MARTIAN WATER

To understand the present climate and evolutionary history of Mars, and the stability of water ice at its surface, as well as the habitability of Mars and the potential for using its resources, we need to understand the water on Mars. Questions include how much and how quickly water vapor settles near or on the ground. Research on how water interacts with the surface and atmosphere on Mars includes many specific processes.

The exchange of water between the Martian regolith and its atmosphere can occur as a result of physisorption (also called physical adsorption), salt hydration, brine (salty aqueous solution) formation and frost formation.