

Communications Design and Data Visualisation

Session 1.3

Basic Colour Theory

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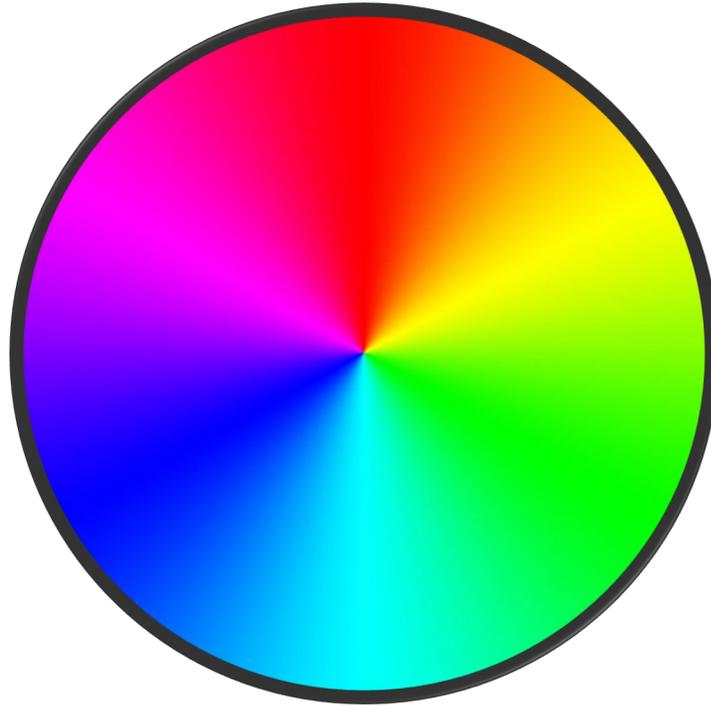
Basic Colour Theory

Colours – Less is More.

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Basic Colour Theory

RGB spectrum



16,777,216 Colours

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Basic Colour Theory

How do we pick, manage and organise virtually infinite colours within a limited application?

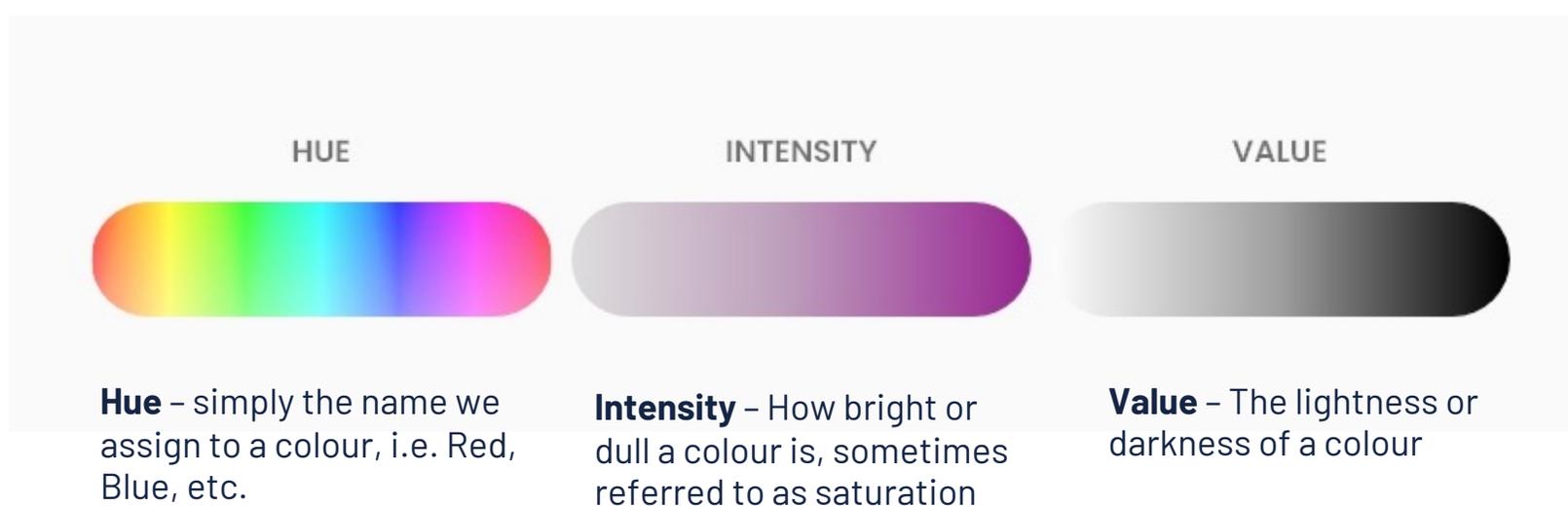
Who decides what colours go where, and how they are presented?

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Basic Colour Theory

Colour is what we see when light, striking an object, is reflected back to the eye Learning colour mixing and relationships will allow you to utilize colour in your work effectively colour can be used to create specific visual effects or to assign a mood to a piece

Colour has three properties: Hue, Intensity, and Value



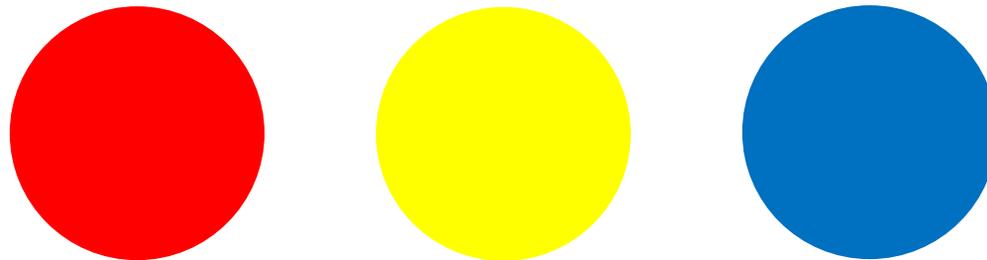
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Basic Colour Theory

The primary colours are Red, Yellow, and Blue.

These colours can be mixed to make any other colour (along with white and black) but can't be mixed themselves (they are natural)

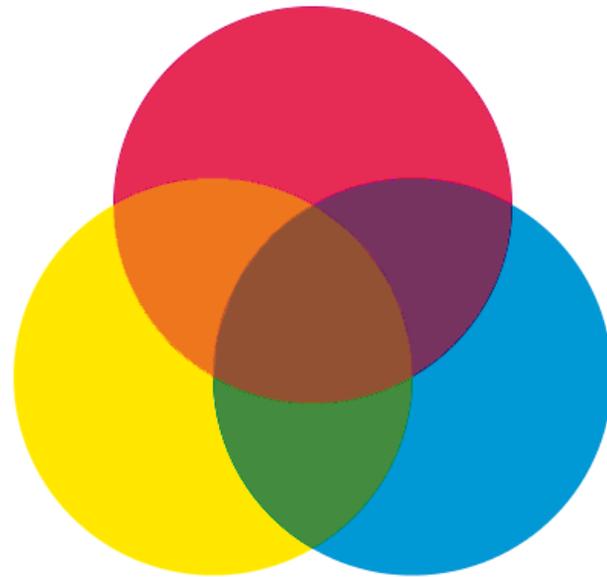
Primary colours are the origin of all of the colours on the colour wheel



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Basic Colour Theory

The secondary colours are Green, Orange and Violet.
These colours are made by mixing one primary colour with another



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Tertiary colours are made by mixing one primary colour with one secondary colour

Red + Orange = **Red-Orange**

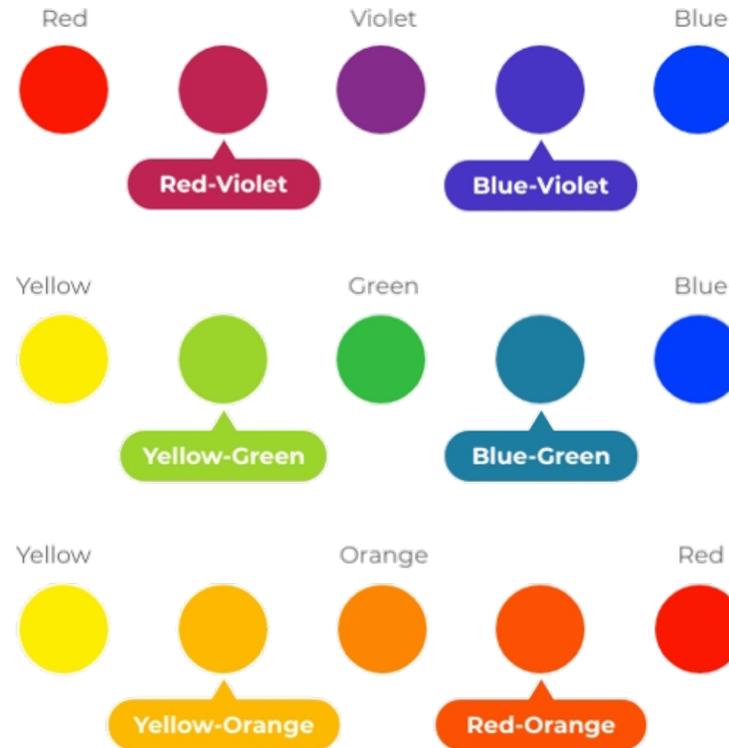
Red + Violet = **Red-Violet**

Yellow + Green = **Yellow-Green**

Yellow + Orange = **Yellow-Orange**

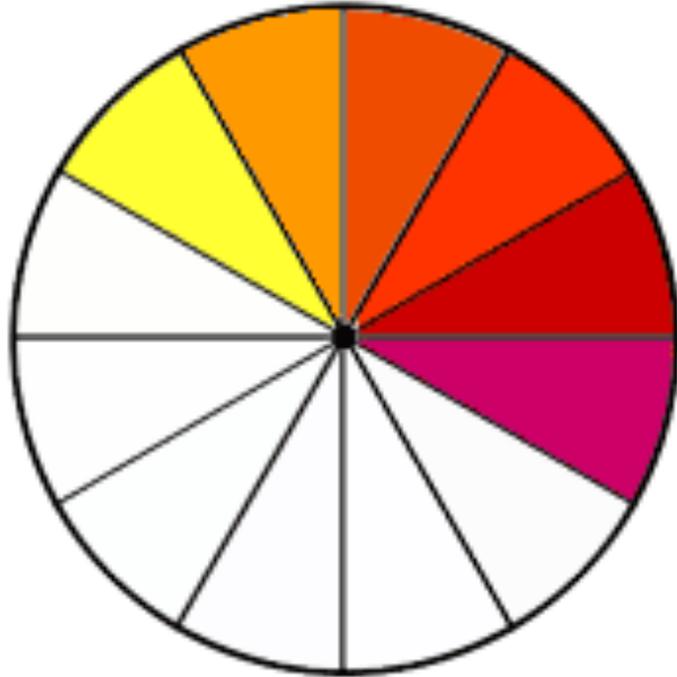
Blue + Green = **Blue-Green**

Blue + Violet = **Blue-Violet**

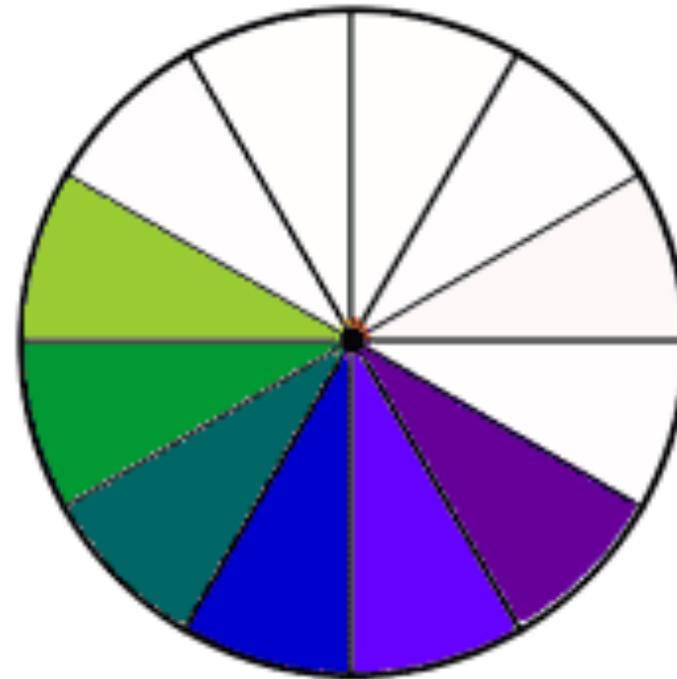


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Warm colours are reds, oranges, and yellows. These colours suggest heat, love, anger, violence, etc.



Cool colours are blues, greens and violets. These colours suggest sadness, night, the ocean, winter, etc.

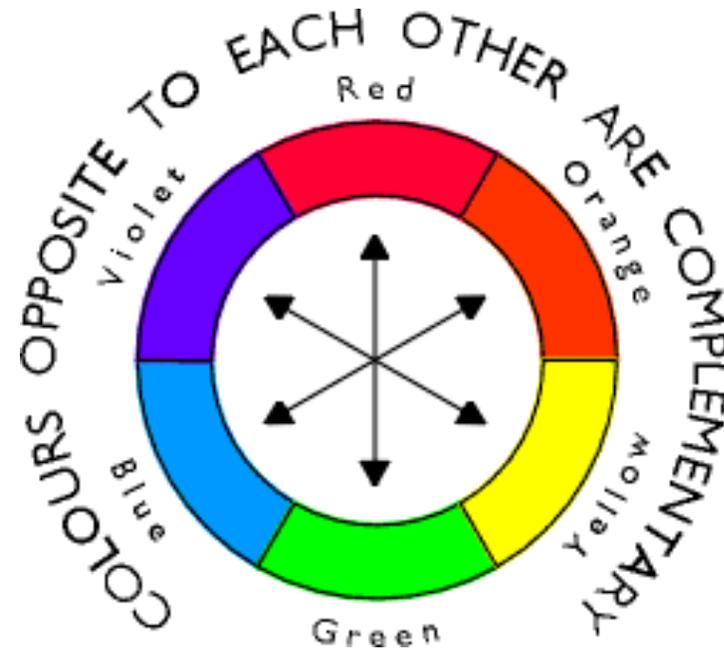
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Complementary colours are high contrast colours directly opposite each other on the colour wheel.

Complementary colours appear stronger and more vivid when placed next to each other in a work of art.

Complementary colours can be mixed to create neutral tones.



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Basic Colour Theory

Colour Schemes

A group of colours that work together visually
Designers choose colour schemes for their work to:

- Increase the clarity of the work
- achieve a specific desired visual effect
- Create visual unity within their piece

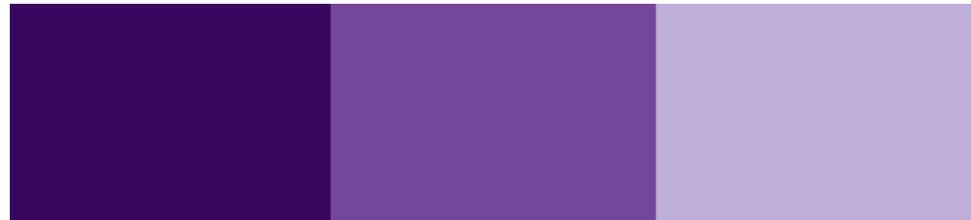


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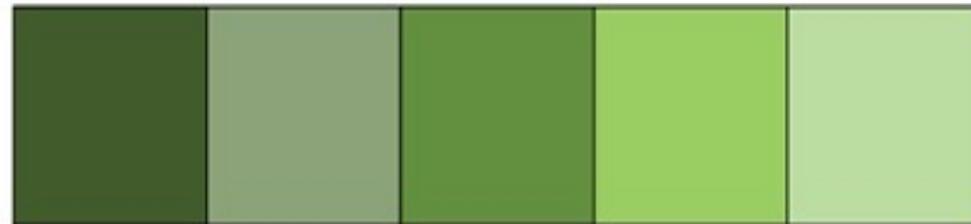
Basic Colour Theory

Monochromatic colour Scheme

- **Monochromatic** – a colour scheme with multiple values of a single colour
- Monochromatic colour schemes are often used in place of black and white work or to establish a mood.



Tint = colour + white (to make the colour lighter)



Shade = colour + black (to make the colour darker)

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Analogous colour Scheme

Analogous colours are next to each other on the colour wheel. They are naturally harmonious but lack contrast.



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Triadic colour Scheme

A **triadic** colour scheme uses colours at the points of an equilateral triangle (three colours spaced equally on the colour wheel).

Sometimes referred to as a balanced colour scheme

i.e. yellow-green, red-orange, and blue-violet

