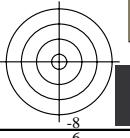
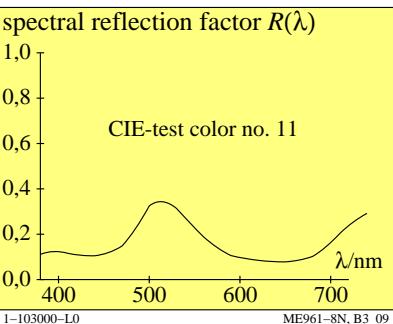
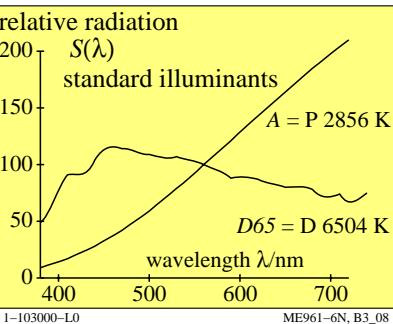
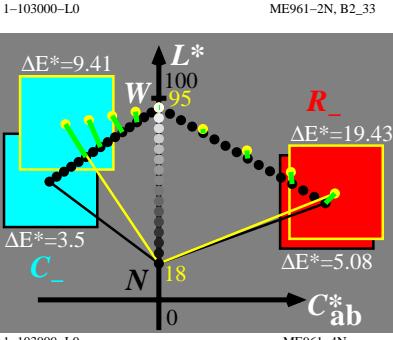
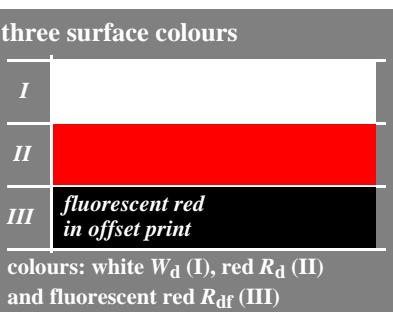
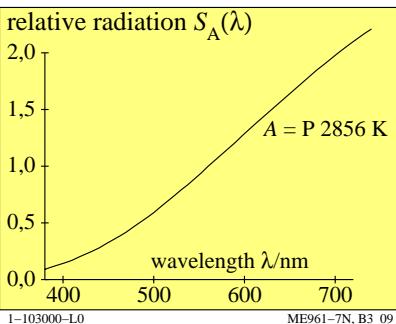
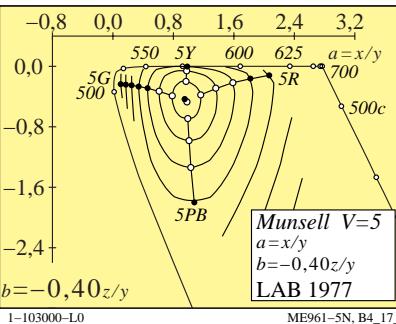
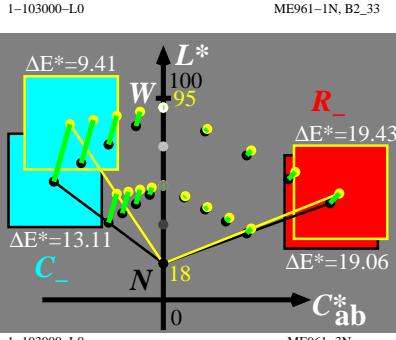
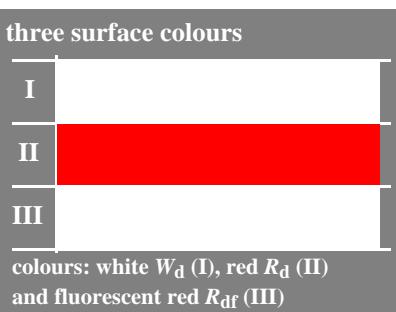


see similar files: <http://farbe.li.tu-berlin.de/ME96/ME96.HTM>

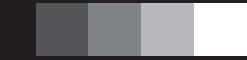
perceived color terms (colorness: cube root coordinates)

perceived color terms	name and relationship with standard chromaticity values	notes:
lightness	$L^* = 116 \left(Y / 100 \right)^{1/3} - 16$ Aproximation: $L^* = 100 \left(Y / 100 \right)^{1/3}$	<i>definition 1976 in: CIELUV, CIELAB</i>
chromaticness for linear chromatic value diagram (AT, B)		
red-green	$a^* = 500 \left[\left(X / X_n \right)^{1/3} - \left(Y / Y_n \right)^{1/3} \right]$ $= 500 \left(a' - a'_n \right) Y^{1/3}$	<i>definition 1976 in: CIELAB</i>
yellow-blue	$b^* = 200 \left[\left(Y / Y_n \right)^{1/3} - \left(Z / Z_n \right)^{1/3} \right]$ $= 500 \left(b' - b'_n \right) Y^{1/3}$	$n=D65$ (surround)
radial	$C^* = [a^{*2} + b^{*2}]^{1/2}$	
saturation	= chromaticness / lightness	<i>definition</i>
red-green	$S_a^* = a^* / [100 \left(Y / 100 \right)^{1/3}]$ $= 21,6 \left(a' - a'_n \right)$	<i>for:</i> <i>CIELAB 1976</i>
yellow-blue	$S_b^* = b^* / [100 \left(Y / 100 \right)^{1/3}]$ $= 21,6 \left(b' - b'_n \right)$	
radial	$S_c^* = C^* / [100 \left(Y / 100 \right)^{1/3}]$ $= 21,6 [(a' - a'_n)^2 + (b' - b'_n)^2]^{1/2}$	
chromaticity	<i>for nonlinear chromaticity diagram (a', b') definition</i>	
red-green	$a' = (1 / X_n)^{1/3} (x / y)^{1/3}$	<i>opponent</i>
yellow-blue	$= 0,2191 (x / y)^{1/3}$ for D65	<i>color system</i>
radial	$b' = - 0,4 (1 / Z_n)^{1/3} (z / y)^{1/3}$ $= - 0,08376 (z / y)^{1/3}$ for D65 $c' = [(a' - a'_n)^2 + (b' - b'_n)^2]^{1/2}$	





see similar files: <http://farbe.li.tu-berlin.de/ME96/ME96.HTM>
<http://130.149.60.45/~farbmtrik> or <http://farbe.li.tu-berlin.de>



perceived color terms (colorness: cube root coordinates)

perceived color terms	name and relationship with standard chromaticity values	notes:
lightness	$L^* = 116 (Y / 100)^{1/3} - 16$ Aproximation: $L^* = 100 (Y / 100)^{1/3}$	definition 1976 in: <i>CIELUV, CIELAB</i>
chromaticness for linear chromatic value diagram (AT, B)		
red-green	$a^* = 500 [(X / X_n)^{1/3} - (Y / Y_n)^{1/3}]$ $= 500 (a' - a'_n) Y^{1/3}$	definition 1976 in: <i>CIELAB</i>
yellow-blue	$b^* = 200 [(Y / Y_n)^{1/3} - (Z / Z_n)^{1/3}]$ $= 500 (b' - b'_n) Y^{1/3}$	$n=D65$ (surround)
radial	$C^* = [a^*^2 + b^*^2]^{1/2}$	
saturation	= chromaticness / lightness	definition for:
red-green	$S_a^* = a^* / [100 (Y / 100)^{1/3}]$ $= 21,6 (a' - a'_n)$	<i>CIELAB 1976</i>
yellow-blue	$S_b^* = b^* / [100 (Y / 100)^{1/3}]$ $= 21,6 (b' - b'_n)$	
radial	$S_c^* = C^* / [100 (Y / 100)^{1/3}]$ $= 21,6 [(a' - a'_n)^2 + (b' - b'_n)^2]^{1/2}$	
chromaticity	for nonlinear chromaticity diagram (a', b') definition	
red-green	$a' = (1 / X_n)^{1/3} (x / y)^{1/3}$	opponent
yellow-blue	$= 0,2191 (x / y)^{1/3}$ for D65	color system
radial	$b' = -0,4 (1 / Z_n)^{1/3} (z / y)^{1/3}$ $= -0,08376 (z / y)^{1/3}$ for D65	
	$c' = [(a' - a'_n)^2 + (b' - b'_n)^2]^{1/2}$	

1-103100-L0

ME961-72, BT9_10



TUB-test chart ME96; Computer graphics and colorimetry
 Image series ME96, 3D=1, de=0, $L-cmyn6^*$

three surface colours

I

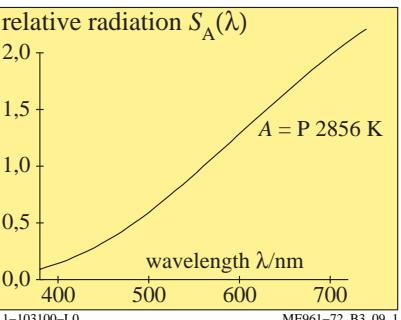
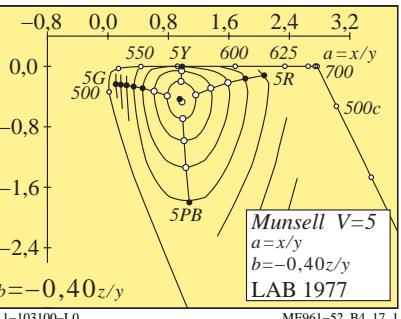
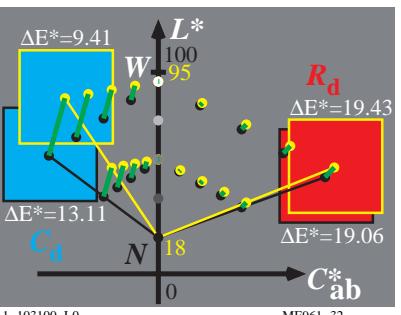
II

III

colours: white W_d (I), red R_d (II)
 and fluorescent red R_{df} (III)

1-103100-L0

ME961-12, B2_33



PE4300L_120830.TXT, 1080 colors, Separation cmyn6*
 input: $rgb/cmky \rightarrow rgbd$
 output: 3D-linearization to rgb^*dd

three surface colours

I

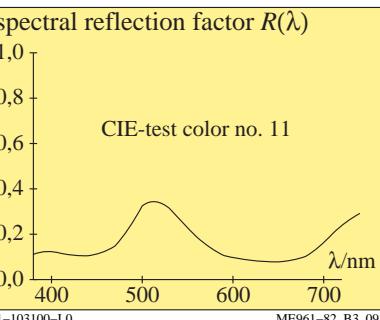
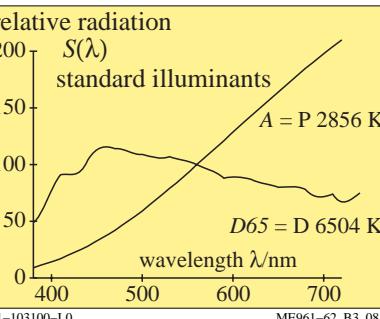
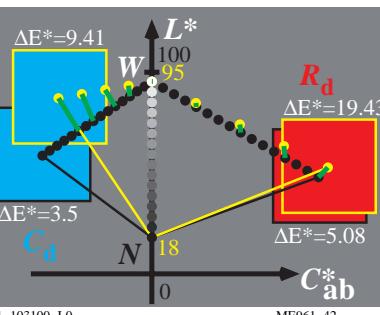
II

fluorescent red
in offset print

colours: white W_d (I), red R_d (II)
 and fluorescent red R_{df} (III)

1-103100-L0

ME961-22, B2_33



1-103100-L0
 ME961-82, B3_09_2





see similar files: <http://farbe.li.tu-berlin.de/ME96/ME96.HTM>
<http://130.149.60.45/~farbmtrik> or <http://farbe.li.tu-berlin.de>



perceived color terms (colorness: cube root coordinates)

perceived color terms	name and relationship with standard chromaticity values	notes:
lightness	$L^* = 116 (Y / 100)^{1/3} - 16$ Aproximation: $L^* = 100 (Y / 100)^{1/3}$	definition 1976 in: <i>CIELUV, CIELAB</i>
chromaticness for linear chromatic value diagram (AT, B)		
red-green	$a^* = 500 [(X / X_n)^{1/3} - (Y / Y_n)^{1/3}]$ $= 500 (a' - a'_n) Y^{1/3}$	definition 1976 in: <i>CIELAB</i>
yellow-blue	$b^* = 200 [(Y / Y_n)^{1/3} - (Z / Z_n)^{1/3}]$ $= 500 (b' - b'_n) Y^{1/3}$	$n=D65$ (surround)
radial	$C^* = [a^*^2 + b^*^2]^{1/2}$	
saturation	= chromaticness / lightness	definition for: <i>CIELAB 1976</i>
red-green	$S_a^* = a^* / [100 (Y / 100)^{1/3}]$ $= 21,6 (a' - a'_n)$	
yellow-blue	$S_b^* = b^* / [100 (Y / 100)^{1/3}]$ $= 21,6 (b' - b'_n)$	
radial	$S_c^* = C^* / [100 (Y / 100)^{1/3}]$ $= 21,6 [(a' - a'_n)^2 + (b' - b'_n)^2]^{1/2}$	
chromaticity for nonlinear chromaticity diagram (a', b') definition		
red-green	$a' = (1 / X_n)^{1/3} (x / y)^{1/3}$	opponent color system
yellow-blue	$= 0,2191 (x / y)^{1/3}$ for D65	
radial	$b' = -0,4 (1 / Z_n)^{1/3} (z / y)^{1/3}$ $= -0,08376 (z / y)^{1/3}$ for D65	
	$c' = [(a' - a'_n)^2 + (b' - b'_n)^2]^{1/2}$	

1-113000-L0

ME961-7N, BT9_10

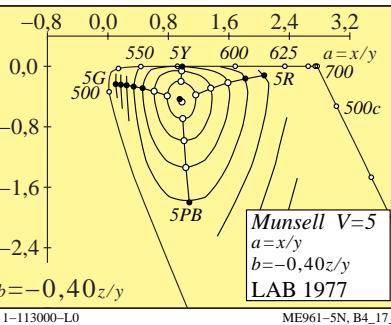
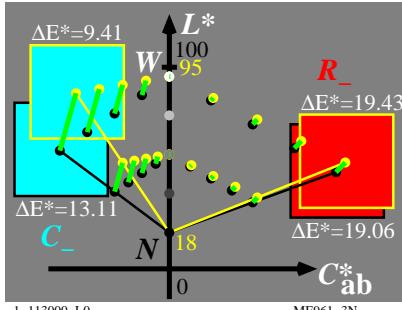


three surface colours

I	
II	
III	

colours: white W_d (I), red R_d (II)
and fluorescent red R_{df} (III)

1-113000-L0 ME961-1N, B2_33



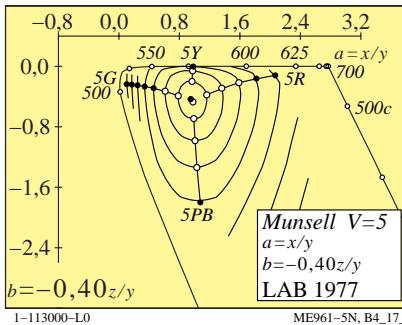
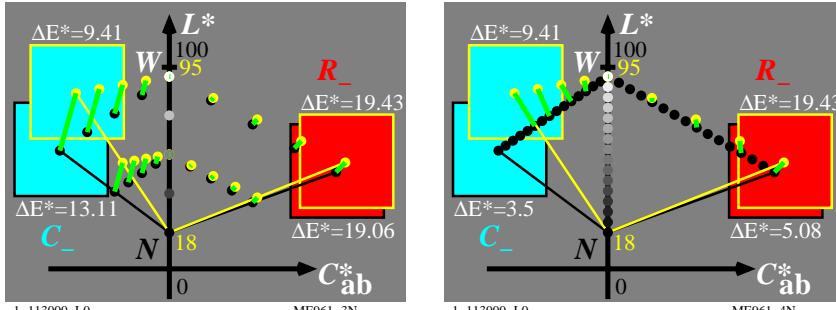
1-113000-L0 ME961-5N, B4_17_1

three surface colours

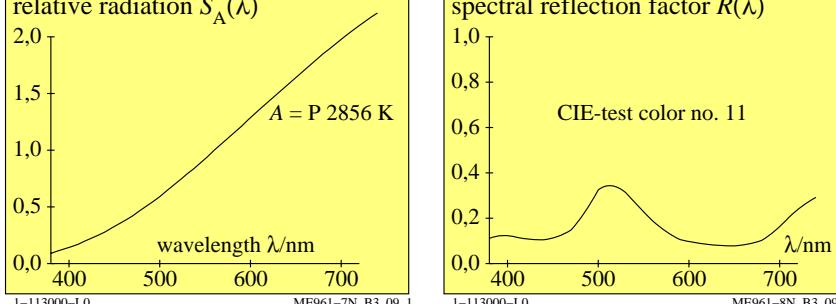
I	
II	
III	fluorescent red in offset print

colours: white W_d (I), red R_d (II)
and fluorescent red R_{df} (III)

1-113000-L0 ME961-2N, B2_33



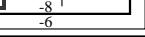
1-113000-L0 ME961-6N, B3_08

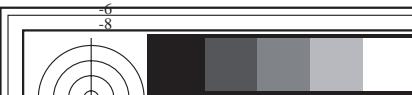


1-113000-L0 ME961-8N, B3_09_2

TUB-test chart ME96; Computer graphics and colorimetry
Image series ME96, 3D=1, de=1

input: $rgb/cmky \rightarrow rgb/cmky$
output: no change





see similar files: <http://farbe.li.tu-berlin.de/ME96/ME96.HTML>
<http://130.149.60.45/~farbmtrik> or <http://farbe.li.tu-berlin.de>

perceived color terms (colorness: cube root coordinates)

perceived color terms	name and relationship with standard chromaticity values	notes:
lightness	$L^* = 116 (Y / 100)^{1/3} - 16$ Aproximation: $L^* = 100 (Y / 100)^{1/3}$	definition 1976 in: <i>CIELUV, CIELAB</i>
chromaticness for linear chromatic value diagram (AT, B)		
red-green	$a^* = 500 [(X / X_n)^{1/3} - (Y / Y_n)^{1/3}]$ $= 500 (a' - a'_n) Y^{1/3}$	definition 1976 in: <i>CIELAB</i>
yellow-blue	$b^* = 200 [(Y / Y_n)^{1/3} - (Z / Z_n)^{1/3}]$ $= 500 (b' - b'_n) Y^{1/3}$	$n=D65$ (surround)
radial	$C^* = [a^*^2 + b^*^2]^{1/2}$	
saturation	= chromaticness / lightness	definition for: <i>CIELAB 1976</i>
red-green	$S_a^* = a^* / [100 (Y / 100)^{1/3}]$ $= 21,6 (a' - a'_n)$	
yellow-blue	$S_b^* = b^* / [100 (Y / 100)^{1/3}]$ $= 21,6 (b' - b'_n)$	
radial	$S_c^* = C^* / [100 (Y / 100)^{1/3}]$ $= 21,6 [(a' - a'_n)^2 + (b' - b'_n)^2]^{1/2}$	
chromaticity for nonlinear chromaticity diagram (a', b') definition		
red-green	$a' = (1 / X_n)^{1/3} (x / y)^{1/3}$	opponent color system
yellow-blue	$= 0,2191 (x / y)^{1/3}$ for D65	
radial	$b' = -0,4 (1 / Z_n)^{1/3} (z / y)^{1/3}$ $= -0,08376 (z / y)^{1/3}$ for D65	
	$c' = [(a' - a'_n)^2 + (b' - b'_n)^2]^{1/2}$	

1-113100-L0

ME961-73, BT9_10

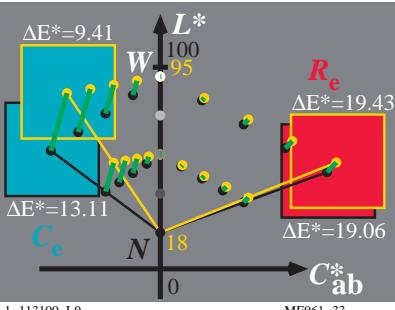
TUB-test chart ME96; Computer graphics and colorimetry
 Image series ME96, 3D=1, de=1, $L-cmyn6^*$

three surface colours

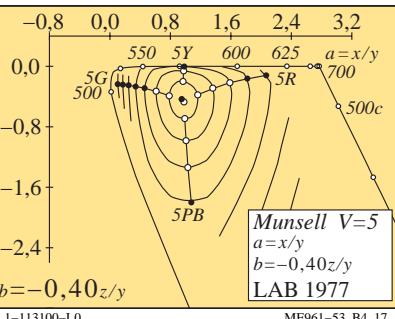
I	
II	
III	

colours: white W_d (I), red R_d (II)
and fluorescent red R_{df} (III)

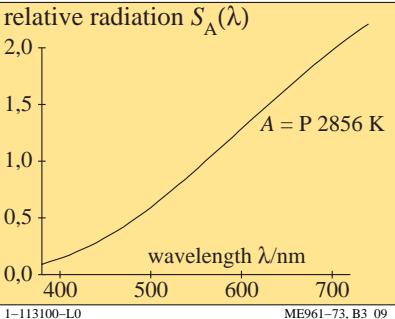
1-113100-L0 ME961-13, B2_33



1-113100-L0 ME961-33



1-113100-L0 ME961-53, B4_17_1



1-113100-L0 ME961-73, B3_09_1

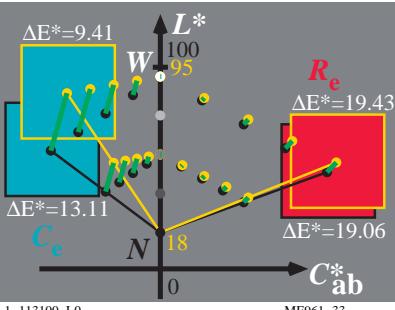
input: $rgb/cmky \rightarrow rgb_{de}$
 output: 3D-linearization to rgb^*_{de}

three surface colours

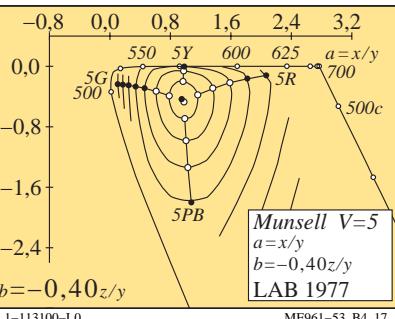
I	
II	
III	fluorescent red in offset print

colours: white W_d (I), red R_d (II)
and fluorescent red R_{df} (III)

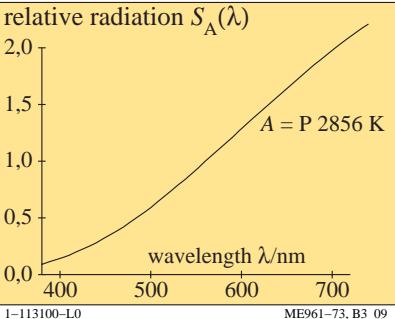
1-113100-L0 ME961-23, B2_33



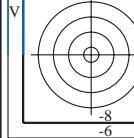
1-113100-L0 ME961-43



1-113100-L0 ME961-63, B3_08



1-113100-L0 ME961-83, B3_09_2



C

M

Y

O

L

V

C

