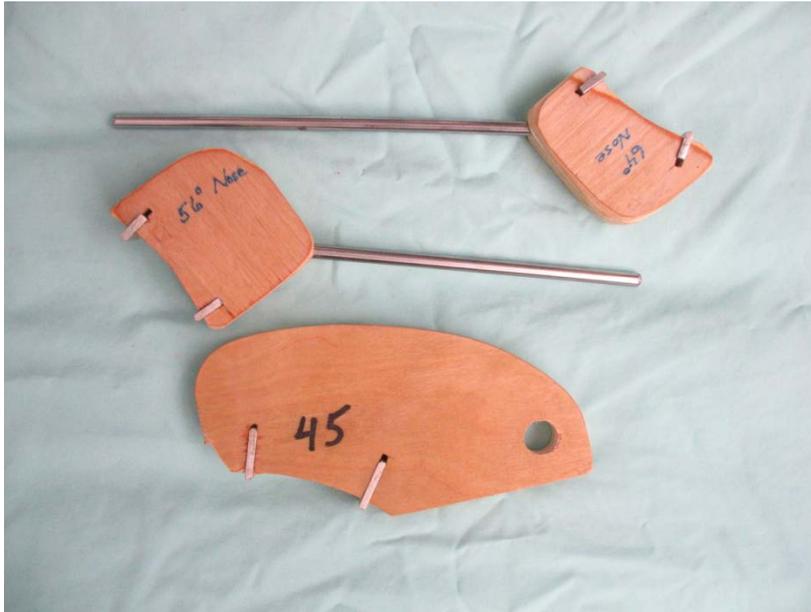


**Inexpensive sharpening jigs and a protractor for repeatable nose angles**

**Two views of useful sharpening jigs using the grinding wheel circumference**

Upper two jigs are used with a Wolverine sharpening system using a Vari-grind jig.

The lower jig can be used with many variable angle platforms.



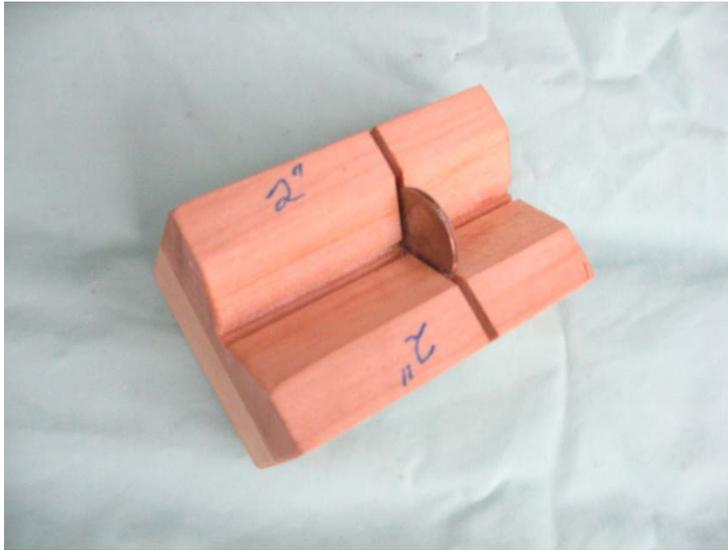
These can be used with many sharpening systems such as the Wolverine system mentioned above.

Brief shop notes follow:

1. AFTER finding the sharpening profile you like such as Irish grind, American grind or extended wing grind, mark down the setting on the Vari-grind jig and lock down the V-arm support at the correct distance for your grind.
2. Cut a block of wood about 2 inches by 2 inches (scraps of cabinet plywood work well)
3. Hold the block up to sharpening wheel and trace an arc using the circumference of the sharpening wheel.
4. Drill a hole in the block for the rod (picture shows  $\frac{1}{4}$  drill rod but wood dowel will do).
5. Insert the rod into the hole and adjust depth to meet the traced arc in step 3. Glue in place (CA glue works)
6. Cut the arc with a band saw and two friction fit notches for two  $\frac{1}{2}$  inch by  $\frac{1}{8}$  inch aluminum stock cut the width of the plywood. The aluminum blocks can have a radius edge to improve viewing their fit the tangent of grinding wheel (see pictures above).
7. Test fit the first aluminum block and hold up to wheel and make any final adjustments. Glue in place (CA glue works well).
8. Fit the second aluminum block so that both aluminum blocks touch the circumference of the grinding wheel. Glue in place.
9. Label and finish as desired.

Note: Mike Darlow was one early adopters of using the grinding wheel circumference to adjust grinding angles. The reader is referred to his books and videos for additional authoritative grinding jig information.

***Inexpensive sharpening jig*** to adjust gouge extension from Vari-grind jig



Two self explanatory views. Choose a stop material which will be stable to repeated sharp gouges and yet will not nick the sharp gouges. Copper, brass, hard plastic or a quarter can be used. Glue in place (epoxy was used in this jig).

***Inexpensive Protractor*** which will not nick sharpended gouge or skew edges and will give useful nose angles of the tool.

