

NOISE CONTROL RESILIENT CEILING
KSCH HANGER
Patent No. 7,028,432
SELECTION GUIDELINES

IMPORTANT! PLEASE READ FIRST:

*These suggested selection guidelines represent generally accepted procedures for properly selecting Kinetics Noise Control KSCH for ceiling system isolation. These suggestions may be followed, modified, or rejected by the owner, engineer, contractor, and/or their respective representative(s) since they, not Kinetics Noise Control, are responsible for planning and executing procedures appropriate to a specific application. Kinetics Noise Control reserves the right to alter these suggestions and encourages contact with the factory or its representatives to review any possible modification to these suggested guidelines prior to commencing selection. **Note that selection guidelines are intended for basic drywall ceilings only. When hanging MEP or other equipment other than lightweight lighting fixtures or lay-in tile, please contact your local Kinetics representative for additional assistance.***

1. Define ceiling area being isolated and sketch a layout showing the ceiling hanger locations per the following criteria (refer to layout diagram below):
 - A. Isolators installed at the perimeter must be located not more than 16" from the edge of the isolated ceiling; maintain at least a three-inch clearance from the perimeter.
 - B. Isolators may be located up to 48" along the perimeter of the isolated ceiling.
 - C. Isolators mounted mid-room (i.e., those isolators not at the perimeter) may be located up to 48" on center each way (o.c.e.w.).
 - D. Many room configurations will require non-conventional placement of isolation hangers to support the gypsum board ceiling (i.e., every isolated ceiling cannot be laid out in even rows in each direction). Consideration must be given to supporting the gypsum board ceiling adequately; this may require unique spacing arrangements to accommodate installation of the ceiling grid.
2. Once spacing of the ceiling hangers is determined and sketched, three (3) general areas of the ceiling require load calculations: mid-room, along the perimeter, and in the corners. The total number of calculations required depends on how varied the spacing of the hangers is in each of these areas.
3. Determine the total weight of the layers of gypsum wallboard and ceiling grid components being supported by the isolation hangers. The chart below is useful in determining common weights for materials used in isolated ceiling construction:

Building Material	Weight (psf)
R11 (3-1/2" Fiberglass)	0.50
1-1/2" CRC and 7/8" DWF	0.50
1/2" Gypsum Board (Type X)	1.90
5/8" Gypsum Board (Type X)	2.33

- Additional items such as lighting fixtures or a lay-in tile ceiling may be suspended from the gypsum board/ceiling grid assembly. The weight of these items needs to be considered when determining the appropriate number/capacity of hangers required.
- Calculate load at each hanger location:

_____ lbs/hanger = Total PSF of ceiling materials x SF area carried by hanger

Where, PSF = pounds per square foot
 SF = square feet

- Select appropriate hanger for each location from chart below. Designated model numbers indicate the load at which the isolator deflects 5/8" (in addition to the 3/8" preload set at factory). Every hanger has at least a 50% overload capacity; it is possible to slightly exceed the maximum capacity shown in the chart below:

KSCH	Outer Spring	Inner Spring
22	Gray	-
35	Blue	-
48	Black	-
73	Gray	Silver
90	Brown	-
120	Orange	-
140	Brown	Silver
172	Red	-
223	Red	Silver