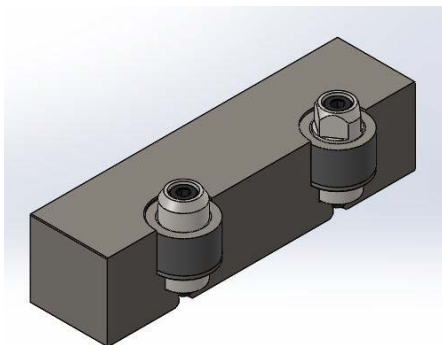


Installation Instructions for 12mm Diamond and Circular Taper Locating Pins and Bushings

Locator Pin Bushings set consist of Diamond and Circular 12mm pins
(PN 51000 w/4mm screws, or PN 52000 w/8-32 screws), 12mm bushing (2pk, PN 45070)

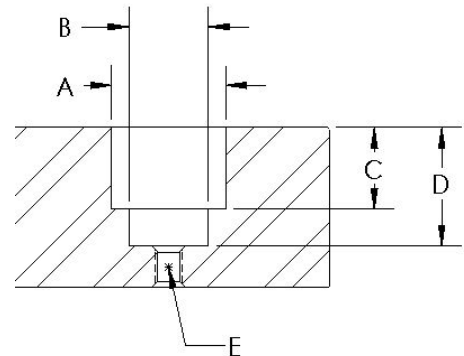
NOTE: Properly installed pins provide true location of mounted item to fixture <0.0004" (0.01mm)

INTERFERENCE FITS: In any pressfit installation, metal is displaced. Usually, a combination of bushing closure and jig plate distortion results, therefore the best practice is to use the minimum interference necessary to retain the bushing in the jig plate. Typical diametrical interference of 0.0005" (0.0127mm) to 0.0008" (0.02032mm) for liner bushings often results in bushing closure resulting in the circular diamond pin set being difficult to install and remove, therefore a light interference of 0.0003" (0.00762mm) is recommended ("A" dim). A very small amount of anaerobic retaining compound may be applied to the OD on of the bushing if the "A" dim is slightly over dimension.

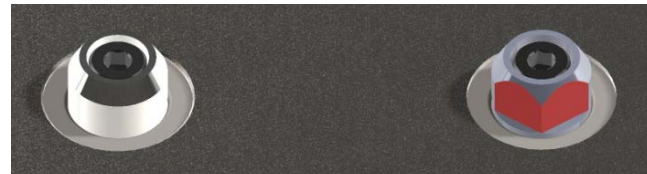


Bushing Machine Prep

- "A" = 0.7094/0.7096 (18.018/18.024mm)
- "B" = 0.485/0.505 (12.31/12.93mm)
- "C" = 0.500/0.520 (12.70/13.21mm)
- "D" = 0.73/0.75 (18.5/19.1mm)
- "E" = 8-32x1 (PN 52000),
M4-0.7x25 (PN 51000)



Correct



Incorrect

Installation Orientation of Diamond and Circular Taper Locating Pins

The 12mm Circular Taper Pin is designed to position the mounted item in the X-Y plane. The Diamond Pin of a Pin Set (PNs 51000 and 52000) is to prevent the mounted item from rotation about the circular pin. So that positional accuracy is maintained and the mounted item can be readily separated from the fixture, **be sure the diamond pin is set in the bushing such that the pointed edged of the diamond faces the circular pin** (see images above).