

77. *Pinus ponderosa* / *Quercus arizonica* - *Quercus emoryi* Woodland Association

Ponderosa pine / Arizona white oak - Emory oak Woodland Association

This woodland community is characterized by a moderately dense (40–60% cover) canopy (>5 m) dominated by emergent ponderosa pine (*Pinus ponderosa*) above Arizona white oak (*Quercus arizonica*) and Emory oak (*Quercus emoryi*), with a variable understory often composed of bullgrass (*Muhlenbergia emersleyi*). This species is the primary overstory species, with all others typically present in the mid-canopy or as shrubby individuals in the understory. Arizona white oak (*Q. arizonica*) and Emory oak (*Q. emoryi*) are consistent (1.0) subdominants to ponderosa pine (*P. ponderosa*), as medium-sized (5–15 m) trees with average cover of around 10% each. The subcanopy stratum (0.5–2 m) is generally quite sparse (<5% cover), with no consistent dominants or associates. The moderately sparse (10–20% cover) field stratum (<0.5 m) is characterized by the consistent presence (1.0) and typical dominance of bullgrass (*M. emersleyi*). On average, this species provides around 15% cover, typically in areas with low overstory canopy.

Common species

- *Pinus ponderosa*
- *Quercus arizonica*
- *Quercus emoryi*
- *Muhlenbergia emersleyi*

This community covers 0.007% (1.9 ha/4.7 ac) of the Rincon Mountain District and occupies only one location, a small basin east of Juniper Basin Campground. It is typically found on low-angle (20%) slopes and in sheltered basins around 1,900 meters (6,233 ft). The surface cover is characterized by moderately deep and well-drained loam underlying a thick layer of pine-needle litter and duff with patchy boulders and bedrock outcrops. The parent material is a mix of quartz monzonite and mica schist.



