



Figure 1 FTIR spectrum of DMATMS reaction with $\text{SiO}_2\text{-OH}$ (50x1s, 250°C, red) and subsequent exposure to TiCl_4 (50x1s, 250°C, blue). Peaks: a. isolated -OH b. weak H-bonded -OH c. strong H-bonded -OH d. C-H e. Si-H f. Si-CH₃ g/h. Si-O-Si i/j. Ti-O.