

CHANGE TYPE: Modification

CHANGE SUMMARY: For glazing that is not considered to be in a hazardous location, the rule for the minimum height above a tread at the side of a stairway is now 36 inches to correspond to the height of a guard as previously found in the exception. Other revisions to the text clarify the meaning and application of the glazing requirements at stairways.

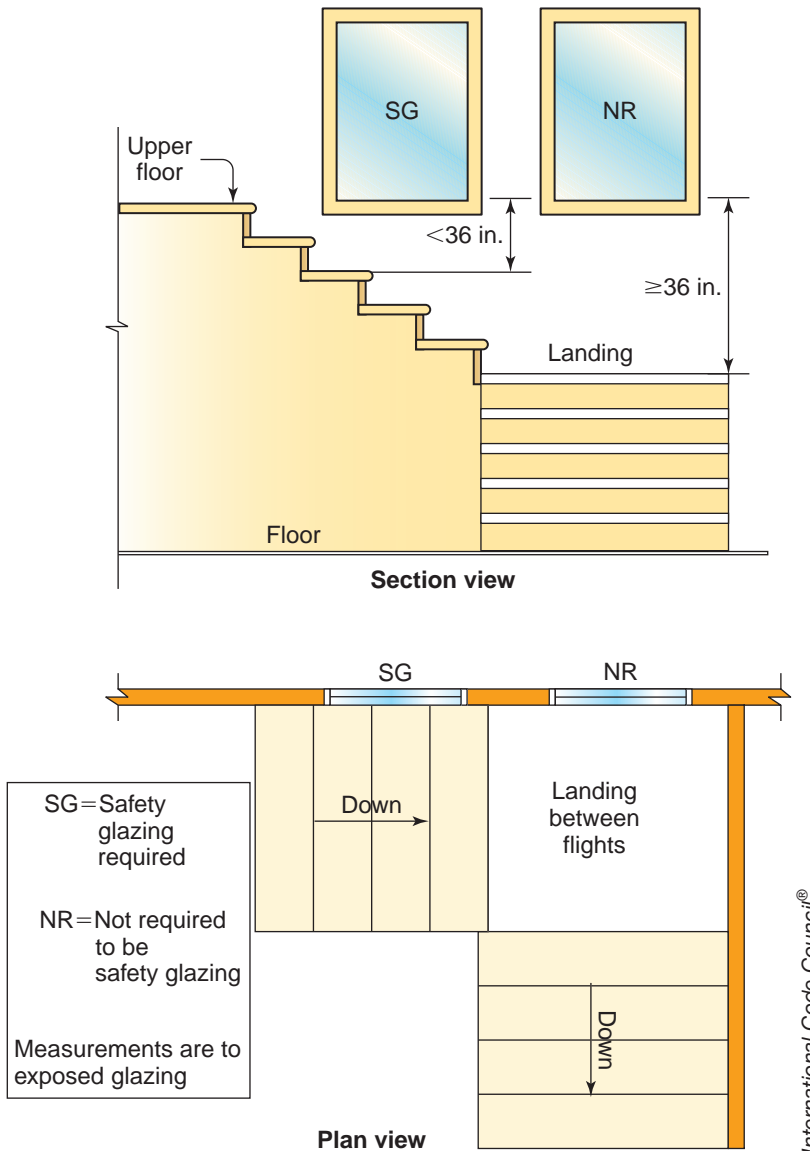
R308.4.6

Glazing Adjacent Stairs and Ramps

2012 CODE: 7. **R308.4.6 Glazing Adjacent Stairs and Ramps.**

Glazing adjacent to stairways, landings, and ramps within 36 inches (914 mm) horizontally of a walking surface when where the bottom exposed surface edge of the glazing is less than 60 36 inches (1524 914 mm) above

R308.4.6 continues



Glazing adjacent stairs and landings between flights of stairs.

R308.4.6 continued

the plane of the adjacent walking surface of stairways, landings between flights of stairs and ramps shall be considered a hazardous location.

Exceptions:

1. When a rail is installed on the accessible side(s) of the glazing 34 to 38 inches (864 to 965 mm) above the walking surface. The rail shall be capable of withstanding a horizontal load of 50 pounds per linear foot (730 N/m) without contacting the glass and be a minimum of 1½ inches (38 mm) in cross sectional height.
2. Glazing 36 inches (914 mm) or more measured horizontally from the walking surface.
2. ~~The side of the stairway has a guardrail or handrail, including balusters or in-fill panels, complying with Sections R311.7.6 and R312 and the plane of the glazing is more than 18 inches (457 mm) from the railing; or~~
3. ~~When a solid wall or panel extends from the plane of the adjacent walking surface to 34 inches (863 mm) to 36 inches (914 mm) above the walking surface and the construction at the top of that wall or panel is capable of withstanding the same horizontal load as a guard.~~

CHANGE SIGNIFICANCE: Stairs present a greater risk of falls than level surfaces, and the code recognizes the need for safety glazing when glazing is installed at the sides of stairways. The provisions related to glazing at stairways have been confusing for many code users. Previously, the rule stated that the glazing (other than safety glazing) must be installed at least 60 inches above the walking surface (a tread or a landing). An exception to the rule allowed installations less than 60 inches above the walking surface without requiring safety glazing provided a solid wall or panel protected the glazing to a height of 34 to 36 inches. The intent was that a window installed in a wall with the bottom exposed edge of the glazing at least 34 inches above the tread was not considered to be in a hazardous location. Because this is the most common installation of glazing at stairways, it becomes the rule for the 2012 edition of the IRC in Subsection R308.4.6 for glazing adjacent to stairs and ramps. In addition, the new text clarifies that this subsection applies to glazing located adjacent to intermediate landings between flights, but not to the top and bottom landings of the stairway between stories. The floor or landing at the top of the stairway is not considered a hazardous location, as some code users had inferred from the 2009 language. The bottom landings of stairways are now only addressed in the next subsection.

For glazing at the sides of stairways, the previous range of 34 to 36 inches was intended to correspond to the minimum heights of handrails and guards, respectively, but implied to some that there was a maximum height limit. In any case, a range of dimensions is not appropriate in this case and the code now sets a minimum height of 36 inches to correspond to the guard requirements. Revision of these provisions clarifies the meaning, provides objectively measurable dimensions, and brings consistency to the application of glazing requirements at stairways. Satisfying any one of the following three conditions means the glazing at the side of the stairs, ramps, and intermediate landings is not considered to be in a hazardous location and therefore does not require safety glazing:

- The bottom exposed edge of the glazing is not less than 36 inches above the plane of the walking surface.
- The glazing is at least 36 inches from the edge of the walking surface measured horizontally.
- A rail (typically a handrail) meeting the applicable loading and dimension requirements is installed at a height of 34 to 38 inches above the plane of the walking surface.

The significant deletion from the stairway glazing provisions relates to the installation of a guard combined with a minimum horizontal clearance requirement. Previously, an exception permitted the installation of a guard to protect glazing that was less than 36 inches above the walking surface, if a horizontal clearance greater than 18 inches was provided between the guard and the glazing. If these criteria were satisfied, safety glazing was not required. The guard and 18-inch horizontal clearance requirements have been deleted from the 2012 IRC because a much less restrictive option already exists. The code permits a single rail, such as a handrail, with no infill panels to protect the glazing without any horizontal clearance requirement.