

Plant Species Diversity

Texas Quail Index

Summary: Observers will estimate species diversity of forbs during two seasons (spring and fall) at each mile marker.

Purpose: Quail need a diverse plant community. Forbs are especially important for insect and seed production. Cooperators will learn how to identify key forb species important for quail and to assess their seasonal abundance. These estimates of species diversity will be correlated with quail abundance estimates.

Supplies: hula hoop, digital camera, clipboard, Forb Diversity data sheet, calculator

Methods:

1. A pair of estimates will be obtained for each mile marker. Samples should be measured at right angles to the road.
2. Have assistant step away from road (at a right angle) a total of 25 steps. Facing the road, toss the hula hoop over your shoulder to get a random sampling point.
3. Count the number of different species of forbs encountered. It is recommended that you take a vertical photo of the plot; be sure and include a clipboard or enamel board with mile marker - plot identification (e.g., T1-3-R). Enter these results on the Forb Diversity data sheet.
4. Identify the most common species observed. Take good quality digital photographs and/or collect specimens and press them for identification later. Be able to at least list unknowns from among various mile markers (i.e., if you list a species as "Unknown 1", be consistent throughout the transect that this plant is "Unknown 1").
5. Take sample from opposite side of road. Repeat until all 11 stations are recorded; should be a total of 22 entries on data sheet.