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Mitigation Best Practices for Investors and Financial Institutions

by Kimberlee Centera

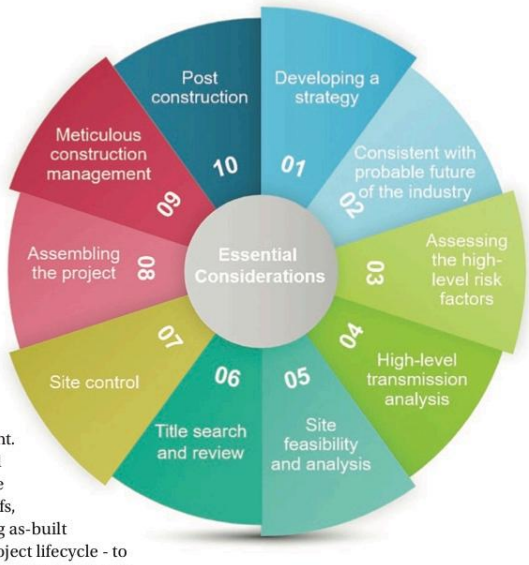
Renewable energy policy is vital to the development and deployment of renewable energy. According to the Sierra Club, ninety U.S. cities, ten counties, and two states have already adopted ambitious 100 percent clean energy goals. How are these projects financed?

Bloomberg's Clean Energy Investment Trends report for 2018 states that more than half of all new investment in clean energy is largely achieved through asset financing. That means collateralizing investments with hard assets such as property, or soft assets such as cash flow, accounts receivable, or bonding bills. Unlike venture capital funds, which anticipate that some investments will result in tax deductible losses, prudent asset financing requires a high probability of success.

Risk mitigation is critical when assets are used to finance development, as is often the case with municipal energy projects. Investor confidence is established with the creation of a strategic thinking framework. This includes an in-depth analysis of potential risks, and how they can be managed or alleviated at every stage.

At the outset, a check list of essential considerations includes the following:

1. Developing a strategy, establishing a brand, and leveraging the power of relationships. How will you articulate precisely who you are to the myriad people who shape the outcome of your project, and those it affects?
2. Ensuring your project is consistent with the most probable future of the industry. Developers need to understand the short- and medium- term trends that affect their business arena: sunset dates for tax credits, changing RPSs, the growing number of environmentally progressive cities and corporations, cost curves that make power cheaper to generate than to buy, the changing regulations of our power utilities, and, ultimately, the integration of energy storage.
3. Assessing the high-level risk factors associated with the project.
4. High-level transmission analysis including load, transmission capacity, and a solid off-taker.
5. Site feasibility and analysis and high-level permitting review.
6. Title search and review.
7. Site control with executed lease or option and easements in place.
8. Assembling the project, identifying various phases of development, and setting the timetable.
9. Meticulous construction management.
10. Post construction (for a smooth and transparent transition to operate the project) includes conditional signoffs, transfer of all documents - including as-built engineering drawings and entire project lifecycle - to the owner/operator. This is referred to as Commercial Operations Date and Compliance (COD).



Due Diligence Best Practices to Mitigate Risk

Due diligence includes a comprehensive review of legal and financial considerations. This means discovering any potential risks and evaluating their impact to determine whether the project is a viable investment.

Technical due diligence identifies total energy yield, social, and environmental implications. Non-financial goals, such as goodwill that is gained when demonstrating environmentally responsible corporate citizenship, may also be an important factor.

A Best Practices framework includes:

- **Site feasibility** and analysis with a high-level review of permitting and jurisdictional issues. This includes a review of the public agencies that may be involved (such as the FAA).
- **Compliance review** to ensure that the project adheres to pertinent regulations.
- **Title Insurance** with a comprehensive analysis of the title environment.
- **Mechanics lien** coverage and ALTA 35 endorsements, which provide insurance coverage for damage sustained by the insured for the removal or alteration of an improvement.
- **High-level transmission analysis** along with transmission capacity assessment.
- **Off-taker negotiations** such as PPAs with utilities or private entities.
- **Off-taker review** and evaluation of the time required for the off-taker to build the transmission line to ensure that it meets project completion deadlines.
- **Future phases** - feasibility analysis and project negotiation must consider making reasonable provisions for future phases. Pre-approvals that facilitate future project phases are much easier to obtain at the initial planning stage than further down the line.
- **Quantifying energy yield** for lenders to obtain a bankable energy yield assessment. Annual variations in generation must also be factored in.
- **Ensuring that power can be exported** into the electricity grid without constraint. Understanding the risks associated with the eventual operational regime is critical to the success or failure of a project.
- **Identification, mitigation, and management** of the environmental implications of the project is crucial to the long-term success of a project and the corporate reputation.
- **Commercial market for the energy and policy environment** must be understood in order to negotiate power purchase agreements.

In addition to comprehensive due diligence, a careful business case assessment includes understanding the goals of the investors to ensure that the financial realities of the project are clearly addressed. This considers both technical viability and environmental impact, as well as long-term financial soundness and the ability to withstand the competitive pressures of the market. The more detailed a due diligence process is, the less likely that potential risks will be overlooked. Thorough due diligence is imperative to the success and resilience of every renewable energy project.

Kimberlee Centera is CEO of TerraPro Solutions, a consultancy made up of renewable development experts with project experience across the United States in solar, wind, and energy storage. Kimberlee is a risk management expert for the development and financing of large-scale generator energy projects. Under her leadership, TerraPro Solutions has generated over 5,500 MWs in renewables, with a total financed value of over $6 billion.

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