

Roatan Lab Ramblings

G. Joseph Wilhelm

Sweet January! The dazed look, shell shocked appearance, stumbling gate and incoherent mumbling are all telltale signs of local family patriarchs emerging from four months of enduring the Roatan rainy season.....indoors.....with their wives.

October thru January, the rains can be daunting and make some of the dirt roads like our mile long branch from the paved "Carretera Principal" (main road) almost impassable. Schools are closed during this time, but everyone's cisterns are filled and guiltless long showers are about the only joy outside of Christmas.

My wife and I do not suffer from being in close proximity as do others. We are too busy laughing at each other's foibles and attempts at "normal life". Now, as we are approaching the end of this year's monsoon epoch, the precipitation is at a manageable level, I can return to working in my not-yet-closed-in shop and resume my Michelangeloesq wood creations for the lab.

I have had a plethora of ponderings fill my mind and now, reinvigorated, I can pursue the perfect lab and we shall start with overthinking the ergonomics. Can't help it. My engineering genes are working on every custom detail with respect to the available funding and material for this effort.

Nothing is more annoying to me than to be physically uncomfortable while engaged in broadening my intellectual divertissements such as microscopy, woodworking, cigars and drinking. So, engineering considerations for comfortable microscopic viewing involve seat type, elevation, viewing bench height and physical dimensions of the particular scope involved. The ability to adjust the seat and/or bench height to accommodate various instruments is necessary and the viewing bench must be as rigid as possible to minimize camera shake.

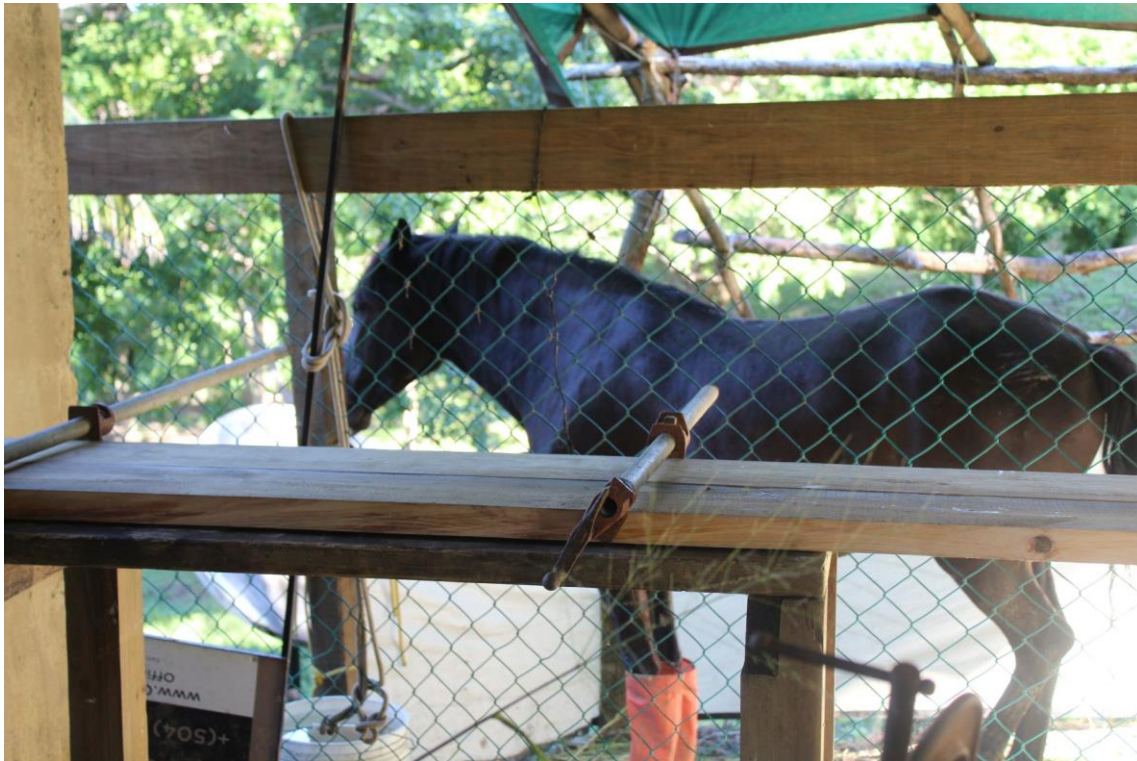
The bench:

Dimensions for the top were taken from the available space, and construction is of four 2"x 8"x 10' local yellow pine boards. Finished dimensions will be 114" long by 28" wide and constructed with the edges of each board trimmed flat and square, joined and glued with dowels to form a seamless surface.

That was the plan.



Half of Benchtop being glued. Glue time is a whole 24 hours or more depending on humidity



This is my supervisor, Macha. If you have never had a close experience/relationship with a horse I can say it is a rather heart-lifting experience quite remarkable. Macha is like a big dog, comes

when called. I swear she would sit and give me her hoof to shake if I asked. There is another complete article there. Back on to subject:

My benchtop planer and table saw are not yet set up yet (due to accessibility and weather), so construction with a circular saw and electric hand planer leave much to be desired in achieving the precise tolerances I strive for. The wood here does not have the finished cut uniformity from board to board that I am accustomed to. It is what it is and I've dealt with worse, just going to take a little longer planing down the high spots and sanding, sanding and more sanding.



OOF! 110 pounds up the stairs to the deck for final glueing.



First filler in place



After 2 hours of planing and sanding, still a ways to go.

Between bouts of planing, wood filling, drying and sanding, I have turned my attention to finding the perfect nominal bench top height as this one will be too heavy (110 lbs.) for easy adjustment. Perusal thru my late 1800s to 1940s "Scientific Apparatus" catalogs revealed "Tables for microscopes" adjustable from 26" to 30" high, which I can accept as starting parameters. I have three metal chair frames upon which to customize seat height and position for viewing. It will be my own version of the X-Chair. Lowest cushioned seat height will be at 18.5 to 19 inches. This puts my eye pupil height from the floor, when sitting upright, with head tilted slightly and looking down at a 45-deg. angle at 42 inches. No arm rests to interfere with getting the chair close to the bench top. Seat height can be incrementally increased by about 4 inches easily with folded layers of a moving blanket and affords a very relaxed and agreeable position for viewing.



I have three of these, sturdy metal frame, salvageable and customizable for seat height. When restored with proper back filler it will look as possibly a Victorian period holdover.

My Zeiss Laboval and GFL models are the microscopes used the most and have measured the eyepiece pupil height from the base at approximately 16 inches. Subtracting the scope eyepiece pupil height from the sitting position eye pupil height leaves us with a 26-inch bench top height. If this is a bit low for some scopes then a simple (but elegantly constructed) wood riser can be utilized beneath the scope base, thusly resolving all of the viewing quandaries that that have plagued the microscopy discipline since its inception. (Yes, yes. I know, you are welcome. I'm also close to solving that whole Newtonian "perpetual motion" thing, it's something to do with cats and trying to sleep).

The above unequivocal, irrefutable and precise science and engineering application (along with the catalog) says to me that maybe, possibly, probably, but not for certain, 26" is a good starting point that may have to be "scooped" (scientific shorthand for "precise adjustment") a bit after actually sitting at the bench.

Aesthetics are also important and this whole room says it wants to be a "period correct presentation" and so it shall be. Of course, everything is subject to the Best-of-my-ability clause.

The period? The instruments, apothecary and most of my scopes fit the Edwardian era to early 1950s so that is where I will keep it with a bias toward King Edward.

A Minwax Provincial wood stain is the color of choice and varnished finish is the desired look. The bench top will be firmly fixed along its entire back and sides to three load bearing walls planked with 1" pine on both sides and will have two 4"x 4" legs securing the bench front to the floor. Camera shake begone! With the low bench bottom to leg (my legs) clearance drawers may not be an option but there will be no storage on the floor under the bench in order to facilitate cleaning. Besides, down here, inaccessible space translates into "habitat" for all kinds of.....things.

The final finishing, installation and leveling of the benchtop will be painful but has to be precise as it is the foundation of the lab and will dictate the position of the glass cabinets which will be custom sized to the apothecary collection.

The last gasps of the precipitation gods are imminent on the horizon as I speak (write.... or whatever) and I am told I must cover my work and make sushi.

Cheers and please feel free to contact me at: gwilhelm@metsonmarine.com with suggestions, a critique or unending praise, your choice.

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