

Lanthanide luminescent mesomorphic complexes with macrocycles derived from diaza-18-crown-6

Stéphane Suárez,^a Olimpia Mamula,^a Rosario Scopelliti,^a Bertand Donnio,^b Daniel Guillon,^b Emmanuel Terazzi,^c Claude Piguet,^c and Jean-Claude G. Bünzli^{*a}

^a *École polytechnique fédérale de Lausanne (EPFL), Laboratory of Lanthanide Supramolecular Chemistry, Swiss Federal Institute of Technology, BCH 1402, CH-1015 Lausanne, Switzerland.*
E-mail: E-mail: jean-claude.bunzli@epfl.ch

^b *Institut de Physique et Chimie des Matériaux de Strasbourg, Groupe des Matériaux Organiques, UMR 7504 CNRS-Université Louis Pasteur, BP 43, 23, rue du Loess, F-67034 Strasbourg Cedex 2, France.*

^c *Department of Inorganic, Analytical and Applied Chemistry, University of Geneva, 30 quai E. Ansermet, CH-1211 Geneva 4, Switzerland*

Electronic Supplementary Information
(5 pages)

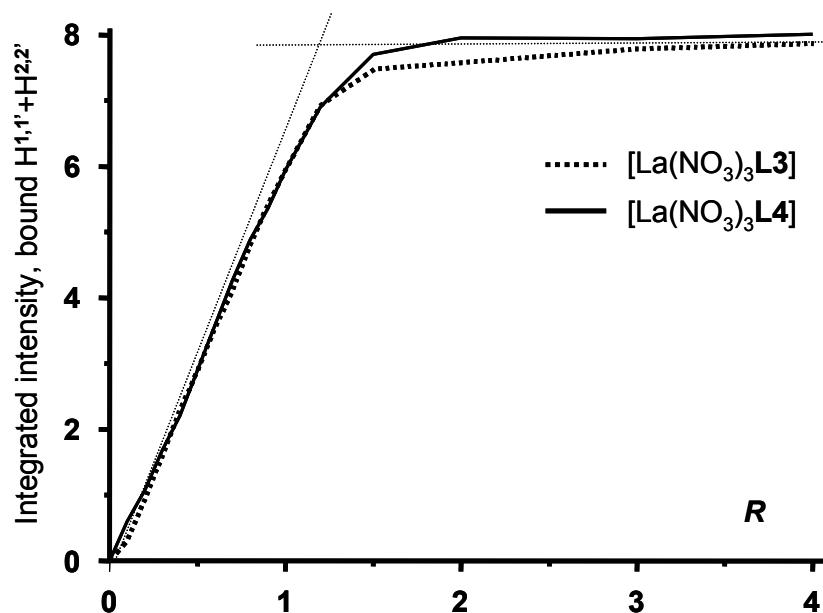


Figure S1. Plot of the integrated intensity of the resonances from bound ligand assigned to $\text{H}^{1,1'} + \text{H}^{2,2'}$ versus the ratio $R = [\text{La}]_{\text{tot}}/[\text{L}]_{\text{tot}}$, in deuterated THF at 298 K.

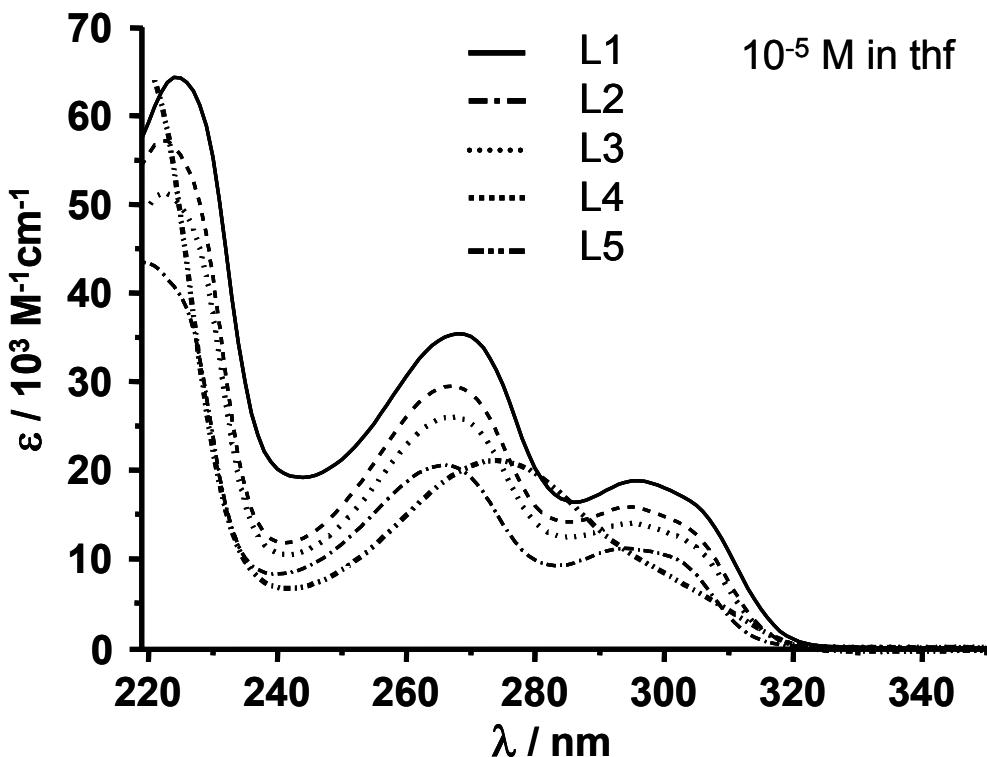


Figure S2. Absorption spectra of the ligands at 298 K.

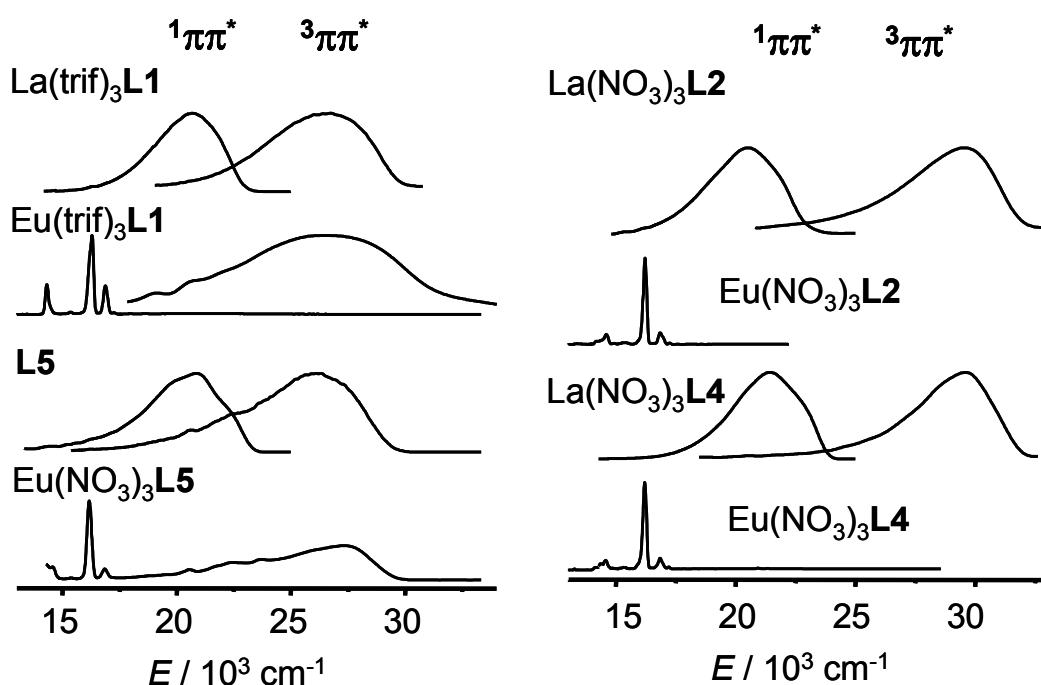


Figure S3. Emission spectra of the complexes at 77 K (solid state samples, excitation on ligand bands).

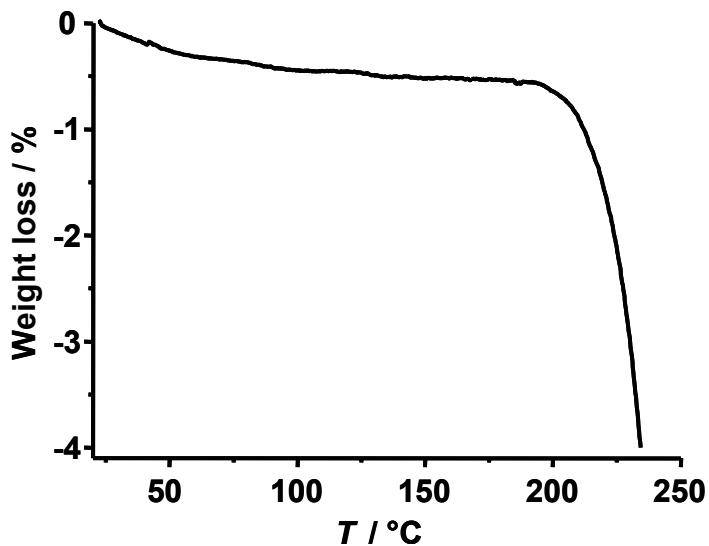


Figure S4. Thermogravimetric analysis of the Eu(NO₃)₃L3·0.5H₂O complex showing the loss of water and the decomposition above 200 °C