



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460

OFFICE OF
AIR AND RADIATION

ENERGY STAR Smart Home Energy Management Systems Clarifications 06/10/2021

- 1. Are submetering devices required to meet the standby power requirements?** The standby power requirement and method of measurement is not applicable to submetering devices which do not have a low power or standby state. EPA has updated the [SHEMS specification](#) to reflect this clarification.
- 2. Does the smart light switch need to measure lighting load if my system always includes a whole-home load monitor that estimates the lighting load?** If the service provider is able to consistently report lighting energy consumption through other means, the smart light switch need not provide that function. For example, the service provider may use the load monitor to determine the lighting load controlled by the smart switch and estimate lighting energy consumption based on this information and the operational state of the switch.
- 3. Does a smart Heavy Duty Safety Switch (HDSS) used for on/off water heater control count as a water heater controller?** Yes. A load switch may qualify as a water heater controller provided it can be set up without using a third-party service (such as IFTTT) and it can power off the water heater based on occupancy. However, partners that use an HDSS for initial certification are encouraged to add functionality with an ENERGY STAR Water Heater or a dedicated-purpose water heater controller in the near future. *Note: since [field data regarding hot water control](#) is optional and we expect only to be monitoring it over time, data from installations without water heater control may be used in the field dataset required to pursue certification. However, water heater control must be available to prospective users at the time of certification.*
- 4. Can multiple models of a certain device type be included in a single SHEMS certification?** Yes, provided the SHEMS platform is able to connect to the devices and provide the minimum services in the Program Requirements. There are no limits to the number of ENERGY STAR certified thermostat or smart lighting product models that can be included in a SHEMS certification. The ENERGY STAR public listing is limited to displaying 5 plug load device models and up to 3 lighting load control device models, but service providers are encouraged to maintain a webpage with a complete list of compatible devices. Not all models need to be deployed in the field to remain a part of the certified bundle. Should a device in the ENERGY STAR public list lose compatibility with the service, service providers are expected to notify their Certification Body to update their listing.
- 5. Are there any specific requirements for how devices must be controlled based on Time of Use (TOU) utility prices?** The only requirements are that the system must be able to (a) retrieve and store TOU rate information either directly from the utility or via manual user entry; and (b) shift device energy use to decrease costs, taking into account user preferences. The device control strategies that are implemented to reduce energy costs are up to the service provider and may include such features as: thermostat setbacks; pre-cooling or pre-heating; dimming lights; or sending suggestions or scheduling prompts to users to run a major appliance at a different time. *Note: since [field data regarding TOU use](#) is optional and we expect only to be monitoring it over time, data from installations without TOU control capability may be used in the field data submitted for initial certification. However, TOU control must be available to prospective users (even if geographically limited) at the time of certification.*

Have an additional question? Please contact smarthomesystems@epa.gov.