

Color Theory and Accessibility

Choosing the Right Color Palette for Inclusive Visualization

S

Sequential

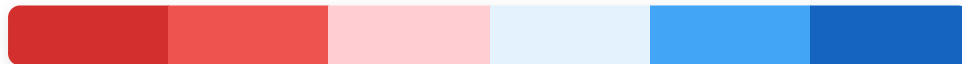
Single hue, varying lightness (temperatures)



D

Diverging

Two hues meeting at neutral (gains/losses)



C

Categorical

Distinct hues for different categories



~8%

of males have color vision deficiency



Accessibility Guidelines

- Avoid red-green combinations
- Use **ColorBrewer** or **Viridis** palettes
- Add **texture/patterns** as redundant encoding
- Test with **color blindness simulators**

✓ Color Contrast Examples

Good Contrast
WCAG AAA

Poor Contrast
Avoid

Blue-Orange
Safe

Red-Green
Unsafe