

Subcommittee Tracking Sheet Savings Below Code

Meeting #3: March 19th, 2015

I. Agenda Items for Discussion/Materials

- Follow-up from last meeting—review progress on action items:
 - ACT: Alejandra/Marc to touch base with ABAG to get update on BayREN pilot
 - ACT: Alejandra to look into AB 758 approach for discussion at next meeting
 - ACT: Marc will begin to work on cross-referencing approach (incentives paid vs. permits pulled)
 - ACT: Marc to try to pull surveys from public agency side of the programs
 - ACT: Alejandra to review tax credit allocation committee study—get from Andy Brooks
 - ACT: Alejandra to follow-up with IOU To Code pilots
 - ACT: Alejandra to review Cadmus study, review possible code non-compliance methodologies from other
 - Keep an eye out for attribution, free-ridership screens
- Update on other statewide efforts:
 - BayREN
 - AB 758
- Introduction to Repair Indefinitely discussion: EUL regulatory history
 - Possible other approaches for California
 - What is the most appropriate rationale for new approaches in California?
- Repair Indefinitely Examples and Data Strategy
 - What are other examples of measures that can be kept in service almost indefinitely?
 - How can we explain how each measure is a lost opportunity, why customers aren't actually cheating on the code?
 - What is the cost to bring those measures to code? What is the cost of going beyond code?
 - How prevalent are these anecdotes?
 - How can we capture the magnitude of lost savings statewide?
- If time permits: The literature on below code/non-compliance: Study designs that effectively sort out free rides?



Is there a way to leverage CEUS and RASS?

II. Meeting Attendees

Alejandra Mejia, Cal TF staff Jenny Roecks, Cal TF staff Annette Beitel, Cal TF staff

Doug Mahone, TF Member Sherry Hu, TF Member Christopher Rogers, TF Member Armen Saiyan, TF Member Martin Vu, TF Member

Kevin Messner, AHAM Marc Costa, The Energy Coalition/LGSEC Nick Dirr, AEA

III. Key Issues Discussed

Local Government

- Public agency data will be accessible, also access to energy upgrade
 - HERO program most challenging
- Data can be broken down to measure-level, just have to work with PAs on aggregation and packaging
 - Questions asked by PUC: What was the intent? New tenant, planned improvement? Helpful to tease that out.
 - The types of measures being done

History of EULs

- Do current EULs take into account second ownership?
 - No, just theoretical equipment life regardless of ownership, operations
- Current EULs are an average of a range collected by surveys—collecting new baseline data would be very expensive
- Equipment past its theoretical EUL is probably the most inefficient, thus probably most valuable for retrofit
 - AHAM has tried to reclassify equipment—has technical support document on remaining useful life, net savings of refrigerators across range of ages
 - ACT: Get AHAM technical support document
 - Data can be collected during program administrator



 Furthermore, spending resources on determining exact age is sometimesfutile, remaining useful life is more important—and it cant be a simple arithmetic calculation

Repair Indefinitely

- How would the commercial lighting fixtures example change under the proposed "greater than 20% reduction from existing density" 2016 language?
 - Yes, that seems to be the CEC's solution to the current regulatory problem.
- AHAM is finalizing a customer study on secondary markets for appliances
 - o ACT: AHAM to share secondary market study when available
- Suggestions from group:
 - o Get to implementers during Prop 39 implementation
 - Federal buildings keep good records (BOMA)
 - o Add rooftop units to list, boilers when they exist in the state
 - Third party lighting direct install contractors and may keep records on costs
 - Doug has been working closely with Ecology Action

IV. Action Items

- ACT: AHAM to share remaining useful life technical document with group
- ACT: AHAM to share secondary market study when available