

Color extensions with the `xcolor` package — various examples

Dr. Uwe Kern

v2.12 (2016/05/11) *

The purpose of this file is to demonstrate a variety of capabilities including the logging facilities of the `xcolor` package. By playing around with different values of `\tracingcolors`, one can observe the different behavior in the log file.

1 Predefined colors

color	rgb	cmyk	hsb	HTML	gray
red	[red]	[red]	[red]	FF0000	0.3
green	[green]	[green]	[green]	00FF00	0.59
blue	[blue]	[blue]	[blue]	0000FF	0.11
cyan	[cyan]	[cyan]	[cyan]	00FFFF	0.7
magenta	[magenta]	[magenta]	[magenta]	FF00FF	0.41
yellow	[yellow]	[yellow]	[yellow]	FFFF00	0.89
orange	[orange]	[orange]	[orange]	FF8000	0.595
violet	[violet]	[violet]	[violet]	800080	0.205
purple	[purple]	[purple]	[purple]	BF0040	0.2525
brown	[brown]	[brown]	[brown]	BF8040	0.5475
pink	[pink]	[pink]	[pink]	FFBFBF	0.825
olive	[olive]	[olive]	[olive]	808000	0.39
black	[black]	[black]	[black]	000000	0
darkgray	[darkgray]	[darkgray]	[darkgray]	404040	0.25
gray	[gray]	[gray]	[gray]	808080	0.5
lightgray	[lightgray]	[lightgray]	[lightgray]	BFBFBF	0.75
white	[white]	[white]	[white]	FFFFFF	1
-red	[cyan]	[blue]	[cyan]	00FFFF	0.7
-green	[magenta]	[red]	[magenta]	FF00FF	0.41
-blue	[yellow]	[yellow]	[yellow]	FFFF00	0.89
-cyan	[red]	[red]	[red]	FF0000	0.3
-magenta	[green]	[green]	[green]	00FF00	0.59
-yellow	[blue]	[blue]	[blue]	0000FF	0.11
-orange	[orange]	[orange]	[orange]	0080FF	0.405
-violet	[lightgreen]	[lightgreen]	[lightgreen]	80FF80	0.795
-purple	[cyan]	[cyan]	[cyan]	40FFBF	0.7475
-brown	[blue]	[blue]	[blue]	4080BF	0.4525
-pink	[darkgreen]	[darkgreen]	[darkgreen]	004040	0.175
-olive	[purple]	[purple]	[purple]	8080FF	0.555
-black	[white]	[white]	[white]	FFFFFF	1
-darkgray	[lightgray]	[lightgray]	[lightgray]	BFBFBF	0.75
-gray	[gray]	[gray]	[gray]	808080	0.5
-lightgray	[darkgray]	[darkgray]	[darkgray]	404040	0.25
-white	[black]	[black]	[black]	000000	0
JungleGreen	[green]	[teal]	[green]	03FF7A	0.6458
DarkOrchid	[purple]	[maroon]	[purple]	9933CC	0.386
-JungleGreen	[magenta]	[red]	[magenta]	FC0085	0.3542
-DarkOrchid	[green]	[olive]	[green]	66CC33	0.614

*This file (`xcolor3.tex`) is part of the `xcolor` distribution which can be downloaded from the CTAN mirrors `CTAN/macros/latex/contrib/xcolor/` or the homepage www.ukern.de/tex/xcolor.html. Please send error reports and suggestions for improvements to `xcolor@ukern.de`.

Switch off \pagecolor by \nopagecolor. The driver may or may not obey this command ...

2 Color definition and application

Test with \definecolor

Comma-separated and space-separated definitions:

identical = identical = identical = identical = identical = identical = identical identical

color	rgb	cmyk	hsb	HTML
c1	[0.7 0.6 0.5]	[0 0.1 0.2 0.3]	[0.08333 0.2857 0.7]	B29980
c2	[0.7 0.6 0.5]	[0 0.1 0.2 0.3]	[0.08333 0.2857 0.7]	B29980
c1a	[0.7 0.6 0.5]	[0 0.1 0.2 0.3]	[0.08333 0.2857 0.7]	B29980
c2a	[0.7 0.6 0.5]	[0 0.1 0.2 0.3]	[0.08333 0.2857 0.7]	B29980
[rgb].7,.6,.5	[0.7 0.6 0.5]	[0 0.1 0.2 0.3]	[0.08333 0.2857 0.7]	B29980
[rgb].7 .6 .5	[0.7 0.6 0.5]	[0 0.1 0.2 0.3]	[0.08333 0.2857 0.7]	B29980
rgb,10:red,7;green,6;blue,5	[0.7 0.6 0.5]	[0 0.1 0.2 0.3]	[0.08333 0.2857 0.7]	B29980
rgb,15:red,10.5;green,9;blue,7.5	[0.7 0.6 0.5]	[0 0.1 0.2 0.3]	[0.08333 0.2857 0.7]	B29980

Another extended color expression (rgb:red!50,4;green!25,2).

Test with named colors:

Test: JungleGreen; Test: JungleGreen; Test: JungleGreen!50!DarkOrchid; Test: green!50!red.

Test with \color

Current color application:

current, 50%, complement, mix and current, 50%, complement, mix,
TestTestTestTest and TestTestTestTest.

Current color test with \definecolorseries:

Test Test
Test Test
Test Test

3 Color in tables

test	row 1
test	row 2
test	row 3
test	row 4
test	row 5
test	row 6
test	row 7
test	row 8
test	row 9

4 Color information

Type test: 1234