

conserving habitat through partnerships

November 1, 2016

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Ron & Thad:

On behalf of the Intermountain West Joint Venture (IWJV) Management Board and staff, I extend our sincere appreciation to the Natural Resources Conservation Service (NRCS) for partnering with the IWJV on the Sage Grouse Initiative (SGI) Strategic Watershed Action Team (SWAT).

Please find attached the SGI SWAT NRCS Quarterly Report for July-September 2016. The report also contains the following appendix: Objectives and Evolution of the SGI SWAT.

Please give me a call at (406) 549-0287 if you have any questions. We look forward to reporting on future SGI SWAT successes!

Sincerely,

Dave Smith

IWJV Coordinator



Sage Grouse Initiative Strategic Watershed Action Team Quarterly Report: July 1 – September 30, 2016

Intermountain West Joint Venture
November 1, 2016





The Sage Grouse Initiative (SGI) Strategic Watershed Action Team (SWAT) continued to make significant gains this past quarter in each of its three focus areas: people and partnerships, science and technology, and communications and outreach. The following reports on these accomplishments from July – September 2016.

PEOPLE & PARTNERSHIPS

SGI would like to thank U.S. Department of Agriculture (USDA) Natural Resources Conservation Service (NRCS) staff, partners, and ranchers for all of their great work and dedication to conserving sage grouse and the sagebrush ecosystem in 2016. The positive momentum for SGI's proactive, voluntary conservation model has continued to grow following the U.S. Fish Wildlife Service's (FWS) 2015 decision not to list sage grouse under the Endangered Species Act. Thanks to the many partners, SGI is proving that this new paradigm of cooperative conservation is making a difference for wildlife and working lands.

SWAT Field Staff

The SWAT field staff continued to expand and accelerate SGI conservation delivery this quarter with support from local and state NRCS staff, funding partners, and the Intermountain West Joint Venture (IWJV). The team's dedicated and enthusiastic range conservationists, wildlife biologists, and natural resource specialists not only help get conservation on the ground but also spread the shared vision of achieving wildlife conservation through sustainable ranching throughout the West. Below are some of the incredible highlights from the SWAT field staff and the IWJV's efforts to support SGI delivery this reporting period.

Conservation Implementation

The IWJV maintains a detailed tracking system to document SWAT field staff progress on a quarterly basis. These contributions are rolled up with other NRCS actions and reported to the FWS, during the annual sage grouse status review process, to ensure landowner and partner efforts are considered in Endangered Species Act listing decision reviews.

Partner Positions Accelerate Conservation—Additional field capacity support provided by SWAT partner positions across the West has essentially enabled NRCS to double the amount of SGI conservation. Partner staff have helped plan or implement:

- **2,485,699 acres** of rangeland improvement to increase sage grouse hiding cover during nesting season. Additional grass cover is expected to increase sage grouse populations by eight to ten percent.
- ➤ 318,293 acres of conifer removal in key nesting, brood-rearing, and wintering habitats. Removing encroaching conifers from sagebrush rangelands eliminates tall structures in otherwise suitable habitat. As birds re-colonize former habitats, increased bird abundance is anticipated.
- ➤ 219 miles of "high-risk" fence near leks to be marked or removed. Marking fences is expected to reduce sage grouse fence collisions by 83%.

The original SGI SWAT agreement will soon be coming to a close, and during the third quarter of 2016, the next round of funding was launched through SGI 2.0. With this new funding, NRCS continues to maintain its commitment to using science to target sage grouse conservation projects and practices. In addition, we are building field capacity, expanding the science team, and strengthening partnerships across the western sagebrush landscape. On that note, SGI welcomes the following new staff:

SGI Field Capacity Coordinator: Michael Brown joined the SGI core team as the new Field Capacity Coordinator. Michael is very familiar with SGI and well-versed in working with ranchers and partners on ways to benefit the bird. He has spent three very productive years as a member of the SWAT field staff. In his new role with SGI, Michael will be responsible for managing the SWAT biologists and range conservationists working with landowners to conserve sagebrush landscapes across the West. Plus, he will be working with SGI Science Advisor, Dr. Dave Naugle, and Jeremy Maestas, Sagebrush Ecosystem Specialist from the NRCS West National Technology Center, in transferring science into even more strategic implementation of on the ground conservation practices.



Michael Brown



Jason Tack

Wildlife Biologist and Spatial Ecologist: Dr. Jason Tack joined SGI, bringing his valuable expertise as a Wildlife Biologist and Spatial Ecologist to the science team as a joint position between FWS and SGI. Jason earned a Ph.D. from Colorado State University, where he examined impacts of renewable (wind) energy development on golden eagles and developed risk maps to assess the potential for golden eagle mortality. Jason's post-doctoral work – on behalf of the University of Montana's Avian Science Center and SGI – examined the influence of temporal patterns in wetland dynamics on sage grouse populations and created spatially explicit models for sage-obligate migratory birds. Now, Jason's primary role is to model sagebrush and dry-mixed grass ecosystems of the Intermountain West and Northern Great Plains. Stay tuned for the SGI *Science to Solutions* report featuring his work!

Terrestrial Systems Ecologist and Remote Sensing Ecologist: Dr. Matthew Jones, a Terrestrial Systems Ecologist and Remote Sensing Scientist, has joined the SGI science team. Matt's expertise lies in applying near-surface, airborne, and satellite remote sensing technology to monitor and model vegetation phenology, ecophysiology, and productivity. He received a M.S. in Resource Conservation as well as a Ph.D. in Systems Ecology from the University of Montana. His past research included working at the Carnegie Department of Global Ecology to detect and monitor invasive species in Hawaiian forests; helping the National Oceanic and Atmospheric Administration Southwest Fisheries Science Center develop terrestrial indicators for salmonid recovery efforts; and using microwave remote sensing of vegetation and biomass to gauge response to climatic constraints and wildfire. With SGI, he will use his remote sensing and ecology expertise to advance conservation over North America rangelands by monitoring ecosystem services and improving estimates of range productivity.



Matthew Jones

SWAT Position Update

SWAT field staff talent does not go unrecognized by other employers. As position vacancies arise, the IWJV works with NRCS, hiring entities and funding partners to re-assess position locations to ensure technical assistance is focused where it's needed most; positions are quickly refilled to minimize disruption to conservation delivery. No new field staff were hired during the quarter.

SWAT Field Staff Calls & Webinars

The IWJV continues to host monthly conference calls in which SWAT members receive SGI updates, share accomplishments and experiences, ask questions, and receive continuous technology transfer and training.

IWJV-Bureau of Land Management Intra-Agency Agreement: On the partnership front, a new five-year agreement was signed by the Bureau of Land Management (BLM) and the IWJV to promote win-win solutions for people and wildlife. This new funding agreement will expand conservation capacity on public land and allow us to focus jointly on research and science. Given the mixed land ownership pattern across the sage grouse range – and the fact that half of all remaining habitat for the bird is on public land – this agreement will allow SGI to help private landowners link up across the fence with public landowners to ensure landscape-scale, cross-boundary conservation.



Joint priorities for BLM and SGI going forward will be removing invading conifers, preventing the spread of invasive weeds and catastrophic wildfire across the range, and restoring important wet meadow habitats. This cooperative approach will benefit from additional scientific decision-support tools to help implement such conservation measures, as well as outcome-based evaluations that will track wildlife and habitat response to conservation practices. SGI debuted a new Public Land Partnership web page, and we look forward to working with BLM on sagebrush ecosystem conservation!

Sagebrush Collaborative Conservation Specialist: As part of the new BLM agreement, the IWJV hired Duane Coombs as the Sagebrush Collaborative Conservation Specialist. In his cover letter, Duane Coombs said, "The



Duane Coombs

task of this generation is to marry the rugged individualist of Western lore with the synergy and collective knowledge of modern society." The eloquence and wisdom of this statement epitomize Coombs and the insight he brings to the IWJV. With the ability to integrate conservation practices, science, and agricultural production, he will help the IWIV continue to enact and accelerate positive conservation change at local and regional levels. Conveying a unique skill set from a career as a ranch manager and foreman, Coombs has a successful and wide-ranging history of collaboration and partnership with academic, political, and agency professionals as well as those in the agricultural community. He is talented at managing large rangeland livestock operations and implementing progressive conservation practices with productive results. His intimate understanding of how conservation practices work on the ground, in addition to knowing first-hand what ranching and farming communities need, makes him an invaluable asset for the team. Coombs has a Bachelor of Science in Range Science and has received multiple conservation awards. This

includes the Bureau of Land Management's Rangeland Steward Award in 2010, and recognition in 2016 from the Environmental Stewardship Award Program, which is sponsored by Dow AgroSciences, NRCS, FWS, National Cattlemen's Beef Association, and the National Cattlemen's Foundation. "I've always wanted to work on the cutting edge of cooperative conservation," Coombs said. "We are in a time where partnerships are crucial to our future, and I'm glad to be part of the IWJV team that has made this their mission."

SCIENCE & TECHNOLOGY

2016 SGI Science Business Meeting

Over 20 scientists and sage grouse conservation leaders attended the 2016 SGI Science Business Meeting, held on the Newmont-owned IL Ranch outside of Elko, NV. Huge thanks to the hosts from Newmont Mining, Jerry Pfarr and Jeff White! All of the cross-disciplinary scientists under contract with SGI gathered together to discuss their sagebrush-related research topics.



The beautiful IL Ranch, one of five conservation ranches owned by Newmont Mining, was the beautiful backdrop for the 2016 SGI Science Business Meeting.

The first day included brief presentations by each participant on his/her current research and how the science can be applied practically to sagebrush conservation.



Jeff White (left) explains Newmont's mesic restoration practices on Maggie Creek during a field tour.

The second day, participants took a field tour of the spectacular IL Ranch where they saw large-scale mesic restoration projects, observed variety in grazing methods, and learned about wildfire recovery as well as resistance and resilience to wildfire.

On the final day, the participants brainstormed the most strategic path forward for upcoming and ongoing research projects in sage grouse country. This planning effort at the annual science meeting ensures that SGI resources are used most effectively, and allows cross-pollination between different scientific disciplines from GIS to genetics, hydrology to biology. Research topics under discussion included: range-wide sage

grouse population connectivity, mesic area and conifer maps, grazing studies on public and private lands, and sagebrush conservation impacts on various songbirds.

Mesic Restoration Workshop

In August, Jeremy Maestas organized a three-day SGI-sponsored workshop exploring beaver ecology and ways to mimic beavers to restore and improve mesic habitat on western rangelands. Through SGI 2.0, NRCS has committed to work with landowners and partners to help protect and restore wet meadows, riparian areas, and other "mesic habitats" over the next four years. As part of the strategy, we're looking for simple and low-cost alternatives for restoring these habitats to benefit sage grouse and private agricultural operations.

One emerging cost-effective technique that improves water availability and expands mesic habitat is called a "beaver dam analogue" (BDA). BDA's are hand-built structures that mimic natural beaver dam activity, reconnecting stream channels to floodplains and restoring degraded habitats.

SGI convened a cadre of 40 interdisciplinary field staff in Logan, Utah, to learn how BDAs can be a "cheap and cheerful" restoration tool for enhancing mesic



Christina Santana (Basin Biologist, OR), Logan Jensen (Engineer, NV), and Trisha Cracroft (State Biologist, ID) enjoy restoration work at the workshop in Logan.

habitat resilience in sagebrush ecosystems. NRCS teamed up with Dr. Joe Wheaton and other scientists in his lab at Utah State University to conduct the workshop. Participants walked around in active beaver ponds to better understand what they do to the system and also looked at places where beaver were absent to envision what might be possible with restoration. "One of our participants said it was like being handed a pair of polarized sunglasses for the first time and seeing the stream in a totally different light," said Maestas.



Working Lands for Wildlife's western coordinator, Tim Griffiths, discusses the benefits of beaver dams for ranchers and wildlife during SGI's Utah-based workshop.

COMMUNICATIONS & OUTREACH

Publications:

- New Research Provides Insights into Sage Grouse DNA USDA Blog post summarizing Todd Cross¹ genetics study authored by U.S. Forest Service and SGI (September 27)
- <u>Tracking Success 2016 Report</u>, in conjunction with a <u>USDA Blog post by</u> NRCS Chief Jason Weller (September 22)
- Greater Sage-Grouse Conservation & the Sagebrush Ecosystem: Collaborative Conservation At Work – a joint report and associated story map created by the Department of Interior, Western Association of Fish and Wildlife Agencies, and USDA (September 21)
- Featured Friend: Wood River Land Trust (September 8)
- Rancher Success Story + Video: <u>Kennedy Ranch Conservation Improvements</u> <u>Benefit Both Livestock And Wildlife In Utah</u> (August 23)
- <u>Sagebrush Rangelands Help Maintain Water Availability</u> + <u>USDA Blog post</u> (August 4)
- Rancher Success Story: <u>Helmick Family Conserves Vital Habitat For Sage Grouse In Idaho</u> (July 28)

SGI Press Hits & Reprints:

- <u>Interior Secretary: One Year Later, Sage Grouse Collaboration is Paying Off</u> The Conservationist Blog, Field and Stream Magazine (September 26)
- <u>Voluntary conservation helps save sage-grouse</u> *Feedstuffs* (September 23)
- <u>Jewell, Hickenlooper nurture "epic collaboration" in \$760M western push to save endangered sage grouse</u> *The Denver Post* (September 21)
- <u>A Special Recipe For Saving Sage Grouse</u> Wildlife Photographic Magazine (September issue)
- The Tree that Ate The West bioGraphic Magazine (August 9)
- The Science of Sagebrush: Measuring the Resilience of Rangelands Baker City Herald (July 11); featuring resilience and resistance concepts explained by SGI's Jeremy Maestas
- An update from the field: Kelsey Molloy writes in (SGI SWAT partner position in Malta, MT) The Montana Conservationist newsletter, Soil and Water Conservation Districts of Montana (August 11)
- New Research Suggests Sagebrush Landscapes Maintain Water Availability Outdoor News Bulletin, Wildlife Management Institute (August)
- Kevin Guinn, USDA "Unsung Hero" Awardee, Tells How Range Conservation
 Makes a Difference The Progressive Rancher (July/August)
- Rockin' TD Ranch Champions Rangeland Conservation in Nevada Vya Conservation District website (July)

Website:

Overview:

- > 24 new website posts published this quarter
- Redesigned and updated SGI's Proactive Conservation page, now titled "What We Do" under the "Our Work" dropdown menu on the website
- Designed and added a new website page for the <u>Tracking Success 2016</u> <u>Report</u>
- > SGI home page tiles updated and formatted with new publications
- ➤ Interesting Tidbit: Germany and Canada are the #2 and #3 countries with the most visitors to SGI's website after the U.S. Traffic from both countries has increased 120% since last quarter.















Page 5 of 9

> 37,922 total page views this quarter (down four percent from last quarter). Note: Summer is always the lowest engagement in terms of media communication across the globe due to vacations. SGI statistics from past years shows the same trend.



Top Website Pages & Posts:

- 1. <u>Home page</u>: 18,126 views
- 2. About The Bird: 1,398 views
- 3. What We Do: 806 views (148% increase from last quarter)
- 4. <u>Helmick Family Conserves Vital Habitat For Sage Grouse in Idaho</u>: 713 views
- 5. Meet Our Staff: 600 views
- 6. About The Habitat: 531 views
- 7. Getting Our Hands Dirty at the 6th Annual SGI Workshop Tour: 497 views
- 8. Conserve Our Western Roots: 471 views
- 9. <u>Job Announcement: Sage Grouse Field Capacity Coordinator</u>: 463 views
- 10. Tracking Success 2016 Report: 410 views
- 11. Public Land Partnership (announced this quarter): 389 views
- 12. Why Grow Sagebrush Seedlings in Prisons?: 386 views



The Helmick family

E-News

- ➤ 139 new subscribers (4,633 total)
- ➤ Three total sent (monthly)
- Most clicked: Happy anniversary to partnership in the sagebrush sea! (September 22)
 - o 502 clicks on SGI 2.0 Investment Strategy
 - o 179 clicks on Tracking Success 2016 Report
- Most popular: Sage grouse don't stop at fences. Neither do we. (July 27)
 - o 1,089 opens, 30% open rate
 - o Featured the SGI Workshop photos, the announcement of the Public Land Partnership with BLM, and new fence collision layer on the SGI web app.

Social Media

Twitter (@SageGrouseInit)

- ➤ 241 total tweets
- ➤ 140 new Followers, bringing the total to 2,187

➤ Top Tweets:

- September 22 (earned 5,050 impressions, 15 retweets, ten likes): Learn how we put practices, research, & people to work for #350species in sagebrush country. New 2016

 REPORT here: bit.ly/2cpPyPS
- o August 11 (earned 3,963 impressions, four retweets, 27 likes): Forbs--like these flowers & the insects that live on them--are the foundation of #sagegrouse chicks' diets.
- July (earned 12,500 impressions, 17 retweets, 31 likes): Good stuff. Thanks @Nature_ID for protecting prime #sagebrush habitat!

Facebook

- 88 new page Likes, bringing the total to 3,880 followers
- 61 total posts
- Top Posts:
 - o September 8 (12,678 people reached! 100 shares! 76 likes): Cool new idea that may help beat back the invasion of cheatgrass, a weed that is threatening wildlife habitat and livelihoods in sagebrush country.
 - o July 28 (3,566 people reached, seven shares, 38 likes): To the Helmick family, conservation and ranching are one and the same.
 - July 10 (3,090 people reached, five shares, 37 likes):
 Sometimes, you have to get your hands dirty to make a difference on the ground. Check out photos from SGI's 6th annual workshop.

SUMMARY

The SGI SWAT is a model for science-based, landscape-scale habitat conservation—and a model for the future. It represents a landmark step forward in helping NRCS – through partnerships with the FWS, state fish and wildlife agencies, and others – address many of the bottlenecks that have long prevented Farm Bill conservation programs from realizing their true potential for wildlife habitat conservation in the West.





NRCS SGI SWAT AGREEMENT PERFORMANCE METRICS

- a) Efforts for outreach to, and participation of, beginning farmers or ranchers, and Native American Tribes within the project area. The SWAT field capacity staff worked directly with eight Indian Tribes, Socially Disadvantaged, Limited Resource, or Beginning Producers this quarter.
- b) Assistance provided to program participants to help meet local, state, and/or federal regulatory requirements. The intent of SGI is to proactively conserve sage grouse habitat to negate the need for additional regulations. Participating producers are highly committed to sage grouse conservation, and the SGI provides an excellent vehicle for addressing threats to sage grouse populations at very large scales.
- c) Numbers of NRCS program participants assisted and/or cooperating in the project effort. The SWAT partner positions made 1,409 contacts (field visits, etc.) with 641 different agricultural producers as of December 31, 2012. The reporting system was revised in 2013, and we now track Technical Assistance days. Since January 1, 2013, the SWAT provided 8,672.25 Technical Assistance days. This level of technical assistance provision is indicative of how the SWAT will ratchet up SGI implementation over the next few years.
- d) Number of Full-time Equivalents (FTE) being employed through the SWAT agreement. Thirty-three and three-quarters (33.75) FTEs (24.0 Field Delivery Capacity Partner Position FTEs, 1.0 Rangeland Inventory Support FTE, 1.0 SGI Field Capacity and Delivery Coordinator FTE, 0.75 SGI Communications Coordinator FTE, 3.0 IWJV FTEs, and 4.0 Science Support FTEs) were employed during the reporting period.
- e) Acres of project area addressed in NRCS program contracts and/or extents of conservation activities implemented in the project area. The SGI SWAT, to date, resulted in the following accomplishments: conservation planning for 2,485,699 acres of grazing systems; 318,293 acres of conifer removal; 1,157,361 feet (219 miles) of fence marking or removal; 8,782 acres of wetland restoration; 25,260 acres of rangeland seeding; and 30,408 acres of conservation easements.
- f) NRCS program dollars obligated in agreements in the projects area by program. A total of \$2,783,000 in Environmental Quality Incentives Program funds were obligated during the reporting period. *This brings the total amount contracted by the SWAT, to date, to an impressive \$62,446,793!*
- g) Other partner or resource contributions from other agencies or organizations which help implement provisions of the agreements. We have secured or leveraged a total of \$7.4 million in partner contributions to date.

Appendix A

Objectives & Evolution of the Sage Grouse Initiative Strategic Watershed Action Team

Launched in 2010, the USDA Natural Resources Conservation Service's (NRCS) Sage Grouse Initiative (SGI) is a highly targeted and science-based landscape approach to delivering enough of the right conservation practices in the right places, in order to elicit a positive sage grouse population response to management. SGI uses dedicated Farm Bill conservation program funds at appropriately large scales to alleviate threats that otherwise fragment habitats, the primary reason for the species "candidate" designation under the federal Endangered Species Act. SGI targets Farm Bill resources to high sage grouse abundance centers, or "core areas," to maintain large and intact habitats rather than providing palliative care to small and declining populations.

The SGI Strategic Watershed Action Team (SWAT) was established to strengthen NRCS' capacity to implement SGI. The SWAT builds field capacity and strengthens the science guiding SGI, as well as bolsters communications capacity—all through partnerships that leverage the NRCS SGI funding with significant contributions from other sources. The Intermountain West Joint Venture (IWJV), in close collaboration with NRCS at multiple levels, continued to make significant progress toward the following objectives in launching the SGI SWAT during the reporting period:

- Increase field-level capacity by placing specialized human skill sets at critical geographic "pinch points" to increase SGI benefits.
- Increase science capacity to better focus SGI implementation, assess biological outcomes, and continually improve program delivery.
- Improve and enhance outreach and communication strategies to increase partner buy-in and SGI participation from landowners.
- Expand SGI partnership to further leverage NRCS contributions resulting in increased outcomes and participation.

This work is facilitated by execution of an Interagency Agreement (IA) between NRCS and the U.S. Fish and Wildlife Service (FWS), and subsequent modifications to the IA. The \$4 million in SWAT funds were obligated in an NRCS-FWS IA, signed June 24, 2011. NRCS provided an additional \$3 million to the SGI SWAT NRCS-FWS IA late in FY 2011, from another funding source, to bring the total NRCS commitment to \$7 million. The "Phase 2" \$3 million was obligated in a modification to the IA, executed on September 13, 2011. NRCS provided an additional \$2.3 million to extend the agreement through December 1, 2016, through a "Phase 3" modification to the IA on September 28, 2012. As with all SWAT projects, the IWJV leveraged NRCS' investment by raising 25% of the funds needed to implement the SGI SWAT from an array of conservation partners, including the FWS, state wildlife and agricultural agencies, conservation districts, non-governmental conservation organizations, and corporations.

The IWJV, through the FWS, subsequently entered into a Cooperative Agreement with Pheasants Forever (PF) to facilitate fiscal administration and partnership-based implementation of SGI SWAT, effective August 9, 2011. PF works closely with the IWJV staff on SWAT implementation and is also playing a key role in building field capacity for SGI, specifically by supervising eight of the SWAT positions through agreements they have negotiated with state fish and wildlife agencies and other partners. For the purpose of this and future reports, we consider the overall \$14.7 million effort as the SGI SWAT, even though only \$4 million arose from NRCS' FY 2011 SWAT appropriation.