Raw Metal Rollerball & Fountain Pen Kits

Kit Features:
- Easy to turn with straight tubes
- Minimum parts - easy to assemble
- Rollerball uses Schmidt Refill
- Fountain uses German Iridium #6 Fine Nib
- Available in multiple finishes
- Overall Length: 5-1/2"

Required Accessories:
- 7mm Pen Mandrel
- Drill Bit(s): #PKEXEC-38
- Bushing set (2/3 pc): #PKMAJSQBU
- Barrel Trimming set: #PKTRIM38
- Live Tailstock Center
- 2 Part Epoxy Glue or Insta Cure (Cyanoacrylate) Glue
- Pen Blank: Minimum Size - 3/4” x 3-1/32”

Preparing the Blank:
- Cut one blank to the length of the tube, adding 1/16” for squaring off (approx 3-1/32”).
- Drill 3/8” hole lengthwise through the blank.
- Spread glue over the tube, insert the tube into 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 blanks, making sure the trimmed ends are 90° to the tube. Use a 3/8” barrel trimmer, or a pen blank squaring jig with a 3/8” sleeve on a disc sander. Take the excess material down flush to the ends of the tubes. Do not trim past the end of the tube since this may interfere with the operation of the mechanism and assembly. Use a barrel trimmer to clean the inside of the tube.

Diagram A / Parts Layout
**Turning the Blank**
- Mount the bushings and blanks according to Diagram B.
- 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 Tailstock.
- Hand tighten the quill adjustment on the tailstock to steady the mandrel. Do not over-tighten, it could damage the mandrel shaft.
- When using Mandrel Saver, there is no need for extra spacer bushings or the knurled nut. Slide tailstock directly against bushings and tighten until blank and bushings are secure.
- 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 sandpaper grits.
- Finish the barrel using your choice of polish. Allow sufficient time for the polish to cure—refer to polish instructions.

**Assembly**
- Arrange parts according to Diagram A.
- Press Tip Coupler into either end of Barrel.
- Press Threaded End Cap into the other end of barrel.

**ROLLERBALL PEN:**
- Drop the spring - wide side first - through the tip coupler.
- Remove the cap from the refill and insert refill - flat side first - through the coupler.
- Thread tip over refill and into the tip coupler
- To change refill, unscrew tip and remove and replace refill. Careful not to lose the spring.

**FOUNTAIN PEN:**
- Affix the ink reservoir into the opening at the nib assembly, push in to connect.
- Thread the assembly into the tip coupler.
- Cap is to be threaded onto tip coupler when pen is not in use.