

# Converting Colors - WCAG Matrix

## Web Content Accessibility Guidelines (WCAG) 2.0 - Color Matrix.

	Hex(FFB66B)	Hex(FF9A51)	Hex(FF7E37)	Hex(F5631B)	Hex(D54700)	Hex(B52A00)	Hex(950000)	Hex(750000)	Hex(570000)	Hex(3C0002)
Hex(FFB66B)		Ratio: 1.22 Failed <sup>5</sup>	Ratio: 1.47 Failed <sup>5</sup>	Ratio: 1.82 Failed <sup>5</sup>	Ratio: 2.57 Failed <sup>5</sup>	Ratio: 3.69 AA 18pt <sup>2</sup>	Ratio: 5.34 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 6.92 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 8.65 Passed <sup>6</sup>	Ratio: 10.19 Passed <sup>6</sup>
Hex(FF9A51)	Ratio: 1.22 Failed <sup>5</sup>		Ratio: 1.21 Failed <sup>5</sup>	Ratio: 1.50 Failed <sup>5</sup>	Ratio: 2.11 Failed <sup>5</sup>	Ratio: 3.03 AA 18pt <sup>2</sup>	Ratio: 4.39 AA 18pt <sup>2</sup>	Ratio: 5.69 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 7.11 Passed <sup>6</sup>	Ratio: 8.38 Passed <sup>6</sup>
Hex(FF7E37)	Ratio: 1.47 Failed <sup>5</sup>	Ratio: 1.21 Failed <sup>5</sup>		Ratio: 1.24 Failed <sup>5</sup>	Ratio: 1.75 Failed <sup>5</sup>	Ratio: 2.52 Failed <sup>5</sup>	Ratio: 3.64 AA 18pt <sup>2</sup>	Ratio: 4.72 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 5.90 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 6.95 AA <sup>1</sup> AAA 18pt <sup>4</sup>
Hex(F5631B)	Ratio: 1.82 Failed <sup>5</sup>	Ratio: 1.50 Failed <sup>5</sup>	Ratio: 1.24 Failed <sup>5</sup>		Ratio: 1.41 Failed <sup>5</sup>	Ratio: 2.03 Failed <sup>5</sup>	Ratio: 2.93 Failed <sup>5</sup>	Ratio: 3.80 AA 18pt <sup>2</sup>	Ratio: 4.76 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 5.60 AA <sup>1</sup> AAA 18pt <sup>4</sup>
Hex(D54700)	Ratio: 2.57 Failed <sup>5</sup>	Ratio: 2.11 Failed <sup>5</sup>	Ratio: 1.75 Failed <sup>5</sup>	Ratio: 1.41 Failed <sup>5</sup>		Ratio: 1.44 Failed <sup>5</sup>	Ratio: 2.08 Failed <sup>5</sup>	Ratio: 2.69 Failed <sup>5</sup>	Ratio: 3.37 AA 18pt <sup>2</sup>	Ratio: 3.97 AA 18pt <sup>2</sup>
Hex(B52A00)	Ratio: 3.69 AA 18pt <sup>2</sup>	Ratio: 3.03 AA 18pt <sup>2</sup>	Ratio: 2.52 Failed <sup>5</sup>	Ratio: 2.03 Failed <sup>5</sup>	Ratio: 1.44 Failed <sup>5</sup>		Ratio: 1.45 Failed <sup>5</sup>	Ratio: 1.88 Failed <sup>5</sup>	Ratio: 2.35 Failed <sup>5</sup>	Ratio: 2.76 Failed <sup>5</sup>
Hex(950000)	Ratio: 5.34 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 4.39 AA 18pt <sup>2</sup>	Ratio: 3.64 AA 18pt <sup>2</sup>	Ratio: 2.93 Failed <sup>5</sup>	Ratio: 2.08 Failed <sup>5</sup>	Ratio: 1.45 Failed <sup>5</sup>		Ratio: 1.30 Failed <sup>5</sup>	Ratio: 1.62 Failed <sup>5</sup>	Ratio: 1.91 Failed <sup>5</sup>
Hex(750000)	Ratio: 6.92 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 5.69 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 4.72 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 3.80 AA 18pt <sup>2</sup>	Ratio: 2.69 Failed <sup>5</sup>	Ratio: 1.88 Failed <sup>5</sup>	Ratio: 1.30 Failed <sup>5</sup>		Ratio: 1.25 Failed <sup>5</sup>	Ratio: 1.47 Failed <sup>5</sup>
Hex(570000)	Ratio: 8.65 Passed <sup>6</sup>	Ratio: 7.11 Passed <sup>6</sup>	Ratio: 5.90 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 4.76 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 3.37 AA 18pt <sup>2</sup>	Ratio: 2.35 Failed <sup>5</sup>	Ratio: 1.62 Failed <sup>5</sup>	Ratio: 1.25 Failed <sup>5</sup>		Ratio: 1.18 Failed <sup>5</sup>
Hex(3C0002)	Ratio: 10.19 Passed <sup>6</sup>	Ratio: 8.38 Passed <sup>6</sup>	Ratio: 6.95 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 5.60 AA <sup>1</sup> AAA 18pt <sup>4</sup>	Ratio: 3.97 AA 18pt <sup>2</sup>	Ratio: 2.76 Failed <sup>5</sup>	Ratio: 1.91 Failed <sup>5</sup>	Ratio: 1.47 Failed <sup>5</sup>	Ratio: 1.18 Failed <sup>5</sup>	

Details can be found at <https://www.w3.org/TR/WCAG20/>.

<sup>1</sup> AA

AA level of the Web Content Accessibility Guidelines (WCAG) 2.0 for any text size.

<sup>2</sup> AA 18pt

AA level for large text above 18pt.

<sup>3</sup> AAA

AAA level of the Web Content Accessibility Guidelines (WCAG) 2.0 for any text size.

<sup>4</sup> AAA 18pt

AAA level for large text above 18pt.

<sup>5</sup> Failed

Fails to comply with the Web Content Accessibility Guidelines (WCAG) 2.0.

<sup>6</sup> Passed

Passes the AAA level of the Web Content Accessibility Guidelines (WCAG) 2.0 for all text sizes.