

DEPARTMENT OF LICENSING AND REGULATORY AFFAIRS

DIRECTOR'S OFFICE

CONSTRUCTION CODE

Filed with the secretary of state on June 4, 2021

These rules take effect 120 days after filing with the secretary of state.

(By authority conferred on the director of the department of licensing and regulatory affairs by section 4 of the Stille-DeRossett-Hale single state construction code act, 1972 PA 230, MCL 125.1504, and Executive Reorganization Order Nos. 2003-1, 2008-4, 2011-4, MCL 445.2011, 445.2025, and 445.2030)

R 408.30500, R 408.30504, R 408.30505, R 408.30506, and R 408.30513 of the Michigan Administrative Code are amended, R 408.30501b and R 408.30501c are added, and R 408.30512 and R 408.30514 are rescinded, as follows:

PART 5. RESIDENTIAL CODE

R 408.30500 Applicable code.

Rule 500. The provisions of the international residential code, 2018 edition, including appendices A, B, C, D, E, F, G, J, K, N, O, P, R, and S except for Sections R 104.2, R 104.3, R 104.5, R 104.7, R 104.8, R 104.8.1, R 105.3, R 105.3.1, R 105.3.2, R 105.6, R 105.9, R 108.3, R 108.4, R 108.5, R 108.6, R 109.1, R 112.2, R 112.3, R 112.4, R113.1 to R 113.3, R 113.4, R 114.1 and R 114.2, R 313.1.1 to R 313.2.1, R 602.11, R602.12, N 1102.3.2, tables R 507.2.3, N1101.12.3(3) and figure R 507.2.1(2), R 507.2.3(1), R 507.2.3(2), and R 507.2.4, sections M1411.8, G2411.1.1.1 to G2411.1.1.5, G2439.7.2, P2503.9, P2709.2.3, P2904.1.1 to P2904.8.2, P2905.1, P2905.2, figure P2904.2.4.2, table P2904.2.2, tables P2904.6.2(1) to P2904.6.2(9), P3009.1 to P3009.11.1, E3902.15, E3902.16, E3902.17, and AJ102.4, the IBC-2015, IECC-2015, IMC-2015, IPC-2015, NFPA 70-2014 listed in chapter 44 govern the construction, alteration, relocation, demolition, use, and occupancy of buildings and structures, and, with the exceptions noted, the international residential code is adopted by reference in these rules. All references to the International Building Code, International Residential Code, International Energy Conservation Code, National Electrical Code, International Existing Building Code, International Mechanical Code, and International Plumbing Code mean the Michigan Building Code, Michigan Residential Code, Michigan Energy Code, Michigan Electrical Code, Michigan Rehabilitation Code for Existing Buildings, Michigan Mechanical Code, and Michigan Plumbing Code, respectively. The code is available for inspection and purchase at the Department of Licensing and Regulatory Affairs, Bureau of Construction Codes, 611 W. Ottawa St., 1<sup>st</sup> Floor Ottawa Building, Lansing, Michigan 48933. The code may be purchased from the International Code Council, through the bureau's website at [www.michigan.gov/bcc](http://www.michigan.gov/bcc), at a cost as of the time of adoption of these rules of \$118.00.

February 26, 2021

R 408.30501b Intent.

Rule 501b. Sections 101.3 and 101.4 of the code are amended to read as follows:

R101.3. Intent. The purpose of this code is to establish minimum requirements to safeguard the public safety, health, and general welfare through affordability, structural strength, means of egress facilities, stability, sanitation, light and ventilation, energy conservation, and safety to life and property from fire and other hazards attributed to the built environment, and to provide safety to fire fighters and emergency responders during emergency operations. The Stille-DeRossett-Hale single state construction code act, 1972 PA 230, MCL 125.1501 to MCL 125.1531 takes precedence over all provisions of this code.

R101.4. Severability. If any section, subsection, sentence, clause, or phrase of this code is found to be invalid by a court of competent jurisdiction, such decision will not affect the validity of the remaining portions of this code.

R 408.30501c Existing structures.

Rule 501c. Section 102.7 is amended to read as follows:

R102.7. Existing structures. The legal occupancy of any structure existing on the date of adoption of this code shall be permitted to continue without change, except as is specifically covered in this code, the international property maintenance code, or the international fire code, or as allowed under the Stille-DeRossett-Hale single state construction code act, 1972 PA 230, MCL 125.1501 to MCL 125.1531.

R 408.30504 Duties and powers of building official.

Rule 504. Sections R104.6 of the code are amended to read as follows:

R104.6. Right of entry. If a building or premises is occupied, the code official shall present his or her credentials to the occupant and request entry. If a building or premises is unoccupied, the code official shall first make a reasonable effort to locate either the owner, the owner's authorized agent or other person having care or control of the building or premises and request entry. If entry is refused, the code official has recourse to every remedy provided by law to secure entry.

When a code official has first obtained a proper inspection warrant or other remedy provided by law to secure entry, the owner, owner's authorized agent or occupant or person having charge, care or control of the building or premises shall not fail or neglect, after a proper request is made as provided in this rule, to permit the code official prompt entry into the building or premises to inspect or examine the building or premises pursuant to this code.

R 408.30505 Work exempt from permit.

Rule 505. Section R105.2 of the code is amended to read as follows:

R105.2. Work exempt from permit. Exemption from the permit requirements of the code shall not be deemed to grant authorization for any work to be done in any manner in violation of the provisions of the code or any other laws or ordinances of this jurisdiction.

Permits are not required for any of the following:

(a) Building permits shall not be required for any of the following:

- (i) One-story detached accessory structures, if the floor area does not exceed 200 square feet (18.58 m<sup>2</sup>).
- (ii) A fence that is not more than 7 feet (2 134 mm) high.
- (iii) A retaining wall that is not more than 4 feet (1 219 mm) in height measured from the bottom of the footing to the top of the wall, unless supporting a surcharge.
- (iv) A water tank supported directly upon grade if the capacity is not more than 5,000 gallons (18 927 L) and the ratio of height to diameter or width is not greater than 2 to 1.
- (v) A sidewalk and driveway not more than 30 inches (762 mm) above adjacent grade and not over any basement or story below and not part of an accessible route.
- (vi) Painting, papering, tiling, carpeting, cabinets, counter tops, and similar finish work.
- (vii) A prefabricated swimming pool that is less than 24 inches (610 mm) deep, and not greater than 5,000 gallons (18 925 L), and is installed entirely above ground.
- (viii) Swings and other playground equipment accessory to detached 1- or 2-family dwellings.
- (ix) Window awnings in group R-3 and U occupancies, supported by an exterior wall that do not project more than 54 inches (1 372 mm) from the exterior wall and do not require additional support, as applicable in Section 101.2 and group U occupancies.
- (x) Decks, porches, patios, landings, or similar structures not exceeding 200 square feet (18.58 m<sup>2</sup>) in area, that are not more than 30 inches (762 mm) above grade at any point as prescribed by Section R312.1.1, are not attached to a dwelling or its accessory structures, are not within 36 inches (914 mm) of a dwelling or its accessory structures, and do not serve any ingress or egress door of the dwelling or its accessory structures.
- (b) Electrical permits shall not be required, as in accordance with the Michigan electrical code, R 408.30801 to R 408.30880, for any of the following:
  - (i) Repairs and maintenance: Minor repair work, including the replacement of lamps or the connection of approved portable electrical equipment to approved permanently installed receptacles.
  - (ii) Radio and television transmitting stations: The provisions of the code do not apply to electrical equipment used for radio and television transmissions, but do apply to equipment and wiring for power supply and to the installation of towers and antennas.
  - (iii) Temporary testing systems: A permit is not required for the installation of any temporary system required for the testing or servicing of electrical equipment or apparatus.
- (c) Mechanical permits shall not be required for any of the following:
  - (i) A portable heating or gas appliance that has inputs of less than 30,000 BTU's per hour.
  - (ii) Portable ventilation appliances and equipment.
  - (iii) A portable cooling unit.
  - (iv) Steam, hot water, or chilled water piping within any heating or cooling equipment or appliances regulated by this code.
  - (v) Replacement of any minor part that does not alter the approval of equipment or an appliance or make such equipment or appliance unsafe.
  - (vi) A portable evaporative cooler.
  - (vii) Self-contained refrigeration systems that contain 10 pounds (4.5 kg) or less of

refrigerant, or that are actuated by motors of 1 horsepower (0.75kW) or less.

(viii) Portable fuel cell appliances that are not connected to a fixed piping system and are not interconnected to a power grid.

(ix) An oil burner that does not require connection to a flue, such as an oil stove and a heater equipped with a wick.

(x) A portable gas burner that has inputs of less than 30,000 BTU's per hour.

(xi) When changing or relocating a gas meter or regulator, a permit is not required when installing gas piping which shall be limited to 10 feet (3 005 mm) in length and not more than 6 fittings.

(xii) When installing geothermal vertical closed loops under the supervision of a mechanical contractor licensed in HVAC as long as the company meets both the following:

(A) Has obtained a certificate of registration as a well drilling contractor pursuant to part 127 of the public health code, 1978 PA 368, MCL 333.12701 to 333.12771.

(B) Has installed the geothermal vertical closed loops in accordance with the department of environment, Great Lakes, and energy's best practices regarding geothermal heat pump

closed loops. Exemption from the permit requirements of this code shall not be deemed to grant authorization for work to be done in violation of the provisions of this code or other laws or ordinances of this jurisdiction.

(d) Plumbing permits shall not be required for either of the following:

(i) The stopping of leaks in drains, water, soil, waste or vent pipe. If any concealed trap, drainpipe, water, soil, waste or vent pipe becomes defective and it becomes necessary to remove and replace the same with new material, then the work is considered as new work and a permit shall be obtained and inspection made as provided in the code.

(ii) The clearing of stoppages or the repairing of leaks in pipes, valves, or fixtures, and the removal and reinstallation of water closets, if the repairs do not involve or require the replacement or rearrangement of valves, pipes, or fixtures.

R 408.30506 Submittal documents.

Rule 506. Sections R 106.1.4 and R802.10.1 of the code are amended and Section R106.1.4 and figure 802.10.1 are added to the code to read as follows:

R106.1.4. Truss design data. As an alternative to the submission of truss design drawings, figure R802.10.1, the truss design data sheet, may be provided to the building official as part of the construction documents at the time of application. Truss design drawings shall be submitted to the building official prior to truss installation as required by Section R802.10.1.

R802.10.1 Truss design drawings. Truss design drawings, prepared in conformance with Section R802.10.1, shall be provided to the building official and approved prior to installation. The truss design data sheet, figure R802.10.1, may be provided to the building official at the time of permit application, as an alternative to design drawings as permitted in Section R106.1.4. Truss design drawings shall include, at a minimum, the information specified below. Truss design drawings shall be provided with the shipment of trusses delivered to the jobsite.

(1) Slope or depth, span, and spacing.

- (2) Location of all joints.
- (3) Required bearing widths.
- (4) Design loads as applicable.
  - (a) Top chord live load (including snow loads).
  - (b) Top chord dead load.
  - (c) Bottom chord live load.
  - (d) Bottom chord dead load.
  - (e) Concentrated loads and their points of application.
  - (f) Controlling wind and earthquake loads.
- (5) Adjustments to lumber and joint connector design values for conditions of use.
- (6) Each reaction force and direction.
- (7) Joint connector type and description (e.g., size, thickness, or gauge) and the dimensioned location of each joint connector except where symmetrically located relative to the joint interface.
- (8) Lumber size, species, and grade for each member.
- (9) Connection requirements for the following:
  - (a) Truss to truss girder.
  - (b) Truss ply to ply.
  - (c) Field splices.
- (10) Calculated deflection ratio and/or maximum description for live and total load.
- (11) Maximum axial compression forces in the truss members to enable the building designer to design the size, connections, and anchorage of the permanent continuous lateral bracing. Forces shall be shown on the truss design drawing or on supplemental documents.
- (12) Required permanent truss member bracing location.

R 408.30512 Rescinded.

R 408.30513 Definitions.

Rule 513. The definitions of attic and sunroom addition in Section R202 of the code are amended to read as follows:

R202. Definitions.

“Attic, uninhabitable with limited storage” means uninhabitable attics with limited storage where the minimum clear height between joists and rafters is 42 inches (1 063 mm) or greater or where there are not 2 or more adjacent trusses with web configurations capable of accommodating an assumed rectangle 42 inches (1 063 mm) high by 24 inches (610 mm) in width, or greater, within the plane of the trusses.

“Attic, uninhabitable without storage” means uninhabitable attics without storage where the maximum clear height between joists and rafters is less than 42 inches (1 063 mm), or where there are not 2 or more adjacent trusses with web configurations capable of accommodating an assumed rectangle 42 inches (1 063 mm) high by 24 inches (610 mm) in width, or greater, within the plane of the trusses.

“ Building Inspector” means the individual who is responsible for the administration and enforcement of the construction of buildings, structures, or appurtenances under the state

construction code specified in R 408.30499 and who is registered in compliance with 2016 PA 407, MCL 339.5101 to 339.6133.

“Building Official” means the person who is appointed and employed by a governmental subdivision, who is charged with the administration and enforcement of the state codes specified in R 408.30499, and who is registered in compliance with 2016 PA 407, MCL 339.5101 to 339.6133.

“Registered design professional” means an individual who is licensed under the occupational code, 1980 PA 299, MCL 339.101 to 339.2919.

“Registered inspector” means an individual who is licensed under the occupational code, 1980 PA 299, MCL 339.101 to 339.2919.

"Sunroom addition" means a new structure with glazing in excess of 40% of the gross area of the structure's exterior walls and roof added to an existing dwelling.

R 408.30514 Rescinded.