

Input: Colorimetric Television Luminous System TLS70

for hue $h^* = lab^*h = 22/360 = 0.061$

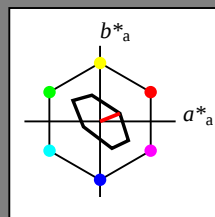
lab^*ich and lab^*nch

D65: hue O

LCH*Ma: 76 28 22

olv*Ma: 1.0 0.0 0.0

triangle lightness t^*



% Gamut
 $u^*_{rel} = 16$
% Regularity
 $g^*_{H,rel} = 34$
 $g^*_{C,rel} = 51$

TLS70; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	76.43	26.27	10.57	28.32	22
Y _{Ma}	93.93	-10.76	34.63	36.27	107
L _{Ma}	89.32	-35.8	27.64	45.24	142
C _{Ma}	90.93	-21.95	-7.07	23.07	198
V _{Ma}	72.1	15.76	-35.63	38.97	294
M _{Ma}	78.5	37.52	-25.23	45.22	326
N _{Ma}	69.7	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272

Output: Colorimetric Television Luminous System TLS00

for hue $h^* = lab^*h = 40/360 = 0.111$

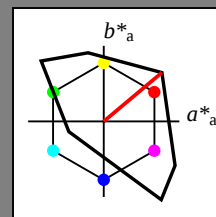
lab^*ich and lab^*nch

D65: hue O

LCH*Ma: 51 100 40

olv*Ma: 1.0 0.0 0.0

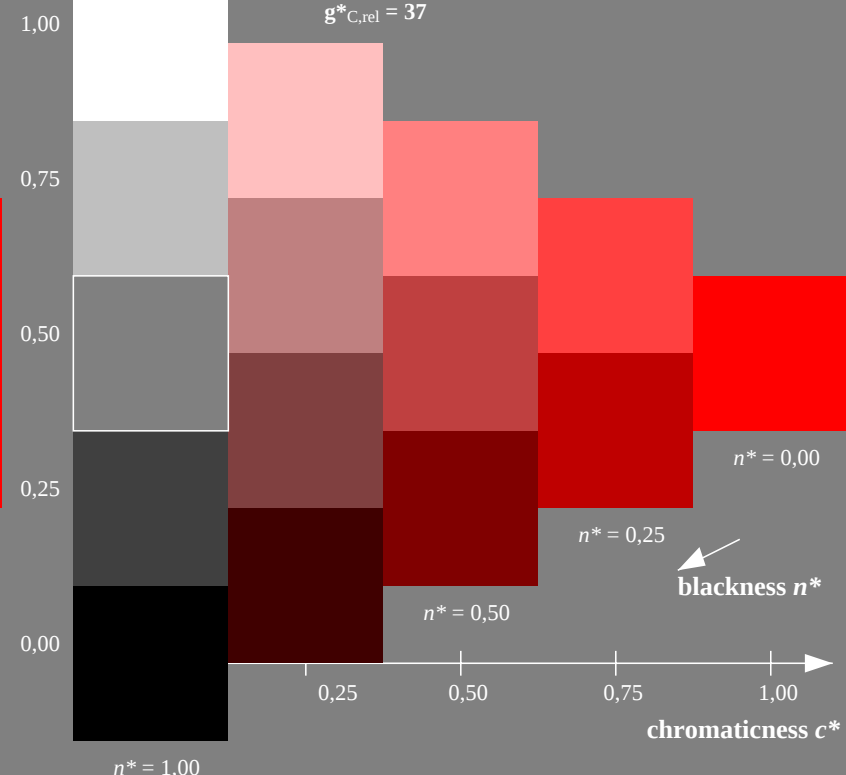
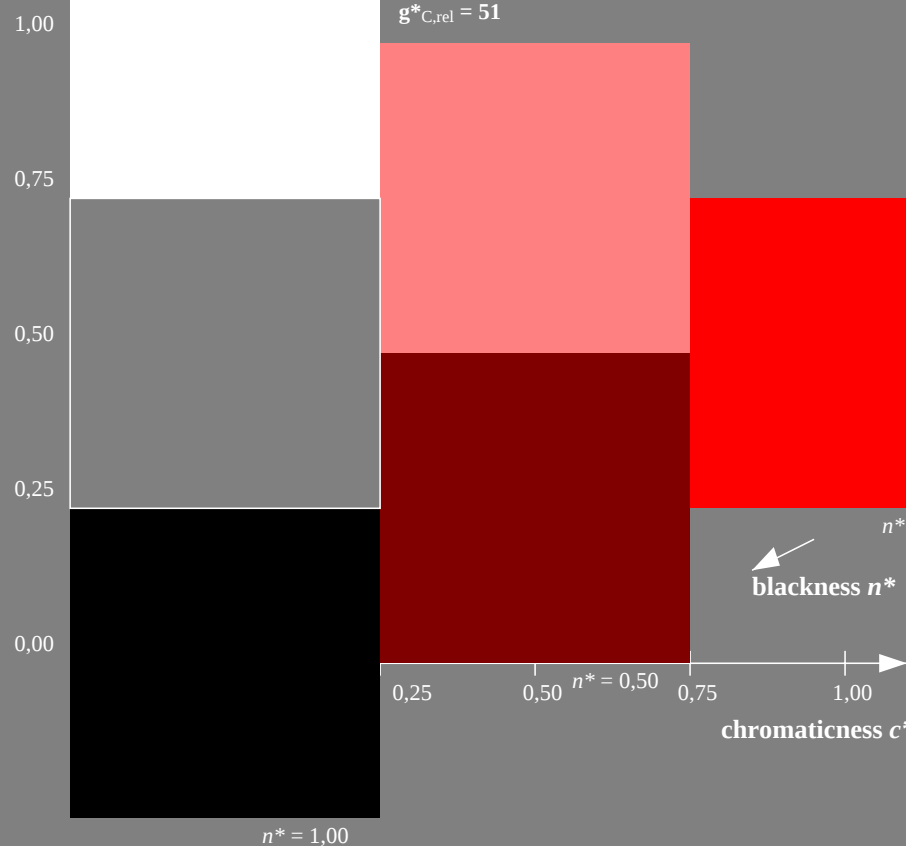
triangle lightness t^*



% Gamut
 $u^*_{rel} = 158$
% Regularity
 $g^*_{H,rel} = 20$
 $g^*_{C,rel} = 37$

TLS00; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	50.5	76.92	64.55	100.42	40
Y _{Ma}	92.66	-20.69	90.75	93.08	103
L _{Ma}	83.63	-82.75	79.9	115.04	136
C _{Ma}	86.88	-46.16	-13.55	48.12	196
V _{Ma}	30.39	76.06	-103.59	128.52	306
M _{Ma}	57.3	94.35	-58.41	110.97	328
N _{Ma}	0.01	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272



NE880-7, 3 step scales for constant CIELAB hue 22/360 = 0.061 (left)

5 step scales for constant CIELAB hue 40/360 = 0.111 (right)

BAM-test chart NE88; Colorimetric systems TLS70 & TLS00

D65: 3 and 5 step colour scales for 10 hues

input: olv* setrgbcolor

output: no change compared to input

Input: Colorimetric Television Luminous System TLS70

for hue $h^* = lab^*h = 107/360 = 0.298$

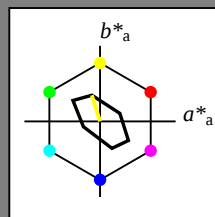
lab^*ich and lab^*nch

D65: hue Y

LCH*Ma: 94 36 107

olv*Ma: 1.0 1.0 0.0

triangle lightness t^*



%Gamut
 $u^*_{rel} = 16$
%Regularity
 $g^*_{H,rel} = 34$
 $g^*_{C,rel} = 51$

TLS70; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	76.43	26.27	10.57	28.32	22
Y _{Ma}	93.93	-10.76	34.63	36.27	107
L _{Ma}	89.32	-35.8	27.64	45.24	142
C _{Ma}	90.93	-21.95	-7.07	23.07	198
V _{Ma}	72.1	15.76	-35.63	38.97	294
M _{Ma}	78.5	37.52	-25.23	45.22	326
N _{Ma}	69.7	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272

Output: Colorimetric Television Luminous System TLS00

for hue $h^* = lab^*h = 103/360 = 0.286$

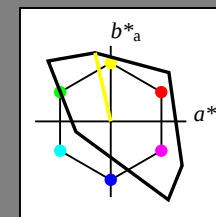
lab^*ich and lab^*nch

D65: hue Y

LCH*Ma: 93 93 103

olv*Ma: 1.0 1.0 0.0

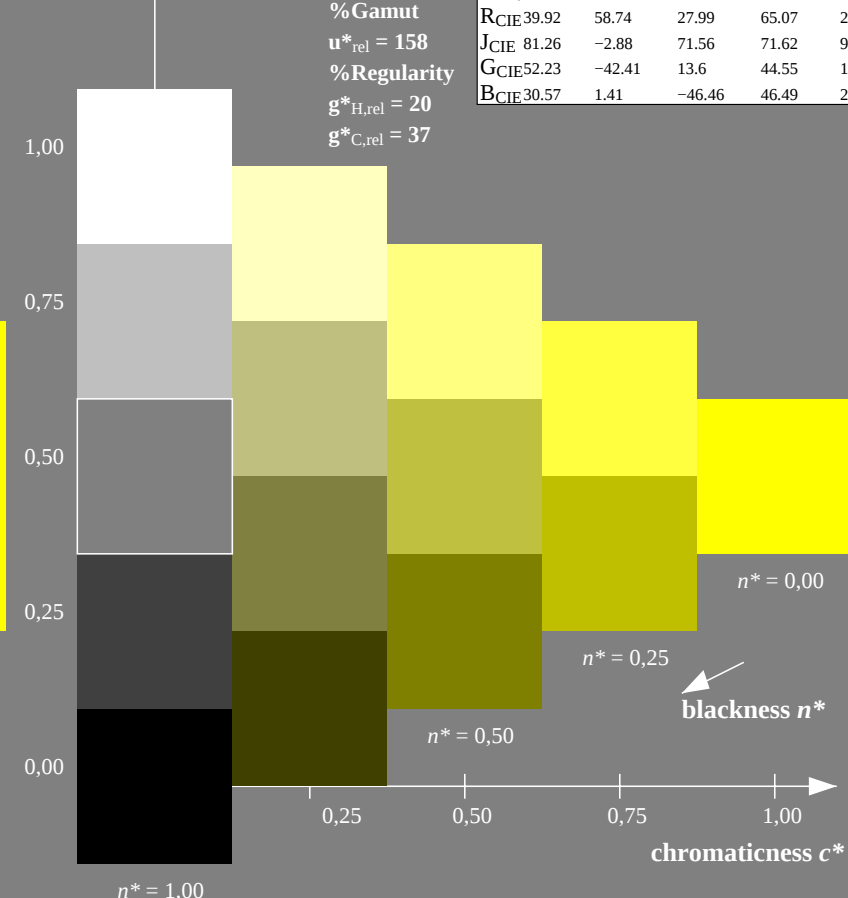
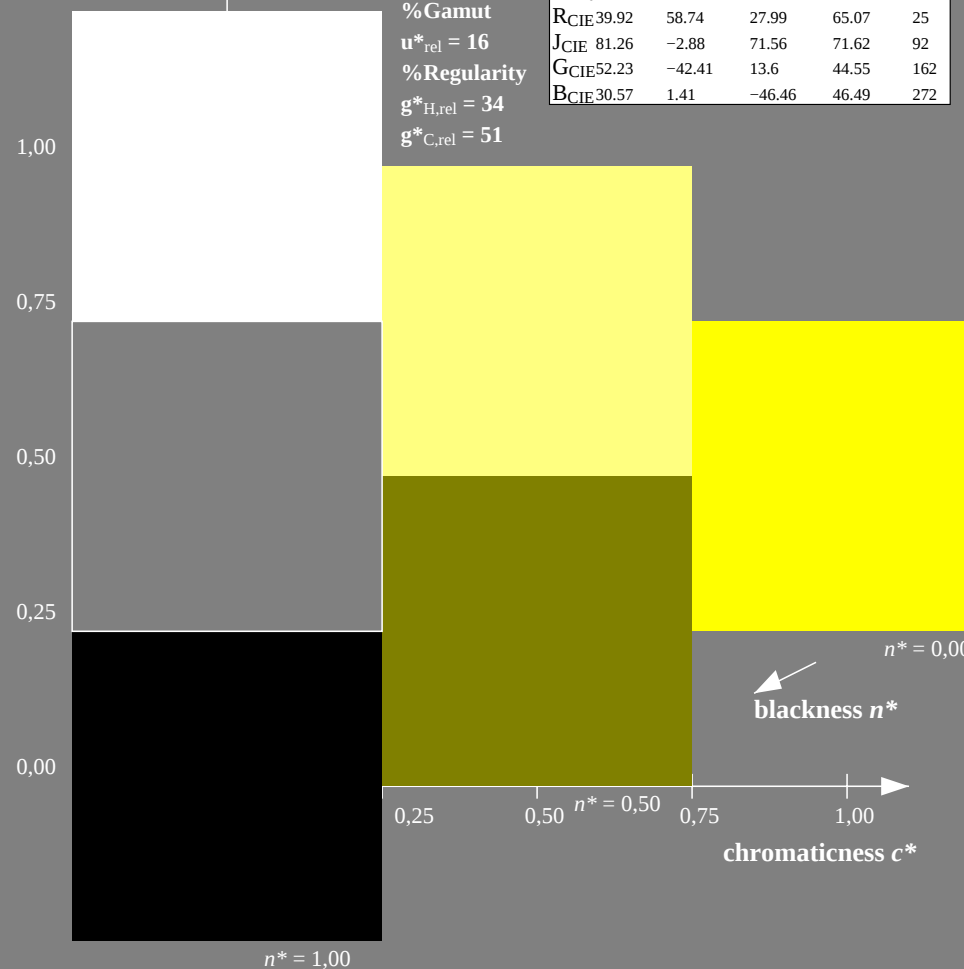
triangle lightness t^*



%Gamut
 $u^*_{rel} = 158$
%Regularity
 $g^*_{H,rel} = 20$
 $g^*_{C,rel} = 37$

TLS00; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	50.5	76.92	64.55	100.42	40
Y _{Ma}	92.66	-20.69	90.75	93.08	103
L _{Ma}	83.63	-82.75	79.9	115.04	136
C _{Ma}	86.88	-46.16	-13.55	48.12	196
V _{Ma}	30.39	76.06	-103.59	128.52	306
M _{Ma}	57.3	94.35	-58.41	110.97	328
N _{Ma}	0.01	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272



NE880-7, 3 step scales for constant CIELAB hue 107/360 = 0.298 (left)

5 step scales for constant CIELAB hue 103/360 = 0.286 (right)

BAM-test chart NE88; Colorimetric systems TLS70 & TLS00
D65: 3 and 5 step colour scales for 10 hues

input: olv* setrgbcolor
output: no change compared to input

Input: Colorimetric Television Luminous System TLS70

for hue $h^* = lab^*h = 142/360 = 0.395$

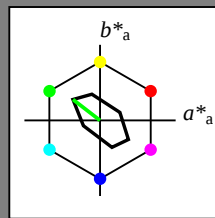
*lab*tch* and *lab*nch*

D65: hue L

LCH*Ma: 89 45 142

olv*Ma: 0.0 1.0 0.0

triangle lightness t^*



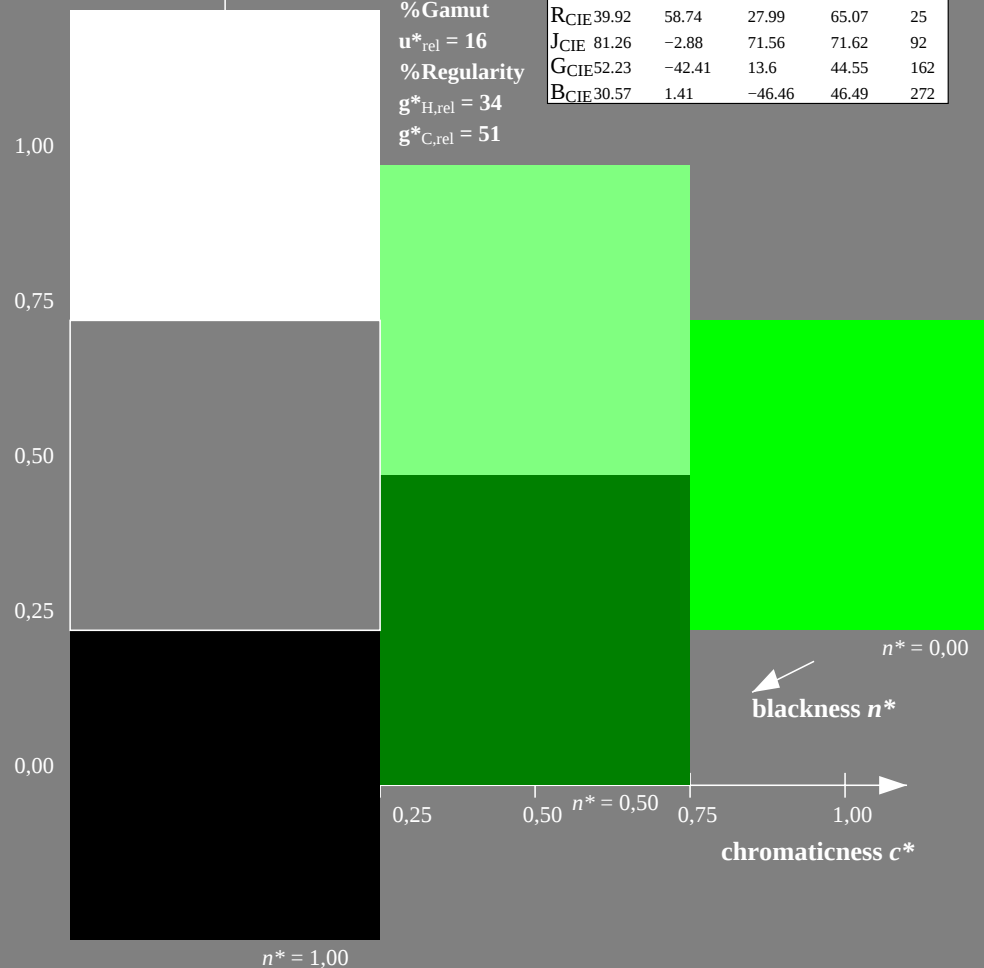
% Gamut

$$u_{\text{rel}}^* = 16$$

%Regularity

$$g^*_{H,rel} = 34$$
$$g^*_{C,rel} = 51$$

TSL70; adapted (a)		CIELAB data			
	L^*_a	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	76.43	26.27	10.57	28.32	22
Y _{Ma}	93.93	-10.76	34.63	36.27	107
L _{Ma}	89.32	-35.8	27.64	45.24	142
C _{Ma}	90.93	-21.95	-7.07	23.07	198
V _{Ma}	72.1	15.76	-35.63	38.97	294
M _{Ma}	78.5	37.52	-25.23	45.22	326
N _{Ma}	69.7	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272

NE880-7, 3 step scales for constant CIELAB hue $142/360 = 0.395$ (left)

BAM-test chart NE88: Colorimetric systems TLS70 & TLS00

D65: 3 and 5 step colour scales for 10 hues

Output: Colorimetric Television Luminous System TLS00

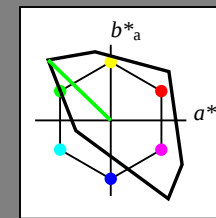
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for hue  $h^* = lab^*h = 136/360 = 0.378$ 
```

lab*tch and lab*nch

D65: hue L

LCH*Ma: 84 115 136

olv*Ma: 0.0 1.0 0.0

triangle lightness t^* 

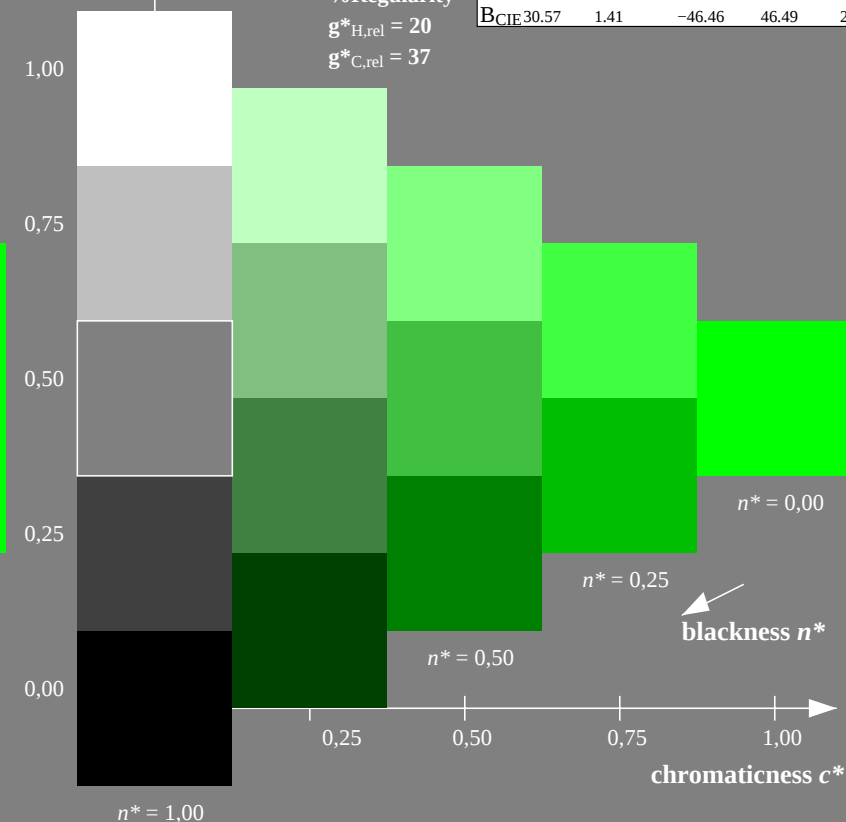
%Gamut

$$\mathbf{u}_{\text{rel}}^* = 158$$

%Regularity

$$g^*_{H,rel} = 20$$
$$g^*_{C,rel} = 37$$

TLS00; adapted (a)		CIELAB data			
	$L^* = L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O_{Ma}	50.5	76.92	64.55	100.42	40
Y_{Ma}	92.66	-20.69	90.75	93.08	103
L_{Ma}	83.63	-82.75	79.9	115.04	136
C_{Ma}	86.88	-46.16	-13.55	48.12	196
V_{Ma}	30.39	76.06	-103.59	128.52	306
M_{Ma}	57.3	94.35	-58.41	110.97	328
N_{Ma}	0.01	0.0	0.0	0.0	0
W_{Ma}	95.41	0.0	0.0	0.0	0
R_{CIE}	39.92	58.74	27.99	65.07	25
J_{CIE}	81.26	-2.88	71.56	71.62	92
G_{CIE}	52.23	-42.41	13.6	44.55	162
B_{CIE}	30.57	1.41	-46.46	46.49	272



5 step scales for constant CIELAB hue 136/360 = 0.378 (right)

```
input: olv* setrgbcolor
```

output: *no change compared to input*

-See for similar files: <http://www.ps.bam.de/NE88/>
 Technical information: <http://www.ps.bam.de> Version 2.1, io=1,1

Input: Colorimetric Television Luminous System TLS70

for hue $h^* = lab^*h = 198/360 = 0.55$

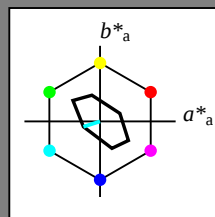
*lab*tch* and *lab*nch*

D65: hue C

LCH*Ma: 91 23 198

olv*Ma: 0.0 1.0 1.0

triangle lightness t^*



%Gamut

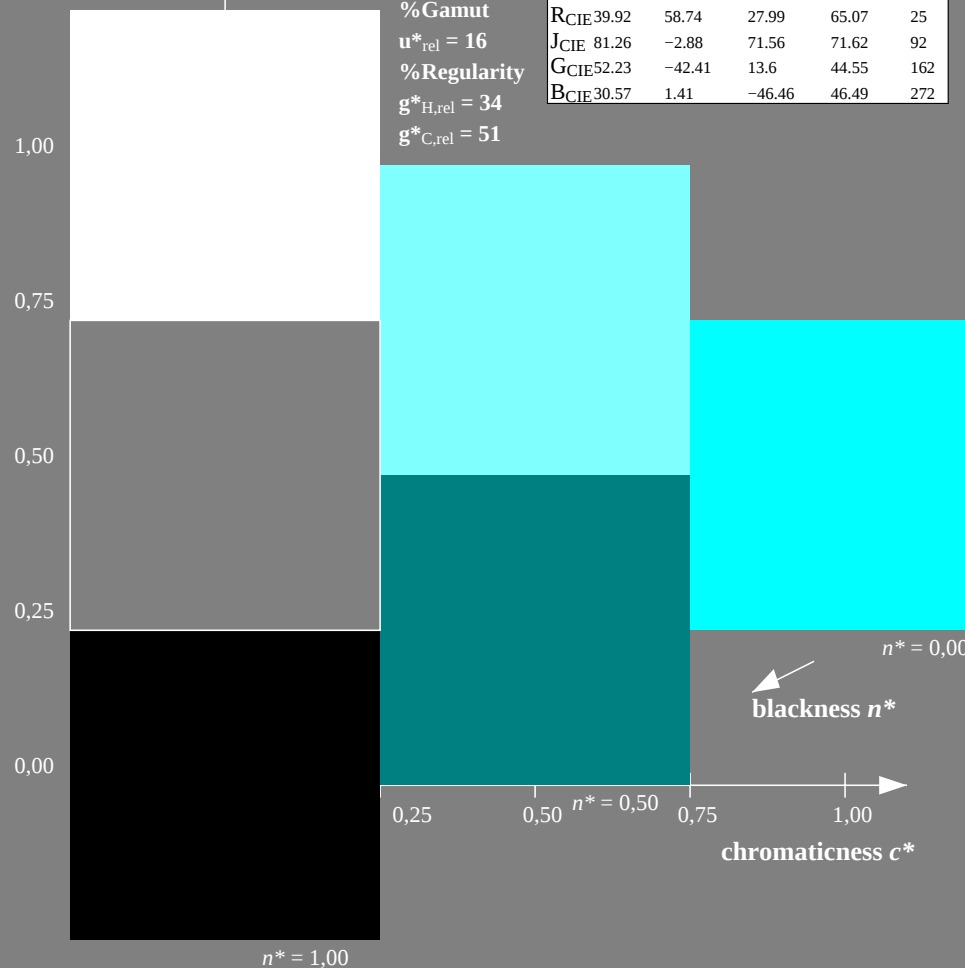
$$\mathbf{u}_{\text{rel}}^* = 16$$

%Regularity

$$g^*_{H,rel} = 34$$
$$g^*_{C,rel} = 51$$

TLS70; adapted (a) CIELAB data

O _{Ma} 76.43	26.27	10.57	28.32	22
Y _{Ma} 93.93	-10.76	34.63	36.27	107
L _{Ma} 89.32	-35.8	27.64	45.24	142
C _{Ma} 90.93	-21.95	-7.07	23.07	198
V _{Ma} 72.1	15.76	-35.63	38.97	294
M _{Ma} 78.5	37.52	-25.23	45.22	326
N _{Ma} 69.7	0.0	0.0	0.0	0
W _{Ma} 95.41	0.0	0.0	0.0	0
R _{CIE} 39.92	58.74	27.99	65.07	25
J _{CIE} 81.26	-2.88	71.56	71.62	92
G _{CIE} 52.23	-42.41	13.6	44.55	162
B _{CIE} 30.57	1.41	-46.46	46.49	272



NE880-7, 3 step scales for constant CIELAB hue 198/360 = 0.55 (left)

BAM-test chart NE88: Colorimetric systems TLS70 & TLS00

D65: 3 and 5 step colour scales for 10 hues

Output: Colorimetric Television Luminous System TLS00

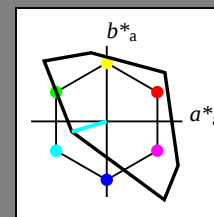
for hue $h^* = lab^*h = 196/360 = 0.545$

lab*tch and lab*nch

D65: hue C

LCH*Ma: 87 48 196

olv*Ma: 0.0 1.0 1.0

triangle lightness t^* 

% Gamut

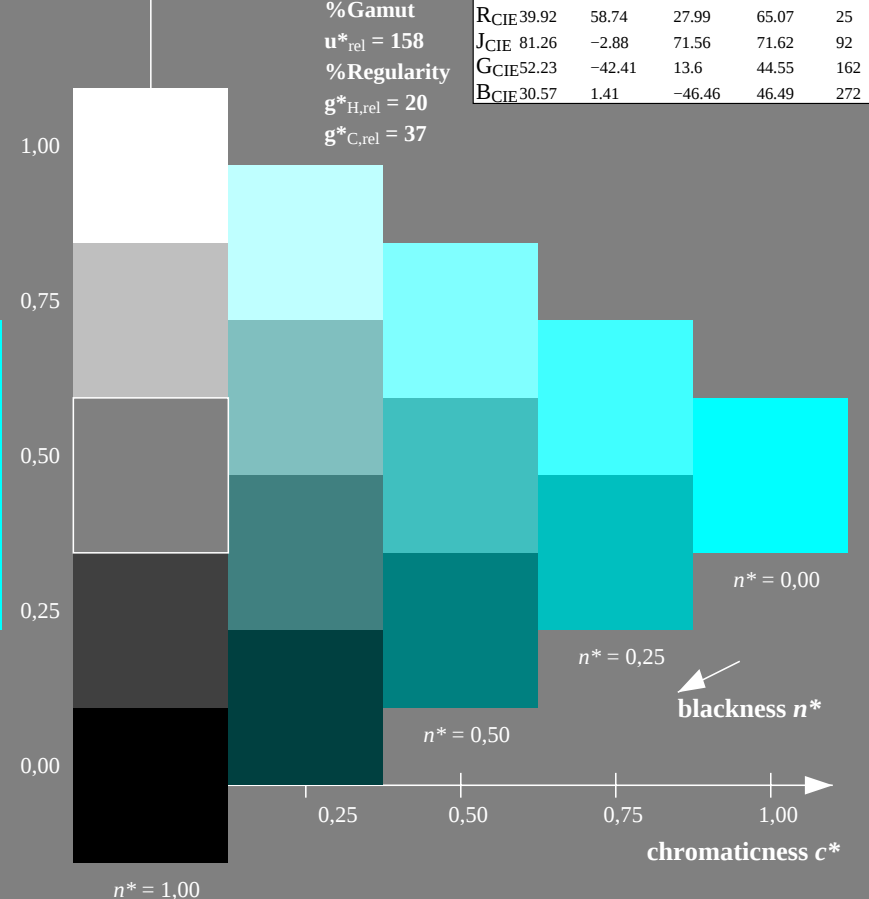
$$\mathbf{u}_{\text{rel}}^* = 158$$

%Regularity

$$g^*_{H,rel} = 20$$
$$g^*_{C,rel} = 37$$

TLS00; adapted (a) CIELAB data

Q_{Ma}	50.5	76.92	64.55	100.42	40
Y_{Ma}	92.66	-20.69	90.75	93.08	103
L_{Ma}	83.63	-82.75	79.9	115.04	136
C_{Ma}	86.88	-46.16	-13.55	48.12	196
V_{Ma}	30.39	76.06	-103.59	128.52	306
M_{Ma}	57.3	94.35	-58.41	110.97	328
N_{Ma}	0.01	0.0	0.0	0.0	0
W_{Ma}	95.41	0.0	0.0	0.0	0
R_{CIE}	39.92	58.74	27.99	65.07	25
J_{CIE}	81.26	-2.88	71.56	71.62	92
G_{CIE}	52.23	-42.41	13.6	44.55	162
B_{CIE}	30.57	1.41	-46.46	46.49	272



5 step scales for constant CIELAB hue 196/360 = 0.545 (right)

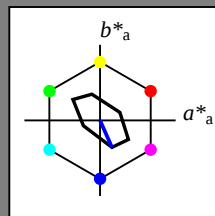
input: *olv** *setrgbcolor*

output: *no change compared to input*

Input: Colorimetric Television Luminous System TLS70

for hue $h^* = lab^*h = 294/360 = 0.816$
 lab^*ich and lab^*nch

D65: hue V
LCH*Ma: 72 39 294
olv*Ma: 0.0 0.0 1.0
triangle lightness t^*



%Gamut
 $u^*_{rel} = 16$
%Regularity
 $g^*_{H,rel} = 34$
 $g^*_{C,rel} = 51$

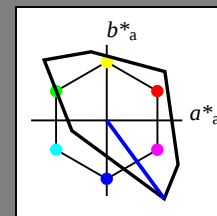
TLS70; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	76.43	26.27	10.57	28.32	22
Y _{Ma}	93.93	-10.76	34.63	36.27	107
L _{Ma}	89.32	-35.8	27.64	45.24	142
C _{Ma}	90.93	-21.95	-7.07	23.07	198
V _{Ma}	72.1	15.76	-35.63	38.97	294
M _{Ma}	78.5	37.52	-25.23	45.22	326
N _{Ma}	69.7	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272

Output: Colorimetric Television Luminous System TLS00

for hue $h^* = lab^*h = 306/360 = 0.851$
 lab^*ich and lab^*nch

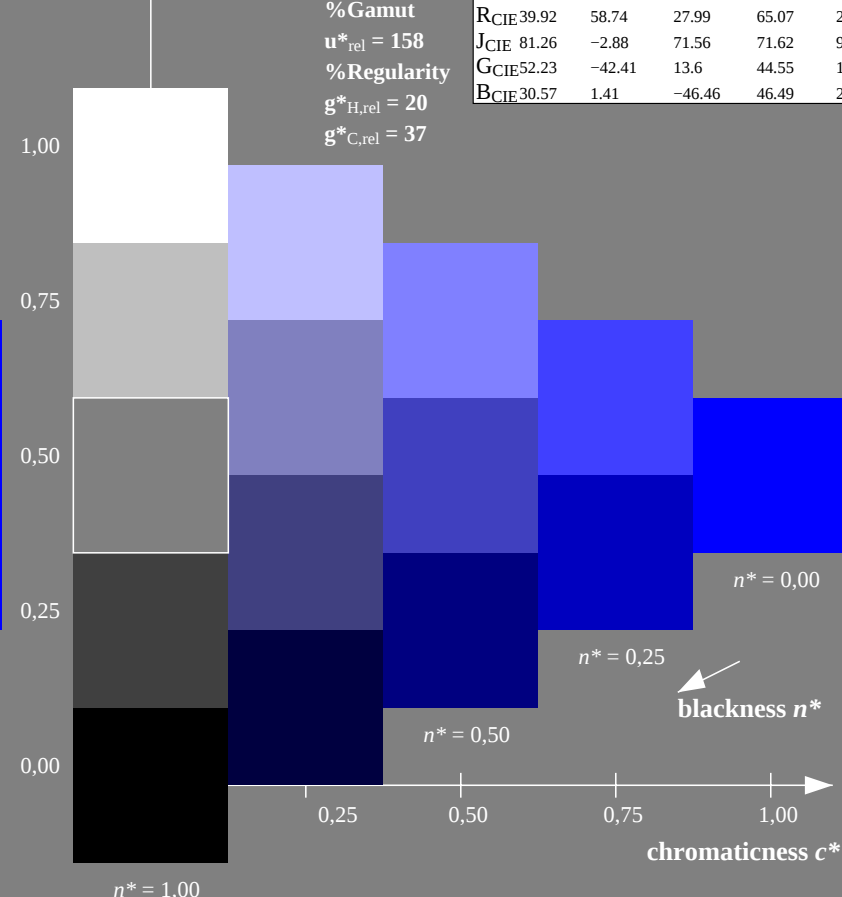
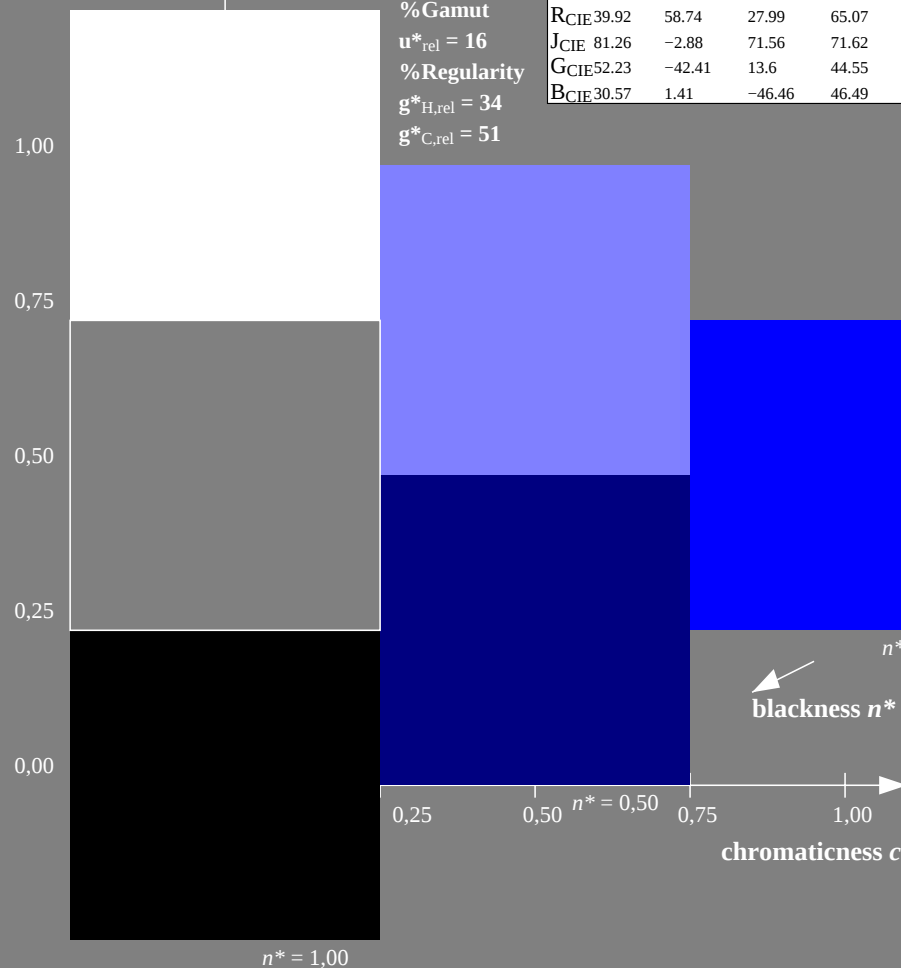
D65: hue V
LCH*Ma: 30 129 306
olv*Ma: 0.0 0.0 1.0
triangle lightness t^*



%Gamut
 $u^*_{rel} = 158$
%Regularity
 $g^*_{H,rel} = 20$
 $g^*_{C,rel} = 37$

TLS00; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	50.5	76.92	64.55	100.42	40
Y _{Ma}	92.66	-20.69	90.75	93.08	103
L _{Ma}	83.63	-82.75	79.9	115.04	136
C _{Ma}	86.88	-46.16	-13.55	48.12	196
V _{Ma}	30.39	76.06	-103.59	128.52	306
M _{Ma}	57.3	94.35	-58.41	110.97	328
N _{Ma}	0.01	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272



NE880-7, 3 step scales for constant CIELAB hue 294/360 = 0.816 (left)

5 step scales for constant CIELAB hue 306/360 = 0.851 (right)

BAM-test chart NE88; Colorimetric systems TLS70 & TLS00
D65: 3 and 5 step colour scales for 10 hues

input: olv* setrgbcolor
output: no change compared to input

Input: Colorimetric Television Luminous System TLS70

for hue $h^* = lab^*h = 326/360 = 0.906$

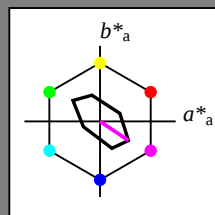
lab^*ich and lab^*nch

D65: hue M

LCH*Ma: 79 45 326

olv*Ma: 1.0 0.0 1.0

triangle lightness t^*



%Gamut
 $u^*_{rel} = 16$
%Regularity
 $g^*_{H,rel} = 34$
 $g^*_{C,rel} = 51$

TLS70; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	76.43	26.27	10.57	28.32	22
Y _{Ma}	93.93	-10.76	34.63	36.27	107
L _{Ma}	89.32	-35.8	27.64	45.24	142
C _{Ma}	90.93	-21.95	-7.07	23.07	198
V _{Ma}	72.1	15.76	-35.63	38.97	294
M _{Ma}	78.5	37.52	-25.23	45.22	326
N _{Ma}	69.7	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272

Output: Colorimetric Television Luminous System TLS00

for hue $h^* = lab^*h = 328/360 = 0.912$

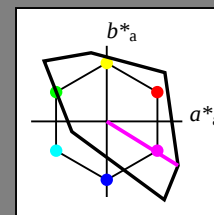
lab^*ich and lab^*nch

D65: hue M

LCH*Ma: 57 111 328

olv*Ma: 1.0 0.0 1.0

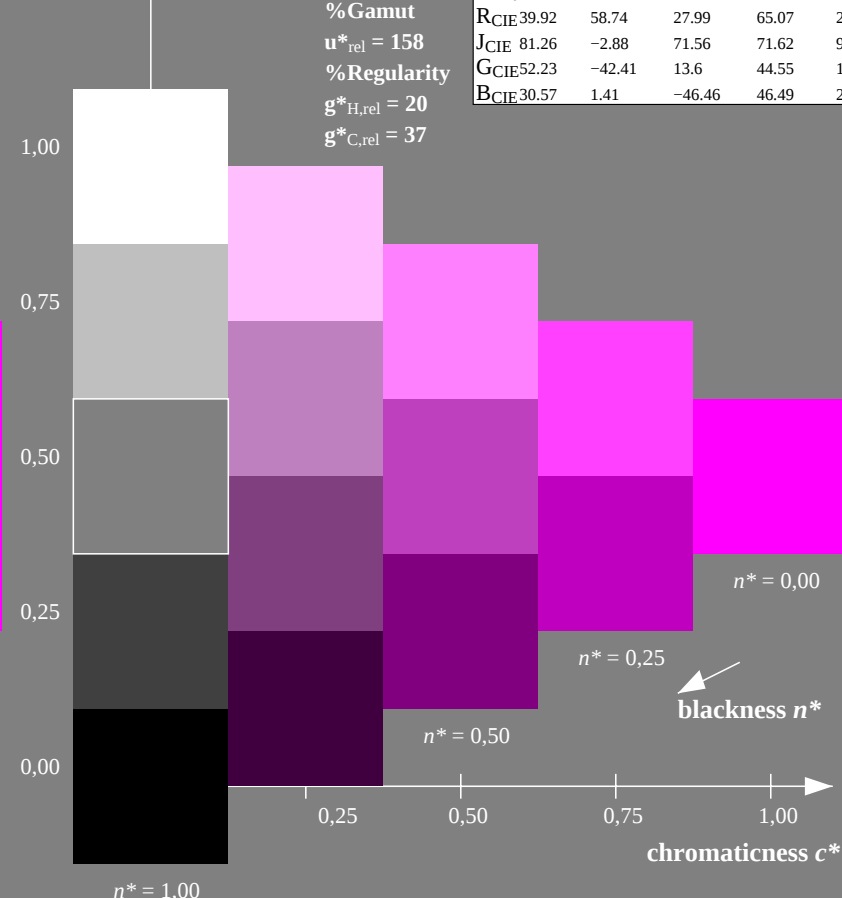
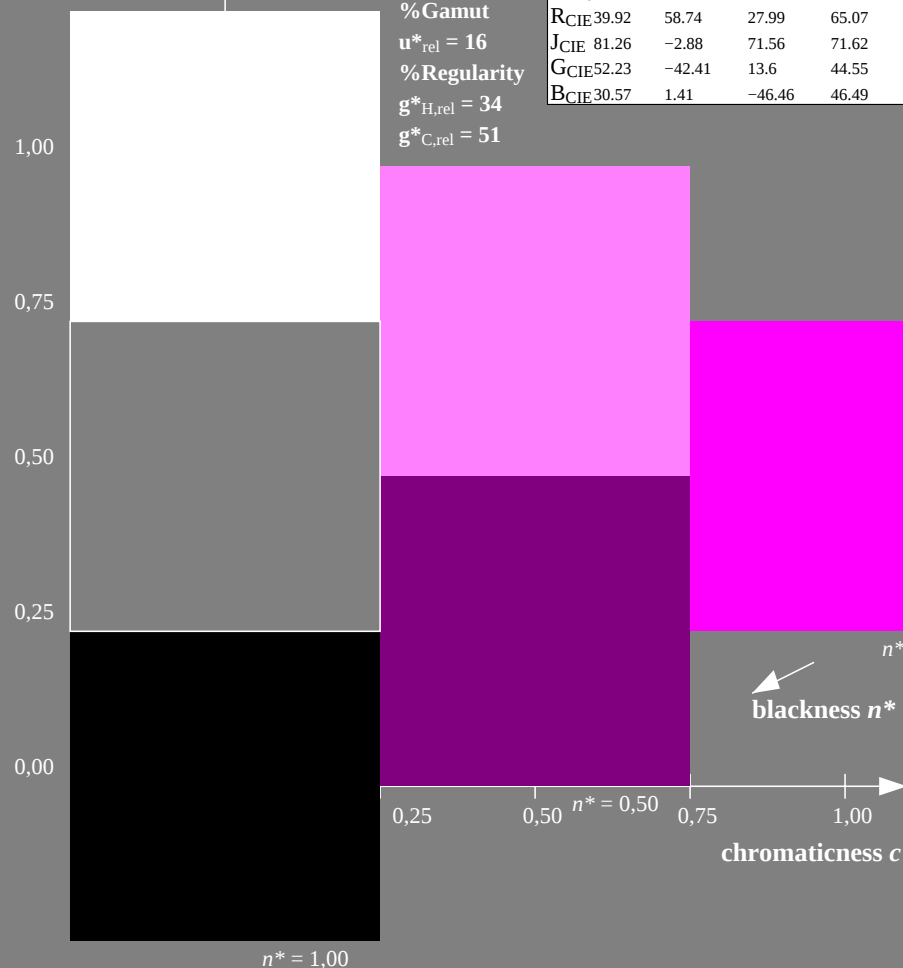
triangle lightness t^*



%Gamut
 $u^*_{rel} = 158$
%Regularity
 $g^*_{H,rel} = 20$
 $g^*_{C,rel} = 37$

TLS00; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	50.5	76.92	64.55	100.42	40
Y _{Ma}	92.66	-20.69	90.75	93.08	103
L _{Ma}	83.63	-82.75	79.9	115.04	136
C _{Ma}	86.88	-46.16	-13.55	48.12	196
V _{Ma}	30.39	76.06	-103.59	128.52	306
M _{Ma}	57.3	94.35	-58.41	110.97	328
N _{Ma}	0.01	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272



NE880-7, 3 step scales for constant CIELAB hue 326/360 = 0.906 (left)

5 step scales for constant CIELAB hue 328/360 = 0.912 (right)

BAM-test chart NE88; Colorimetric systems TLS70 & TLS00

D65: 3 and 5 step colour scales for 10 hues

input: olv* setrgbcolor

output: no change compared to input

Input: Colorimetric Television Luminous System TLS70

for hue $h^* = lab^*h = 25/360 = 0.071$

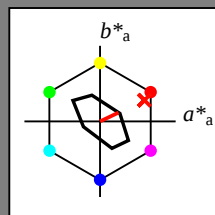
lab^*ich and lab^*nch

D65: hue R

LCH*Ma: 77 27 25

olv*Ma: 1.0 0.05 0.0

triangle lightness t^*



% Gamut
 $u^*_{rel} = 16$
% Regularity
 $g^*_{H,rel} = 34$
 $g^*_{C,rel} = 51$

TLS70; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	76.43	26.27	10.57	28.32	22
Y _{Ma}	93.93	-10.76	34.63	36.27	107
L _{Ma}	89.32	-35.8	27.64	45.24	142
C _{Ma}	90.93	-21.95	-7.07	23.07	198
V _{Ma}	72.1	15.76	-35.63	38.97	294
M _{Ma}	78.5	37.52	-25.23	45.22	326
N _{Ma}	69.7	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272

Output: Colorimetric Television Luminous System TLS00

for hue $h^* = lab^*h = 25/360 = 0.071$

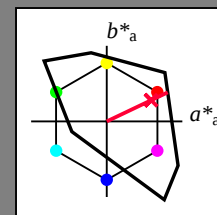
lab^*ich and lab^*nch

D65: hue R

LCH*Ma: 52 89 25

olv*Ma: 1.0 0.0 0.21

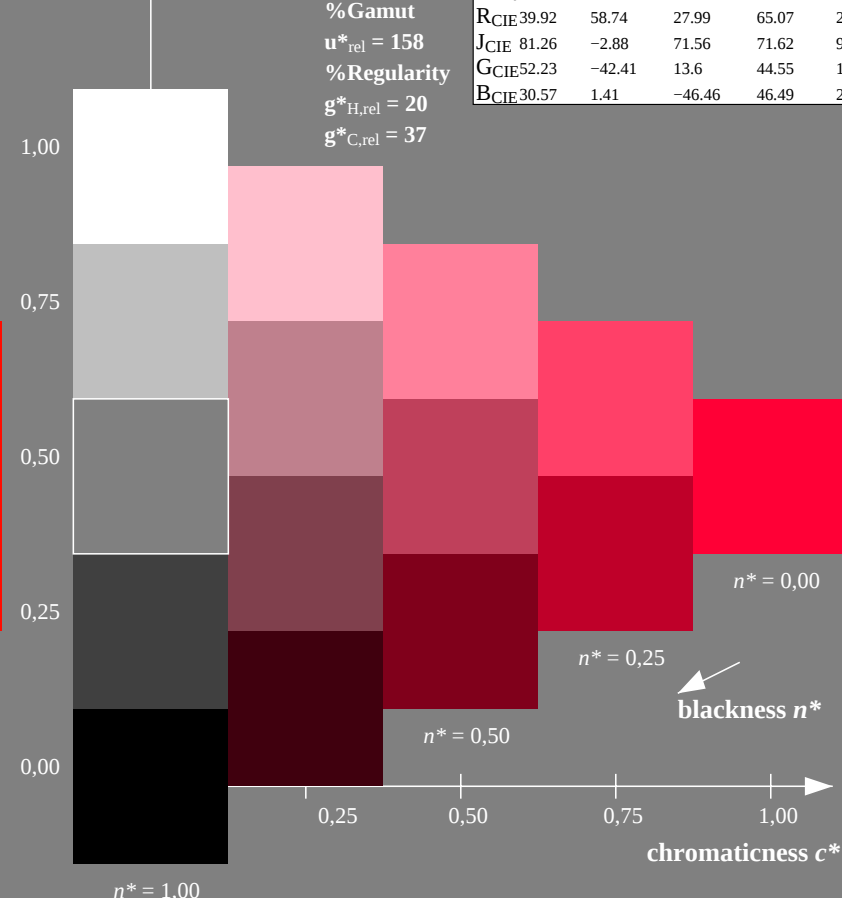
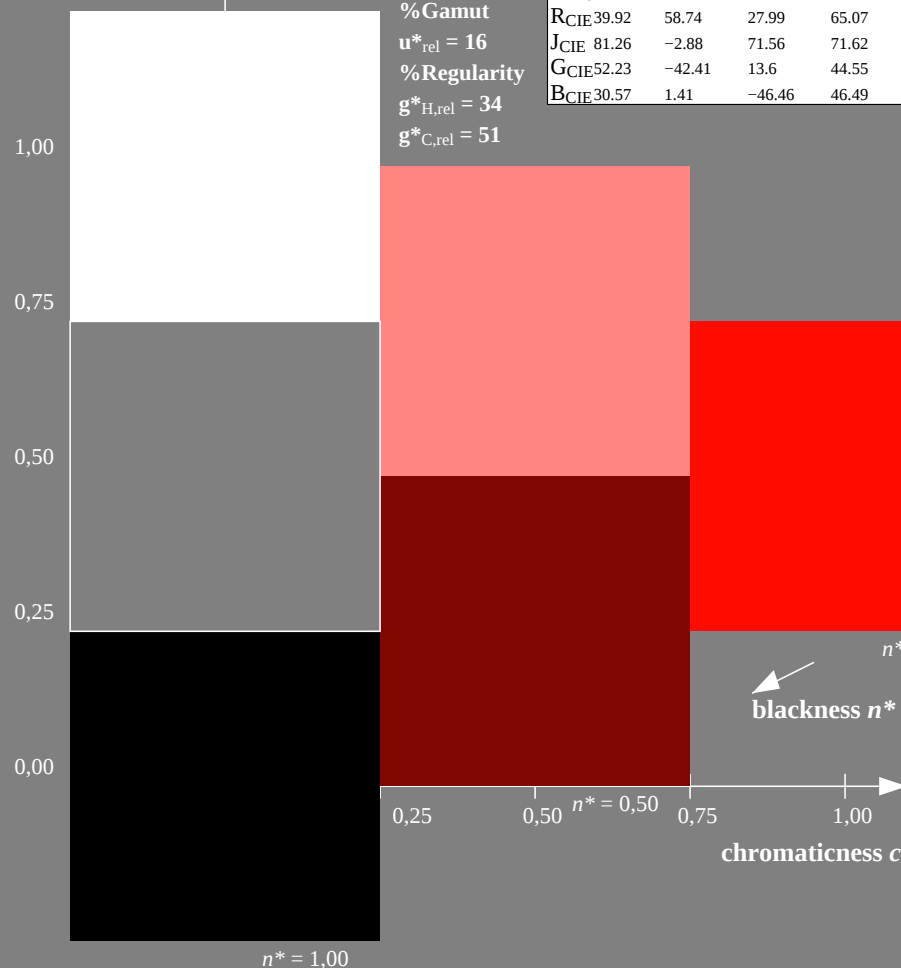
triangle lightness t^*



% Gamut
 $u^*_{rel} = 158$
% Regularity
 $g^*_{H,rel} = 20$
 $g^*_{C,rel} = 37$

TLS00; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	50.5	76.92	64.55	100.42	40
Y _{Ma}	92.66	-20.69	90.75	93.08	103
L _{Ma}	83.63	-82.75	79.9	115.04	136
C _{Ma}	86.88	-46.16	-13.55	48.12	196
V _{Ma}	30.39	76.06	-103.59	128.52	306
M _{Ma}	57.3	94.35	-58.41	110.97	328
N _{Ma}	0.01	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272



NE880-7, 3 step scales for constant CIELAB hue 25/360 = 0.071 (left)

5 step scales for constant CIELAB hue 25/360 = 0.071 (right)

BAM-test chart NE88; Colorimetric systems TLS70 & TLS00

D65: 3 and 5 step colour scales for 10 hues

input: olv* setrgbcolor

output: no change compared to input

Input: Colorimetric Television Luminous System TLS70

for hue $h^* = lab^*h = 92/360 = 0.256$

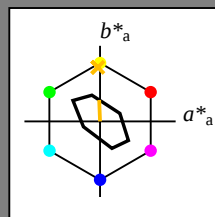
lab^*ich and lab^*nch

D65: hue J

LCH*Ma: 89 28 92

olv*Ma: 1.0 0.74 0.0

triangle lightness t^*



%Gamut
 $u^*_{rel} = 16$
%Regularity
 $g^*_{H,rel} = 34$
 $g^*_{C,rel} = 51$

TLS70; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
OMa	76.43	26.27	10.57	28.32	22
YMa	93.93	-10.76	34.63	36.27	107
LMa	89.32	-35.8	27.64	45.24	142
CMa	90.93	-21.95	-7.07	23.07	198
VMa	72.1	15.76	-35.63	38.97	294
MMa	78.5	37.52	-25.23	45.22	326
NMa	69.7	0.0	0.0	0.0	0
WMa	95.41	0.0	0.0	0.0	0
RCIE	39.92	58.74	27.99	65.07	25
JCIE	81.26	-2.88	71.56	71.62	92
GCIE	52.23	-42.41	13.6	44.55	162
BCIE	30.57	1.41	-46.46	46.49	272

Output: Colorimetric Television Luminous System TLS00

for hue $h^* = lab^*h = 92/360 = 0.256$

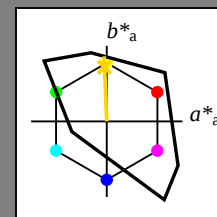
lab^*ich and lab^*nch

D65: hue J

LCH*Ma: 85 86 92

olv*Ma: 1.0 0.82 0.0

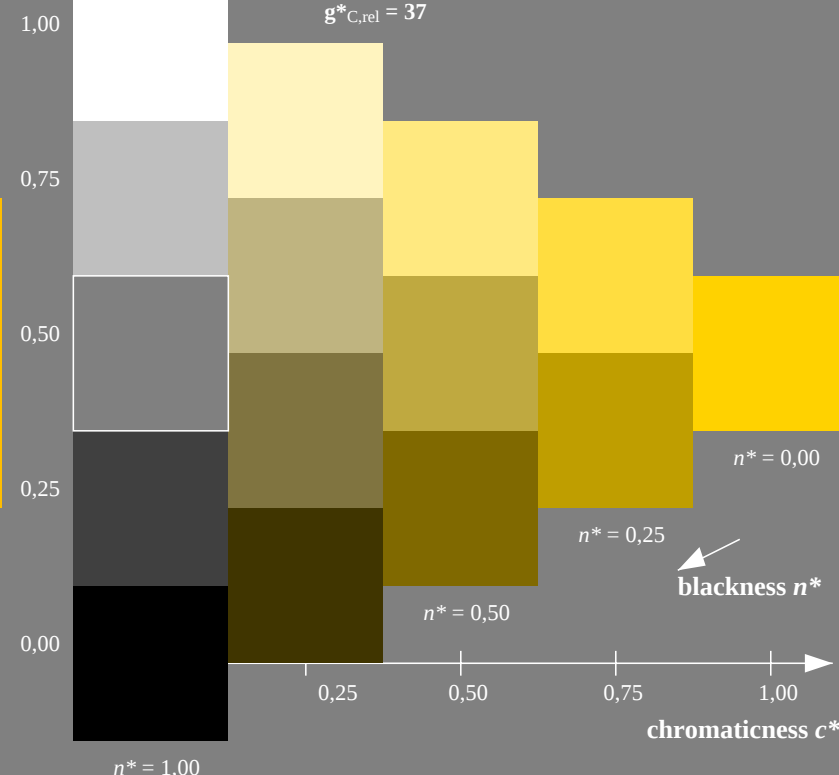
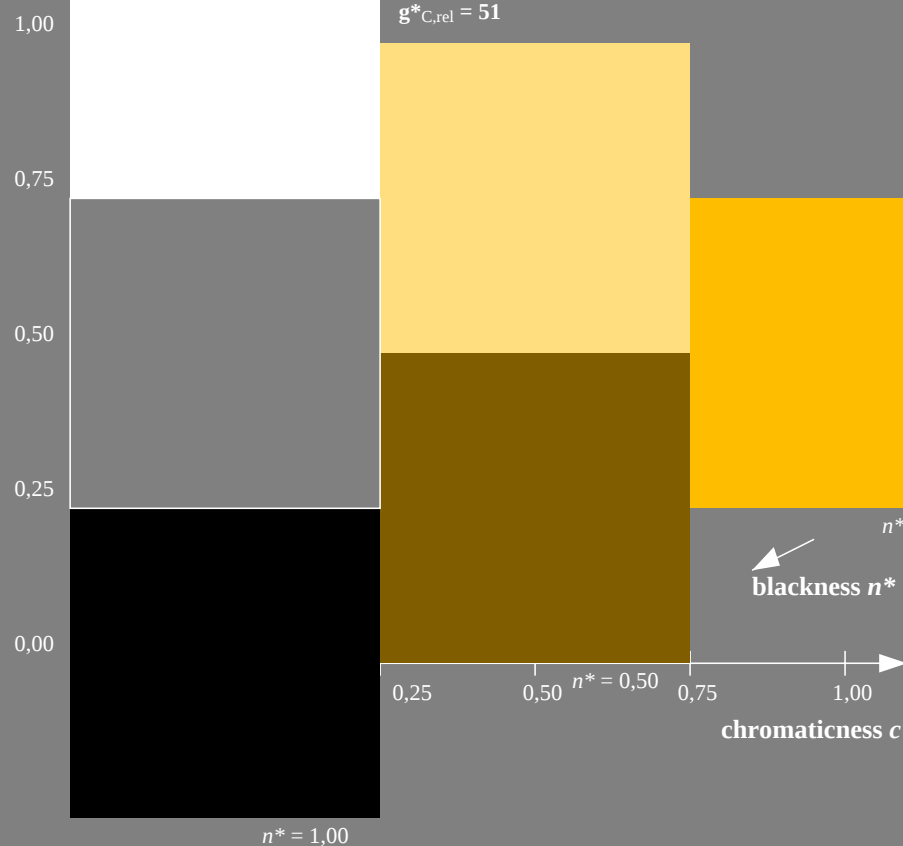
triangle lightness t^*



%Gamut
 $u^*_{rel} = 158$
%Regularity
 $g^*_{H,rel} = 20$
 $g^*_{C,rel} = 37$

TLS00; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
OMa	50.5	76.92	64.55	100.42	40
YMa	92.66	-20.69	90.75	93.08	103
LMa	83.63	-82.75	79.9	115.04	136
CMa	86.88	-46.16	-13.55	48.12	196
VMa	30.39	76.06	-103.59	128.52	306
MMa	57.3	94.35	-58.41	110.97	328
NMa	0.01	0.0	0.0	0.0	0
WMa	95.41	0.0	0.0	0.0	0
RCIE	39.92	58.74	27.99	65.07	25
JCIE	81.26	-2.88	71.56	71.62	92
GCIE	52.23	-42.41	13.6	44.55	162
BCIE	30.57	1.41	-46.46	46.49	272



NE880-7, 3 step scales for constant CIELAB hue 92/360 = 0.256 (left)

5 step scales for constant CIELAB hue 92/360 = 0.256 (right)

BAM-test chart NE88; Colorimetric systems TLS70 & TLS00
D65: 3 and 5 step colour scales for 10 hues

input: olv* setrgbcolor
output: no change compared to input



Input: Colorimetric Television Luminous System TLS70

for hue $h^* = lab^*h = 162/360 = 0.451$

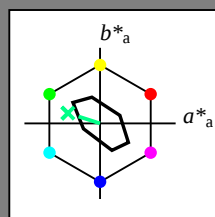
lab^*ich and lab^*nch

D65: hue G

LCH*Ma: 90 30 162

olv*Ma: 0.0 1.0 0.53

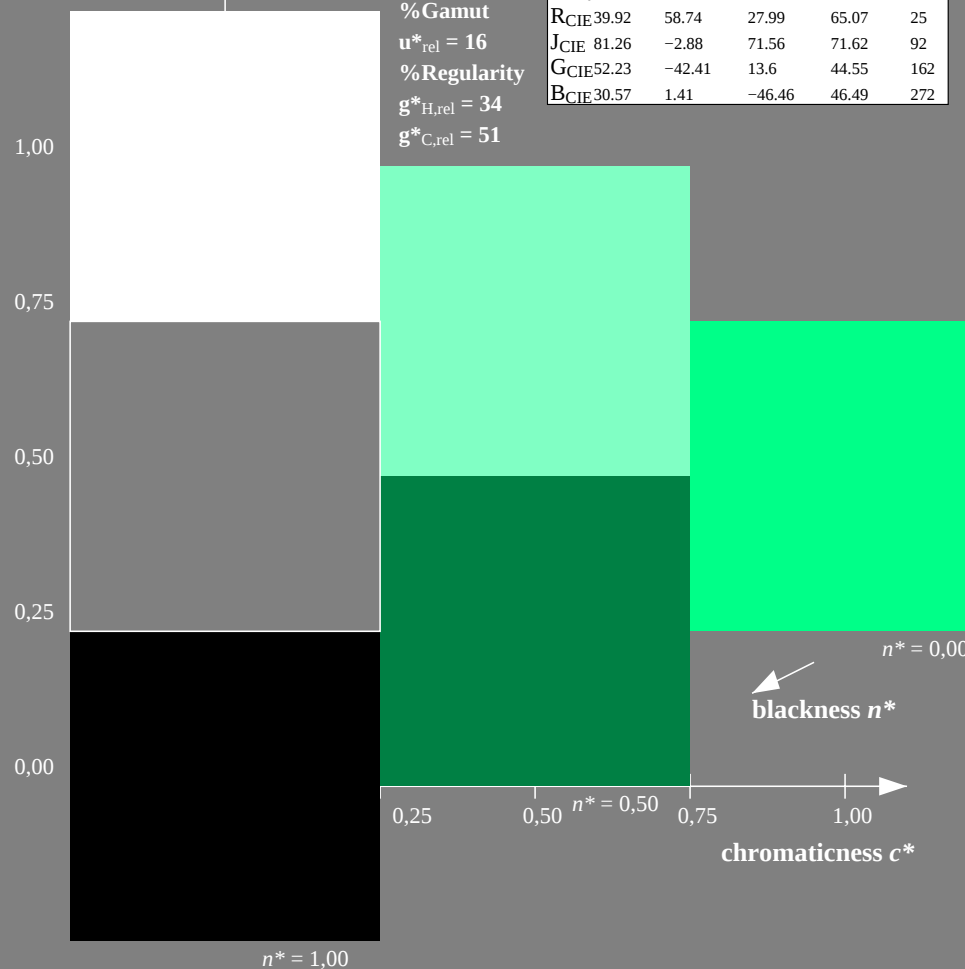
triangle lightness t^*



%Gamut
 $u^*_{rel} = 16$
%Regularity
 $g^*_{H,rel} = 34$
 $g^*_{C,rel} = 51$

TLS70; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	76.43	26.27	10.57	28.32	22
Y _{Ma}	93.93	-10.76	34.63	36.27	107
L _{Ma}	89.32	-35.8	27.64	45.24	142
C _{Ma}	90.93	-21.95	-7.07	23.07	198
V _{Ma}	72.1	15.76	-35.63	38.97	294
M _{Ma}	78.5	37.52	-25.23	45.22	326
N _{Ma}	69.7	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272



NE880-7, 3 step scales for constant CIELAB hue 162/360 = 0.451 (left)

BAM-test chart NE88; Colorimetric systems TLS70 & TLS00
D65: 3 and 5 step colour scales for 10 hues

Output: Colorimetric Television Luminous System TLS00

for hue $h^* = lab^*h = 162/360 = 0.451$

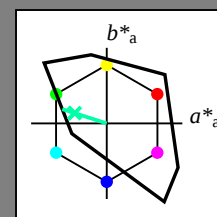
lab^*ich and lab^*nch

D65: hue G

LCH*Ma: 86 62 162

olv*Ma: 0.0 1.0 0.65

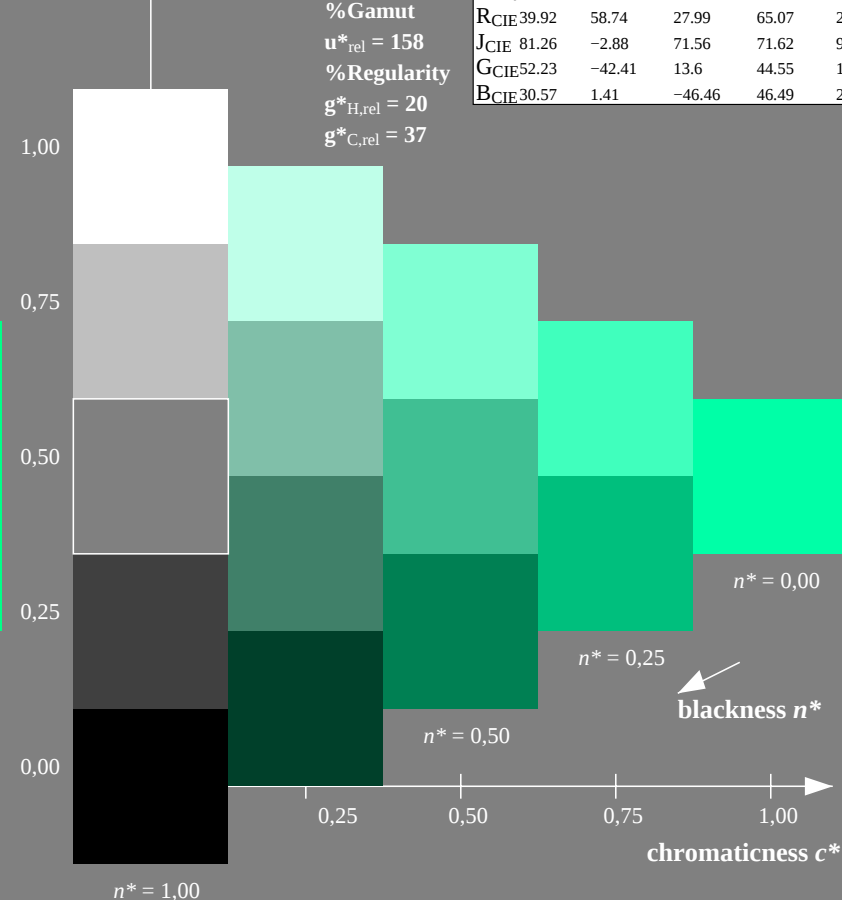
triangle lightness t^*



%Gamut
 $u^*_{rel} = 158$
%Regularity
 $g^*_{H,rel} = 20$
 $g^*_{C,rel} = 37$

TLS00; adapted (a) CIELAB data

	$L^*=L^*_a$	a^*_a	b^*_a	$C^*_{ab,a}$	$h^*_{ab,a}$
O _{Ma}	50.5	76.92	64.55	100.42	40
Y _{Ma}	92.66	-20.69	90.75	93.08	103
L _{Ma}	83.63	-82.75	79.9	115.04	136
C _{Ma}	86.88	-46.16	-13.55	48.12	196
V _{Ma}	30.39	76.06	-103.59	128.52	306
M _{Ma}	57.3	94.35	-58.41	110.97	328
N _{Ma}	0.01	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272



5 step scales for constant CIELAB hue 162/360 = 0.451 (right)

input: olv* setrgbcolor
output: no change compared to input



Input: Colorimetric Television Luminous System TLS70

for hue $h^* = lab^*h = 272/360 = 0.755$

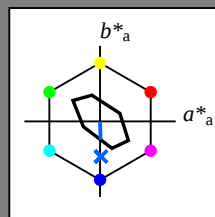
*lab*tch* and *lab*nch*

D65: hue B

LCH*Ma: 80 24 272

olv*Ma: 0.0 0.4 1.0

triangle lightness t^*



%Gamut

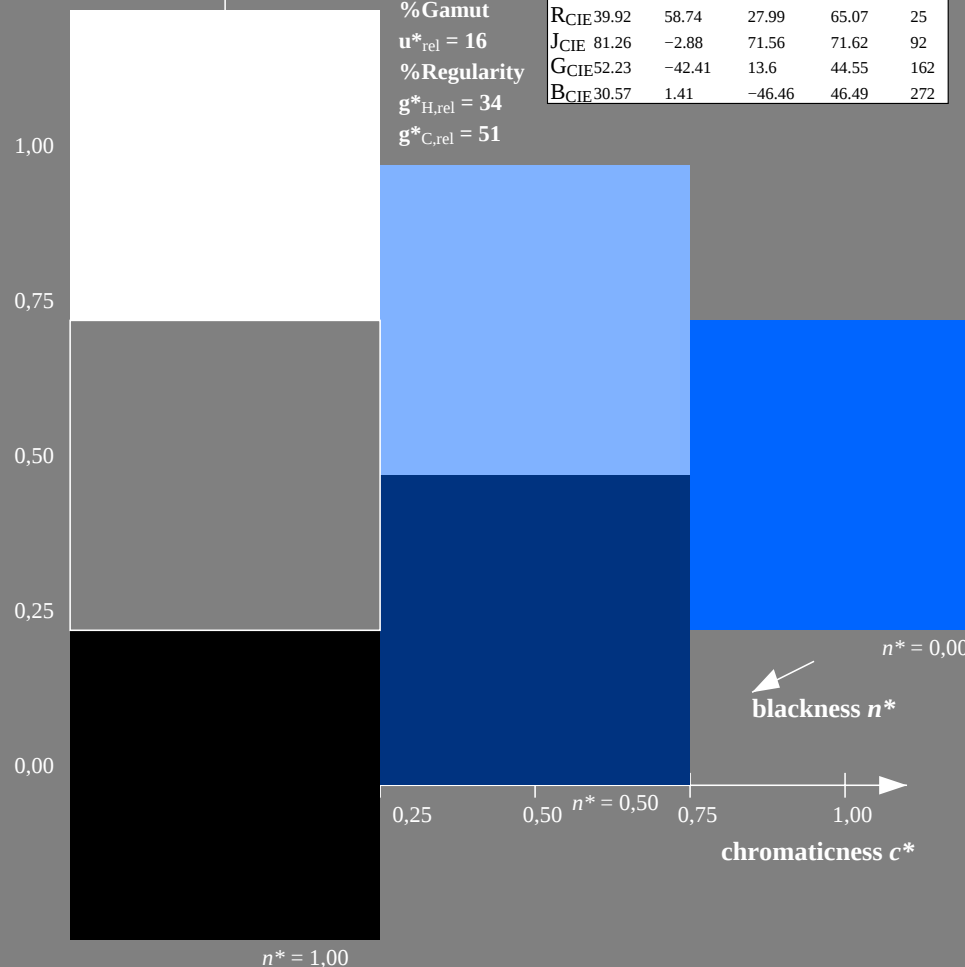
$$\mathbf{u}_{r\varrho}^* = 16$$

%Regularity

$$g^*_{H_{rel}} = 34$$
$$g^*_{C,rel} = 51$$

TLS70; adapted (a) CIELAB data

O _{Ma} 76.43	26.27	10.57	28.32	22
Y _{Ma} 93.93	-10.76	34.63	36.27	107
L _{Ma} 89.32	-35.8	27.64	45.24	142
C _{Ma} 90.93	-21.95	-7.07	23.07	198
V _{Ma} 72.1	15.76	-35.63	38.97	294
M _{Ma} 78.5	37.52	-25.23	45.22	326
N _{Ma} 69.7	0.0	0.0	0.0	0
W _{Ma} 95.41	0.0	0.0	0.0	0
R _{CIE} 39.92	58.74	27.99	65.07	25
J _{CIE} 81.26	-2.88	71.56	71.62	92
G _{CIE} 52.23	-42.41	13.6	44.55	162
B _{CIE} 30.57	1.41	-46.46	46.49	272



NE880-7, 3 step scales for constant CIELAB hue 272/360 = 0.755 (left)

BAM-test chart NE88: Colorimetric systems TLS70 & TLS00

D65: 3 and 5 step colour scales for 10 hues

Output: Colorimetric Television Luminous System TLS00

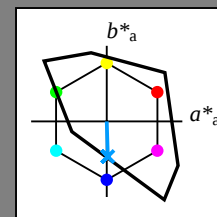
```
for hue  $h^* = lab^*h = 272/360 = 0.755$ 
```

lab*tch and lab*nch

D65: hue B

LCH*Ma: 65 49 272

olv*Ma: 0.0 0.61 1.0

triangle lightness t^* 

% Gamut

$$\mathbf{u}_{r\varphi}^* = 158$$

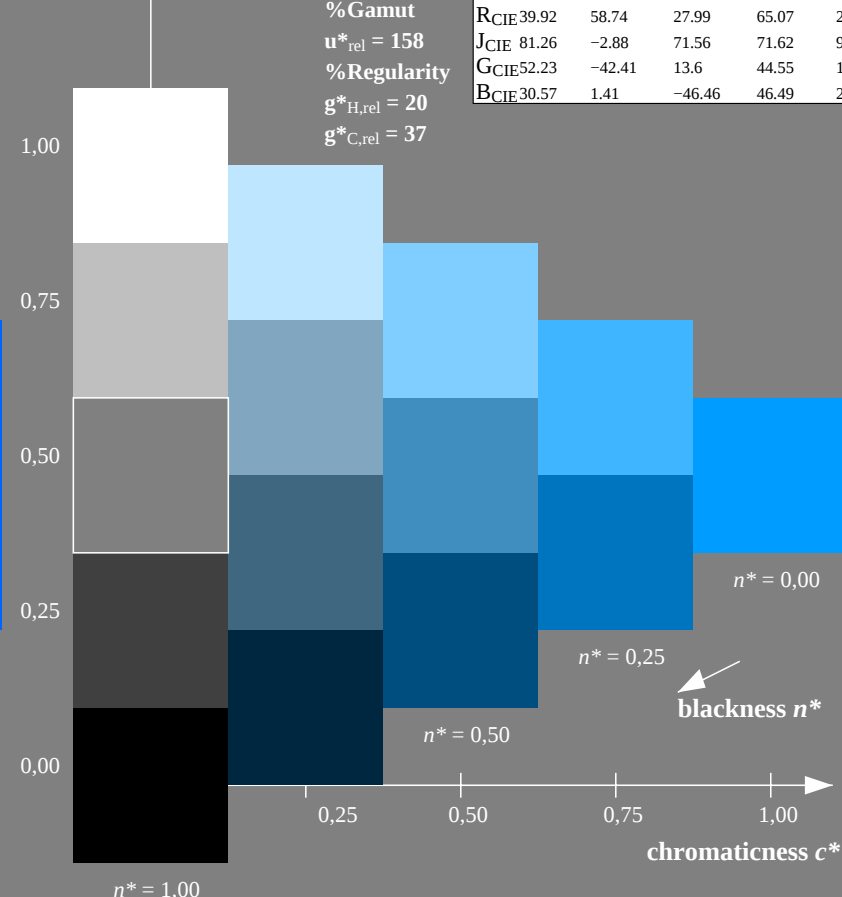
%Regularity

$$g^*_{H\text{rel}} = 20$$
$$g^*_{C,rel} = 37$$

g. C, ref. 1

TLS00; adapted (a) CIELAB data
 $L^* = L^*_a$ a^*_a b^*_a $C^*_{ab,a}$ $h^*_{ab,a}$

O _{Ma}	50.5	76.92	64.55	100.42	40
Y _{Ma}	92.66	-20.69	90.75	93.08	103
L _{Ma}	83.63	-82.75	79.9	115.04	136
C _{Ma}	86.88	-46.16	-13.55	48.12	196
V _{Ma}	30.39	76.06	-103.59	128.52	306
M _{Ma}	57.3	94.35	-58.41	110.97	328
N _{Ma}	0.01	0.0	0.0	0.0	0
W _{Ma}	95.41	0.0	0.0	0.0	0
R _{CIE}	39.92	58.74	27.99	65.07	25
J _{CIE}	81.26	-2.88	71.56	71.62	92
G _{CIE}	52.23	-42.41	13.6	44.55	162
B _{CIE}	30.57	1.41	-46.46	46.49	272



5 step scales for constant CIELAB hue 272/360 = 0.755 (right)

```
input: olv* setrgbcolor
```

output: *no change compared to input*