

RIVERS WEST

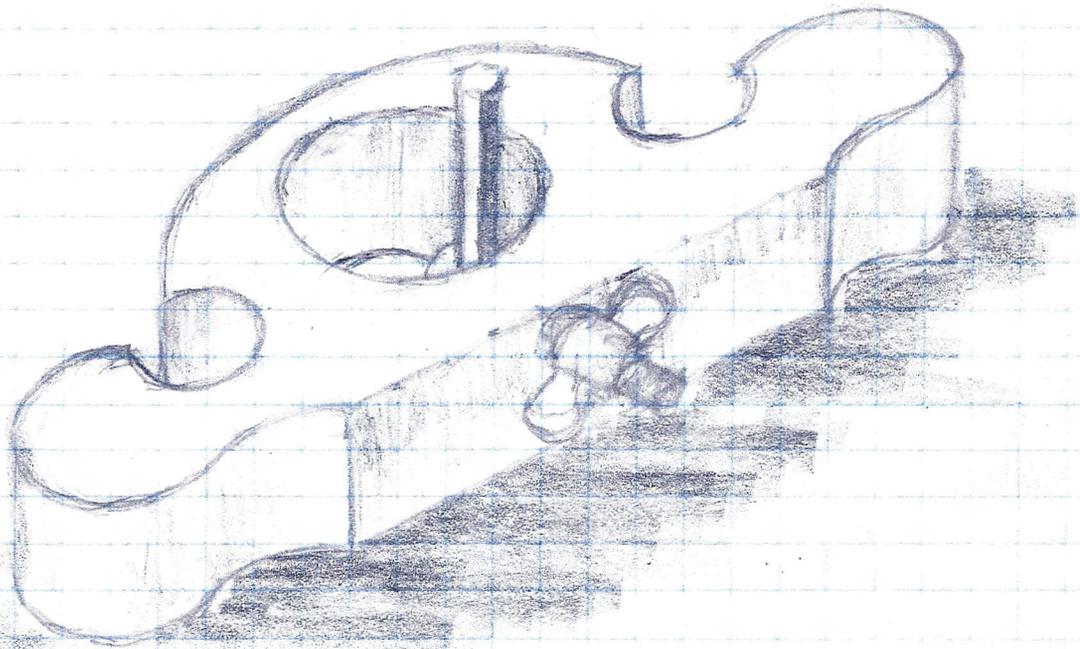
PLANE-MAKING WORKSHOP

MAKE A TRADITIONAL

ROUTER PLANE

AT THE BOATSHOP 9am - 5pm

FACILITATOR: Mike Simmans



MAY 18, 2013

adapted from
John Wilson's
MAKING WOOD TOOLS

ROUTER PLANE (Granny Tooth)

MATERIALS

- 5/16 hex key (Allen Wrench)
- 3/8 thumbscrew 1 1/2" long.
- 3/8 thumbnut (wingnut)
- 5/16 flat washer.

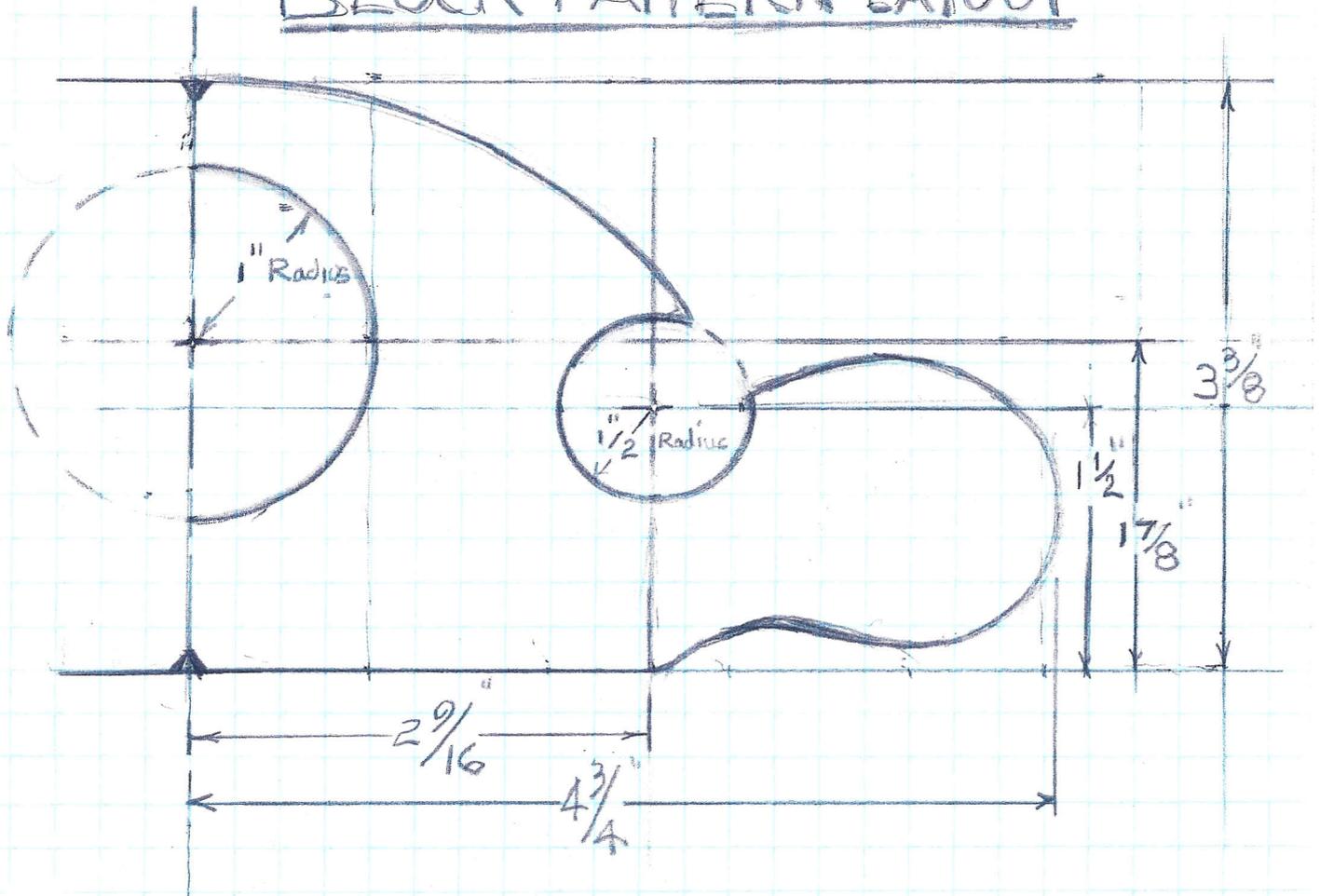
7" Extraslim taper - triangular saw sharpening files work

① 1/16 x 1 1/2 x 1 1/2 - brass stock (optional) top plate.

② 5/8 long #2 flat head wood screws to match top plate.

- ① 1 1/2 x 3 3/4 x 10" Hardwood blank
final dimensions: 1 1/2 x 3 3/8 x 9 1/2

BLOCK PATTERN LAYOUT



ROUTER PLANE CONSTRUCTION SEQUENCE

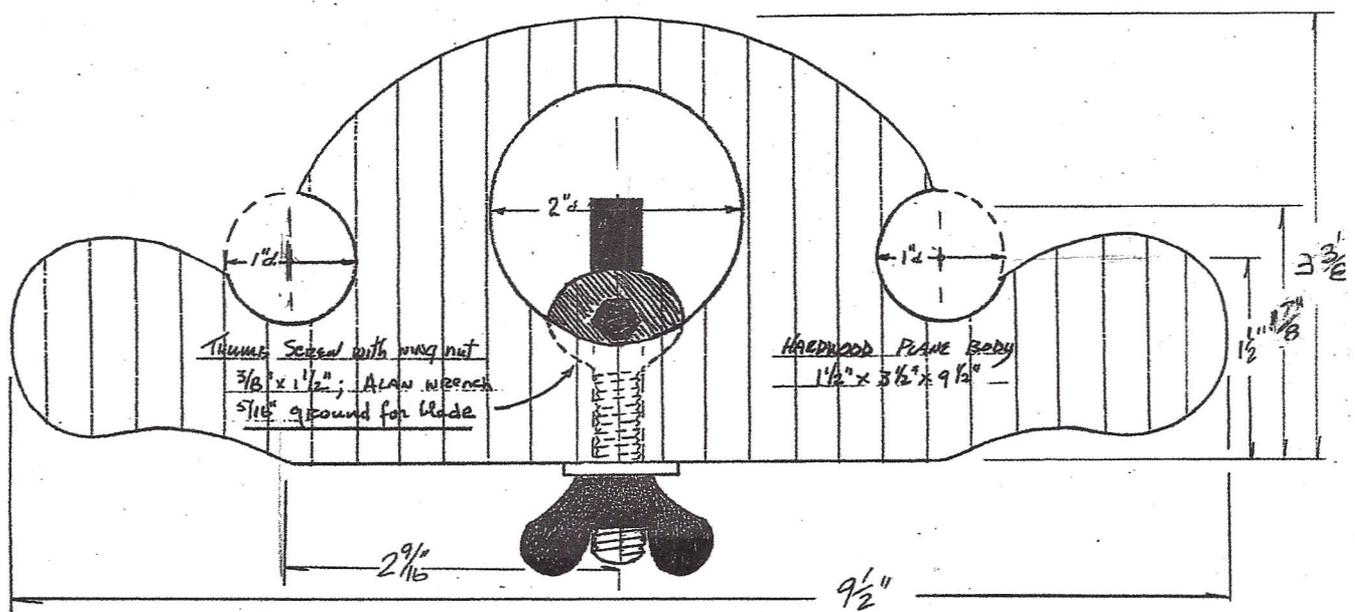
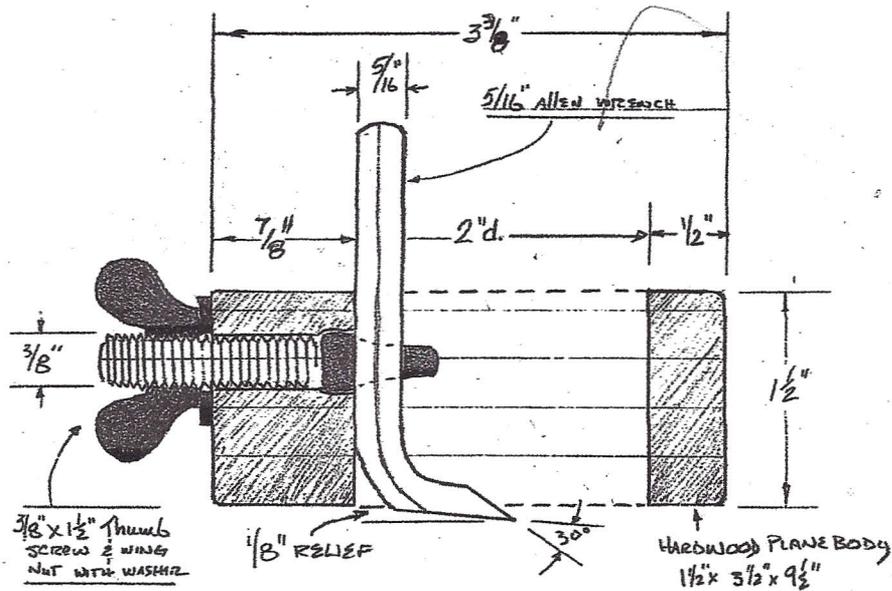
1. Fabricate profile pattern.
2. Square and surface the wood body blank.
3. Mark the center line all the way around the blank.
4. Mark the 1" and 2" dia. holes on the top and bottom of the blank.
5. Trace off the pattern on the blank.
6. Drill 1/8" pilot holes through the centers of the marked circles.
7. Drill a 3/8" dia. hole 1/2" from the top, through the centerline through the back of the block.
8. Proceed with drilling the one 1" and 2" dia. holes.
9. Ease the edges of the blank to about 1/8" radius all around.
10. Cut a slot on the inner surface at the 3/8" dia. hole to accept the thumbscrew (to maintain vertical alignment of the allen wrench blade.)
11. Drill a 1/8" pilot hole and a 5/16" dia. hole in the thumbscrew (again look at the drawing).
12. File the hole in the thumbscrew to accept the hexagonal cross section of the allen wrench.
13. Finish the plane body with "Watco Oil" and hard furniture polish.
14. Grind and hone blade angles. Heat treating has already been done on the wrench.
15. Assemble the new "granny tooth" plane.

CONGRATULATIONS!

Optional top plate (blade stabilizing plate).

If you have difficulty keeping the blade vertical, you may want to make this item.

1. Cut the plate from 1/16" thick brass or aluminum.
2. Ease the edges and lay out the hole for the blade shaft.
3. The hole is made in the same manner as that in the thumbscrew.
4. Drill for two #2-1/2" flathead woodscrews and countersink for the heads.
5. Polish the plate and assemble (drill pilot holes for the screws).



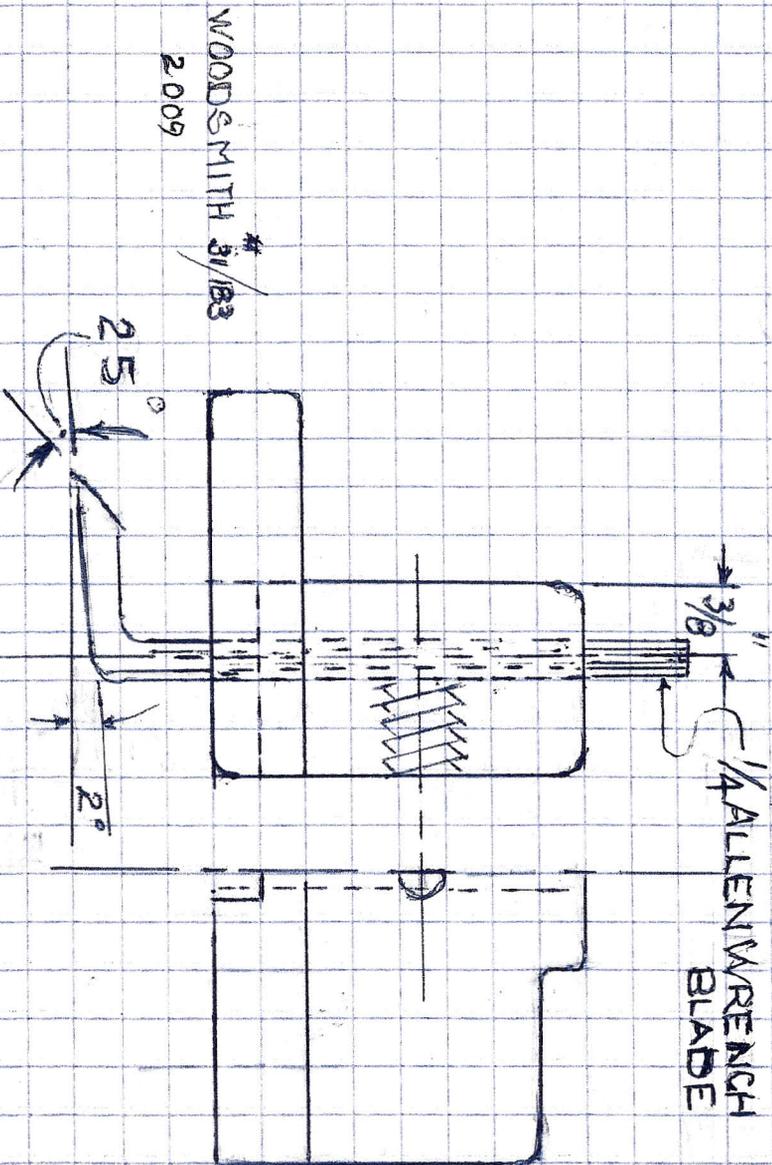
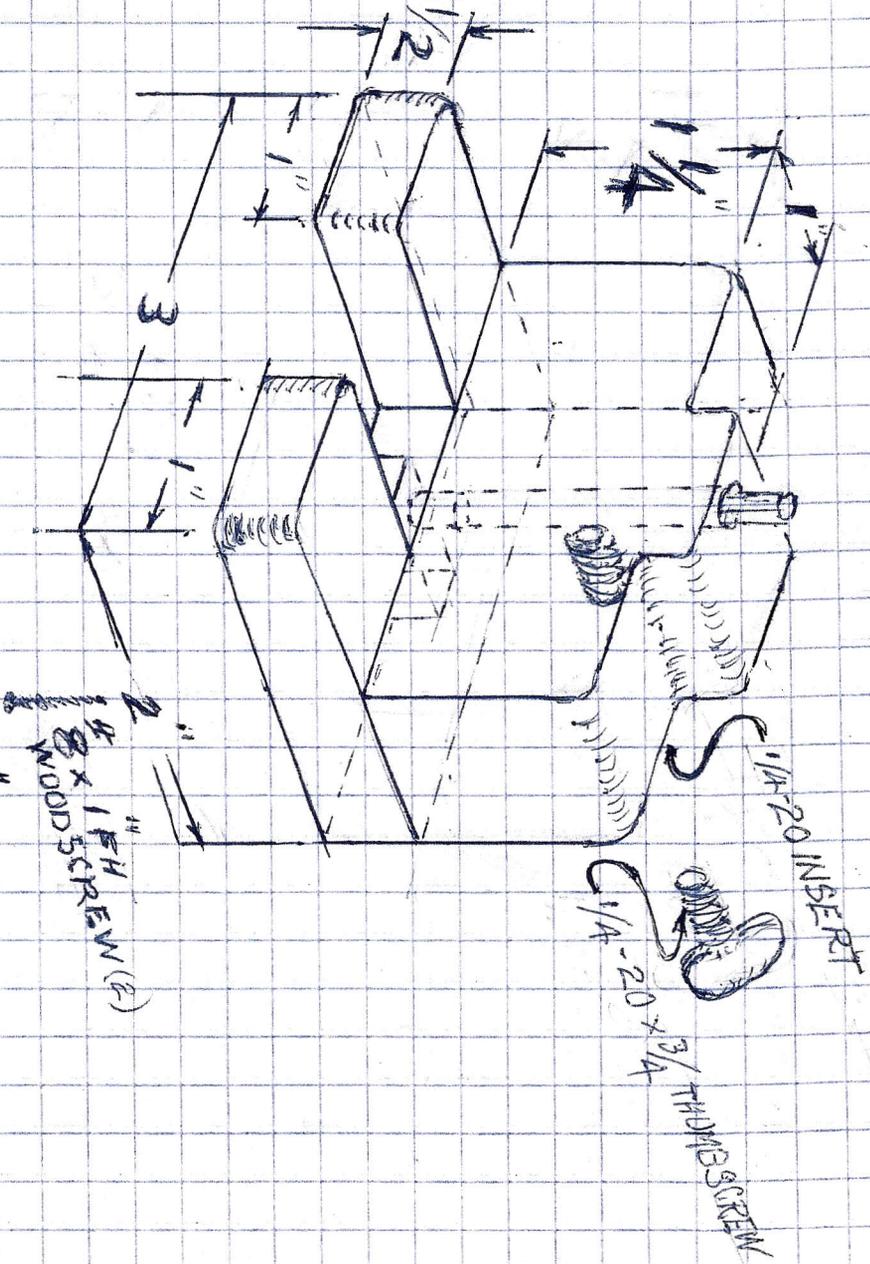
MATERIALS

- 5/16" hex key (Allen wrench)
- 3/8" thumbscrew, 1 1/2" long
- 3/8" thumb (wing) nut
- 5/16" flat washer
- 4" square file, 5/32" *I think that a 5 or 6 saw sharpening file is better.*

These may be purchased at the Reid Tool Supply Co., reidtool.com or 800-253-0421.

Adapted from John Wilson's Making Wood Tools .

ROUTER PLANE



Try this one at home.