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# Highlights from Revision 04 of the Multifamily New Construction (MFNC) Program

Revision 04 of the MFNC program has been posted to the <u>ENERGY STAR website</u>. Partners are permitted to use this Revision immediately, but must apply it to all buildings permitted on or after Jan. 01, 2025. The <u>Current Policy Record</u> contains all specific changes in this Revision. '<u>Mark-up</u>' documents showing all tracked changes except formatting are also available. EPA strongly encourages partners to review these documents. A summary of the most substantial updates is below:

#### **Multiple Program Documents**

- A requirement to inspect each townhouse has been added to the Certification Process Section of the National Program Requirements and the Footnotes of the National Rater Design Review Checklist and National Rater Field Checklist to reflect the sunset of sampling inspection protocols for townhouses for permits on or after 01/01/2025.
- The Certification Process Section of the National Program Requirements has been revised and a footnote has been added to the pre-drywall inspection date field of the National Rater Field Checklist to reinforce that a pre-drywall inspection is always required; that drywall must be entirely removed to fully verify all Items if it is installed prior to the inspection; and that the use of a Sampled Rating on a unit that has missed the inspection is not acceptable.
- Item 3.1 of the National Rater Design Review Checklist and Item 3.4 of the National Rater Field Checklist now clarify that for the ASHRAE and Prescriptive Paths, where a slab edge insulation exemption is used, F-factors must be entered into the Total UA Compliance option (5c) tab in the Multifamily Workbook to demonstrate compliance with Section 3 of the National Rater Design Review Checklist.
- Items 5.5 and 5.6 of the National Rater Field Checklist, Items 4.2 and 4.3 of the National HVAC Design Report, Item 4.1 of the National HVAC Design Supplement to Std. 310 for Dwellings & Units, and Item 4.2 of the National HVAC Design Supplement to Std. 310 for Common spaces & Central Systems clarify that electric resistance limitations do not apply to heat pumps with integral supplemental or emergency electric resistance heat.
- An allowance has been added to the National Rater Field Checklist, National HVAC Design Report and National HVAC Design Supplement to Std. 310: a rate of 50 CFM of continuous kitchen exhaust is permitted to be used, rather than 5 ACH, where the exhaust fan or intake grill is located within 10 ft. horizontally of the edge of the range.
- An allowance has been added to the National Rater Field Checklist, National HVAC Design Report, and National HVAC Design Supplement to Std. 310 for Dwelling & Units: inlets providing outdoor air to a dwelling unit are permitted to be ≥ 5 ft., rather than 10 ft., from both exhaust dwelling unit mechanical ventilation systems and local mechanical exhaust systems.
- Item 7.1 of the National Rater Field Checklist and Section 2 of the National HVAC Design Report have been clarified: when designers provide multiple ventilation designs with more than one airflow rate, the Rater is required to assess the run-time setting of the installed system and use that to determine the corresponding design ventilation airflow rate. The Rater-measured ventilation rate then must fall within the program-specified tolerance relative to this rate.
- Two new Items have been added to Section 4 of the National Rater Design Review Checklist to confirm that
  ventilation rates for all applicable common spaces in the building are listed on the HVAC Design Report. In addition,
  a Footnote has been added to the National Rater Design Review Checklist, the HVAC Design Report, and the
  National HVAC Design Supplement to Std. 310 for Common spaces & Central Systems, that clarifies which common
  spaces must meet ASHRAE 62.1 outdoor air requirements.
- A new allowance has been added to Item 7.3 of the National Rater Field Checklist, Item 2.9 of the National HVAC
  Design Report, and Item 2.4 of the National HVAC Design Supplement to Std. 310 for Common spaces & Central
  Systems: outdoor air is not required where a building has ≤ 250 ft² of corridor space and does not contain any of the
  other common spaces which require outdoor air.

# **National Program Requirements**

- To reinforce the original intent of the program, the Eligibility Requirements Section has been revised to state that only <u>detached</u> dwellings (e.g., single-family homes and duplexes), are not eligible to participate.
- A new program document has been referenced in the Eligibility Requirements Section that defines the applicable
  program requirements, including the minimum Version and Revision, to which a building is eligible to be certified. As
  a result, the Mandatory Compliance Date Section has been deleted.
- The Partnership, Training, and Credentialing Requirements Section has been revised to clarify that Raters, rather
  than Energy Rating Companies (ERC's), must be credentialed by an HCO or meet the credential requirements of an
  MRO prior to completing inspections.



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- To ensure more consistent implementation of the program, the allowance to use Provider discretion to define 'permit date' has been removed and a new alternative, based on the date of the Rater's first inspection, has been added.
- The Certification Process section has been revised to better convey that Raters are to verify that checklist items have been met within EPA-defined tolerances. Prior statements regarding verification may have incorrectly implied that Raters have the authority to interpret program intent, potentially leading to inconsistent implementation.
- The minimum EER requirement has been removed from the ENERGY STAR MF Reference Design.
- SEER2 and HSPF2 conversions have been added to the ENERGY STAR MF Reference Design.

### **National Rater Design Review Checklist**

- Two new Items have been added to Section 1 to ensure that Raters verify that ERC's have signed a Partnership Agreement and that Raters have met training and credentialing requirements prior to completing inspections.
- A new Item has been added to Section 1 to ensure that all dwelling units and the common spaces in the building are designed to meet the program requirements.
- The requirement to derate the wall UA for fasteners and openings has been removed from Section 3.

#### **National Rater Field Checklist**

- A qualifier stating "Up to 10%" has been added next to the builder-verified checkboxes for Item 1.2 and 1.3 to clarify
  that builders are not permitted to verify the entirety of these requirements. In addition, Footnote 1 now states that a
  maximum of 10% of the total surface area of non-adiabatic insulated assemblies are permitted to be builder-verified.
- An allowance has been added to Item 3.4 to use slab insulation with an equivalent or better F-Factor than that of the
  required prescriptive insulation. In addition, a new exemption has been added to the <u>Slab Edge Insulation</u>
  Exemptions and Alternatives, for a monolithic slab that extends from conditioned space to an adjacent garage.
- Item 3.4 has been updated to include a depth of 2 ft. in the Item rather than reference the IECC table which requires a depth of 2 ft. for all applicable climate zones.
- Slab 'at-grade' construction is now covered under Item 3.5 and removed from Item 3.4.
- A new alternative to use a derated U-Factor instead of insulating the concrete floor edge insulation was added to
  Item 3.5 for all podiums and projected slabs, and the old derate alternative for just projected slabs was removed.
  When using this alternative, the Total UA Compliance option (5c) tab in the Multifamily Workbook must be used for
  all Paths to show compliance with the overall insulation levels in Item 1.2.
- Item 3.5 has been revised to clarify that when using the alternative to install ≥ R-2 for projected slabs, for the ASHRAE and Prescriptive Paths the floor edge must be entered into the Total UA Compliance option (5c) tab in the Multifamily Workbook and for the ERI Path the floor edge must be modeled using the R-value of the insulation provided.
- The UA penalty for uninsulated columns has been removed from Item 3.6.
- The intentionally designed details that are included in the 10% area exempted from continuous wall insulation in Item 3.7.1 have been clarified.
- A new central exhaust duct leakage test allowance has been added to Item 6.7: where aerosol-based sealant is
  used on 100% of the exhaust ductwork between the fan and the grilles, the duct-dealing contractor may perform the
  test but sampling is not allowed, and the test may be performed at 25 Pa but the leakage allowance must be reduced.
- The requirement to have a heat trap (Item 11.3) has been removed.
- Item 7.3 now clarifies that sampling is only permitted where airflows are measured by the Rater, not where they are observed by the Rater.
- The requirement to measure hot water delivery temperature (Item 11.4) has been removed.
- To reinforce the ASHRAE Path requirement for the Rater to measure footcandles for spaces modeled with ≥ 30% lighting power savings, it is has been added to Item 12.3.

## National HVAC Design Report

• Items 4.10 and 4.27 now clarify that for AC's or HP's, the AHRI Reference # must represent the rated efficiency of the specific indoor and outdoor components and is recommended, but not required, to also encompass the furnace.

#### **National Water Management System Builder Requirements**

• Item 4.2 has been revised to clarify that moisture-resistant backing materials for tub / shower enclosures are only required where backing is present. For example, backing is not required behind a 3-piece fiberglass tub enclosure.