



Issue Brief

New Approaches in Renewable Energy Finance: *Master Limited Partnerships, Real Estate Investment Trusts, and Crowdfunding*

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To incentivize renewable energy generation at the federal level, the United States has focused largely on tax credits (e.g., the Renewable Energy Production Tax Credit¹ and the Business Energy Investment Tax Credit²), low-interest loans (e.g., Section 1703³ and 1705 loan guarantee programs), Clean Renewable Energy Bonds (CREBs) for tax-exempt rural electric cooperatives and municipally-owned utilities, and the accelerated depreciation of assets (e.g., bonus depreciation and Modified Acceleration Cost Recovery System⁴). However, typically only companies with significant and predictable tax liabilities can benefit from these federal tax incentives, which in practice means that renewable energy developers must enter into complicated financial arrangements with outside investors to make use of the incentives. The outside investors provide capital for the project and in return benefit from the tax incentives, a system known as tax-equity financing. This limits the amount of capital available for renewable energy projects and bars many investors and companies from participating directly in this market.

Indeed, capital was so scarce in the aftermath of the 2008 global financial crisis that, as part of the American Recovery and Reinvestment Act, the U.S. government allowed qualifying renewable energy projects to substitute federal tax credits with a Treasury grant worth about 30 percent of the project's upfront costs.⁵ The Section 1603 cash grant, as the program is commonly referred to, was very successful but expired at the end of 2011. While the economic landscape for renewable energy projects has improved since 2009, access to capital remains a challenge for the industry.

According to the U.S. Partnership for Renewable Energy Finance, the available tax equity finance for renewable energy projects in 2012 could be as low as \$3.6 billion⁶, while Bloomberg New Energy Finance estimates the 2012 tax equity demand to be \$7 billion.⁷ Under the Section 1603 cash grant, an estimated \$7.5 billion was accessible in 2011.⁸ The limited access to capital drives up the cost of developing renewable energy projects and restricts the number of projects that can be installed. Three policy options that could help address these problems – Master Limited Partnerships, Real Estate Investment Trusts, and Crowdfunding – are introduced below.

Master Limited Partnerships

Master Limited Partnerships (MLPs) are a corporate structure defined in Section 7704 of the Internal Revenue Code (IRC). MLPs, in their current state, were permanently codified in the IRC by the *Tax Reform Act of 1986* and the *Revenue Act of 1987* as an opportunity for small investors to invest in companies which benefit from tax privileges and for companies to raise new capital. MLPs are taxed as partnerships but are traded on stock exchanges and can sell shares similarly to C-corporations. MLPs pass the majority of their income down to their shareholders. In practice, this provides tax benefits because MLPs are not taxed at the corporate level, only at the shareholder level, avoiding the ‘double-taxing’ of profits that occurs in C-corporations. Additionally, individual investors can purchase stock in MLPs, freeing up significant capital and decreasing the cost of borrowing for companies. Indeed, according to Felix Morgan and Dan Reicher of Stanford University’s Steyer-Taylor Center for Energy Policy and Finance, the current market capitalization of MLPs is more than \$350 billion and the average returns are 6 percent⁹, which is a marked decrease from the current cost of equity for renewable energy projects.

MLPs have proven very successful at attracting investment for energy projects – indeed, such projects represent 83 percent of current MLP market capitalization. However, at the moment, the benefits of energy-related MLPs are only available to fossil fuel projects. Section 613 of the IRC requires that MLPs receive 90 percent of their income from a qualified ‘depletable’ resource such as coal, oil, or natural gas extraction or pipelines. In June 2012, Senators Chris Coons (D-DE) and Jerry Moran (R-KS) introduced the bipartisan *Master Limited Partnerships Parity Act* (MLP Parity Act, S.3275) which modifies the tax code to include renewable energy as a qualified resource.¹⁰ By amending Section 613 to include renewable energy generation or transportation fuels, as defined by Section 45c(1) and 48 of the IRC, MLPs would be able to finance and own clean energy projects. A study conducted by researchers at Southern Methodist University’s Cox School of Business estimates that extending the MLP structure to clean energy could make an additional \$3.2 billion to \$5.6 billion in capital available over the next decade.¹¹ An additional benefit is that, unlike the temporary Production Tax Credit, MLPs are permanent in the tax code, which provides the industry with investment certainty. Original cosponsors include Senators Al Franken (D-MN), Amy Klobuchar (D-MN), Jeanne Shaheen (D-NH), Sheldon Whitehouse (D-RI), and Jon Tester (D-MT). A House companion bill in was introduced on September 20 by Representatives Mike Thompson (D-CA) and Ted Poe (R-TX).¹²

Real Estate Investment Trusts

Real Estate Investment Trusts (REITs) are companies that own, and often manage, income-producing properties and are publicly traded as liquid stocks on major exchanges. REITs were originally established under the *Real Estate Investment Trust Act of 1960* (H.R. Rep. No. 86-2020) to allow investors to pool assets and participate in the real estate market, which would otherwise only be accessible to large private corporations or wealthy individuals. Like MLPs, REITs pass profits directly through to its investors and are thus not taxed at a corporate level, only at the shareholder level. Avoiding double-taxation provides tax benefits for investors who receive average dividends of less than 10 percent.¹³ According to

the National Association of Real Estate Investment Trusts, the market capitalization of REITs was over \$450 billion at the end of 2011.¹⁴

Under Section 856 of the U.S. IRC, the REIT structure only applies to companies that derive 75 percent of their revenue through real estate rent. Currently, renewable energy generation does not meet this requirement. It is possible that in the case of renewable energy, payment for electricity could qualify as rent and, therefore, be eligible for the REIT structure.¹⁵ The Internal Revenue Service (IRS) has been asked to clarify if payment for electricity qualifies as rent under IRC Section 856.¹⁶

Crowdfunding

For community-scale solar projects or small wind turbines, crowdfunding represents another method for investors to pool their resources to support renewable energy. Crowdfunding describes the collaboration between individuals to fund various projects or initiatives through websites (such as Kickstarter¹⁷). The U.S. market capitalization of crowdfunding projects was \$1.5 billion in 2011. Bloomberg New Energy Finance estimates that the market could grow to \$90 billion¹⁸, and Fred Wilson, a managing partner at the venture capital firm Union Square Ventures, suggests that it could be \$300 billion.¹⁹⁻²⁰ Because of the high capital costs of renewable energy projects and highly regulated nature of crowdsourcing, the latter is not normally considered a potential source of equity. However, in April 2012, President Barack Obama signed the *Jumpstart Our Business Startups Act of 2012* (JOBS Act of 2012, P.L. 112-106)²¹ which could have some bearing for small projects.

The *JOBS Act of 2012* includes provisions to allow businesses to seek equity through crowdfunding and provide a return on investment for projects of less than \$1 million. The \$1 million crowdfunding cap removes many regulatory barriers, allowing community-scale solar photovoltaic or individual small wind turbines of up to about 200-kilowatts. By providing returns of between 5 to 10 percent²², outside investors could also be tempted to participate in such small-scale projects.

Additionally, the *JOBS Act of 2012* modifies Section 3(b) of the *Securities Act of 1933* to increase the annual limit from \$5 million to \$50 million for public offerings which qualify for a registration exemption with the Securities and Exchange Commission (SEC) under Regulation A.²³ Under the modification to Regulation A (entitled Regulation A+), companies are allowed to solicit investor interest in freely tradable Regulation A securities (similar to traditional stocks and securities) before having to file with the SEC, which removes some costs and barriers for small businesses to attract equity. After filing with the SEC, companies can then return and offer securities to investors. Regulation A+ could help companies raise up to \$50 million in equity annually – enough for a 20-megawatt wind project. The SEC must finalize and implement the revised Regulation A before February 2013, and depending on how the agency decides to proceed, it could become a useful instrument for small renewable energy projects.

Conclusion

Both MLPs and REITs promise to reduce the cost of capital for – and, therefore, the cost of electricity from – renewable energy generation. Presently, neither of them are options for developers and owner-operators. However, this could change with *MLP Parity Act's* adoption and a clarification by the IRS,

allowing entry for regular investors and freeing up a significant amount of new, low-cost capital for renewable energy development. The *JOBS Act of 2012* already provides renewable energy companies such as Solar Mosaic and SunFunder the ability to attract investment for small-scale projects through crowdfunding. Legislation such as the *JOBS Act of 2012* and the *Master Limited Partnerships Parity Act* demonstrate the importance of Congressional leadership in expanding the accessibility of renewable energy financing.

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- ⁴ Database of State Incentives for Renewables & Efficiency (DSIRE). 2011. [Modified Accelerated Cost-Recovery System \(MACRS\) + Bonus Depreciation \(2008-2012\)](#).
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