

Wipe On Finishes

LI Woodworkers Club

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Outline

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Intro

- A wipe on finish is any finish that is thinned out for ease of applying
- Most are thinned with mineral spirits or denatured alcohol
- As a thinner finish it does increase how fast it dries
- All wipe on finishes are applied with a cotton rag (old T-shirts)
- Most wipe on finishes have a satin sheen once cured
- Protection with finish varies from poor to excellent
- Most wipe on finishes are easy to repair (scuff and reapply)
- Never leave oily rags unattended!!!
- BLO used rags especially can spontaneous combust and burn down your shop!!

Boiled Linseed Oil (BLO)

- Dates back to the 18th century as a valued finish for furniture
- Extracted from the flax plant seeds
- In raw form is inefficient for finishing so metallic driers are added
 - Salts of cobalt, manganese, zinc
- Always wipe of excess, or the finish will become gummy
- Protection: Poor
- Sheen: Satin



Boiled Linseed Oil Application

1. Prepare the wood by sanding to 220-320 grit paper
2. Remove all sanding dust
3. Apply 1st coat by flooding the wood. If any dry spots appear apply more finish. Before it becomes tacky wipe off any excess well.
4. If any finish bleeds out keep wiping it off every hour or so
5. Apply additional coats once cured overnight. Smooth the surface with 320 grit paper. Then remove all sanding dust. Apply as many coats as needed.

Boiled Linseed Oil Examples



Pure Tung Oil

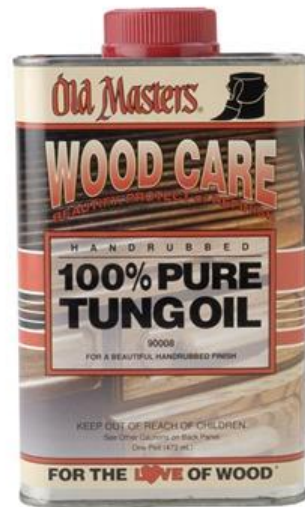
- Pure tung oil is extracted from the Tung tree native to China
- Now comes from South America and Gulf Coast
- Used by for centuries in China as a furniture finish
- One of the most water-resistant oils
- Cures slower than BLO
- Protection: Poor until 5+ coats
- Sheen: Dull until 5+ coats



Pure Tung Oil Application

1. Prepare the wood by sanding to 220-320 grit paper
2. Remove all sanding dust
3. Apply 1st coat by flooding the wood with a thinned 50/50 coat thinned with mineral spirits. If any dry spots appear apply more finish. Before it becomes tacky wipe off any excess well.
4. If any finish bleeds out keep wiping it off every hour or so
5. Apply the next 2 coats with thinned finish. Let each coat cure overnight. Smooth the surface with 320 grit paper. Then remove all sanding dust. After 3rd coat apply full strength pure tung oil.

Pure Tung Oil Examples



Polymerized Oil

- Cooking linseed or Tung oil in a oxygen-free environment at around 500°F
- Act like a varnish now that they are thicker and are now crosslinked
- Simply means a “crosslinked” oil
- Avoid using on large furniture as it dries very fast and can cause streaking
- Avoid thick coats as it can crack once cured
- Protection: Excellent if built up
- Sheen: Gloss

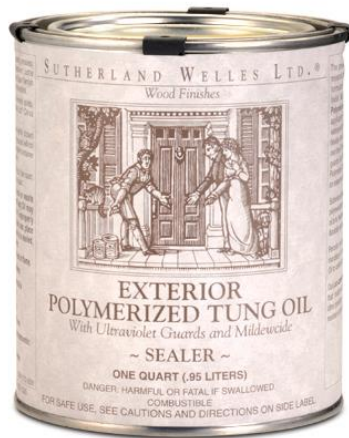


Polymerized Oil Application

1. Prepare the wood by sanding to 220-320 grit paper
2. Remove all sanding dust
3. Apply 1st coat on the surface very thinly and evenly
4. Allow the coat to dry completely overnight
5. Steel wool the surface with 0000 grade wool and wipe/blow off dust.
6. Apply additional coats thinly and repeat.

Polymerized Oils

Examples



Oil/Varnish Blend

- Made with linseed/tung/soybean/safflower oil and a resin such as alkyd, phenolic, and polyurethane
- Performs like an oil (reduces sheen and cures slowly)
- Performs like a varnish (water resistance, hardness, sheen)
- Watco Danish Oil and Minwax tung oil finish is a common oil/varnish blend
- Protection: Medium
- Sheen: Satin



Oil/Varnish Blend Application

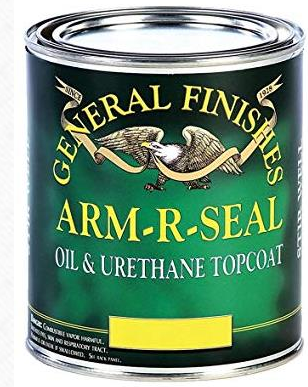
1. Prepare the wood by sanding to 220-320 grit paper
2. Remove all sanding dust
3. Flood 1st coat onto wood with the grain
4. After 5-10 minutes buff evenly with cotton rag
5. Wait overnight, then steel wool with 0000 grade wool.
6. Apply 2nd coat. 2 coats are recommended

Oil/Varnish Blend Examples



Wiping Varnish

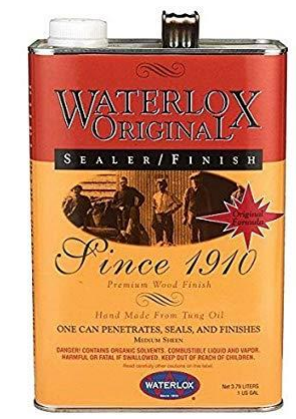
- Simply varnish that is thinned with mineral spirits to make ease of application with a rag (50/50)
- Usually 3 coats of wipe on varnish = 1 coat full strength varnish
- Builds in thickness as more coats are applied
- Make your own wipe on varnish
 - 1 or 2 parts mineral spirits TO 3 parts oil based poly
- Protection: Excellent when built up
- Sheen: Gloss or Satin



Wiping Varnish Application

1. Prepare the wood by sanding to 220-320 grit paper
2. Remove all sanding dust
3. Wipe on generous amount of wiping varnish with the grain. Avoid too much wiping to prevent streaking.
4. Let dry 4+ hours (sometimes overnight)
5. Lightly sand surface with 320 grit. Remove all dust.
6. Repeat coats until desired build

Wiping Varnish Examples



Shellac

- A natural resin secreted by the lac bug primarily in India
- Approx 1.5 millions bugs make 1lb of shellac
- Denatured alcohol is used to thin shellac flakes
- Bonds well over just about any stain and finish
- Great for French polishing
- Can be found in amber, clear, blonde, garnet, orange, dewaxed
- Short shelf life



Shellac Application

1. Spread out a small piece of cotton rag and put in the middle a folded smaller cloth. Then lift the 4 corners of outer cloth and twist. Twist the corners tight so there is no wrinkles.
2. Thin out the shellac to a 2 lb cut and pour onto pad until liquid seeps out
3. Move pad across wood with the grain lightly to produce light layers. When pad is dry add more shellac
4. Let dry at least 2+ hours then lightly scuff sand with 320 grit paper
5. Repeat applications to the desired build

Shellac Examples



Paste Wax

- Beeswax
 - Produces a medium gloss sheen, easy to use as a finish
- Paraffin wax
 - Produces a lower sheen than beeswax, softer
- Carnauba wax
 - Produces a high sheen, difficult to buff out
- Closest thing to having no finish on wood due to lack of any protection
- Great to rub out a cured finish to a smooth satin sheen



Paste Wax Application

1. Sand wood surfaces for film finishes to 220 grit or alone to 600 grit for wax
2. Clean all surfaces from dust
3. Put a lump of wax in center of a cotton rag and wrap rag around it.
4. Rub cloth over surface to release the wax. Rub in any direction
5. Allow most of the solvent in wax to evaporate. Approx 10-15 minutes
6. Wipe off excess wax with a cotton cloth.
7. Apply additional coats of wax and repeat process

Paste Wax Examples



Rubio Monocoat

- All natural oil finish originally designed as a floor finish (and still is)
- Plant based 0 VOC
- Non-toxic
- Apply simply with “1” coat
- Easy to maintain (scuff spot and apply Rubio)
- Shows the natural wood and patina of wood
- It adheres to the wood by molecular bonding so no film forms
- 2 part finish (oil & accelerator)
- Water resistant



Rubio Monocoat Application

1. Higher the grit of sanding changes color of Rubio Monocoat. 120 grit to 180 grit works best.
2. Remove all dust.
3. Apply with a clean cotton cloth evenly
4. Wait 10 minutes to remove any excess oil with a clean cotton cloth. Make sure to change cloth once saturated. Make sure all excess oil is removed.
5. Polish surface with lambs wool or white polish pad for a matte sheen.

Osmo Oil

- Combines the advantages of natural oils and waxes in 1
- Resistant to dirt, water, and abrasions
- Ingredients: sunflower oil, soybean oil, thistle oil, carnauba wax, candelilla wax, silica, drying agents, naphtha
- Microporous and molecularly bonds to wood
- Easy to repair with no sanding
- Comes in matte or satin sheen



Osmo Oil Application

1. Sand all surfaces to 220 grit. Remove all dust
2. Apply thinly and evenly with the grain.
3. Let dry at least 8-10 hours
4. Second coat apply thinly and evenly. Remove excess oil immediately.
5. When thoroughly dry buff surface with polishing white pad