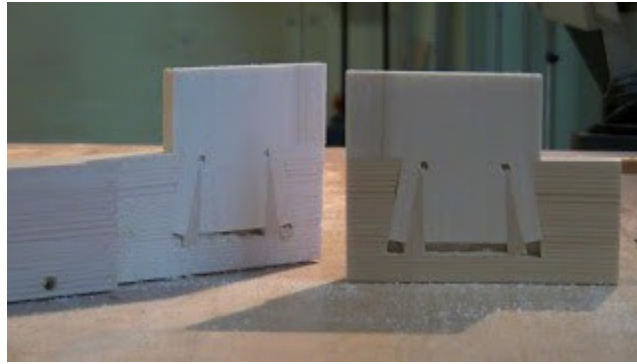


## Fox Wedged Mortise & Tenon

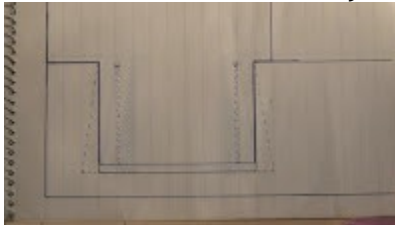


The Fox Wedged mortise and tenon combines the strength of a wedged tenon with the concealment of a stub tenon.

Accuracy is essential to ensure tight joint lines and a well fit 'dovetail'.



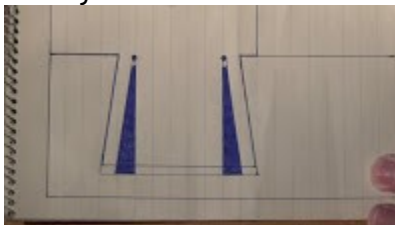
First prepare a [stub mortise and tenon](#) in the normal way



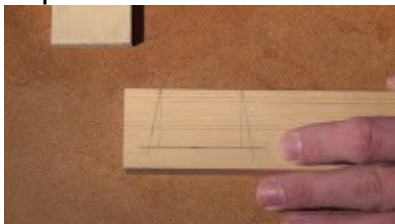
Two saw kerfs are sawn into the tenon, parallel to the edges and close to each edge (shown by the dotted lines)



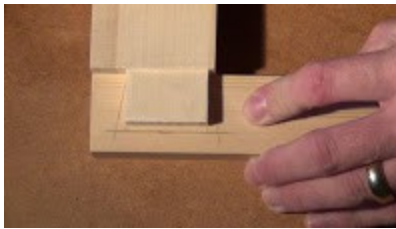
A small hole is bored at the base of each saw kerf, which provides stress relief and space for the wedge tip to crush if necessary



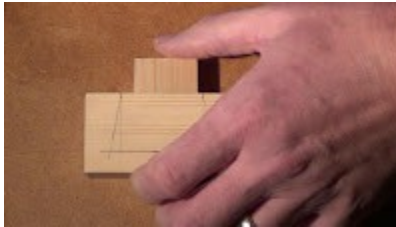
The ends of the mortise are chopped back at an angle to match the wedges, so that the tenon will distort to fill the extra space as it is driven home



Pencil in the stub mortise profile, and then draw in the back cut ends



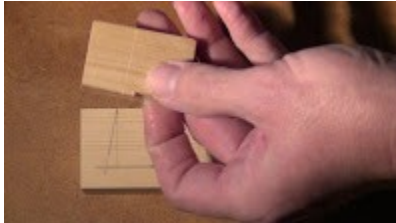
Here you can see the gap left below the tenon to ensure the joint will fit tight at the shoulders



Prepare a snug fitting, long grain, piece of wood, from which to cut the wedges



With this piece held fully in the mortise, knife the shoulder line on to it...



...which gives the wedge length



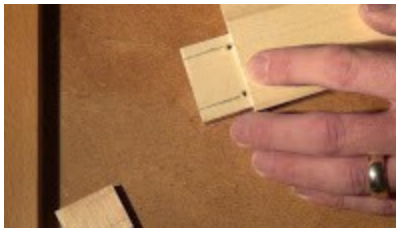
Mark the tenon for saw kerfs and holes



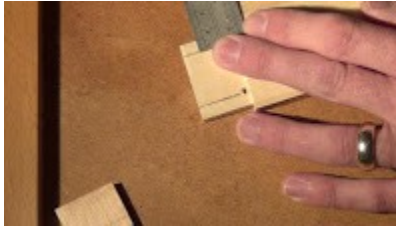
Drill the two holes, right up close to the tenon shoulders



Saw the two kerfs to intercept with the holes



The tenon should now look like this



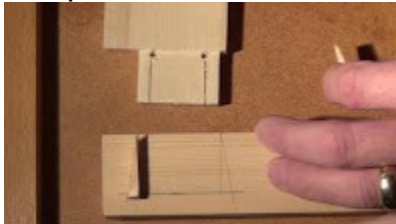
Measure the width of the saw kerf. This is extra space that needs filling by the wedge



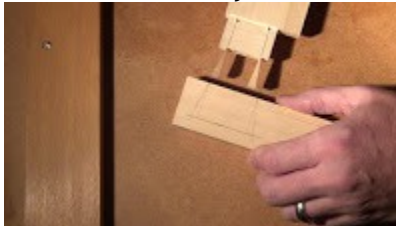
With a bevel gauge set to the back cut angle (1:7 is a reasonable guide), mark out the first wedge. Remember to add the width of the saw kerf to the wedge



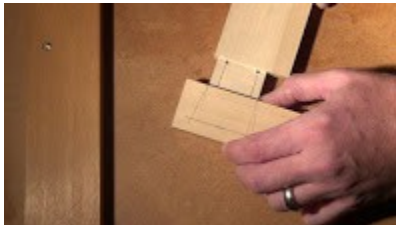
The second wedge can utilise the sloped cut off the first



After cutting the wedges, double check that they match the layout



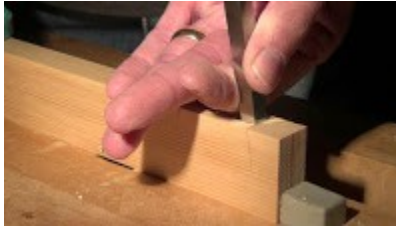
Insert the wedges a tiny bit...



And ensure that the tenon is a good fit in the top of the mortise



Using the bevel gauge as a guide...



...chop back the angled ends of the mortise



Check the angle with the to of the bevel gauge



Now it's time for assembly. Apply glue to the mortise...



...the tenon...



...and the wedges



Insert the tenon, with wedges pinched in the saw kerfs, into the mortise



Gradually push the tenon into the mortise, forcing the wedges further into the saw kerfs



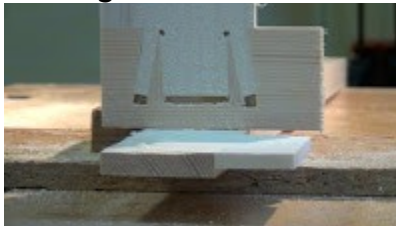
You may need to hammer the tenon in, up to it's shoulders, or use a clamp



Once the shoulders are tight, clamp the joint and leave to cure



If practising, saw the cured joint through...



...to check the fit  
Now watch the video:

<https://youtu.be/hQCBoJaGe8E>