

T-BAR CEILING GRID REQUIREMENTS

As per ASCE Standard 13.5.6.2.2:

- a. A heavy-duty T-bar grid system shall be used.
- b. The width of the perimeter supporting closure angle shall not be less than 2.0 inches. In each orthogonal horizontal direction, one end of the ceiling grid shall be attached to the closure angle. The other end in each horizontal direction shall have a 0.75-inch clearance from the wall and shall rest upon and be free to slide on a closure angle.
- c. For ceiling areas exceeding 1,000 ft², horizontal restraint of the ceiling to the structural system shall be provided. The tributary areas of the horizontal restraints shall be approximately equal.
- d. For ceiling areas exceeding 2,500 ft², a seismic separation joint or full height partition that breaks the ceiling up into areas not exceeding 2,500 ft² shall be provided unless structural analyses are performed of the ceiling bracing system for the prescribed seismic forces that demonstrate ceiling system penetrations and closure angles provide sufficient clearance to accommodate the anticipated lateral displacement. Each area shall be provided with closure angles in accordance with item 2 and horizontal restraints or bracing in accordance with item 3.
- e. Except where rigid braces are used to limit lateral deflections, sprinkler heads and other penetrations shall have a 2-inch oversize ring, sleeve, or adapter through the ceiling tile to allow for free movement of at least 1 inch in all horizontal directions. Alternatively, a swing joint that can accommodate 1 inch of ceiling movement in all horizontal directions is permitted to be provided at the top of the sprinkler head direction.
- f. Changes in ceiling plan elevation shall be provided with positive bracing.
- g. Cable trays and electrical conduits shall be supported independently of the ceiling.