

Coinage metal complexes of 3,5-bis(trifluoromethyl)pyrazolate ligand

Synthesis and characterization of $\{[3,5-(CF_3)_2Pz]Cu\}_3$ and $\{[3,5-(CF_3)_2Pz]Ag\}_3$

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Received 19 October 1999; accepted 24 November 1999

Abstract

Copper(I) and silver(I) adducts of $[3,5-(CF_3)_2Pz]^-$ have been prepared in good yield by reacting the corresponding metal(I) oxide with pyrazole $[3,5-(CF_3)_2Pz]H$. 1H , ^{13}C , ^{19}F NMR spectroscopic data as well as their X-ray crystal structures are presented. The copper adduct is trimeric in the solid state. The silver complex exists both as trimers and pairs of trimers. The trimer pairs show weak Ag–Ag interactions (Ag...Ag distance = 3.3073(13) Å). © 2000 Elsevier Science S.A. All rights reserved.

Keywords: Coinage metal complex; $\{[3,5-(CF_3)_2Pz]Cu\}_3$; $\{[3,5-(CF_3)_2Pz]Ag\}_3$; Pyrazolate, Copper, Silver, Fluoro ligand
