

Intro to Financing for Efficiency and Renewables & Five Tips for Success

Merrian Fuller, UC Berkeley April 24, 2009

# **Financing Case Studies**

#### Conventional

- □ AFC's Keystone Home Energy Loan (PA)
- □ City of Cambridge (new)
- Efficiency Vermont
- KEMA's California EE Loan Fund (terminated)
- □ MN Center for Energy and Environment
- □ NYSERDA's Energy \$mart Loan Fund
- NYSERDA's HPwES Loan Program
- Nebraska Energy Office
- Sacramento Municipal Utility District (SMUD)
- □ Vermont Gas Systems
- □ Viewtech Financial Services

#### Report available: rael.berkeley.edu/financing

#### **On-Bill Financing**

- □ BC Hydro (terminated)
- □ First Electric Cooperative (AR)
- Manitoba Hydro
- □ NW Natural Gas (terminated) (Portland)

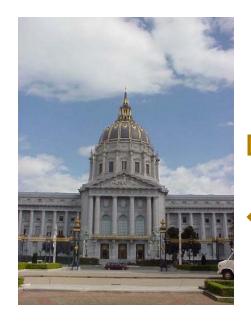
#### Tariffed Installation Program (TIP) w/ On-Bill Repayment

- Maui Electric Company
- Midwest Energy (KS)
- □ New Hampshire Electric Coop (terminated)

#### **Clean Energy Municipal Financing**

□ City of Berkeley (new)

## **Clean Energy Municipal Financing**



**\$\$** Upfront





- Creates financing district & approval process
- Provides upfront capital
- Attaches repayment obligation to the building

- Identifies work & chooses contractor
- Repays financing as a line item on the property tax bill
- Repayment obligation transfers with ownership

### 150+ Energy Efficiency Financing Programs in the US...



## **Barriers to Efficiency & Solar**

- "Not worth the effort"
- Lack of convenient, actionable information
- Uncertainty about the energy savings
- Few comprehensive service providers (in CA)
- Split incentives
- High upfront cost
- Others...



## 5. Encourage Comprehensive Energy Retrofits

Longer terms (~15-20yrs)

- Program requirements
  - Approved measures & contractors
  - Loading order
  - Residential Energy Conservation Ordinance
- Education



## 4. Work closely with contractors

- Contractors are the best sales force (NY, PA, VT)
- Time & money required to engage contractors
- More training needed
- An accepted standard would help local govts roll out energy efficiency programs



## 3. Be aware of who is left out

- Renters
- Low/moderate income

### Some options:

- Loan guarantees
- Lower interest rates
- Alternative credit measures
- Additional rebates
- Guarantee savings
- Pay for handholding
- Financing may not work for everyone!



### 2. Scale matters

- Larger volume programs will be *significantly* lower cost per project
- CEMF at the county level or higher?
- Streamlined program
- Marketing and outreach are KEY for long-term success



## 1. Use new messages, messengers

- Local govts are important messengers!
- Engage local groups that already have trust & connections
- More dynamic, appealing messages are needed



# Contact Info: Merrian Fuller merrianfuller@gmail.com rael.berkeley.edu/financing