

L^*/L_u^* LABJNDu4 relative standard lightness L^*/L_u^* $Y_{nc}=L^*_w \text{RGB}_{nc}=100, 52, 87, 31$ L^*/L_u^*

2 100

 $L^*_{LABJNDu4}=\ln(A_{1n}+A_{2n}Y)/(A_{2n}A_{0n}) \quad (Y_{nc}/100 < Y \leq Y_{nc})$ $L^*_{LABJNDu4}=\ln(A_{1n}+A_{2u}x)/(A_{2u}A_{0n}) \quad (x=Y/Y_u)$ $L^*_N(3,6)=146, L^*_u(18)=332, L^*_w(90)=517$

1 10

0 1

 $\log[L^*/L_u^*]=0, m_u=0,33$ $L^*_u=49, L^*_u=332$ application
range

0,1

1

10

100

Y

-1

0

1

2

log(Y)

 $x_u=1$ $x_w=5$ $x_N=0,2$