

Color setting & profile

CMYK (Cyan, Magenta, Yellow and Black) are the colors used in the printing process, whereas RGB (Red, Green and Blue) are the colors used by displays /monitors. Your document should be created in CMYK mode so that the colors that you see on the screen most closely match the final printed product. If you create your document in RGB, the colors in your printed product may vary. Many of the bright values produced by your monitor cannot be reproduced in print. Most monitors can display more than 16 million colors while the press and printers can only produce colors in 10s of thousands; therefore a monitor can produce a much larger variation of colors compared to offset presses or digital printers.

About CMYK and RGB

- Scanners, digital cameras, and computer monitors use red, green and blue (**RGB**) light to display color.
- Presses print with cyan, magenta, yellow and black (**CMYK**) ink instead of RGB light, and therefore produce a different range of color.

To print on a four-color press, all RGB files must be converted to **CMYK**.



- Certain **RGB** colors that you can see on your monitor or camera (in particular, bright vibrant colors) cannot be replicated with standard **CMYK** inks. These inaccessible RGB colors are said to be "out of the **CMYK** range" When selecting colors for your print project, we recommend using CMYK color to avoid having major color variations.

