

Test report

Light Reflectance Value

What is Light Reflectance Value (LRV)?

Light Reflectance Value (LRV) is the total quantity of visible light reflected by a surface, e.g. floorings, ceilings, walls and furniture, at all wavelengths and directions when illuminated by a light source.

The LRV scale runs from 0, which is a perfectly absorbing surface that could be assumed to be totally black, up to 100, which is a perfectly reflective surface that could be considered to be the perfect white. Because of practical influences in any application, black is always greater than 0 and white never equals 100. Additional to colour, the structure and gloss of the product or surface are determining factors for LRV.

The LRV value is directly measured according to British Standard 8493:2008 'Light Reflectance Value (LRV) of a surface'.

The L*-value (colour depth) is sometimes being used to calculate visual contrast, but should not be mixed up with the LRV as it is significantly higher. However, the L*-value can be used to calculate the LRV of a surface (also referred to as the 'ρ-value' (rho)), as a close approximation of the directly measured LRV according to BS 8493.

Formula: $\rho (\rho) = 100 \times ((L+16)/116)^3$

Product name: **Essence**

Results:

Colour	L*	LRV
1910	52.25	20.37
2051	34.10	8.06
2085	34.20	8.10
2921	25.12	4.45
2924	49.59	18.08
3821	21.36	3.34
3841	19.41	2.84
4301	25.96	4.73
5011	37.43	9.77
7074	41.64	12.27
7283	38.52	10.38
8173	27.04	5.11

Colour	L*	LRV
8412	34.15	8.08
8501	24.96	4.40
8802	28.96	5.82
9093	33.14	7.60
9094	38.03	10.10
9111	21.84	3.47
9501	24.98	4.41
9503	38.32	10.27
9506	44.20	13.98
9925	53.23	21.25
9980	27.95	5.44
9990	17.02	2.31

Measurements tool/equipment/conditions

- standard illuminant CIE D65
- 10° standard colorimetric observer
- 100% UV
- specular component included
- aperture: large

For more information on LRV in general and test results per product, visit www.desso.com