

# Miracle Click Pen Kits Assembly Instructions

## Required Accessories

- 7mm pen mandrel
- 2-piece Bushing Set
- 7mm Drill Bit
- 7mm barrel trimmer
- Live Tailstock Center
- Glue (Thick CA or Epoxy)

## Preparing the Blank

- Cut 1 blank to the length of the tube and add 1/16" for squaring off.
- Drill a 7mm hole lengthwise through the blank.
- Spread glue over the tube; insert the blank with a twisting motion to spread the glue evenly inside.
- Center the tube lengthwise inside the blank.
- When the glue is dry, square the ends of the blank. Use a barrel trimmer, or a universal pen blank squaring jig with a power disc sander. Take the excess material down flush with the ends of the brass tube. (Do not trim beyond the length of the tube since this may interfere with operation of the mechanism and assembly). Use a barrel trimmer to clean the inside of the tube.



## Turning the Blank

- Mount the bushings and blank according the diagram above.
- Thread on the knurled nut and hand tighten to hold all components in place.
- Slide the tailstock up snugly against the mandrel shaft inserting the live center point into the mandrel dimple, lock in place.
- Hand tighten the quill adjustment to firm up the mandrel. (DO NOT overtighten, it could damage the mandrel).
- Using sharp tools, turn the blank down close to the bushing diameter. Turn the barrel (straight or to a profile of your choice)
- Sand the blank down to be flush with the bushings gradually increasing the sandpaper grits.
- Finish the barrel with your choice of polish. Allow sufficient time for the polish to cure.

## Diagram A



## Assembly

- Arrange parts according to Diagram A.
- Press the Click assembly with the Clip into one end of the Tube.
- Press the Coupler into the other end of the Tube.
- Slide the Click mechanism into the end of Click/Clip assembly.
- Insert the Refill with the Spring into the open end of the Coupler. Note: Make sure the Refill go through the tube end to show the Click mechanism.
- Thread the Tip onto the Coupler.
- Thread the Click spring and the Plunger onto the end of the Click assembly. Note: Do not over tighten the assembly onto the Click Mechanism.
- To advance the refill press the end of the click mechanism, to retract the refill press the end of the click mechanism again.