

Abstract

The biological soil crust is composed of living microorganisms. In deserts it is mainly the non-vascular plants that constitute the soil crust. Protein, polysaccharide, NDVI and Organic carbon showed significant differences ($P < 0.05$) at all sites. Areas above waterfalls and non-agricultural contained more crust than those below and agricultural areas, respectively. The vegetative cover in the former sites reduced both wind and water erosion. However, areas below waterfalls had the highest protein due to the proximity of microorganisms to water that might have accumulated here during winter. The water facilitated accelerated metabolic activities of all microphytes