Securitisation in New Markets: Moody's Perspective

Author

Paris

Yaron Ernst
Head of Business Development
+33 1 5330-1027
Yaron.Ernst@moodys.com

Contacts

Frankfurt

Detlef Scholz
Group Managing Director
+49 69 70730-737
Detlef.Scholz@moodys.com

London

Frederic Drevon
Senior Managing Director
+44 20 7772-5356
Frederic.Drevon@moodys.com

Neal Shah
Team Managing Director
+44 20 7772-5440
Neal.Shah@moodys.com

Christophe de Noaillat
Vice President – Senior Credit Officer
+44 20 7772-5536
Christophe.deNoaillat@moodys.com

Middle-East Contact

Khalid Howladar
Vice President
+44 20 7772-5577
Khalid.Howladar@moodys.com

Central and Eastern Europe Contact

Daniel Mumzhiu
Analyst
+44 20 7772-8710
Daniel.Mumzhiu@moodys.com

Investor Liaison

New York
Brett Hemmerling
Investor Liaison Specialist
+1 212 553-4796
Brett.Hemmerling@moodys.com

Client Service Desk

Frankfurt: +49 69 70730-776
London: +44 20 7772-5454
Paris: +33 1 5330-1047
csdlondon@moodys.com

Website

www.moodys.com

Table of Contents

OVERVIEW

The sweeping success and growing volumes of securitisation transactions globally in recent years have attracted the attention of many players operating in new markets, where securitisation is emerging as an efficient and viable financing tool. Moody's is currently following a number of such developments, notably in Central and Eastern Europe, Africa and the Middle East.

This report examines the primary issues in these new markets, and is designed to help potential issuers, investors and transaction arrangers understand the factors that drive Moody's credit analysis.

The report also discusses the different types of rating scales that may be applied in these markets, and describes the differences between Moody's local and foreign currency ratings.

This report is an update of the original 2003 report with the same name and integrates the revised foreign-currency ceilings[1].

OBSTACLES TO SECURITISATIONS IN NEW MARKETS

Because the nature of securitisations as sophisticated financial products that are new to most participants in the new markets of Central and Eastern Europe, Africa and the Middle East, there are several important issues that should be identified in advance by the relevant parties in order to allocate time sensibly and be ready to handle the possible obstacles. The following are the typical issues that are likely to be confronted by market players when attempting to do securitisation transactions in those nascent markets.

[1] "Revised Foreign-Currency Ceilings to Better Reflect Reduced Risk of Payments Moratorium in Wake of Governement Default," May 2006.

Regulatory Issues

Does the necessary infrastructure exist to accommodate regulatory concerns?

To what extent are originators regulated?

It is important to ascertain whether or not the necessary infrastructure exists, to accommodate structural, accounting, and other regulatory concerns. These typically include issues such as what the structure of the special purpose vehicle (SPV) that issues the securities should be; whether the securities should be a form of debt or equity (i.e. including profit sharing); what limits should be set on the ability of institutional investors to invest in this type of security; regulations of the rated instruments; and the nature of the accounting and tax treatment of the transaction. In addition, the extent to which relevant originators (e.g., banks, consumer lenders) are regulated influences normally the credit quality of their products as well as their motivation to securitise.

Legal Issues

Do local laws impact issues such as bankruptcy, transfer of assets to SPV or foreclosure?

How reliable is the legal framework overall?

Parties to the transaction must analyse local laws concerning bankruptcy, transfer of the securitised assets to the SPV, tax issues, the noteholders' security interest in the assets, data/consumer protection rights, foreclosure, etc. (see *Appendix B* for specific legal issues). Legal issues have a material impact on the viability of any securitisation, particularly in new markets, where the local laws and the nature of the legal system are less well known and legal precedents may be limited or less applicable to securitisations. The overall reliability of the local legal system would certainly play a role as well.

Data Collection

Are there concerns over the consistency or accuracy of available data on assets or historical performance?

Is data compliant with international standards or reviewed independently?

Obtaining accurate data about the characteristics of the assets or the historical performance of the lender's portfolio may be difficult in new markets. Valid concerns may rise regarding the reliability or the consistency of the data. The historic data is often limited, and, with respect to "traditional" assets such as consumer or mortgage loans, is often not organised on a static pool basis.[2] Similarly, it is important to ensure that the transaction performance data, which will be prepared by the servicer on an on-going basis for monitoring purposes, conforms to international reporting standards.[3] A related issue is whether the data is normally reviewed by an independent accounting firm, and if so, how solid are the applicable accounting standards?

Unrated Originators/Servicers

An unrated originator/servicer may raise concerns

A sub-investment grade servicer may require a back-up servicer

It is often the case that originators and/or servicers in new markets are not rated, which raises questions on whether the financial condition of the servicer will allow it to service the underlying assets until maturity of the notes. Therefore, if Moody's is called in to rate a transaction, Moody's considers the need that the servicer obtain a credit rating so that Moody's may evaluate the servicer's creditworthiness. If the servicer's rating is expected to be sub-investment grade, a back-up servicer with an appropriate rating may be needed. For more details on this issue, see "Moody's Analysis" – section on Structure and Credit Enhancement.

Depth of the Local Capital Markets

Local financial market's state of development will impact viability of securitisation

The extent to which the local financial market has developed would have a strong impact on the viability of securitisation. For example, the availability and quality of hedging instruments, such as interest rate and currency swaps are important factors. Equally significant would be the overall maturity and sophistication of the local securities and debt markets.

[2] Historic performance is reported on a *static pool basis* when the performance of each loan production vintage (normally annually or quarterly) is represented separately. This enhances the analysis of the performance and relevant trends and the comparison of different years. It also removes distortion due to changes in the composition or size of the *total* portfolio, which may cloud the real performance if the reporting is on an aggregated/dynamic basis. See "Historical Default Data Analysis for ABS Transactions in EMEA," December 2005.

[3] See "Moody's Approach to European Post-Issuance Monitoring and Reporting," October 2001; "Update on Moody's Approach to European Post-Issuance Monitoring and Reporting," May 2002.

Issuers' Motivations

In most cases, securitisation offers key benefits…

Although in most cases securitisation carries important benefits to issuers in new markets, these benefits may be reduced when other cost-efficient funding sources are available. Some banks in Central Europe, for example, have a strong base of liquid assets coupled with an attractive funding rate based on their customers' deposits, which together reduce somewhat the allure of securitisation.

…but these may be reduced by individual circumstances when other cost-efficient funding sources are available

Even in that situation, however, securitisation can be attractive for a bank because of the Basel regulatory capital relief that securitisations may achieve, together with more efficient asset and liability management with the accompanying freeing up of economic capital for use elsewhere in the bank's business. And whilst non-bank corporates do not operate under regulatory capital requirements, securitisation still frees up economic capital through the risk transfer to bond holders – frequently allowing the corporates to achieve substantial savings in their overall borrowing costs.

Investors' Concerns

Local investors are frequently unfamiliar with securitisation products – Moody's research can be of value

Local investors in new markets typically have limited experience with structured finance products, given the fact that securitisation products were historically seldom seen in those markets. Moody's often works with these investors, providing them with reports setting out Moody's methodology and research on structured finance transactions in other markets.

Local investors' concerns are normally amplified by the unique nature of structured finance securities, which do not have the standard profile of a corporate bond, and whose maturity and internal enhancement are greatly influenced by the underlying assets' prepayment rate.

Foreign investors may have concerns about the new market

Foreign investors, on the other hand, often have experience with securitisations in other countries, but very little knowledge about the underlying new market. They may need to overcome a variety of concerns about the perceived risks associated with new countries. Moody's works closely with government officials, local lawyers, bankers and potential originators in order to bridge the knowledge gap of international and local investors and address the issues specific to each market.

Country Ceiling and Foreign Exchange Moratorium Risk

Cross-border deals' ratings may be subject to the risk of a moratorium on FX debt payments

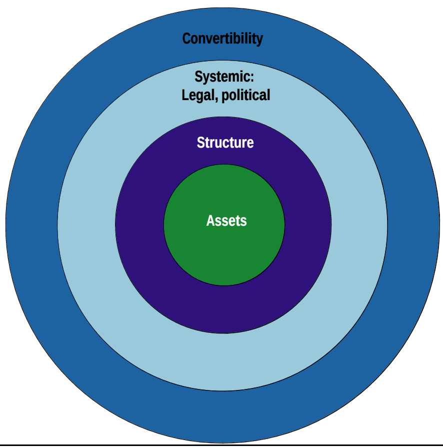
Cross-border transactions require specific analysis regarding the potential limit that could apply to the rating of the notes because of the potential default of a government and the possible application of a moratorium by a government on all foreign currency debt (or other) payments in times of crisis. The possibility of a securitisation transaction obtaining a rating higher than the country foreign currency ceiling is discussed in greater detail in the section "Moody's Rating Scales".

THE VARIOUS RISK LAYERS

In order to understand the differences between the different rating scales, it is helpful to review the various layers of risk that affect any securitisation in a new market. Chart 1 describes these risks.

Chart 1:

The Risk Layers Affecting Securitisation in New Markets



Any securitisation in a new market will be subject to different layers of risk, with regard to (i) the assets; (ii) its structure; (iii) systemic issues in the local market; and (iv) convertibility, transferability and expropriation

Assets – These risks are directly related to the assets being securitised. They are the "traditional" factors of credit risk, including the creditworthiness of the underlying obligors; the characteristics of the assets; the availability and value of a security interest, if any; and the diversity of the pool (e.g. geographic location and industry type, etc.).

Structure – Structural risks are those that may be responsible for a payment default on the notes despite the cash generated by the underlying assets. Defaults could occur, for example, as a result of a rise in interest rates when a transaction's underlying assets yield fixed rate returns, but the notes have floating interest rates. In addition, cross-border transactions would naturally be exposed to foreign-exchange devaluation risk, and in most cases will need a related hedging, typically a foreign currency swap.

Another example would be a payment shortfall on the notes resulting from a timing gap between the incoming and out-paid cash flows. Structural risks also include those related to the allocation of interest and/or principal payments among the various classes of noteholders, based upon the structure's "waterfall".[4]

Systemic – Systemic risks are domestic risks that affect all debt issuers within a country. They include legal risks, such as the enforceability of contracts and the efficiency of the judicial system, political risks (e.g. the stability of the administration and the risk of political interference), as well as efficiency of the financial markets (e.g. payment and clearing systems, accounting and reporting standards). Each country's systemic risks are reflected in the country's Local Currency Guidelines, which suggest the maximum possible rating in such country for a local currency obligation.

Convertibility, transferability, expropriation and redenomination – In cross-border transactions, the assets normally generate cash flows in the domestic currency, while the securities backed by those assets are denominated in a "hard" foreign currency, normally Euros or U.S. dollars. Regardless of the credit strength of the underlying assets, the issuer might default on the payment of (foreign currency) interest or principal on the notes if the government were to impose a moratorium on all foreign currency debts because of a financial crisis in the country. Convertibility risk is thus the risk that, in a national crisis, the government might impose a foreign exchange moratorium in order to reduce the flow of hard currency out of the country.

Transferability risk is similar to the convertibility risk discussed above, except that it concerns a scenario in which the conversion to foreign currency may be accomplished but no payments/ transfers in foreign currency can be made to external parties.

However, it was observed that governments are often reluctant to impose a moratorium despite defaults on their own (government) debt. Indeed, such moratoria were avoided in the late 1990s in several countries including Ecuador, Pakistan and Russia. Expropriation risk involves a situation in which a government, in a financial crisis, takes over assets or accounts of local parties.

Redenomination risk – a risk that has been seen in the past when countries have changed the contractual currency for which debts have been due. For instance in Argentina in 2000-2001, the government redenominated domestic loans and foreign currency obligations. Mortgage loans previously denominated in US dollars were converted into local pesos at a much devalued exchange rate in order to ease the debt burden on obligors.

Moody's 'joint default' method measures the probability that a government will apply a moratorium to a private-sector obligation in foreign currency

Moody's sovereign approach uses the ***"joint default" method*** to measure the probability that a government may apply a moratorium to a private sector obligation in foreign currency. The joint-default method is calculating the probability of the combined event of: (1) sovereign foreign currency crisis, leading to, (2) general payments moratorium, and (3) no exemption is available for the foreign currency bond/note.

[4] A transaction's "waterfall" is the legally binding order by which the transaction's payments should be made by the issuer. This order of payments, which is contained in the deal's documents, sets forth the priorities among the noteholders and other third parties, such as the servicer, the swap counter-party, the cash manager, the administrator, the security agent, etc. It also sets priorities concerning payments of interest and principal among noteholders of the various classes of notes.

The joint-default method is therefore using the variables: (1) the probability of default by the government; (2) the probability of default of the issuer in local currency; (3) the correlation between the government default in foreign currency and the issuer default in local currency; (4) the Moratorium factor ("M"), indicating the probability of a moratorium in the country; and (5) the probability that the rated obligation would be subject to an exemption by the government. For more details about Moody's sovereign approach and the joint-default method, see Moody's rating methodology.[5]

As a result of the small probability of the combined event as described above, transferability and convertibility risk is smaller than it used to be perceived in the past. **Accordingly, Moody's Sovereign Unit revised countries' foreign currency ceilings.** The new foreign currency ceilings[6] are the result of applying the joint-default method, while using: (a) the government probability of default, and (b) the probability ("M") of moratorium in the country. Achieving a rating that is higher than the foreign currency country ceiling remains possible, and is explained in the "Global Rating Scale" section below.

MOODY'S RATING SCALES

Moody's offers to assign structured finance ratings on securitisation transactions using two different rating scales: the Global Scale and the National Scale. In addition, ratings under the Global Scale could apply to obligations in foreign currency (Global Scale Ratings) or local currency (Global Local Scale Rating). Moody's analysis, which depends on the scale that is used, is described in more detail below.

The Global Scale Ratings

Moody's Global Scale Ratings are comparable across countries, regardless of debt type or nature of issuer

Ratings under the global rating scale are the "traditional" Moody's (foreign currency) ratings that are used for all international debt instruments rated by Moody's. Global Scale Ratings are comparable across countries irrespective of the type of debt used (structured or regular bonds or loans) or the issuer's nature (corporate, bank, government or SPV).

This foreign currency rating is constrained to some extent by foreign exchange convertibility and transferability risk — the possibility that the government might impose a moratorium on all debts during a foreign currency crisis.

Moody's structured finance analysts work closely with our sovereign analysts to assess the probability and length of any moratorium in a given country.

With respect to future flow transactions where the structure offsets the convertibility and transferability risks,[7] the rating would normally be linked to some extent to the originator's local currency rating, simply because the ability to continue and generate the future receivables will be linked to the originator's creditworthiness. In cases where a substantial part of the transaction's cash flows are originated and retained offshore, the rating could be higher than the country ceiling, assuming that the originator's local currency rating is higher than the country foreign currency ceiling. This will be subject, of course, to the complete separation of these funds from the sovereign's reach, and appropriate legal opinions on the relevant issues.

Revised Country Ceilings

'Below the revised country ceiling the foreign currency rating of a transaction will be the same as its local currency rating.

As explained above, Moody's revised country ceilings already take into account the probability that a Government would impose a moratorium. As a result any local currency rating of a structure's obligation, when below the revised country ceiling, will be equal to the foreign currency rating.

[5] "Piercing the Sovereign Ceiling: An Update," January 2005; "Revised Policy with Respect to Country Ceilings," November 2005.

[6] The new foreign currency ceilings are listed in "Revised Foreign-Currency Ceilings to Better Reflect Reduced Risk of a Payments Moratorium in Wake of Government Default," May 2006.

[7] A future flow transaction is a securitisation of receivables not yet in existence, so that the underlying payments to the originator are conditioned upon the originator's staying in business. Examples would include credit card deals, backed by clients' future purchases with their cards, or telecommunication transactions, supported by customers' payments for future use of telephone lines.

Example:

The structure involves a securitisation of consumer loans in country X. The Government debt rating is **Ba1**, the country ceiling is **Baa1**, and the country's local currency guidelines (LCG) are **A3**.

Moody's Structured Finance rating committee concludes that the *local currency* rating of the structured obligation is **Baa2**. This rating was determined to be lower than the Country LCG due to some concerns about the legal issues related to securitisation in that country and the limited available data. The structure will be rated **Baa2** on the foreign currency global rating scale.

Piercing the country ceiling

Structural features may mitigate the moratorium risk, thus enabling the foreign currency rating to pierce the country ceiling

If the local currency rating of the structure was higher than the revised country ceiling,, the structure would need to mitigate the consequences of a moratorium to a comfort level higher than the revised country ceiling, This can be achieved via structural features such as an off-shore liquidity facility or a political risk insurance (PRI) policy to cover transferability and convertibility risk. If such an appropriate protection is provided to the structure, the ultimate *foreign currency* rating on the notes could be identical to the *local currency* rating on the structured obligation, which would be based on the quality of the assets, the structure and the country's systemic risks.

Using liquidity facility[8]

The liquidity facility agreement should specifically provide that it will be used to cover political risk, including transferability and convertibility risk. In some cases it may need to also cover expropriation risk, which is the risk that in time of financial crisis the government might take direct or indirect control over the issuer's accounts or assets. The facility should be of sufficient size so that it could cover all payments due under the notes during the expected period of any foreign exchange moratorium. Moody's would evaluate closely the terms under the liquidity facility agreement, including the maximum available amount and the payment procedures. The financial strength of the liquidity provider will be also assessed.

Using political risk insurance (PRI)[9]

As regards a PRI policy, Moody's will closely analyse the likelihood that the insurer will settle promptly if a valid claim is made under the policy. Among the factors that will be analysed:

- the rating of the PRI provider
- the nature of business of the PRI provider (whether providing PRI is a material part of the provider's business)
- the strength of the PRI policy in general
- the coverage of the various risks under the policy, including transferability, convertibility, expropriation and redenomination risk
- the delay between the time in which the claim is made and the payment by the provider
- any exceptions to such payment under the PRI policy
- whether the PRI policy covers only payments of interest or also principal
- whether the rating applies only to the timely payment of interest or also to the timely payment of principal
- whether liquidity is available for the time gap between the political event and PRI being made available

8 See "Liquidity Facilities in European Term Securitisations," August 2002.

9 See "Moody's Approach to Rating Securities that Benefit from Political Risk Insurance, Rolling Reinstatable Guarantees and B Loan Participations," Moody's Special Report, June 2002.

The Local Currency Rating

Local currency ratings are capped by the relevant Moody's Local Currency Guideline…

…unless there are offshore credit enhancements

Naturally, the foreign currency transferability and convertibility risk is irrelevant for notes denominated in local currency. Instead, ratings of local currency notes are generally capped by Moody's Local Currency Guideline ("LCG") for that country, which incorporates the country's *domestic* systemic[10] risks, which include political, legal and financial system risks (see description in previous section). The LCG is an indication of the likely highest possible local currency rating for a given country, which applies to all issuers domiciled in that country (see *Appendix A* for the LCG of selected countries).

In order to achieve a rating higher than the LCG, additional off-shore credit enhancements would be needed such as bond insurance, cash reserves, letters of credit or other external guaranties from appropriately rated parties.

The National Scale Ratings[11]

National Scale Ratings, developed for specific markets, solely address domestic factors and are not comparable across countries

Moody's has also constructed specific National Scale Ratings for several countries (e.g. Russia, South Africa, Brazil and Mexico). These rating address factors which are assessed based solely on domestic analysis. Ratings on a national scale are not comparable with any other ratings outside of that country. National Scale Ratings are indicated by a two-letter suffix for the country that follows the rating (e.g., **Aaa.br** for Brazil).

Table 1:
Comparison of Moody's Structured Finance Rating Scales

Rating Scale	Globally Comparable?	Risks Covered	Rating Ceiling
Global Rating Scale Foreign Currency Rating)	Yes	All risks, including convertibility, systemic, asset-related and structural	Determined by Moody's sovereign approach, combining the local currency rating of the structured obligation and the foreign currency country ceiling. If sufficient liquidity /PRI is used, it would be capped by the local currency rating of the structured obligation (which would in turn be capped by the country Local Currency Guideline)
Local Currency Rating	Yes	Systemic, asset-related and structural	The local currency rating of the structured obligation (which would in turn be capped by the country Local Currency Guideline)
National Scale Rating	No	Assets-related and structural	No ceiling, i.e., Aaa.nn

MOODY'S ANALYSIS

Moody's analysis combines traditional analysis of asset pool with relevant local legal issues and systemic risks

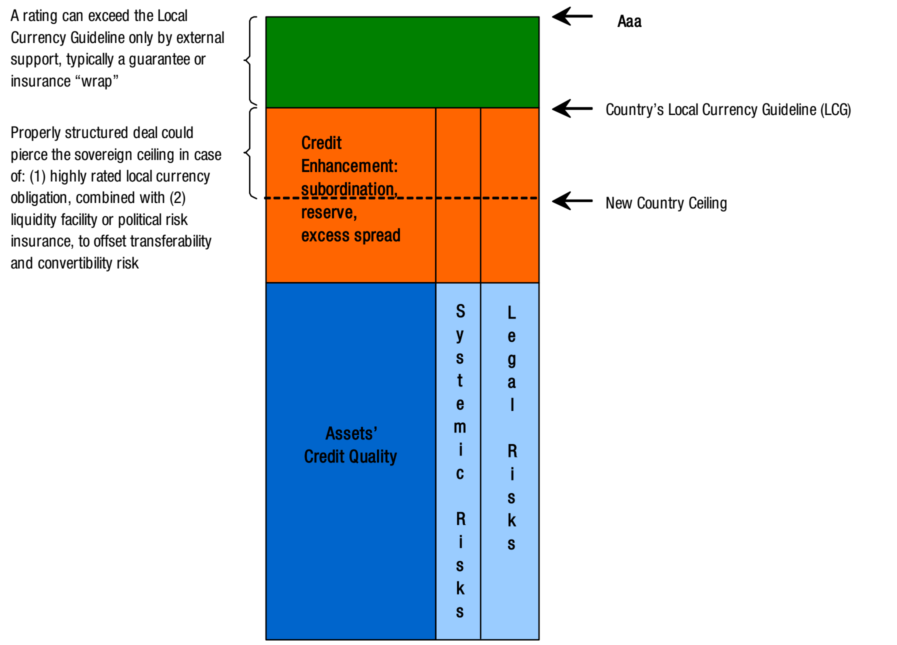
Various risk factors are considered in Moody's rating analysis of securitisations in new markets, and the interaction between them will determine the ultimate rating of the issued notes. In addition to being driven by a traditional analysis of the asset pool, the rating will also be affected by the country's unique legal issues and systemic risks. Furthermore, the "ceiling" of the rating will depend on the country rating, the level of moratorium risk, the Local Currency Guideline, and the form of any external credit enhancement included to mitigate default risk and foreign exchange moratorium risk. *Chart 2* illustrates the interaction among these factors.

[10] See "Moody's Approach to Embedding Systemic Risk in the Rating Analysis and to Piercing the Local Currency Guideline in Structured Transactions," Moody's Special Report, July 2001.

[11] A detailed description of a National Scale Rating is beyond the scope of this report. Given the unique nature of National Scale Ratings, which are tailored specifically for each country, the discussion of such a scale should be done separately on a country-by-country basis.

Chart 2:

The Interaction Between Credit Enhancement Features and the Different Rating Levels



The following are the typical steps taken by Moody's in its analysis of securitisations in new markets.

1. Assets Analysis[12]

Credit quality of underlying assets is key driver of notes' ratings

The credit quality of the underlying assets remains the most important driver of the credit ratings of the notes issued. The analysis focuses on the probability of defaults amongst the assets, the chance of recovery in the event of defaults (including the length of any delay in recoveries), and the uncertainty associated with these default probabilities and recoveries. The assets analysis is used by the Moody's credit committee to determine the portfolio's expected loss.

It is important to note that the assets' analysis includes also the risk of redenomination, currency devaluation or local interest rate fluctuations, i.e., any scenario in which the government could apply certain measures that would result in a reduction of the value of the local receivables and/or assets. These risks are distinguished from transferability or convertibility risks (see "Foreign Exchange and Moratorium Risk" section below), because they affect the value of the underlying receivables and/or assets in local currency, regardless of convertibility to foreign currency. Regarding redenomination, if not covered by an external insurance or other structural feature, Moody's typically applies a probability weighted approach to cover for this risk. This approach is applied when assessing the capital structure of the transaction and typically results in additional credit enhancement requirements especially for classes of Notes, whose target rating is above the government rating. If this approach is applied, Moody's will highlight in its Pre- Sale Report the link between the ratings on the Notes and the rating of the country.

[12] An explanation of Moody's general methodology for analysing the various types of securitisations is beyond the scope of this report, which focuses solely on the unique aspects of new markets. For references of Moody's general methodology reports, see *Appendix C*.

2. Legal and Regulatory Issues

Legal issues are analysed in any securitisation, but are particularly significant in new markets

The legal issues that are typically analysed in any securitisation receive particular attention when a transaction takes place in a new market, given most players' relative unfamiliarity with the local laws, the lack of securitisation-related precedents, and the potential problems that can arise if there are legal uncertainties as to how a securitisation will be treated. These may significantly affect the viability of a securitisation. Questions associated with such legal uncertainties include:

1. Could the 'true sale' of the assets to the SPV be challenged in the event of the originator's insolvency ('claw back')?
2. Does usury law cap the interest rates charged on a consumer receivables portfolio?
3. Can a security interest on the assets only be assigned to the SPV after a formal registration process, which may be long and costly?

For a more detailed list of potential legal issues, see *Appendix B*.

3. Structure and Credit Enhancement

Moody's analyses the allocation of transaction cash flows and priorities of payments, and suggested internal credit enhancements, as well as external structural enhancements

For any securitisation, the structure of the transaction has a significant impact on the risk profile of the issued notes. Moody's analysis focuses on the allocation of transaction cash flows and priorities of payments (i.e., the payment "waterfall"), and the suggested components of internal credit enhancements such as a reserve account, capture of excess spread, over-collateralisation, or inclusion of subordinated notes. Moody's will also assess the effectiveness of external structural enhancements such as interest rate and currency hedging arrangements, and liquidity facilities.

The level of credit enhancement provided by such instruments is determined based upon the targeted rating levels for the issued classes of notes, the expected loss of the assets, and taking into consideration the country's political risks (see next subsection). For example, if the transaction's target rating is not expected to pierce the country ceiling, credit enhancement will only be needed up to that rating level. Conversely, if the target rating is above the country ceiling, the credit enhancement of the pool (and possibly structural enhancements to mitigate convertibility and transferability risk) will need to be structured accordingly (see *Chart 2*).

Moody's assignment of the ultimate rating and any required enhancements will be based on Moody's expected loss approach[13] for each class of notes.

In addition, Moody's will evaluate the creditworthiness and ability of all third parties to adequately perform their roles. These will include swap counterparties,[14] liquidity providers[15] and servicers[16].

Because servicers are frequently not rated in new markets, or have only a sub–investment grade rating, an appropriately rated back-up servicer may be needed so that the rating of the notes can reach investment grade. Moody's evaluates the need for such a back-up on a case-by-case basis, while taking into account: (a) the type of the underlying assets and the level of sophistication expected from the relevant servicer, (b) the portfolio's size, (c) the nature of the local market and the availability of qualified servicers for these assets, (d) the unique position of the originator/servicer in that country, including competition-related issues, and (e) related legal issues.

[13] For a detailed explanation of Moody's expected loss approach, see the reports referenced in Appendix C.

[14] See "Framework for De-Linking Hedge Counterparty Risks from Global Structured Finance Cashflow Transactions, Moody's Methodology," May 2006.

[15] See "Liquidity Facilities in European Term Securitisations," August 2002.

[16] See "Asset-Backed Servicer Quality ("SQ") Ratings in EMEA: Moody's Methodology," April 2005.

4. Foreign Exchange and Moratorium Risk

Analysis of FX and moratorium risk relies on input from Moody's Sovereign Team

As discussed previously, Moody's Sovereign Team provides feedback with analysis combining the local currency rating on the structured obligation and the foreign currency rating of the sovereign. In case an external support is provided to protect against moratorium risk, the Sovereign Team also advises regarding the possible length of such moratorium in that country, which would define the required length of such external support (PRI or liquidity facility).

Moody's analysis will also take into account the nature of the issuer and the unique aspects of the transaction. For example, an issuer (or an industry) that is vital to the country's economy and for whom a default on foreign currency-denominated instruments may prove exceptionally disadvantageous may be exempted by the government from a moratorium (moratoria are generally instituted to help domestic borrowers avoid insolvency, they are not meant to penalise them). Similarly, if most of the transaction's cash flows are derived and retained offshore, the structure itself may shield the securities, at least partly, from moratorium risk.

If the combined result is below the target rating of the transaction, it is likely that the structure would have to use an external support, such as PRI or liquidity facility, to offset transferability and convertibility risk. Based on all of the above factors, a credit committee will then determine the required size and length of such structural enhancement needed to mitigate the transferability and convertibility risk. Moody's will also analyse the exact terms of any such liquidity facility or insurance policy, as well as the creditworthiness of the enhancement provider, in order to determine the benefit to the transaction.

5. Systemic Risks – Local Currency Guidelines

Moody's assess risks affecting all issuers in the country in question

As discussed above, these are Moody's assessment of the country's inherent domestic risks including political risks, legal uncertainties, and the efficiency of the local financial markets. These risks affect all issuers within the country. Moody's structured finance analysts continue the discussion with Moody's sovereign risk unit concerning the country Local Currency Guidelines, and will evaluate what additional systemic risks that are relevant for the structured transaction need to be addressed. As illustrated by *Chart 2*, the ultimate local currency rating of the structure may be below the country's Local Currency Guidelines due to the above risks.

6. Additional External Credit Enhancement

External credit enhancement is required to obtain a rating above the Local Currency Guideline

As the deal's ratings are constrained by the country's Local Currency Guideline, to obtain a rating above the LCG, additional external credit enhancement from outside the country will be required. External credit enhancement may be obtained through a note insurance policy (typically a "wrap" by a monoline insurance company), an offshore guarantee, or a letter of credit from an appropriately rated party.

Selected Countries' Ceilings and Local Currency Guidelines (As of 31 August, 2006)

Table 2:

	Country	New Foreign Currency Country Ceiling	Local Currency Guideline (LCG)
Central/Eastern Europe	Bulgaria	**A1**	**Aa3**
	Croatia	**A1**	**Aa1**
	Czech Republic	**Aa1**	**Aaa**
	Estonia	**Aa1**	**Aaa**
	Hungary	**Aa1**	**Aaa**
	Kazakhstan	**Baa1**	**A1**
	Latvia	**Aa1**	**Aaa**
	Lithuania	**Aa1**	**Aaa**
	Poland	**Aa1**	**Aaa**
	Romania	**A2**	**Aa3**
	Russia	**A2**	**A1**
	Slovakia	**Aa1**	**Aaa**
	Slovenia	**Aaa**	**Aaa**
	Ukraine	**Ba3**	**A3**
Africa	Egypt	**Baa2**	**A3**
	Morocco	**Baa2**	**A3**
	South Africa	**A2**	**Aaa**
	Tunisia	**A3**	**Aa2**
Middle-East	Bahrain	**A2**	**Aa2**
	Israel	**Aa1**	**Aa1**
	Jordan	**Baa3**	**A3**
	Kuwait	**Aa3**	**Aa2**
	Lebanon	**B2**	**Ba1**
	Oman	**A2**	**Aa2**
	Qatar	**Aa2**	**Aa2**
	Saudi Arabia	**A1**	**A1**
	UAE	**Aa2**	**Aa2**
Other	Cyprus	**Aa1**	**Aaa**
	Greece	**Aaa**	**Aaa**
	India	**Baa2**	**Aa3**
	Turkey	**Ba1**	**A2**

APPENDIX B

Legal Issues Frequently Encountered in New Markets[17]

Borrower/Loan Related

- Enforceability of loan documents, including the underlying security (if any)
- Average time to enforce security and average recovery costs
- Enforceability of prepayment penalties
- Usury law – Can the interest rate of the loan be modified/capped?
- Consumer protection laws – Are there any limits on the data that banks/lenders can share with investors or other third parties?
- Setoff – Are borrowers allowed to offset their deposit-related claims against the loan amount they owe to a bankrupt bank?

Transfer of Receivables

- Is a notification to borrowers needed? If so, what are the implications if no notice is given?
- Are there any other requirements in order to perfect the transfer of the receivables? Is there any registration required in connection with certain assets (e.g., mortgage loans)?
- Is there a stamp tax or transfer tax?
- True sale – What is the possibility that a court would re-characterise the transfer as a secured loan in case of the seller's bankruptcy? Is there relevant case law?
- Claw back – How far back in time can a court go to cancel the transfer, in the case of a fraudulent conveyance or a preference?

SPV

- Is there a specific law for its structure and conditions?
- Is there a minimum capital required? Restricted actions? Minimum number of officers? etc.
- Is the SPV and/or its assets legally segregated from its affiliates and/or creditors?
- Is it eligible to file for, or be placed in, bankruptcy? If so, how will the underlying assets be treated in its bankruptcy?
- Can substantive consolidation be applied by a court to consolidate the assets of the SPV with those of any of its affiliates? If so, what are the relevant factors under the relevant case law?
- Are non-petition clauses enforceable against creditors of the SPV?

Bankruptcy – General

- Is there a specific bankruptcy law? What are the main principles?
- Is only liquidation available, or also re-organisation?
- What is the typical time frame of the proceedings?
- In general – How are secured creditors treated differently from unsecured creditors?
- What is the typical priority order of claims?
- Who has the capacity to decide on the plan of liquidation/re-organisation? The judge? An administrator/trustee? A vote of creditors?
- How can claims (secured or unsecured) or their priority be modified during the proceedings?

[17] This appendix is only intended to provide a general overview of the legal issues that often arise in securitisations in new markets. Most of these issues are relevant also in the context of established securitisation markets. However, they need to be especially verified in new markets, where the familiarity with the legal system is weaker, there have normally been very few securitisations so far, and often investors and analysts cannot read the documents in their original language. This list does not purport to be exhaustive, and market participants should seek specific legal advice concerning a given transaction in a specific country. Naturally, the legal issues may vary greatly depending on the country and the type of transaction.

Tax

Are any of the following taxes applicable, and if so, what is the taxation rate?

- Taxation on the revenues of the SPV
- Stamp or transfer tax - with respect to the transfer of receivables
- Value added tax (VAT)
- Withholding tax – applied to the payments made by the SPV to investors
- Other taxes under securities laws

APPENDIX C - RELATED MOODY'S RESEARCH

General Methodology – Assets

Rating Methodologies

- Moody's Individual Loan Analysis for German RMBS, July 2003 (SF24240)
- Moody's Approach to Rating UK RMBS, April 2005 (SF47735)
- Update on Moody's Real Estate Analysis for CMBS Transactions in EMEA, June 2005 (SF57645)
- Moody's Rating Approach to European Covered Bonds, June 2005 (SF57011)
- Moody's Approach to Rating Trade Receivables Backed Transactions, July 2002 (SF14091)
- CDO: A Moody's Primer, July 2005 (SF52193)
- Understanding The Risks In Credit Default Swaps, March 2001 (SF10197)
- Stopping for Yield: Moody's Approach to Evaluating Esoteric Assets in CBOs and CLOs, December 1999 (SF8201)

Special Reports

- Moody's European Country Tiering for CMBS Recovery Rate Assumptions: Focus on Key Jurisdictions, January 2005 (SF45047)
- European Covered Bond Legal Frameworks: Moody's Legal Checklist, December 2005 (SF66418)
- Historical Default Data Analysis for ABS Transactions in EMEA, December 2005 (SF64042)
- Moody's Approach to Rating European Auto ABS, November 2002 (SF17579)

General Methodology – Structure and Other

Special Reports

- Shari'ah and Sukuk: A Moody's Primer, May 2006 (SF74488)
- CDOROM v2.3 User Guide, March 2006 (SF71280)
- Clawback Risk in EMEA Securitisation Transactions, March 2005 (SF34076)
- Liquidity Facilities in Term European Securitisations, August 2002 (SF15810)
- A Users Guide for "Moody's Analytical Rating Valuation by Expected Loss" ('MARVEL'), May 2001 (SF10019)
- Triggers in Securitisations, January 2000 (SF8229)
- Rating Mezzanine Securities in Structured Finance Transactions: The Impact of an Expected Value Approach, February 1999 (SF7297)
- Subordination, Diversification and the Expected Loss Approach to Credit Risk, February 1997 (SF5621)
- Introduction to Moody's Analysis of Securitization Transactions and Structures, reprinted June 1995 (SF2738)

Rating Methodologies

- Cash Flow Analysis in EMEA RMBS: Testing Structural Features with the MARCO Model, January 2006 (SF58290)
- Framework for De-linking Hedge Counterparty Risk From Global Structured Finance Cash Flow Transactions: Moody's Methodology, May 2006 (SF73248)
- Moody's Modelling Approach to Rating Structured Finance Cash Flow CDO Transactions, September 2005 (SF62420)
- The Combined Use of Qualitative Analysis and Statistical Models in the Rating of Securitisations, July 2001 (SF10814)
- The Lognormal Method Applied to ABS Analysis, July 2000 (SF8827)

Systemic Risks and Local Currency Guidelines

- Moody's Approach to Embedding Systemic Risk in the Rating Analysis and to Piercing the Local Currency Guideline in Structured Transactions, July 2001 (SF10850)
- The Usefulness of Local Currency Ratings In Countries with Low Foreign Currency Country Ceilings, July 1999 (SF7768)
- Local Currency Guidelines, March 1998 (SF6361)

Foreign Exchange Convertibility and Moratorium Risk

- A Guide to Moody's Sovereign Ratings, August 2006 (SF)
- Revised Foreign-Currency Ceilings to Better Reflect Reduced Risk of Payments Moratorium in Wake of Governement Default, May 2006
- Revised Policy with Respect to Country Ceilings, November 2005
- Piercing the Country Ceiling: An Update, January 2005
- Moody's Approach to Rating Securities that Benefit from Political Risk Insurance, Rolling Reinstatable Guarantees and B Loan Participations, June 2002
- Using External Credit Support To Mitigate Sovereign Risk And Pierce The Country Ceiling In Structured Transactions, May 2000
- Moody's Sovereign Ratings: A Ratings Guide, March 1999

Representative Deal Reports

- CityMortgage MBS Finance B.V. (Russia), July 2006
- Russian Mortgage Backed Securities 2006-1 S.A. (Russia), June 2006
- HCF Funding No. 1 B.V Series 2006 (Czech Republic), June 2006
- Garanti Diversified Payment Rights Finance Company Series 2006-A (Turkey), April 2006
- Russian Consumer Finance No.1 S.A. (Russia), March 2006
- Red Arrow International Leasing (Russia), March 2006
- Alfa Diversified Payment Rights Finance Company S.A. (Russia), March 2006
- ROOF CEE 2006-1 (Poland & Czech Republic), March 2006
- Eurasia Structured Finance No. 1 (Russia), January 2006
- Russian Standard Bank – Servicer Report (Russia), January 2006
- Kazkommerts DPR (Kazakhstan), November 2005
- Russian Auto Loans Finance (Russia), July 2005
- Petroleum Export Limited (Egypt), July 2005
- Akbank Remittance Trust Securitisation Limited (Turkey), June 2005
- ENSeC Home Finance Pool 1 (Dubai), April 2005
- Baltic-American Mortgage Trust (Latvia), December 2004
- Russia International Card Finance (Russia), November 2004
- Finansbank A. . – Finans Capital Finance Limited Step-Up Callable Subordinated Notes due 2014 (Turkey), September 2004
- HCF Funding No. 1 (Czech Republic), January 2004
- Halyk Remittances Finance Company (Kazakhstan), December 2003
- Polish Retail Properties Finance PLC (Poland), October 2003

SF74362isf