

9stufige Grauskalierung zwischen $L^*_{0aN}=-71$ & $L^*_{0aW}=71.5$, $Y_{0ref}=200$, Normierung Weiß W

$L^*_{0aN}=-71.4$, $L^*_{0aU}=0.0$, $L^*_{0aW}=71.5$, $Y_{0aN}=2.0$, $Y_{0aU}=20.0$, $Y_{0aW}=200.0$, $C_{0aY}=Y_{0aW}:Y_{0aN}=100.0$

$L^*_{taN}=50.3$, $L^*_{taU}=53.0$, $L^*_{taW}=71.5$, $Y_{taN}=101.0$, $Y_{taU}=110.0$, $Y_{taW}=200.0$, $C_{taY}=Y_{taW}:Y_{taN}=2.0$

Regularitätsindex nach ISO/IEC 15775:2022, Anhang G für 5 und 9 Stufen

$g^* = 100 [\Delta L^*_{min}] / [\Delta L^*_{max}]$, $L^*_{TUBLOG,Ua} = 50 / \log(5) [\log(Y/Y_u)]$ mit $Y_u=20$

$$g^*_5 = 100, g^*_9 = 99$$

$$g^*_5 = 5, g^*_9 = 3$$

$$g^*_5 = 64, g^*_9 = 44$$

$L^*_{TUBLOG,Ua}$ angestrebte Ausgabe

n0. i	L^*_{0a}	L^*_{0r}	Y_{0a}	Y_{0r}
9	71.5	1.0	200.0	1.0
8	53.6	0.875	112.5	0.558
7	35.8	0.75	63.2	0.309
6	17.9	0.625	35.6	0.169
5	0.0	0.5	20.0	0.091
4	-17.8	0.375	11.2	0.047
3	-35.7	0.25	6.3	0.022
2	-53.6	0.125	3.5	0.008
1	-71.4	0.0	2.0	0.0

$$\Delta L^*_{0a} = 17.9$$

$$(i=1,2,\dots,8)$$

reale Ausgabe

L^*_{ta}	ΔL^*_{ta}	L^*_{tr}	Y_{ta}	$(L^*_{tr})^{1/2.75}$	L^*_{la}	ΔL^*_{la}
71.5		7.7			71.5	3.2
63.9		5.3	0.638	156.2	0.849	68.3
58.5		3.4	0.388	131.6	0.708	65.3
55.1		2.1	0.225	117.8	0.581	62.6
53.0		1.3	0.125	110.0	0.469	60.3
51.7		0.7	0.065	105.6	0.371	58.2
51.0		0.4	0.031	103.2	0.283	56.3
50.5		0.2	0.011	101.8	0.196	54.5
50.3		0.0	101.0	0.0	50.3	4.1

$$\text{Normierung: } Y_{taW} = Y_{0aW} \frac{Y_{0ai} + Y_{0ref}}{Y_{0aW} + Y_{0ref}}$$