

WAC 194-50-090 ASHRAE Standard 100, 2018—Section 9—Implementation and verification requirements.

9.1.1 Requirements. *Buildings* that have an energy target shall comply with the requirements of Section 9.1.1.1. *Buildings* that do not have an energy target shall comply with the requirements of Section 9.1.1.2. All *buildings* shall implement an energy management plan as described in Section 5. The energy management plan shall be integrated into the *building's capital management plan* as described in Section 5. The energy management plan shall include the elements listed in Section 5.

9.1.1.1 Buildings with energy targets. For *buildings* having energy targets, *energy efficiency measures (EEMs)* identified from the energy audit shall be implemented in order to meet the *building's* energy target. Develop a written plan for maintaining the *building's energy use intensity (EUI)* at or below the energy target.

Exceptions to Section 9.1.1.1:

1. **Investment criteria EEMs:** *Buildings* may demonstrate compliance by implementing all of the *EEMs* that achieve the investment criteria in Normative Annex X.

2. **District energy system EEMs:** Implementation of *EEMs* to *district energy system(s)* in lieu of or in combination with *EEMs* implemented directly to *campus buildings* is acceptable, provided the energy audit demonstrates the energy savings from the *district energy system EEMs* will be equal to or greater than the energy saved from the *EEMs* identified for the *buildings*. Energy savings shall be measured as a reduction in Btu per year.

3. **Grouped buildings EEMs:** Implementation of *EEMs* to non-Tier 1 covered *buildings* complying at the *grouped buildings* level is acceptable, provided the energy audit demonstrates the energy savings from the *EEMs* implemented at the *grouped buildings* level will result in a *WNEUI* at or below the energy target of the *grouped buildings*.

4. **Tier 2 covered buildings:** *Tier 2 covered buildings*.

9.1.1.2 Buildings without energy targets. *Buildings* that do not have an energy target shall implement all of the *EEMs* that achieve the investment criteria in Normative Annex X.

Exceptions to 9.1.1.2:

1. **District energy system EEMs:** Implementation of *EEMs* to *district energy system(s)* in lieu of or in combination with *EEMs* implemented directly to *campus buildings* is acceptable, provided the energy audit demonstrates the energy savings from the *district energy system EEMs* will be equal to or greater than the energy saved from the *EEMs* identified for the *buildings*. Energy savings shall be measured as a reduction in Btu per year.

2. **Tier 2 covered buildings:** *Tier 2 covered buildings*.

9.1.1.2.1 - Not adopted.

9.1.1.2.2 - Not adopted.

9.1.2.1 Training of Building Staff. An ongoing written training plan shall be implemented. *Building* occupants and staff shall be trained, at a minimum, as established by the operations and maintenance (O&M) program defined in Section 6.

9.1.2.2 Multiple buildings. A multiple-*building* plan shall be implemented to coordinate *EEM* implementation and measurement of the *EUI*

among *buildings* when complying at the *campus*, campus-level or *connected building* level.

9.1.2.3 Implementation and commissioning of EEMs. *EEMs* shall be implemented and commissioned in accordance with the Washington State Energy Code. Washington state energy code (*WSEC*) exceptions based on mechanical system or service water heating capacity shall not be applied when developing the scope for commissioning. For example, the 2018 *WSEC*, Section C408.1 General, the exceptions do not apply. The *qualified energy auditor* or *qualified person* shall review the commissioning report and certify that the *EEMs* are functioning as intended.

Informative Note: For guidance on commissioning protocols, refer to ASHRAE Guideline 0.2-2015 Commissioning Process for Existing Systems and Assemblies and ASHRAE Guideline 1.2-2019 Technical Requirements for the Commissioning Process for Existing HVAC&R Systems and Assemblies.

9.1.2.4 Energy efficiency sequencing. Implementation of *EEMs* shall be prioritized to take advantage of the life cycle of *building* systems and to minimize the disruption of *building* occupants. Delayed implementation shall be evaluated using the methodology included in Normative Appendix X and reported in the energy management plan.

9.2.2 Verification of implemented EEMs for Buildings without Energy Targets. Upon implementation of *EEMs*, the affected end-use systems shall be monitored for one year to verify *EEM* energy savings. The *qualified energy auditor* or *qualified person* shall review the results of the *EEM* energy monitoring and certify that the energy savings of the package of *EEMs* meets or exceeds 75 percent of the energy savings projected in the energy audit as required. For *buildings* unable to meet the requirements of Section 5.2 Building energy monitoring, the *qualified energy auditor* or *qualified person* shall provide verification using the methods of the *International Performance Measurement & Verification Protocol, Concepts and Options for Determining Energy and Water Savings Volume I*¹¹ options A through D.

9.3 Compliance. The *qualified person* shall complete the compliance documentation as required in Normative Annex Z.

ASHRAE Standard 100, 2018—Section 10 - Not adopted.

[Statutory Authority: RCW 19.27A.210. WSR 24-16-041, § 194-50-090, filed 7/30/24, effective 8/30/24. Statutory Authority: RCW 19.27A.210 and 19.27A.250. WSR 24-03-033, § 194-50-090, filed 1/8/24, effective 2/8/24. Statutory Authority: RCW 19.27A.210. WSR 20-22-059, § 194-50-090, filed 10/30/20, effective 11/30/20.]