

Coconino National Forest Plan Revision

## Alpine Tundra

### General description

- 941 acres of alpine tundra occurs in the Kachina Peaks Wilderness, beginning around 10,600 feet elevation continuing to the top of Humphrey's Peak, the highest point in Arizona. This is the only alpine tundra and area of bristlecone pine on Forest Service land in Arizona and is one of the southernmost extents of alpine tundra in the continental United States.
- Alpine tundra consists of three main habitat associations: boulder fields, talus slopes, and meadows. Krummholz (areas of dwarfed, wind twisted trees) occurs near tree line where trees transition to alpine tundra vegetation. It is typically barren with sparse vegetation including grasses, forbs, lichens and low shrubs. It supports a federally threatened plant, San Francisco Peaks groundsel (*Packera franciscanus*) found only in the Coconino National Forest, as well as other endemic species.
- Vegetation is controlled by presence of soil, wind, snow accumulation, slope, and aspect. Episodic weather related factors are the major natural disturbance processes and include extreme temperatures, solar radiation, winds, avalanches, and moisture. Wildland fires and invasive or noxious weeds have had little to no effect on this habitat.
- Major human disturbances include developed recreation from the adjacent ski area and year-round dispersed recreation, mainly outside of winter. On trails, like the popular hike leading to Humphrey's Peak, trampling can kill plants.

### Desired Condition

- The ecosystem diversity of alpine tundra is maintained. It maintains the ecological attributes and processes that allow it to provide watershed values, habitat for native biota, panoramic vistas, and/or solitude. The mountain maintains attributes that provide historic and cultural values. It displays a diverse composition of native species and vegetation communities (including boulder fields, talus slopes, and meadows). Invasive species are absent. Recreation use, ecological attributes, and tribal values maintain the uniqueness of the vegetation.
- The alpine ecosystem provides habitat for San Francisco Peaks groundsel and is able to support and sustain rare or endemic species and continues to be resilient to natural and human-caused impacts.

Working Draft – text under development, subject to change  
Public input is welcome and would be most useful if received by December 10, 2010.  
No text is final until Plan approval in Fall 2012.

**Objectives** – *[none currently identified]*

**Standard**

- Recreation activities and new route construction shall avoid important habitats and result in little additional areas of disturbance.

DRAFT