

White Balance

What is it?

Sometimes called neutral, gray or color balance. Adjustment to get the color you want or in photography and image processing, **color balance** is the global adjustment of the intensities of the colors (typically red, green, and blue primary colors).

An important goal of this adjustment is to render specific colors – particularly neutral colors (colors not found on the color wheel such as beige, brown gray, black and white) – correctly; hence, the general method is sometimes called **gray balance**, **neutral balance**, or **white balance**. Color balance changes the overall mixture of colors in an image and is used for color correction; generalized versions of color balance are used to get colors other than neutrals to also appear correct or pleasing.

Why?

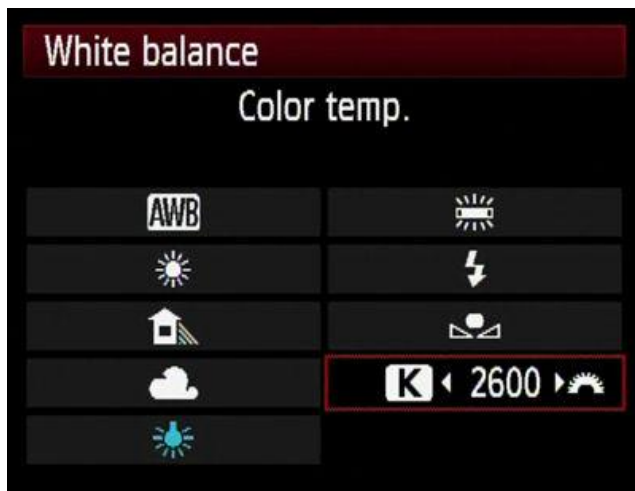
Mixed light
Prefer another color

Where?

Anywhere

How?

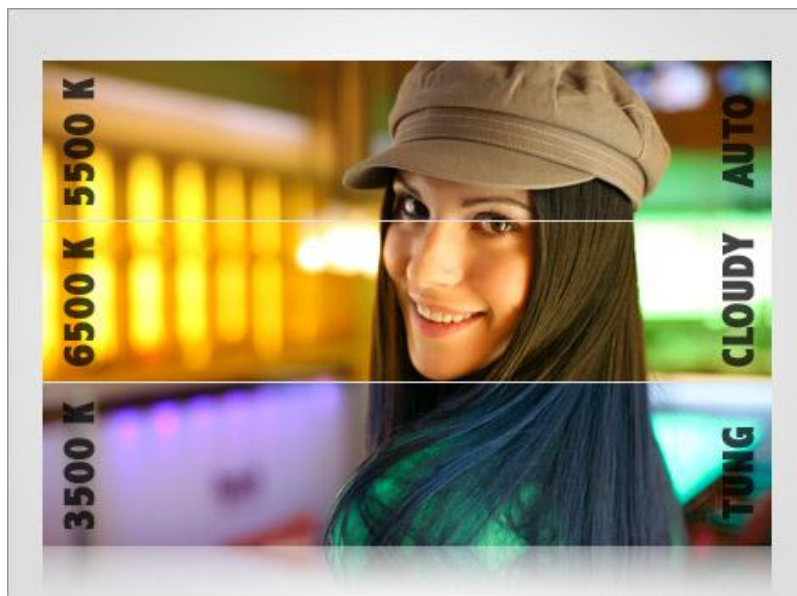
Choose a setting
Set the temperature
Custom (white or gray card)



Neutral – make white white and black black?

Some typical color temperatures:


WB Settings	Color Temperature	Light Sources
	10000 - 15000 K	Clear Blue Sky
	6500 - 8000 K	Cloudy Sky / Shade
	6000 - 7000 K	Noon Sunlight
	5500 - 6500 K	Average Daylight
	5000 - 5500 K	Electronic Flash
	4000 - 5000 K	Fluorescent Light
	3000 - 4000 K	Early AM / Late PM
	2500 - 3000 K	Domestic Lightning
	1000 - 2000 K	Candle Flame




What's better? - You Decide!

The camera is an instrument that teaches people how to see without a camera.
-Dorothea Lange

IYP Session 3 – White Balance Station

Station 1 - Lit by a daylight colored light. (5500K)  Daylight

Station 2 - Lit by a tungsten colored light. (2700K)  Tungsten

Go to Station 1 or 2 and take three (3) pictures

Photo 1




Set White Balance (WB) to Auto.  Auto White Balance


















Photo 2

Set WB to the appropriate setting for the light.  Daylight or  Tungsten

Photo 3

Set custom WB or set color temperature.  Custom or  Kelvin

Which photo do you prefer? Why?

White balance	WB Settings	Color Temperature	Light Sources
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