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January 25, 2005

Office of the Comptroller of the Currency  
250 E Street, SW  
Mail Stop 1-5  
Washington, DC 20219

Attn: Docket No. 04-22

Jennifer J. Johnston  
Secretary, Board of Governors of the Federal  
Reserve System  
20<sup>th</sup> Street and Constitution Avenue, NW  
Washington, DC 20551

Attn: Docket No. OP-1215

Robert E. Feldman  
Executive Secretary  
Federal Deposit Insurance Corporation  
550.17<sup>th</sup> Street, NW  
Washington, DC 20429

Regulation Comments  
Chief Counsel's Office  
Office of Thrift Supervision  
1700 G Street, NW  
Washington, DC 20552

Attn: No. 2004-48

Re: Freddie Mac's Comments on Internal Ratings-Based Systems for Retail Credit Risk for Regulatory Capital, 69 Fed. Reg. 62748 (Oct. 27, 2004)

Freddie Mac respectfully submits these comments in response to the banking agencies' proposed supervisory guidance with request for comment, Internal Ratings-Based Systems for Retail Credit Risk for Regulatory Capital (the "Proposal"). Specifically, Freddie Mac is responding to the request in the Proposal for comments on the methodology for the estimation of Loss Given Default ("LGD") for retail mortgages.

Freddie Mac has been in the business of purchasing retail mortgages for 34 years and has bought tens of millions of residential mortgage loans during the past three decades. In connection with these business activities, Freddie Mac has developed extensive databases of information tracking mortgage defaults. We believe that our data could provide useful insights with respect to the following three LGD-related issues that are mentioned in the Proposal:

- (1) Defining "periods of high credit losses";
- (2) Determining methods to estimate an LGD appropriate to such periods of high credit losses; and
- (3) Determining whether the LGD adjustment for high credit losses should reflect the likely LGD for the particular bank (legal entity), or for a nationally diversified portfolio.

In general, the Proposal raises several important issues about LGD estimation that are not easily answered. Our experience with mortgage defaults suggests that accurate estimation of LGD requires complex modeling of numerous variables. These views are reinforced by the experience of our regulator, the Office of Federal Housing Enterprise Oversight ("OFHEO"), in determining an appropriate LGD to include in capital regulations that apply to us. We believe the information we provide will be useful to the agencies in their deliberations.

Our principal observations are as follows:

1. Historical data indicate that LGD on retail mortgages tends to be significantly higher in periods of high defaults.
2. To understand and measure this phenomenon, one must use data from the 1980s and early 1990s and this data must be from regions that experienced a real estate recession.
3. LGD is dependent on many factors, such as the level of mortgage insurance, the location of the property, and the quality of the servicing of nonperforming loans. Incorporating these factors requires careful modeling and a rich data set.

### Discussion

The last seven years have been a period of unusually low credit losses for residential mortgages, with no episodes that could reasonably constitute a “period of high credit losses.” In the prior twenty years, however, three regions of the country have experienced significant real estate recessions: the region that includes the states of Arkansas, Louisiana, Mississippi and Oklahoma (“the ALMO states”) in the 1980s; New England in the early 1990s; and California in the early-mid 1990s.

As illustrated in Table 1 below, the LGD in the ALMO states during the mid-to-late 1980s was significantly higher than recent experiences. The data in Table 1 was published by OFHEO in its first Notice of Proposed Rulemaking on risk-based capital, 61 Fed. Reg. 29592 (June 11, 1996). To prepare the table, OFHEO gathered data on 1.2 million conventional, 30-year fixed-rate first-lien mortgages on single-unit owner-occupied properties. These loans were purchased by Freddie Mac and Fannie Mae within 12 months of origination, between 1979-93. OFHEO separately estimated default and LGD rates based on available data.

OFHEO grouped loans into contiguous state/origination-year combinations by company (Freddie Mac or Fannie Mae) over 10 cumulative years and identified the combinations that generated the highest loss rates. OFHEO found that loans originated in 1983-84 in the ALMO states suffered the highest credit losses. For this benchmark, OFHEO averaged the default and loss severity rates by original loan-to-value (“OLTV”) of loans purchased by the two companies. OFHEO found that LGD as a percentage of OLTV ranged from 44 to 69 percent<sup>1</sup>:

Table 1: Default, Severity, and Loss Rates of Benchmark Loans by LTV at Origination

LTV range	Average default rate	Average severity rate	Loss rate
<=60%	2.2%	43.5%	1.0%
>60% <=70%	3.5%	46.2%	1.6%
>70% <=75%	7.9%	50.1%	3.9%
>75% <=80%	9.4%	58.9%	5.5%
>80% <=85%	12.0%	55.0%	6.6%
>85% <=90%	17.7%	60.2%	10.7%
>90%	26.4%	69.0%	18.2%

<sup>1</sup> Losses in the table are calculated without considering the benefit to Freddie Mac and Fannie Mae of the proceeds from mortgage insurance on loans with original LTVs above 80 percent.

Using raw data to forecast an appropriate LGD on a particular portfolio during a future real estate recession involves a significant modeling effort. OFHEO developed one such modeling approach in its final risk-based capital regulation for Freddie Mac and Fannie Mae (the “GSE Rule”), which is codified at 12 C.F.R. § 1750.

Under the GSE Rule, LGD is a function of three components: (1) foreclosure and real-estate owned expenses as defined percentages of the unpaid principal balance; (2) lost interest, as a function of mortgage coupon and the financing cost until disposal of the foreclosed property through sale; and (3) collateral deficiency, which is the difference between the recovery proceeds and the mortgage UPB at default. The GSE Rule calculates recovery proceeds as a defined percentage of projected house prices. House prices are projected from mortgage origination through the start of the stress period based on local Census Division housing price index (“HPI”) data; house price growth rates during the 10-year stress test are calculated from the HPI series for the West South Central Census Division for the years 1984-93.

We believe that a principal advantage of OFHEO’s approach is that it incorporates the effect of past house prices into the estimate of LGD. Credit enhancements such as private mortgage insurance are also incorporated into the OFHEO model.

Other factors that could be incorporated into a model are state-by-state variations due to variations in foreclosure laws and quality of servicing of nonperforming loans. This latter factor is important, as the quality of servicing has improved significantly since the 1980s. For example, rating agencies often incorporate quality of servicing into some of their decisions around subordination levels. However, incorporating this information in a rigorous way requires a significant amount of data from an assortment of servicers.

We appreciate having the opportunity to offer our perspective on this important issue. Please do not hesitate to contact us if we may be of further assistance.

Sincerely,



Edward L. Golding  
Senior Vice President  
Capital Oversight & Economics