RESOURCE MANAGEMENT ON SHELDON-HART MOUNTAIN NATIONAL WILDLIFE REFUGE COMPLEX



SageCon Summit

2023

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SHELDON-HART MOUNTAIN NWR COMPLEX

Hart Mountain National Antelope Refuge

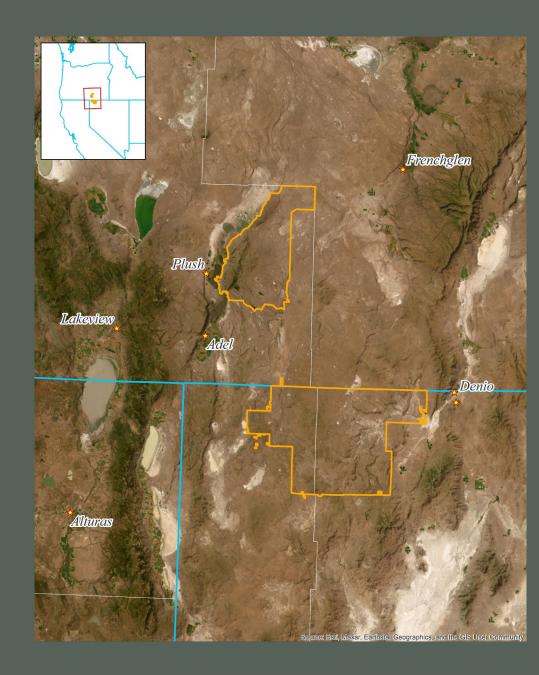
➤ Approx. 277,954 acres



Sheldon National Wildlife Refuge

➤ Approx. 576,506 acres





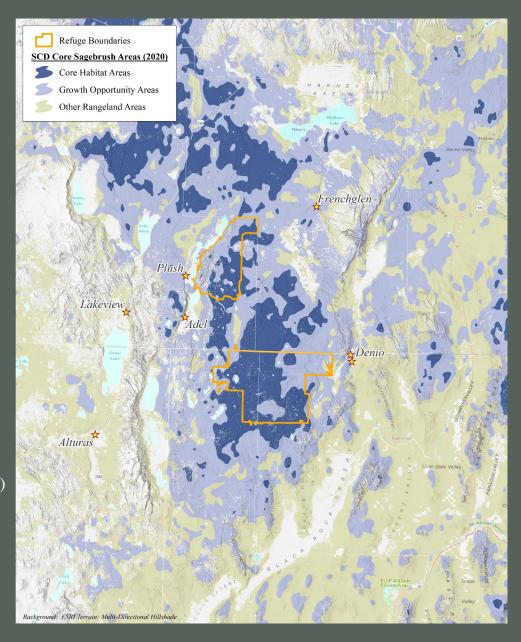
SAGEBRUSH CONSERVATION DESIGN (2020)

Hart Mountain National Antelope Refuge:

- Core Habitat Areas: 121,849 acres (43.5%)
- ➤ Growth Opportunity Areas: 119,939 acres (42.8%)
- > Other Rangeland Areas: 3,430 acres (1.2%)
- Non-Sagebrush Areas: 35,026 acres (12.5%)
 - primarily woodlands, rock features, playas & mesic/wetland areas

Sheldon National Wildlife Refuge:

- ➤ Core Habitat Areas: 353,478 acres (61.2%)
- ➤ Growth Opportunity Areas: 193,084 acres (33.5%)
- Other Rangeland Areas: 8,836 acres (1.5%)
- Non-Sagebrush Areas: 22,086 acres (3.8%)
 - > primarily rock features, playas & mesic/wetland areas, and road surfaces & opal mine areas



BIO PROJECTS

- > GRSG lek counts
- Big game surveys
- Pygmy rabbit surveys
- > Bat monitoring
- Wildlife cameras (guzzlers, meadows)
- Invasives management
- Meadow and spring assessments
- Bighorn sheep habitat assessments
- Juniper management
- Fire rehabilitation
- ➤ Habitat monitoring



Habitat Monitoring



FY23 Field Crew



BHS Habitat Assessments





Pygmy Rabbit Surveys

Spring Assessments





Big Game Surveys

GRSG Lek Counts

Wildlife Cameras

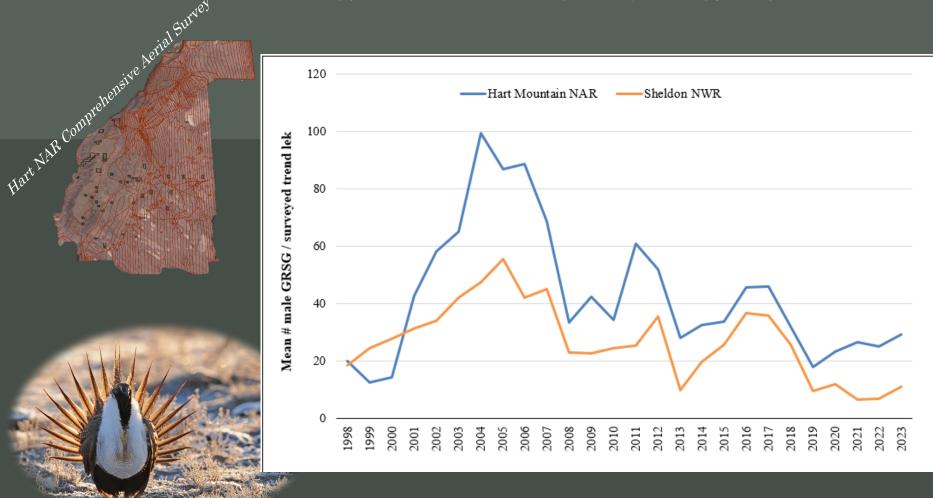




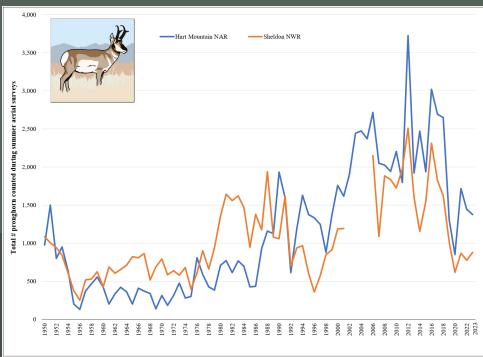


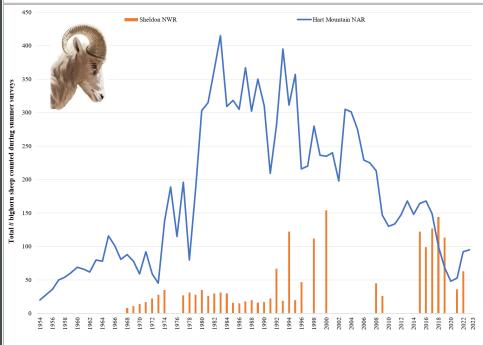


GREATER SAGE-GROUSE



© Jennifer Hall





BIG GAME



National Antelope Refuge

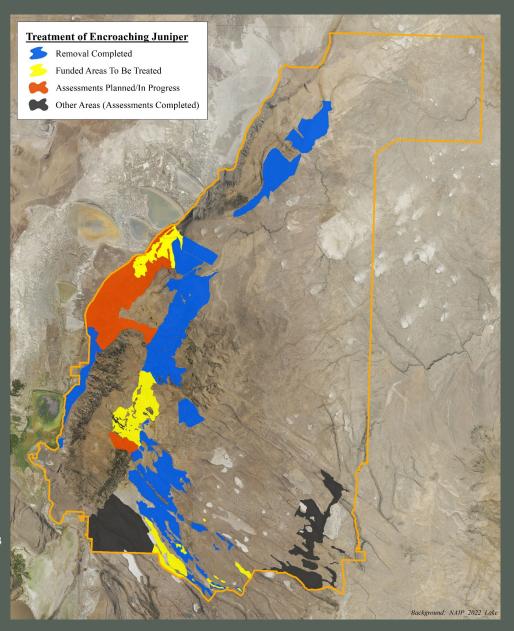
Encroaching Juniper Removal: (since 2012)

Total: 24,656 acres

- ➤ Hand Sever (Drop & Walk): 13,614 acres
 - 2,409 acres were later piled for burning
- ➤ Lop & Scatter: 2,700 acres
- > Cut/Pile/Cover: 4,674 acres
- \triangleright L&S + C/P/C (mixed treatment): 2.658 acres
- > D&W + L&S (mixed treatment): 1,010 acres

Planned Efforts: (next 2-3 years)

- > Additional Removal: 6,611 acres (funded)
- > Evaluations (of Completed Asmts): 10,544 acres
- ➤ Additional Hab. Cond. Assessments: 10,390 acres
 - focused on Bighorn Sheep habitats



National Antelope Refuge

Fire History: (since 2012)

Total: 29,457 acres (28,696 acres on-Refuge)

➤ Pile Burn: within 7,704 acres

➤ Broadcast Rx: 361 acres

Escaped Rx: 57 acres

➤ Wildfire: 21,334 acres (20,573 acres on Refuge)

Planned Treatments: (next 2-3 years)

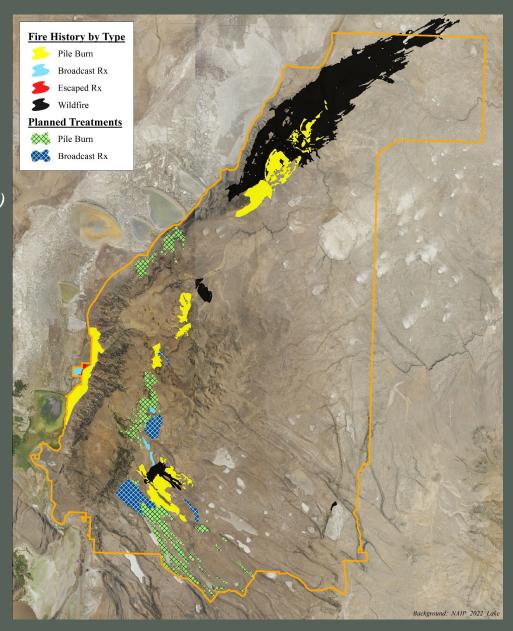
➤ Pile Burn: within ~5,296 acres

➤ Broadcast Rx: ~2,221 acres (meadows)

> Escaped Rx: 0 acres

➤ Wildfire: 0 acres (Hopefully. Probably not going

to be that lucky.)



National Antelope Refuge

Aerial Herbicide Application:

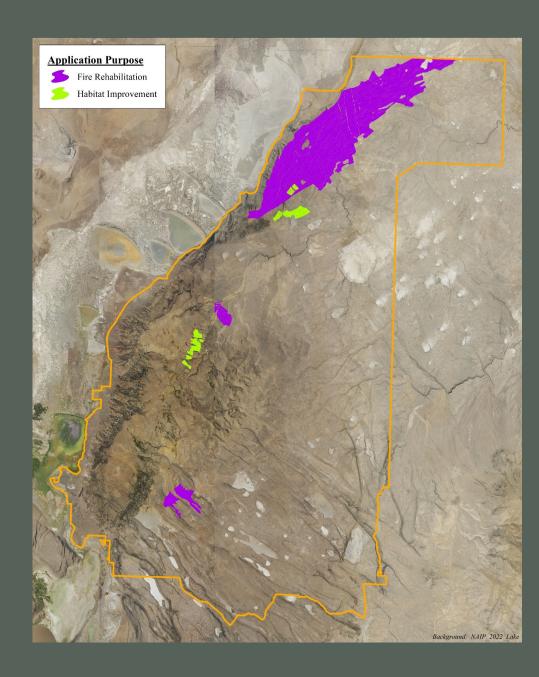
(since 2012)

Total: 20,343 acres

- > Emergency Stabilization/Rehabilitation: 19,255 acres
- ➤ Habitat Improvement: 1,088 acres

Primary Targets: Invasive Annual Grasses
(cheatgrass, Japanese brome,
Field brome, Ventenata,
medusahead)

Currently no additional aerial applications planned on Hart Mountain for the next 2-3 years



National Antelope Refuge

Native Seed Application: (since 2012)

Total: 16,554 acres

➤ Aerial Broadcast: 9,438 acres

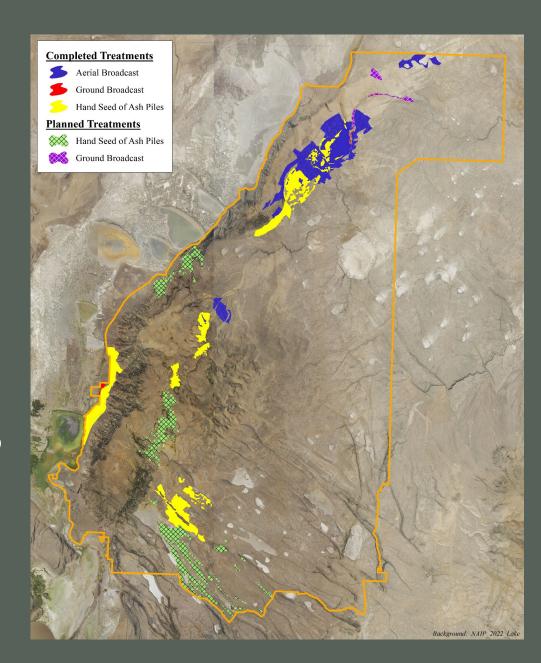
> Ground Broadcast: 118 acres

➤ Hand Seed (of ash piles): within 6,998 acres

Planned Applications: (next 2-3 years)

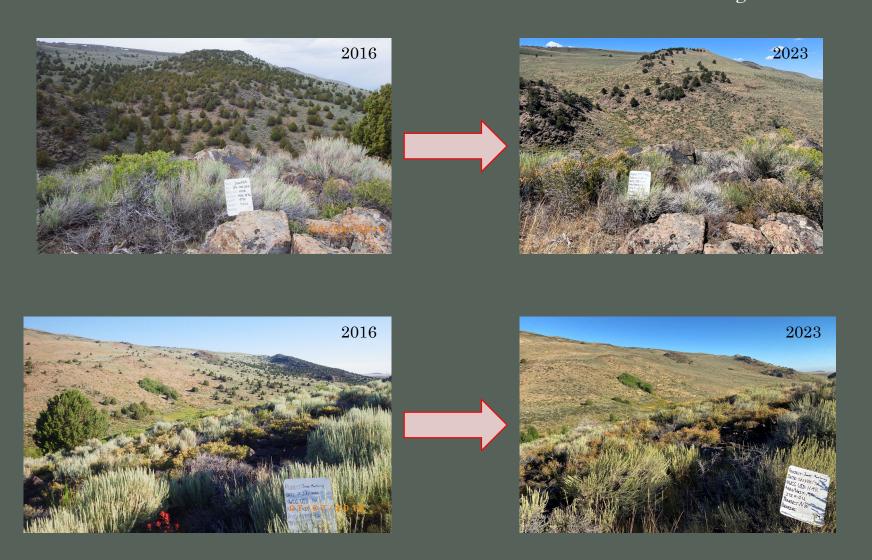
> Ground Broadcast: ~250 acres

 \blacktriangleright Hand Seed: within ~5,300 acres



National Antelope Refuge

$\underline{Juniper\ Management}$



Fire Rehabilitation











Hart Mountain

National Antelope Refuge







Habitat Monitoring

Fire Rehab Effectiveness and Efficacy



Hart Mountain

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National Antelope Refuge

Habitat Monitoring

> Photographic Step-in-Time









THANK YOU



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