

Supplementary information

Synthesis, Crystal Structures and Luminescent Properties of Eleven New Lanthanide and Yttrium Complexes with Fluorescent Whitener and 1,10-Phenanthroline

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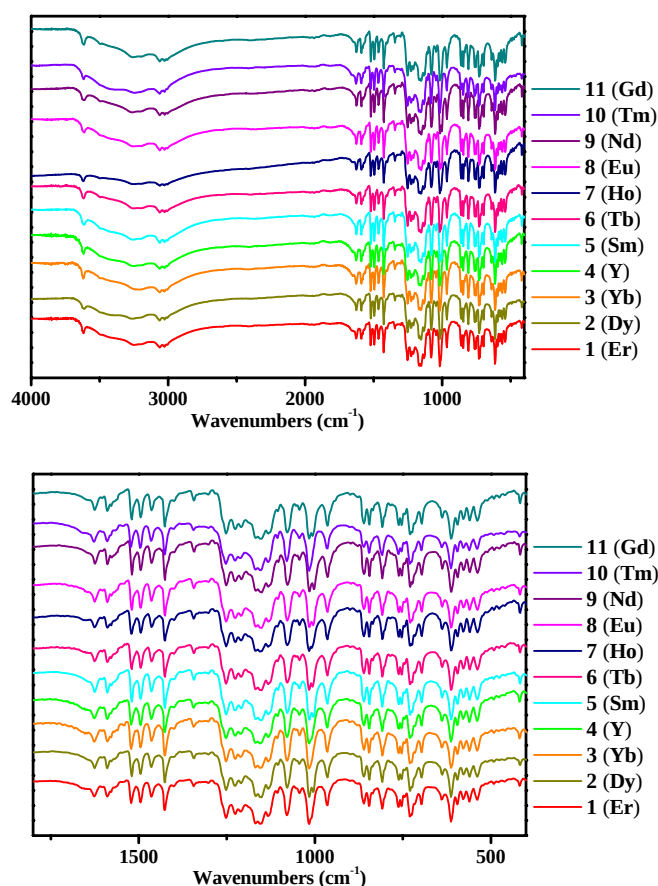


Fig. S1 IR spectra of solids 1-11.

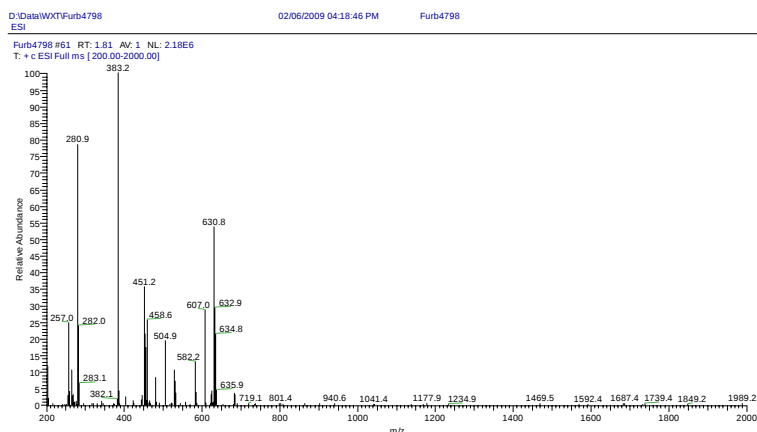


Fig. S2 The mass spectrum of compound **8** in DMSO solution.

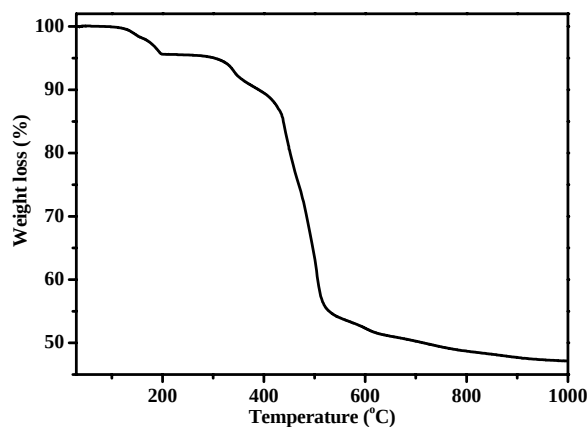


Fig. S3 TGA curve of compound **8**.

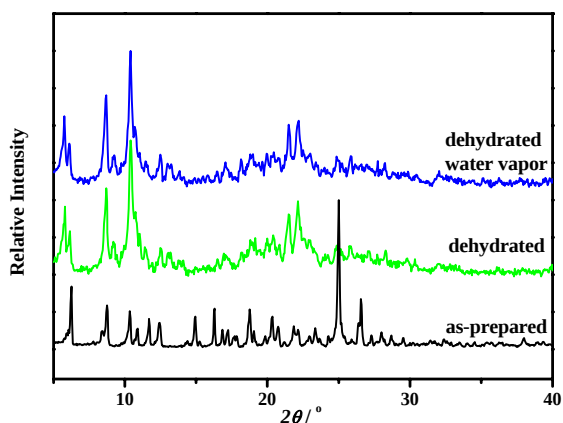


Fig. S4 Powder XRD patterns of the as-prepared and the dehydrated solid **8** (**Eu**), as well as the dehydrated solid had been exposed to water vapor for 11 days.

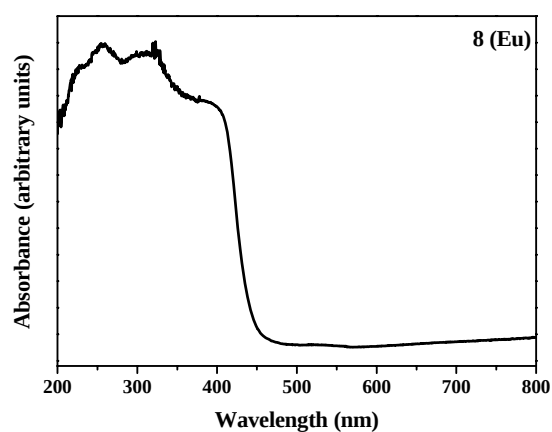


Fig. S5 The diffuse absorbance of solid **8**.

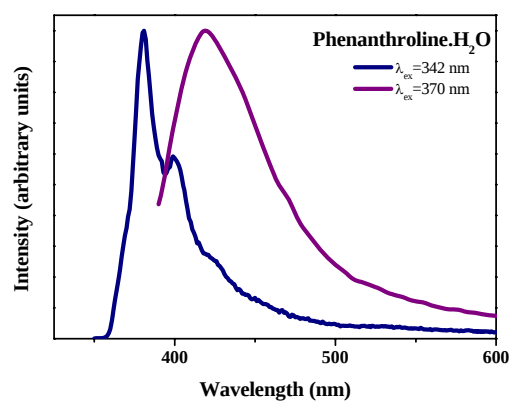


Fig. S6 Normalized solid-state emission spectra for phenanthroline·H₂O.

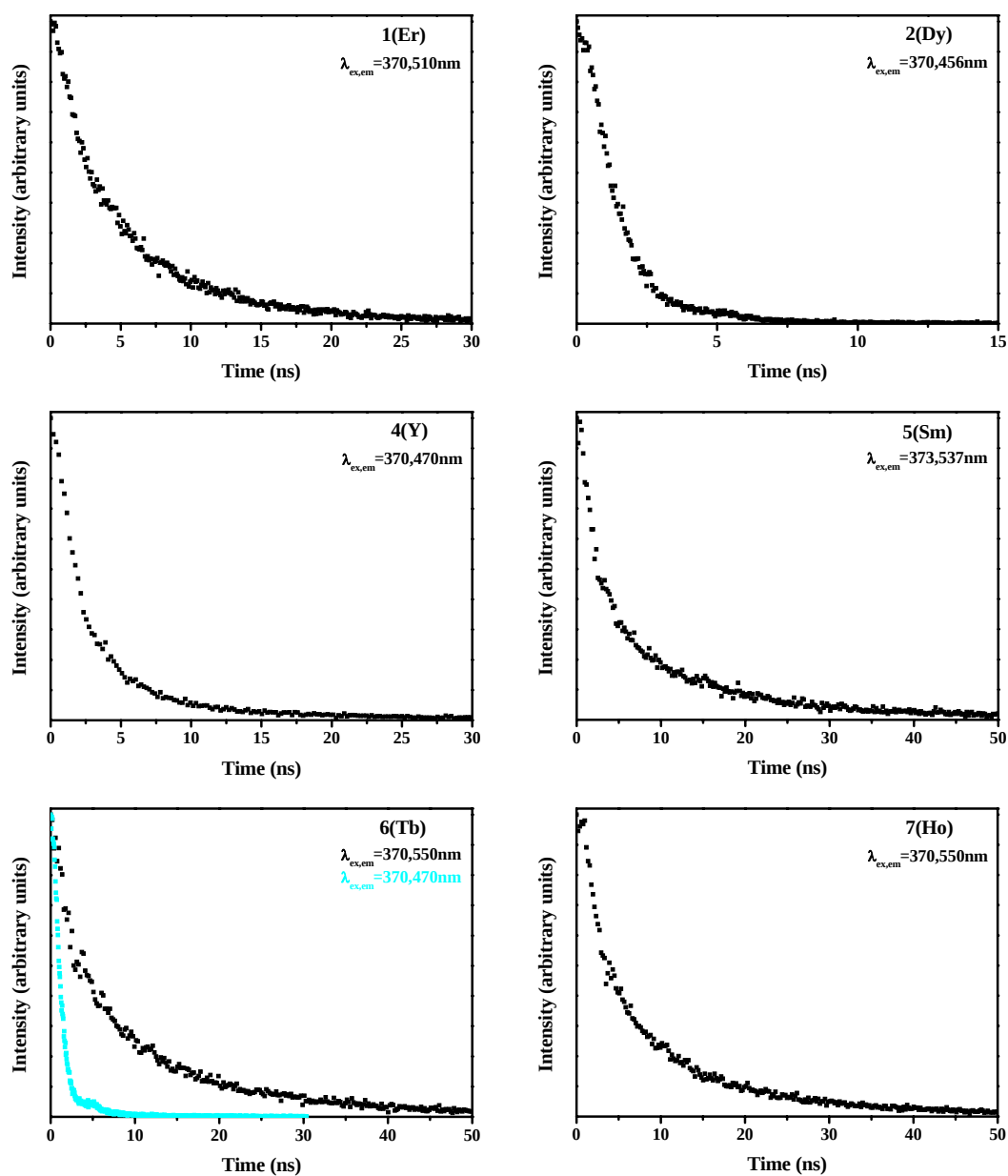


Fig. S7 Room-temperature solid-state fluorescent intensity as a function of time for 1-2 and 4-7.

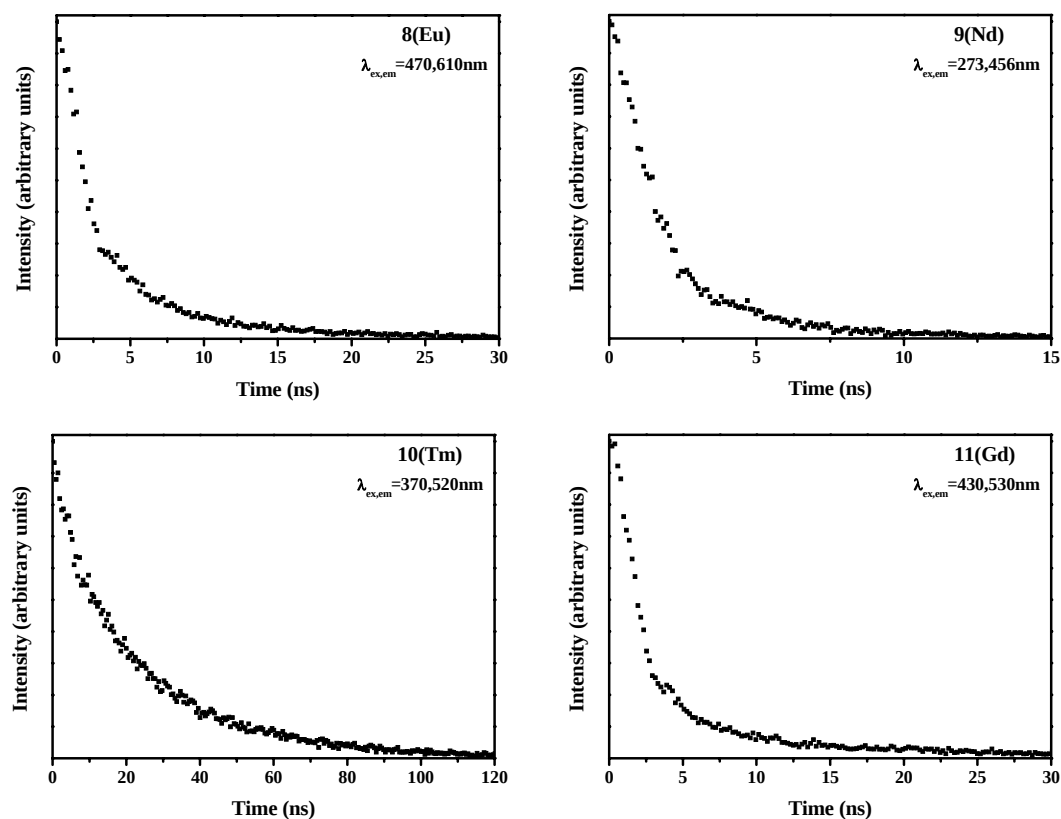


Fig. S8 Room-temperature solid-state fluorescent intensity as a function of time for 8-11.

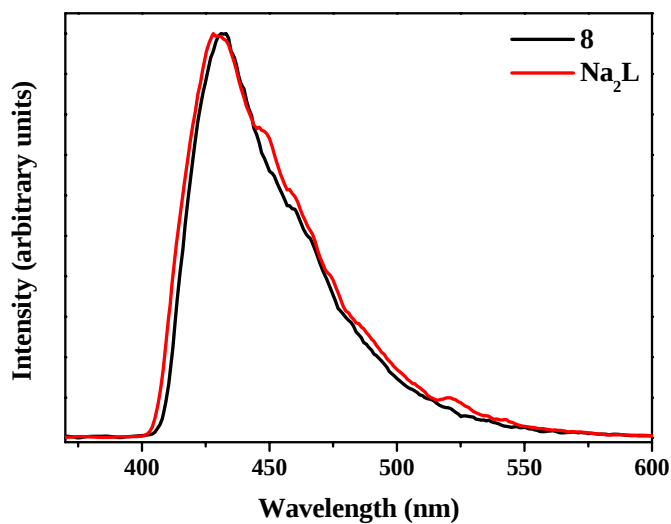


Fig. S9 Normalized emission spectra for solid **8** and Na_2L in DMSO solution under excited at 330 nm.