Rating Methodology

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The Analysis Of Off-Balance Sheet Exposures

A Global Perspective

Moody's Investors Service
Global Credit Research

Summary

This Rating Methodology describes the broad framework that Moody's uses on a global basis when considering off-balance sheet (OBS) exposures. Within this framework, it also provides an overview of the various methodologies already in existence that Moody's analysts use to assess a wide variety of OBS risk.

The analysis of OBS exposures is another facet of Moody's initiative to enhance its corporate credit analysis[1], which brings increased scrutiny to four other areas:

- ***The quality of financial reporting***[2]
- ***The quality of corporate governance***[3]
- ***The quality of risk management practices***[4]
- ***Vulnerability to an abrupt loss of market access***[5]

Events over the last few years, particularly in the US and Europe, have demonstrated that high-profile credit defaults or severe credit deteriorations were often preceded by instances of poor financial reporting, weak governance practices, inadequate risk management, lack of liquidity, or abusive uses of OBS structures.

Assessing OBS risk is already an integral part of fundamental credit analysis and could have a direct impact on an issuer's rating, depending on the size and nature of the exposure. This type of analysis also has an important link to a company's risk management practices because companies often attempt to manage risk through the use of various OBS structures. However, while the analysis of a company's risk management practices focuses on the ***process*** of managing risk overall, OBS risk analysis focuses on ***specific*** OBS exposures and how they impact the overall risk profile of the company.

The objectives of Moody's thought process around OBS exposures include: greater consistency across the ratings practice globally; potential refinement of existing methodologies, where needed; and the development of new methodologies for evolving OBS exposures such as risk transference structures. By achieving these objectives, we anticipate greater analytical transparency for issuers, investors, and analysts.

Moody's analysts will continue to factor OBS exposures into the analysis of individual issuer's ratings. In addition, a number of special comments on specific types of OBS exposures germane to certain industries are planned. They will be topical discussions highlighting risks that may impact a large number of companies within an industry and summarize OBS exposures for companies within that industry.

Defining OBS Exposures

OBS exposures arise in two ways:

1. When a company has retained the risks and rewards associated with certain rights and obligations that meet the definition of assets and liabilities[6], but the accounting treatment does not fully recognize, or recognize at all, those assets and liabilities. For example, OBS exposures often arise when rights have been transferred or obligations have been settled from an accounting and legal perspective. However, from an economic perspective, the company retains enough risks and rewards such that, in substance, there has not been either transference or settlement.

or

2. When a company has contingent obligations that do not currently meet the accounting definition of a liability because the contingency is not probable. However, the contingency may become a liability in the future, if certain events occur[7].

1. *In North America, this initiative is called the Enhanced Analysis Initiative (EAI) and is described in a press release dated June 13, 2002 ("Moody's to Introduce Specialized Analytical Teams to Enhance Corporate Credit Analysis"). A similar initiative is underway in Europe, which is described in a March 2004 Special Comment entitled "The Impact of Moody's Financial Reporting Initiative on European Corporates." This initiative will also eventually be introduced in Asia.*
2. *See "Rating Methodology: Financial Reporting Assessments", December 2003.*
3. *See "Rating Methodology: U.S. and Canadian Corporate Governance Assessment", August 2003.*
4. *See "Rating Methodology: Risk Management Assessments", July 2004.*
5. *See "Moody's Liquidity Risk Assessments – Q&A", March 2002 and "Speculative Grade Liquidity Ratings", September 2002.*
6. *In the US, the implementation of FIN 46 may have a broad impact on OBS transactions. Prior to FIN 46, consolidation was based on controlling financial interest, as evidenced by a majority of voting interest. However, in some circumstances, voting interests do not provide a substantive indicator of a controlling financial interest. FIN 46 provides guidance on when consolidation based on voting interests is inappropriate and instead uses a "risks and rewards" model to determine if consolidation is necessary. As a result, many of the OBS exposures discussed in this Rating Methodology may be affected. Similarly, OBS exposures for Canadian companies and companies reporting under international accounting standards are likely to be affected by similar guidance in these jurisdictions.*
7. *While our focus is on contingent obligations, a company may also be the beneficiary of contingent assets (for example, a company may have purchased insurance to protect against certain negative events).*

In the first case, Moody's adjusts the company's financial statements to recognize the omitted assets and liabilities. In the second case, Moody's may be concerned that a contingent obligation becomes a liability before it is recognized by accounting standards. As a result, cash flows are analyzed to take the potential OBS exposure into consideration. The analysis is based on assumptions regarding future events, which may result in the creation of a liability. The focus is on the impact of a series of hypothetical "what ifs" on cash flows under various scenarios, but does not result in an adjustment to the financial statements.

In either case, making adjustments for OBS exposures has implications for ratio calculations and cash flow analysis because a company may have more obligations than are apparent. Effectively, OBS exposures could result in higher leverage than is reported. The practical implication is that the balance sheet and cash flows have to be adjusted to reflect the economic reality of the risk that is not captured through accounting treatment.

Exclusions From The Scope Of OBS Exposure Analysis

In the previous section, we defined the scope of OBS exposures for the purpose of this methodology. What have been excluded are on-balance sheet exposures, which may not fully capture the risk of that exposure. Examples include undervalued assets or liabilities that may not be marked-to-market under certain accounting standards or derivative instruments measured at fair value where the accuracy of the reported fair value may be questionable. These types of exposures reflect measurement concerns and have been excluded from the scope of this analysis.

General Framework For Analyzing OBS Exposures

OBS exposures cover a broad range of obligations, commitments, or structures and can be as simple as a guarantee or as complex as a project financing. However, the framework that Moody's consistently applies in the analysis of all types of OBS exposures is to consider:

- ***What is the risk associated with the OBS exposure?***
- ***Who has exposure to the risk and, if the risk is shared with other parties, how is it apportioned?***
- ***How should the risk be quantified, if possible?***
- ***What are the necessary adjustments that should be made to the financial statements for OBS exposures to ensure comparability among all companies?***

As mentioned previously, the accounting treatment may not adequately capture the risk associated with certain OBS exposures. Moody's describes these reporting inadequacies in individual issuer reports, while making adjustments to the financial statements to more accurately reflect the company's OBS risk. Given the lack of consistent global accounting standards[8], the adjustments will vary from jurisdiction to jurisdiction and are highlighted throughout this report where appropriate.

Analyzing Various Types Of OBS Exposures

In this section, the types of OBS exposures are described and grouped into three categories:

1. ***Unconsolidated Legal Entities***

   This category includes transactions involving the creation of a Special Purpose Entity (SPE) such as for a securitization[9]. It also includes those pension obligations that are funded into separate trusts and joint ventures, which are legally separate entities that expose each joint venture partner to certain risks.

2. ***Executory Contracts***

   Executory contracts are generally contracts where both parties have yet to perform their obligations or are obligated to continue to perform them in the future, regardless of changing economic conditions. For these types of contracts, neither an asset nor a liability is recorded on the balance sheet. Examples include operating leases, forward purchase or sale commitments, and take-or-pay contracts.

8. *In 2005, international accounting standards will replace national accounting standards in the European Union.This will improve reporting consistency for European companies across countries.*
9. *There are specific accounting rules that determine whether or not securitizations will be consolidated.*

3. *Contingent Obligations*

Contingent obligations can either be ***contractual*** or ***non-contractual*** in nature. For example, if a subsidiary is facing financial difficulties, its parent company may be contractually obligated to cover the subsidiary's debt-service payments under the terms of a guarantee. In another example, financial institutions may provide standby liquidity facilities or letters of credit, which contractually require funding under certain conditions and could result in potentially significant liquidity calls and exposure to credit risk.

Non-contractual contingent obligations are those that arise unexpectedly such as lawsuits or those created by the requirements of regulatory or environmental agencies. Unlike contractual contingent obligations and the other two categories of OBS exposures, non-contractual contingent obligations are difficult to measure due to their uncertainty.

Within our general framework for analyzing OBS exposures — namely, the identification and quantification of OBS risk followed by adjustments to the financial statements or analyzing cash flows after estimating potential future liabilities — Moody's uses various analytical approaches. Each of these approaches is summarized in Appendix 1 and described more fully in the following sections with relevant publications noted in the footnotes.

In addition, certain types of OBS exposures are prevalent in most, if not all industries, while some are limited to a few industries. A chart indicating the types of OBS exposures typically found in a number of industries is attached in Appendix 2.

Unconsolidated Legal Entities

Securitization Transactions[10]

Identify OBS Exposure	Example	Analytical Approach
Assets are sold to an SPE, but significant loss exposure to the assets and related liabilities has been retained.	Securitization	Adjust financial statements to recognize both the assets and related liabilities of the SPE.

Asset securitization is the process through which a variety of financial and non-financial assets are packaged into securities that are then sold to investors. The cash flows generated by the assets are used to pay principal and interest on the securities in addition to transaction expenses. The securities themselves are "backed" or supported by the assets and are known as asset-backed securities (ABS). They can be long- or short-term in nature.

Originators that securitize their assets include banks, finance companies, captive finance companies, and to a lesser extent, industrial entities[11]. Securitization results in the diversification of funding sources and may provide lower-cost funding when compared to the cost of the originator's unsecured borrowings[12]. It also enables financially weak or small companies to access cost-competitive funding. Finally, securitization may help an originator match fund its assets and liabilities.

Through a "true sale" or "absolute transfer" of an asset pool to an SPE in a securitization, the assets are legally separate from those of the originator and, depending on how the transaction is structured, are typically removed from the balance sheet. This means that if the originator that sold its assets to the SPE filed for bankruptcy protection, the unsecured creditors of the originator would not have a valid claim against the asset pool and its related cash flows.

The ABS investor looks only to the cash flow generated from the asset pool as well as credit support "built into" the transaction for repayment of the ABS — from a legal perspective, there is no recourse to the originator. However, in many cases, much of the credit support built into the transaction has been provided or retained by the originator from the outset[13]. As a result, most of the credit risk of underperforming assets may have been retained by the originator. There may also be cases where an originator steps in to support an underperforming transaction in order to retain securitization as a funding source.

10. *See "Demystifying Securitization for Unsecured Investors", January 2003 and "Securitization and its Effect on the Credit Strength of Companies: Moody's Perspective 1987 – 2002", March 2002.*
11. *An industrial company may securitize the trade accounts receivables that are generated when its products are sold. These securitizations are not typically public transactions and are more commonly found in asset-backed commercial paper or factoring programs.*
12. *This depends on the originator's rating (a higher-rated entity may be able to borrow funds at a lower cost in the unsecured market), the quality of the receivables, and the structure of the transaction.*
13. *In many securitization transactions, credit support is either provided by the originator (for example, a cash reserve account) or retained by the originator (if the subordinated tranches or equity is held).*

Securitizations tend to complicate balance sheet analysis because, generally speaking, assets are removed from the originator's balance sheet while the majority of the credit risk of the assets remain. Nonetheless, balance sheet analysis still remains relevant as long as several adjustments are made. If a securitization fails to transfer meaningful risk, the securitized assets and debt are added back to the originator's balance sheet and several financial and cash flow ratios are adjusted accordingly[14]. To the extent that risk is not fully transferred, Moody's views the securitization as the equivalent of an on-balance-sheet secured financing.

Risk Transference Structures Are A Subset Of Securitization Transactions

In their simplest form, risk transference structures use securitization technology to transfer credit risk, typically a narrow subset of all the risks that a company faces. For example, in a securitization, if a significant amount of the transaction's credit risk (which is held in subordinated tranches or the equity piece) is sold or covered through insurance, credit risk may have been transferred. As a result, there may be less reason to completely add back the assets and debt of the transaction to the balance sheet.

Other forms of risk transference include whole loan sales, where loans are sold outright to a third party rather than to a SPE pending a securitization, and the purchase of credit protection for certain types of balance sheet exposures. While the use of these methods to transfer risk is not new, the interpretation of the transference of risk is being taken one step further: if risk is transferred, the equity supporting it may no longer be required and could be allocated for other corporate purposes. Consequently, the company may have more room to leverage its balance sheet than is apparent.

The analytical questions that risk transference structures pose are complex. While the case can be made that risk is reduced through these structures, it is typically only credit risk that is lessened. Given that a company is a dynamic entity managing many risks that are not easy to quantify, the measurement of the degree to which credit risk may have been reduced does not fit neatly into corporate analysis of all risks. Other factors such as the correlation of credit risk with other risks facing the company are important considerations. Moody's continues to work on the development of a methodology to assess the potential impact of risk transference structures on a company's financial condition and ratings.

Pension Obligations[15]

Identify OBS Exposure	Examples	Analytical Approach
Company is at risk for the assets and liabilities of an OBS entity, but does not recognize its net liability or gains and losses.	Pensions	Adjust financial statements to recognize the net liability and gains and losses of the OBS entity. Analyze cash flows after considering future pension obligations.

The treatment of pension obligations varies from jurisdiction to jurisdiction as to whether or not they are accounted for on-balance sheet or off-balance sheet. For example, in the US, Canada, the UK , some European countries, Australia, and Japan, pension obligations are pre-funded into pension trusts, which are legally separate entities. In these countries, accounting standards require the recording of the net pension obligation (gross pension obligation less the value of the assets in the pension trust) in a footnote. In addition, companies are generally permitted to smooth the net pension obligations to shield their income statements from volatility[16].

In these jurisdictions, Moody's focuses on whether or not asset cash flows are sufficient to cover future pension obligations. There is scrutiny of the assets in terms of sustainability of the asset returns and the discount rate applied to future pension obligations. Based on these considerations, the amount of underfunding may be adjusted and is included as debt. In addition, income smoothing is eliminated.

In contrast, there are several countries in Europe, including the German-speaking countries, where there is no legal requirement to pre-fund pension obligations[17]. Instead, pension obligations are paid as they become due and corporate investments may be accumulated to fund future pension obligations. Accounting standards require that the present value of the pension obligations be recorded on the balance sheet together with the corresponding assets, which are not specifically dedicated to the pension obligations.

To achieve comparability with global practices, Moody's simulates a pre-funding of pension obligations for companies that do not pre-fund. Cash and marketable securities in excess of the amounts required to maintain the business are first applied to pension obligations. Given the long-term horizon for payment of pension obligations and the general predictability of the payment streams, the company will likely have time to secure the necessary financing for the balance. If the company has the ability to easily access the capital markets, Moody's assumes that its existing debt and equity mix will be maintained to fund future pension obligations net of applied cash balances[18].

14. See "Alternative Financial Ratios for the Effects of Securitization: Tools for Analysis", September 1997.

15. See "Analytical Observations Related to US Pension Obligations", January 2003; "Analytical Observations Related to 'Underfunded' Pension Obligations when Using UK and IAS GAAP", May 2003; and "Australian Pension Obligations: No Material Issues for Rated Companies", June 2003.

16. Under Australian GAAP, provisioning for unamortized service costs and actuarial gains and losses, which results in the smoothing of net income, is not allowed.

17. The French system is primarily based on state pensions and secondarily on one-time terminations payments, which are also unfunded.

18. See "Moody's Approach to Analyzing Pension Obligations of Corporations", November 1998.

Joint Ventures And Other Equity Method Investments[19]

Identify OBS Exposure	Examples	Analytical Approach
Company has partial ownership in an OBS entity, which is strategically important.	Joint Ventures Equity Method Investments	Depending on the risk allocation, adjust financial statements to reflect the full or pro-rata consolidation of an OBS entity. Analyze cash flows after considering potential cash flow requirements.

Joint ventures can be found in many different industries for a wide variety of reasons. They generally provide strategic benefits; can be set up for marketing, manufacturing, distribution, or financing purposes; and directly incur debt. Typically, they are reported on the balance sheet as an investment accounted for by the equity method if the company's ownership interest is between 20% to 50%and are consolidated if that interest exceeds 50%. For an interest less than 20%, the investment is accounted for at either fair value or cost, depending on the structure of the joint venture[20].

The analysis of joint ventures can be complex, particularly when determining how various risks should be allocated to each joint venture partner. In making its assessment, Moody's considers the materiality of the joint venture to each of its partners, the business rationale for its existence, the strategic importance of the joint venture to each partner, and the conditions under which a partner may exit.

The cash flow requirements of the joint venture and each partner's responsibility to provide support, if necessary, are other important factors in the analysis. The conditions under which the joint venture can be unwound may lead to unexpected financial consequences in the future if the relationship between the partners deteriorates. Finally, Moody's considers any moral obligation that a partner may have to support a joint venture should it underperform.

In many instances, Moody's will consolidate joint ventures on a pro-rata basis for each partner. However, if the joint venture is strategically important to one particular partner and the economic penalty is such that it prevents that partner from exiting, Moody's may fully consolidate the joint venture.

Project Finance And Other Non-Recourse Debt[21]

Identify OBS Exposure	Examples	Analytical Approach
Company finances operations through debt backed only by cash flows from a specific project or assets.	Project Finance Debt Non-recourse Debt	Depending on the risk allocation, adjust financial statements to reflect the full or partial consolidation of project-related assets and debt. In some cases, the net liability may be used. Analyze cash flows after considering potential cash flow requirements.

Project finance debt is supported by the cash flows of a specific project such as a coal mine, power plant, or football stadium. Similar to a securitization transaction, holders of project finance debt are only entitled to look to the project itself for repayment. Legally, the project finance debt is non-recourse to the sponsoring company, but there could be important strategic reasons to support a project if it fails to perform.

In assessing a project financing, there are many considerations. The first is to assess which parties are taking the risk, including the project's sponsor, suppliers to the project, purchasers of the project's output, contractors, financial institutions and/or governments. Projects usually result in single asset concentrations and face completion, operational, market, and political or currency risk depending on where they are located.

Project-related joint ventures may also be formed and financed with project debt. Depending on the project's structure, it may appear on the balance sheet as an equity investment for the joint venture partners, potentially masking large debt obligations. Certain performance, completion, and financial guarantees could result in liabilities not reflected on the balance sheet. As a result, Moody's may consolidate project finance debt either fully or on a pro-rata basis to reflect the true exposure for a joint venture partner, particularly if the project is of strategic importance to the company.

19. *Under certain circumstances, joint ventures are accounted for under the equity method. Nonetheless, the company remains exposed to some of the risks and rewards of the joint venture's assets and liabilities, which have not been included in the company's balance sheet.*
20. *In Canada, joint ventures are accounted for using the proportionate consolidation method. . Under international accounting standards, companies have a choice to use either the equity method or proportionate consolidation to account for joint ventures.*
21. *See "Moody's Approach to Rating the Petroleum Industry", December 2003 (page 18).*

Executory Contracts

Identify OBS Exposure	Examples	Analytical Approach
Under executory contracts, neither an asset nor a liability is recorded.	Operating Leases Forward Purchase or Sale Commitments Take-or-Pay Contracts	For operating leases, adjust financial statements to recognize both assets and liabilities. For forward purchase or sale commitments, analyze cash flows after considering potential cash flow requirements. For take-or-pay contracts, analyze cash flows after considering potential cash flow requirements or adjust the balance sheet, as appropriate.

Lease Agreements[22]

Lease agreements are contracts under which a company or lessee has the use of an asset in return for a rental payment over the life of the lease. Terms of the lease may vary, but usually include a payment for ongoing maintenance of the lease equipment. Failure to comply with the terms of a lease could constitute a default and would likely trigger cross defaults or an acceleration of other debt obligations. Under certain conditions, the company may also have the right to purchase the leased equipment.

There are two types of leases: a finance or capital lease and an operating lease. Under the terms of a ***capital*** lease, the rights and obligations contained in the lease are reported on the balance sheet as assets and liabilities[23]. In contrast, under the terms of an ***operating*** lease, the rights and obligations contained in the lease are not reported on the balance sheet as assets and liabilities. An operating lease is considered an executory contract with associated rental expense disclosed in the financial statement footnotes.

Accounting-based criteria are used to determine whether the lease is reported as a capital lease or an operating lease. However, Moody's treats all leases as capital leases and makes adjustments to bring operating leases on balance sheet for analytical purposes. In capitalizing operating leases, Moody's may use one of several analytical approaches. The simplest is the standard "8x" multiple[24], which is applied to the most current annual rent expense to arrive at a debt equivalent value.

Another approach is to calculate the net present value of the future minimum lease payments using an appropriate discount rate such as the discount rate implicit in the lease agreement, the finance lease rate, or the company's weighted cost of debt. Finally, a modified present value approach, which is based on whether the asset is core to the company's operations, may also be used[25].

Forward Purchase Or Sale Commitments

These are commitments typically related to the purchase or sale of goods or services. In addition, forward purchase commitments may also obligate a company to make certain capital expenditures in the future and to make payments under outsourcing arrangements or advertising commitments. Forward sale commitments can be captured in order backlogs where it is important to consider whether the orders are firm or contingent.

In general, accounting standards require disclosure around various commitments to make future payments under a variety of contracts or agreements. In its analysis, Moody's factors these commitments into the analysis of future cash flows.

Take-Or-Pay Contracts

Take-or-pay contracts are another form of purchase commitment typically found in the chemical and energy industries. A company may be obligated to purchase raw materials or power from a supplier regardless of whether or not either is used. Such contracts can be problematic if market conditions and raw material prices change or if the price of the end product drops. Regardless of whether or not the contract becomes problematic, Moody's factors payments under take-or-pay contracts into the analysis of future cash flows and may also adjust the balance sheet, if appropriate[26].

22. *See "Off-Balance Sheet Leases: Capitalization and Ratings Implications", October 1999 and "European Telecommunication Operators' Use of Sale and Leaseback Transactions Can Pressure Ratings", October 2001.*
23. *In Japan, a company may have finance leases where ownership of the asset is not deemed to have been transferred from the lessor to the lessee. For these types of leases, the company may choose not to capitalize them, but account for them as operating leases.*
24. *For an explanation of the "8x" multiple refer to "Off-Balance Sheet Leases: Capitalization and Ratings, Implications," October 1999 (page 3).*
25. *In the modified present value approach, all the core cash generating assets of the company are identified. Assuming that these assets are required in perpetuity, the rental payment stream, net of depreciation, is discounted back (essentially take the interest component of the rent and divide it by the discount rate). The traditional present value method would still be used for the rental payment stream of any non-core assets.*

Contingent Obligations

Identify OBS Exposure	Examples	Analytical Approach
Assets and liabilities are recognized when a loss is probable.	**Contractual:** Guarantees Standby Liquidity Facilities Letters of Credit Warranties **Non-contractual:** Lawsuits Environmental Remediation Unwinds of Tax Structures	Analyze cash flows after considering potential cash flow requirements.

Guarantees And Other Support Mechanisms

Guarantees, where one company contractually agrees to support the obligations of another, are typically disclosed in the footnotes of the financial statements. A weaker form of guarantee are support or keep-well agreements where the promise of support may include a specific ownership percentage as well as maintenance of minimum net worth and fixed charge levels. Most indirect guarantees of the indebtedness of others are not typically disclosed in the financial statements, except for required disclosures by companies in the US, Canada, and Japan[27].

In both cases, Moody's analyzes cash flows based on various assumptions regarding future events that may result in the creation of a liability. Depending on the organizational structure of the company, there can also be upstream and/or downstream support provided, each with its own rating implications. In addition to creating additional financial burden, guarantees may also result in structural subordination, particularly if there are both holding and operating companies involved[28].

Standby Liquidity Agreements

Standby liquidity agreements, which are disclosed in financial statement footnotes, are typically provided by financial institutions. Under certain conditions, the standby liquidity facilities can be drawn, resulting in potentially large calls on liquidity and exposure to credit risk, depending on the terms of repayment and underlying collateral, if any.

In terms of accounting treatment, if it appears that a draw is likely under a standby liquidity agreement, an adjustment is made to the corresponding assets and liabilities of the financial institution. While in agreement with this accounting treatment, Moody's analyzes future cash flow requirements to estimate potential obligations that may arise before there is recognition by accounting standards.

Letters Of Credit

There are a number of different types of letters of credit including performance, trade, and financial. Letters of credit are also generally issued by financial institutions and can only be drawn under certain conditions. Whether or not letters of credit are added to debt depends on the probability of a draw, any unsecured exposure that may result from a draw, and the underlying collateral supporting the letter of credit, if any.

The accounting treatment for letters of credit is the same as for standby liquidity agreements: an adjustment is made to the balance sheet of the financial institution if it appears that a draw is likely. Similar to its analytical treatment of standby liquidity agreements, Moody's analyzes future cash flow requirements to estimate potential obligations that may arise prior to accounting recognition.

Warranties

Warranties usually arise from the manufacture of products such as autos. In terms of accounting treatment, warranty reserves are already found on the balance sheet. However, Moody's will analyze the assumptions used in the determination of the warranty reserve to determine whether or not there will be greater claims on future cash flows than anticipated. In addition, trends in the warranty reserve are monitored so that problems with product quality can be quickly identified.

26. *Going forward, in both the US and Europe, many take-or-pay contracts, outsourcing agreements, service concession agreements, and rights to capacity in the telecom industry will be accounted for as leases and treated by Moody's as such for analytical purposes.*
27. *Recent guidance in the US (FIN 45) requires initial recognition and measurement on the balance sheet for many guarantee contracts that contingently require the guarantor to make payments to the guaranteed party.*
28. *See "Credit Considerations in Assigning Subsidiary Ratings in the Absence of Legally Binding Support", December 2003.*

Lawsuits

Litigation is an ongoing risk for all types of companies. As history has shown through the impact of litigation related to product liability and, more recently, litigation against investment banks related to aggressive financial engineering for corporate clients, the financial consequences can be significant.

Accounting standards exist for the disclosure of lawsuits, but determination of the reported amount is based on judgment. Information may be disclosed in footnotes, or, as is the case with asbestos litigation, the estimated liability may be captured in the financial statements. While the impact of litigation is difficult to quantify, Moody's considers a range of possible outcomes based on the nature of the lawsuit, where the case is being adjudicated, and other relevant information, all of which are factored into an analysis of the company's future cash flows.

Environmental Remediation

All companies, but particularly those involved in heavy industry such as manufacturing, mining, and waste management, face ongoing regulatory requirements related to the environment. Another notable example is post-closure obligations for nuclear power plants[29]. Similar to litigation, the cost of environmental remediation can be significant and difficult to quantify due to a changing regulatory environment, difficulties in the disposal of toxic materials, and the potential health impact on individuals. In its analysis, Moody's considers the current regulatory environment, potential changes to it, and future cost estimates. Based on these factors, a number of "what if" scenarios are developed and their potential impact on future cash flows is estimated.

Potential Unwinds Of Tax-Advantaged Structures

Given the increasing use of financial engineering by a number of companies, certain types of aggressive financing structures may face scrutiny by the tax authorities. If a company is forced to unwind a tax-advantaged structure, there could potentially be a significant claw-back of previously realized tax benefits and the imposition of penalties. If such a structure is identified, Moody's will estimate the potential tax liability if the structure is unwound and adjust cash flows accordingly.

Another related issue is that intermediaries, which develop such structures, may face potential litigation if the structures are found to harm investors, whether directly or indirectly. An example of this is the litigation that intermediaries faced resulting from their development of certain types of financing structures used by Enron. In its analysis of these exposures, consistent with its approach to litigation in general, Moody's will consider a range of possible outcomes based on the nature of the litigation.

Summary And Conclusion

In summary, the range of OBS exposures is broad and the analysis of them can be complex. This report has presented the various approaches that Moody's uses to analyze OBS exposures, which are already factored into ratings. Moody's has published its practices in a number of areas, but continues to refine its thought process. Over time, we expect to update existing methodologies and publish additional guidance.

Going forward, our analysis of OBS exposures will also focus on the discussions of relevant topics that may only have an effect on specific industries. Topics chosen for discussion could be determined by the dollar amount of OBS exposure, by the potential impact on ratings industrywide, or by OBS risk that may not have been fully highlighted before. Future special comments will cover both corporates and financial institutions and explore issues including, but not limited to, whole loan sales, standby liquidity agreements, and the sale of equipment leases to third parties.

29. *Post-closure obligations for nuclear power plants are pre-funded as are pension obligations. The gross liability is netted against the assets in a decommissioning trust fund.*

Appendix 1: Summary Of Moody's Analytical Approaches To Various OBS Exposures

Identify OBS Exposure	Examples	Analytical Approach
Assets are sold to an SPE, but significant loss exposure to the assets and related liabilities has been retained.	Securitization	Adjust financial statements to recognize both the assets and related liabilities of the SPE.
Company is at risk for the assets and liabilities of an OBS entity, but does not recognize its net liability or gains and losses.	Pensions	Adjust financial statements to recognize the net liability and gains and losses of the OBS entity. Analyze cash flows after considering future pension obligations.
Company has partial ownership in an OBS entity, which is strategically important.	Joint Ventures Equity Method Investments	Depending on the risk allocation, adjust financial statements to reflect the full or pro-rata consolidation of an OBS entity. Analyze cash flows after considering potential cash flow requirements.
Company finances operations through debt backed only by cash flows from a specific project or assets.	Project Finance Debt Non-recourse Debt	Depending on the risk allocation, adjust financial statements to reflect the full or partial consolidation of project-related assets and debt. In some cases, the net liability may be used. Analyze cash flows after considering potential cash flow requirements.
Under executory contracts, neither an asset nor a liability is recorded.	Operating Leases Forward Purchase or Sale Commitments Take-or-pay Contracts	For operating leases, adjust financial statements to recognize both assets and liabilities. For forward purchase or sale commitments, analyze cash flows after considering potential cash flow requirements. For take-or-pay contracts, analyze cash flows after considering potential cash flow requirements or adjust the balance sheet, as appropriate.
Assets and liabilities are recognized when a loss is probable.	**Contractual:** Guarantees Standby Liquidity Facilities Letters of Credit Warranties **Non-contractual:** Lawsuits Environmental Remediation Unwinds of Tax Structures	Analyze cash flows after considering potential cash flow requirements.

Appendix 2: Potential OBS Exposures By Industry

	Banking	Insurers	Securities Firms	Aerospace	Consumer Products	Energy	Healthcare	Capital Goods	Media & Telecom	Retailing	Technology	Transport
Unconsolidated Legal Entities												
Securitization Transactions [1]	X	X	X	X	X	X	X	X	X	X		X
Risk Transference Structures [2]	X	X	X	X			X					
Pension Obligations	X	X	X	X	X	X	X	X	X	X	X	X
Joint Ventures	X	X	X	X	X	X	X	X	X	X		X
Project Finance			X		X	X		X	X			
Executory Contracts												
Lease Agreements			X	X	X	X	X	X	X	X		X
Forward Purchase or Sale Commitments			X	X	X	X		X	X	X		X
Take-or-Pay Contracts						X			X			X
Contingent Obligations												
Guarantees	X	X	X	X	X	X	X	X	X	X		X
Standby Liquidity Agreements	X	X	X									
Letters of Credit	X	X	X		X	X	X			X	X	
Warranties				X	X			X		X	X	
Lawsuits	X	X	X	X	X	X	X		X	X	X	X
Environmental Remediation				X	X	X		X		X	X	X
Unwinds of Tax Structures	X		X				X			X		

[1] Includes accounts receivables securitizations for corporates.
[2] For aerospace companies, includes revenue risk sharing agreements and insurance for residual value guarantees.

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