

RESIDENTIAL STAIRWAYS

Stairs: The maximum riser height shall be 8 inches and the minimum tread depth shall be 9 inches. The riser height shall be measured vertically between leading edges of the adjacent treads. The tread depth shall be measured horizontally between the vertical planes of the foremost projection of adjacent treads and at a right angle to the tread's leading edge. The walking surface of treads and landings of a stairway shall be sloped no steeper than one unit vertical in 48 unit's horizontal (2-percent slope). The greatest riser height within any flight of stairs shall not exceed the smallest by more than $\frac{3}{8}$ inch. The greatest tread depth within any flight of stairs shall not exceed the smallest by more than $\frac{3}{8}$ inch. Stairways shall not be less than 36 inches in width.

Headroom: The minimum headroom in all parts of the stairway shall not be less than 6 feet 8 inches measured vertically from the sloped plane adjoining the tread nosing or from the floor surface of the landing or platform.

Handrails: Stairways within dwelling units are permitted to have a handrail on one side only. The top of handrails shall be placed not less than 34 inches or more than 38 inches above the nosing of treads and landings. A stairway having less than 4 risers and serving one dwelling unit need not have handrails.

Guardrails: Raised floor surfaces located more than 30 inches above the floor or grade below shall have guardrails not less than 36 inches in height. Open sides of stairs with a total rise of more than 30 inches above the floor or grade below shall have guards not less than 34 inches in height measured vertically from the nosing of the treads. The triangular opening formed by the riser, tread and bottom of a guard at the open side of a stairway are permitted to be of such a size that a sphere 6 inches cannot pass through. Openings for required guards on the sides of stair treads shall not allow a sphere $\frac{43}{8}$ inches to pass through.

