Evaluation Committee Report

June 27, 2008

Evaluation Committee Notes

The Evaluation Committee met on June 27, 2008, with Debbie Kitchin, chair; Alan Meyer, Board; Philipp Degens, Evaluation Manager; Brien Sipe, Evaluation Analyst; Sarah Castor, Market Research and Evaluation Analyst; Fred Gordon, Planning and Evaluation Director; Ken Keating, Evaluation Expert; Paul Berkowitz, CSG; Steven Grover, ECONorthwest; Diane Ferington, Sr. Residential Sector Manager; Elaine Prause , Sr. Industrial Sector Manager; and Lakin Garth, Planning and Evaluation Intern. The meeting began at 10:05 AM with an overview of the meeting's agenda.

Phil presented the Energy Trust's proposed free rider methodology that would address many of the issues raised by Ken Keating at the last Evaluation Committee meeting. The methodology aims to be more consistent/straightforward and deal with inconsistent answers. The method is being used on all current evaluations. The HES 05-06 and PE 06-07 impact evaluations' free rider rates will be the first evaluations to use the method. In future evaluations Energy Trust will implement a set of improvements such as, improved wording or questions and consistency checks. Discussion included:

- Ken Keating indicated that inconsistent answers are best dealt with at the time a participant completes the survey.
- Alan Meyer raised the issue of the lumping together of responses for weighting purposes, (this has been addressed).
- Alan Meyer also asked why Energy Trust must be bound by net-to-gross estimates. Ken Keating mentioned the need to spend money effectively and Phil Degens mentioned that gross savings are a good indicator of how well the measures were doing in achieving their expected savings.

Phil presented current limitations of spillover estimates (baseline unknown, savings based on self reports). For substantial spillover savings claims, they may warrant separate studies with methods similar to participant evaluations (end use metering, in-depth interviews).

- Ken Keating suggested that spillover should get the same amount of resources dedicated to its calculation as free riders.
- Debbie Kitchin suggested that market actors other than non-participants need to be included in any study that seeks to assess spillover.

Final results for the 2006 PE Impact and Process Evaluation were presented by Phil Degens – included spillover and free rider figures. Major findings were:

- 101.6% realization rate
- 20.1% weighted free rider rate
- 81.1% net savings rate
- Less variance in the expected and estimated savings
- Compressed air projects consistently underestimate savings with a realization rate of 136%
- Process pumping had lower realization rate (77%)
- Water and waste water have improved their realization rates over the last evaluation

- PE has done projects at 10% of the industrial facilities in its service territory, representing 21% of the electricity consumption and 20% of the employees
- If we also include BE and NBE this goes up to 15% of the facilities, 25% of the electricity consumption and 25% of the employees
- PE market penetration has been high in machinery manufacturing (42% of employment) food manufacturing (27%) primary metals 27%, paper (27%) and water (38% of population) and wastewater (50% of flow)

Discussions about the evaluation included:

- The lower variance in realization rate compared to the first three years of the PE program.
- Ken Keating asked why baseline savings estimates in several cases were indicated as incorrect, but not readjusted. Phil Degens mentioned that the evaluator did not tinker with the baseline assumptions and that incorrect baselines were viewed as one of the reasons for the variance in evaluation vs. projected savings.
- Elaine Prause indicated that contractors/ATACs want consistent policies/guidelines to refer to baseline calculations for different industries.
- One measure had negative realization rates being reported as 0%. This was due to inappropriate management of equipment that can be fixed and not inappropriate project that cannot.
- Alan Meyer asked if PE program works with Energy Star energy management companies. Elaine Prause indicated most companies are not working with this program, and could be.

Phil Degens presented the final results of the HES 2005/2006 Process and Impact Evaluation. Major findings were:

- High free riders rates for gas furnaces (57%), heat pumps (64%), insulation (61%) and windows (55%)
- Free rider rates were validated by contractors
- Participant and nonparticipant spillover quite high for windows (1,900%), CFLs (465%) and insulation (50%)
- Billing analysis models were quite sensitive to model specification and resulted in a 71% electric and 124% therm net realization rate
- Measure level savings were not deemed reliable

Discussions about the evaluation included:

- Concern that Home Energy Review influence on future measure installations was not accounted for in the Free Rider calculation
- Failure to account for participants with multiple measures
- The fact that participant and vendor free rider estimates were reasonably aligned
- Debbie Kitchin indicated that the Board does want to recognize spillover in the savings figures. This includes both participant and non-participant spillover
- Ken Keating suggested that resources need to be expended to get better spillover estimates
- Steve Grover indicated he had more confidence in participant spillover, although there are some problems with self reported efficiency of equipment (tendency to indicate new products as 'high efficiency'). Attribution is also problematic, customer may not be aware of what influenced their purchasing decision.
- Group agreed that we need to figure out a way to calculate spillover and credit program. All recognized need to earmark budget for this task in future evaluations.

- Phil Degens proposed to contract with set of national experts to review Energy Trust billing analysis procedures and methods.
- Given high free rider rates reported by consumer/vendors for heat pumps and gas furnaces, there was some discussion about the feasibility of changing incentives and upping efficiency levels
- All recognized the potential for dissatisfaction associated with program measure and incentive changes. Some expressed concern regarding the sensitivity of the trade ally network to abrupt changes in the marketplace. For heat pumps, it was suggested HSPF rating could be increased, but tightening efficiency for gas furnaces is not as feasible.

The Evaluation Committee meeting concluded at 1:12 PM.

The next Evaluation Committee meeting will be scheduled for August 12, 2008 from 11:00 AM-1:00 PM.