

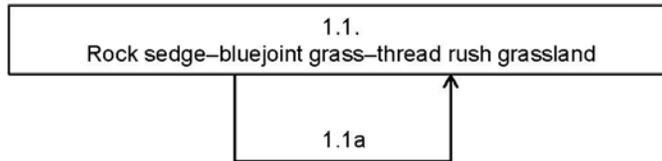
Ecological Site Description ID:	R236XY110AK—Western Alaska Maritime Graminoid Loamy Depressions
Ecological Dynamics of the Site:	
<p>This western Alaska maritime ecological site is located in lowland depressions. These areas are typically found at elevations between 140 and 980 feet with slopes of 0 to 2 percent. Slope aspect does not appear to influence the plant community dynamics of this site as it is found on all aspects.</p> <p>This ecological site is correlated to soil component D36-Western maritime grass loamy depressions. Soil characteristics that are likely to influence plant community dynamics include a cryic soil temperature regime, an udic moisture regime with moderate permeability to a depth of 40 inches, and a moderately acidic to very strongly acidic (pH 5.8 to 4.6) first mineral horizon. Organic material content in the surface layer normally ranges from 8 to 15 percent. Annual precipitation ranges from 28 to 57 inches, and the annual frost-free period is typically between 80 and 140 days. Parent material consists of gravelly drift.</p> <p>The reference community phase is typified by patchy grassland with various graminoid species and areas of unvegetated bare soil and surface rock fragments. There are no similar landforms within the survey area that support a comparable reference community phase. Ecological sites R236XY107AK (Western Alaska Maritime Scrub Gravelly Drainages), R236XY108AK (Western Alaska Maritime Graminoid Peat Flood Plains), and R236XY109AK (Western Alaska Maritime Graminoid Peat Drainages) support hydrophilic plant communities in western Alaska lowland areas within the survey area; however, the reference community phases of these ecological sites support low and medium shrubs. It is suspected that differences in the soil moisture regime, soil surface pH, parent material, soil drainage class, and runoff potential may be responsible for the dissimilarities between the reference state, community phases, and disturbance regimes among these ecological sites.</p> <p>No known major disturbance regime is associated with this ecological site; thus, only a reference community phase is described. Throughflow and overflow from precipitation and snowmelt as well as potential snowpack in these depressions results in permanently ponded, non-vegetated areas. This ecological site surrounds these areas. These soils are somewhat poorly drained and have low runoff potential. Ponding occurs occasionally for brief periods from April through October, though a year-round water table can be found at a depth of 6 to 28 inches. This community, which is species rich in facultative to obligate wetland species, is capable of weathering these periods. Minor natural variations in plant richness and cover may be evident, but no data suggests that a community-altering ponding disturbance exists that requires establishment of an early community phase.</p> <p>Slight to moderate grazing of sedges by moose is possible on this ecological site, but it does not appear to affect the ecological processes enough to alter the community significantly.</p> <p>No alternative states for this ecological site have been observed.</p> <p>This report provides baseline vegetation inventory data for this ecological site. Future data collection is needed to provide further information about existing plant communities and any possible disturbance regimes within this ecological site.</p>	

State and Transition Diagram:

Western Alaska Maritime Graminoid Loamy Depressions

R236XY110AK

1. Reference State



LEGEND  
1.1a = Ponding

State ID Number:	1	State Name:	Reference State
Phase 1.1			
Community Phase Number:	1.1	Community Phase Name:	Rock sedge-bluejoint grass-thread rush grassland
Community Phase Narrative:			
<p>The reference community phase for this ecological site is characterized by grassland with areas of unvegetated soil and surface rock fragments. Overall plant productivity is visually estimated to occur primarily among graminoids with shrub and forb production being relatively small and in equal amounts. Typically, this community consists dominantly of medium and tall graminoids, including rock sedge (<i>Carex saxatilis</i>), bluejoint grass (<i>Calamagrostis canadensis</i>), tufted hairgrass (<i>Deschampsia cespitosa</i>), and thread rush (<i>Juncus filiformis</i>). Several other species of rushes (<i>Juncus spp.</i>) and sedges (<i>Carex spp.</i>) may also be present. Water-tolerant shrubs and forbs are common, but generally not in abundance. They may include arctic raspberry (<i>Rubus arcticus</i>), bog rosemary (<i>Andromeda polifolia</i>), violets (<i>Viola spp.</i>), and purple marshlocks (<i>Comarum palustre</i>). Moss ground cover can vary (total mean cover ~38 percent). Other ground cover generally includes herbaceous litter (~33 percent). About 9 percent of the surface is covered with rock fragments. About 18 percent is bare soil.</p>			

### Community Phase Canopy Cover

(Vegetation data in the table are provided as constancy (percent) and average canopy cover (percent) of the most dominant and ecologically relevant species for this community phase.)

Plant group	Common name	Scientific name	USDA plant code	Constancy (percent)	Average canopy cover (percent)
S	Arctic raspberry	<i>Rubus arcticus</i>	RUAR	66.7	1.6
G	Bluejoint grass	<i>Calamagrostis canadensis</i>	CACA4	100.0	10.7
G	Rock sedge	<i>Carex saxatilis</i>	CASA10	66.7	35.0
G	Thread rush	<i>Juncus filiformis</i>	JUFI	66.7	3.5
F	Violet	<i>Viola spp.</i>	VIOLA	66.7	2.1

Note: The vegetation and soils for this reference community were sampled at three separate locations. Due to the limited data available for this community phase, personal field observations were used to aid in describing this plant community.

#### Community Pathways

Pathway Number	Pathway Name & Description
1.1a	<p>Ponding.</p> <p>Throughflow and overflow from precipitation and seasonal snowmelt may result in ponding. This community is rich in hydrophilic species, and it appears to be capable of withstanding the anoxic conditions commonly caused by ponding. Minor natural variations in plant richness and cover may be evident, but no <i>in situ</i> data or observations suggest the presence of a community-altering disturbance that would require an early flooding or ponding community phase.</p>

*This report is interim and subject to change.*