TECH Clean California – Working Data Set READ ME

September 29, 2023

Available on the TECH Clean California Public Reporting Website at https://techcleanca.com/public-data/download-data/



Disclaimer

Energy Solutions follows CPUC direction and guidance on the publication of any data included in the TECH Working Data Set.

Please use your best discretion when using and making representations from this data and direct questions about the data to <u>tech.info@energy-solution.com</u>.

Terms Directory

TECH OR TECH CLEAN CALIFORNIA	The Technology and Equipment for Clean Heating Initiative
IOU	Investor-Owned Utility
CPUC	The California Public Utilities Commission
CEC	The California Energy Commission
DOE	The United States Department of Energy
СТА	Consumer Technology Association
PII	Personally Identifiable Information
HPWH	Heat pump water heater
HP HVAC	Heat pump space heater/cooler
Heat Pump	A HPWH or HP HVAC unit – a device that moves heat from one area to another in the opposite direction in which heat would normally flow. Common household appliances that use heat pumps include refrigerators and freezers.
Customer	The resident of the building/space into which equipment that receives a TECH incentive is installed
Contractor	The business that performs the installation of the heat pump equipment and receives the TECH incentive (along with any layered incentives paid through the TECH Incentive Clearinghouse)
QPL	Qualified product list, such as the HPWH qualified product list maintained by the Northwest Energy Efficiency Alliance (NEEA) https://neea.org/resources/hpwh-qualified-products-list

Background

Read Me: TECH Working Data Set

In September 2018, Senate Bill 1477 (Stern) directed the CPUC to develop and supervise the administration of the TECH Initiative, a statewide market development initiative, to advance the state's market for low-emission space and water heating equipment for new and existing residential buildings. CPUC was required to identify and target key low-emission space and water heating equipment technologies that are in an early stage of market development and that would assist the state in achieving its greenhouse gas emissions reduction goals. CPUC then issued Decision 20-03-027 Establishing Building Decarbonization Pilot Programs, including TECH Clean California.

Data Set Description

The TECH Working Data Sets provide anonymous data gathered from incentive applications submitted by TECH participating contractors as well as qualified product lists.

Data in the TECH Working Data Sets is presented on a per-installation basis, so each row represents a unique installation of either a HPWH or a HP HVAC system. All data is anonymized. Data fields (columns) describing each installation include:

- Information about the site, such as the California Climate Zone and CalEnviroScreen Disadvantaged Community status
- Data on the installed equipment and replaced equipment
- Total Project Cost (including equipment and installation costs)
- Incentive provided by TECH Clean CA and any layered partner programs
- Installation details describing the HPWH/HP HVAC installation, such as duration and quality installation measures performed by the installer.

There are two TECH Working Data Sets:

- 1. The **TECH Working Data Set_Single-Family** contains data on individual heat pump installations performed by contractors who typically service single-family homes and applied for an incentive through the TECH Clean California Single Family incentive program. This dataset includes data on a small number of installations performed in small Multifamily homes as well.
- 2. The **TECH Working Data Set_Multifamily** contains data on large-scale heat pump installations in multifamily residential buildings, sometimes involving large central systems that serve multiple apartments and/or many small unitary systems installed in adjacent apartments. Contractors applied for these incentives through the TECH Multifamily Incentive Program.

Data Sources

The primary data sources for the TECH Working Data Set include:

- Incentive applications completed by TECH participating contractors
- Qualified Product Lists maintained by the Air-Conditioning, Heating, and Refrigeration Institute (AHRI), Northwest Energy Efficiency Alliance (NEEA), and United States Department of Energy (<u>US DOE</u>)
- <u>CalEnviroScreen 4.0</u> Disadvantaged Community list
- Partner programs offering incentives that layer with TECH incentives (see the About TECH Clean CA webpage)

Frequency of Updates

Updates to the Working Data Set are published on a monthly basis.