

**Supporting Information for:**

**Understanding the Selective Extraction of the Uranyl Ion  
from Seawater with Amidoxime-Functionalized  
Materials: Uranyl Complexes of Pyrimidine-2-amidoxime**  
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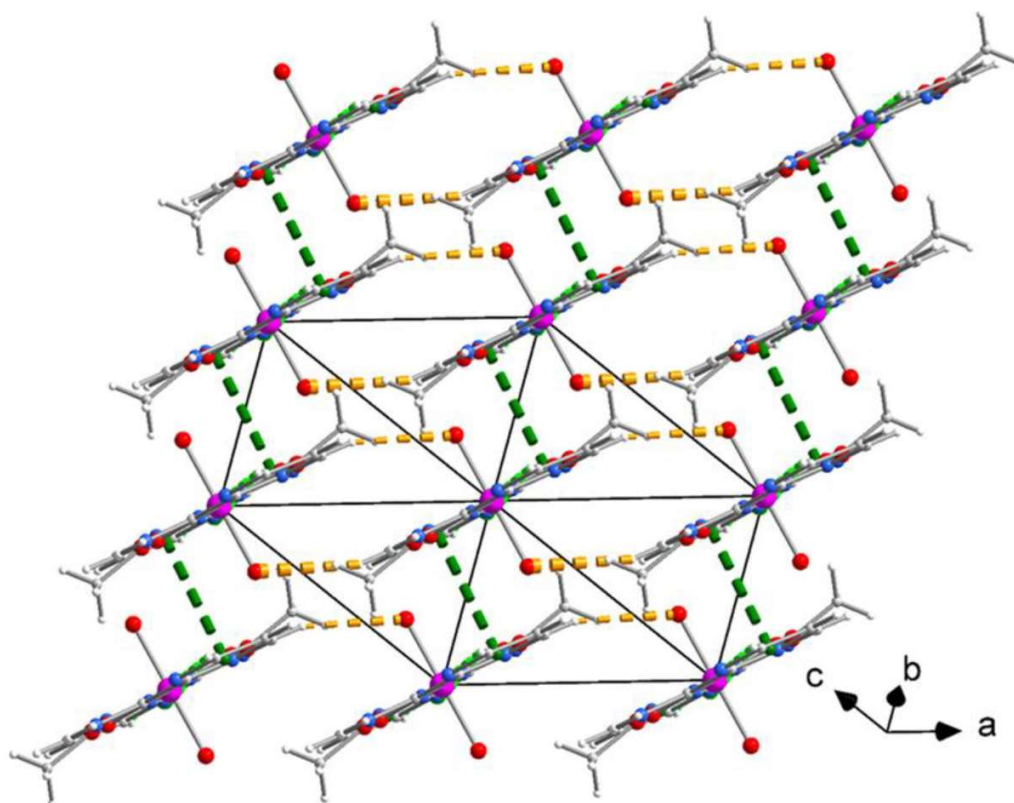
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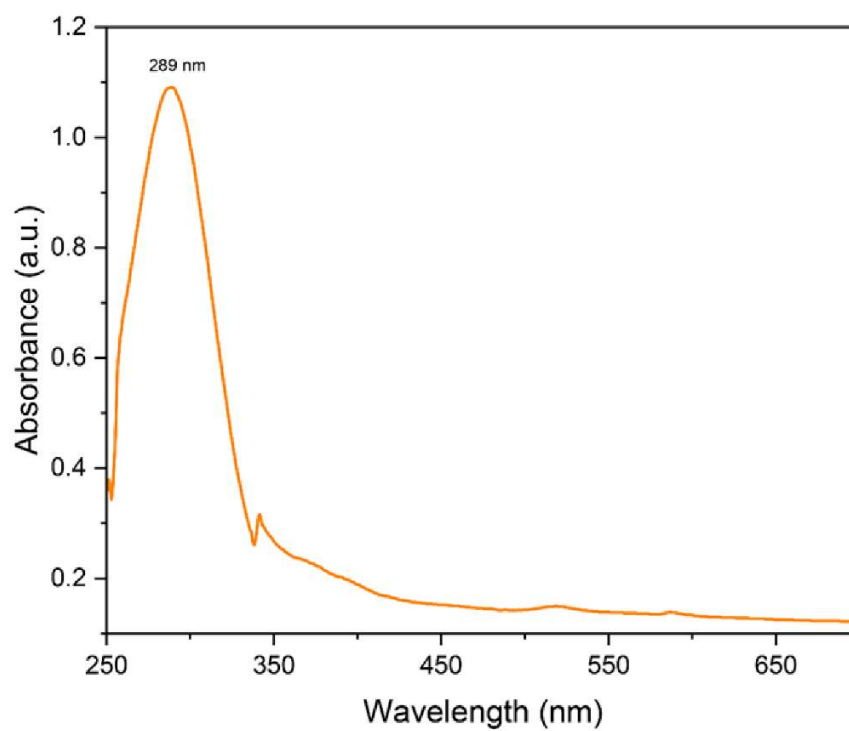
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† Dedicated to Professor Albert Escuer for His Contributions to Inorganic Chemistry: A Great Scientist and a Precious Friend.

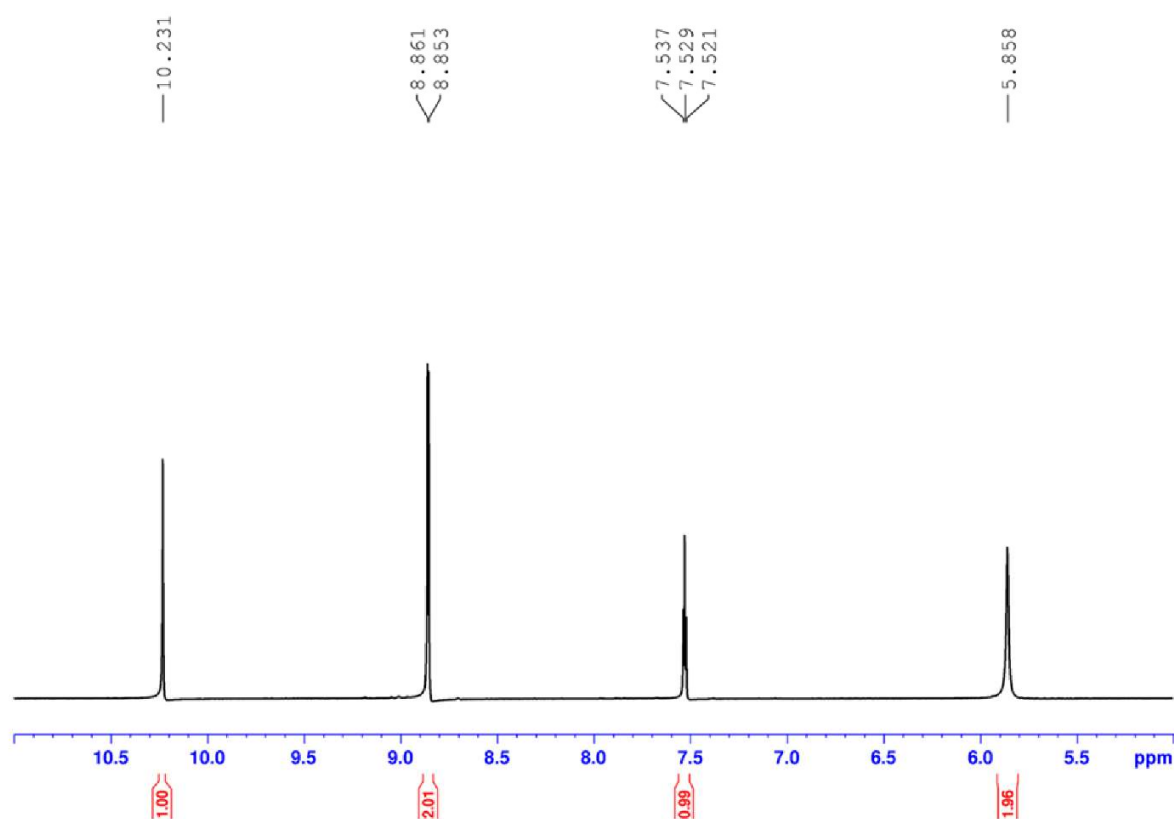


**Figure S1.** The packing of molecules in the crystal structure of  $[\text{UO}_2(\text{pmadH})_2(\text{MeOH})_2]$  (**1**), viewed along the  $[1,-1,1]$  direction. Dashed light green, dark green and orange lines represent  $\text{C5-H(C5)}\cdots\text{N3}$  hydrogen bonds,  $\pi$ - $\pi$  stacking interactions and  $\text{C3-H(C3)}\cdots\text{O3}$  hydrogen-bonding interactions, respectively. For metric parameters, see Table 3.

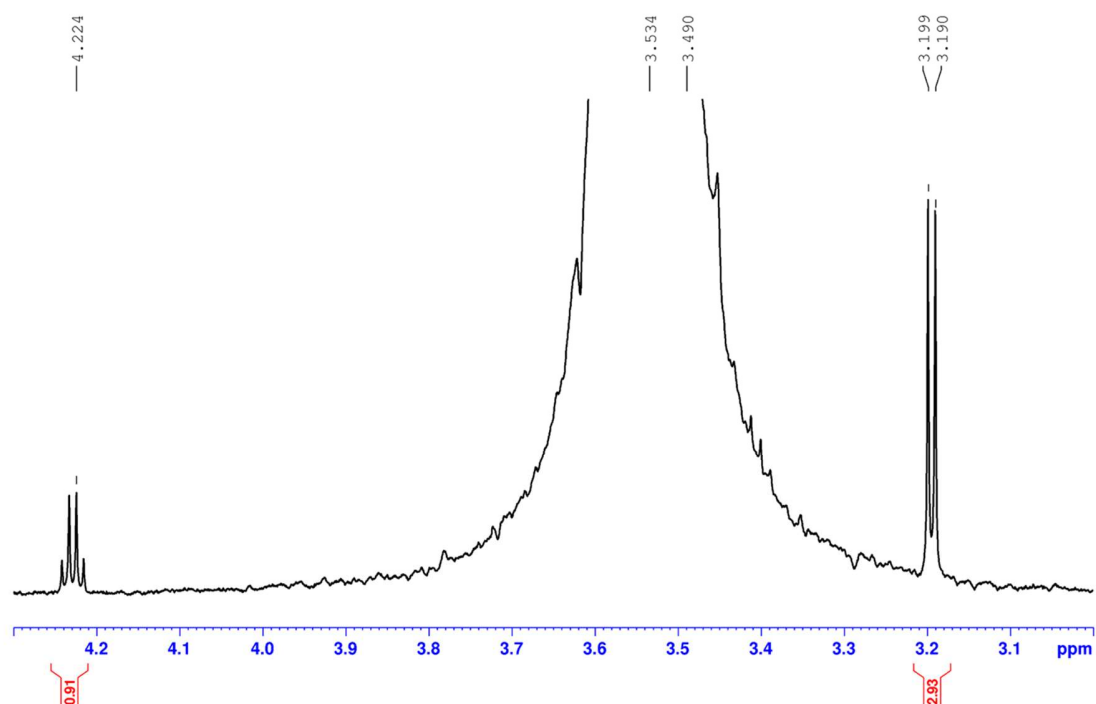


**Figure S2.** The UV/Vis spectrum of  $[\text{UO}_2(\text{pmadH})_2(\text{MeOH})_2]$  (**1**) in DMSO. The 340 nm peak is a ghost peak due to the instrument used.

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**Figure S3.** The  $^1\text{H}$  NMR spectrum of free pmadH<sub>2</sub> in d<sub>6</sub>-DMSO in the  $\delta$  11.00-5.00 ppm region.



**Figure S4.** A part of the  $^1\text{H}$  NMR spectrum of  $[\text{UO}_2(\text{pmadH})_2(\text{MeOH})_2]$  (**1**) in  $\text{d}_6$ -DMSO showing the MeOH protons. The signal at  $\delta \sim 3.5$  ppm is due to the protons of the  $\text{H}_2\text{O}$  content of the deuterated solvent and to the coordinated hydroxide protons (see text for discussions), see Eqs. (4)-(6) of the main body of the ms.