Supplementary Material (ESI) for PCCP

Molecular Organization of Hydrophobic Molecules and co-Adsorbed Water in SBA-15 Ordered Mesoporous Silica Material

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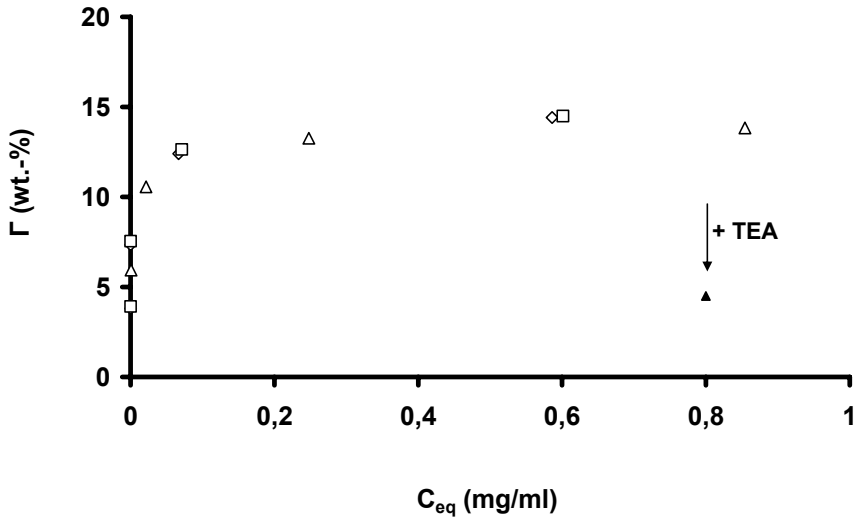

Figure ESI-1: Γ (wt.-%) weight fraction itraconazole adsorbed into SBA-15 as a function of C_{eq} (mg/ml) itraconazole equilibrium concentration in dichloromethane. The material was pretreated for one week at different relative humidities (RH-%) to obtain different water contents (WC-wt.-%): ◊ RH0 WC1.4 ; □ RH52 WC4.3 ; Δ RH97 WC38.4. Adsorption isotherms were corrected for the physisorbed water. Influence of addition of traces of triethylamine (TEA) on itraconazole adsorption (▲) with the RH0 WC1.4 SBA-15.

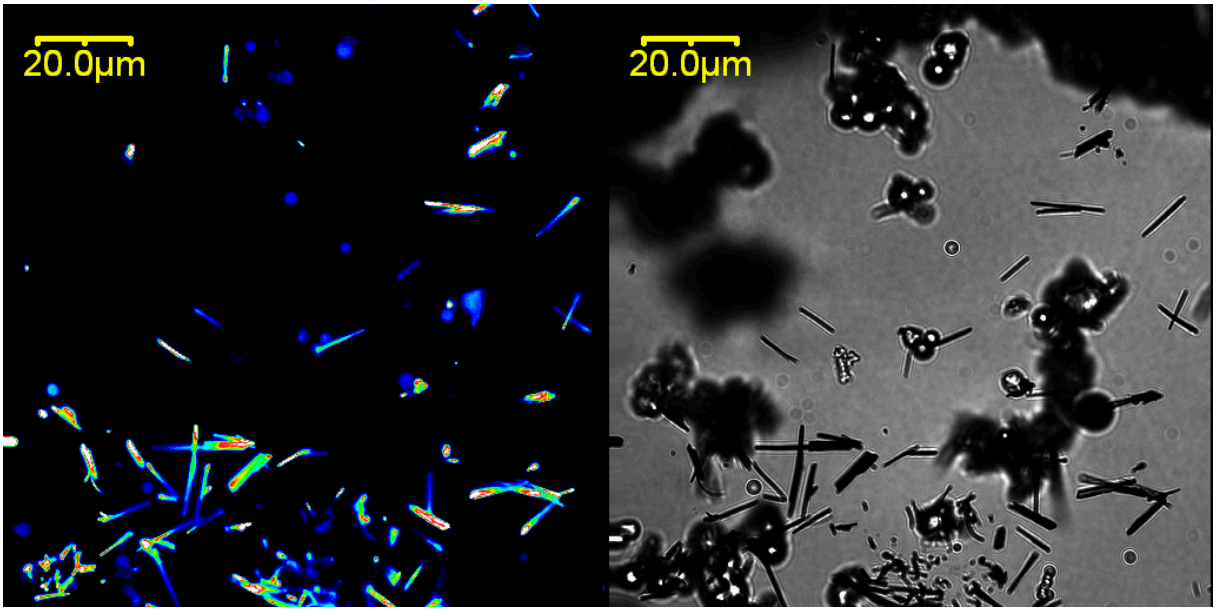

Figure ESI-2: Confocal fluorescence (left) and transmission images (right) of SBA-15 spheres loaded with Nile red and containing a pre-adsorbed water content of 1.4 wt.-% after 4 h exposure to SGF.

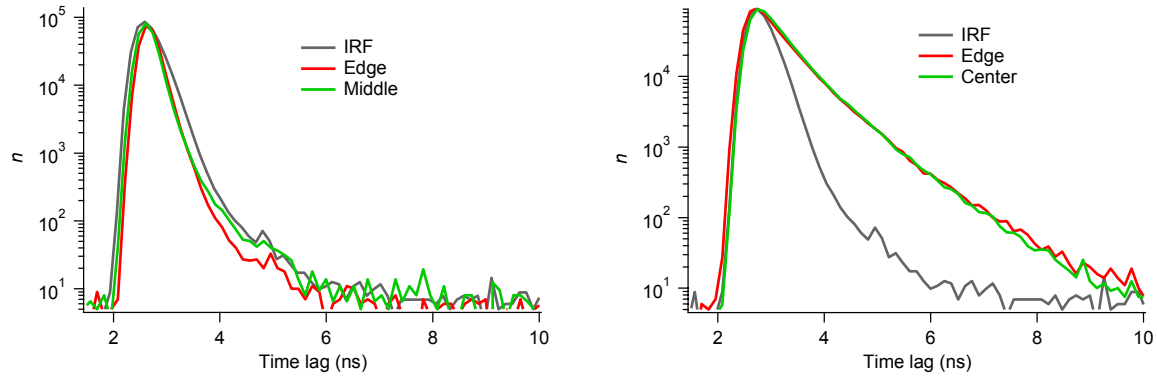

Figure ESI-3: Fluorescence decay curves of Nile red adsorbed into SBA-15 spheres with pre-adsorbed water content of 1.4 wt.-% (left) and 38.5 wt.% (right) after exposure to SGF. Decay curves originate from the edge and middle of the SBA-15 sphere. IRF represents the instrument response function.