

Monthly Municipal Forum

# Implementing a Residential PACE Program

March 21, 2012





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CALIFORNIA

**PACENOW**

*Together, providing a platform for sharing PACE information and experiences with others*

## Today's presenters:



**Dorian Dale**, Energy Director & Sustainability Officer, Town of Babylon, NY

[ddale@townofbabylon.com](mailto:ddale@townofbabylon.com)



**Sheila Berger**, Dept. Analyst, Sonoma County Energy Independence Program

[Sheila.Berger@sonoma-county.org](mailto:Sheila.Berger@sonoma-county.org)



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# Welcome!

## Today's agenda:

1. **Welcome and Introductions**
3. **Babylon, New York's Residential PACE Program**  
Dorian Dale, Energy Director and Sustainability Director, Town of Babylon
4. **Sonoma County's Residential PACE Program**  
Sheila Berger, Department Analyst, Sonoma County Energy Independence Program
5. **Q & A**

### Discussion Items

- A. Overview of residential programs and metrics
- B. Impact of federal mortgage regulators
- C. Considerations before launching a program
- D. Challenges and Lessons Learned



*ROADMAP TO RECOVERING WASTED ENERGY  
SAVING LIVELIHOODS AND MONEY IN THE PROCESS*

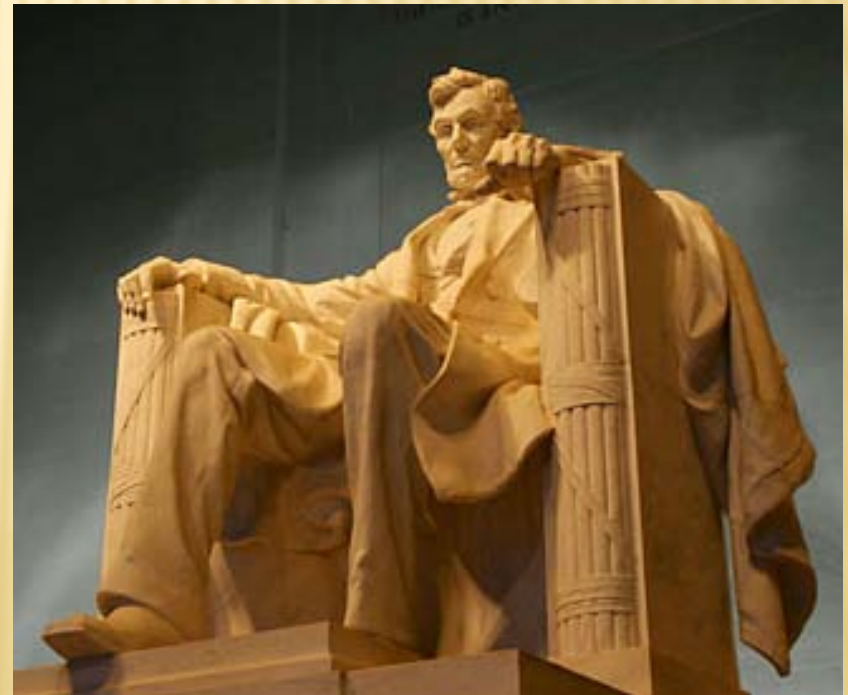
# **GREEN HOMES 12-STEP SET-UP**

# 1- BIG CHAIR BUY-IN

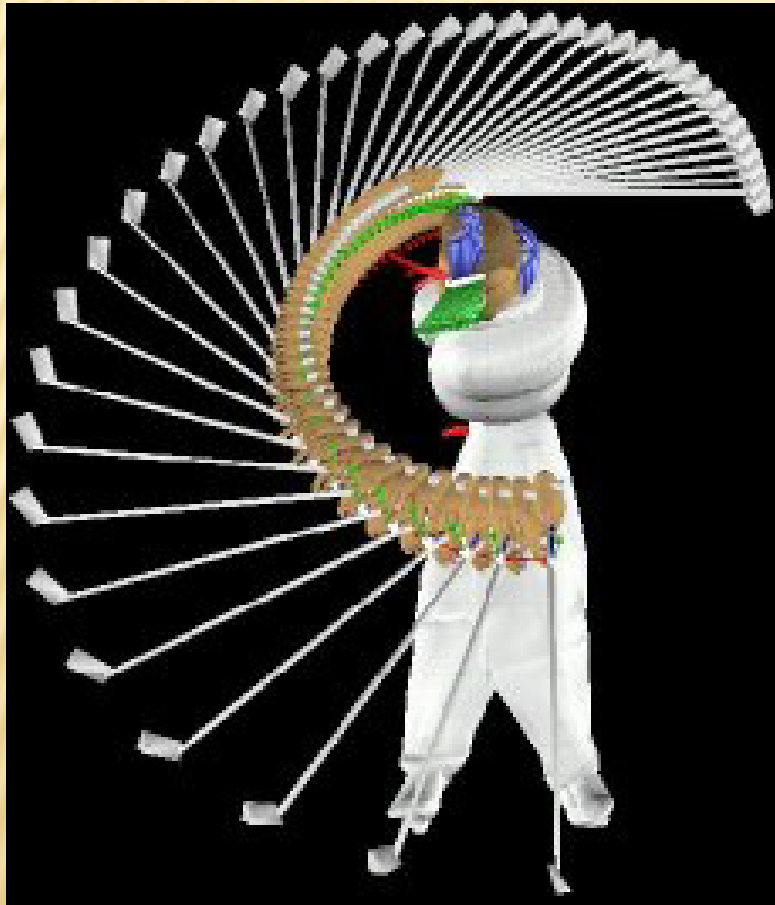
It starts with Leadership

Where there's a will,

There are multiple ways



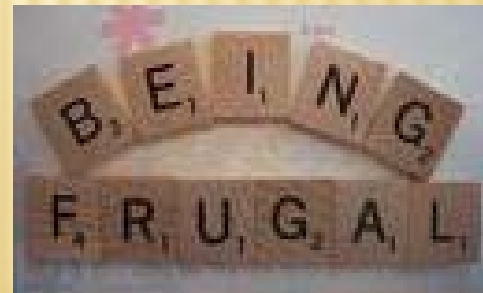
# 2-EFFICIENCY DELIVERED EFFICIENTLY



If you're asking people to become an



Then your operation better be about



# 3-IDENTIFY OPERATIONS OFFICER

- Program Director
- ✓ Dep Com/DPW
- ✓ Ran 100-man crew
- ✓ Master Electrician
- ✓ IBEW member
- ✓ Experienced contractor
- ✓ Keen on green
- ✓ Smart
- ✓ Ambitious



*Sammy Chu*

# 4-STAKEHOLDER ENGAGEMENT



- ✓ Town Attorney
- ✓ Contractors
- ✓ Utilities
- ✓ Unions
- ✓ Weatherization Provider
- ✓ Parallel Programs

# 4A-IT'S ENOUGH TO AMAZE

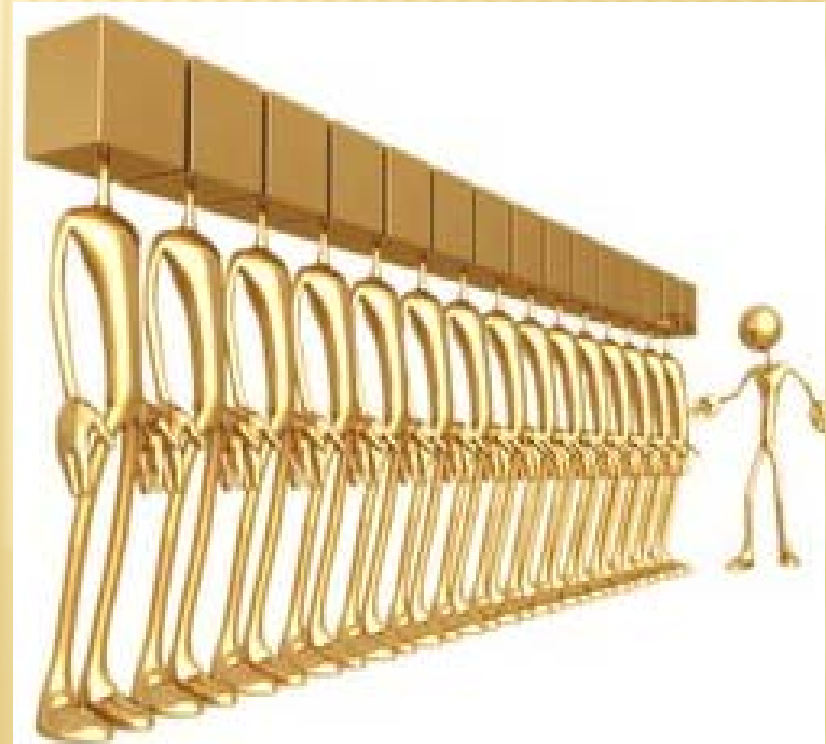


*Don't reinvent the wheel...*



# 5-PROGRAM UNIFORMITY

- Loading order
- Comparable pricing
- 1.8 S.I.R.
- \$15K cap (\$8.4Kavg)
- 10yrs max payback
- \$1.1K+ yr svgs



# 6-CODE CONFORMITY/CLASH

*expanded definition of solid waste to include energy waste, based on its carbon content*



1. Solid + Energy = Waste
2. Contractor certification
3. State Improvement District
4. No Cash for Caulkers
5. FHFA PACE Derailment

# 7-ID A BILLING SYSTEM

- ❑ Utility on-bill
- ❑ Benefit Assessment
- ❑ Separate Waste bill
- ❑ Muni Water bill
- ❑ Semi-annual tax bill



# 8-RETAIN/REPURPOSE SUPPORT STAFF



- Senior staffer in place
- In-house PD
- Hire outside PD
- Adjutant – provisional hire
- In-take/Outreach - hourly
- Comptroller type - P/T
- College/seasonals

# 9-STAKE OUT SPACE AND EQUIPMENT

- ✓ Blower door test rig
- ✓ InfraRed camera
- ✓ Combustion safety
- ✓ Analytic Energy software
- ✓ Program paraphernalia
- ✓ Dedicated vehicle(s)



# 10-SET UP WEB-SITE



## About Us [http://ligreenhomes.com/about\\_us](http://ligreenhomes.com/about_us)

*Long Island Green Homes (LIGH) is a Town of Babylon program that helps homeowners make energy efficiency improvements, by financing all of the upfront costs.*



THE  
BABYLON PROJECT

building green homes, green jobs & green communities

[www.thebabylonproject.org](http://www.thebabylonproject.org)

## Homeowner of the month



*My home had a few very drafty rooms. After I participated in the program, I couldn't believe how bad my home was prior to the improvements.*

# IT-DRAM ATTENTION



- **Public-Private Persuasion**
- **Message Media**
- **Suburban Guerilla**
- **PennySaver Promo**
- **Asymmetric Messaging**
- **Tightfisted Tips**
- **Viral Marketing in Analog World**

# 11A-COST CUTTING COOL

## Community Currency



Capturing Coupon Clippers

# 12-STIR & ADD HOMEOWNERS

The Value of Green...

Cost

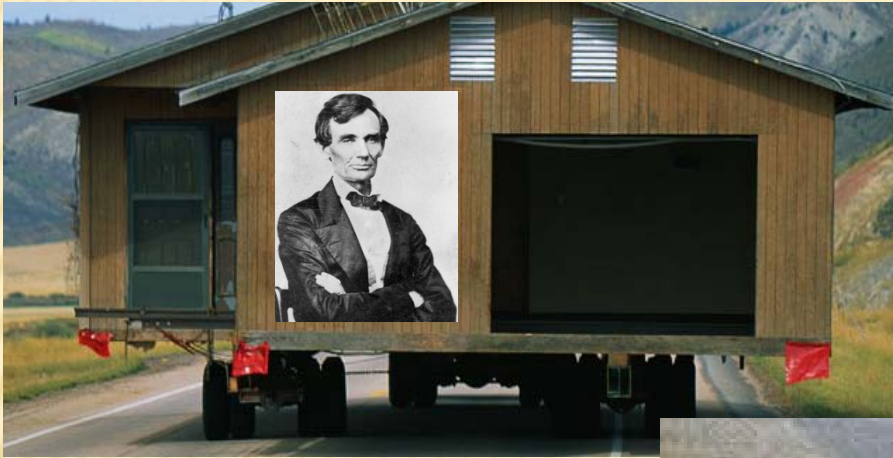
Comfort

Convenience



# MUNICIPAL DELIVERY MODEL

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PART OF DOING MUNI BIZ



One-Stop Retrofit

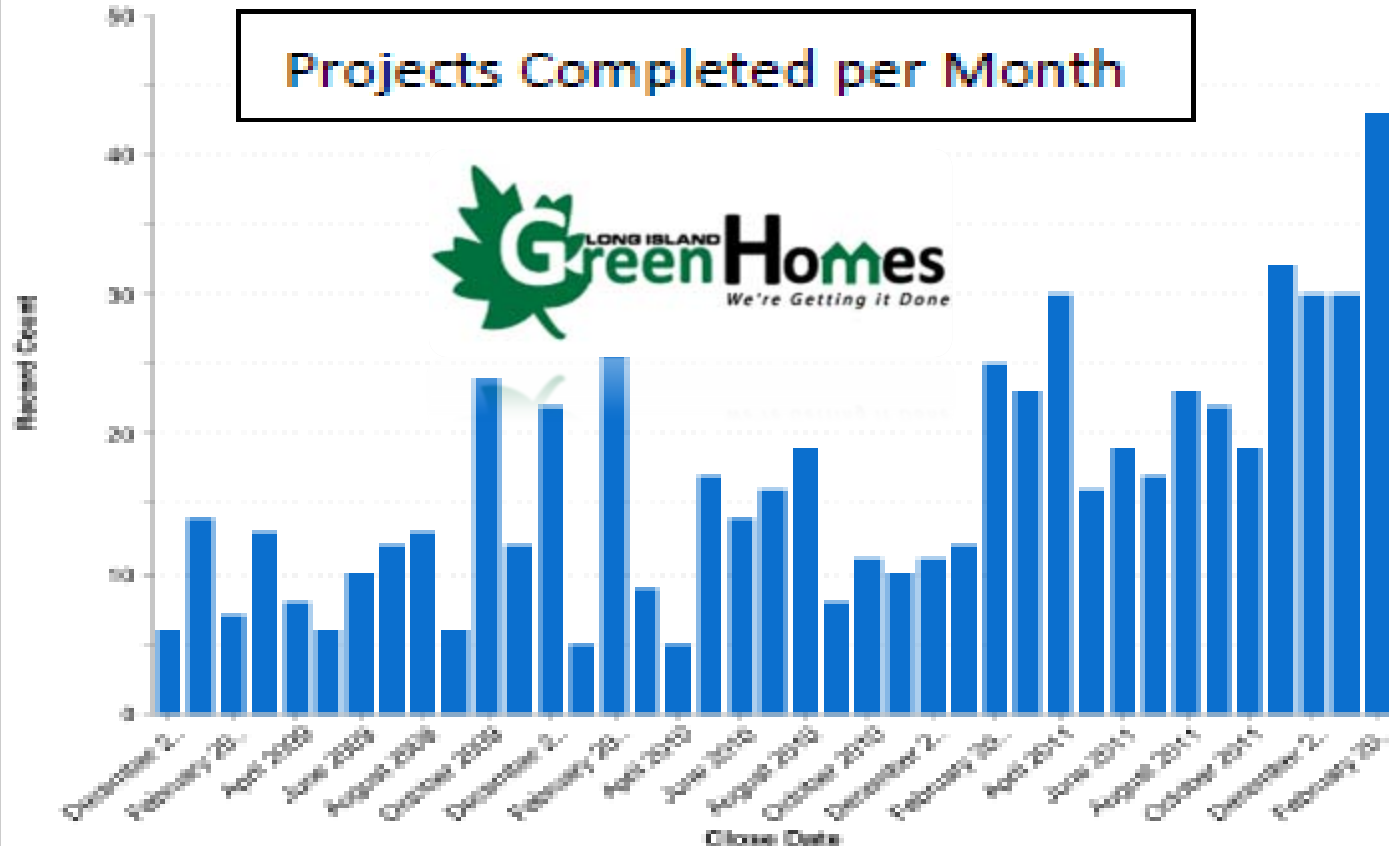
# DEEP RETROFITS AS OF 3/1/12

Jobs Completed:	652
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Audits Completed:	1,321
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Jobs in Progress:	665
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Projects Completed per Month



# COST & SAVINGS

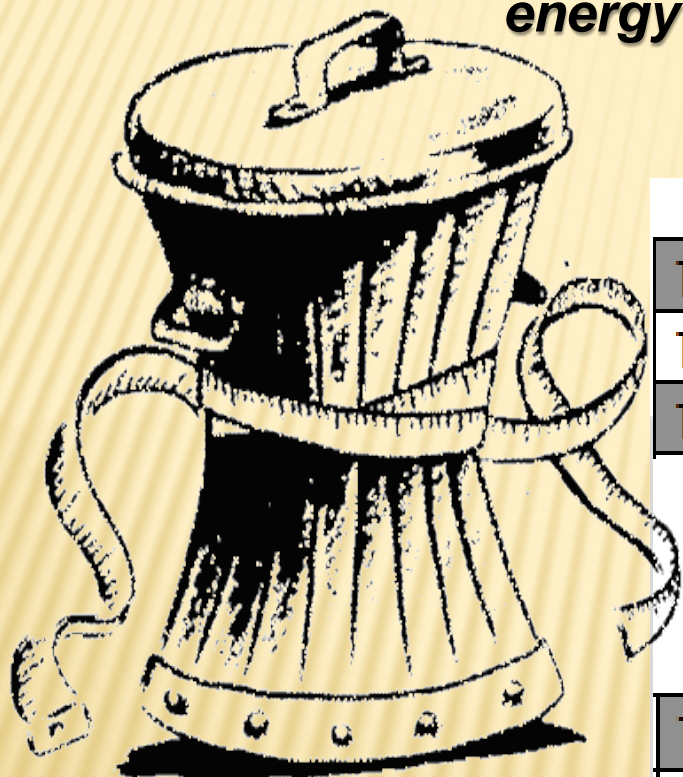


Total Cost of Completed Jobs:	\$6,394,399
Average Cost of Completed Jobs:	\$9,807
Average Annual Savings per Job:	\$1,149
Average Payback Period (years):	8.72
Average SIR (Savings to Investment Ratio):	1.79
Average HVAC Cost:	\$2,422
Average DHW Cost:	\$859
Average Basement Insulation Cost:	\$1,096
Average Attic Insulation & Airsealing Cost:	\$3,550
Average Wall Insulation Cost:	\$1,203
Average Lighting Cost:	\$44
Average Window Cost:	\$85
Average Miscellaneous Cost:	\$502
Average Comfort & Safety Cost:	\$24

# NECESSITY IS THE MOTHER



***expanded definition of solid waste to include energy waste, based on its carbon content***



## CO2 Emissions Savings Summary

Total CO2 Emissions Saved Annually (lbs):	6,143,674
Total Solid Carbon Saved (lbs):	1,720,229
Total CO2 Emissions Saved Annually (tons):	3,072

## Energy Savings Summary

Total Electricity Saved Annually (kWh):	340,579
Total Oil Saved Annually (Gal):	222,365
Total Natural Gas Saved Annually (CCF):	68,468
Total Propane Saved Annually (Gal):	5,340

# JULY 6, 2010 – COORDINATED STRIKE

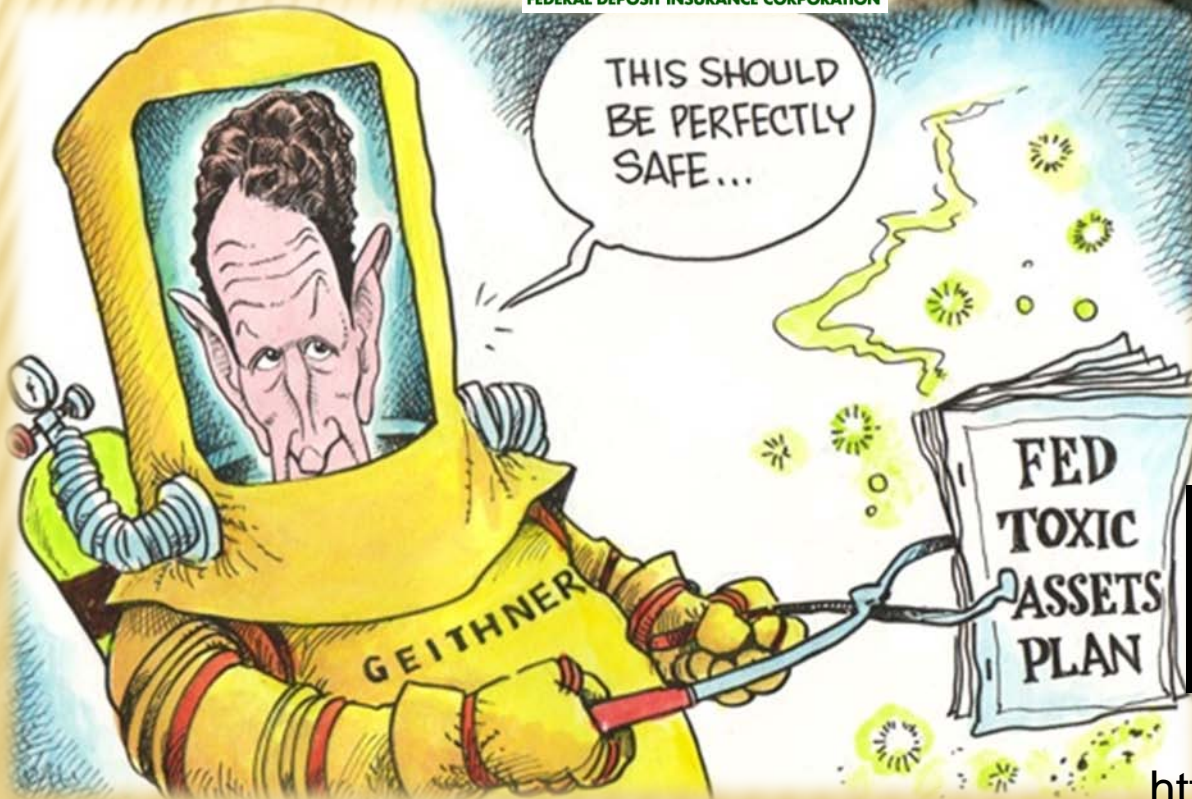
Your savings federally insured to at least \$250,000  
and backed by the full faith and credit of the United States Government

## NCUA

National Credit Union Administration, a U.S. Government Agency

## FDIC

FEDERAL DEPOSIT INSURANCE CORPORATION



Comptroller of the Currency  
Administrator of National Banks

US Department of the Treasury

<http://jedmorey.com/2011/obama>

# *Levering to Spread the Field*



## The 10th Amendment

"The powers not delegated to the United States by the Constitution, nor prohibited by it to the States, are reserved to the States respectively, or to the people."

**Precedent Set by FHFA:**

**Abrogation of sovereign capacity of state & local government to determine what constitutes a public purpose.**

**Assessments in Jeopardy**



# Sonoma County Energy Independence Program

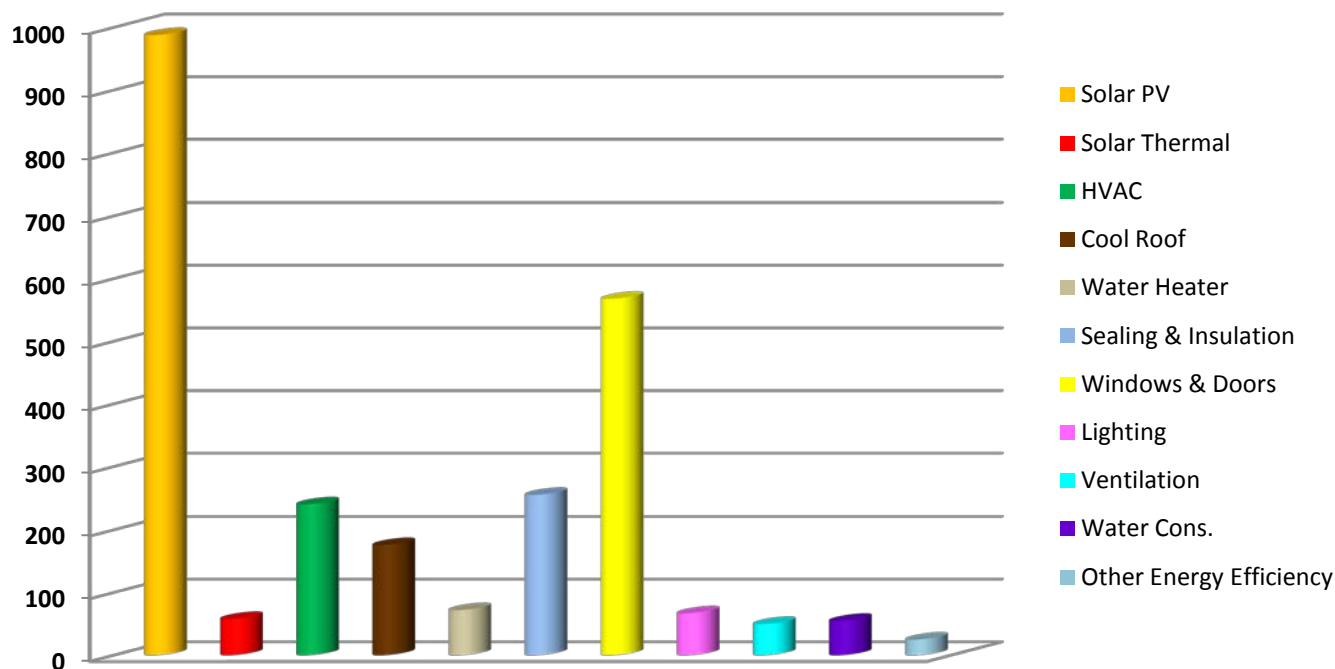
SCEIP opened March 2009 to both residential and commercial customers  
County-wide program (all 9 cities and towns + unincorporated county)  
1635 residential participants, funded between \$2,500 and \$206K (\$28K avg.)

## Eligibility for Residential ( $\leq 4$ units) Applications

- Improvements (more than 85 to choose from!) permanently affixed to the property
- No new construction or repairs (except as needed for improvement installation)
- Within geographical boundaries of the county
- Applicants are legal owner(s) of property, not underwater or property tax delinquent
- May request up to 10% market value of the property
- Property must be on the County tax rolls
- 10% EE requirement for renewable funding\*\*
- Energy analysis recommended, not required\*\*



## 1635 Residential Projects Funded by SCEIP \$45.7 Million, 2554 Improvements



### Impact

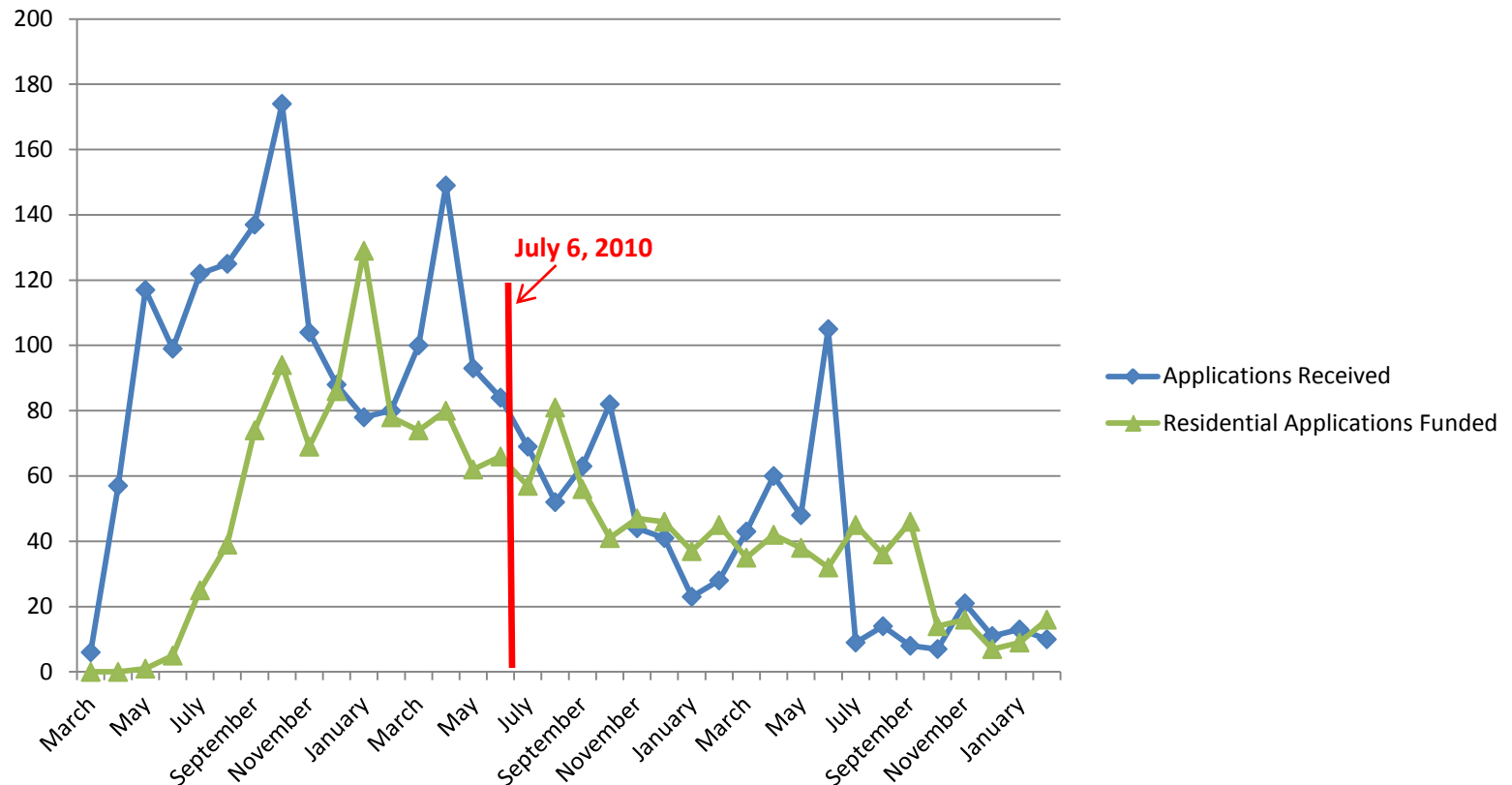
**Jobs: 531 (ARRA), 49 Local Construction**

**Solar PV: 5.7 MW, 988 systems, 3,459 tons eCO2 annual reduction**

# Impact of Federal Mortgage Regulators

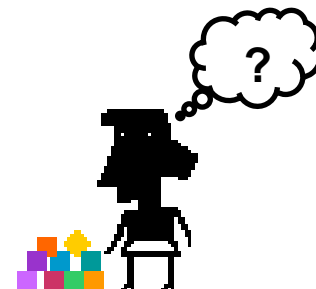
- FHFA instructions to mortgage lenders issued July 6, 2010
- Program closed doors for a week, reopened July 13, 2010 with some changes:
  - All residential participants notified via US mail of FHFA action and offered opt-out option (pre-payment with no penalty)
  - New disclosure added to application requiring signature of all owners on title
  - Sonoma County entered into litigation against the FHFA
- Residential program participation dropped slightly

# Impact of Federal Mortgage Regulators



# Building a Flourishing Program: Things to Consider

- Community Goals, Political Will and Market for PACE
- Identify Partners: public, private, education and non-profits
- Work with Stakeholders: Mortgage Lenders, Contractors, Local Utilities
- Strategic and Business planning
- Program Funding: start-up, operating, project
- Administrators, Staffing, Steering Committee, Legal Team, Financing Team
- Program Delivery: a Storefront and/or Web Site
- Staff & Workforce Tools and Training
- Marketing, Education & Outreach



# Operating a Flourishing Program: Things to Expect

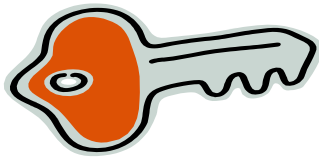
- Success!
- Constant change!
- On-going contractor relationships!
- A mountain of data!
- Expanded service opportunities!



# Lessons Learned

- ✓ Create a Strategic Plan and a Business Plan early in the program development stage
- ✓ Develop a comprehensive marketing plan with a realistic budget
- ✓ Beware the unintended consequences of making program changes
- ✓ Consider restrictions on funding sources before accepting
- ✓ Keep the message simple





## KEY MESSAGE

No matter WHERE your PACE program operates.....

...its planning and design will follow the same fundamental recipe.

### Property Assessed Clean Energy (PACE) Replication Guidance Package for Local Governments



March 30, 2012



*Together, providing a platform for sharing PACE information and experiences with others*

Welcome to Sonoma County's Energy Independence Program!  
Your one-stop shop for efficiency and solar improvements for both home and business

**Search Contractors**  
Find qualified local service providers to do the work

[My Action Plan](#) [Find Rebates](#) [Search Contractors](#) [Apply for Financing](#)

**Program Activity Dashboard**

**What's New**  
You can improve the comfort and health of your home, while saving money and lowering utility bills. Energy Upgrade can help. Learn how! Attend a FREE Home Energy Workshop.

**What's New**  
We are pleased to announce two new rebate services. The Action Plan and Apply for Financing Tool.

**In the News**  
Media coverage for Sonoma County Energy Independence and Energy Upgrade California in Sonoma County.

**Featured Video**  
Locally-produced 30-second TV spot highlights benefits of a home energy analysis and rebates offered through Energy Upgrade featuring local actors and Jane Doe from VCEIP.

**Webinar Summary - 1/24/2012**

Applications Received	2
Funding Requested (Pilot)	\$20,210
Applications Approved	0
Contracts Signed	0
Energy Analysis Rebate Applications Received	2

**GRAND TOTAL PROGRAM ACTIVITY - ENERGY INDEPENDENCE - 2011**

Applications Received	204
Funding Requested (Pilot)	\$81,222,094
Applications Approved	176
Energy Analysis Rebates Provided	118
Contracts Signed	168
Contracts Funded	\$24,490,287

**GRAND TOTAL PROGRAM ACTIVITY - ENERGY INDEPENDENCE - 2011**

Energy Efficiency	1478
Water Conservation	80
Generation	1011

**Residential Improvements Funded by PACE (includes Energy Analysis rebates)**

Commercial Improvements Funded by PACE	73
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**FINANCIAL BENEFIT - GRAND TOTALS - ENERGY INDEPENDENCE - 2011**

Improvements	219 of 288 (80%)
Dollar Volume	\$2,981,288

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# Questions?

**PACENow**

[www.pacenow.org](http://www.pacenow.org)

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Energy Independence Program**

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