## **BIRD TWIST PEN KIT**

#### **Kit Features:**

- Stylish Bird Silhouette Cap Design and Feather Clip
- Reliable Schmidt Twist Mechanism
- · Easy to Turn With Single Tube
- Minimal Parts--easy to assemble
- · Available in multiple finishes
- · Overall Length: 5-5/8"
- USES REFILL: PKPARK-R5

#### **Required Accessories:**

- 7mm Pen Mandrel
- Drill Bit: #PKEXEC-38 for Plastic, #PK-38BP for Wood
- Bushing Set(2pc): #PKFEDBU
- Barrel Trimming set: #PKTRIM38 or Squaring jig with 3/8" sleeve from PKTRIMSET on disc sander
- · Live Tailstock or Mandrel Saver
- 2 part Epoxy or Thick CA (Cyanoacrylate) Glue
- Pen Blank Minimum Size: 5/8" x 5/8" x 2-5/16"L

#### **DIAGRAM A / PARTS LAYOUT**



#### **Preparing the Blank:**

- Cut blank to the to the length of the tube, adding 1/16" for squaring off.
- Drill 3/8" hole lengthwise through the blank.
- Spread glue over 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 B / TURNING THE BLANKS

#### **Turning the Blank**

**#PKBIRDXX** 

- 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 to a profile of your choice, a rounded edge on the ends will create a good transition for the pen parts.
- 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

- Press Tip into smaller diameter end of Barrel.
- Press Coupler into remaining end of Barrel.
- · Place Spring over Refill shaft. Spring is tapered, tapered side goes on Shaft first.
- Insert Refill into lower Barrel, through Coupler.
- Thread Mechanism into coupler, over Refill.
- Insert Mechanism into Cap. Should go in by hand, avoid using press to insert mechanism.
- To extend and retract refill, twist cap clockwise and counterclockwise.
- To replace Refill, unthread Mechanism from Coupler. Remember to switch Spring to new Refill.

### Diagram C / Bushings #PKFEDBU

