Quick Start Learning Guide For LabColors Cosmetic Dyes

We ***strongly recommend*** that you read through this entire page before using your Labcolors.

This LabColors Quick Learning Guide includes the following information:

• Diluting the Labcolor Concentrated Solutions
• Blending the Labcolor Diluted Solutions
• Using the Labcolors Undiluted
• Using the Labcolors Diluted
• Use in High pH Products - ex: Cold Process (CP) Soap
• Use in Low pH Products - ex: Melt and Pour (MP) Soap, Lotions, Creams, etc.

Diluting Labcolor Concentrated Solutions:

It's easy!!!

You will need a pot, Distilled, Deionized, or Reverse Osmosis water (I do not recommend tap water unless you have EDTA available - metal ions found in tap water can affect color over time), a thermometer, a whisk for stirring, a container for storage and about 10 minutes of time.

Your container can be glass or plastic. Keep in mind plastic will stain. A good tight fitting lid is also recommended to help prevent evaporation of the water.

Gloves are a good idea - dyes will temporarily dye skin. Bleach or a kitchen cleaning scrub will remove the dye. If you drop dye on your counter or floor **DO NOT** add more water with a mop or wet rag - first clean up your spill with paper towels and then wash or you will make a huge puddle of dye!

Determine the size of LabColors you have purchased. The label on the bottle will tell you what size Labcolors you have. They are either:

• For 8 oz. (125 - 250 ml)
• For 16 oz. (250 - 500 ml)

Measure out your water according to the size of Labcolors you purchased and place it in the pot.

Example: For 8 oz. (250 ml) you would measure out 8 oz. (250 ml) of water for each color. Do not add more water than what your size of Labcolors is - it will dilute the dye strength which will affect the formula.

- Heat the water to 140° F (60°C). Remove from heat as soon as this temperature is reached - going higher or prolonging heat exposure may affect the integrity of the dye.
- Before opening the LabColours tube shake the tube well to distribute any possible settlement and then pour the contents of the dye tube into the water and stir.
- Some water may have evaporated during the heating process. You may now weigh or measure the liquid to see if it is within the 8 oz. or 16 oz. range and add water until you have reached the maximum amount of the Labcolors size you have purchased.
- Pour the Color into your container.
- After the mixture has cooled you may add your preservative - USE ONLY a water soluble preservative -DO NOT use Phenonip as it is oil soluble and will just float on the surface!

If you prefer not to use a preservative, dyes can be measured and poured into ice cube trays and frozen and then stored in freezer bags. Or you may keep the colors refrigerated.

The preservative used in the dye solution for storage will most likely be destroyed when used in your lye water solution. It is of no concern after the dye is in the soap. If you pre-mix your lye solution, add dye and store it for later use, the integrity of the preservative will be compromised and your solution may develop mold.

HINT: If you have dye left over in the vial:

Once the color has been made pour it into its container. With a small pipette, or pouring carefully, fill the vial with a little of the mixed color, cap the vial and shake. Then pour it back into the container. This system works well to ensure you have all the dye in the mixture!

HINT: If making more than one color fill your pot with a bit more than the amount of water needed to make all the colors. Using more takes water loss into consideration so you will have enough water. Once the water is heated measure out the amount needed and blend your color.

Pay close attention to the temperature of the water to make sure it is not over 140° F, (60*C), when you add the dye.

A few formulas call for "**Royal Purple 50% dilution**" - this means add an equal amount of water to the Royal Purple dye which has **ALREADY** been diluted with water, and use this combination - DO NOT just add more water to everything or your color will not be what you want.

Blending Labcolors To Create More Shades Of Colors:

By using the Primary 12 colors you will be able to make many more wonderful colors following the mixing guides. The Formulas are given in "PARTS".

A "Part" can be any measurement you wish, such as drops, teaspoons, or anything as long as the parts are equal.

Example #1: We are going to make a Sunflower color for a low pH product such as a batch of melt and pour soap.

The Formula calls for:

- 1 Part Peach
- 1 Part Canary
- We are going to use teaspoons as our "Parts".
- To make Sunflower you will need a total of 2 Parts (1 Peach + 1 Canary = 2 Parts).

Remember to KEEP YOUR "PART" THE SAME Measurement!

Example #2: We are going to make Magenta for a High pH product such as a batch of cold process soap with less than 30% very yellow Pomace Olive Oil.

The Formula calls for:

- 1 Part Fuchsia
- 1 Part Melon Red
- 1/4 Part Royal Purple
- Again, we are going to use teaspoons as our "Parts".
- To make Magenta you will need a total of 2 1/4 Parts (1 Fuchsia + 1 Melon Red + 1/4 Part Royal Purple = 2 1/4 Parts).

Remember to KEEP YOUR "PART" THE SAME Measurement!

HINT: Please note that the deeper shades of Red will require much more dye to overcome the whiteness of CP soap.

Not using enough dye will result in a Pink shade since white and red make pink. I suggest only using the deeper reds for swirling to keep your soap cost effective.

VERY IMPORTANT!

ALWAYS blend colors together in a separate container before adding to your soap or product. DO NOT pour your parts separately into the soap or product! You will get unexpected (and not so nice) results!

Using Labcolors Undiluted:

You can use LabColor Solutions straight from the bottle.

Use the Formulary guide, but make your "parts" drops. This method is not as accurate as measuring the liquid form. However, with some products and soap recipes you may not

get the true color you would get if the dyes have been diluted with water (See instructions for diluting above.)

Using Labcolors Diluted:

This is the preferred method for using LabColors Solutions. There are two types of products which determine which part of the Formulary Guide you would use. These are High pH and Low pH.

Specific instructions related to these two types are given below.

High pH Use:

Using LabColors in high pH products:

*NOTE: The following info is for High pH Products - refer to the Low pH Info below for everything that does not use an Alkali.

We have developed a system where 12 Prime colors are used as the building blocks for all the remaining color combinations.

The **HIGH pH Formulary Guide** will give you two options:

• Half Tone
• Full Tone Maximum Amount

These are further separated into the following groups:

• The Prime 12 - the first 12 colors.
• Basic High pH Colors - true colors.
• Mists - muted soft decorator or countryside type tones.

Results in Products:

- **CP**--as listed
- **KOH Liquid Opaque**--as listed.
- **KOH Liquid Transparent**--will remain transparent, may cloud slightly due to fragrance oil.
- **KOH Transparent**--will remain transparent, may cloud slightly due to fragrance oil.

If you are using a recipe for Transparent Liquid Soap that requires neutralizing at the end of the process to **lower the pH BELOW 7, you will need to use the **Low pH Color Guide**.

Common Dyes will behave even more unpredictably when added to a product with a High pH. Some will turn redder while some will fade into nothing at all or look like mud.

The colors for High pH products in this guide are completely stable.

LabColors have all been tested in cold process soap and cured for 6 weeks. Additionally, they have all been exposed to direct sunlight for an additional 6 months to verify the light stability of the color. Orange tones will go slightly darker after 6 months.

Your soap may look weird when you first mix in the dyes but after the initial 24 hour insulation period the true color will develop. You will not see much of a change, if any, over the curing period. Some colors require a lot of dye per pound of soap - I suggest these colors be used for a marble or swirl effect.

LabColors may be added at any point of your soapmaking process - just be certain to remove the equivalent amount of water you use to make your lye solution. Either add the equal amount of liquid dye right into the water portion of your lye solution - or you may add your dyes at light trace. If you are using Solutions Concentrates undiluted you can simply add in drops without adjusting your water content.

They may also be used with the **Hot Process** technique. You will achieve better results if the dye is added prior to the cook. If it is added at the end of the cook it will result in an unusual type of marble effect throughout.

The measurements are the amounts that we tested per Lb of finished product to obtain the color samples in the guide. This is a "Suggested" starting point as the actual color you want may be more or less than what is stated.

We have also included the "Maximum Amount " of color per US and Canadian guidelines. You should never go over the Maximum Amount in any product!

Again, the amount shown in the half and full tone areas on the Formulary Guide is a "Suggested" starting point you can use per pound of finished product.

This is the most frequently asked question and we want to make that clear!

Half Tone Measurements are a lighter color which many people prefer. This amount is also per pound of finished product and is a "Suggested" starting point - you may use more or less.

We cannot tell you "exactly" how much you should use in your specific recipe or batch, but we do give you a suggested starting point. (Most people are happy with the 1/2 tone measurements). Color is very subjective. What may be a great color to you may not be to someone else.

HINT:

- When your soap is at light trace add your color. Usually the color of the soap at this point will be the color of your finished soap. (It can be slightly lighter after cure) You can then add small amounts of your color until you reach the shade you desire then add any Fragrance Or Essential Oils.

- Sometimes a Fragrance or Essential oil can CHANGE the color of the soap in the Pot!
- DON'T BE TOO ALARMED! Purples for example, can turn an ugly GREEN color if the Fragrance oil is very yellow. Once the soap has gelled IT WILL BE PURPLE!
- However if the Fragrance oil or Essential Oil naturally discolors the soap or there is a high concentration of Olive Oil nothing can be done to counteract this. For Olive Oil Colors use the Olive Dyes.

Low pH Use:

***Note this is NOT for CP soap - refer to High pH above.**

We have developed a system where 12 Prime colors are used as the building blocks for all the remaining color combinations.

The **LOW pH Formulary Guide** will give you three options.

- Half Tone Transparent
- Full Tone Transparent
- Opaque

These are further separated into the following groups:

- The Prime 12 Colors - these are true colors.
- Basic Colors - more true colors.
- Tropical Colors - bright and vivid.
- Countryside Colors - soft muted decorator tones.

Results in Products:

- **Melt and Pour Transparent**--Will remain transparent or see through.
- **Gels or clear fragrance free products**--Will remain transparent or see though.
- **Fragranced Gels, Clear Fragranced Products**--May cloud slightly from the fragrance, no loss of depth.
- **Melt and Pour Opaque**--Will lighten considerably due to the Titanium Dioxide.
- **Lotion, Creams and White Based Products**--Will lighten considerably.

HINT: To preview the color in Transparent Melt and Pour Soap, simply add a few drops to a shotglass of water. For Opaque MP, lotions and creams try adding a few drops into any white mild dish soap or a white hand lotion.

NOTE: Royal Purple will be a slight gray color in any SALT type product such as bath salts or salt scrubs. It is fine in bathbombs or fizzies.

These dyes are easy to use!! You will not need a lot of dye to color low pH products!!

Begin with the Half Tone Amounts and blend in well. The Half tone measurements are usually more than enough. Have fun!