

### #3 *Quercus emoryi* / Mixed Perennial Grass Tree Savanna Association (P)

#### Emory oak / Mixed Perennial Grass Tree Savanna Association

This savanna community is characterized by a sparse (<15%) canopy dominated by Emory oak (*Quercus emoryi*) with a diverse matrix of perennial grasses (43%) in the field stratum (<0.5 m). Emory oak (*Q. emoryi*) is typically present as a small tree or a large tree-like shrub with heights of 3–4 meters [to 5 m], often increasing when growing in small drainages or on more sheltered, northerly aspects. This species provides an average of 9% cover across the community, with values ranging up to 20% in some locations. Mexican blue oak (*Quercus oblongifolia*) and Arizona white oak (*Quercus arizonica*) are occasional components of this community, with average cover around 1% and rarely up to 3%. Common sotol (*Dasyllirion wheeleri*), beargrass (*Nolina microcarpa*), and California brickellbush (*Brickellia californica*) are the most consistent and widespread subcanopy components, providing cover of 1–3% throughout. The field stratum (<0.5 m) is characterized by a dense (45%), diverse matrix of native and non-native perennial grasses dominated by single threeawn (*Aristida schiedeana*), sideoats grama (*Bouteloua curtipendula*), bullgrass (*Muhlenbergia emersleyi*), Lehmann lovegrass (*Eragrostis lehmanniana*), Texas bluestem (*Schizachyrium cirratum*), and tanglehead (*Heteropogon contortus*). Local dominance is highly variable, with areas solely dominated by one species or evenly split across many.

#### Common species

*Quercus emoryi*  
*Quercus oblongifolia*  
*Dasyllirion wheeleri*  
*Eragrostis lehmanniana*  
*Aristida schiedeana*

Overall, this community covers 8.0% (156 ha, 385 ac) of the park, mainly on south- to-southeast facing back-slopes of varying grades at 1,540–2,050 meters (5,025–6,725 ft). The primary examples of this community are on south-facing slopes east of Yaqui Ridge and on the exposed slopes of Montezuma Peak.

