



**E. Compare Actual Costs to Budgeted Costs:** (Please refer to your grant agreement to list your deliverables/budget categories and budgeted costs compared to actual costs incurred during this reporting period in the table below.)

<b>PROJECT BUDGET CATEGORIES</b>	<b>Budgeted SNC Dollars</b>	<b>Actual Dollars</b>
<b>GRAND TOTAL</b>		

**Explanation:** (if needed)

**F. Do you have information to report on the project-specific Performance Measures for your project?** (If so, please list the Performance Measures below and describe your progress.)

**G. Were there any other relevant materials produced under the terms of this Agreement that are not a part of the budgeted deliverables? If so, please attach copies.** (Include digital photos, maps, media coverage of project, or other work products.)

**H. Next Steps:** (Work anticipated in the next 6 months, including location and timing of any scheduled events related to the project.)

## **Please Complete this Section for FINAL Report ONLY**

### **Capacity-Building Results and Collaboration and Cooperation with Stakeholders:**

(What partnerships did you initiate or strengthen as a result of this project? How did they affect the project outcome? If applicable, how did this grant increase your organization's capacity? What is your plan to sustain this increase?)

As a result of this project, we were able to improve outreach to areas of the Mono Basin that had been largely overlooked, such as DeChambeau Ponds and the Mono Craters, and to groups like off-highway vehicle (OHV) users. Grant funding also made it possible for Friends of the Inyo to increase its presence in the field and its capacity to take on restoration projects.

The Mono Lake Volunteer program benefitted from the framework established by the grant. Grant-funded activities provided a natural avenue for volunteer participation and ensured that volunteer labor was allocated effectively.

During the course of the project, the working relationship between the partner organizations and the Inyo National Forest improved substantially. The Mono Lake Committee and Friends of the Inyo appreciated the Inyo National Forest's efforts to give direction to the organizations' field work priorities.

The nature of the grant was such that project activities were split between the Mono Lake Committee and Friends of the Inyo. This differentiation allowed each organization to concentrate on its strengths and to develop a more thorough and systematic restoration work plan. Greater focus led in turn to improved communication mechanisms for generating public involvement from visitors and residents alike.

The improved systems which developed as a result of the project are now well-established, and both organizations will continue to use and expand them.

## **Description of Project Accomplishments:**

### **1. Most Significant Accomplishment**

Describe in one concise, well-written paragraph, the most significant accomplishment that resulted from this grant.

The past three years have seen significant changes in the land management priorities of the Inyo National Forest, and much of the focus has shifted away from the Mono Basin. The grant helped us to fill the gaps by addressing the restoration requirements of the basin when the Inyo National Forest was unable to do so. The partner organizations received guidance from the Inyo National Forest as to where we should direct our efforts, and then worked collaboratively to carry out crucial restoration projects. In this way we contributed both to the valuable data sets pertaining to Mono Basin restoration and to the lasting health of the basin's many ecosystems.

### **2. WOW Factor**

If applicable, please describe anything that happened as a result of the project or during the project that is particularly impressive.

Having grant funding in place made it possible for the Mono Lake Committee to interact with Mono County on the Lee Vining airport project, which posed an unanticipated threat to the Mono Basin viewshed and to sensitive deer and sage grouse habitat, and required an immediate response from the Mono Lake Committee. Our response and the resulting mitigation action would not have been possible without the accommodating nature of our grant support.

### **3. Design and Implementation**

When considering the design and implementation of this project, what lessons did you learn that might help other grantees implement similar work?

Because this project spanned multiple years, it was helpful to have grant language that allowed us the flexibility to react to changes on the ground. When the Lee Vining airport project introduced a critical need for extensive revegetation on the site, the Mono Lake Committee was able to work together with other local groups to put in place a revegetation plan that will ensure a successful outcome through test plots, planting, and long-term monitoring. The process of administering the grant taught us to adapt our priorities based on the needs we saw as they developed.

### **4. Indirect Impact**

Please describe any indirect benefits of the project such as information that has been developed as a result of the project is being used by several other organizations to improve decision-making, or a conservation easement funded by this grant that encouraged other landowners in the area to have conservation easements on their property.

Creek monitoring activities conducted as part of this project have been very helpful in providing data to stream scientists and local stakeholders in both the north and south regions of the Mono Basin. Data gathered from piezometers has been used in decisions about restoration in the south basin, while monitoring of Mill and Wilson creeks has informed water management and conflict resolution in the north basin.

## **5. Collaboration and Conflict Resolution**

If you worked in collaboration or cooperation with other organizations or institutions, describe those arrangements and their importance to the project. Also, describe if you encountered conflict in the project and how you dealt with it, or if there was conflict avoided as a result of the project.

The Mono Lake Committee worked closely with Mono County to resolve conflict related to the Lee Vining airport project. The Mono Lake Committee was concerned about the excessive scope of the project and the County's inadequate revegetation plan, which involved introducing non-native species to the site. Together with other community members, the Mono Lake Committee approached the County immediately with our concerns. A series of meetings outlined satisfactory mitigation measures and resulted in the adoption by the County of a more rigorous review process for County projects. A new revegetation plan was devised and put into practice, and the Mono Lake Committee will continue to be involved over the next four years as test vegetation plots are evaluated and the best planting approach chosen.

## **6. Capacity-Building**

SNC is interested in both the capacity of your organization, as well as local and regional capacity. Please describe the overall health of your organization including areas in need of assistance. SNC is interested in the strength and involvement of your board, significant changes to your staff, size and involvement of membership. In addition, describe how your project improved capabilities of partners, or the larger community.

Both project partners are healthy organizations with strong boards, stable membership, and few staffing changes. The main improvement achieved as a result of the grant was the increase in effectiveness and capacity of the Mono Lake Volunteer program, which celebrated its seventh season in 2010. The Mono Lake Volunteer program is cooperatively sponsored by the Mono Lake Committee, California State Parks, the US Forest Service, and the Eastern Sierra Interpretive Association. This past season the program's roster consisted of 35 active members, and each year we welcome several new volunteers. The new volunteers go through a fairly rigorous training program at the beginning of the season so they have an in-depth understanding of the Mono Basin's history and ecology. The program greatly enhances the organizations' ability to communicate with the visiting public and to share stewardship projects with those who care about the basin.

The grant also enabled Friends of the Inyo to increase significantly its presence in the basin and its ability to develop much-needed restoration projects in neglected sites.

## **7. Challenges**

Did the project face internal or external challenges? How were they addressed? Describe each challenge and any actions that you took to address it. Was there something that SNC did or could have done to assist you? Did you have to change any of your key objectives in response to conditions “on the ground”?

The SNC budget freeze which postponed grant funding in 2009 was a challenge to deal with. In 2008 the partner organizations hired a dedicated Mono Basin Resource Steward, and this approach was very successful. Without program funding in 2009 we lost momentum, and in 2010, as a result of funding declines for both organizations, we decided to use existing staff to accomplish the goals of the grant. This worked well but was not an optimal solution, and some project components did not receive as much attention when they were overseen by multiple people with other responsibilities.

The temporary lapse in funding created new opportunities, but also made it extremely difficult for the partner organizations to accomplish some goals. For example, Friends of the Inyo was unable to continue water quality monitoring in 2010 due to the departure of the staff member who had previously undertaken this work. SNC was very understanding and allowed the grantees to replace this task with increased outreach and monitoring relating to OHV use in the basin.

## **8. Photographs**

Grantees are strongly encouraged to submit photos, slides or digital images whenever possible. These images will be used for SNC publications such as annual reports or on the website. Please make sure you clearly identify location, activity, and your project with each submitted image. Images will be credited to the submitting organization, unless specified otherwise.

Please see attachments.

## **9. Post Grant Plans**

What are the post-grant plans for the project if it does not conclude with the grant? Include a description of the following (if applicable): (1) Changes in operations or scope; (2) Replication or use of findings; (3) Names of other organizations you expect to involve; (4) Plans to support the project financially, and; (5) Communication plans?

Friends of the Inyo and the Mono Lake Committee have applied for and received modest funding from the National Forest Foundation to carry on some of the components of the Mono Basin Resource Stewardship project in 2011. The organizations will seek funding in future years as well so as to ensure that the project activities continue.

1. The scope of the project has changed to allow for more independent oversight by the partner organizations of their areas of focus. The organizations will prioritize their activities internally and proceed accordingly.
2. The monitoring data collected by the partner organizations continues to inform land and recreation management in the basin, and to provide direction for restoration activities.
3. The Mono Lake Committee and Friends of the Inyo will continue to work in partnership on this project, and will seek the involvement of the Inyo National Forest and the Sierra Nevada Alliance.
4. The partner organizations will continue to seek out grant support and will take advantage of our staff, resources, and organizational capacity as leverage to obtain matching funds.
5. Each organization will use existing networks, such as newsletters, press releases, and blog posts, to communicate results and ongoing activities related to the work achieved under this grant.

#### **10. Post Grant Contact**

Who can be contacted a few years from now to follow up on the project? Please provide name and contact information.

Lisa Cutting, Eastern Sierra Policy Director for the Mono Lake Committee, may be contacted at (760) 647-6595 ext. 142 or at [lisa@monolake.org](mailto:lisa@monolake.org).

**SNC-approved Performance Measures:** (Please list each Performance Measure for your Project, as identified in your Grant Agreement, and the results/outcomes.)

Please see attachments for supplementary reports on grant-funded activities such as creek monitoring, air and water quality work, and invasive plant removal.

## Sierra Nevada Conservancy Grant Program Project Reporting Guidelines

Progress Reports are required periodically throughout the term of the Grant Agreement (Refer to Exhibit B of the Grant Agreement). These reports will allow you and the Sierra Nevada Conservancy (SNC) to see the degree to which the project is on track and achieving your projected outcomes. Your Progress Reports will further provide the SNC with information that will help us to explain your work to the Board Members and various other audiences. Timing of Progress Reports is specified in the Project Schedule included in Exhibit A of the Grant Agreement, but generally every 6 months until completion of the project.

A Progress Reporting Form is provided to Grantees on the SNC Website. **Six-month Progress Reports** should reflect the previous 6-month period; **Final Reports** should address each question for the entire grant period – looking at the project as a whole.

The form specifies the items you will need to report on. For the Six-Month Interim Report these include, but are not limited to: *A Progress Report Summary of work completed, Deliverables or Outcomes Completed, Challenges or Opportunities Encountered, Unanticipated Successes Achieved, Actual Costs compared to Budgeted Costs, Any Additional Relevant Materials Produced, and Next Steps.*

The Final Report will include additional information, such as: *Resources Leveraged, Capacity-Building Results and Collaboration and Cooperation with Stakeholders, a Description of Project Accomplishments, and SNC Approved Performance Measures.*

Please make sure that you submit complete reports by the dates requested in your Grant Agreement.

### **Creek Monitoring**

The Mono Lake Committee has conducted regular creek monitoring of Mono Basin streams since 1995. This decades-long data set is regularly accessed by researchers and has been of great value in informing restoration stream flow recommendations made by State Water Board-appointed scientists. Measurements are taken weekly June through September and monthly during the rest of the year. Piezometers, embedded groundwater gauges, are situated along Rush and Lee Vining creeks. The water levels in these gauges are recorded to the nearest quarter inch. Weather and stream flow in cubic feet per second are also recorded during monitoring. Mill and Wilson creeks are monitored weekly June through September to determine the volume of water at a series of points in this system. Water depth and velocity are calculated using data collected from a flow meter and/or flumes at each monitoring site.

### **Invasive plant work**

Beginning in the summer of 2008, the Mono Lake Committee has worked to counter the spread of invasive weeds in the Mono Basin through collaboration, volunteer coordination, and adaptive management. Each year early-season surveys and mapping helped to reveal the sites that were most threatened, and these were prioritized accordingly. Sweet clover (*Mellilotus albus*) and bouncing bet (*Saponaria officinalis*) were the most widespread weeds, especially in damaged riparian areas like Mill and Lee Vining creeks.

Throughout the summers volunteer weed-pulling days were organized by the Mono Lake Committee and Friends of the Inyo. Both organizations have established a solid base of local volunteers whose assistance has been invaluable in the realization of the project goals. In order to increase the involvement of community members not already trained as volunteers, events were advertised through local newspapers, posters, and the partners' websites, as well as through an informational brochure compiled in the summer of 2010. Local and visiting school groups also participated in invasive weed pulling activities.

Mechanical methods of weed removal were used exclusively. Volunteers were trained in safe tool use and in the importance of minimizing soil disturbance. Satellite populations of weeds were targeted first in order to restrict their spread. In 2008 pulling was done early in the summer before the weeds had gone to seed, but in 2010 this was not possible due to staffing constraints. Weeds that had gone to seed were carefully bagged seed-head first in plastic and disposed of offsite. In the 2008 season, previously-established test plots were monitored and pulling parties were held by the Mono Basin Resource Steward. 80 volunteers contributed 296 hours during the summer and fall. In the 2010 season, 74 volunteers worked 112 hours to uproot 622 pounds of weeds.

Although much work remains to be done, the partner organizations were successful in meeting our grant-funded objectives. The restoration of healthy riparian forest to the creek bottomlands will reduce the risk of habitat destruction during flood events and wildfires. In the longer term, curbing the spread of invasive weeds in a timely manner will help to bring back functional self-sustaining habitat for birds and wildlife, and to keep degraded and weed-infested areas from becoming much larger problems in the future.

### **Recreation statistics**

In 2008, visitation at the Mono Basin National Forest Scenic Area Visitor Center was 115,221. At South Tufa, visitation was 120,874. At Navy Beach, visitation was 19,249. At Old Marina, visitation was 74,923. At County Park, visitation was 26,100. The Mono Basin Resource Steward contacted 1333 visitors, patrolled 141 miles on foot and 4060 by truck, and repaired or installed 35 signs from June to December 2008. The Resource Steward coordinated 7 volunteer restoration projects and led 8 guided hikes and 8 birding walks. These events involved a total of 235 participants.

In 2010, visitation at the Mono Basin National Forest Scenic Area Visitor Center was 164,000. At South Tufa, visitation was 142,085. At Navy Beach, visitation was 19,903. At Old Marina, visitation was 85,583. At County Park, visitation was 25,868. There was no official Mono Basin Resource Steward during this season, but Mono Lake Committee staff coordinated 7 volunteer weed pulling parties which involved 74 volunteers, including two groups of visiting students and two staff groups from local organizations.

Sierra Nevada Conservancy  
Grant Reporting  
Air Quality

Drew Foster monitored the Conway Summit station, part of a national network of IMPROVE (Interagency Monitoring of Protected Visual Environments) sites weekly during the summers of 2008 and 2010. He submitted the air filters to the UC Davis Air Quality Lab, which compiled the data. These data can be obtained from Jose Mojica, [mojica@crocker.ucdavis.edu](mailto:mojica@crocker.ucdavis.edu) or 559-905-6846.

## **Eastern Sierra Water Watchers 2010 Program Summary**

Under the revised work agreement with the Sierra Nevada Conservancy, Friends of the Inyo has successfully completed the surface water quality monitoring for 6 Owens River watershed sites, over 5 consecutive months. Data for May 2010 has not been included, as it did not meet the quality assurance standards set forth by the program. As there was a combination of returning field volunteers as well as new recruits, May measurements were considered to be a field exercise, with the level of comfort and expertise in performing monthly monitoring vastly improving over time. In addition, the new Conservation Director / Program Coordinator needed to establish a working rapport with the team of Volunteers and the technical resources available at the Lahontan Regional Water Board. With the assistance of Erick Burres, Citizen Monitoring Coordinator, the Eastern Sierra Water Watchers (ESWW) program was adequately equipped and trained to perform the following field functions:

1. Dissolved Oxygen measurements (titration method)
2. pH measurements (probe)
3. air and water temperatures (thermometers)
4. Total Dissolved Solids / Conductivity (probe)
5. Turbidity (meter)
6. Fecal coliform (Idexx / incubator)

In preparation for a potential next round of stream monitoring, Friends of the Inyo (FOI) conducted field physical surveys at the respective 6 monitoring sites, also known as the “Streamwalk Survey”. Furthermore, a 1-day biological assessment for macroinvertebrates was performed in conjunction with the August 2010 chemical monitoring. These additional (non-contracted) services were deemed necessary, to support the data collected, to improve analytical capability, and to create a more comprehensive program. Stream flow monitoring would most definitely be a valuable addition to 2011 monitoring efforts, along with the ability to consult with hydrologists that are familiar with our stream sections and flow conditions.

A preliminary look at 2010 water quality data shows that average fecal coliform counts remain at less than 9 organisms per 100 milliliters—providing assurance that an August 2007 level of 50 fecal organisms was an outlier condition that could not be substantiated. Glass Creek results show the lowest level of fecal organisms of all 3 creek sections, even while recording higher turbidity readings than Deadman Creek during the summer months.

In terms of water pH, levels range between 7.4—8.2, demonstrating fairly consistent readings throughout 2010. Conductivity readings (showing the amount of dissolved salts and minerals in these stream sections) averaged between 43 and 50, with very little change. These are all good signs, indicating that stream health (at least during these sampling periods) is intact.

The 2009 annual report revealed that Lower Deadman Creek was colder than upper sections of the same or adjacent creeks. This could not be substantiated, as during 2010, Upper and Lower

Deadman Creek reported similar water temperature readings, with Glass Creek recording colder water temperatures than the others. The above-normal snowpack in the high country could figure into the equation.

Dissolved oxygen concentrations showed similar findings in 2010 for Upper Deadman Creek, while the average concentration of dissolved oxygen dropped by an average of 1 mg/liter for Glass Creek; and dropped an average of 1.5 mg/liter of Lower Deadman Creek. Weird science perhaps, but water quality can change dramatically, and short-term causes of upset conditions cannot always be identified. Explanations may include equipment failure, operator error, non-representative sampling and a plethora of unknown circumstances, natural and un-natural. It remains our responsibility to choose representative sampling sites and to maintain the integrity of those sites. When the monitoring adheres to our quality assurance plan, the data becomes more defensible and useful, and we can begin to rule out explanations for some spikes in measurements.

One lesson we learned is that data needs company. Chemical testing needs to be accompanied by flow rates, weather reporting, temperature readings, physical observations and biological surveys. The more we can incorporate these criteria into water sampling, the more reliable the data will be. Knowing these caveats, we can remain vigilant in our efforts to be hands-on, field-based water watchers.

The public role is a major one, commencing with watershed interest and water quality education, and evolving towards watershed awareness and citizen-based action. Friends of the Inyo will encourage public input and insight towards establishing the designated stream sections on the Inyo National Forest. As we have decided to incorporate 3 BLM stream sections into any 2011 monitoring efforts, and not having sufficient resources to monitor more than 6 stream sections, we will need to carefully select the 3 priority stream sections from our current inventory of 6 Inyo National Forest stream. The upper section of Mammoth Creek is the most likely candidate to release from monitoring—as the Mammoth Water District performs stream monitoring near their upstream drinking water intakes. Periodic stream measurements are also performed by the Mammoth Water District on stretches of Mammoth Creek in the town of Mammoth (middle Mammoth Creek). One possibility would be to abandon chemical testing on all 3 sections of Mammoth Creek, but to pursue volunteer events such as the Steamwalk survey and bug counts to provide clues to Mammoth Creek watershed health.

The current volunteer base appears dedicated to continuing water quality monitoring on both Glass Creek and Deadman Creek (upper and lower). As the northern BLM watersheds would involve different users and stewards, the program will be challenged to locate volunteers and supporters in the Bridgeport and Lee Vining communities. The addition of an Americorps Watershed Technician to FOI's 2011 roster will enable the Conservation Director to delegate some field testing responsibilities, and to concentrate on coordinating and communicating water

quality concerns with both the Bureau of Land Management (Bishop Office) and Inyo National Forest.

In terms of human resources and program efficiency, the largest time-consuming event is the dissolved oxygen titration process. This procedure alone consumes 45 minutes of hands-on water sampling at the streambank. FOI has borrowed a dissolved oxygen meter (1) from the Lahontan Water Board—yet even after calibration and maintenance, the device has proven less accurate than the titration method. The tradeoff is the degree of accuracy, versus the time commitment (45 minutes for titration, 1 minute for the meter). If a new dissolved oxygen meter is purchased, utilized alongside the borrowed unit, and calibrated monthly along with the titration method (in our office lab), the amount of volunteer time in the field could be better used to conduct more streamwalks, perform more bug surveys, and conduct more public education. This decision will depend upon grant funding received for the 2011 and 2012 monitoring cycles.

Lastly, the ESWW program has been tasked with stream monitoring, not stream restoration. It would behoove the program to identify creek sections that are in need of physical improvements, and to work with the responsible agencies to identify and then perform restoration projects. They could start with simple efforts—such as removing antiquated, rusted iron pipe along the Mammoth Creek Town Park section (more of a tripping hazard than a river health issue, but a fairly easy removal and repair project. Projects could proceed towards fencing off sensitive stream sections from heavy grazing pressure, reseeding eroded streambanks, or building footpath bridges across heavily-used stream crossings. I believe these hands-on tasks will build the capacity and confidence of stream stewardship groups, and result in a greater sense of stream ownership.