Socioeconomic Monitoring Report
for the Deschutes Collaborative Forest Project

March 2012

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**Socioeconomic Monitoring for 2012**

**Summary**

All projects funded through the Collaborative Forest Landscape Restoration Program (CFLRP) are required to report annually on specific performance measures and to complete any monitoring described in their approved proposal. CFLRP-funded projects are also required to conduct multiparty monitoring to address ecological, social, and economic project effects. Additional national CFLRP monitoring requirements were proposed in 2011 and are currently under review. The Deschutes Forest Collaborative Project (DCFP) steering committee, monitoring subcommittee, and staff have also made recommendations for additional socioeconomic monitoring.

A working socioeconomic monitoring plan for the DCFP is shown in Table 1. This plan includes required monitoring and additional parameters recommended by DCFP steering committee members and staff. All monitoring costs listed in the plan are estimates and include only personnel costs for DCFP and Deschutes National Forest (DNF) staff and contractors. Estimated costs do not include in-kind contributions from steering committee members and other stakeholders. Actual costs may vary by as much as 20 percent.

The first two items in the plan – agency performance measures and multiparty monitoring – are currently required and cost approximately $13,000 per year to complete. Performance measures and multiparty monitoring track ecological as well as socioeconomic outputs and outcomes.

The remaining parameters – education and outreach activities, economic impacts, and collaboration effectiveness – would be monitored for the first time in 2012. Monitoring these three parameters will cost between $1,500 and $17,000, depending on the desired level of data accuracy and selected monitoring methods. The initial recommendation for these parameters is to conduct a rapid assessment, survey, or after-action review and then determine the need for more in-depth monitoring.

The DCFP engages in other ecological monitoring that is not included in this plan. Partner matching funds from the City of Bend and the Upper Deschutes Watershed Council pay for water quality monitoring and in-stream, riparian, and fish passage monitoring. National ecological monitoring parameters for all CFLPR projects are currently under review by the USDA Forest Service and will likely become a requirement in 2012.
### Table 1. Working Socioeconomic Monitoring Plan

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Method</th>
<th>Responsible Party</th>
<th>Estimated cost*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agency performance measures (including acres treated, matching and leveraged funds, and TREAT model outputs)</td>
<td>See annual report template</td>
<td>DNF and DCFP staff</td>
<td>$6,500</td>
</tr>
<tr>
<td>Multiparty evaluation of implemented projects, including implementation costs and recreation impacts</td>
<td>Qualitative, in-field review of project goals, treatment specifications, implementation, and outcomes</td>
<td>DCFP staff/contractor (with DNF field staff and field tour participants)</td>
<td>$6,500 + in-kind</td>
</tr>
<tr>
<td>Education and outreach activities</td>
<td>Spreadsheet to track dates and numbers</td>
<td>DCFP staff/contractor</td>
<td>$500</td>
</tr>
<tr>
<td>Economic impacts (jobs created or maintained and regional economic benefits)</td>
<td>(1) Rapid assessment of 2011 annual report data</td>
<td>DCFP staff and DNF staff/contracted economist (with treatment contractors and mill managers)</td>
<td>(1) $500 + in-kind</td>
</tr>
<tr>
<td></td>
<td>(2) Optional: Direct tracking of jobs created and jobs maintained</td>
<td></td>
<td>(2) $4,000 + in-kind</td>
</tr>
<tr>
<td></td>
<td>(3) Optional: Direct tracking and calculation of direct, indirect, and induced benefits</td>
<td></td>
<td>(3) $8,000 + in-kind</td>
</tr>
<tr>
<td>Collaboration effectiveness</td>
<td>(1) Survey</td>
<td>DCFP staff/contractor (with steering committee subcommittee members and DNF staff)</td>
<td>(1) $500 + in-kind</td>
</tr>
<tr>
<td></td>
<td>(2) Optional: Focus group/After-action review</td>
<td></td>
<td>(2) $1,000 + in-kind</td>
</tr>
<tr>
<td></td>
<td>(3) Optional: Interviews</td>
<td></td>
<td>(3) $2,500 + in-kind</td>
</tr>
<tr>
<td>Total estimated cost</td>
<td></td>
<td></td>
<td>$14,500 to $30,000</td>
</tr>
</tbody>
</table>

* Estimated costs are for DNF and DCFP staff time and contractors. They do not include in-kind time contributions from subcommittee members and other stakeholders.
Background and Guiding Principles

Monitoring is periodic data collection and analysis to track trends in system conditions and processes over time. Socioeconomic monitoring tracks variables like public attitudes and behaviors, employment, and production rates. Socioeconomic monitoring may also address process issues, such as communication, organizational structure and procedures, and relationships among partners.

Appropriate monitoring parameters and methods depend on the purpose of the monitoring. Sometimes monitoring is conducted simply to increase knowledge about system characteristics and dynamics. Monitoring to provide accountability typically involves tracking inputs or outputs, such as dollars expended, number of acres treated, or volume of wood processed. Monitoring for adaptive management tends to look at outcomes, to determine if desired effects on social, economic, or ecological conditions are being achieved.

In 2011, the DCFP steering committee and monitoring subcommittee members reviewed required and optional socioeconomic monitoring for the project. They agreed that that beyond national reporting requirements, the purpose of DCFP socioeconomic monitoring should be to inform adaptive management. They recommended that selection of monitoring parameters and methods be guided by the following two principles:

1. **Monitoring results should be useful.** Don’t measure anything unless it either is required by the CFLR program or will inform future work of the DCFP. Review monitoring results annually to assess their usefulness for adaptive management.

2. **Monitoring benefits should justify costs.** Carefully evaluate the monitoring budget to make sure that the expected results are worth the dollars and time required to gather and analyze the data.

Required Monitoring

Current socioeconomic monitoring and reporting requirements are listed in Table 2. As required for its annual report to the USDA Forest Service, the Deschutes National Forest (DNF) tracks a number of performance measures. Reported socioeconomic monitoring performance measures include total project funds and matching funds, several project implementation and output measures, and estimates of number of jobs supported by the project and regional economic benefits of the project. These are described in more detail below. In 2011, the cost for DNF staff to complete the annual report was approximately $5,500. It is expected that in 2012 CFLRP projects will be also be required to report leveraged funds, which will increase the cost to approximately $6,500.
In addition, all CFLRP projects are required to conduct multiparty monitoring. According to its original proposal to the Forest Service, the DCFP meets this requirement by conducting two multiparty monitoring field reviews annually. Field review organization, facilitation, and reporting is facilitated by Central Oregon Partnership for Wildfire Risk Reduction (COPWRR) and costs approximately $6,500 per year. DNF staff and other participants donate their time and travel expenses.

### Table 2. Required socioeconomic monitoring and reporting

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Responsible party</th>
<th>Estimated annual cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>Multiparty field reviews</td>
<td>DCFP staff/COPWRR</td>
<td>$6,500 + in-kind</td>
</tr>
<tr>
<td>Annual reporting</td>
<td>DNF staff</td>
<td>$6,500</td>
</tr>
<tr>
<td><strong>TOTAL COST</strong></td>
<td></td>
<td><strong>$13,000</strong></td>
</tr>
</tbody>
</table>

### Multiparty field reviews

All CFLRP projects are required to conduct multiparty monitoring. According to its proposal to the Forest Service, DCFP fulfills this requirement by holding two post-implementation field reviews per year. During the field reviews, agency planners and managers, project partners, and other stakeholders collectively evaluate how well project goals and objectives have been met and make recommendations for future projects. Depending on project goals and objectives, the field reviews may include socioeconomic as well as ecological issues.

### Implementation and output measures

Each fall, the DNF is required to submit an annual report on a number of CFLRP performance measures, which include number of acres and number of miles treated for various purposes, green tons of biomass produced, and changes in numbers of wildfire ignitions and wildfires controlled.

### Matching funds and leveraged funds

CFLRP projects are also required to report total funds expended, broken down by appropriated CFLRP funds, partner matching funds, and Forest Service matching funds. Starting in 2012, CLFR projects will likely be required to report leverage funds, which are monetary and in-kind contributions from Federal, State, Tribal, and private sources that support project goals but are not counted as a direct match to the project. DCFP staff from the Central Oregon Intergovernmental Council and The Nature Conservancy will work with
agencies and organizations in Central Oregon to determine what other restoration work can be considered to leverage DCFP’s work and compile these data.

**Jobs created, jobs sustained, and regional economic impacts (TREAT)**

CFLRP projects are also required to use the Treatments for Restoration Economic Analysis Tool (TREAT) to estimate annual economic effects of their restoration activities. TREAT is an input-output model that estimates changes in employment and income. Project inputs to TREAT include total project funds, the distribution of funds to different project types, harvest volumes, and types of wood products generated from harvested material. TREAT uses this input and regional economic multipliers to estimate the number of jobs created or supported by the project, labor income, and total regional economic impacts, including direct, indirect, and induced effects.

**Fire suppression costs averted (R-CAT)**

The DCFP is leading an effort to use the Wildland Fire Management Risk and Cost Analysis Tool (R-CAT) to model the effects of restoration on the overall fire program management costs. R-CAT uses spatially explicit fuel models and fire behavior maps, average fire suppression and burned-area rehabilitation costs, and data on annual treatments to assess the effects of the CFLRP project on the landscape and estimate savings in fire suppression costs. The Forest Service has asked all CFLRP projects to complete R-CAT once. Depending on the results of those initial runs, projects may be required to use R-CAT again in Year 10 to compare pre-project and post-project conditions. Since the DNF reported baseline R-CAT results in 2011, it will not be required to do so again before 2020 and so is not included in Table 1.

**Biophysical monitoring**

Table 1 also does not include biophysical monitoring described in the DCFP proposal, including water quality, in-stream, riparian, and fish passage monitoring funded and conducted by the City of Bend and the Upper Deschutes Watershed Council. Additional CFLRP program ecological monitoring requirements are currently under review by the Forest Service. These would require the DCFP to (1) establish project-level and landscape-level desired conditions for fire regime restoration, fish and wildlife habitat condition, watershed condition, and non-native invasive species severity; (2) establish targets for each desired condition; and (3) periodically measure progress toward each desired condition. It is expected that this additional ecological monitoring will be required for Fiscal Year 2012.
Recommended Socioeconomic Monitoring

In 2011 the DCFP monitoring subcommittee and steering committee reviewed current CFLRP reporting requirements, proposed monitoring requirements, and other commonly monitored socioeconomic parameters. They recommended adding the socioeconomic monitoring parameters listed in Table 3.

### Table 3. Recommended socioeconomic monitoring

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Method</th>
<th>Responsible party</th>
<th>Est. annual cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>Public outreach and education efforts</td>
<td>Spreadsheet tracking dates and numbers</td>
<td>DCFP staff to communications subcommittee</td>
<td>$500</td>
</tr>
<tr>
<td>Project implementation costs</td>
<td>Compile and review per-acre costs associated with different treatments</td>
<td>DCFP staff to monitoring subcommittee</td>
<td>$0</td>
</tr>
<tr>
<td>Recreation and tourism impacts</td>
<td>Discuss during post-treatment field review</td>
<td>DCFP staff to monitoring subcommittee</td>
<td>$0</td>
</tr>
<tr>
<td>Economic impacts</td>
<td>(1) Rapid assessment of annual report data and TREAT inputs &amp; outputs</td>
<td>DNF staff, DCFP staff, contracting economist; with contractors, and mill operators</td>
<td>(1) $500 + in-kind</td>
</tr>
<tr>
<td></td>
<td>(2) Optional: Directly track jobs created and jobs sustained</td>
<td></td>
<td>(2) $4,000 + in-kind</td>
</tr>
<tr>
<td></td>
<td>(3) Optional: Directly track and model economic benefits</td>
<td></td>
<td>(3) $8,000 +in-kind</td>
</tr>
<tr>
<td>Collaboration effectiveness</td>
<td>(1) Collaboration survey</td>
<td>DCFP staff, with steering and subcommittee members and DNF staff</td>
<td>(1) $500 + in-kind</td>
</tr>
<tr>
<td></td>
<td>(2) Optional: Focus group discussion/After-action review</td>
<td></td>
<td>(2) $1,000 +in-kind</td>
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<tr>
<td></td>
<td>(3) Optional: Interviews</td>
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<td>(3) $2,500 +in-kind</td>
</tr>
<tr>
<td>TOTAL COST</td>
<td></td>
<td></td>
<td>$1,500 to $17,000</td>
</tr>
</tbody>
</table>

Cost estimates in Table 3 reflect an average of $50 per person-hour for DCFP staff to measure these parameters and a rough estimate of the cost to hire an economist to assist with economic monitoring. Actual costs could vary by as much as 20 percent. Cost estimates also assume that that steering committee members, DNF staff, timber and service contractors, and mill owners would contribute some in-kind time to complete the socioeconomic monitoring. The rationale for monitoring each parameter and recommended monitoring methods are described below the table.
Public outreach and education efforts

**Rationale**
One of the goals of the DCFP’s communications subcommittee is to raise community awareness and build broad support for landscape-level restoration with local and regional audiences. The subcommittee has developed a communications plan to address these goals. Data on numbers and types of outreach and educational materials and events, and numbers and types of people reached, can be used to track progress toward objectives in the DCFP communication plan and report outputs to funders and others. In addition, the compiled results can be reviewed annually or biennially to assess how well outreach and education efforts are reaching target populations.

The monitoring subcommittee discussed the option of conducting public surveys to track changes in public knowledge of forest health and fire conditions and attitudes toward restoration treatments, the DCFP, and others involved in forest management. However, they decided against developing and administering public surveys for two reasons: (1) recent public surveys that address these issues in general (although not the DCFP specifically) are available from Professor Bruce Schindler at Oregon State University and from the Oregon Forest Resources Institute, and (2) it is unlikely that DCFP communication activities will produce a statistically significant change on public knowledge and attitudes, so survey results would likely not provide useful feedback on the effectiveness of the DCFP’s outreach work. However, the monitoring subcommittee recommends that the DCFP communication subcommittee available survey results in the communication plan. It may also be possible to add questions related to DCFP’s work to future public surveys administered by OFRI or Oregon State University.

**Method**
Create a spreadsheet of outreach and education efforts and update it when events are held or information distributed. For outreach and educational activities, record the date, type of event, number of participants, and type of participants (e.g., grade school students, Rotary club members). For materials, record the type of material (e.g., brochure, report, press release), date(s) of distribution, and numbers distributed (or number of web site hits). Annually compile results and evaluate them in terms of needs and goals identified in the DCFP communication strategy.

**Responsible parties**
DCFP staff to the communication subcommittee.

**Cost**
About 10 hours of staff time per year, or approximately $500.
Project implementation costs

Rationale
DCFP partners, agencies, contractors, and other stakeholders are interested in keeping treatments cost-efficient while achieving desired outcomes. While per-acre treatment costs are often discussed during multiparty field reviews, they are not formally tracked by the DCFP and the specific site conditions or mitigation measures that affected costs are not always identified. Tracking this information would allow comparison of per-acre costs of different treatments and assessment of the cost impacts of specific contract requirements and mitigation measures.

Method
For both service and stewardship contracts, sales administrators track per-acre costs, and service line items are separated out by cost in the contract. It would be relatively simple for DCFP staff to the monitoring subcommittee to ask sales administrators for treatment costs per acre for each DCFP service and stewardship project treatment, along with a narrative description of site conditions, contract stipulations, and/or specific prescription elements that affected the cost. This information could then be shared and discussed on post-implementation multiparty field reviews and during project planning.

Responsible parties
DCFP staff to the monitoring subcommittee would gather the data from DNF staff and share it with the monitoring and restoration subcommittees.

Cost
Approximately five hours per project, which would be covered by the current multiparty monitoring field review budget.

Recreation impacts

Rationale
Steering committee members have expressed a desire to see recreation and tourism interests better integrated into project planning and review. Explicitly discussing recreation and tourism considerations during multiparty post-implementation field reviews would encourage this by eliciting feedback and recommendations for future project planning. The written record of these discussions would provide a means of tracking changes over time.

Method
Explicitly address recreation and tourism impacts in post-implementation field reviews.

Responsible parties
DCFP staff to monitoring subcommittee.
**Cost**
No additional cost (covered by budget for multiparty monitoring field reviews).

**Economic impacts**

**Rationale**
Estimates of jobs supported by the DCFP and regional economic impacts of the project are currently based TREAT model outputs, which use input data from contract agreements and from mill operators. However, the model does not distinguish between newly created or maintained jobs or between full-time, part-time, and seasonal jobs. The model also makes assumptions regarding restoration and mill workforces that may not reflect the local situation. According to the model’s developers, TREAT is not intended to provide accurate counts of the number of jobs created by each individual CFLRP project. Rather, TREAT provides broad-level data that can be used to compare economic trends among CFLRP projects. Initial reports from all funded CFLRP projects suggest TREAT job estimates tend to be high.

To allow national-level comparison and aggregation of CFLRP economic impacts, it is necessary that all CFLRP projects use the same method (TREAT) to measure economic outputs and outcomes. However, DCFP steering committee members and staff have expressed a need for more accurate jobs and economic impact data that can be used locally to build support for the project. This information could be developed by directly measuring jobs supported by the project and re-calcultating regional economic impacts using refined model assumptions. Ground-truthing TREAT inputs and outputs with locally gathered data would also help TREAT model developers improve the model.

The monitoring subcommittee recommends an initial meeting of DNF staff, contractors, and mill operators to assess annual report data on harvest volumes and TREAT inputs and outputs and, if possible, improve the estimates with readily available industry data. The results of this effort could be shared with the national TREAT modeling team to help them refine that model and with the DCFP steering committee to determine whether additional economic monitoring is needed. Based on this rapid assessment, the steering committee may decide to directly track jobs data and hire a local economics to model regional economic impacts.

**Methods**

(1) **Rapid assessment of TREAT inputs and outputs**
Conduct a rapid assessment by contractors, sales administrators, and mill managers involved in DCFP projects in 2011. Participants would review the 2011 DCFP TREAT data along with available industry data on jobs and product volumes, and discuss whether there
is a need for improving the accuracy of TREAT inputs or directly measuring economic outcomes of the project. TREAT model developers could participate by telephone.

(2) Directly track jobs supported by DCFP projects
Work with DNF staff, contractors, and mill managers to track types and numbers of jobs directly attributable to DCFP projects. This will require that contractors and mill managers review their employment records and possibly develop a process for tracking how much time each employee spends on DCFP work versus other work. Typically, such data are gathered by surveying or interviewing business managers. The Southwest Crown of the Continent CFLRP project in Montana has developed a contractor survey for this purpose that could be adopted or modified by the DCFP. To protect proprietary business information, individual business data would be kept confidential and only aggregated results would be shared with the steering committee.

(3) Calculate direct, indirect, and induced economic benefits to the region
TREAT is a modification of the standard model used to calculate regional economic impacts, IMPLAN (IMpact analysis for PLANning). IMPLAN assumptions and data can be further modified to reflect local economic conditions and estimate part-time as well as full-time jobs. This requires carefully defining the impact region and gathering primary data on numbers of jobs, harvest volumes, and wood products directly attributable to DCFP projects. It may also require additional information from mills, such as general business characteristics, the types of work they perform, employment, and their non-labor expenses. These data would be used only to adjust the IMPLAN model and would be kept confidential. Modifying and running IMPLAN to develop more accurate estimates of regional economic impacts will require the work of an economist experienced with IMPLAN and the forest industry. The contracted economist would work closely with the TREAT model developers and DCFP and DNF staff.

**Responsible parties**
DCFP staff and DNF staff responsible for annual reporting, with input from timber and service contractors and mill managers.

**Cost**
(1) The rapid assessment is estimated to require approximately 10 hours total from DCFP and DNF staff, or $500, plus 2-4 hours in-kind from each contracting business and mill involved in DCFP projects in 2011.

(2) Directly tracking jobs supported by the project is estimated to require 80 hours of DCFP staff time, or $4,000, to identify the data needed and develop a template for data management; review employment records and/or survey contractors, mill managers, and appropriate DNF staff; and compile results. Alternatively, DCFP could hire a contracting
economist to gather this data, at a similar cost. This estimate does not include time contributed by timber and service contractors, mill managers, and DNF staff.

(3) Hiring a consulting economist to gather additional IMPLAN input data, modify the model to better approximate local conditions, and run the model will cost up to $8,000. The cost for a consulting economist will vary depending on the effort required to gather input data and coordinate with TREAT model developers.

Collaboration effectiveness

**Rationale**
Collaboration effectiveness is commonly measured by asking people knowledgeable about the collaborative group to evaluate how well it is functioning. If the same individuals are periodically asked to evaluate the same set of factors, for instance by completing an annual survey, results can be used to track changes in the collaboration effectiveness as well as identify opportunities for improvement.

Some DCFP steering committee members have expressed a particular interest in understanding how results of the collaborative effort, including monitoring results, have changed forest management on the DCFP landscape. Some of these changes may be measured as tangible outputs or outcomes (such as acres treated or dollars saved) but others may be less quantifiable yet important shifts in the way the Forest Service and DCFP partners plan and implement work. Understanding how DCFP work has influenced planning, management, and decisionmaking can help the steering committee monitor adaptive management trends.

**Methods**
In 2011, the National Forest Foundation developed a collaboration effectiveness survey for CFLRP projects. The survey consists of ten statements about issues that have been found to be important for successful collaboration, including tangible progress toward goals, representativeness, leadership, communication, good-faith participation, and accountability. Respondents are asked to rate whether they strongly agree, agree, are neutral, disagree, or strongly disagree with each of the statements. The Forest Service will not require CLFRP projects to complete and report results of this survey, but the CFLRP Coalition, an advocacy group that reviews and promotes the program, may request that all funded projects complete the survey and share results with the Coalition.

The monitoring subcommittee recommended reviewing the proposed effectiveness survey, possibly adding few additional questions on issues of most importance to the DCFP, and testing the survey in 2012.
Another option for measuring collaboration effectiveness is a focus group meeting or after-action review. Group discussions like those that occur on the DCFP’s multiparty monitoring field tours would have the added benefit of improving mutual understanding of individual perceptions of collaboration effectiveness and facilitating a collective evaluation of effectiveness. DCFP could use a focus group process to review survey results and identify aspects of the collaborative effort that are working well and aspects that could be improved.

(1) Collaboration effectiveness survey
The survey developed by the National Forest Foundation is shown below:

<table>
<thead>
<tr>
<th>Rate your level of agreement with each statement on a scale of 1 to 5, where 1=strongly disagree, 2=agree, 3=neutral, 4=disagree, and 5=strongly agree.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Organizations that we need to be members of this collaborative group are engaged or have been invited.</td>
</tr>
<tr>
<td>People in our collaborative are willing to work toward agreement on important aspects of our project.</td>
</tr>
<tr>
<td>People in this group communicate openly with one another.</td>
</tr>
<tr>
<td>The people who lead this collaborative group communicate well with all of the members.</td>
</tr>
<tr>
<td>Our CFLR project is up to date on how implementation is progressing.</td>
</tr>
<tr>
<td>Implementation of treatments is in alignment with our CFLR project objectives.</td>
</tr>
<tr>
<td>Project implementation is moving the landscape toward more resilient ecosystems.</td>
</tr>
<tr>
<td>More restoration is happening on the ground as a result of the collaboration.</td>
</tr>
<tr>
<td>CFLR project participants do a good job of following through on collaborative agreements.</td>
</tr>
<tr>
<td>The collaborative’s participation improves the Forest Service’s decision-making process and implementation.</td>
</tr>
</tbody>
</table>

Closed-ended questions such as these are useful because they are quick and easy to answer and results can be quantified, for instance to show what percentage of respondents agree or disagree with a statement. However, the closed-ended question format does not provide a mechanism for asking why people agree or disagree with the statements or how they think a particular factor has affected the process or results. It also does not allow them to make recommendations for improvement. It therefore may be useful to add some open-ended questions to the survey.

Collaboration research has identified several variables associated with successful collaboration that may be useful for the CFLRP to track, including those addressed above in the collaboration effectiveness survey. Additional factors are listed below. The DCFP steering committee may want to measure one or more of these variables through a written survey, interviews, or facilitated group discussion.
<table>
<thead>
<tr>
<th>Effectiveness indicators</th>
<th>Sample survey/interview/discussion questions</th>
</tr>
</thead>
</table>
| Tangible outcomes        | What projects have been implemented that would not have been possible without the DCF?  
How has the collaborative effort improved project planning?  
How has the collaborative effort reduced conflict among stakeholders?  
How has participation in this collaborative effort led participants to change their beliefs or behavior? |
| Shared purpose and goals | Are the purpose and goals of the effort clearly articulated?  
Do participants all identify the same purpose and goals?  
Do participants agree that the collaborative effort is focused on the most important issues?  
Do participants feel that the effort is worth the time and money invested? |
| Effective decisionmaking | Do participants think the decisionmaking process is fair?  
Is the group able to reach decisions in a timely manner?  
Can the group’s recommendations be implemented?  
Do people with decisionmaking authority respect and implement group decisions? |
| Effective communication   | Does the group process encourage identification and discussion of areas of disagreement?  
Is the organizational structure effective?  
Is the best available information used in planning, decisionmaking, and implementation?  
Has participation in this effort increased participants’ understanding of each others’ perspectives? |
| Adequate funding and staffing | Are key functions and activities adequately funded?  
Are there adequate staffing and administrative support? |

(2) **After-action review**

Hold a facilitated group discussion of survey results or a focus group meeting modeled after an after-action review. The basic after-action review model has participants in a particular task or project collectively discuss four questions:

1. What was supposed to happen?  
2. What actually did happen?  
3. What can we learn from this?  
4. What are we going to do next time?

The purpose of an after-action review is not rehash every aspect of an effort or to evaluate performance, but to identify what worked well and how to improve things that didn’t work well to improve future management.
The group discussion could be focused on a particular process, such as the development of specific management recommendations, or more generally on collaboration effectiveness over a defined time period, such as the past year. To look retrospectively at changes in planning, management, and decisionmaking, the DCFP may want to add a fifth question, “What did we do differently this time?” Focus group discussions should be structured around specific questions and facilitated.

(3) Interviews
To focus more directly and substantively on management adaptations, DCFP staff or a contractor could interview key agency and industry managers to identify how their practices have evolved over time and how input the DCFP has influenced those changes. An interview process would allow more in-depth analysis of how planning, management, and decisionmaking has changed and possible reasons for the changes.

Responsible parties
DCFP staff would be responsible for administering the survey, facilitating group discussions, and compiling results. Steering committee members, subcommittee members, and DNF staffers would be responsible for completing the survey and participating in group discussions.

Cost
(1) Approximately 10 hours per year, or $500, for DCFP staff to amend the survey, administer it, and compile responses. (2) Approximately 20 hours, or $1,000, for DCFP staff to organize and facilitate one group review and compile results. (3) Approximately 60 hours, or $2,500, for DCFP staff to interview 5 to 10 planners, managers, and decisionmakers and analyze results. Hiring a contractor to complete any of these activities could increase costs. These estimates assume that DCFP steering committee and subcommittee members and DNF staff would contribute their time as an in-kind contribution to the project.