

AH-3 Unit (For Round Holes)

Assembly and Punch and Die Replacement

Lower Arm Assembly

Pilot Pin Removal: To remove the pilot pin, thread the ¼-20 x ½ set screw into the holder to back the pilot pin out of its hole.

Pilot Pin Installation: Use a brass or aluminum hammer to install the pilot pin assembly (P/N 1001) into the hole on the bottom of the holder under the die. Ensure the pilot pin is perpendicular to the bottom and extends 3/32" from the bottom surface. Thread the 1/4-20 x 1/2 set screw (P/N 91332), supplied with the pilot pin, until it touches the bottom of the hole, being careful not to push the pilot pin back out.



Die Removal: To remove the round die (P/N 2524), turn the unit on its side and unscrew the two S.H.C.S (P/N 91041) from the lower arm. Then lift the round die up and out of the unit.

Die Installation: First make sure the die and die seat are free of debris. Then insert the round die (P/N 2524) with the cutting edge on the top, being sure the die is fully seated in the lower arm of the holder. Insert the two S.H.C.S (P/N 91041) up thru the lower arm of the holder and into the bottom of the block die and tighten.

Upper Arm Assembly

First check punch and die alignment. Externally lubricate punch body (P/N 2513) with a thin even coat of lubricant (e.g. P/N 8007 Molykote® type G-N metal assembly paste). Assemble the punch body up thru the bottom of the punch driver (P/N 3779) and loosely thread the punch screw (P/N 91260) only a few threads, by hand, into the punch. Drop the punch through the guide bore of the holder, gradually lowering the punch into the die. Visually look to see that the die clearance is even all the way around. If the die clearance is uneven, contact UniPunch.

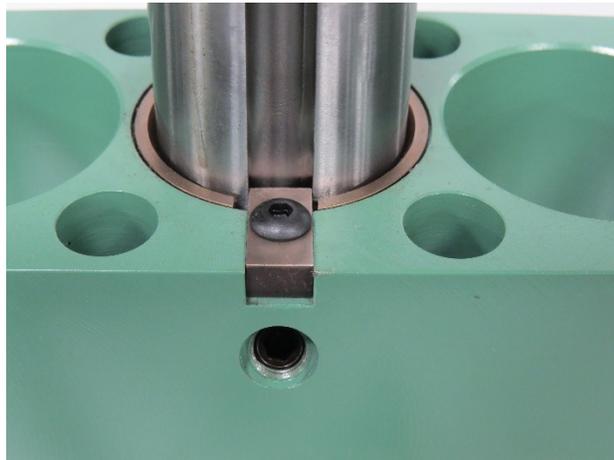
Pull the punch and punch driver back out of the unit. Assemble the (4) lifter springs (P/N 3774) into the four small pockets on the upper arm of the holder. Then assemble the stripper plate (P/N 3773)

on the underside of the upper arm by inserting the four stripper bolts (P/N 3784) down thru the center of the lifter springs and tighten into the stripper plate.

Assemble the (2) spring spacers (P/N 3742), with the pilot facing up, into the two large pockets on the upper arm. Assemble the two smaller stripping springs (P/N 3741) into the center of the two larger stripping springs (P/N 3740). Then drop these stripping spring assemblies into the two larger pockets on the upper arm on top of the spring spacers.

Next, assemble the punch and punch driver assembly into the punch plate (P/N 3772) with the F.H.S.C.S. (P/N 91260), making sure the keyway on the punch driver is 90 degrees to the right of the front of the punch plate. Lubricate the punch driver with a thin even coat of lubricant (e.g. P/N 8007 Molykote® type G-N metal assembly paste). Drop the punch and punch plate assembly down into the guide bore of the unit and make sure the stripping springs are captured in the pockets on the bottom side of the punch plate.

Insert the half dog point S.S.S. (P/N 91360) into the side of the upper arm. Align the keyway on the punch driver with the half dog point S.S.S until it touches the punch driver. Back it out half a turn to allow the punch driver to move up and down freely.



Converting a Round Unit to a Shaped Unit

Purchase a key kit (P/N 9307) and the appropriate shaped punch and die.