



Showcasing research from Professor Zhengtao Deng's laboratory, College of Engineering and Applied Sciences, Nanjing University, Jiangsu, P.R. China.

Solid-state synthesis of cesium manganese halide nanocrystals in glass with bright and broad red emission for white LEDs

Ultra-stable CsMnX_3 ($X = \text{Cl}, \text{Br}, \text{I}$) nanocrystals embedded in borosilicate glasses with a stable photoluminescence (PL) emission maximum at 649 nm, high PL quantum yield of 65.1%, and wide line-width of 130 nm were synthesized as excellent red phosphors for white light-emitting diode (LED) devices with a high color rendering index (CRI).

As featured in:



See Zhengtao Deng *et al.*,
Chem. Sci., 2023, **14**, 5309.