



# Phosphor Information Leaflet

## GENERAL

Name	Zinc hexafluorid silicate manganese
Chemical formula	ZnSiF <sub>6</sub> :Mn <sup>4+</sup>
Application areas	Light emitting diodes

## OPTICAL PROPERTIES

Excitation maxima @ 630 nm	471 nm (2.63 eV)
Emission maximum @ 470 nm exc.	630 nm (1.96 eV)
Centroid wavelength	629 nm (1.97 eV)
Full width @ half emission maximum	5 nm (0.02 eV)
Lumen equivalent	202 lm/W <sub>opt.</sub>
CIE1931 chromaticity coordinates (x, y)	0.693, 0.306
Band edge of host lattice	-
Reflection @ 470 nm	33 %
Decay time $\tau_{1/e}$	365 $\mu$ s

## PHYSICAL PROPERTIES

Body colour	Brownish-white
Density	2.1 g/cm <sup>3</sup>
Refractive index (at $\lambda$ )	1.4
Mineral type	-
Crystal system	Trigonal
Space group (#)	R-3 h (148)

