



# Soil and Plant Science Division Technical Soil Services South Central Soil Survey Region

## Soils Class for Future Master Gardeners

### Rosenberg, Texas, Major Land Resource Area (MLRA) Soil Survey Office (SSO)

#### Purpose

The Fort Bend County Extension Office staff contacted the Rosenberg MLRA SSO (fig. 1) to request a soils class as part of a Master Gardeners Course. On September 25, 2025, Scott Cardenas and Stacey Kloesel, soil scientists from the Rosenberg MLRA SSO, met with dozens of local gardeners in the community to teach them how to identify and sample soils.

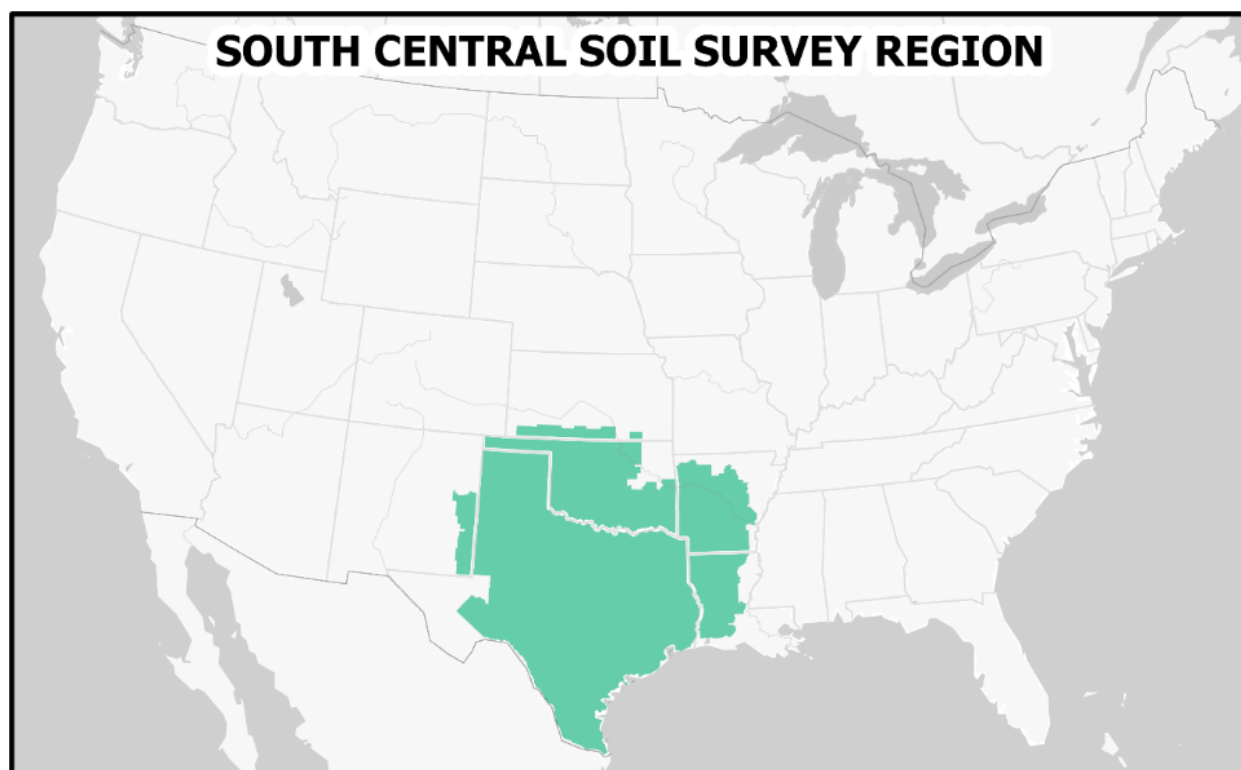


Figure 1.—The Rosenberg MLRA SSO is part of the South Central Soil Survey Region.

## Background

Every year, the Fort Bend County Extension Office offers a Master Gardeners Course for community members to learn skills for advanced gardening techniques. The curriculum includes a soils class as part of the gardening education required for gardeners to be certified as master gardeners.

Cardenas and Kloesel explained the importance of knowing the soil when gardening and how each plant prefers a unique soil. They talked about how soils develop and form from different parent materials and how the gardeners could identify the soils in their own backyards (fig. 2). Cardenas and Kloesel emphasized healthy garden practices and showed the gardeners how to take soil samples from their gardens to submit to a laboratory if they suspected any nutrient deficiencies or deterring pH balances. They demonstrated how soil scientists use different soil sampling techniques to conduct a soil survey (fig. 3). Cardenas and Kloesel also explained how the gardeners could access the soil and ecological data that is available to the public on Web Soil Survey.



**Figure 2.—Scott Cardenas and Stacey Kloesel teaching future master gardeners how to view the layers in their soil by viewing a small hole.**





Figure 3.—Scott Cardenas showing the class soil sampling tools used by soil scientists.

## Key Outcomes

The soils class portion of the Master Gardeners Course was a great experience for all involved. The gardeners were amazed to learn about the different soil horizons and how each horizon can have its own limitations or benefits. Throughout the class, Cardenas and Kloesel were able to talk directly to members of the public about the importance of soil knowledge, conservation practices, and how Web Soil Survey can give easy access to soil and ecological information on their own property.