

Thrift Bulletin

TB 13a-2

Handbook: **Thrift Activities**
Subject: **Structured advances**

**Section: 520**

Structured Advances

Summary: Thrift Bulletin 13a-1 is rescinded with the issuance of this bulletin. The difference between this bulletin and TB13a-1 is the specific reporting guidance has been removed. Institutions filing Schedule CMR should follow the reporting instructions provided in the Thrift Financial Report Instruction Manual.

For Further Information Contact: Your OTS Regional Office or the OTS Risk Management Division, Washington, DC, (202) 906-6861.

Thrift Bulletin 13a-2

In recent years, structured advances have become an increasingly popular funding source for savings institutions¹. Because structured advances often have complex embedded options, the use of these instruments can raise safety and soundness concerns, particularly if management does not sufficiently understand their price and interest rate sensitivity. A significant portion of outstanding structured advances has been issued by the Federal Home Loan Banks (FHLB); however, other issuers provide structured advances. For example, reverse repurchase agreements with Wall Street securities firms, when they contain embedded options, are structured advances. This Bulletin provides supervisory guidance to management on the prudent management of structured advances.

Guidelines for Management

Management should exercise diligence in assessing the risk associated with structured advances. As a matter of sound practice, prior to obtaining a structured advance, an institution should:

- (a) Review the terms and conditions of the advance and evaluate the instrument's price sensitivity;
- (b) Ensure that the proposed transaction is consistent with the institution's portfolio objectives and liquidity needs; and,
- (c) Conduct a pre-purchase portfolio sensitivity analysis for *any* "significant transaction" involving structured advances. A "significant transaction" is any transaction that might reasonably be expected to increase the institution's Sensitivity Measure by more than 25 basis points. Prior to undertaking any

¹ For the purpose of this Bulletin, structured advances include advances with embedded options or derivative-like features where the advances' coupon, average life, or redemption value is dependent on a reference rate, an index, or a formula. The term "structured advance" includes, but is not limited to, puttable and callable advances, convertible advances, variable-rate advances with embedded caps, floors, or collars, step-up variable-rate advances, and amortizing advances.

Thrift Bulletin 13a-2

significant transaction, management should conduct an analysis of the incremental effect of the proposed transaction on the interest rate risk profile of the institution. The analysis should show the expected change in the institution's net portfolio value (with and without the transaction) that would result from an immediate parallel shift in the yield curve of plus and minus 100, 200, and 300 basis points. In general, the institution should conduct its own analysis. It may, however, rely on an analysis conducted by either a qualified independent third party, or by a FHLB, provided the values of embedded options are adequately captured and that management understands the analysis and its key assumptions.

In addition to the parallel-shock interest rate scenarios described above, OTS recommends that institutions evaluate the effects of non-parallel movements in the term structure, basis changes, or changes in interest rate volatility on this portfolio.

OTS may view as an unsafe or unsound practice the use of structured advances by any savings association that does not have adequate risk measurement, monitoring, and control systems.

Reporting Guidelines

Each institution that files Schedule CMR is required to report structured advances in accordance with the instructions provided in the Thrift Financial Report Instruction Manual.

Examiner Guidance

For institutions that report market value estimates of structured advances, OTS examiners should review the valuation methodology. At a minimum, examiners should determine whether the institution:

- (a) Estimates and reports the market values of each structured advance in its portfolio;
- (b) Uses zero-coupon (spot) rates, or spot rates plus a spread, of the appropriate maturities to discount cash flows;
- (c) Uses implied forward interest rates to model variable rate cash flows; and,
- (d) Values embedded options using an appropriate option valuation methodology, for example Black-Scholes, Monte-Carlo, or lattice valuation methods.

Examiners may determine that an institution should use more sophisticated measurement techniques if significant supervisory concerns exist, such as a low Post-shock NPV Ratio or a high Sensitivity Measure. In any case, the institution should be familiar with the details of the assumptions, term structure, and logic used in performing the measurements.



3/4 Richard Riccobono
Deputy Director