

**CONCORD TOWNSHIP DECK REQUIREMENTS**  
**FOR PERMIT APPLICATION/REVIEW**

- Design criteria are to be per **IRC-2006**, as amended, by **PA-UCC**.
- Two (2) sets of architectural plans, fully dimensioned with specifications, drawn to scale are required. Plans are to include a footing plan; framing plan; complete section(s); stairs, guardrail and handrail details and section; deck guardrail detail and section; and finished deck plan view. A graspable handrail 34"–38" height, measured vertically from the stair tread nose is to be provided on all stairs with four (4) or more risers. When a combination guard-hand rail is used then the minimum overall height is to be 34" measured vertically from the stair tread nose. Provide a cross section with dimensions of proposed handrails. Handrail brackets are to be approximately 30" apart. Handrails are to have a maximum grip size of 2-1/4" across, and minimum 1-1/4" across, and maximum perimeter of 6-1/4", and a minimum perimeter of 4". Handrails with greater than 6-1/4" perimeter must provide a graspable finger recess on both sides of the profile, as dictated by code.
- Stairways may not be less than 3 feet in clear width. Handrails shall not project more than 4-1/2" on either side of the stairway.
- A 36" high guardrail is to be provided around all decks/floor surfaces greater than 30" above grade. Guardrails are to be constructed as non-climbable (vertical balusters only). No sunbursts, diagonal, horizontal, or other designs that provide a ladder effect or allow a passage of a 4" diameter spherical object.
- Treads are required to be 9" min. measured horizontally nose to nose. All treads may have a uniform projection of not more than 1 ½ inches when solid risers are used. The greatest tread depth within any flight of stairs may not exceed the smallest by more than 3/8 inch. Show on details.
- The maximum riser height is 8 1/4 inches. There may be no more than a 3/8 inch variation in riser height within a flight of stairs. The riser height is to be measured vertically between leading edges of the adjacent treads. Show on details.
- All components of the deck (posts, beams, joists, flooring, guardrails, balusters, stairs) must show the type/grade of lumber to be used. Example, "southern yellow pine, No. 2 pressure treated (ACQ)". Decking min. Of 5/4" @ 16" joists spacing. All joists must be attached to ledger using approved metal. Hangers, and 10p hot dipped galvanized nails, (or approved equal as per P.T. lumber provider).

- Decks 6' above grade measured from the deck floor are to be supported by 6x6 posts, min. Deck height to be shown on plans. Posts are required to be anchored to the piers with proper post-based anchors & bolts.
- All decks with spas, roofs, enclosures, etc., on them require signed and sealed plans/specifications by the design professional responsible for the design of the project. All design loads are to be indicated on the plans.
- Decks attached to trusses, or engineered joists are required to have signed & sealed plans/specifications by the registered design professional responsible for the design of the project.
- Additional sections, details, specifications will be required for complex, multi-level, angular decks, etc.
- The department reserves the right to require any deck plan to be signed and sealed by a registered design professional responsible for its design.
- Any material other than (ACQ-type) pressure treated lumber, or cedar shall have a current ICC research report or evaluation report on that product. All requirements contained in the report must be complied with, and all plans and specifications are required to be signed and sealed by a registered design professional responsible for the design of the project.
- Sway bracing is required on decks over 8' high above grade, measured from the deck floor. Sway bracing may be required on lower decks depending on construction/conditions determined in the field. At a minimum 2x bracing must be applied to the bottom of the joists at full diagonal spans.
- All decks over 8' high above grade, measured from the deck floor, required to be signed and sealed by a registered design professional responsible for the design of the project.
- Decks attached to cantilevers, (bow or bay structures) must be signed & sealed by a registered design professional responsible for the design of the project.
- All post to beam/brace connections must be bolted using two 1/2" min. hot dipped galvanized carriage bolts spaced at 2-1/2" vertically and torque to medium fiber compression. (See details of typical post-beam connections).
- The ledger board, aka/ nailer board, must be uniformly attached to the structure's rim board using similar type 1/2" carriage bolts with nut and washer assemblies, @ 16" O.C. with a 5" min. staggered vertical spacing, (2" from edge min.), torque to medium fiber compression. Lag bolts; 6"

long min., may be substituted when required, provided that penetration is made through the existing rim board, and is visible along the interior, when possible.

- **NOTE:** Contractor must verify that existing conditions are adequate prior to attachment. The township official must be notified when adverse conditions are encountered.
  
- All footings must be at a minimum 12x12 in. And must rest at least 36” below surface on undisturbed soil. Diameter and depth of footing may increase depending on design conditions of the structure as well as the supporting soils.