

Commentary

Emerging Credit Risks in Project Finance Transactions

Morningstar DBRS

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Managing Director Asset, Project, and Sports Finance +1 416 597-7438 arthi.sambasivan@morningstar.com A project finance transaction is designed to enable a project to generate stable cash flow through a single-purpose vehicle to periodically pay down debt and make equity distributions to its owner.

Normally, it does not have the business risk that a traditional corporate credit entails. Instead, under a project finance structure, revenue volatility is reduced through one or more long-term revenue contract(s) with a creditworthy counterparty(ies). Additionally, operating risk is passed down to an experienced operator through an operating and maintenance contract. Historically, project finance debt fully amortizes at a fixed interest rate with no refinancing risk. In addition, a project finance transaction is expected to be structured with tight restrictive covenants to offer additional protections to debtholders. As a result of these significant risk mitigants, a project finance transaction can withstand more leverage than what a typical corporate business can sustain.

Nonetheless, project finance transactions, which historically were dominated by power generating projects, have spread rapidly into other fields and asset classes, including energy infrastructure (e.g., oil and gas pipelines and refineries, electric transmission assets); essential digital infrastructure (e.g., data centers, telecommunication towers, and fibre optic networks); and other intangible assets (e.g., revenue contract monetization of identifiable and transferable intellectual property rights). These emerging fields have propelled project finance as a popular tool for sponsors to secure alternative debt financing solutions.

We believe the expansion of the project finance universe has introduced both opportunities and challenges. The emerging risks identified below are not new credit risks per se; rather, they are risks that were less commonly experienced in project finance in the past. The analysis and mitigation of these risks, however, may require a more granular approach, given the high leverage in project finance transactions. This commentary provides a summary of our general view of these emerging credit risks/trends and the potential credit implications for the stakeholders evaluating them.

Refinancing and/or Recontracting Risk

We have seen an increase in refinancing and/or recontracting risk in recent years, as partially amortizing debt and shorter contract terms have become more prevalent in project finance transactions. These risks are especially common within the project transactions to finance data centers and other digital infrastructure assets. Refinancing and recontracting risks are intertwined but distinctive concepts. The following table summarizes the three commonly observed refinancing and recontracting features in project transactions.

Type	Debt Structure	Refinancing	Recontracting	Risk
		Risk	Risk	Assessment
1	Partially amortizing debt with significant remaining revenue	Yes	No	Managable
	contractual tail			
2	Partially amortizing debt with debt maturity coinciding with	Yes	Yes	Case by Case
	contract renewal			
3	Fully amortizing debt with exposure to recontracting/merchant risk	No	Yes	Case by Case

The risk of a type 1 transaction is generally considered manageable as the main risk is the potential for rising interest rates at the refinancing point. This risk can be effectively managed through conservative debt sizing by assuming stressed refinancing interest rates, inflation-linked revenue contracts, and a mandatory cash-sweep feature to accelerate debt payments for the refinanced debt when certain triggers are hit. For transactions with type 2 or type 3 structures, we view the credit risk as being higher. Both types of transactions involve recontracting risk and require case-by-case analysis that considers the assets' essentiality, replaceability, and market competitiveness in the future. For instance, UK rolling stock assets have a much higher certainty of recontracting at the renewal point than that of a power generating plant; a hyperscale data center, which is essential to the anchor tenant's operations, located in a prime location, with significant upfront capital and access to clean and affordable energy supply, will have a much better likelihood of having its contract renewed than less competitive co-location facilities. Relative to type 3 transactions, we believe that type 2 transactions do not necessarily increase the overall risk by having additional refinancing risk. This is because type 2 transactions offer structural flexibility, such as a cash sweep option during the refinancing period, to mitigate the recontracting risk, while the structure of type 3 transactions is fixed throughout the debt term. The refinancing/recontracting risk may or may not affect a project's overall credit risk or credit ratings, depending on the materiality of such risk. As described in more detail in Global Methodology for Rating Project Finance and Global Methodology for Rating Essential Digital Infrastructure, we may use additional credit metrics such as project loan coverage ratios to refine our assessment of the overall impact from the refinancing/recontracting risk in certain circumstances.

Heightened Structural Complexity

In recent years, the demand for global investment in new essential infrastructure assets has accelerated with sponsors looking to partner with other investors with access to significant financial resources and expertise. For a co-investor who purchases a minority interest in the project, that interest is often indirectly secured against the project's cashflows (through shares in the operating project company), which ensures alignment of interest between the sponsor (often the majority owner) and the minority investor/shareholder. These holding company structures are often used to raise financing outside the ringfenced project company as a means to meet multifaceted purposes including debt raising flexibility, tax efficiency, and accounting objectives. Some of these transactions depend completely on monetization of the underlying contractual arrangements with little dependence on the underlying project assets where there is little project performance risk or such risk is largely passed down to a highly experienced operator with strong credit quality. Contractual restrictions on the majority holder's ability to dilute or sell its interests are closely evaluated, along with the protections afforded to the

minority investor with respect to key decisions concerning the project's overall business and its dividend policy (reserve matters).

In other cases, the boundary between corporate and project finance can be blurred, especially in newer asset classes, such as a standalone fibre optic projects where the very nature of essentiality of the asset must allow for certain operational flexibility. These newer financing structures aim to strike a balance between requiring tight restrictive covenants needed to mitigate the high leverage and recognizing the transaction structure needs to allow certain flexibility for such assets to stay competitive, with future expansionary capital spending at management's discretion. The structural complexity alone does not necessarily introduce additional risk to a transaction. However, we believe overall credit risk and ratings may be adversely affected by structural subordination of debt at the holding company level that is not otherwise mitigated by, for example, satisfactory control of reserve matters by the minority investor/holding company and/or a transactional structure that appropriately insulates the project and related cashflows from additional credit risk.

Counterparty Volatility

Traditional power generating projects are contracted with highly rated utilities with stable credit profiles. A project's rating is generally lower than the rating of the revenue counterparty. As a result, a change in the operating project's credit risk is primarily driven by the project's standalone risk, as opposed to a change in the counterparty's credit profile. This, however, has changed in recent years when a non-utility company enters into a power purchase agreement as the revenue counterparty, or an oil and gas upstream company pays the pipeline project under contract. The credit risk of the revenue counterparty in these transactions can be more volatile, which in turn may increase the volatility of a project's rating. In such cases, the project lenders are exposed to not only the project's standalone risk but also the higher volatility of the counterparty's credit quality.

Merchant Risk

A merchant project usually refers to a merchant power generating project that sells uncontracted output to the market. In recent years, merchant renewable power projects (solar, wind, and hydro power) have gained significant traction in the marketplace. The cash flow of a merchant power project is exposed to the volatility of the wholesale power prices and production volume. Among the merchant projects, the credit risks can vary significantly depending on the specific generating technology. In general, merchant renewable power projects share similar characteristics and have much lower risk profiles than that of merchant thermal generating projects. This is because renewable generating projects do not incur fuel cost to generate power, with virtually 100% gross margin. We believe merchant projects are inherently riskier than contracted projects. However, well-structured merchant renewable power projects with robust debt service coverage ratios could obtain investment-grade ratings.

Nascent Technology Risk

As technology matures in the renewable power sector, it's often forgotten that technology risks, such as inaccurate wind resource assessments, were a major risk for wind power projects in their early days. With the energy transition gaining steam, we believe the technology risk of some of the nascent renewable power assets, such as green hydrogen or carbon capture and storage projects, will become a key risk consideration when evaluating these projects. Input from industry experts and reliable data collection and analysis will be important for credit analysts to test the assumptions in the financial model in order to derive reliable cash flow projections. We believe some of the newer technologies are starting to become mainstream. For instance, the technology risk of battery storage projects is becoming less of a concern to lenders and rating agencies. However, it will still take years to commercialize other new technologies and for lenders and rating agencies to get comfortable with their technology risk.

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