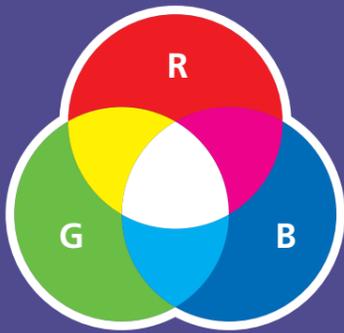


COLOR

Color is one of the most important properties that we can control. Color can create atmosphere, set the mood, tell us about time of day, and even dramatically change the way something appears on stage.

Additive Color Mixing



Mixing two primary colors creates a secondary color (CMY), e.g. Red & Green = Yellow.

Each new color is less saturated than the original colors, you are working towards white light.

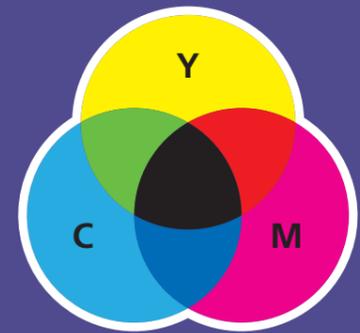
Mixing all three primary colors together creates white light.

There are two ways we can mix and create color.

Additive color mixing occurs when you add more than one light in a different color to the same area. It is based on the primary colors of light: Red, Green & Blue (RGB) and is the basis of LED lighting systems.

Subtractive color mixing occurs when you place more than one color filter in front of a single light source. It is based on the secondary colors of light: Cyan, Magenta & Yellow (CMY) and is found in most moving lights.

Subtractive Color Mixing



Mixing two secondary colors together creates a primary color (RGB), e.g. Magenta & Yellow = Red.

Each new color will be more saturated than the original colors, you are working towards black.

Mixing all three secondary colors together creates black – no light.

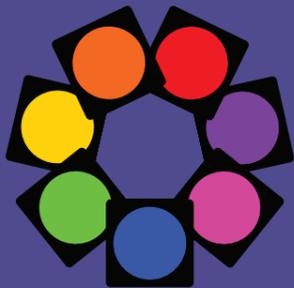


Complimentary Colors

Colors which are opposite each other on the color wheel. When mixed together additively, they will form white light.

For example, if we mix Red and Cyan, we get white light. We know that Cyan is made up of Green and Blue, so by mixing Red and Cyan, you are actually mixing Red, Green and Blue – so the result is white light.

Choosing Colors



Traditionally, filter manufacturers would issue color swatches to lighting designers with a range of color filters that you could choose to create the right look for your show.



LED lighting and modern control consoles mean that you can select and create almost any color you want directly from the lighting desk.



The deep blue in the background adds depth to the stage while the amber backlight & warm white front light on the lead performer makes her 'pop' by comparison.



Color has been used here to convey information – the strong use of green tells us that we are in the Emerald City of Oz.



The cool white backlights give a sense of the desperation of war and supports the stark reality of their situation.

“ Lighting is everything. It creates mood and has an emotional effect on you. ”
Zak Bagans