using a qualified third party's EDDSS credit risk model to determine the borrower's credit score. For QRM purposes, the creditor need not validate the model on its own book of business, but may rely on the third party's annual certification that the model is still EDDSS and accurately rank orders credit risk. A recent example of this approach is the Federal Reserve's Risk-Based Pricing Rule, 12 CFR Part 222, which requires credit bureaus and credit scoring model developers to provide the content for certain mandated consumer notices (providing information about the national distribution of credit scores) on an annual basis, and entitles lenders to rely on that information.

Like Option #1 above, this option does not allow creditors to develop and use their own credit scoring models for QRM purposes, but does relieve creditors from their burden of validation and annual

revalidation of the models for QRM purposes. Since all mortgage securitizers under this option must rely on credit scoring models built by third party credit score developers using data from a consumer reporting agency that compiles and maintains files on consumers on a nationwide basis, this option also adds consistency to the odds-of-default approach.

- » The creditor must use a model that:
 - » accurately rank orders mortgage credit risk
 - » is built on a nationwide database of consumers
 - » assigns a cut-off score that represents the acceptable percentage of least credit risky borrowers (established by the Agencies) for that model
 - » is periodically revalidated to preserve its status as EDDSS and to determine if the cut-off score needs to change to meet the acceptable percentage of least credit risky borrowers for that model
 - » is subject to examination by CFPB
- » Agencies may reset the qualifying percentage of least risky borrowers

For guidance, the following table generally matches the percentage of mortgage borrowers who achieved certain FICO 8 scores, calculated on performance from Oct 2008 - Oct 2010):

<i>Percentage of Population</i>	<i>FICO 8 Score</i>
10%	815
20%	795
30%	770
40%	740
50%	710
60%	675
70%	625
80%	570
90%	520

Proposed Credit History Rule -- Option #1

DELETE:

Subpart D—Exceptions and Exemptions, §__.15 *Exemption for qualified residential mortgages, subsection (d)(5):*

(d)(5) *Credit history*—(i) *In general.* The creditor has verified and documented that within ninety (90) days prior to the closing of the mortgage transaction:

(A) The borrower is not currently 30 days or more past due, in whole or in part, on any debt obligation;

(B) Within the previous twenty-four (24) months, the borrower has not been 60 days or more past due, in whole or in part, on any debt obligation; and

(C) Within the previous thirty-six (36) months:

(1) The borrower has not been a debtor in a case commenced under Chapter 7, Chapter 12, or Chapter 13 of Title 11, United States Code, or been the subject of any Federal or State judicial judgment for the collection of any unpaid debt;

(2) The borrower has not had any personal property repossessed; and (3) No one-to-four family property owned by the borrower has been the subject of any foreclosure, deed-in-lieu of foreclosure, or short sale.

(ii) *Safe harbor.* A creditor will be deemed to have met the requirements of paragraph (d)(5)(i) of this section if:

(A) The creditor, no more than 90 days before the closing of the mortgage transaction, obtains a credit report regarding the borrower from at least two consumer reporting agencies that compile and maintain files on consumers on a nationwide basis;

(B) Based on the information in such credit reports, the borrower meets all of the requirements of paragraph (d)(5)(i) of this section, and no information in a credit report subsequently obtained by the creditor before the closing of the mortgage transaction contains contrary information; and

(C) The creditor maintains copies of such credit reports in the loan file for the mortgage transaction.

REPLACE subsection (d)(5) with the following:

(d)(5) *Credit history*—(i) *In general.* The creditor has verified and documented within ten (10) days prior to the closing of the mortgage transaction that the borrower has a credit risk score that indicates the borrower's odds-of-default on the mortgage are [X] to 1 or higher. The credit risk score shall be the product of an empirically derived, demonstrably and statistically sound credit scoring model based on data from a consumer reporting agency that compiles and maintains files on consumers on a nationwide basis, as defined in 15 U.S.C. 1681a(p). The credit scoring model shall be capable of rank ordering the credit risk presented by a borrower over the spectrum of all mortgage borrowers.

(A) *Empirically derived and other credit scoring models.* A credit scoring model is a model that evaluates a borrower's creditworthiness mechanically, based on key attributes of the borrower and aspects of the transaction, and that determines, alone or in conjunction with an evaluation of additional information about the borrower, whether the borrower is deemed creditworthy. To qualify as an empirically derived, demonstrably and statistically sound, credit scoring model for purposes of this section (d)(5), the model must be:

(I) based on data that are derived from an empirical comparison of sample groups or the population of creditworthy and noncreditworthy applicants who applied for credit within a reasonable preceding period of time;

(II) developed for the purpose of evaluating the creditworthiness of consumer applicants for credit, and applicable to mortgage applicants;

(III) developed and validated using accepted statistical principles and methodology; and

(IV) periodically revalidated by the use of appropriate statistical principles and methodology and adjusted as necessary to maintain predictive ability.

(B) *Odds-of-default.* The odds-of-default shall be defined as the ratio of non-delinquent borrowers to delinquent borrowers. Delinquent borrowers shall be defined as those with a mortgage delinquency of 90 days past due or worse over the 24 month period following the origination of the loan; non-delinquent borrowers shall be defined as those with no mortgage delinquency of 90 days past due or worse over the same 24 month period following the origination of the loan.

(C) *Annual Certification.* For purposes of compliance with subsection (d)(5)(i), a creditor may rely on the annual written certification of the person that developed the empirically derived, demonstrably and statistically sound credit scoring model that the model has been validated within a reasonable period of time on a national database of

scoreable individuals with recent data from a consumer reporting agency that compiles and maintains files on a nationwide basis, as defined in 15 U.S.C. 1681a(p), and that the [X] to 1 odds-of-default credit risk threshold is represented by a specific credit score produced by such model, as determined through the validation process.

(D) *Model Risk Management.* The credit scoring models used by creditors pursuant to this section (d)(5) shall be developed and actively managed in accordance with the Supervisory Guidance on Model Risk Management promulgated by the Federal Reserve Board and the Office of the Comptroller of the Currency (SR Letter 11-7 and OCC 2011-12). The credit scoring model developers shall verify their methodology for calculating the relationship between their credit scoring model and the scoreable individuals' odds-of-default, as defined in this section (d)(5). Creditors shall retain satisfactory evidence of compliance with these requirements for examination purposes.

(ii) *Resetting the Minimum Odds-of-Default.* The Agencies shall have the authority to alter or amend the definition of odds-of-default, or adjust the minimum acceptable odds-of-default, in order to effect the purposes of the QRM exemption.

Proposed Credit History Rule -- Option #2

DELETE:

Subpart D—Exceptions and Exemptions, §__.15 Exemption for qualified residential mortgages, subsection (d)(5):

(d)(5) *Credit history*—(i) *In general.* The creditor has verified and documented that within ninety (90) days prior to the closing of the mortgage transaction:

(A) The borrower is not currently 30 days or more past due, in whole or in part, on any debt obligation;

(B) Within the previous twenty-four (24) months, the borrower has not been 60 days or more past due, in whole or in part, on any debt obligation; and

(C) Within the previous thirty-six (36) months:

(1) The borrower has not been a debtor in a case commenced under Chapter 7, Chapter 12, or Chapter 13 of Title 11, United States Code, or been the subject of any Federal or State judicial judgment for the collection of any unpaid debt;

(2) The borrower has not had any personal property repossessed; and (3) No one-to-four family property owned by the borrower has been the subject of any foreclosure, deed-in-lieu of foreclosure, or short sale.

(ii) *Safe harbor.* A creditor will be deemed to have met the requirements of paragraph (d)(5)(i) of this section if:

(A) The creditor, no more than 90 days before the closing of the mortgage transaction, obtains a credit report regarding the borrower from at least two consumer reporting agencies that compile and maintain files on consumers on a nationwide basis;

(B) Based on the information in such credit reports, the borrower meets all of the requirements of paragraph (d)(5)(i) of this section, and no information in a credit report subsequently obtained by the creditor before the closing of the mortgage transaction contains contrary information; and

(C) The creditor maintains copies of such credit reports in the loan file for the mortgage transaction.

REPLACE subsection (d)(5) with the following:

(d)(5) *Credit history*—(i) *In general.* The creditor has verified and documented within ten (10) days prior to the closing of the mortgage transaction that the borrower has a credit risk score that indicates the borrower's odds-of-default on the mortgage are [X] to 1 or higher. The credit risk score shall be the product of an empirically derived, demonstrably and statistically sound credit scoring model. The credit scoring model shall be capable of rank ordering the credit risk presented by a borrower over the spectrum of all mortgage borrowers.

(A) *Empirically derived and other credit scoring models.* A credit scoring model is a model that evaluates a borrower's creditworthiness mechanically, based on key attributes of the borrower and aspects of the transaction, and that determines, alone or in conjunction with an evaluation of additional information about the borrower, whether the borrower is deemed creditworthy. To qualify as an empirically derived, demonstrably and statistically sound, credit scoring model for purposes of this section (d)(5), the model must be:

(I) based on data that are derived from an empirical comparison of sample groups or the population of creditworthy and noncreditworthy applicants who applied for credit within a reasonable preceding period of time;

(II) developed for the purpose of evaluating the creditworthiness of consumer applicants for credit, and applicable to mortgage applicants;

(III) developed and validated using accepted statistical principles and methodology; and

(IV) periodically revalidated by the use of appropriate statistical principles and methodology and adjusted as necessary to maintain predictive ability.

(B) *Odds-of-default.* The odds-of-default shall be defined as the ratio of non-delinquent borrowers to delinquent borrowers. Delinquent borrowers shall be defined as those with a mortgage delinquency of 90 days past due or worse over the 24 month period following the origination of the loan; non-delinquent borrowers shall be defined as those with no mortgage delinquency of 90 days past due or worse over the same 24 month period following the origination of the loan.

(C) *Model Validation and Compliance.* A creditor may use an empirically derived, demonstrably and statistically sound, credit scoring model obtained from another person, if such model is based on a national database of scoreable individuals with recent data from a consumer reporting agency that compiles and maintains files on a nationwide basis, as defined in 15 U.S.C. 1681a(p); or a creditor may develop its own credit risk model if the model is capable of rank ordering the credit risk presented by each borrower over the spectrum of the creditor's mortgage borrowers,

and the model satisfies the criteria set forth in paragraphs (A)(I) through (IV) of this section (d)(5). The creditor shall validate the model it uses at least annually, based on its own credit experience in accordance with paragraphs (A)(I) through (IV). A model that fails this validity test is no longer an empirically derived, demonstrably and statistically sound, credit scoring model for that creditor.

(D) *Model Risk Management.* The credit scoring models used by creditors pursuant to this section (d)(5) shall be developed and actively managed by creditors in accordance with the Supervisory Guidance on Model Risk Management promulgated by the Federal Reserve Board and the Office of the Comptroller of the Currency (SR Letter 11-7 and OCC 2011-12). Pursuant to these regulatory standards, creditors shall validate the accuracy of their credit scoring models and verify their methodology for calculating the relationship between their credit scoring model and their borrowers' odds-of-default, as defined in this section (d)(5). Creditors shall retain satisfactory evidence of compliance with these requirements for examination purposes.

(ii) *Resetting the Minimum Odds-of-Default.* The Agencies shall have the authority to alter or amend the definition of odds-of-default, or adjust the minimum acceptable odds-of-default, in order to effect the purposes of the QRM exemption.

Proposed Credit History Rule -- Option #3

DELETE:

Subpart D—Exceptions and Exemptions, §__.15 Exemption for qualified residential mortgages, subsection (d)(5):

(d)(5) *Credit history*—(i) *In general*. The creditor has verified and documented that within ninety (90) days prior to the closing of the mortgage transaction:

(A) The borrower is not currently 30 days or more past due, in whole or in part, on any debt obligation;

(B) Within the previous twenty-four (24) months, the borrower has not been 60 days or more past due, in whole or in part, on any debt obligation; and

(C) Within the previous thirty-six (36) months:

(1) The borrower has not been a debtor in a case commenced under Chapter 7, Chapter 12, or Chapter 13 of Title 11, United States Code, or been the subject of any Federal or State judicial judgment for the collection of any unpaid debt;

(2) The borrower has not had any personal property repossessed; and (3) No one-to-four family property owned by the borrower has been the subject of any foreclosure, deed-in-lieu of foreclosure, or short sale.

(ii) *Safe harbor*. A creditor will be deemed to have met the requirements of paragraph (d)(5)(i) of this section if:

(A) The creditor, no more than 90 days before the closing of the mortgage transaction, obtains a credit report regarding the borrower from at least two consumer reporting agencies that compile and maintain files on consumers on a nationwide basis;

(B) Based on the information in such credit reports, the borrower meets all of the requirements of paragraph (d)(5)(i) of this section, and no information in a credit report subsequently obtained by the creditor before the closing of the mortgage transaction contains contrary information; and

(C) The creditor maintains copies of such credit reports in the loan file for the mortgage transaction.

REPLACE subsection (d)(5) with the following:

(d)(5) *Credit history*—(i) *In general*. The creditor has verified and documented within ten (10) days prior to the closing of the mortgage transaction that the borrower has a credit risk score that indicates the borrower's odds-of-default on the mortgage are [X] to 1 or higher. The credit risk score shall be the product of an empirically derived, demonstrably and statistically sound credit scoring model. The credit scoring model shall be capable of rank ordering the credit risk presented by a borrower over the spectrum of all mortgage borrowers.

(A) *Empirically derived and other credit scoring models*. A credit scoring model is a model that evaluates a borrower's creditworthiness mechanically, based on key attributes of the borrower and aspects of the transaction, and that determines, alone or in conjunction with an evaluation of additional information about the borrower, whether the borrower is deemed creditworthy. To qualify as an empirically derived, demonstrably and statistically sound, credit scoring model for purposes of this section (d)(5), the model must be:

(I) based on data that are derived from an empirical comparison of sample groups or the population of creditworthy and noncreditworthy applicants who applied for credit within a reasonable preceding period of time;

(II) developed for the purpose of evaluating the creditworthiness of consumer applicants for credit, and applicable to mortgage applicants;

(III) developed and validated using accepted statistical principles and methodology; and

(IV) periodically revalidated by the use of appropriate statistical principles and methodology and adjusted as necessary to maintain predictive ability.

(B) *Odds-of-default*. The odds-of-default shall be defined as the ratio of non-delinquent borrowers to delinquent borrowers. Delinquent borrowers shall be defined as those with a mortgage delinquency of 90 days past due or worse over the 24 month period following the origination of the loan; non-delinquent borrowers shall be defined as those with no mortgage delinquency of 90 days past due or worse over the same 24 month period following the origination of the loan.

(C) *Annual Certification, Model Validation, and Compliance*. A creditor may use an empirically derived, demonstrably and statistically sound, credit scoring model obtained from another person, if such model is based on a national database of scoreable individuals with recent data from a consumer reporting agency that compiles and maintains files on a nationwide basis, as defined in 15 U.S.C. 1681a(p). For purposes of compliance with subsection

(d)(5)(i), a creditor may rely on the annual written certification of such other person that the [X] to 1 odds-of-default credit risk threshold is represented by a specific credit score produced by such model, as determined through the validation process.

For purposes of compliance with subsection (d)(5)(i), a creditor may develop its own credit model if that model is capable of rank ordering the credit risk presented by each borrower over the spectrum of the creditor's mortgage borrowers, and the model satisfies the criteria set forth in paragraphs (A)(I) through (IV) of this section (d)(5). The creditor shall validate the model it uses at least annually, based on its own credit experience in accordance with paragraphs (A)(1) through (IV). A model that fails this validity test is no longer an empirically derived, demonstrably and statistically sound, credit scoring model for that creditor.

(D) *Model Risk Management.* The credit scoring models used by creditors pursuant to this section (d)(5) shall be developed and actively managed in accordance with the Supervisory Guidance on Model Risk Management promulgated by the Federal Reserve Board and the Office of the Comptroller of the Currency (SR Letter 11-7 and OCC 2011-12). The credit scoring model developers shall verify their methodology for calculating the relationship between their credit scoring model and the scoreable individuals' odds-of-default, as defined in this section (d)(5). Creditors shall retain satisfactory evidence of compliance with these requirements for examination purposes.

(ii) *Resetting the Minimum Odds-of-Default.* The Agencies shall have the authority to alter or amend the definition of odds-of-default, or adjust the minimum acceptable odds-of-default, in order to effect the purposes of the QRM exemption.

Proposed Credit History Rule -- Option #4

DELETE:

Subpart D—Exceptions and Exemptions, § __.15 Exemption for qualified residential mortgages, subsection (d)(5):

(d)(5) *Credit history*—(i) *In general*. The creditor has verified and documented that within ninety (90) days prior to the closing of the mortgage transaction:

(A) The borrower is not currently 30 days or more past due, in whole or in part, on any debt obligation;

(B) Within the previous twenty-four (24) months, the borrower has not been 60 days or more past due, in whole or in part, on any debt obligation; and

(C) Within the previous thirty-six (36) months:

(1) The borrower has not been a debtor in a case commenced under Chapter 7, Chapter 12, or Chapter 13 of Title 11, United States Code, or been the subject of any Federal or State judicial judgment for the collection of any unpaid debt;

(2) The borrower has not had any personal property repossessed; and (3) No one-to-four family property owned by the borrower has been the subject of any foreclosure, deed-in-lieu of foreclosure, or short sale.

(ii) *Safe harbor*. A creditor will be deemed to have met the requirements of paragraph (d)(5)(i) of this section if:

(A) The creditor, no more than 90 days before the closing of the mortgage transaction, obtains a credit report regarding the borrower from at least two consumer reporting agencies that compile and maintain files on consumers on a nationwide basis;

(B) Based on the information in such credit reports, the borrower meets all of the requirements of paragraph (d)(5)(i) of this section, and no information in a credit report subsequently obtained by the creditor before the closing of the mortgage transaction contains contrary information; and

(C) The creditor maintains copies of such credit reports in the loan file for the mortgage transaction.

REPLACE subsection (d)(5) with the following:

(d)(5) *Credit history*—(i) *In general*. The creditor has verified and documented within ten (10) days prior to the closing of the mortgage transaction that the borrower has a credit risk score that places that borrower in the least credit risky [X]% of mortgage borrowers. The credit risk score shall be the product of an empirically derived, demonstrably and statistically sound credit scoring model, based on data from a consumer reporting agency that compiles and maintains files on consumers on a nationwide basis, as defined in 15 U.S.C. 1681a(p). The credit scoring model shall be capable of rank ordering the credit risk presented by a borrower over the spectrum of all mortgage borrowers.

(A) *Empirically derived and other credit scoring models*. A credit scoring model is a model that evaluates a borrower's creditworthiness mechanically, based on key attributes of the borrower and aspects of the transaction, and that determines, alone or in conjunction with an evaluation of additional information about the borrower, whether the borrower is deemed creditworthy. To qualify as an empirically derived, demonstrably and statistically sound, credit scoring model for purposes of this section (d)(5), the model must be:

(I) based on data that are derived from an empirical comparison of sample groups or the population of creditworthy and noncreditworthy applicants who applied for credit within a reasonable preceding period of time;

(II) developed for the purpose of evaluating the creditworthiness of consumer applicants for credit, and applicable to mortgage applicants;

(III) developed and validated using accepted statistical principles and methodology; and

(IV) periodically revalidated by the use of appropriate statistical principles and methodology and adjusted as necessary to maintain predictive ability.

(B) *Odds-of-default*. The odds-of-default shall be defined as the ratio of non-delinquent borrowers to delinquent borrowers. Delinquent borrowers shall be defined as those with a mortgage delinquency of 90 days past due or worse over the 24 month period following the origination of the loan; non-delinquent borrowers shall be defined as those with no mortgage delinquency of 90 days past due or worse over the same 24 month period following the origination of the loan.

(C) *Annual Certification*. For purposes of compliance with subsection (d)(5)(i), a creditor may rely on the annual written certification of the person that developed the empirically derived, demonstrably and statistically sound credit

scoring model that the model has been validated within a reasonable period of time on a national database of scoreable individuals with recent data from a consumer reporting agency that compiles and maintains files on a nationwide basis, as defined in 15 U.S.C. 1681a(p), and that the [X]% credit risk threshold is represented by a specific credit score produced by such model.

(D) *Model Risk Management.* The credit scoring models used by creditors pursuant to this section (d)(5) shall be developed and actively managed in accordance with the Supervisory Guidance on Model Risk Management promulgated by the Federal Reserve Board and the Office of the Comptroller of the Currency (SR Letter 11-7 and OCC 2011-12). The credit scoring model developers shall verify their methodology for calculating the relationship between their credit scoring model and the percentage of individuals who qualify under this section (d)(5). Creditors shall retain satisfactory evidence of compliance with these requirements for examination purposes.

(ii). *Resetting the Percentages of Qualifying Mortgages.* The Agencies shall have the authority to adjust the percentage of loans that qualify under this section (d)(5) for the QRM exemption.



ABOUT FICO:

FICO is a leading provider of analytics and decision management technology. The company offers a wide range of market leading products and services including the FICO® score that was first introduced in 1989. FICO® scores are the most widely used credit bureau risk scores, powering approximately 10 billion decisions a year. In addition, FICO scores are the required credit risk underwriting standard for all FHA-insured loans as well as all loans sold to Fannie Mae and Freddie Mac. Headquartered in San Jose, California, FICO also has U.S. offices in Colorado, Delaware, Minnesota, New York, and Virginia.

FICO'S COMMITMENT TO CONSUMER EDUCATION:

About myFICO®:

myFICO® is the consumer division of Fair Isaac, the company that invented the FICO® credit risk score most widely used by lenders.

Through myFICO.com, FICO offers informative credit-information products along with consumer financial education materials that help people understand actions they can take to achieve and protect their overall financial health. Over 23 million FICO® scores have been sold to U.S. consumers since FICO launched its consumer service in March of 2001.

About ScoreInfo:

ScoreInfo.org is a non-commercial website launched by FICO to help consumers understand and benefit from the risk-based pricing and credit score disclosure notices they receive in the mail from U.S. lenders in accordance with federal regulations (Risk-Based Pricing Rule) effective January 1, 2011. Many lenders have chosen to comply with this new regulation by providing all consumers with a notice that contains their credit score and other related information shortly after they apply for credit. As most credit decisions include FICO® scores, the Scoreinfo.org website aims to help consumers understand how the FICO® scores they receive in their disclosure notices are calculated and how they can manage their credit and their scores over time.