

GUIDELINES FOR COLLATERAL EVALUATION AND CREDIT  
CLASSIFICATION OF TROUBLED OIL AND/OR GAS RESERVE  
BASED LOANS

SUMMARY

This document sets forth flexible guidelines to be utilized in an examiner's review of reserve-based loans. The classification of reserve-based loans is like all loan classification in that it must be predicated on an independent assessment of all salient credit factors that are germane to the specific credit being reviewed. The use of these guidelines by examiners should aid in efforts to ensure that troubled reserve-based loans receive consistent treatment nationwide.

DISCUSSION

Engineering Reports

The initial step to assessing the creditworthiness of reserve-based loans is an analysis of the engineering function. Cash flow generated from the future sale of encumbered oil and/or gas reserves is the primary, and in most cases the intended, source of repayment. Therefore, the integrity of engineering data that depicts that future cash stream is critical to the initial lending decision and equally important to an examiner in the assessment of the credit quality.

For evaluation purposes, acceptable engineering reports must be an independent, detailed analysis of the reserve prepared by a competent engineering group. The report must address three critical concerns:

- (1) Pricing. Prices must be realistic. The report should indicate consideration for both price inflation and cost inflation over the "life of the properties".
- (2) Discount factors. Discount rates used should reflect current market interest rates.
- (3) Timing. Preferably the report should be no more that six months old and under no circumstances exceed 12 months. The critical factor in determining the adequacy of the timeliness of the reports is change. Recent significant price fluctuations or changes in interest rates may require the examiner to adjust the valuation of the reserves to reflect currency conditions.

In those cases where the engineering reports do not meet one or more of the above criteria, the examiner may need to use other methods, e.g. recent cash flow histories, to determine the current collateral value. In addition, appropriate comments should be included in the report of examination and recommendations made to bank management for improving their engineering reporting.

Again, cash flow generated from the sale of oil and/or gas in the future is the basic premise of reserve-based lending. For this reason, prudence mandates that loan values be predicated primarily on reserves that are "Proved Developed Producing properties (PDP)".

#### Red Flag or Trigger

A comprehensive analysis of the credit must take place if any of the following factors are present:

- The loan balance exceeds 65 percent of the discounted Present Worth of Future Net Income (PWFNI) of PDP, or the cash flow analysis indicates that the loan will not amortize over four to five years.
- The credit is not performing in accordance with terms or repayment of interest and/or principal, or
- The credit is identified by the bank as a "problem" credit.

After performing the analysis, the examiner must determine if classification is warranted. The following guidelines are to be applied in instances where the obligor is devoid of primary and secondary repayment capacity or other reliable means of repayment, with total support of the debt provided solely by the pledged collateral (Collateral dependent debt).

#### Classification Guidelines

Proved Developed Producing (PDP) Reserves:

- (1) 65 percent of discounted PWFNI, should be classified SUBSTANDARD. A lesser percentage or less severe criticism may be appropriate in cases where a reliable means of repayment exists for a portion of the debt. The 65% percentage should be used when the discounted PWFNI is determined using historical production data ("decline curve analysis engineering"). When less than 75% of the reserve estimate is determined using historical production data, or the discounted PWFNI is predicated on engineering estimates of the volume of oil/gas flow (volumetric and/or analogy based engineering date) the collateral value assigned to substandard should be reduced accordingly.

- (2) The balance, but not more than 100 percent of discounted PWFNI of PDP reserves, should be extended DOUBTFUL.
- (3) Any remaining deficiency balance should be classified LOSS.

### Other Reserves

In addition to PDP, many reserve-based credits will include Proved Developed Non-Producing (PDNP) Reserves, Shut-In Reserves, Behind-the-Pipe Reserves and Proved Undeveloped Properties (PUP) as collateral. Due to the nature of these other reserves, there are no strict percentage guidelines for the proportion of the credit supported by this type of collateral that should remain as a bankable asset. However, only in very unusual situations would the proportion of collateral values assigned to a classification category approach the values for PDP.

The examiner must ascertain the currency status of each reserve and develop an appropriate amount. Examples could be reserves that are Shut-In due to economic conditions versus reserves that are Shut-In due to the absence of pipeline or transportation. PUP require careful evaluation before allowing any bankable collateral value. An example of a bankable value for PUP could be one that has a binding purchase contract. In every classification where a bankable value is given for any of these "Other Reserves", the loan write-up should support fully the examiner's determination.

### SUMMARY

The above guidelines apply to reserve-based loans that are considered collateral dependent and are devoid of repayment capacity from any other tangible source. Rarely should bankable consideration be given to loans that are completely collateral dependent in excess of the liquidation value of the pledged reserves. Once again, there is no substitute for a specific case-by-case analysis of applicable credit and collateral factors pertaining to each individual credit. Frequently, when a lender encounters problems with a production credit, numerous other types of assets (e.g., A/R, inventories, real estate, etc.) are encumbered in an effort to protect the banks' interests. Other types of collateral and sources of repayment should be carefully evaluated on a case-by-case basis.

When reserves are considered real property under state law, foreclosed and debtor in possession properties should be handled in accordance with 12 U.S.C. 29 and 12 CFR 7.3025. In those cases, they should be carried at amounts that do not exceed their liquidation (quick sale) value supported by independent appraisals or tangible purchase offers. (See 12 CFR 7.3025 d and e.)