US PREF

U.S. Partnership for Renewable Energy Finance

Prospective 2010 – 2012

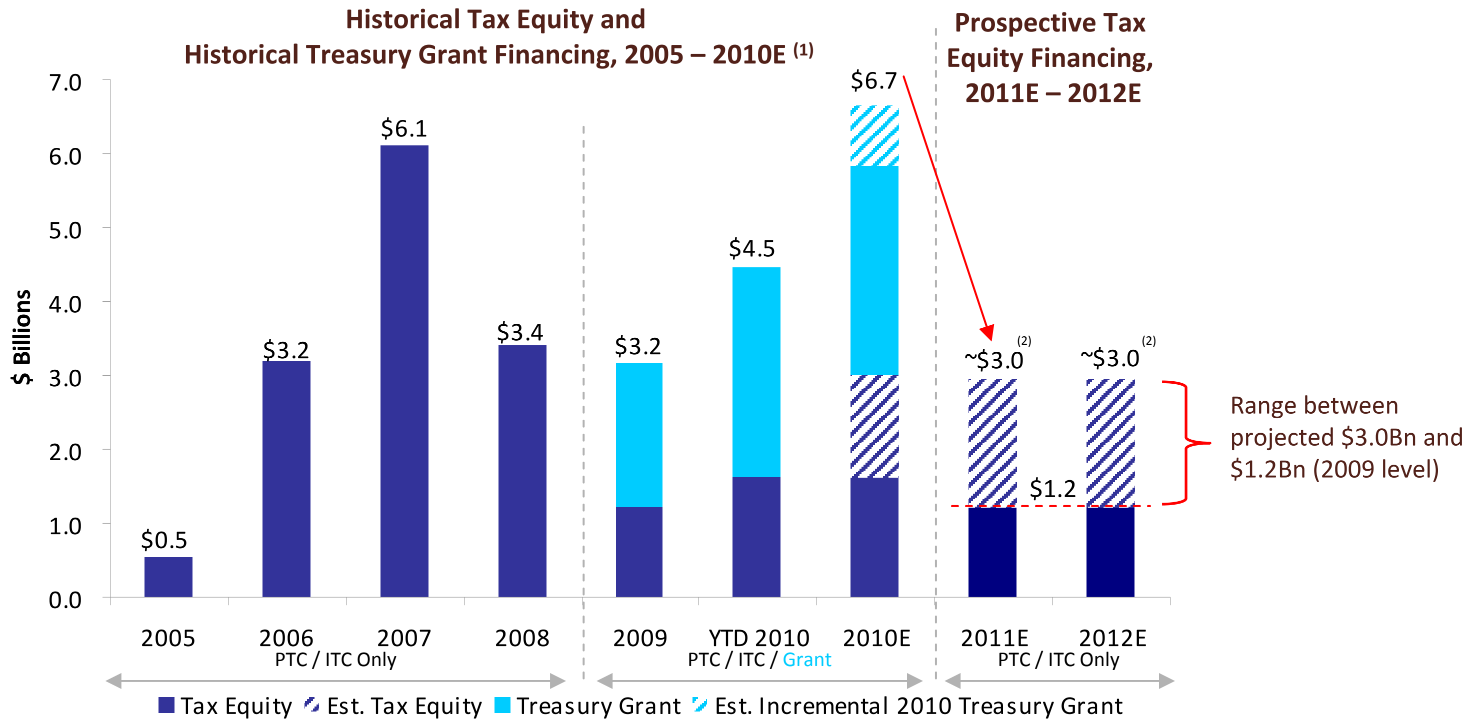
Tax Equity Market Observations

July 2010

v1.2

Stabilization provided by 1603 Treasury Grant

- In **2009**, the Section 1603 Cash Grant program stabilized the renewable energy market by providing $1.9 billion of cash grants in lieu of tax credits accounting for 61% of the equity capital market, keeping the level of renewable energy project finance nearly constant with levels achieved in 2008. This was a successful Federal program
- **YTD 2010**, $2.7 billion of 1603 Treasury Grants have supplied 60% of tax equity-related financings
- **Estimated 2010 Total** cash grants could approach $3.65 billion comprising 55% of the projected tax equity market
- **Looking ahead, without the 1603 Cash Grant program, the level of tax equity capital is anticipated to decline by more than 50% to likely no more than $3.0 billion in 2011 and 2012, limited just to tax equity again**
- **If the economy and/or credit markets were to revert to 2009 levels, the available amount of tax equity would be expected to shrink accordingly to as little as $1.2 Billion, as shown in the 2011 and 2012 ranges below**
- **Note: developer's equity contribution (not shown below) approximates 30%, or approximately equivalent to the cash grant**



Sources: U.S. Department of The Treasury, PREF Estimates, Leading Tax Equity Market Participants

(1) Includes all 1603 Treasury Grants for renewable projects

(2) $3.0 billion projection is the amount not likely to be exceeded; derived from canvassing each of the current tax equity market participants

Recent Contraction of Tax Equity Market

- The renewable tax equity market developed because of the need to monetize tax attributes that incentivize renewable energy
  - Many renewable energy project developers do not generate taxable income necessary to utilize these tax credits; therefore, project developers monetize these tax credits though financial intermediaries ("tax equity providers")
- However, the recent recession exposed the limited capability of these tax equity providers to provide sustainable funding due to their own insufficient or non-existent taxable income and/or the illiquid nature of this capital
- Even developers who had their own taxable income historically also ran out of tax capacity (e.g. Florida Power & Light/NextEra Energy) and have became more dependent on tax equity providers
- **<u>The number of tax equity market participants, and associated availability of tax equity, dropped dramatically in 2008 and has not yet recovered</u>**

Tax Equity Investors in 2007

- JPMorgan
- Union Bank of California
- Wells Fargo
- New York Life
- Bank of America
- GE Capital
- Morgan Stanley
- HSH Nordbank (1)
- Key (1)
- Northern Trust (1)
- John Hancock
- Prudential
- NorthWestern Mutual
- Citi
- ABN Amro*
- Fortis*
- Lehman Brothers*
- Wachovia*
- AIG*
- Merrill Lynch*

Departed tax equity base during 2008-2009 due to insufficient taxable income or bankruptcy

*Permanent Departure

Tax Equity Investors in 2008

- JPMorgan
- Union Bank of California
- Wells Fargo
- New York Life
- GE Capital
- Sempra Energy
- Morgan Stanley
- Bank of America (1)
- U.S. Bank (1)
- HSH Nordbank (1)
- Key (1)
- Northern Trust (1)
- SunTrust (1)

Tax Equity Investors in 2009

- JPMorgan
- Union Bank of California
- Bank of America
- GE Capital
- Credit Suisse
- Morgan Stanley
- Citi
- Wells Fargo (1)
- US Bank (1)
- Key (1)
- Northern Trust (1)

<u>RENEWABLES TAX EQUITY MARKET: $6.1 BILLION</u> | <u>$3.4 BILLION</u> | <u>$1.2 BILLION</u>

(1) Small solar financings

2010 Tax Equity Market Participants

- There are currently 16 tax equity investors active in renewable energy
  - **Expect to lose 3 to 5 of the participants when the 1603 Treasury Grant expires at year end**
- Approximately half of these participants are lead tax equity investors that have complete deal teams who originate and process tax equity requests; lead investors may choose to syndicate a portion of their exposure to other syndicate tax equity investors that comprise the other half of the participants

2010 Tax Equity Investors

Firm	Contact
Bank of America	Jack Cargas
J.P. Morgan	John Eber
GE Capital	Kevin Walsh
Union Bank	Lance Markowitz
Citi	Marshal Salant
Credit Suisse	Jerry Smith
Morgan Stanley	Martin Torres
Google	Rick Needham
SunTrust	Brian Adam
MetLife	Jeetu Balchandani
PNC	Dick Rai
PG&E	Brian Steel
Wells Fargo (1)	Barry Neal
Northern Trust (1)	Glen Davis
Key (1)	Paul Pace
U.S. Bank (1)	Darren Van't Hof

(1) Small solar financings

Survey Considerations

- US PREF canvassed 100% of the leading tax equity market participants
  - Each market participant projected the anticipated supply of tax equity capital their institution would have available for the balance of 2010, 2011 and 2012
  - Resulting bottoms-up build led to approximately ~$3 billion of tax equity capacity in 2011 and 2012, assuming current market conditions persist
  - However, if the economy and/or credit market revert to 2009 conditions, the available amount of tax equity would be expected to shrink accordingly
- See pages 6 and 7 for qualitative comments on the current tax equity market provided by the leading tax equity market participants

2010-2012 Tax Equity Market Availability

- Absent an extension of the 1603 Treasury Grant, the anticipated total financing available for renewables is expected to decrease by ~56% in 2011, jeopardizing the amount of MWs installed, jobs created, and avoided CO_2 emitted
- These consolidated estimates by the leading tax equity providers are subject to the vagaries of the external credit market environment and would be dramatically revised downward if the credit markets experienced another dip
- Certainty provided by the 1603 Treasury Grant program provides an important floor to renewable development and more than doubled the depth of the tax equity market in 2009 and projected 2010E
- **<u>A two-year 1603 Treasury Grant extension should not require additional appropriation since both the PTC and ITC were previously extended to 2012 and 2016, respectively. However, current legislative proposals would expand eligibility to projects with non-taxable owners, creating budget scoring impacts</u>**

Represents committed funds per year, may actually fund in subsequent years ($ in millions)

	2010E [1]	2011E	2012E
Anticipated Tax Equity Availability [2] *% of 2007 Tax Equity ($6,109)*	$3,000 *49%*	$2,950 *48%*	$2,950 *48%*
ITC Grant [3]	$3,650	$0	$0
Anticipated Total ***% of 2007 Tax Equity ($6,109)***	**$6,650** ***109%***	**$2,950** ***48%***	**$2,950** ***48%***
Associated MW Installations [4]	**5,165 MW**	**2,291 MW**	**2,291 MW**
Associated Job Creation [4]	**29,053**	**12,888**	**12,888**
Associated Avoided CO_2 Emissions [4] (Metric Tonnes)	**11,673,423**	**5,178,436**	**5,178,436**

(1) Reflects estimated incremental $800 million of 1603 Treasury Grants through December 2010 (~28% increase relative to YTD 2010 level of $2.9 billion)
(2) Used to monetize the Production Tax Credit ("PTC"), Investment Tax Credit ("ITC") and Accelerated Depreciation ("MACRS")
(3) Grant bridge as a proportion of total financing varies by project, dependent on financing structure; 2010 grant amount reflects all 1603 Treasury Grants related to renewable projects
(4) Extrapolated from a 40MW wind project in the northeast; assumes tax equity / grant bridge accounts for 50% of financing

Lead Tax Equity Providers Commentary

- Anecdotally, the lead tax equity providers made the following observations…

- "Year to date, there have been $1.6 billion of tax equity financings. The $1.4 billion of ITC cash grants have effectively doubled the depth of the tax equity market in the first half of the year."

- "I used to be able to say to my credit committee that I couldn't envision not having taxable income to offset…I can no longer make that representation."
- "Only need to worry about 5 years of having taxable income to monetize the MACRS depreciation versus 10 years if need to monetize the PTC as well."

- "The Treasury and other government departments are putting enormous pressure on banks to get rid of illiquid assets and tax equity is an illiquid asset."

Lead Tax Equity Providers Commentary

(continued)

- Anecdotally, the lead tax equity providers made the following observations…

- "Since the credit crisis banks funding costs have gone up massively, which translates into more expensive financing costs for all of our products, including tax equity."

- "Will not staff up and allocate additional human resources to tax equity department due to uncertainty of government commitment, most recent example is the expiration of the ITC cash grant."

- "Renewable tax rebate program has always been and continues to be handicapped due to uncertainty."

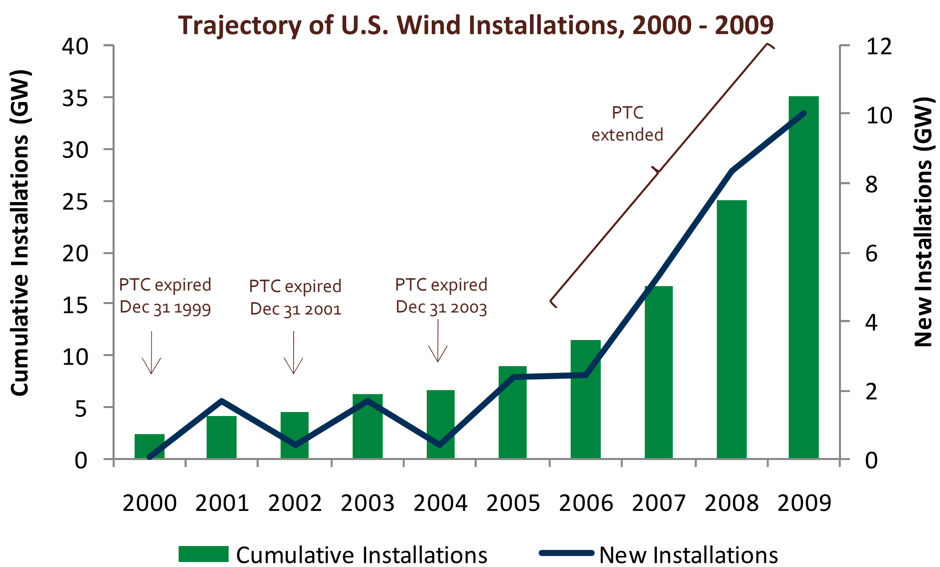
Appendix:

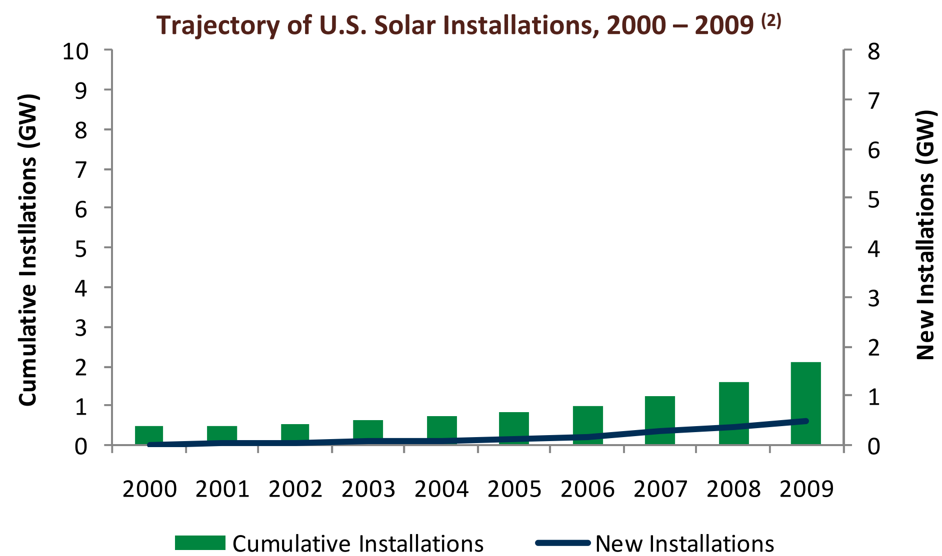
Tax Equity and 1603 Treasury Grant Overview

- Renewable energy projects have historically been supported through the U.S. tax code, notably through:
  - The production tax credit ("PTC") in Section 45,
  - The investment tax credit ("ITC") in Sections 25D and 48, and
  - Accelerated tax depreciation in Section 168 ("MACRS")
- Prior to the financial crisis, renewable energy developers had two options in order to monetize the favorable tax benefits granted through the tax code: either 1.) offset eligible corporate income, or 2.) utilize tax equity to monetize the PTC, ITC, and MACRS (typically used by developers that don't manufacture taxable income)
  - The financial crisis led to a dramatic contraction in tax equity, crippling the market and as a result Congress passed Section 1603 of the Recovery Act in order to facilitate construction of renewable energy projects by monetizing the tax attributes (PTC, ITC) directly from Treasury
  - Section 1603 of the Recovery Act enables qualifying renewable energy projects to utilize a cash grant of equal value to the ITC ("1603 Treasury Grant") in lieu of needing to monetize the PTC or ITC
- **<u>Through the end of 2010, developers were presented a third option, 3.) utilize 1603 Treasury Grants to monetize PTC and ITC</u>**
- **<u>However, developers still need to utilize either 1.) eligible corporate income, or 2.) tax equity to monetize the MACRS</u>**

History of U.S. Clean Energy Installations

- Prior to PTC and ITC extensions in 2007-2008, renewable energy project installations fluctuated considerably, reflecting inconsistent policy
- The introduction of the 1603 Treasury Grant in 2009 had an immediate impact on the U.S. clean energy market
- Nearly $2 billion of 1603 Treasury Grants were disbursed over the course of 2009 (1)
  - This helped stimulate nearly $9 billion of new investment in clean energy in the U.S. in H2 2009
  - 2009 installations of wind and solar energy capacity in the U.S. exceeded all other years, despite a global recessionary environment and associated sharp decline in availability of tax equity and project financing
- **However, new wind installations in Q1 2010 fell to the lowest Q1 installation figure since 2007, just 539MW – highlighting the U.S. wind industry's need for consistent policy and longevity in order to continue to incent new investment**





(1) Beginning in September 2009
(2) Excludes Solar Thermal

Sources: American Wind Energy Association, Solar Energy Industry Association, Bloomberg New Energy Finance, U.S. Department of The Treasury