

Funding and Jobs in Solar

by
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Introduction

- Software engineer by training
- Over 15 years of experience in software, semiconductor and project management
- Have a software startup that is developing a web based event management platform for conferences and tradeshows. Launched the software at TiECon
- Joined solar industry about two and half years back

Why Solar?

- Long term solution, proven source
- Other forms of renewable also dependant on Sun in a way or other
- True Distributed Generation
- Smart Grid



Job opportunities



- California tops the jobs list in nation by creating 25,000+ jobs
- Estimated 100,000+ solar workers in US
- Kinds of jobs:
 - Direct jobs (Hands on knowledge of PV)
 - Manufacturing, Installers, Sales, Marketing, Financing, Project Management
 - Indirect jobs (Relevant transferable skills)
 - Software development, analytics, monitoring, networking , security

Funding scenario

- Funding for solar gone up in 2011, more than half a billion in funding until now
- Pew Trust reported in its report earlier in March, 2011

“The U.S. competitive position in the clean energy sector is deteriorating, as the country slipped to third place in terms of the amount of private investment directed to the G-20 economies...Until 2008, the U.S. had held the top spot, which is now firmly held by China. Globally, 2010 clean energy finance and investments grew by 30 percent to a record \$243 billion. The United States received \$34 billion in equity last year, a 51 percent increase from 2009.”

Sources for funding

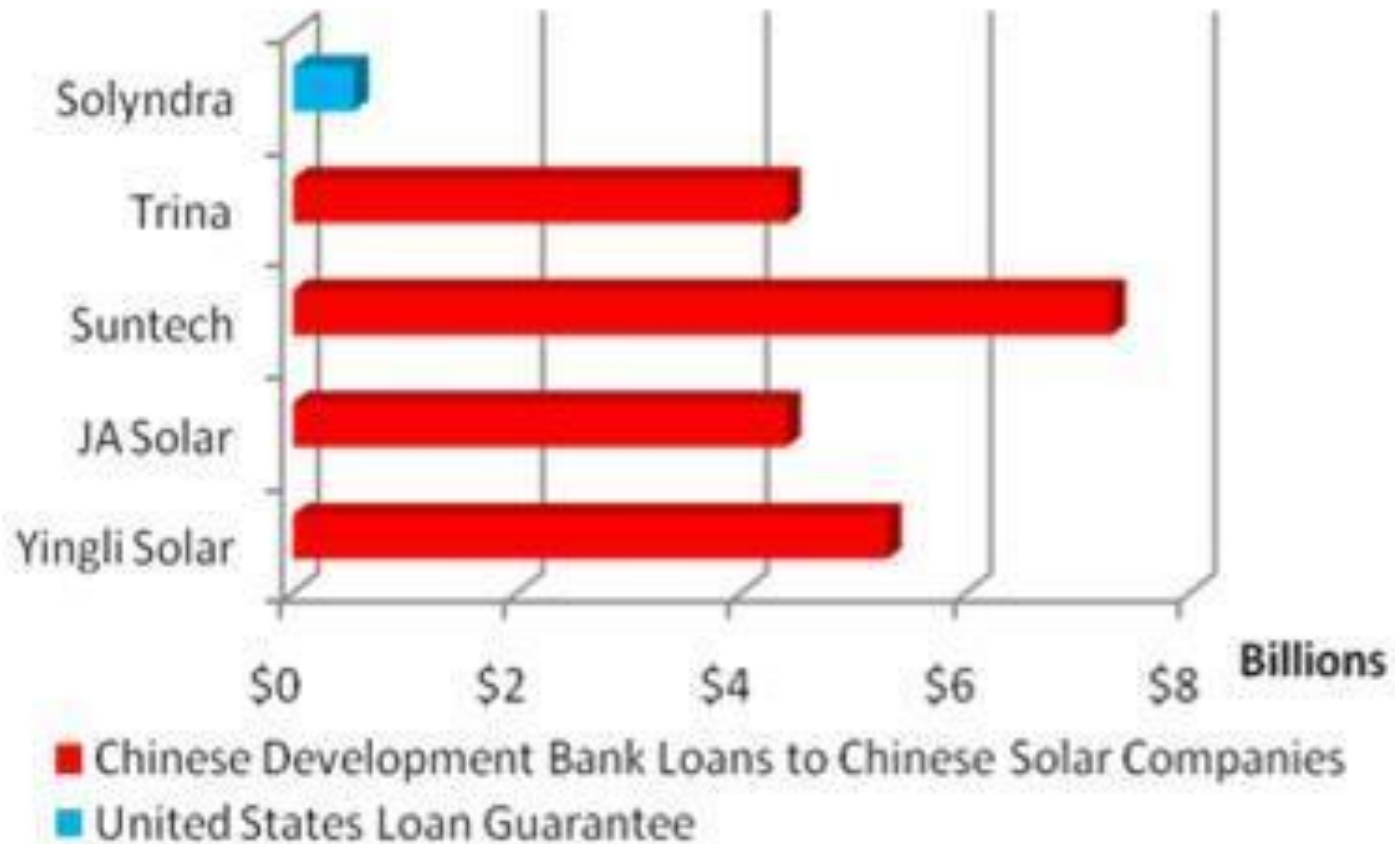
- Government incentives
 - Tax benefits including bonus and accelerated depreciation
 - Cash grant
- Banks
- Private investment funds
- High Net Worth Individuals
- Venture Capital
- Overseas Investments a.k.a. EB5 money

What are we missing?

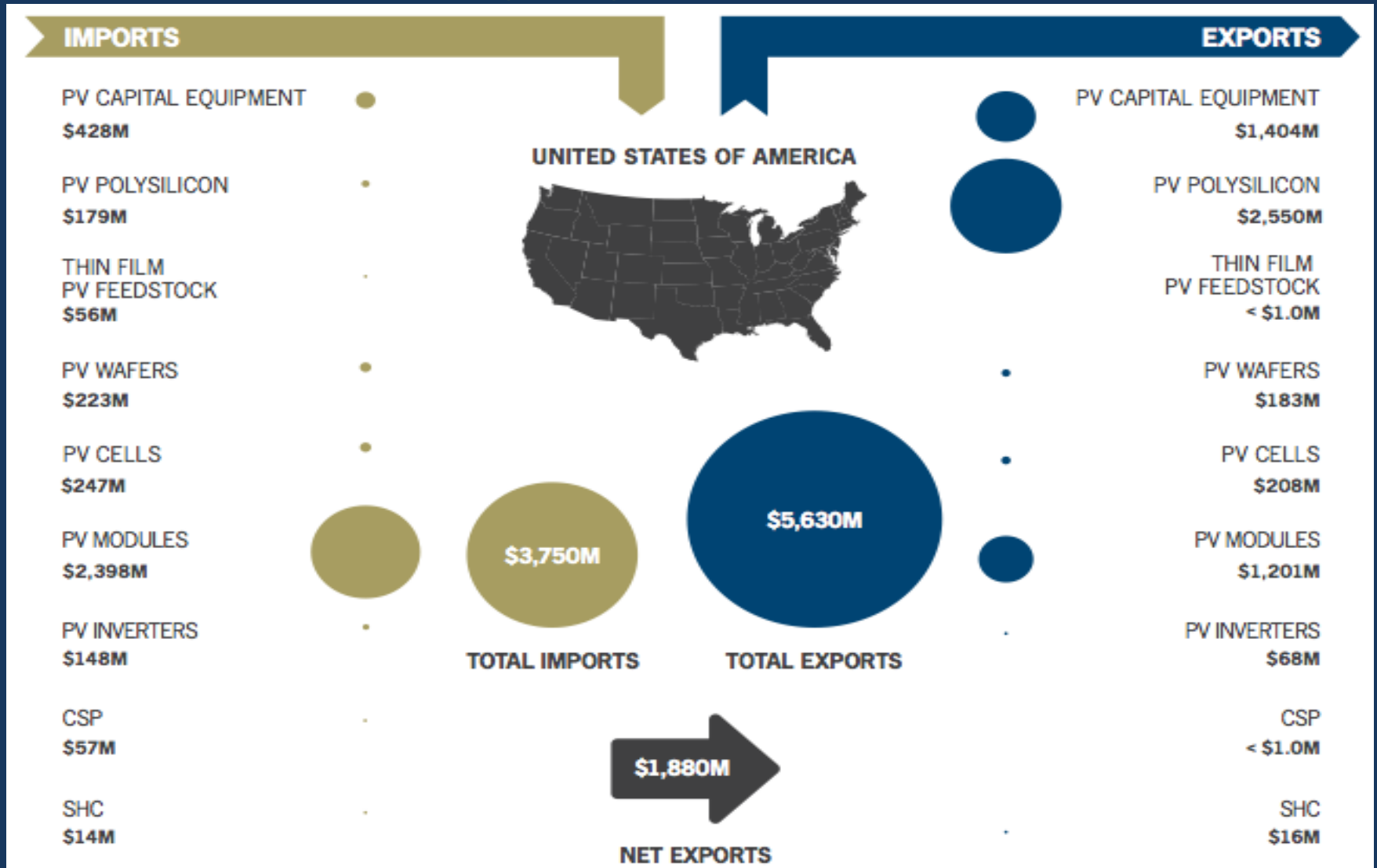
- Three major focus areas
 - Innovation...Innovation...Innovation...
 - Loans and funding to the manufacturers
 - Feed In Tariff



Loans to Manufacturers



US solar industry export import (im)balance



Feed In Tariff

- Canada (\$0.42 to \$0.80 per kWh)
- China (\$0.15 per kWh)
- Germany (\$0.50 to \$0.70 per kWh)
- India (\$0.24 to \$0.39 per kWh)
- Spain (\$0.42 per kWh)
- Thailand (\$0.27 per kWh)
- USA
 - Gainesville, FL (\$0.26 to \$0.32 per kWh)
 - New Jersey , S-REC market

What is needed?

- A uniform Feed In Tariff policy that incentivizes participants to install even at small scale levels
- Continued Tax Benefits which could be limited in lieu of 'Preferred Tariff' i.e. FIT rates
- Continuous effort in finding disruptive and life changing technologies
- Continued loan guarantee program from US Government or Banks to support innovation

