## 3 Point Star Streptohedron

From David Springett in his books Woodturning Wizardry and Woodturning Full Circle.


Start with a block that is two halves of a 70 mm cube cut and rejoined with a paper or double-sided tape joint at the centre. The grain direction of both halves should be along the bed of the lathe. Mount this accurately between centres with the joint perfectly on centre and in line with the lathe drive. Turn the wood to be round and cut a spigot for mounting the wood in a 50 mm chuck on one end.
Mount the wood in a chuck and turn it to be exactly 60 mm diameter. Dress the tailstock end of the wood to be perfectly flat. Put a pencil dot at the centre of this end. Draw a line around the wood 52 mm from the tailstock end. Cut the wood away between the 52 mm mark and the dot on the end.

Make yourself a template that is 60 mm wide and has one side angled to be 10 mm off the straight line. Cut into the area between the 52 mm mark and the pencil dot on the end using this template to get the desired angles. The pencil dot end should now be close to a sharp point. Sand all this area.

Remount the work in a jam chuck and secure it with hot melt glue so that cutting of the wood at the 52 mm mark is not hindered. Bring up the tailstock for security. Cut away the surplus wood at the tailstock end, leaving a lump in the middle for tailstock to hold.

Take away the tailstock and turn that end of the wood to the shape of the template. The outer edges of this are should now be close to sharp edges. Sand all this cut area.

Remove the wood from the lathe. Split the joint and ensure the two faces of the wood are clean and smooth. Rotate one of the two parts through 120 degrees and glue the wood together. Sand and finish.


