

2,5-Diformylbenzene-1,4-diol: A Versatile Building Block for the Synthesis of Ditopic Redox-Active Schiff Base Ligands

Tonia Kretz, Jan Willem Bats, Hans-Wolfram Lerner, and Matthias Wagner

Institut für Anorganische Chemie, Johann Wolfgang Goethe-Universität Frankfurt am Main,
Max-von-Laue-Straße 7, 60438 Frankfurt am Main, Germany

Reprint requests to Prof. Dr. Matthias Wagner. Fax: +49 69 798 29260.
E-mail: Matthias.Wagner@chemie.uni-frankfurt.de

Z. Naturforsch. **2007**, *62b*, 66–74; received July 24, 2006

2,5-Diformylbenzene-1,4-diol (**5**) is a well-suited starting compound for the preparation of ditopic hydroquinone-based ligands. Here, we report an optimized synthesis of **5** which improves the overall yield from published 7 % to 42 %. Three new ditopic Schiff base ligands, 2,5-[*i*Pr₂N(CH₂)₂N=CH]₂-1,4-(OH)₂-C₆H₂ (**8**), 2,5-(pyCH₂N=CH)₂-1,4-(OH)₂-C₆H₂ (**9**), and 2,5-[py(CH₂)₂N=CH]₂-1,4-(OH)₂-C₆H₂ (**10**), have been synthesized from **5** and structurally characterized by X-ray crystal structure analysis (py = 2-pyridyl).

Key words: Aldehydes, N,O Ligands, π -Interactions, Quinones, Tridentate Ligands