Exploring Cosmogenic Surface-Exposure Dating as a Tool for Dating Rock Glaciers

Middlebury College & North Dakota State University



Rock glaciers, like the one shown above, are mixtures of rock and ice that move slowly downslope in many mountain environments. A warming climate is causing ice within some rock glaciers to melt. We are studying the role of rock glaciers as sources of water and are using cosmogenic surface-exposure dating to determine how old this representative rock glacier in the Uinta Mountains of northern Utah is.





Visitors: Jeff Munroe and Ben Laabs Visit dates: Virtual visit during spring 2022

The samples were collected by Jeff Munroe (faculty, Middlebury College) and Ben Laabs (faculty, North Dakota State University). They were processed to clean quartz at North Dakota State before being sent to UVM for Be extraction.