



SOIL AND PLANT SCIENCE DIVISION

Technical Soil Services

South Central Soil Survey Region

Kerrville, Texas, MLRA Soil Survey Office

4-H District Soil Judging Contest

Purpose

The 4-H soil judging contest provides 4-H members the opportunity to learn about soils. Local 4-H staff asked the Kerrville, Texas, MLRA Soil Survey Office staff to dig and describe the soil pits for the contestants to evaluate.

Background

Prior to his field visit, Travis Waiser identified a location with differing soil features in Gillespie County, Texas. Once he was in the field, he determined pit locations and took soil samples for particle size analysis. During the week of April 12–19, Travis Waiser, Jarred Goedeke, Ed Janak, and Willie Crenwelge prepared for the District 10, 4-H soil judging contest. Waiser analyzed soil characteristics both in and out of the soil pit to accurately populate soil judging answer keys. He evaluated soil texture, structure, consistency, depth, slope, and erosion at four soil pits (fig. 1) to help decide infiltration rate, runoff potential, permeability, and site drainage for each pit. On Wednesday, April 17, the soil judging contest took place from 9:00 a.m. to 12:00 p.m.

There were 31 students in attendance, representing multiple counties. County agents, parents, and coaches also attended, bringing total attendance to forty-eight people. Once students completed the soil judging contest (fig. 2), Waiser walked through each pit and explained how to make soil assessments.

Key Outcomes

The 4-H soil judging contest is a great opportunity for students from third to twelfth grade to gain exposure to soil science, a potential degree opportunity in college, and a possible career as a soil scientist. The Kerrville staff enjoy helping teach students and coaches more about soil. The students, parents, and coaches all gain knowledge and understanding of the different soils across the landscape and see soil science as an exciting career path.



Figure 1.—The four soil pits evaluated during the contest.



Figure 2.—A 4-H contestant texturing the subsoil during the contest.