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Differences between RGB and CMYK

The word RGB stands for the colors red, green, and blue, the colors are known as the primary colors for light such as a computer screen, tv, strobe light or anything similar to that. With just RGB different colors can be made where colors are added together to make up what we see on the screen. What makes these colors in a screen are these small tiny squares called pixels. Pixels are on a television set, computer monitor, and many other technologies and can be seen in different shapes and sizes. If they are viewed under a strong enough magnifying glass, one pixel contains all of the three colors. The light can also blend the colors on the eyes to create the desired colors, to put it more simply the light can be projected in a higher or lower light for each color to produce a mix of new color and shade. Even our eyes itself has these color receptors that contain RGB colors which is why we use these colors more often for technology. While this idea is true there's a certain amount of color that a screen can show that the eye can see more of.

The word CMYK, on the other hand, stands for the colors cyan, magenta, yellow, and black although strange to have black as K. CMYK is a bit complicated and somewhat confusing, but the idea with CMYK is that colors from the spectrum are subtracted from natural white light into pigments or dyes. In other words solid colors are created that is closely similar to the light colors but without the light. These pigments can be printed onto paper in tiny little cyan, magenta, yellow, and black dots. If you were to take a magnifying glass to a magazine cover or any printed book, for example, you would see that the main image is really just a bunch of dots spread out, some closer than others, to appear like the colors we want. While the style sound similar to RGB CMYK can do much more. One great example is a painter mixing two of the main colors to create a new color and can do this with many other colors to paint a image. The idea while may be similar to RGB CMYK is produced very differently from it.

Neither system of color is perfect nor can they actually reproduce all the available colors in nature, but they are both good enough to look realistic to the eye. You don't really need to know all the technical stuff, but you should at least be aware that CMYK and RGB are used for different types of media. For example if you create a brochure using RGB color, when you send it to the printer your colors won't be quite right when printed. That's why when printing the printer uses large bins of ink that are made in cyan, magenta, yellow, and black, which is why the colors on screen don't look as similar to the colors on paper. If you are working in Photoshop, make sure you set the appropriate color mode, for the media you expect to present your work in. If you are doing a website, RGB are your colors to go with; if however it's going to be printed, then it's CMYK. Always make sure the colors

your trying to product are the right colors for each because color on print and on screen will look completely different when compared side by side. While each side is limited in someway the ideas we use are limitless.