

Darstellung und Charakterisierung von Bis(trichlorsilyl)phenylamin und 2,2,4,4-Tetrachlor-1,3-diphenyl-[1,3,2,4]diazadisiletidin

Preparation and Characterization of Bis(trichlorosilyl)phenylamine and 2,2,4,4-Tetrachloro-1,3-diphenyl-[1,3,2,4]diazadisiletidine

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Cross Linking, Silazanes

Bis(trichlorsilyl)phenylamine (**1**) and 2,2,4,4-tetrachlor-1,3-diphenyl-[1,3,2,4]diazadisiletidine (**2**) have been synthesized as potential precursors for the preparation of porous oxygen-free solids by the reaction of tetrachlorosilane with dilithiated aniline. Both compounds were characterized by crystal structure analysis. **1** crystallizes monoclinically, $P2_1/n$, $a = 10.124(2)$, $b = 12.701(2)$, $c = 11.425(3)$ Å, $\beta = 109.34(2)^\circ$ and $Z = 4$ ($R_1 = 4.6\%$, $wR_2 = 11.6\%$, 1297 independent reflections). **2** crystallizes orthorhombically, $Pbca$, $a = 11.42(1)$, $b = 8.17(1)$, $c = 17.05(1)$ Å, and $Z = 4$ ($R_1 = 3.7\%$, $wR_2 = 8.2\%$, 1923 independent reflections). Ammonolyses and polycondensation of **1** and **2** yield amorphous solids with low porosities.