

Ecological site R070AY013NM Salt Meadow

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Rangeland health reference sheet

Interpreting Indicators of Rangeland Health is a qualitative assessment protocol used to determine ecosystem condition based on benchmark characteristics described in the Reference Sheet. A suite of 17 (or more) indicators are typically considered in an assessment. The ecological site(s) representative of an assessment location must be known prior to applying the protocol and must be verified based on soils and climate. Current plant community cannot be used to identify the ecological site.

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Approved by	Kendra Moseley
Approval date	
Composition (Indicators 10 and 12) based on	Annual Production

Indicators

1. **Number and extent of rills:** None

2. **Presence of water flow patterns:** None

3. **Number and height of erosional pedestals or terracettes:** None

4. **Bare ground from Ecological Site Description or other studies (rock, litter, lichen, moss, plant canopy are not bare ground):** Bare Ground 10 to 20 percent

5. **Number of gullies and erosion associated with gullies:** None

6. **Extent of wind scoured, blowouts and/or depositional areas:** None

7. **Amount of litter movement (describe size and distance expected to travel):** Typically slight, however during major flooding events this site slows water flow and captures litter and sediment.
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8. **Soil surface (top few mm) resistance to erosion (stability values are averages - most sites will show a range of values):** Stability class rating anticipated to be 5-6 at soil surface. This will need to be verified at reference area.
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9. **Soil surface structure and SOM content (include type of structure and A-horizon color and thickness):** SOM ranges from 3 to 4 percent. (La Brier) A1-0 to 6 inches; brown (7.5 YR 5/2) silty clay loam, dark brown (7.5 YR 3/2) moist; weak, medium subangular blocky structure parting to moderate coarse granular; slightly hard, very friable, slightly sticky and slightly plastic; many fine roots; many fine tubular pores; moderately alkaline.
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10. **Effect of community phase composition (relative proportion of different functional groups) and spatial distribution on infiltration and runoff:** Diverse grass, forb, shrub functional/structural groups and diverse root structure reduce raindrop impact and slow overland flow, providing increase time for infiltration to occur.
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11. **Presence and thickness of compaction layer (usually none; describe soil profile features which may be mistaken for compaction on this site):** None
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12. **Functional/Structural Groups (list in order of descending dominance by above-ground annual-production or live foliar cover using symbols: >>, >, = to indicate much greater than, greater than, and equal to):**
- Dominant: Warm-Season mid Bunchgrass>Warm-Season Sod=Cool-Season Mid Rhizomatous
- Sub-dominant: Warm-Season Sod>Warm-Season mid Sod Forming>Cool-Season Grass like,
- Other: Warm-Season Bunchgrass=Shrubs>Forbs
- Additional:
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13. **Amount of plant mortality and decadence (include which functional groups are expected to show mortality or decadence):** None to slight
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14. **Average percent litter cover (%) and depth (in):** Litter percent will be reduced following or during extended drought and or wildfire event.
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15. **Expected annual annual-production (this is TOTAL above-ground annual-production, not just forage annual-production):** (Low Production 1,200 pounds per acre) (Average RV Production 2,500 pounds per acre) (High Production 3,800 pounds per acre) Production can be reduced following extended drought or the first growing season following wildfire.
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16. **Potential invasive (including noxious) species (native and non-native). List species which BOTH characterize**

degraded states and have the potential to become a dominant or co-dominant species on the ecological site if their future establishment and growth is not actively controlled by management interventions. Species that become dominant for only one to several years (e.g., short-term response to drought or wildfire) are not invasive plants. Note that unlike other indicators, we are describing what is NOT expected in the reference state for the ecological site: Invasive plants should not occur in the reference plant community. However, salt cedar may infrequently invade if seed source is located near the site. Inland salt grass and foxtail barley are the major native (non-invasive) increasers on this site.

17. **Perennial plant reproductive capability:** All plants should be vigorous, healthy and reproductive depending on disturbances i.e. drought. Plants should have numerous seedheads, vegetative tillers etc. The only limitations are weather, wildfire, and natural disease that may temporarily reduce reproductive capability.
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