

State of California

Memorandum



Date: August 3, 2020

To: Gary Barsley, Southern California Edison (SCE); Henry Liu, Pacific Gas and Electric (PG&E); Chan Paek, Southern California Gas (SCG); Ed Reynoso, San Diego Gas and Electric (SDG&E); Nancy Goddard, PacifiCorp

CC:

From: Peter Biermayer - Utilities Engineer, Industrial/ Agricultural Programs and Portfolio Forecasting Section, Energy Efficiency Branch, Energy Division, CPUC

Subject: Disposition Approving Smart Thermostat, Residential: **SWHC039-03**

1. Discussion and Direction

The California Public Utilities Commission (CPUC) approves the statewide workpaper for Smart Thermostat, Residential: SWHC039-03 which includes both electric and natural gas measures. This technology is also referred to as smart communicating thermostats (SCT). This workpaper is a Phase 1 workpaper submission and will be effective on 1/1/2021 with an expiry date of 12/31/2021. Program administrators (PAs) are directed to revise and resubmit a workpaper by June 1, 2021 for the 2022 program year informed by ongoing research which is expected to conclude in the spring of 2021.

2. Workpaper Summary

SWHC039-03 was submitted as a revised statewide workpaper replacing consolidated SWHC039-01 workpaper which had an 1/1/2020 effective date and a 12/31/2020 expiration date.

Four areas of the existing workpaper were updated:

- Savings values were updated for downstream deemed measures based on ex post evaluation of the 2018 program year (PY2018 Impact Evaluation). The values are climate zone specific but relevant for all housing types. Direct install measures maintain savings from the previous workpaper.
- Net to gross values were updated for both downstream direct install and downstream deemed measures based on PY2018 Impact Evaluation results.
- Pricing is now based on 2020 online retailer data.

- A new effective useful life identifier was added for SCTs, although the measure life remains the same at 9.1 years.

3. Critical Review Issues

Primary review issues were related to the application of PY2018 Impact Evaluation savings values and NTG to update the existing workpaper. These issues were resolved as follows:

- Participant-weighted savings estimates were applied when there were multiple IOUs present in a climate zone.
- Climate zone 3 results were applied to climate zone 1, since the climates are similar. Climate zone 1 did not have participants, therefore it did not have independent savings estimates. Savings for all other climate zones are based on participant results in those zones.
- Customers in all housing type categories (single family, multifamily, and modular home) receive the same unit savings value, which is the PY2018 Impact Evaluation average savings values which included all housing type categories.

The PAs revised the workpaper consistent with the Workpaper Review Team's recommendations.

The PAs are directed to revise the workpaper for 2022 based on ongoing evaluation work in 2020 and early 2021. The 2020 evaluation will target the direct install channel SCT measure in combination with a variety of other HVAC measures. The results from this analysis will allow for the update of the direct install channel savings estimates. In addition, further analysis of the downstream rebate channel may also allow for updates to the downstream channel savings as well. All additional analyses will be completed by Spring 2021 in time to facilitate another workpaper update by June 2021.