

# Controlling Surface Quality: A Holistic Approach

## From the Ground Up

While the type of surface quality (gloss, satin, or matte) greatly depends on the aesthetic of the artist or collector, surface quality plays an important role in creating a unified, finished appearance.

Often painters feel surface quality is determined by the final layer of varnish. In fact, an established landscape painter recently explained that his final picture varnish wasn't yielding the same glossy surface quality he'd come to expect. Turns out he'd been working on a new type of ground, which greatly affected each subsequent layer of the painting - all the way up to the varnish.



So it is only fitting that this discussion start from the ground up, showing how each layer of the painting structure affects surface quality. By taking each layer into consideration, artists can choose the materials that will support the work they want to create.

### The Anatomy of an Oil Painting

The different layers that are applied onto a painting's support create the "anatomy" of an oil painting. The most common supports are stretched fabric (canvas or linen) and wooden panels. Generally speaking, oil paintings age better on rigid supports because the paint film is not subjected to movement throughout the life of the painting - and is thus less prone to cracking. Adhering fabric onto panels is also a popular choice for artists.



#### Ground

The choice of ground is often the most overlooked component in controlling the overall surface quality. Through 500 years of oil painting, three different grounds have been used to build permanent paintings:

• Traditional Gesso: Gamblin Traditional Gesso (whiting and Rabbit Skin Glue): is a highly absorbent ground for use on rigid supports only.

• Acrylic Gesso: an absorbent ground for use on flexible or rigid supports. Artist's grade acrylic gesso is formulated with enough "tooth" to create a physical bond with oil paint. Be cautious of economy-grade acrylic gesso, which is often too slick to encourage a mechanical bond with paint layers.

• Oil Ground: a nonabsorbent ground for use on flexible or rigid supports. Traditional oil grounds contain lead white pigment bound in linseed oil; they tend to be more brittle and prone to cracking. Gamblin's Oil Painting Ground is an alkyd-based, bright-white ground that dries quickly with greater flexibility.

Absorbent grounds will pull more oil out of the paint film into the ground. The resulting paint layer will have a matte surface. Non-absorbent oil grounds do not absorb oil from the paint film, so paintings will retain a glossier surface. The landscape painter mentioned earlier built his painting on a highly absorbent ground. Acting like a sponge, it pulled the oil out of each subsequent layer of paint. As a result, the gloss varnish that was applied to this "thirsty" painting sunk into the paint layers and dried more matte than expected.

### **Paint Layers**

Often painters notice that their oil paintings take on an uneven surface quality after the paint layers have dried. This is because artists' pigments absorb the linseed oil binder at varying rates. The phenomenon of oil colors drying more matte is often referred to "sinking in."

The 90 colors in the Gamblin line can be categorized as high, moderate, and low in their oil - or fat - content. To determine the oil content of a color, look at the paint; the shinier the paint, the fatter it is. For example, Napthol Red is shinier than Cadmium Red, so Napthol Red has a higher oil content. Colors with a higher fat content will dry glossier, while leaner colors will dry more matte. Once painting mediums are added to the paint, the difference in fat content among colors is negligible.

To better judge color saturation, many artists choose to even out the surface before the painting is completed. This brings up the issue of "oiling out" vs. using a retouch varnish. When using retouch varnish, a thin layer of removable varnish is put in the middle of the structure. When "oiling out," a thin layer of binder is put between other layers of binder, and before long, this all cross-links to become one homogeneous layer. This method is preferable to using actual retouch varnish in the middle of a painting.

### "Oiling Out" Procedure:

1. Apply a liberal coating of 1:1 Galkyd Painting Medium and Gamsol Odorless Mineral Spirits to a dry painting. This can be applied to the entire painting or just to the area that needs to be enlivened.

- 2. Allow the medium to be absorbed into the painting for approximately two minutes.
- 3. Wipe off the excess painting medium with a soft, lint-free cloth.



You can view our 4 minute instructional video and add it to your Gamblin Studio Notes Library.

### **Glazing and Varnishing**

The final stages of the painting can ultimately determine the type of surface quality the painting will take. Whereas some painters prefer a dead-matte finish, others like the saturated colors and depth obtained by a high gloss. With an understanding of materials, painters can easily achieve their desired surface quality.

First, it is important to make a distinction between a glaze and a varnish. A glaze is a permanent paint layer containing little to no pigment; paintings may contain multiple layers of glazes or none at all. The popular technique of finishing off a painting with a clear layer of Galkyd, for example, constitutes a glaze layer and fulfills the artist's aesthetic concern for surface quality. A varnish layer, on the other hand, is a non-porous, protective layer that is removable for conservation purposes; it serves its aesthetic purpose while also providing protection against dust and dirt.

There is much benefit in applying both a thin glaze layer and a varnish layer to a finished oil painting. When a varnish is applied, it will often "sink-in" to the matte (absorbent) areas while appearing glossy over the already glossy (nonabsorbent) areas. The varnish will then dry with an uneven surface. Consider using the "oiling out" method (described above). This will even out the surface and, more importantly, even out the absorbency rates on the surface of the painting. The final varnish layer will lie on top of the glaze layer, rather than sink in to the permanent layers of paint.

### Waxing Artistic

Oil paintings tend to take on the surface quality of the top-most layer, so it's important to learn how to modify the surface qualities of your painting mediums and varnishes accordingly. Our Galkyd Painting Medium dries to a gloss surface. Our gel mediums - Neo Megilp and Galkyd G-Gel - dry to a gloss/satin finish. The surface quality of all of these mediums can be modified with our Cold Wax Medium. For a matte version of Galkyd, simply dissolve the Cold Wax Medium in equal parts Gamsol. This creates a fluid matting agent that, once completely dissolved,



can be added directly to the Galkyd medium. Adding 1/4 matting agent to 3/4 Galkyd will make a more matte finish. The Cold Wax Medium can be added directly into our gel mediums.

Gamblin Gamvar Picture Varnish will naturally dry to a glossy surface. Cold Wax Medium can be dissolved directly into the mixed batch of Gamvar for a more matte surface. The modified varnish will dry more matte than it appears wet, so it's important to test it first. For a completely matte surface, the Cold Wax Medium itself can be applied to a dry painting with a soft, lint-free cloth in small, circular strokes. Let the wax varnish dry overnight. Then leave it as is if you like the matte surface or gently buff the surface to create a soft luster. (Be sure not to scratch the surface of the wax varnish while buffing.)

Remember, the varnish layer is the one layer of the painting structure that is removable. If you're not satisfied with the surface of the varnish, simply remove it with Gamsol Odorless Mineral Spirits and try again!

If you have any questions about controlling the surface quality in your own work, please feel free to contact us.

Sincerely,

Scott Gellatly Technical Support Representative

Gamblin Artists Colors Co. PO Box 625 Portland OR 97207 USA Telephone: 503.235.1945 Fax: 503.235.1946