

Natural Resources Conservation Service

Soil Science Division

Soil Survey Region 12



Soil Survey Office at Paul Smiths, New York (12-PAS)

Painting with Soils Workshop

Purpose

Janella Cruz and Rebecca Fox, soil scientists in the USDA Natural Resources Conservation Service soil survey office in Paul Smiths, New York, led two *Painting with Soils* workshops at the Paul Smith's College Visitor Interpretive Center. The purpose of the workshop was to introduce soils in a fun way, and at the same time, educate the public about the importance of soils. Participants varied in age and had different levels of interest in soil. Two main groups were Paul Smith's college students who were interested in the environment and artists who wanted to try soils as an art medium.



Rebecca Fox, soil scientist, stands in front of the class and demonstrates different methods of creating soil paint.

Materials used in the first workshop were soil horizons, or layers, extracted from soil profiles that were collected on the college property. A soil profile is a vertical section of the soil that is exposed by a hole that is dug from the surface of the soil to the underlying bedrock. The soils used for the workshop are called Spodosols, and they are commonly found throughout the Adirondack Mountains. Spodosols typically have bleached or light-colored horizons and reddish or dark brown horizons. The properties of these soils provided several different colors for the workshop participants to use.

For the second workshop, there were two additional colors — green and black soils that were collected from New Jersey and Orange County, New York. The New Jersey green soil was found in shallow marine environments and made primarily of glauconite, a mineral that gives the soil its dark green color. The black soil from Orange County formed from decomposed organic matter, which gives the soil its black color. These soils are in reclaimed swampland that is used primarily for vegetable production. As the participants painted, Cruz and Fox facilitated conversations about soil properties and about the processes that cause different colors in the soil to occur.



Participants painting with soils during one of the workshops held at Paul Smith's College in New York.

Key Outcomes

The soil survey staff received positive feedback from the workshops. Several participants requested that additional workshops be held in the future. The workshops introduced the topic of soils to people who otherwise might not have been interested. The painting with soils activity provided an excellent opportunity for participants to not only celebrate the beauty of soil, but also to think about soil as an essential natural resource. After the workshop, many participants expressed a desire to learn more about soils. Participants were directed to the Web Soil Survey and the NRCS soil education page. Because of the success of these workshops, Paul Smith's College has asked the soil survey staff to lead an additional workshop in August.



Examples of paintings made with soils during the workshop.