

Primary Colors

Trichromatic theory of color:

17 century, the perception of any color can be represented by just three variables

Additive color system (video system): RGB

“additive” means they reproduce colors by adding colored light sources

Subtractive color system (painting and printing):

magenta, cyan, and yellow (incorrectly) by RBY
modify the light reflected from white paper by absorbing (subtracting) certain colors

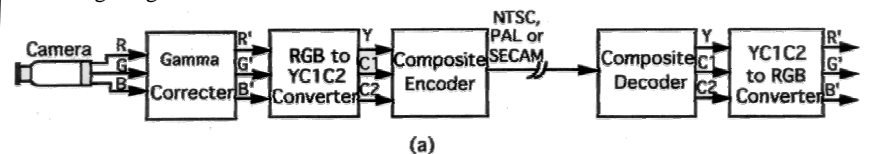
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Component Color Video System

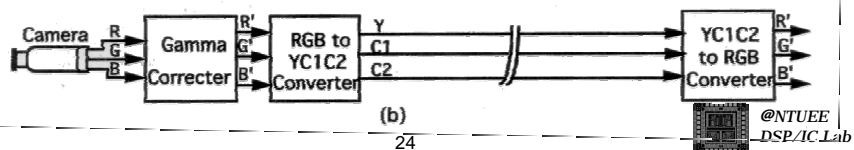
Composite System

In order to transmit or broadcast the analog video over a signal channel, there is a need for composite color system that combine the three color components into a single signal



Component System

In color video system, the devices must deliver three components to control the light sources of display.



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