Can't find the perfect color right out of the box? Looking for a more personal touch? Don't mind a little elbow grease and dust? You may want to consider purchasing unfinished wood furniture from International Concepts. There are so many options available when you decide to do your own finish, so we thought we might give you a hand narrowing the field a little. First, we're going to give you some basic tips on things that should be done regardless of what finish you pick.

Before you start:

The first thing you want to do is look at your piece of furniture. Ask yourself these questions:

- What kind of wood is it?
- Is it a solid wood piece or does it have veneers?
- Will staining this piece enhance the beauty of the wood?

If you have unfinished wood that is Cherry or Walnut, you might want to consider a clear finish, or a stain that matches the wood to enhance the natural beauty of the coloring and wood grain. If you have Oak, Maple, Pine, or Birch, you may want it to look like something else. Faux finishes can really enhance the look of furniture, and they lend themselves very well to DIY projects, as they can be a lot of fun to do.

Decided what you want it to look like? Let's move on to the next step.

Preparing for Finishing

Before you try finishing your own piece, you want to make sure you have all the supplies.

Here are the basic supplies one needs to finish at home. If there are specific supplies meant for finishing styles, those will be listed with the Finish.

<u>Space.</u>

This can be messy work. Choose a large space, like your garage or deck. You want to have ventilation, because some finishes have strong odors, and you don't want those smells trapped in your house. If you don't have a garage or deck, cover your floor with a thick layer of newspaper to protect flooring, or even a tarp will work. If you don't have great ventilation, open all the windows in the house, and point fans to blow the inside air out of your house. That will prevent dust from getting stuck in your finish later.

Protection.

Pick up a set of safety goggles, and make sure you wear them. If they want to fall off your face, attach a big elastic band to the earpieces so they stay on. Most safety glasses will fit right over top of your regular glasses.

Dust masks. These are really important. You don't want all that dust and chemicals in your lungs.

Gloves. One is better off with latex medical gloves, not big dishwashing gloves. The dish gloves can make you clumsy; you don't want to drop a quart of stain from slippery gloves, or gouge your finish with a stray finger and not notice.

You can buy all of the above at the local hardware store, and probably for less than ten dollars altogether.

The tools of the trade.

In transit or in your home, furniture can get little flaws. If you want a great finish, pick up some Natural Wood Fill. You can use it to fill knot holes, scratches, and dings. This works long after your piece is finished, too.

Tack Cloths. Tack cloths come individually wrapped in plastic, and they're sticky. When you use a tack cloth on wood furniture, it picks up all the dust. You can also use a cloth dampened with denatured alcohol. The alcohol evaporates quickly, and leaves no residue, and makes the dust stick to the cloth.

Cloths. Don't use any kind of terry cloth, like bath or tea towels. Nothing embroidered, or anything that leaves lint. The best cloth to use is actually jersey knit. That's the fabric they make t-shirts out of. If you go to any paint or hardware store, you can pick up a box of them for around ten dollars. It's a good idea to get them, and after, you can use them to clean up and throw out. None of the cloths you use to stain are salvageable afterwards. For temporary storage, soak the used rags in water in a closed metal container away from heat and flame, because if they get too hot, they can spontaneously combust!

Brushes. If you're painting, get paint brushes, or get the foam brushes for detail work with gel stain. Liquid or penetrating stain needs a paint brush, usually.

There are a number of things you can find around the house to make things easier. A butter knife or chopstick for those hard to reach places, and cotton swabs for getting gel stain out of corners and screw holes. Painter's tape for protecting any hinges or glass front doors that will need to be taped off. If you have some flat sticks, like old trim pieces or edge cuts from other projects, these can be used to hold products off the floor, and allow for better air circulation. I like to call them 'stickers'. Of course, you're going to want Sandpaper. Sandpaper can get pretty confusing. There's a number of types, and they all come in quite a few different grits. Here's a basic fact to remember: The lower the number of the grit, the coarser the sandpaper. Look for the Garnet paper or the Grey paper but always double check the grit number on the back to make sure you have the right piece. The wrong sandpaper can ruin a project, and always sand WITH the grain!

Sandpapers are commonly graded as coarse (40-60 grit), Medium (80-120), Fine (150-180), Very Fine (220-240), Extra Fine (280-320) and Super Fine (360 and above). You might be asking, "Why can't I just sand the entire project with 360 Super Fine sandpaper?" You can, but it's going to take forever. The coarse paper removes material faster, but it can leave fine scratches in the wood. Sanding with progressively finer grits removes the scratches left by the previous paper and eventually leaves a smooth finish

That was the dry stuff. Now for the wet stuff.

<u>Stain</u>

Let's talk about stains for a moment. I'm going to cover three kinds of stain; Tung Oil, Gel Stain, Penetrating Stain.

<u>Tung Oil</u>

Tung Oil, sometimes called Danish Oil, is a bit different. Over raw wood, it can have the same color effects as the traditional stains, but it hasn't been tinted. Tung Oil comes in one tone, and leaves a transparent honey color over the wood. A hard drying oil which provides a tough, water-resistant finish, it can be used as a finish, or as a primer or sealer on bare wood before applying paint or varnish.

Gel Stain

Gel stain is a very useful product for the inexperienced finisher. It's got great coverage, around 250sq. feet per quart. That's usually enough to do a few coats if you want to, or do multiple pieces and just leave the stain on a little longer. Applying Gel stain is like covering your furniture in a coating of mayonnaise. It's thick, so it doesn't run and drip like penetrating stain. This allows you a greater control over the depth of color you get.

Penetrating Stain

Penetrating stain is what most people think of when they think about stain. It's an excellent product, but it requires more effort in application, cleanup, and preparation, especially for the inexperienced. Applied with a brush or a rag, you must take care not to get drips or pools on surfaces. These will penetrate deeper

into the wood, leaving a bolder color and marring your finish. A quart of this covers less as well, only about 100 sq. feet.

<u>Top Coat</u>

Sealing your project is good for several reasons. In the case of tables and shelves, it prevents major surface wear, and keeps it beautiful. It's also easier to clean. When it comes to stools and seating, it's going to increase the life of both your stain, and your favorite pair of jeans. Sitting on a stained stool with no topcoat can cause wear on your clothes.

There are several options for topcoats, just as there are for stain. Tung Oil, however, doesn't NEED a topcoat. You can put it on if you want, but Tung Oil has been used for hundreds if not thousands of years in China to seal decorative and marine wood as well as porous masonry. Can't argue with thousands of years of Chinese history, now can we?

<u>Oil Based</u>

Oil based finishes have a very strong odor, and should not be used without a secure breathing mask. Lacking a properly ventilated spray booth, this product can be used outdoors to prevent fumes. These finishes can frequently lend a golden tone to whatever they are coated over.

- Lacquer: A quick-drying, solvent-based finish. Lacquer is dissolved in lacquer thinner, which is a highly-flammable solvent, and is typically sprayed on, within a well ventilated spray booth, or out of doors. This minimizes the risk of accidental combustion.
- Shellac: A widely used single component resin varnish that is alcohol soluble. It is not used for outdoor surfaces or where it will come into repeated contact with water such as around a sink or bathtub. Shellac clean-up may be done either with pure alcohol or with ammonia cleansers.

Water Based

Having superior clarity and lending no color, Water based finishes come with the added bonus of easier clean up.

• Acrylic: Water based clean up, no solvent fumes, and a clearer finish. For the inexperienced person, this is probably the best finish to try at home, as you don't have to worry about thinners, ammonia, or spontaneous combustion.

Once you have chosen the type of stain, and the type of top coat, you can actually start.

Preparing your furniture for stain

So, now you have some basics under your belt. You've got the facts, but now you need techniques. Thank goodness, we have those too. We'll take you from fresh and unfinished, right out of the box, all the way to the finished project.

Sanding your furniture:

You Will Need:

- 120 grit Garnet Sandpaper
- 150 grit Garnet Sandpaper
- Safety goggles
- Dust mask
- Tack Cloth, or t-shirt rag and denatured alcohol

Sandpaper comes in 9" x 12" sheets. Cut them in half, then in half again. This will leave you with four pieces at a 4-1/2" x 6" size. Take one of those pieces, and fold it into half, then half again, leaving you with a little piece of sandpaper, about the size of your palm. This allows you greater control. When the paper gets clogged, which it will, just flip to a clean side, and keep going.

Step One: Start with 120 grit Garnet Sandpaper.

Just like anything else, there are right and wrong things to do when sanding. The most obvious thing is that you always want to sand with the grain, not across it. Keep the flat side of the sandpaper in complete contact with the surface of the wood. When sanding with the grain, it is alright to get close to the edges, but be careful that you don't accidentally round-over the corners. If you want the corner to be softened, run the paper once or twice down the edges in a single long stroke. That means the edges will be smooth and even, not sharp, and without any dips or curves. When sanding end grain, run your fingers lightly along the surface of the end grain. You should notice that one direction feels smoother than the other direction. Sanding in the smooth direction will yield better results.

Step Two: Use the 150 grit Garnet Sandpaper.

When the surface is fully smooth to the touch, set aside the 120 grit, and with a fresh piece of 150 grit sandpaper, lightly sand by hand applying light pressure with the fingertips. Go over the entire surface, and remember, sand with the grain, in straight lines. Don't swoop or curve, if you do, those marks will show up when you put the stain on, even if you don't see them now.

Step Three: Remove Dust.

Clean the surface in preparation for finishing by removing the dust with either a Tack Cloth, available at paint or hardware stores, or one of those t-shirt rags dampened with denatured alcohol. Denatured alcohol will evaporate quickly, and won't make the wood swell the way a cloth dampened with water would. Give the surface a couple of minutes to dry; this is a good time to vacuum up the dust so it doesn't get stuck in your finish. Cleaning as you go is very important; shake the dust out of your clothes, wash your hands, and get a bit of fresh air. I know, the masks are hot, especially in the summer, but you'll thank me when you can still produce saliva.

That's it for prep work. Easy, right? Just three simple steps. Now take the stain you've chosen, and read the back of the container. See the directions? Follow those, and I'll provide some techniques and know-how to bolster you along.

Staining your furniture

Now that you have gotten rid of any dust on the surface of your piece, and had a look at the directions on your product, I'll cover the techniques for using the three stains I mentioned earlier.

Click <u>here</u> for Tung Oil Click <u>here</u> for Gel Stain Click <u>here</u> for Penetrating Stain

Finishing with Tung Oil

Tung Oil provides a satin finish and provides coverage of approx 12.5 sq. m/l (600 sq. ft./gallon) and is usually applied in three coats by brush or cloth, leaving around 6-24 hours between coats, depending on the mixture being used and the wood being treated. Tung Oil is safe for outdoor furniture. On average, we recommend between 3 and 6 coats of Tung Oil for a smooth finish.

Once you've finished the prep work, you can move on to the staining.

Specific Supplies for applying Tung Oil:

- Sandpaper in 220, and 360.
- Natural Bristle paintbrush (Optional)
- T-shirt cloths

- Tack Cloth
- Paint Thinner for cleanup
- Gloves, Mask, and Goggles

Step One: Read the can!!

This is the biggest mistake people make: just cracking open the can and starting. What if you don't have time to finish? Shake before opening? Reading the label is the first thing you should do before you even think of opening a product.

Step Two: Apply the first coat.

Using a rag or the natural bristle brush, apply the first coat. Follow the grain, and of course, try not to leave any dry spots. Let it dry for the prescribed amount of time according to the can. Depending on the length of time, this might be a good time to stop for lunch and a little cleanup.

Step Three: Do a light sanding.

When it is dry to the touch, do a light sanding with 220 grit paper. By light sanding, I mean very light. Moving in a long single stroke, go from one end of the surface to the other without stopping. Only apply a small amount of pressure, you don't want to scratch the start of the finish. Wipe gently with a tack cloth to remove any dust.

Step Four: Repeat as necessary.

You may need to do three to six coats, as I said before. Between coats, sand with the 220 grit paper. After your LAST coat, do the same kind of sanding with the 360 grit, and wipe for the last time. You now have a beautiful piece of furniture that is resistant to watermarks, has an easily repaired, tough finish, and looks beautiful. Tung oil is a top coat as well as a stain, so you're all done!

And you did it all yourself. Cool, huh?

Finishing with Gel Stain

Gel Stain is a great product. It doesn't drip or run, it's easy to apply, and it really adds some beautiful rich tones. You can do one coat and have a light stain, or you can do as many as you want to achieve the depth of color you want. It comes pre-mixed in a number of beautiful colors, and covers around 250 sq. feet per quart. It's also pretty fun to use. Be sure to have adequate ventilation when working with gel stains, as they contain materials that give off toxic fumes. Also

make certain to discard the cloths that you use properly, as the gel stain is quite flammable.

Once you've finished the prep work, you can move on to the staining.

Specific Supplies for applying Gel Stain:

- Sandpaper in 220, and 360.
- Foam paint brush
- T-shirt cloths (at least 10)
- Tack Cloth
- Mineral Spirits for cleanup
- Q-tips for getting stain out of the corners
- Paper towel for the wiping phase
- Gloves, Mask, and Goggles

Step One: Read the can!!

This is the biggest mistake people make, is just cracking open the can and starting. What if you don't have time to finish? Shake before opening? Reading the label is the first thing you should do before you even think of opening a product.

Step Two: Apply the first coat.

Put your gloves on. This stuff will get in your nails, your rings, everywhere. You're going to want them. Wear clothes you don't mind ruining, because they probably won't be wearable in public when you're done. If you use a rag, fold it so that you have a smooth padded surface, with no wrinkles or seams. You want it to have a really smooth surface, so you don't leave streaks in the finish. Really, the Foam brush is easier to apply Gel stain with. Once you have your cloth or brush ready, apply the first coat. Follow the grain, and of course, try not to leave any dry spots. This is sort of like spreading a thick layer of mayonnaise on a piece of bread. Don't try to rub it in. You want it to sit on the surface. It doesn't have to be pretty, it just has to be covered. Don't worry if it's thicker in some spots than others; as long as you can't see the wood grain, you're good to go.

Step Three: Wipe the stain off.

The instructions on the can will tell you how long to leave the stain on the wood before wiping it off. Remember what I said about the cloth at the beginning? Fold it so that you have a smooth padded surface, with no wrinkles or seams. You want it to have a really smooth surface, so you don't leave streaks in the finish. Now go with the grain, and wipe the stain off. The brush doesn't work for

this part at all. If you want, start with a paper towel in one hand to take the majority off, then use the rag to get the last of it. This saves on cloths. When the cloth seems full of stain, rotate it, or refold it. Aren't you glad I said to wear gloves? Use the Q-tips to get into the corners. Don't leave any blobs of stain, because they won't evaporate. They'll just get sticky, and make a mess later.

When all the gel is off, let it dry. Have a look at it. Like the color? Skip to step five. Want it a little richer, a little darker? Keep reading.

Step Four: Give it a light sand.

When it is dry to the touch, do a light sanding with 220 grit paper. By light sanding, I mean very light. Moving in a long single stroke, go from one end of the surface to the other without stopping. Only apply a small amount of pressure, you don't want to scratch the start of the finish. Wipe gently with a tack cloth to remove any dust.

Step Five: Repeat as necessary.

Between coats, sand with the 220 grit paper as in step four. After your LAST coat, do the same kind of sanding with the 360 grit, and wipe for the last time. Let the stain cure according to the can, and then you'll be ready to apply your clear topcoat.

Penetrating Stain

Specific Supplies for applying Penetrating Stain:

- Sandpaper in 220, and 360.
- T-shirt cloths (at least 10)
- Tack Cloth
- Mineral Spirits for cleanup
- Q-tips for getting stain out of the corners
- Gloves, Mask, and Goggles
- Stir stick

Step One: Read the can!!

This is the biggest mistake people make, is just cracking open the can and starting. What if you don't have time to finish? Shake before opening? Reading the label is the first thing you should do before you even think of opening a product.

Step Two: Stir the can, do not shake. Apply the first coat.

Put your gloves on. This stuff will get in your nails, your rings, everywhere. You're going to want them. Wear clothes you don't mind ruining, because they probably won't be wearable in public when you're done. Remove the lid, and stir the stain. Make sure you scrape the bottom of the can carefully. That's where all the pigment is. Stir it well, but avoid making bubbles. Bubbles may translate into texturing on your stain that you don't want.

To use the rag, fold it so that you have a smooth padded surface, with no wrinkles or seams. You want it to have a really smooth surface, so you don't leave streaks in the finish. Once you have your cloth ready, apply the first coat. Follow the grain, and of course, try not to leave any dry spots. It's runny, but try to make an even saturation on all the surfaces. If you have vertical surfaces, save them until you can turn the product over to make them horizontal. Otherwise, drips everywhere! Don't try to rub it in. You want it to sit on the surface. It doesn't have to be pretty, it just has to be covered.

Step Three: Wipe the stain off.

The instructions on the can will tell you how long to leave the stain on the wood before wiping it off. Usually it's a couple of minutes. Remember what I said about the cloth at the beginning? Fold it so that you have a smooth padded surface, with no wrinkles or seams. You want it to have a really smooth surface, so you don't leave streaks in the finish. Now go with the grain, and wipe the stain off. The brush doesn't work for this part at all. When the cloth seems full of stain, rotate it, or refold it. Aren't you glad I said to wear gloves? Use the Q-tips to get into the corners. Don't leave any blobs of stain, because they won't evaporate. They'll just get sticky, and make a mess later.

When all the gel is off, let it dry. Have a look at it. Like the color? Skip to step five. Want it a little richer, a little darker? Keep reading.

Step Four: Give it a light sand.

When it is dry to the touch, do a light sanding with 220 grit paper. By light sanding, I mean very light. Moving in a long single stroke, go from one end of the surface to the other without stopping. Only apply a small amount of pressure, you don't want to scratch the start of the finish. Wipe gently with a tack cloth to remove any dust.

Step Five: Repeat as necessary.

Between coats, sand with the 220 grit paper as in step four. After your LAST coat, do the same kind of sanding with the 360 grit, and wipe for the last time. Let the stain cure according to the can, and then you'll be ready to apply your clear topcoat.

Top Coating your furniture

Now that you have the perfect color, you want it to last. I'll cover three of the most common finishes, Lacquer, Shellac, and Acrylic. Stains also come in sheens. Matte, Semi-Gloss, and Gloss. Matte has no sheen, Gloss is very shiny, and Semi-gloss is somewhere in between.

When it comes to Top Coat, there are two techniques I will cover, and they'll be obvious when you go to buy your top coat which you'll be doing. You can spray the finish on, or you can brush it on.

No matter what you do, spray or brush, give it a light sand between coats, then hit it with the 360 after the last coat. This will give you a grit-free finish, as long as you have remembered to wipe with a tack cloth each time you sand.

If you want to spray your finish, do it outside. The reason for this is called *Overspray*. Overspray is great, unless you just got it on your couch. When you are spraying, press down on the nozzle while it is pointed AWAY from your project, then move across the surface in one long stroke, ending the spray stream OFF of your project. Otherwise, you can get puddles of finish, and they take forever to dry, as well as being unattractive. Don't stop and start on the surface of your furniture, go all the way from one end to the other, in a steady pace. Do one stroke at a time, don't continue to spray and reverse direction. Again, sand between coats, and with a spray finish, you want to do at least three. As a can of spray top coat usually only does 25 sq. feet, you might want to buy a couple of cans.

When brushing your top coat on, use a natural bristle brush for oil based finishes, and a synthetic brush for water based. The brushes react differently with the finishes, so doing so will give you the smoothest finish possible. Brush it on in long smooth strokes. This isn't like painting, where you can just keep going over the same spot until it's covered. You'll get lap marks in your finish, and it starts to get sticky right away, so it can clump and wrinkle. Then you have to either sand it all off, re-stain, and refinish, or you have to strip it off if it's too thick to sand. That's a whole messy headache in and of itself. Of course, sand between coats, wipe with the tack cloth, and obey all the drying times on the labels.

That's it, folks! That's all she wrote. Enjoy your beautiful, hand-finished furniture.

About the Author: In a previous life, the author was an Antique Furniture Refinisher and Restorer, and is now employed by Cymax.com.