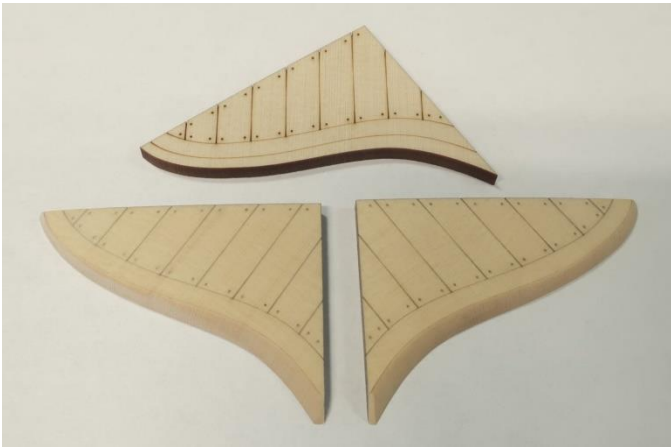


## Chapter Three – Stern framing and planking....

### The square tuck and counter planking.

Everyone knows a square tuck can be very, very tricky to make it so it looks good. Rather than fart around with individual elements I decided to take a shot at doing it the exact same way the model builder of the contemporary model did his square tuck. Unfortunately for him...he didn't have a laser cutter. So all of the elements are indeed laser cut for you but it will still require that you take your time and carefully measure and glue the items in position.



It took a really long time to design and draft the shapes absolutely correct. But once that was done, it took about 15 minutes to bevel the outside edge. There is a laser etched line for that so it was easy. So you must bevel the edges as such. See the photo above. You might want to even under-bevel it initially and finish further while fairing the outside of the hull but that is up to you.

I also added the planking within that tricky framework as laser etched lines. This included treenails. But the treenails are for placement only. They are same size as we will treenail the hull planking. So you can drill them and use 15 pound black or dark brown fishing line for your

treenails. OR...just use the laser etched ones as the final because it still looks pretty darn good.

Then glue them on the model making sure they are lined up port and starboard.

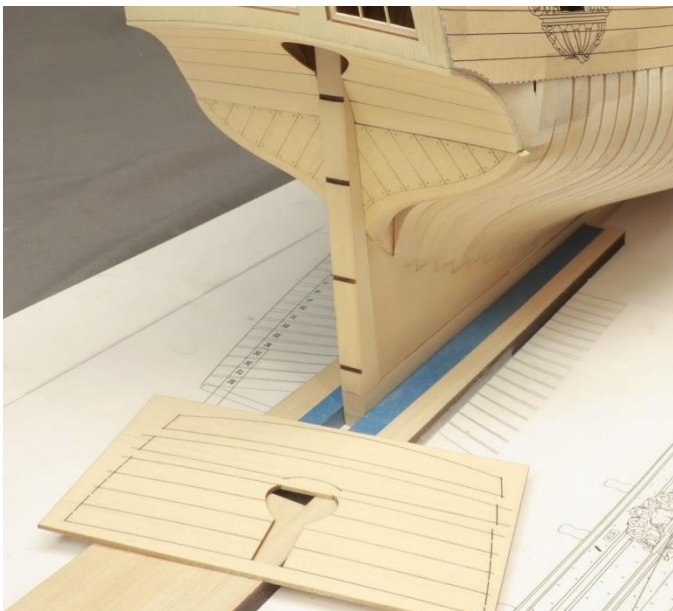
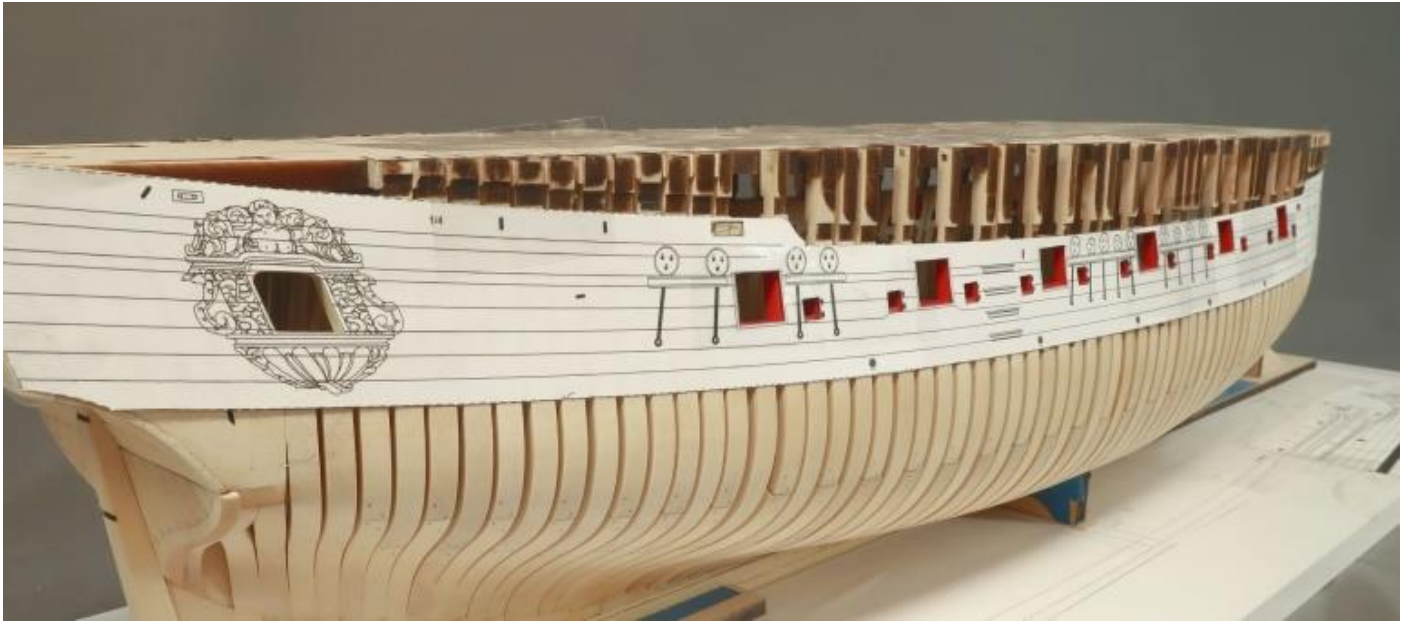
Keep in mind how a square tuck was used and its actual purpose on the ship. The plank ends would butt against this frame on the forward side. So it needs to stand proud of the frame already on the model when positioned. This should be by about 3/64" all the way down. See below.

Now it is time to plank the counter. The counter



planks are laser cut just like it was for the Winchelsea model project. They are pretty straight forward. Sand the sides flush when with the hull so planking the sides of the hull will be nice and neat. See the photo on the next page.

The first thing that needs to be done in preparation for planking is to paint the port openings. It is much easier to do so now and those familiar with all of my Syren projects will recognize this step. I am using the same Crimson Acrylic red for this model that I use for all of them.



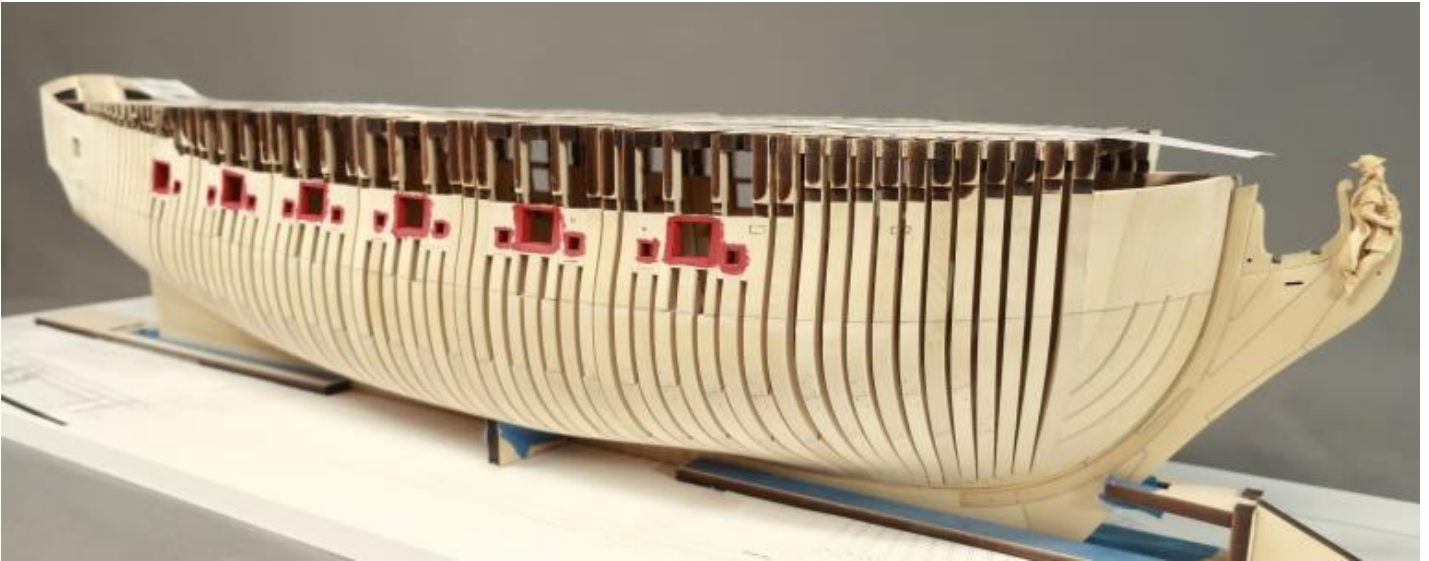
Instead of sanding, I painted the insides of the sweep ports with a very light tan color first. This will cover the char without compromising the shape of the sweep ports. I mixed Titanium White with some brown and yellow Ochre. Once that paint dried I switched to the Crimson. That is the color I will use for my bulwarks.

One additional note....The quarter badge opening and window area was painted tan and will NOT be painted red. This will be left tan as the great cabin will remain unpainted.

Once the painting was complete I taped the two templates into position on both sides of the model.

I forgot to mention that you should cut out all of the sweep ports and gunports from the template before taping it on the hull. In addition, cut out the fixed blocks on the templates as well. You will be tracing and marking the exact locations for the fixed blocks and the sweep port covers as well as the bottom edge of the templates.

The gunports and sweep ports need to be painted bulwark red before the external hull planking can begin. One note however, rather than just start painting, this model has many laser cut sweep ports. The insides of the sweep ports still have laser char on them. It just couldn't be avoided. You just really can't successfully paint over that. The red won't cover it and will appear too dark. You don't want to sand it off. That would be bad. It would change the precision shape and size of those port openings.



We will be adding the sweep port covers to the hull soon so we can plank around them. The same is true for the fixed block shells.

Use a hard lead pencil so it keeps a sharp point longer. Yes the lead will leave a lighter line but it will be more precise. Use a 4H or even a 6H pencil for marking the hull.

When you are done tracing these elements and the bottom edge of the templates, remove the paper templates carefully. We will be using them again many times. Cut away any tape that hangs over the edges of the template. Don't try and remove any tape from the printed surface...the template will tear. Then store the templates safely for later use.

Here is what the hull looks like after removing the templates. Photo above.

Hopefully you can see my reference line that shows the top edge of the wales. But its hard to see the sweep port outlines in the photo. Thats OK. Just know that they are there. You can see the locations of the fixed blocks.

We will be adding the first strake which represents the first layer for the top of the

wales. This is probably the most crucial of planking steps. So take you time with it. If the run and fit for this first plank is wrong then all of your planking will be wrong thereafter. It will be hard to recover from that.

The strips are  $7/32$ " x  $3/64$ " Yellow cedar. I have a whole bunch of them ready to go. All have been matched for color. All three strakes for the wales are  $7/32$ " wide. Try really hard to align the top of the strip with your reference line on the hull. Make sure you match the placement and run... port and starboard.

I won't rehash how to plank a hull and how to bend the strips. I have done that so many times. Just refer to the tutorials and many logs on ModelShipWorld. Or download the respective chapters for the Cheerful or the Winchelsea from my online store. I am using a travel iron and bending and twisting as usual. The first strake or the upper wales have been completed. At least the first layer!! I prefer to use two layers. You could however just use a thicker strip and complete the upper and lower strakes in one layer instead. Its up to you. But I personally prefer two layers because I think I can do a much better and cleaner job with the painting and placement.



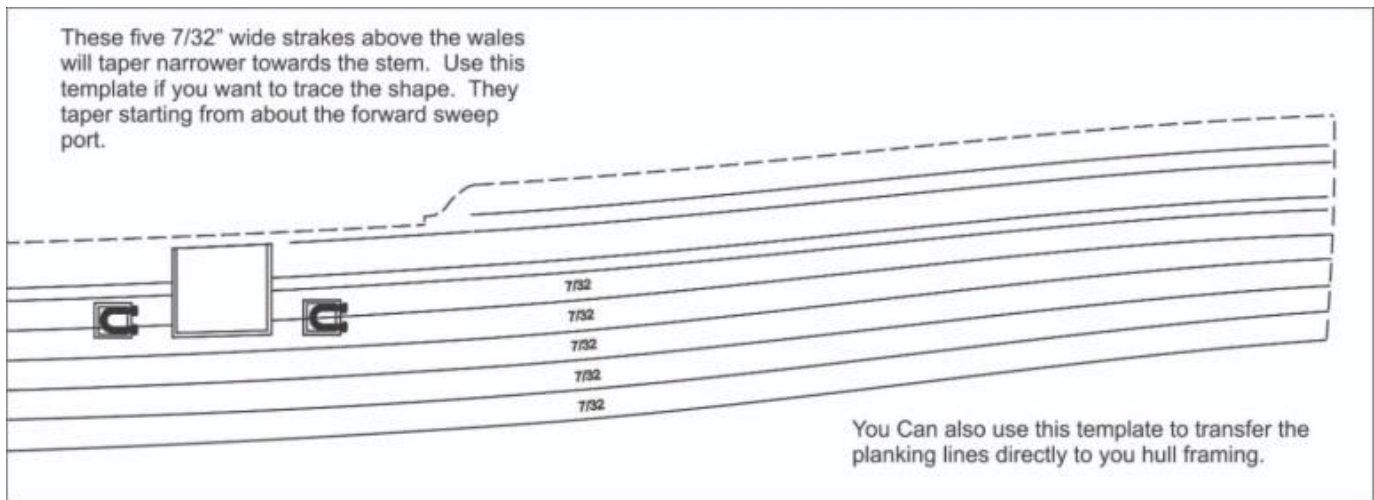
With this upper wale in place (above)...it is now time to add two more strakes of the same width and thickness below it. It sounds easy enough, but remember to get a good tight fit against the strakes already on the hull. I am also using a #2 pencil to shade one edge of each strake to simulate the caulking. Although on the upper and lower wales it's not important. It's only the first layer. I would however simulate the caulking on the middle layer of the wales because it is only one layer thick. I am referring to the butt joints only.

**One last very important note:** When gluing these three strakes for the wales onto the hull, make sure you glue the strips to each and every frame. It's the planking that will hold the hull together when we remove the top jigs. So the frames need to be really secure to the planking. Place a drop of glue (your choice of PVA or CA) to each and every frame as you

proceed. When we complete two or three strakes above the wales later, that's when we will remove the top jigs and establish the sheer properly. So that's coming up soon. If the planks aren't secured to the frames it might be a disaster in the making. But maybe not. I am just a nervous Nelly.

I finished the first layer for the wales. Basically I added two more strakes below the first that was added. I show this image because it's the first one that gives you a good glimpse of what the hull will eventually look like below the wales. This is as low as the planking will reach on the hull. Everything you see below the wales is left unplanked and these frames will remain visible. I do love a fully planked hull though. It's my preference actually. But like everyone else, I would be crazy to cover up all of that hard work with the frames.





I will add two more strakes now above the wales. They are also 7/32" wide and 3/64" thick. Then it will be time to remove all of the top jigs. Finally!!!

So after these 3 initial strakes of the wales were completed, I will start working my way up towards the sheer. There are five more 7/32" wide strakes above the wales. So far I have added two of them. I wouldn't normally post an update for simply two strakes of progress. But in this case it's good to point out a few things.

First, with five strakes now on both sides I think the hull is sufficiently solid to remove all of the cross jigs along the top of the model. But I could very well have just kept going. But above this last strake is where you have to start notching the planking around the port openings and sweep ports. So I thought this was as good a time as any to remove those jigs.

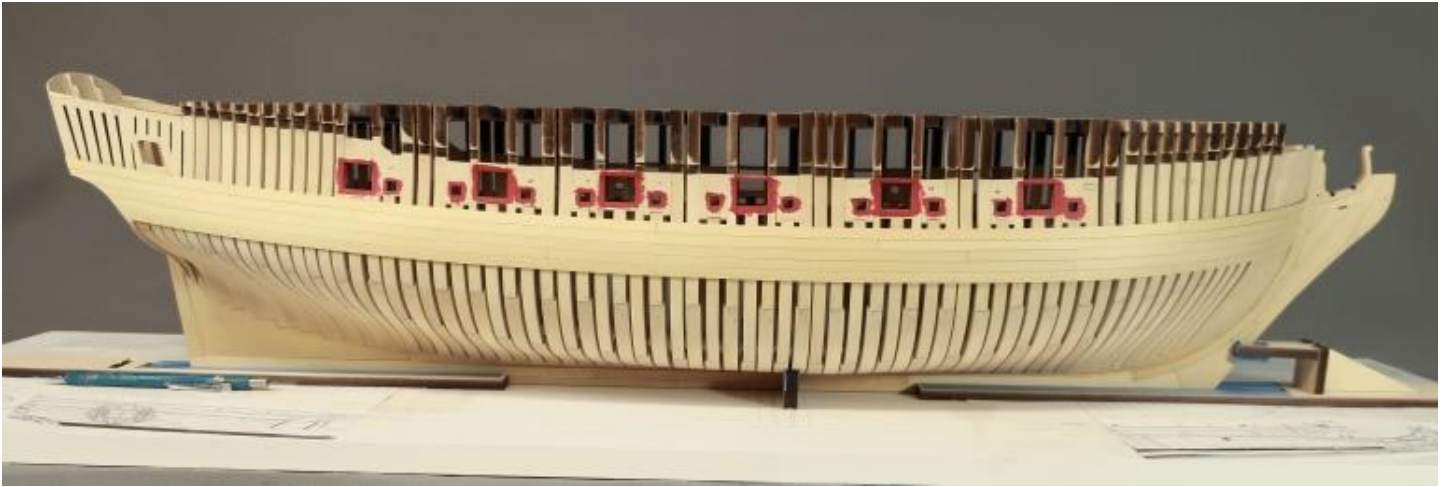
In addition, I would note that on many ships the planking above the wales is pretty straight forward. There is no real tapering of the strakes at the bow or stern. So you can more or less just use planking strips all the same width (in this case 7/32" wide). But for Speedwell, these five 7/32" wide strakes do in fact taper at the bow. At least they should if

you want to end up with a proper run of the sheer. As you can see in the photo provided.

These five 7/32" wide strakes will taper from about the forward sweep port and get narrower as they hit the stem. So there are many ways you can do this planking. You could literally paste the template onto a 3/64" thick sheet of Cedar and cut your planks out. They would be the exact shape you need. And yes I could simply laser cut them for you but it is unlikely that the cedar I use for these would match in color with the cedar you use for the remainder of the planking. So you folks will have to cut your own.

You could also transfer the lines from this smaller template of which a PDF copy will be available...to your hull frames. This would give you the tick marks for your individual strakes and you would proceed to plank just we did on the Winnie or any other model. There are so many ways to do this. You guys can pick your own. As this project is considered an advanced one, I won't repeat myself and do a blow by blow on how to properly plank a hull.

Here is my hull with those two additional planks above the wales. I used a 4H pencil to simulate caulking.



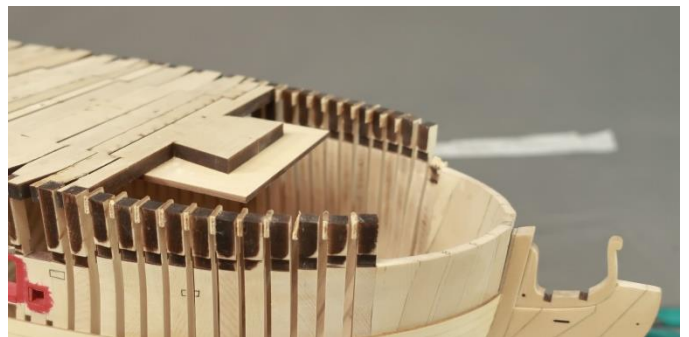
Remember that the stakes for the wales have no taper at the bow. Those are straight 7/32" wide strips. BUT, the next five stakes above the wales do taper at the bow as discussed. Yes it's weird but that is how it was done on the contemporary model. I am just following suit for our model as well.

### **Removing the JIGS!!!**

So if the hull is not sufficiently strong at this point so I can remove the cross jigs then something is seriously wrong. These five stakes are very carefully glued to each frame. So everything should and will stay intact after we remove them. Trust me...famous last words.

To start this process...The first thing I did was remove all the tape along the top of the cross jigs holding them together. Easy-peasy. Then I just used a pair of nippers....flush cutters, to snip the strips on the cant frame jigs first.

This will allow you to actually remove the whole jig after you cut those strips on both sides of the hull. I see lots of inboard fairing in my near future!!!



Then I repeat this process at the stern for those cant frames. But the very aft jig should just come right out. Then just repeat the process to remove the aft cant frame jig. Photo on next page.

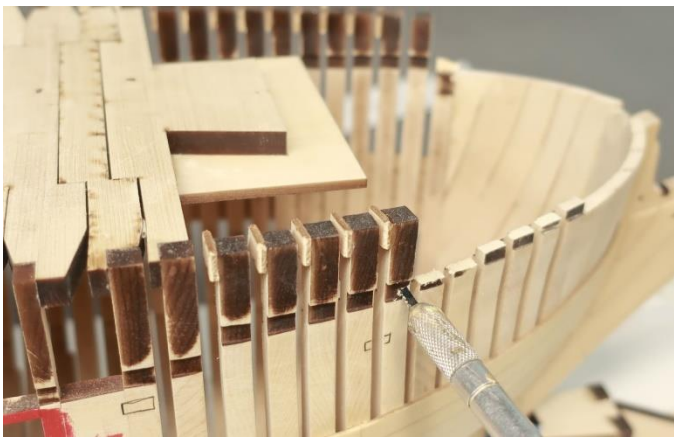
### **So far so good.**

Next I started tackling the extensions for all of those cant frames. For this I prefer to use my home-made saw. It's basically just a scroll saw blade in an Xacto knife handle. It has fine teeth



but is somewhat wide to prevent bending while in use. I just cut myself a short length of blade to insert into the handle.

Start carefully cutting the extensions. As you can see below...I am sawing them off one at a time. But I am not sawing along the sheer too closely. I am cutting in the center of the notches cut from the top-timbers. I want some wiggle room when I finally establish the proper sheer.



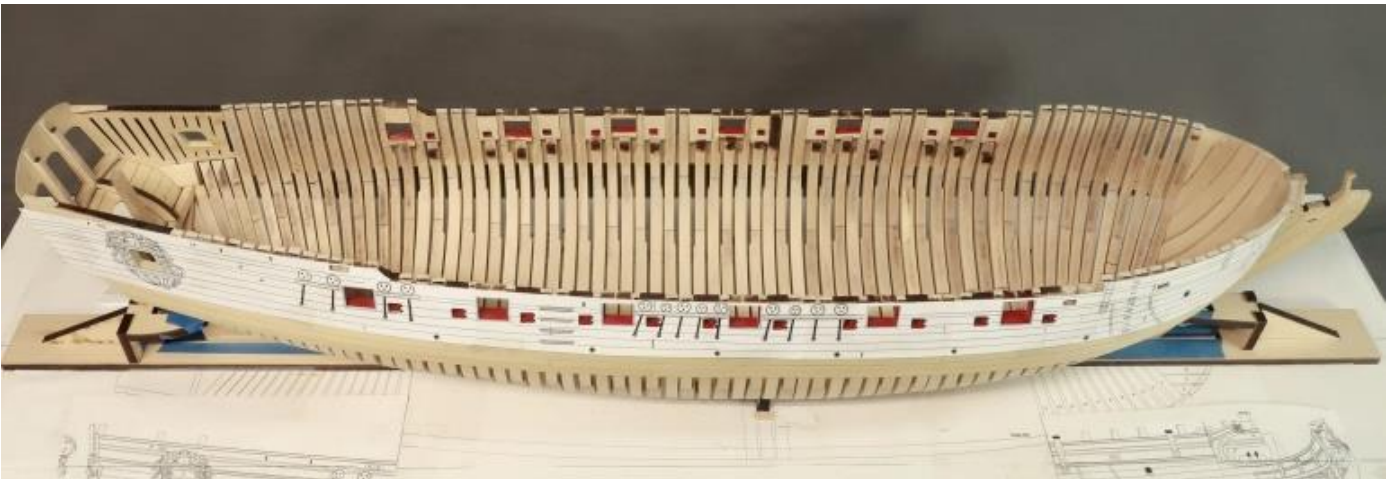
With the extensions removed for all of the cant frames we are almost done. Now we must tackle the jigs for the square frames. I am just using the very same scroll saw blade to cut the top timber extension on the port side. Then I do the same to the top timber extension on the starboard side and the cross jig for that square frame will be freed.

When all of the cross jigs are removed, you will be ready to establish a proper sheer. To do this we need to use our trusty templates once again. Place them back on the model. Line up the bottom edge of the template with the top edge of the wales. This will give you a nice idea of where the sheer of the model should be. With the template on the model I am going to use various sanding sticks to bring down the top timbers so they are flush with the top of the template. In a few cases the sheer may fall higher or lower than those notches on your frames. This is fine as long as you match the template. We will be adding a fairing cap to the top of those frames in the next step.



I have lots of inboard fairing to do!!!

But I will wait to start that until after the outboard side is completely planked...for extra strength for the hull.



Here you can see my long sanding stick. It's about an inch wide and 15" long. It has 120 grit sandpaper glued to one side.

I will create a smooth sheer line with it that

marches the top of the template.

Then I will add the fairing cap.



Once





I shaped and sanded the proper sheer so now it's time to add the fairing cap.

The fairing cap will now be added. This serves two purposes and I discovered with the Winnie project that this is a great design element to help builders when fairing the hull inboard.

First, it establishes a consistent width along the entire sheer. It will be hard to screw that up as long as you don't sand into the strip. The

fairing cap is  $\frac{5}{32}$ " wide give or take. It is also  $\frac{1}{16}$ " thick.

In addition, the fairing cap is glued to the top of each frame which really strengthens the hull. There is no wiggle in any of the frames as you fair inboard or out.

There are 2 sections of fairing cap for the waist. I added the forward piece first (#1)...then the aft section (#2). The waist





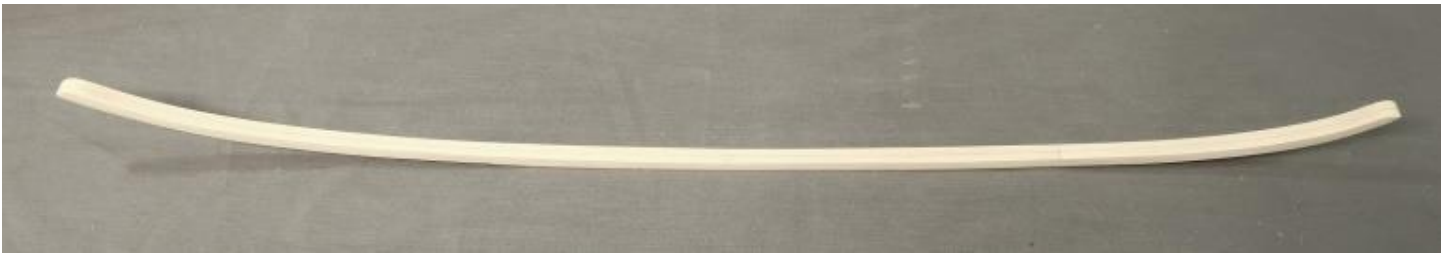
sections must be added first because a hance piece sits on top of the forward length. We will add that later. These are labeled #1 and #2 on the laser cut sheet with the fairing cap strips. When gluing these on, the outside edge is flush with the outboard framing which should already be faired. You can see below what remains inboard to be faired. The only fairing I have done inboard up to this point is whatever I managed to get done progressively after raising a half dozen frames. I had reached inside under those cross jigs to at least get rid of the heavy stuff. But the cant frames are virtually untouched.

The qdeck fairing cap (#3) needs to be beveled on the aft end to sit flush against the transom. The bow section of fairing cap is self-explanatory. Just make sure its flush with the outboard framing for all four of these pieces. Then you will know exactly how much material you need to remove inboard.

In the photo above, after the fairing cap sections were all added, the two hance pieces were added at the bow. You can see how it sits on top of the waist fairing cap. Also check out the framing plan for clarity. It's at the break in the waist up to the fcastle sheer. A scroll will be added much later after we finish planking everything.

I had originally thought that I would need to wait until all the outboard planking was completed before I could fair inboard. But the hull seems so strong with the fairing caps glued on so I just decided to go for it.

The hull has now been completely faired inboard...or about 98% there. There are still some areas that will require some "noodling". But I really wanted to get this done because it makes so much dust and it's a pain in the butt. I started with 60 grit sandpaper to get rid of the heavy steps from frame to frame. Then I switched to 150 grit and then to



120 grit. Remember when you are doing this NOT to reduce the fairing cap. Its inevitable that you may hit it from time to time and you may remove the laser char but try and keep the width of the sheer as consistent as you can. The fairing cap helps you do this. Here is a picture after finishing up the inboard fairing. Now I can return to the outboard



planking with a much cleaner hull. Although I am compelled to add the keelson first just to make the inboard area even cleaner, it's nice NOT to have to look at all that unkempt framing and laser char. It cleaned up rather well dont you think?

I did in fact add the keelson before returning to the outboard planking. This is made up from 4 laser cut lengths. There are probably many ways to attack this. But I decided to assemble all 4 pieces first. There are scarph joints between each length. Then I sanded it clean of laser char. It may be hard to see in the photo above but I also drew a reference line down the center of the keelson. This is where the bolts will go. It was easier to mark the center of this 3/8" wide keelson now instead of after it's glued on the model. I used a compass opened to 3/16" with a pencil on one side. A handy tool to have around.



I test fit the keelson on the model. The shape is so specific to each model after fairing inboard that... yes I had to tweak the bottom of the keelson and the bottom of the hull inboard to get a good fit in some places. I used various riflers and sanding sticks to match the curve and shape of the keelson as closely as possible. Then the bolts were added. I used 30 pound black fishing line. One bolt goes every other frame. This is except for the scarph joints which get two bolts. Check out the plans for details. Now the inboard side of the hull is completed for now. It's nice and clean. I can now return to planking the outboard side of the hull.

Picture on the top of the next page.



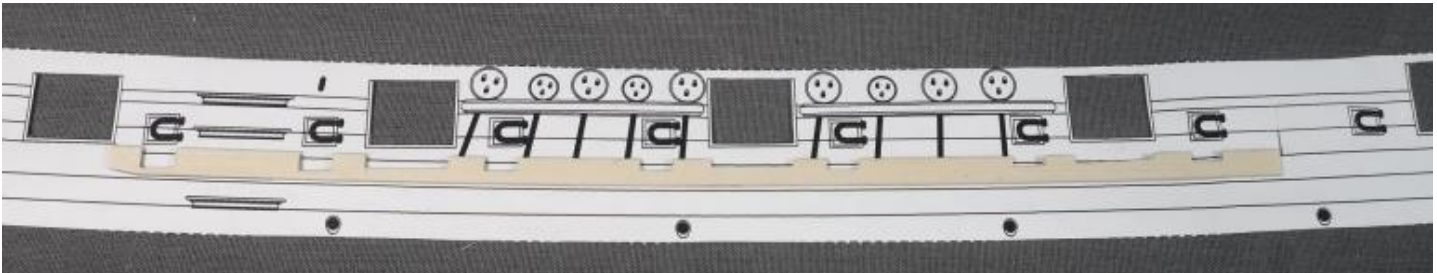
them completed, but before I move further up towards the sheer, I needed to add the sweep port lids and fixed block shells on the outboard side.



This is just like on the Winchelsea project and all other projects I design. These must be added so we can plank around them neatly. Use the template to find there locations. On the next page you can see how the plank directly below the sweep ports needed to be cut around each and every port. I basically followed the template. This does take some time to do but if you just go slowly, it will all turn out fine. I made sure I had a very sharp blade as I was cutting the plank around the sweep ports and gunports. One wrong move or if impatient and you can remove too much from the plank and you will have to start over. Thank goodness there are only six gunports but there are plenty of sweep ports to carefully cut around. I have one more  $7/32$ " strake to go which will need to be cut around the tops of the sweep ports next.

Now to get back to planking above the wales... I am trying to complete the five  $7/32$ " wide strakes above the wales. I had two of

You may notice that I am also leaving a  $1/64$ " to  $1/32$ " rabbet around the bottom and sides of each gun port. Even though this sloop



didn't have gun port lids, they may have used bucklers during heavy seas and bad weather. It's just a guess but it seemed like the way to go. You could omit this and simply cut

your planks flush to the edge of your port openings if you prefer. It's hard to tell on the contemporary model if they have this rabbet.



I managed to get the starboard side planked up to the 3/32" strake. Photo on previous page. This 3/32" wide strake is actually the first layer of the fancy molding that will be added much later. I will pause here on the starboard side and not go any higher for the moment. Above this 3/32" wide molding, the outboard planking is covered with a frieze or painted. There will not be any treenails visible above this point. So this is the optimal time to pause and add treenails to all the planking I have done so far. This is optimal to complete now for two reasons. I also test fit the window for the gallery in position because the planking needed to be neatly shaped around its perimeter.

- First, I can still see where the hull framing is above and below this planked area. This will make it super easy to run some tape down the hull to define exactly where the treenails should go.

- In addition, the second layer of wales has not been added yet. On the Speedwell, there is an upper and lower wale strake. These stand proud of a planking strake between them and it will be so much easier to treenail that middle strake without worrying if I would damage the edges of the wales above it and below it.

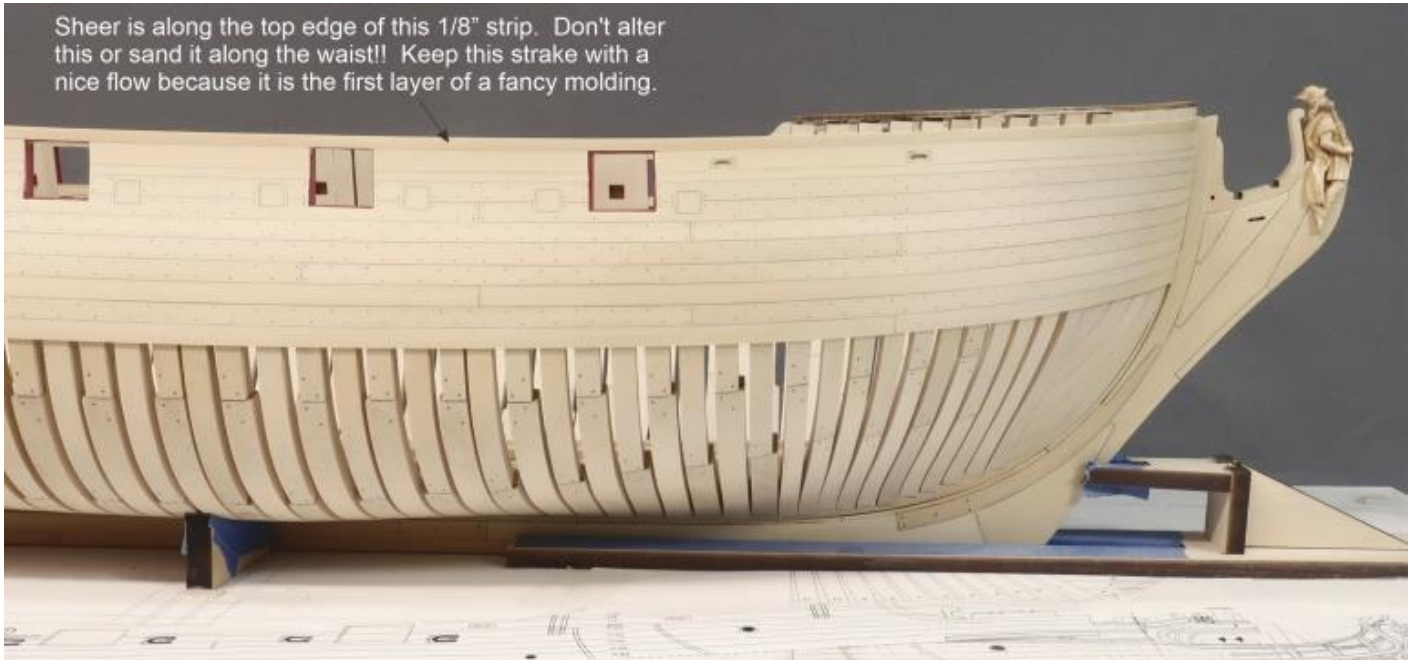
I also want to point out that for the quarter

badge window; a laser etched square is on the framing piece. You must trim each plank around this so you can insert the laser cut window later. Here is a picture of that opening with the laser cut window inserted. There will be acetate placed in the opening first and then this window when we are finished with all of the outboard planking. You wouldn't want to damage it by gluing them on now.

I have finished planking up to the 3/32" wide molding level and not the sheer. I have stopped to treenail the hull planking which takes a while to do neatly and precisely. I am using 10lb black fishing line. Work has been slow because I am taking my time to line everything up with the frames and keep it all neat and tidy. The starboard side is completed, and the port side is underway. Once I am finished with this I will complete the outboard planking up to the shear. Then I will add the second layer of wales and the fancy molding.

Treenailing is optional of course but it does make a difference when not overdone and if the treenails are not too large. Even though only a few strakes need treenails, it still takes a bloody long time to do!!!

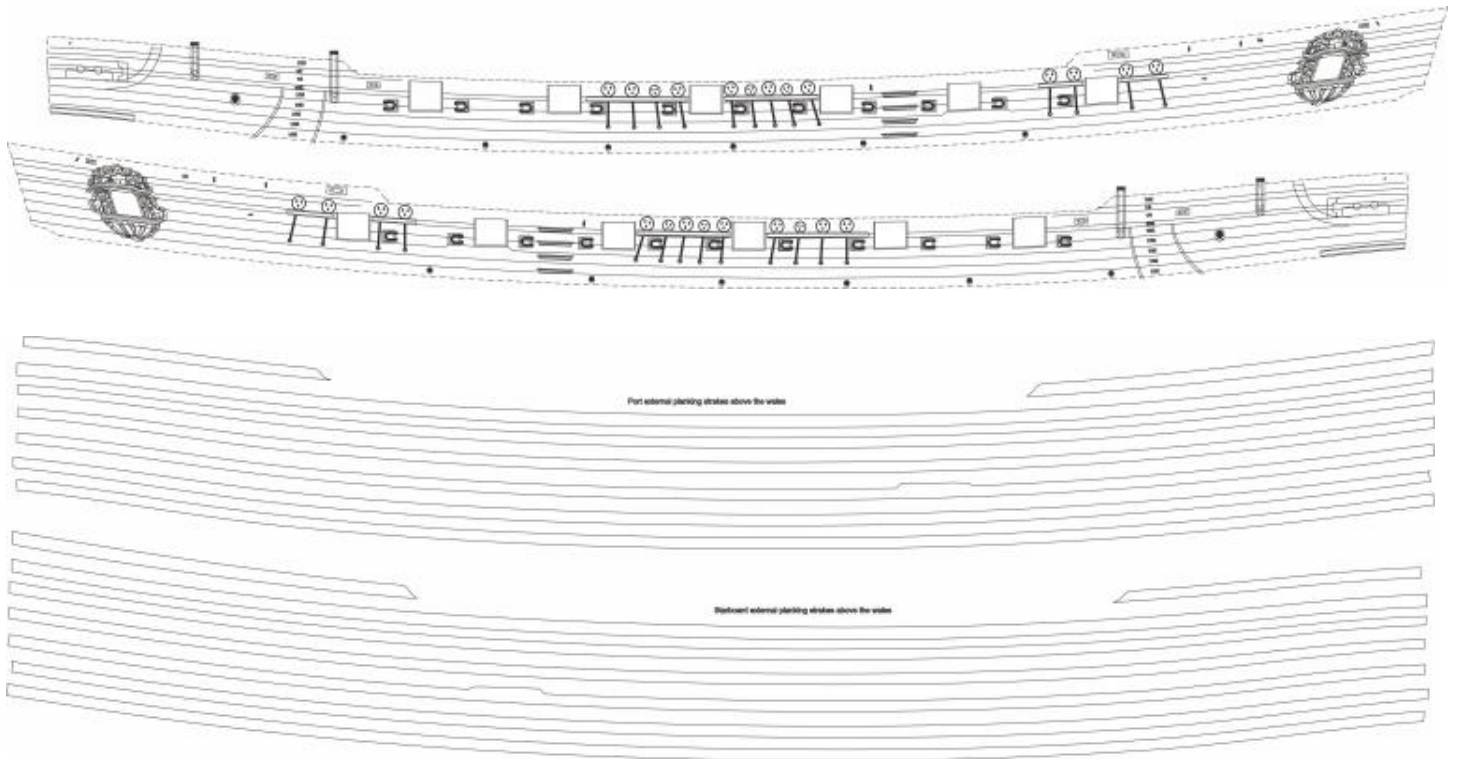




After finishing the treenails...finally, I continued to plank up to the sheer. This meant one more 1/4" wide strake to cut around all those ports. It wasn't too difficult to do. Then another stake of 1/8" wide planking which is the first layer for another fancy molding strip. We will add that soon. The top of this

1/8" strake and molding is the sheer. The top of this along the waist should NOT be altered or sanded down. You want to maintain that





nice continuous and graceful flow for that molding strip and sheer. If for whatever reason your planking in the waist ends up slightly higher or lower that is OK. This is tough to plan out exactly. The top edge for me along the waste was about 1/64" higher than the sheer I sanded into the framing and fairing cap. That is perfectly fine and it is best not to sand the strake down to match. It is best to keep a nice flow and even width to what will become the molding. I hope that makes sense.

Then I planked along the drifts fore and aft to complete the external planking on the starboard side. I will repeat this on the port side next. The Qbadge and window for it are just lightly tacked in place for the photo. That shouldn't be glued permanently yet.

Note where you would see the scrolls along the waist. On Speedwell they are different than on a frigate like the Winnie. Therefore a different approach is needed for them. So you will

notice how the planking along the drifts in the waist are stepped. This shape will allow for the addition of the scrollwork later where it will make perfect sense.

Once I complete this on the other side I will begin adding the second layer of the wales painted black and the fashion pieces. Then the fancy molding will be added outboard.

All of the planking should be relatively easy. Aside from the detailed expansion templates (below), I also created an expansion of every single planking strake above the wales individually. They have the tapers needed on each of them. This can be used to literally cut the exact shape of every strake from a 3/64" thick sheet of Yellow Cedar if you chose to. Even the drifts are included. You will still have to cut them around each gunport and break them into individual lengths depending on where your planking step pattern is. You can use the plans to find those. There was no need to create an expansion drawing for the 3/32" and 1/8" wide strakes that represent the fancy molding. I just ripped those on my table



saw as they are not tapered and easy to plank with being so narrow.

**All of these planking expansions and templates are provided on the plans.**

Moving along...In preparation to install the second layer for the wales, the carved fashion piece needs to be added first. This is a resin casting prepared in the usual way with gel stain. Like I did for the Winnie carvings. This does a great job of matching the color of the yellow cedar. It is easier and cleaner to add the carved fashion piece first rather than have to cut and shape the back side to fit over the wales. I will add the fashion piece first and then just butt the wales up against the forward side next.

The resin carving will bend to conform to the hull shape. No worries there. I glued the lower end in first and waited for it to dry using CA. This locked it in pretty good so I could then push the top end of the fashion piece to bend it and secure it with CA as well. I filled any gaps with filler but there shouldn't be many. It should fit pretty tightly. You could also heat up the carving in a tub of very hot water to make it more pliable so it will bend easier.

Note that the QBadge is still just temporarily tacked in position. It's not permanent yet.

Then I added the second layer of the upper and lower wales. I used 1/32" strips of Yellow cedar. You could use 3/64" thick strips as well but I am personally partial to thinner wales. I did knock-off the top and bottom edges of the wales to just soften them up. No hard edges for me.

I also painted the top and bottom edges black before gluing them on the model. This keeps it nice and neat so I don't have to try and paint that edge on the model. It makes a big difference and it's finally starting to look like a ship model!!!

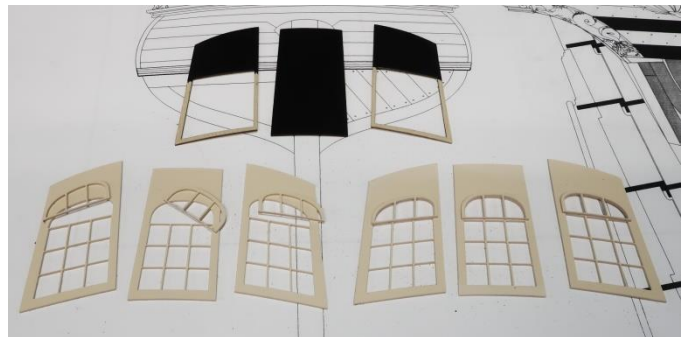


I glued the qbadges onto the model permanently at this time. It needed to be done now so I can add the fancy molding on the hull and then the friezes etc. I am working my way up to the sheer and cap rail. For the qbadge, some acetate was placed in the window opening first from the outboard side. Then the window itself which is laser cut in plastic. Lastly, I added the qbadge so the roof molding on the badge lined up with the 3/32" wide planking strip. This will line up the badge properly with the molding I am going to add.



The next step was to permanently add the stern lights. I glued the laser cut stern lights together as shown. There is a little top portion that is glued on top of the larger laser cut stern lights. The three on the left show the individual pieces before gluing them up. On the right side it shows them glued together.

In addition, there are three laser cut cedar inboard pieces shown on the top of this image. The aft side is painted black/dark Gray where the stern lights are false. Meaning they wont be windows you can see through.



With the badge in position I added the 3/32" x 1/32" molding. I scraped the profile into some boxwood strips in the usual way. I created a scraper by filing the profile into an old razor blade.

It may be difficult to tell but the stern lights are placed in the appropriate openings from the inboard side first.



Then some laser cut acetate used to simulate the window glass is placed in the same openings from the inboard side. Lastly the painted laser cut pieces are placed on top as the final layer with the painted gray portion facing outboard.

You can see the photo on the previous page.

With the windows glued into position from the inboard side, I will be able to plank the inboard side of the hull next... but only the two strakes along the sheer.

Instead of doing that however I decided to add the sweep port hinges and horse shoe plates to the outboard side of the hull. It is a nice

distraction and I couldn't wait to see how the hull might look with these little details. This can be done whenever you like really but I figured why not do it now that I am in the mood to see the hull with some details.

The sweep port hinges are available as a laser cut min kit. I have several sizes but these are the "large" hinges I have developed. One package is enough for Speedwell. You will need to buy a package or possibly create them from scratch if you are feeling ambitious. The horseshoe plates are provided in the chapter parts along with the "bow tie" plate for at the stern post and keel connection. These are laser cut from black laser board.





### Inboard Sheer Planking...

It is time to return to the inboard construction. Specifically we need to add a few strakes of inboard planking along the sheer of the hull. This will allow us to finish the final cap and molding on the exterior of the hull next. It will also enable us to complete the scrolls along the waist and establish the final width of the bulwarks. This is important...you don't want to have the bulwarks looking too thick and chunky. Once the inboard planking is glued on that will determine the thickness of your bulwarks.

I mention this because it is all too typical to find models made with overly thick bulwarks which are way out of scale. This will be your last chance to fair the inboard side and make them even thinner if you want to. The bulwarks are  $\frac{1}{4}$ " thick on my model after I added the inboard planking. The planking is  $\frac{3}{64}$ " thick. So please do the math and double check what your final thickness will be for the bulwarks once you add these laser cut planking strips inboard. Please refer to the two photos above frequently which show the inboard planking in position.



You can also examine the plans which show these five inboard sections of bulwark planking along the sheer.

The etched reference numbers for each section are also there to show the order in which they should be best placed on the model. Start with planking section one at the stern. It should be placed flush with the top of the sheer. The aft end should be beveled to sit nicely against the transom.

Follow this up by placing #2 at the bow in the same manor. Note how both create a notched are where the scroll work will eventually be placed. Examine the photos on the previous page.

Its now time to place section 3 of the inboard planking at the sheer. The aft edge of this section should sit flush with the aft edge of frame 16. This is very important. Check the plans and the photos.

The last two sections are fairly straight forward. Add section 4 of the inboard planking below the drift at the bow. Cut it to length on the aft side. It doesn't really matter how long because the last section #5 is laser cut extra-long so you can cut it to fit nicely in the gap between sections 3 and 4.

With the five strakes of inboard planking completed it will establish the final thickness of

the bulwarks. Sand the planking smooth with some fine sandpaper.

The photo above shows the next step. We want to have a nice surface for the top of the cap rail to paint black. We will be painting it in a little while. But for now, a very thin "final cap" will be added. This will cover all of the many layers and create a smooth, problem-free surface.

The final cap is laser cut on very thin 1/64" thick yellow cedar. I believe it is labelled sheet "M". Once again there are laser etched reference numbers showing the order of placement on the model. Place sections #1 and #2 along the waist first. It's a very thin final cap but really finishes it off cleanly. Section #1 is aft side of the waist...section #2 is the forward side. Check out the photo above.

Now you might think that you should add section 3 of the final cap next. But don't do that yet. Before placing the final caps at the bow and stern, we need to make the scroll caps. The scroll caps are laser cut on 1/8" thick cedar. They are cut to be glued up in two layers as shown in the photo (next page). The shorter scroll caps are for the bow and the longer ones will be placed at the stern side of the waist. Glue them together as shown and carefully remove the laser char. You don't have to get them pristine but clean them up and sand the top surface for painting later.



You can see how the scroll cap once glued in position sits on top of the final cap in the waist. The photo below shows the scroll cap at the bow.



With the scroll cap glued in position, you can sand the inboard and outboard sides flush with the planking. You can also fill any gaps along the planking and the scroll cap but this will ultimately be painted and covered up anyway.

Now it's time to add the final cap at the bow. This is actually laser cut on 3/32" thick cedar. It is labeled sheet "P". I have given you guys an extra piece just in case.

You can see how it butts up against the "scroll cap". Once this final cap is in position at the

bow you can sand it flush inboard and outboard and also the top edge so it has a nice flow into the scroll cap. This will be your actual sheer and painted black very soon. In fact you might be able to see that I already painted the top of the starboard side black.



Now let us turn our attention to the stern and basically repeat the process.



You can see in the photo above that you are basically doing the same thing you did at the bow. But this time the final cap is 1/64" thick that will be placed along the top of the qdeck sheer. Just but it up against the scroll cap and sand it flush all around. Get a good smooth sanding and fill all the gaps. When you are all done you can paint the top surface of the caprail black. Try and hide any seams you might have at any of the joints. Make it as smooth and clean as possible.

Try not to get too much black paint on the outboard and inboard planking. Just paint the top surface of the entire cap.



It is finally time to start adding the fun details. There are two options for the painted friezes to choose from. You can download them from the syren website or print out the last few pages of this chapter. Print them out on plain white paper and spray them with a matte fixative. There is a darker frieze which I have chosen and a lighter blue one.

Cut them out and start to test fit them on your model. Place the frieze strips right on top of the 3/32" wide molding. They will run straight across the hull from bow to stern in several sections. But each section against each other like you would hang wallpaper. Try and match

the patten as you proceed. I used a glue stick to apply glue to the back side of each frieze strip. This gave me enough "open" time to slide the frieze around and position it before it dried. Carefully cut away the frieze that covers a gun port with a sharp #11 blade. I did this after the frieze was glue onto the hull and fully dried.

With the frieze completed you can no add the 1/8" strip of molding above it. You will need to scrape the profile of your choosing into a 1/32 x 1/8 strip of boxwood as usual. Then glue it directly atop the frieze. See below. Run the strip from bow to stern keeping a nice smooth





run. You don't want this wavy!! If your frieze was wavy then your molding will be as well. So take care to match the proper run of your planking here. The top edge of your molding you sit flush with the top surface of the cap along the waist. If it doesn't, you should either reduce the width of the friezes or enlarge it so the molding is flush at the waist.

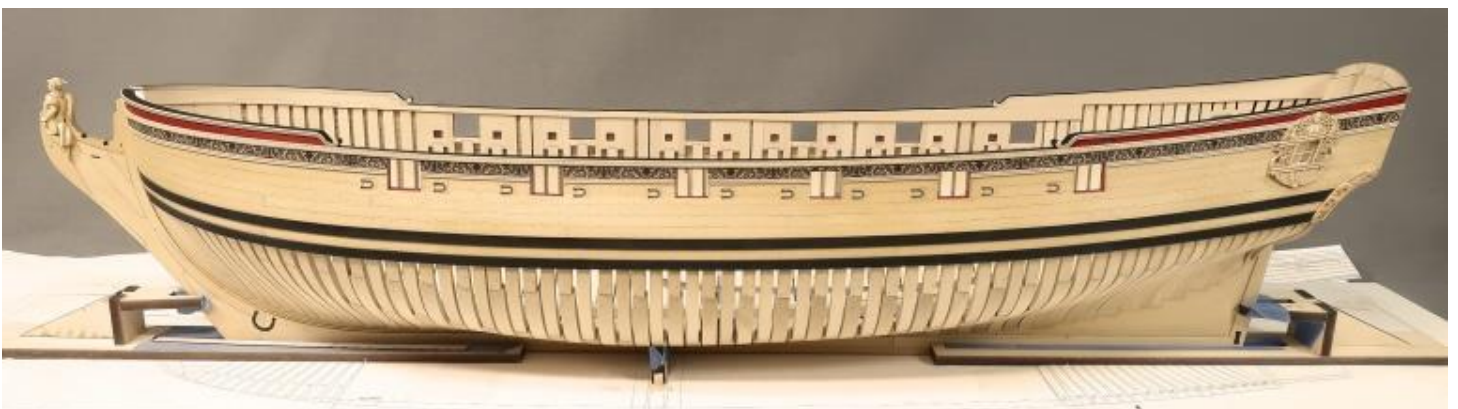
It would be a good idea to paint the red areas along the drifts at this point. Paint the area above the molding with the same color bulwark red that you used for the gunports.

The painting should be done ahead of placing the fancy molding along the sheer of the drifts. In this case the 3/32" wide molding is laser cut for you. You can start with the laser cut and

etched scrollwork first. Glue these onto the model. Sand the scroll caps to suit should they be a bit larger. You want the edged of the scroll itself to be flush with the top of the cap. It will be a close fit initially but will inevitable



require some tweaking. Then position and glue the molding strip in position. But it up against







the scroll so the pattern of laser etched detail matched as close as possible. Repeat the same process at the bow. See the photos provided.

To finish off chapter 3, all that remains is to add the anchor lining. This is straight forward. The anchor lining is laser cut for you. It is 1/32" thick. There are two sets of anchor lining parts depending on how you wish to best complete them. I have provided the anchor lining as one laser piece. This is the easiest method provided that your hull planking lines up with the planks of the anchor lining. If it does not, you may opt to add each strake of the anchor

lining one at a time. I have also provided the laser cut parts for this option. This should allow you to more closely match the run of the hull planking. I drilled and added the trenails to the ends of the anchor lining as per the plans.

The photo below shows the hull as it stands at the close of chapter 3.





**Ketch Rigged Sloop Speedwell  
Laser Cut Parts for Chapter Three**

**Don't forget you will need to buy one  
package of large sweep port hinges.**

**A - Square Tuck - 1/8"**

**B - Counter Planking - 3/64"**

**C - Wale Bow Planks - 3/64"**

**D - Hance Fairing Caps - 7/32"**

**E - Fairing Cap - 1/16"**

**F - Keelson - 3/8"**

**G - Sweep Ports/Fixed Blocks - 3/64"**

**H - Stern Lights - 1/32"**

**I - Stern Lights - Tan Acrylic**

**J - Stern Lights - Acetate"**

**K - Inboard Shear Planking - 3/64"**

**L - Horse Shoe Plates - BLK  
Laserboard"**

**M - Final Cap - 1/64"**

**N - Scroll Caps - 1/8"**

**O - Molding - 1/32" Boxwood**

**P - Final Cap Bow- 3/32"**

**Q - Anchor Lining - 1/32"**

**Wood Strips Included**

**1/8" x 1/32" Boxwood – 10**