

INFLUENCE OF THE CONTACT
BETWEEN WATER AND A HYDROPHOBIC
SURFACE ON SELF-DIFFUSION
OF WATER MOLECULES

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S u m m a r y

Using the method of quasi-elastic scattering of slow neutrons, the influence of the contact between distilled water and a hydrophobic surface (porous silica covered with trimethylsilane $[-\text{Si}(\text{CH}_3)_3]_n$) on self-diffusion of water molecules has been studied. It has been established that after the contact of water with the hydrophobic surface the self-diffusion constant of water molecules increases due to the enhancing of the water collective motions, the latter being a result of water clusterization.