

Strategies for Success Under Forest Service Restoration Initiatives

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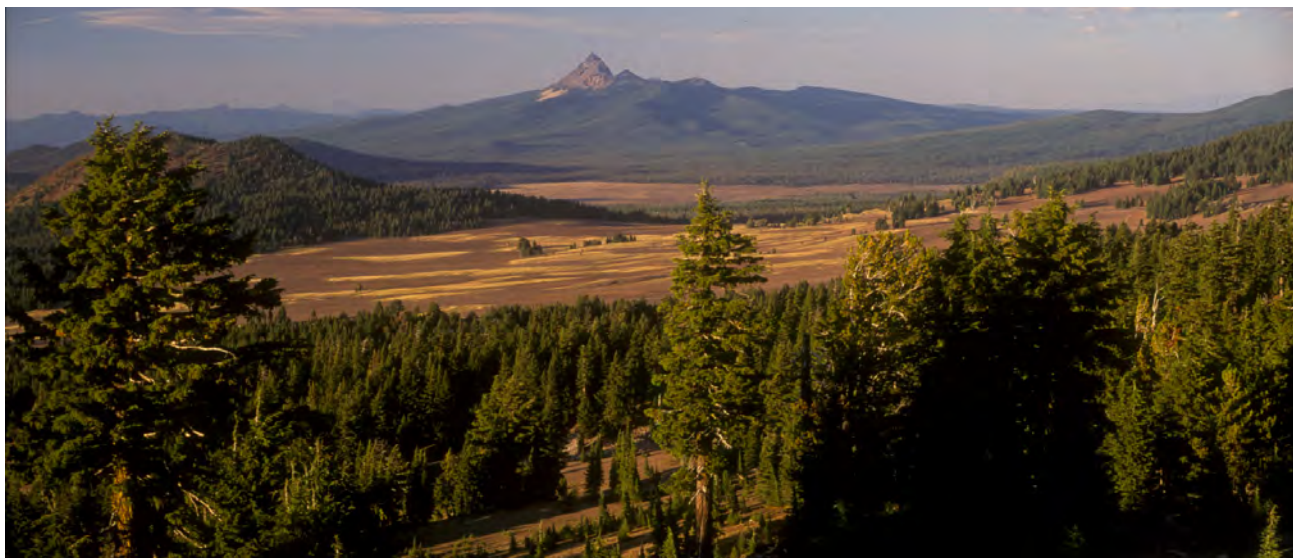
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Executive summary

Over the last decade, the Forest Service has been implementing a series of new initiatives designed to accelerate cross-boundary, collaborative, integrated restoration. Between April-September of 2017, with funding from the US Forest Service, we investigated two of these initiatives, the Collaborative Forest Landscape Restoration Program (CFLRP) and the Joint Chiefs' Landscape Restoration Partnership (JCLRP). We surveyed 425 Forest Service and NRCS staff and conducted a total of 143 interviews with both agency staff and external stakeholders for the CFLRP and JCLRP projects to obtain detailed perspective about our questions and reach external partners. Our objectives were three-fold:

1. Understand the value added by the CFLRP and JCLRP.
2. Identify factors that support success and persistent challenges.
3. Inform future implementation and design of collaborative restoration approaches.

Key findings: CFLRP

The CFLRP added value in the following ways:

- The majority of agency staff reported success at achieving project objectives and said the CFLRP allows forests to focus on their high priority work.
- The most valuable aspect of the CFLRP has

been the long-term funding commitment and prioritization of a particular landscape. These features incentivized collaborators to invest their time and effort, helped to leverage resources, and allowed for a coordinated program of work across the landscape.

- The CFLRP legitimized collaboration as a way of doing business and, in most places, decreased conflict and litigation.
- Most respondents reported significant progress in addressing the threat of fire in their project areas, although more could be done through application of prescribed fire and maintenance of treatments.
- The program supported existing industry, but the majority of projects said the CFLRP was not successful in reducing treatment costs through utilization of restoration byproducts and did not support new wood products markets and facilities.

The CFLRP was most successful in places with:

- A strong history of collaboration, transparent communication strategies, and agreement about a restoration vision.
- Strong line officer leadership and strategic thinking about both a restoration vision and how to find adequate capacity to implement projects.
- Industry capacity and valuable forest products.
- Project work focused on relatively less contentious landscapes.
- Professional facilitation and partners with scientific or legal expertise.

Less successful projects generally suffered from poor collaboration and communication, limited agency capacity, line officer and staff turnover, unexpected ecological disturbances, and a lack of markets, wood products facilities, or strong industry partners.

Over 90% of survey respondents and interviewees said the program should continue, and most said that they would reapply for funding. Some respondents anticipated negative effects on communities and collaboration when funding ends but also said there will be enduring benefits. Recommendations included ensuring adequate capacity and high-quality leadership follow CFLRP investments and identifying funding mechanisms to maintain treatments.

Key findings: JCLRP

The JCLRP added value in the following ways:

- Strong majorities reported success at achieving all of the primary objectives of the JCLRP and said the initiative allowed them to focus on their high priority work.
- The multi-year funding commitment marked projects as agency priorities, leading to increased leveraging of funds, landowner participation, and cross-boundary work.
- For most projects, the JCLRP commitment to a landscape spurred improvements to interagency partnerships and collaboration with stakeholders, leading to decreased conflict and increased trust.
- Although it was not a goal of the JCLRP, some workforce capacity also was developed under the JCLRP.

The JCLRP was particularly successful in places with a history of collaboration, willing landowner and community partners, and adequate agency capacity and leadership. Less successful projects reported a lack of coordination and communication between the Forest Service and NRCS, staffing limitations compounded by hiring delays, lack of willing landowners, lack of prior collaborative planning efforts, and problems with some landowner assistance requirements.

Over 80% of agency staff and nearly all interviewees, even those on less successful projects, said the JCLRP approach should continue and that they valued the emphasis on public-private partnerships, the requirement to work collaboratively, and the multi-year funding. Recommendations included ensuring adequate capacity is in place to support projects, improving the proposal evaluation process, and improving communication between and within the agencies.

Recommendations

Multi-year investment, with a collaborative and landscape focus, is essential to successfully leveraging resources and affecting ecological conditions at meaningful scales.

- The multi-year commitment to a place gives a landscape credibility and incentivizes partners to focus their capacity and leverage funding in a specific place.
- For most projects, the landscape-scale focus of both the CFLRP and JCLRP led to improved landscape-scale planning, which is essential for affecting ecological processes like fire. However, it was beyond the scope of our project to measure ecological outcomes.

These types of focused investments should be coupled with a transformed business model for the Forest Service that orients staff capacity, leadership, and agency-wide attention to support priority projects and landscapes.

- The presence of high-quality leadership and adequate capacity was a critical predictor of success.
- Our data indicated that staff turnover and lack of adequate capacity were the primary internal agency factors that undermined project success.

A key question is whether more can be done to revitalize industry for landscapes that are priorities for investment but have low-to-no value wood products and minimal industry infrastructure.

- Strategic investments in industry capacity, along with more certainty about treatment

plans on a landscape, would be necessary to successfully rebuild or expand industry capacity where it currently is limited or does not exist.

- In some places there may not be enough prospect of timber harvest to support capital investment in forest products utilization. In these cases, it may be best to focus investments in service contracts and contractor capacity.
- For multiple projects, faster planning approaches or increased accomplishments were not enough to overcome current market limitations that resulted in a lack of implementation or wood products utilization.

CFLRP and JCLRP approaches are not equally suited to all places.

- Our findings indicate that CFLRP might be best suited to places with large-scale, contiguous landscapes in need of restoration and where there is currently either limited industry capacity or industry partners who rely on large amounts of low-value product. These situations necessitate a multi-year, landscape-level focus.
- Other places where conflict is high, timber has high value, or where restoration needs are more dispersed across the landscape also may benefit from focused investment; however, these places may be better suited to regional prioritization processes that can focus investment for shorter periods of time.
- The JCLRP investments could be more strongly coupled with assessment of places with the highest need for fuels reduction, wildlife habitat restoration, or watershed restoration, depending on agency priorities; the approach is well-suited for all-lands challenges that necessitate cross-boundary work.

Our findings offer numerous criteria that could be used to improve proposal evaluation processes going forward.

- A history of collaboration, established relationships, and agreement around restoration goals were the primary variables people consistently said led to successful projects;

we also identified multiple other variables, specific to each program, that would indicate likelihood of success.

- Continuing to refine proposal processes to assess for these items would help to ensure that priority investments are made in the locations with the best chance of success, or to identify places that may be high priorities for work but need additional support and capacity to move forward successfully.

Many projects would benefit from continued funding to maximize the return on investment to date.

- It will be necessary to support maintenance of treatments and improve application of prescribed fire in order to maximize the value and long-term benefits of investments.
- Most of these landscapes have built partner and stakeholder agreement and capacity. Many participants in our study were concerned collaboration would wane if additional funding is not allocated to these landscapes. The agencies may want to consider how to maximize the return on investments that have been made in building collaborative capacity, under the CFLRP in particular.



Project overview and background

Over the last decade, the Forest Service has been implementing a series of new initiatives designed to accelerate cross-boundary, collaborative, and integrated restoration. In April of 2017, we entered into a challenge cost-share agreement with the US Forest Service to independently investigate two of these initiatives, the Collaborative Forest Landscape Restoration Program (CFLRP) and the Joint Chiefs' Landscape Restoration Partnership (JCLRP). As both of these efforts approached the end of their initial cycles of funding, it was important to evaluate them to understand what worked, why some projects had more success than others, and opportunities for improving agency restoration policies and practices. Our objectives were three-fold:

1. Understand the value added by the CFLRP and JCLRP. Our goal was to understand the beneficial effects of these efforts beyond accomplishment data, which the Forest Service collects and analyzes. Instead, we wanted to know how these efforts have allowed projects and stakeholders to identify and implement new and improved approaches to restoration and how they are allowing the agency and partners to overcome longstanding challenges.
2. Identify factors that support success and persistent challenges.
3. Inform future implementation and design of collaborative restoration approaches.

Background on the CFLRP and JCLRP

In 2009, Congress established the Collaborative Forest Landscape Restoration Program (CFLRP, P.L. 111-11), which allocated funding through a competitive process to landscape-scale, restoration projects proposed jointly by the Forest Service and a group of collaborators on national forest lands. The law requires projects to develop a program of work on landscapes larger than 50,000 acres and to characterize the ecological need, social agreement, and

economic opportunities associated with forest restoration byproducts that make the landscape a priority for investment. There are 23 CFLRP projects across the United States that vary in size and have unique collaborative histories, infrastructure, and ecological conditions; all are in fire-adapted landscapes, with the goal of reintroducing natural fire and reducing the risk of fire to valued resources. The ten projects funded in 2010 received a ten-year funding commitment; 13 additional projects were funded in 2012 with an 8-year funding commitment (see Figure 1, page 5).

The Joint Chiefs' Landscape Restoration Partnership (JCLRP), established in 2014, is a multi-year partnership between the Forest Service and Natural Resources Conservation Service (NRCS) to facilitate cross-boundary restoration through inter-agency and community collaboration. The primary goals of the initiative are to work across public and private lands to reduce wildfire threats to communities, protect water quality and supply, and improve habitat quality for at-risk or ecosystem surrogate species. The JCLRP provides up to three years of funding for projects through a competitive process managed internally by the NRCS and Forest Service. Approximately 50 projects have been funded to date, beginning with 13 projects in 2014 and 15 projects in 2015 (see Figure 2, page 6)

Methods

Our detailed methods can be found in Appendix A (page 24). In short, the project involved:

- Online surveys of 425 Forest Service and NRCS staff (n=196 for JCLRP project respondents, n=229 for CFLRP project respondents), including project leads, team members, and line officers on CFLRP and JCLRP projects. The goal of the survey was to obtain generalizable data to inform our research questions.
- Confidential interviews with agency staff and external stakeholders for both CFLRP (81 total interviews) and JCLRP (62 total interviews) projects to obtain detailed perspective about our questions and reach external partners.

Figure 1 Collaborative Forest Landscape Restoration Program projects

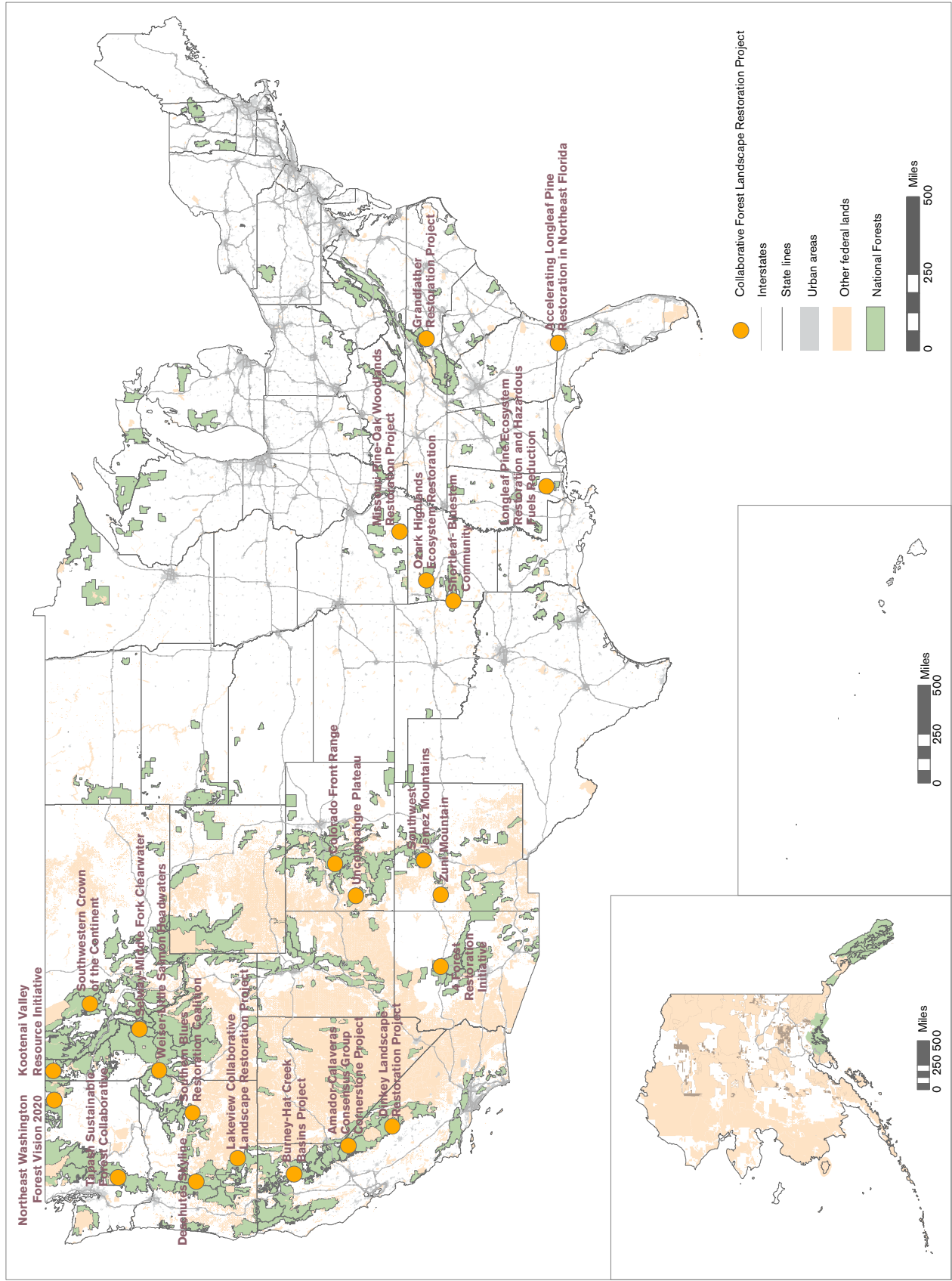
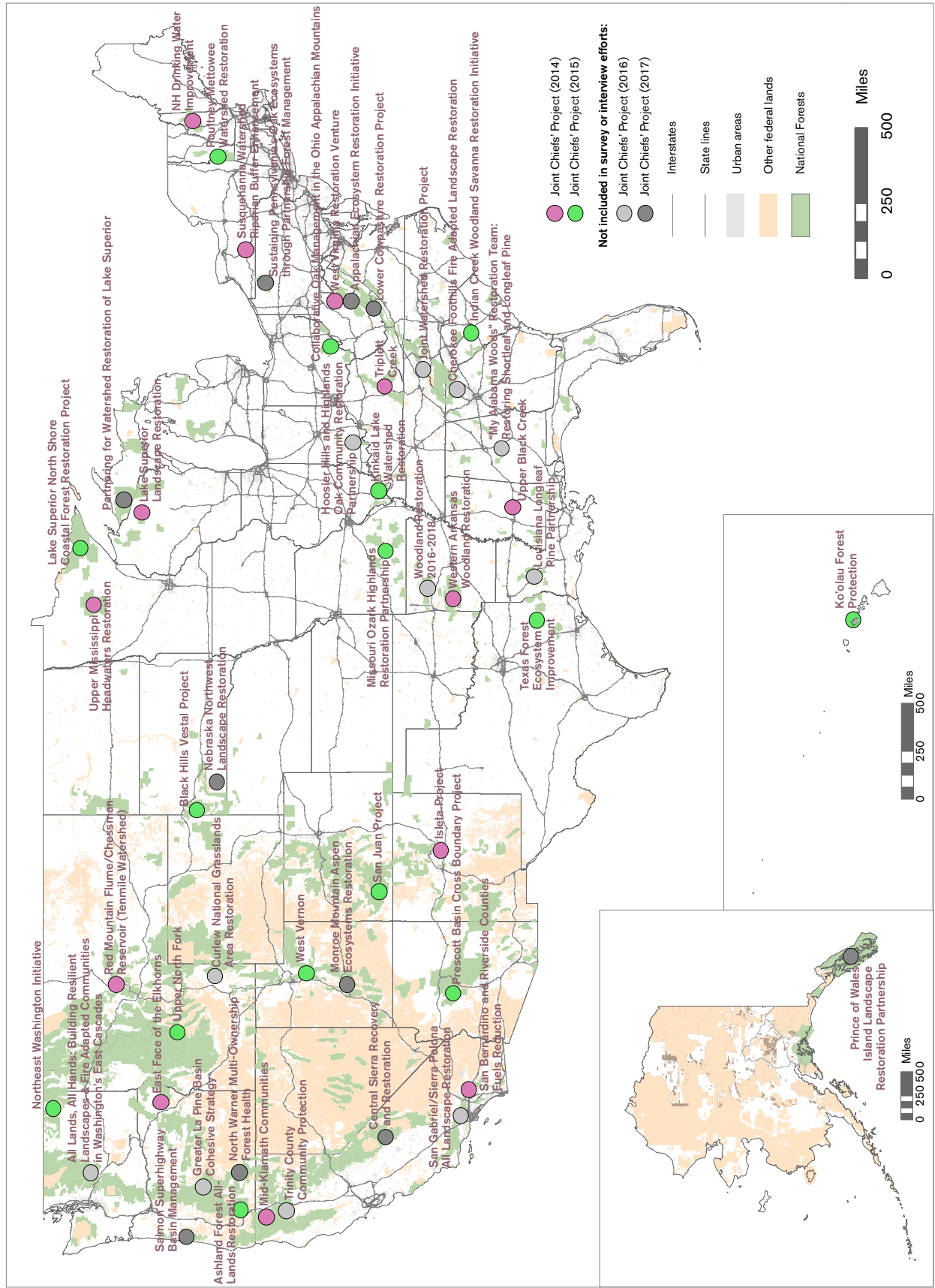


Figure 2 Joint Chief's Landscape Restoration Partnership projects



Results

This report provides a summary of our findings. Our detailed results, including survey and interview data, can be found in Appendix B, which is available online at <https://ewp.uoregon.edu/publications/working>.

Collaborative Forest Landscape Restoration Program

What worked and what didn't

The majority of agency staff reported success at achieving project objectives and said the CFLRP allows forests to focus on their high priority work.

- A majority of respondents reported success at meeting all CFLRP goals, except reducing treatment costs through restoration by-products. Strong majorities reported success in planning at landscape scales, integrating across resource areas, and increasing the pace of restoration.
- Strong majorities of survey respondents said they had reduced the threat of fire in their project area and improved ecological conditions.
- Three-fourths of survey respondents said the CFLRP allowed their forest to focus on their highest priority work; line officers in particular said this was true.
- Many people said their project included restoration activities that would not typically get funded, due to the focus on integrated landscape restoration.
- About a quarter of projects were not on track to meet restoration goals; we discuss commonalities for these projects in the next section.

The most valuable aspect of the CFLRP has been the 8 or 10-year funding commitment and prioritization of a landscape. These features incentivized collaborators to invest their time and effort, helped to leverage resources, and allowed for a coordinated program of work across the landscape.

- Strong majorities of survey respondents said the 10-year commitment to a landscape was the most valuable aspect of the CFLRP.
- For most projects, the value-added of the CFLRP, according to the survey and interviews, went beyond increased investment, due to improved landscape-scale planning, stronger interagency and stakeholder relationships, leveraged funds, and increased implementation and planning efficiencies.
- About half of interviewees reported that CFLRP has allowed them to do larger-scale NEPA in faster time frames.
- As one interviewee noted, “CFLRP provides some leveraging opportunity for additional funding and additional projects, when you have a number of stakeholders that are involved and all aimed at a similar goal.... I think it's definitely been a powerful thing.”

The CFLRP legitimized collaboration as a way of doing business and, in most places, decreased conflict and litigation.

- An almost universally reported success under the CFLRP was the strengthening of collaborative relationships.
- In the survey, 75% of respondents said they had seen decreased conflict and 61% said they had decreased litigation.
- Strong majorities of survey respondents said collaborators had influenced planning, monitoring, and communication strategies and that trust, transparency, and communication had improved.
- External interviewees also said collaboration had improved, but to various extents, depending on the historical level of conflict or trust, the receptivity of local managers to collaborative input, and the degree of contention about restoration goals on a landscape.

Most respondents reported significant progress in addressing the threat of fire in their project areas, although more could be done through application of prescribed fire and maintenance of treatments.

- Eighty percent of survey respondents said they had reduced the potential threats of fire in their project areas because of CFLRP.
- Multiple projects had fire burn through their project areas and, when it did, reported less intense fire behavior and greater access for fire crews.
- Many projects said they had not been able to accomplish prescribed fire to the extent they wanted to.
- In addition, 84% of staff said they would not be able to maintain treatments in the future without additional funding.

While the program supported existing industry, the CFLRP was not, on the whole, successful in reducing treatment costs through restoration by-products or supporting new wood products markets and facilities.

- Our interviews indicate that the CFLRP projects supported existing industry, in some cases leading to more work shifts at local mills, revitalizing businesses that were struggling to stay afloat, and reducing treatment costs.
- The CFLRP was not successful at creating new businesses, nor did it provide the amount of product or certainty to allow existing industry partners to expand significantly.
- About half of respondents in our survey said they had some success in supporting wood products contractors and facilities, and about a third said they had some success in reducing treatment costs with restoration byproducts.



Why some projects were more successful than others

Projects we considered successful were those where all interviewees agreed that the project was meeting its intended objectives and achieving targeted vegetation management accomplishments, and where stakeholders were satisfied with their level of involvement. Less successful projects were those where interviewees said they were not on track with meeting accomplishments and where one or more interviewees said the stakeholders or agency personnel were dissatisfied with the quality of collaboration on the project area.

A history of collaboration was the biggest predictor of success.

- Almost all surveyed agency personnel said that their communication strategy with stakeholders, their unit's history of collaboration, and their stakeholders' history of collaboration were the biggest contributors to success.
- Interviewees on more successful projects said they had collaboratively developed zones of agreement through rigorous, time-intensive conversations, including field trips, research, and monitoring.
- Stakeholder groups with a history of conflict or distrust among stakeholders or with the agency reported less success, although they often still reported improved relationships.
- Stakeholder groups involved in project planning were more satisfied with collaborative efforts and their overall influence on CFLRP projects.
- More challenges were faced on projects with newly formed collaborative groups or that engaged multiple national forests with differential levels of history of or commitment to collaboration.

Effective leadership, communication, and strategic planning were key factors underlying success.

- Strong leadership from line officers was key to ensuring adequate resources were available for accelerated planning and implementation.
- Line officers were also essential for setting expectations on their units, particularly around

a culture of collaboration and prioritization; it was valuable to have both strong district- and forest-level leadership.

- Full-time CFLRP coordinators were essential, according to interviewees, to maintain continuity, communication, and momentum.
- A strong majority of survey respondents indicate that strategic planning was important to success; interviewees pointed to the value of five-year restoration strategies at the forest level.
- External interviewees said that strong and established lines of communication within stakeholder groups and with agency personnel were critical.
- Regional leadership also played a valuable role by ensuring projects had adequate capacity and funding and by providing extra capacity for contracting and entering agreements.

The primary internal barriers to success were a lack of agency capacity and staff turnover.

- Lack of agency capacity and frequent staff or line officer turnover were the biggest factors that stymied success. Strong majorities of survey respondents and interviewees said these were problems for their projects. In some places, units had extremely high levels of turnover and vacancies, making it hard to get work done and maintain continuity.
- Projects with limited line officer leadership or high rates of turnover said they faced difficulty in engaging collaboratively, maintaining trust and agreement, innovating, and finding adequate capacity to support project implementation.

Markets, timber value, and contracting were the most important external factors that affected project success.

- Local wood products contractors, facilities, and markets helped projects successfully get work done.
- Local "mom-and-pop" industry partners often were more willing to work with collaborators to find a way to conduct work on the landscape; people attributed this to their low overhead costs and strong community ties.

- Industry infrastructure did not guarantee success. For example, one project had a robust timber industry, but for various reasons, including unexpected disturbance and limited agency capacity, struggled to proceed as planned.
- Valuable timber was helpful in that receipts could be reinvested in the landscape; however, the presence of valuable timber made collaboration even more important, especially with local county commissioners and less trusting partners. Some people questioned whether places with valuable timber and considerable conflict are the best places for long-term investment under the CFLRP.
- Survey respondents ranked a lack of wood products contractors or markets as the most important external factor that limited success.
- Contracting capacity was a challenge in some places; in addition, in other places contracts were awarded to businesses that did not perform or went bankrupt, severely undermining project progress.

Having a relatively less contentious landscape allowed for successful progress.

- Projects in relatively more contentious landscapes (e.g. in mixed conifer forests, with many at-risk species, or with recent disturbances) had a harder time finding agreement about the path forward.
- Places where a disturbance occurred during the project often found that their planning efforts became obsolete; disturbances also sometimes made it harder to find agreement about how to respond and move forward.
- Interviewees suggested that starting in less contentious areas to build agreement and demonstrate success was important to do before undertaking more controversial activities.

Partners that offer facilitation, science capacity, and legal expertise contribute substantially to successful projects.

- Over 80% of survey respondents said professional facilitation was key to success; interviewees confirmed this.
- People pointed to the value of committed partners who can help stakeholders understand local ecology, conduct monitoring, or navigate legal requirements.
- On some projects, high numbers of partners with scientific expertise made it more difficult to find agreement.

In summary, the most successful projects had the following in common:

- A strong history of collaboration, transparent communication strategies, and agreement about a restoration vision.
- Strong line officer leadership and strategic thinking about both a restoration vision and ensuring adequate capacity was in place to accelerate activities.
- Industry capacity and valuable forest products.
- Project work focused on relatively less contentious landscapes.
- Professional facilitation and partners with scientific or legal expertise.

Less successful projects had the following in common:

- Poor collaboration and communication.
- Line officer and staff turnover, along with inadequate agency capacity.
- Lack of markets, wood products facilities, or strong industry partners.
- Unexpected ecological disturbances.



Future of the CFLRP and projects

Almost all survey respondents and interviewees said the program should continue, that they would reapply for funding, and that the program should be expanded to other types of restoration needs (see Figure 3, page 13).

- Over 90% of surveyed staff said the CFLRP should continue.
- Interviewees also said the program should continue; even participants on projects they characterized as less successful said the program should endure.
- Multiple interviewees suggested allowing CFLRP dollars to go towards planning, with some suggesting a staged funding approach that also would include a mechanism for supporting maintenance of treatments.

Project participants anticipated some negative effects on communities and collaboration when funding ends, but they also said there will be enduring benefits.

- A majority of surveyed staff said they will see negative effects on the community when funding ends; some indicated this was because of the lack of funding to continue valuable work and support jobs.
- Thirty percent said the CFLRP creates unsustainable expectations with partners. While we do not have data on why people believe this to be true, a couple interviewees said that the influx of funding may contribute to short-term booms for local economies that will not be sustained.
- Many interviewees reported that while they have not made as much initial progress as they wished, they have positioned themselves to be more productive should CFLRP funding continue. Multiple interviewees reported they underestimated the amount of time, money, coordination, and staff it would take to be prepared to implement immediately when CFLRP money arrived, but that the CFLRP investment has positioned them for future success.
- Regardless of whether they receive additional funding, a majority of interviewees and survey

respondents reported they will try to continue to work with their stakeholders on collaborative restoration, and agency staff said they have developed an improved ability to work at larger scales and leverage funds from partners.

A significant minority of respondents reported downsides of the CFLRP to other forests and programs.

- Thirty-six percent said the CFLRP leads to too much emphasis on funded landscapes at the expense of other important work.
- About 20% of survey respondents believed that the initiative negatively affects other forests within a region.

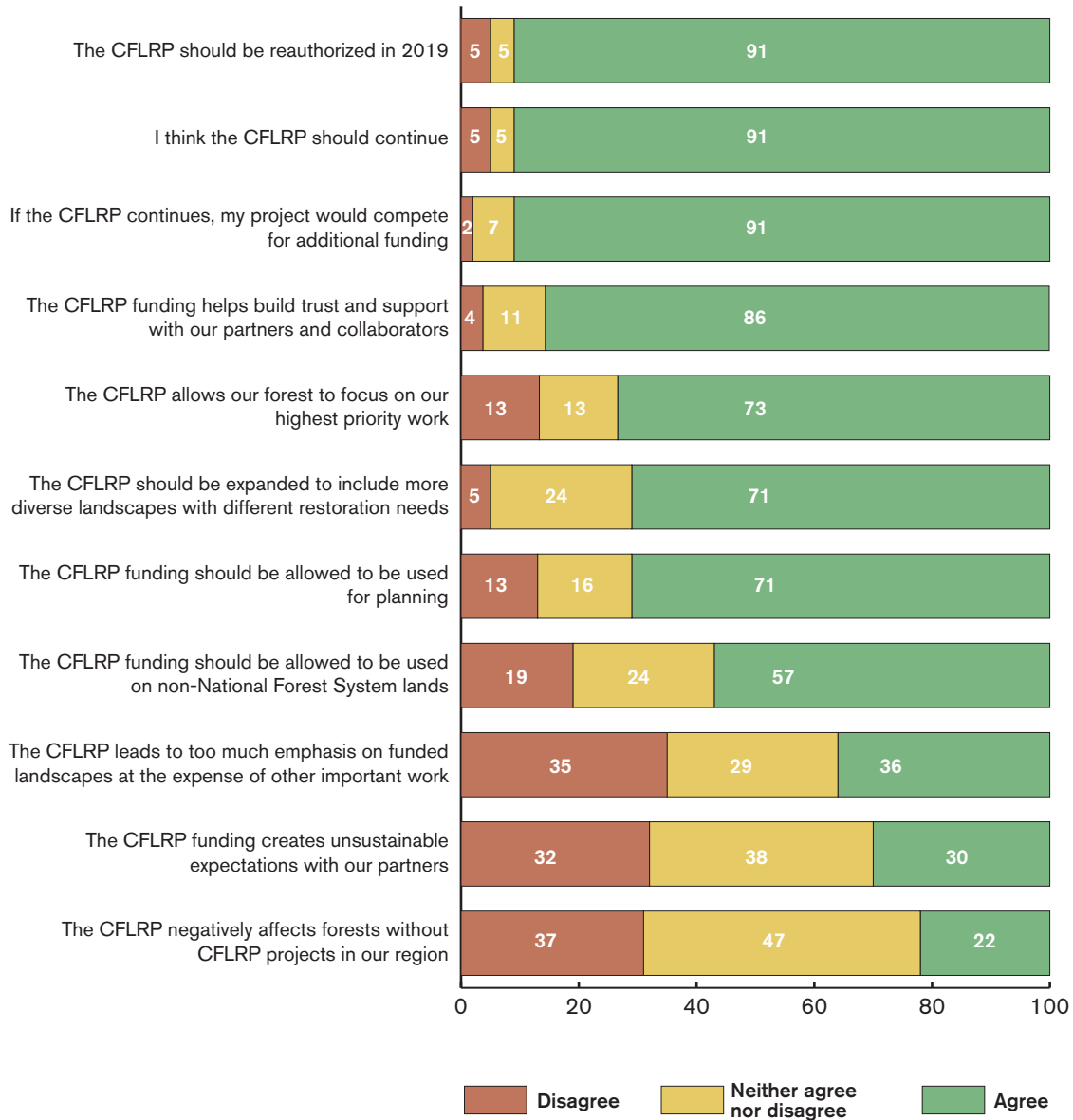
The majority of interviewees said it was critical to ensure adequate capacity and leadership follow CFLRP investments.

- Interviewees suggested that it is imperative that groups have a professional facilitator so collaborators can more effectively work through difficulties, identify zones of agreement, and communicate. Some said this would require changes to how funding can be used.
- The majority of interviewees reported they would like to see incentives for agency staff staying in place for the lifetime of a project, particularly for the CFLRP coordinator.

A majority of agency interviewees said metrics and accountability need to be improved.

- Interviewees want metrics and measurement systems to be streamlined and aligned more closely with other metrics the agency already reports. Many interviewees felt they spent too much time reporting, drafting annual reports, and trying to track accomplishments in multiple databases.
- Several interviewees suggested a need for communication requirements with the collaborative group. A few interviewees suggested, for example, there be mandatory communication of annual reports, budgets, and performance measures by the agency to the collaborative group.

Figure 3 Survey respondent agreement with statements about the CFLRP, by percentage of respondents





Joint Chiefs' Landscape Restoration Partnership

This report provides a summary of our findings. Our detailed results, including survey and interview data, can be found in Appendix B, which is available online at <https://ewp.uoregon.edu/publications/working>.

What worked and what didn't

Strong majorities reported success at achieving all of the primary objectives of the JCLRP and said the initiative allowed them to focus on their high priority work.

- Almost everyone in the survey (>80%) and in interviews said they were engaging in restoration at landscape scales more than in the past.
- Seventy-eight percent of respondents said they had increased the pace of restoration on their project areas and attributed this to the JCLRP.

- About 75% of people said that JCLRP allows them to focus on their high priority programs and projects.
- Over 70% of agency personnel said they were accomplishing more work on adjacent lands, improving vegetation conditions, improving fish and wildlife habitat, and integrating across resource areas.
- Sixty percent reported success at reducing the threat of fire to local communities and improving watershed conditions.

The multi-year funding commitment marked projects as agency priorities, leading to increased leveraging of funds, landowner participation, and cross-boundary work.

- Interviewees across all projects indicated that increased funding incentivized partner and landowner participation. NRCS interviewees reported that working on JCLRP projects with private landowners made the agency more relevant in those communities, particularly with private forest landowners.

- Seventy-three percent of survey respondents said that because of the JCLRP, they had leveraged more funds from partners, other agencies, or stakeholders.
- Seventy-eight percent said they were accomplishing more work on state and private lands. As a Forest Service employee stated, “To me the biggest value added with this is working across borders. We can do what we can do on Forest Service land, but if there’s not additional treatment done on private land it’s kind of a moot point. The forest doesn’t stop at an arbitrary political boundary, and the work needs to be done across borders.”

The JCLRP commitment to a landscape spurred improvements to interagency partnerships and collaboration with stakeholders.

- A majority of interviewees reported an increase in understanding between the Forest Service and NRCS regarding their processes, resources, and areas of expertise, which allowed for more resource sharing and cross-boundary coordination and implementation.
- Nearly 90% of survey respondents said they had strengthened interagency partnerships and collaborative relationships with stakeholders.
- About 2/3rds of respondents said they had identified innovations in engaging with community members and stakeholders.
- Strong majorities of survey respondents reported that project collaborators helped the agency communicate more effectively with the public, influenced planning, and expanded capacity to get work done.

Better relationships led to decreased conflict and increased trust.

- About half of respondents said the JCLRP had reduced conflict, and a third said it had decreased litigation.
- Strong majorities of survey respondents agreed that trust, transparency, communication, and accountability with collaborative partners had improved since receiving JCLRP funding.
- Interviewees on multiple projects indicated that better community relationships with part-

ners and landowners mitigated negative perceptions of the federal agencies and built trust in the community.

Although it was not explicitly a goal of the JCLRP, some workforce capacity was also developed under the JCLRP.

- Forty-three percent of survey respondents said their projects had supported jobs in the restoration economy, and 21% said they had supported wood products contractors, facilities, and markets.
- On a couple projects, interviewees said JCLRP money has gone to long-term workforce development, including training crews, tribes, partners, and landowners to do forest management.

Why some projects were more successful than others

Projects that we considered successful were those for which all interviewees agreed they were on track to meet their project goals, partners and landowners had engaged as expected, and all interviewees were satisfied with project progress. Those we identified as less successful were those where one of these factors was not true. Of the 17 projects we interviewed, three reported that they had had limited success and encountered significant challenges. Those that were largely unable to accomplish project goals were funded in 2014, while the relatively more successful projects were funded in 2015, indicating that proposal evaluation and agency support for projects may have improved from year 1 to year 2.

The most critical factors underlying success were having established collaborative relationships and communication strategies among the agencies and stakeholders.

- A history of collaboration among the agency and stakeholders and the agencies’ communication strategy with partners ranked highest in our survey as factors underlying success, with about 90% of respondents pointing to the positive value of these variables.

- Established collaborative groups had greater credibility in the community, systems in place to handle dissention or differences in opinion, and established zones of agreement about project and restoration goals.
- Collaborative groups and key partners acted as communication facilitators and provided trustworthy outreach and education to the public and landowners.
- Interviewees said having partners who could add capacity was an important factor, particularly in cases where NRCS had less technical forestry expertise. Sometimes this lack of expertise delayed projects until it could be found.
- Having a history of collaborating to identify goals and priority areas for treatment, whether it was through CFLRP, a community wildfire protection plan, forest plan, or NEPA project document, facilitated quick identification of priority areas and treatment options under the JCLRP.
- Having a track record of successful implementation also was a facilitating factor because it established credibility and convinced landowners to work with agencies.

Willing landowners and local stakeholder capacity were essential to successful implementation of cross-boundary work.

- Nearly all survey participants reported that the presence of willing landowners in a project area was a factor underlying success.
- The primary external barrier identified in our survey was lack of financial capacity among stakeholders, with about half identifying this as a factor, followed by lack of willing landowners to participate and stakeholders' limited ability to leverage funds, both of which about a third of respondents said were barriers to success.

Internal capacity, leadership, and coordination between the NRCS and the Forest Service were key factors that supported projects.

- About 80% of surveyed staff pointed to agency capacity and line officer leadership as key to success; interviewees said that having ade-

quate internal capacity and a dedicated project coordinator were central to success.

- Structured communication strategies throughout the life of projects were reported by about 25% of interviewees as important to success, especially between the Forest Service and NRCS.
- Some interviewees said the mismatch of Forest Service and NRCS processes, funding streams, and timelines posed challenges, as did NRCS privacy rules that limited information sharing with the Forest Service and other partners, reducing projects' ability to reach out to private landowners.

The greatest internal challenge was having inadequate agency capacity and staff.

- Interviewees reported limited staff capacity and turnover, especially within NRCS, almost universally as a significant challenge to the JCLRP, and some projects attributed their lack of success primarily to this issue.
- Lengthy hiring processes and hiring freezes caused delays on several projects, even stopping one project completely.
- Completing cultural resource requirements and heritage surveys delayed projects up to one year, primarily, people said, due to lack of staff capacity to complete the work.
- Not being NEPA-ready was reported as a problem in only a few cases, and being NEPA-ready was discussed as valuable in many cases.

Having project goals that align with community, partner and agency goals created a unified vision and limited contention on the landscape.

- People said support at every level of the agencies was valuable, with local or field-level support for project objectives especially critical for success; where local staff did not support the broader project's goals, progress was hampered.
- About a quarter of projects said that a lack of accountability between or within the NRCS and Forest Service and poor project leadership led to poor contracting, project goals being ignored, or inefficient use of funds.

- Landscapes with high-priority ecological concerns, like at-risk species, those that had witnessed disturbance events, or where potential disturbances like fire were a major concern for the community, made projects more competitive for other sources of funding or more important to local partners.

Limited industry infrastructure and capacity to burn posed problems for fuels reduction projects, particularly at the pace and scale envisioned by JCLRP projects.

- In certain areas, the timber being removed from a project site had little to no commercial value, so most of it was burned or sold as firewood. Lacking infrastructure led to longer implementation timelines and limited management options.
- Accomplishing prescribed burning also was a challenge for about one quarter of projects, due to short burn windows and having limited, qualified personnel to burn.

The timing and structure of funding under JCLRP was almost universally reported as a major challenge.

- Project participants often said they were unsure if or when funds would come through and did not know how much funding they would be receiving.
- Interviewees said that money often came through late in the fiscal year, posing obligation challenges that impacted the efficacy and efficiency of some projects.

- These issues have likely improved in recent years, based on our conversations with Washington Office staff, which worked to address these problems.

In summary, the most successful projects had the following in common:

- An established and active collaborative group working in the area.
- Established relationships with partners who had clear and consistent goals.
- High levels of coordination between the Forest Service and NRCS.
- Willing landowners.
- Project coordinators and adequate capacity.
- NEPA readiness, a history of participating in other planning processes where there had been a discussion or identification of priorities, and a history of successful implementation.
- Project goals that aligned with local community and agency goals.

Less successful projects had the following in common:

- Lack of coordination and communication between the Forest Service and NRCS.
- Staff capacity limitations compounded by hiring delays.
- Lack of willing landowners to participate in projects.
- Lack of planning or unified vision.
- Issues with NRCS processes and landowner assistance requirements.



Future of the JCLRP Projects and Initiative

Almost all research participants and interviewees said the JCLRP should continue (see Figure 4, page 19).

- Over 80% of survey respondents said the JCLRP should continue, and almost all external interviewees concurred.
- About 80% of survey respondents said they valued the emphasis on public-private partnerships, the requirement to work collaboratively, the multi-year funding commitment, and the flexibility of the funding.
- About two-thirds of survey respondents said the JCLRP should be expanded to landscapes with different restoration needs.
- Every participant, when asked in interviews, said they would always have a use for additional funds and have more work to do; about 80% of survey respondents said they would apply for more funding.
- About a fifth of interviewees highlighted the need for and challenges associated with future maintenance and monitoring.

Participants reported they would like to continue working cross boundary with their partners in some capacity.

- Those that believed they would continue this style of management were generally working with established collaborative groups or partners that had other sources of funding, broader priorities, or broader community support to achieve specific goals.
- Among survey respondents, 60% said that their ability to work across jurisdictions will continue even without additional funding, but only 17% said that restoration will continue to happen at an improved pace.

However, people said a decrease in funds will limit the potential to conduct work on private lands and the level of engagement with partners and private landowners.

- As one external partner emphasized, “All of this happened because of a funding source,

and if the funding source goes away, then the motivation for maintaining partnerships is lessened.”

- Almost half of the survey responses said their projects will not be able to maintain their JCLRP restoration treatments after funding ends.
- People said staff turnover or loss of those in leadership positions make it difficult to sustain partnerships.
- A quarter of respondents said they would see negative effects on local communities after funding ended.

Small percentages reported downsides of the JCLRP to other forests and programs.

- About 10% of survey respondents believed that the initiative negatively affects other programs/projects on the forest or that the initiative negatively affects forests without JCLRP dollars in the region.
- About 20% of respondents said that JCLRP funding creates unsustainable expectations with partners due to delays for planned implementation or money being redirected away from other efforts to the JCLRP.

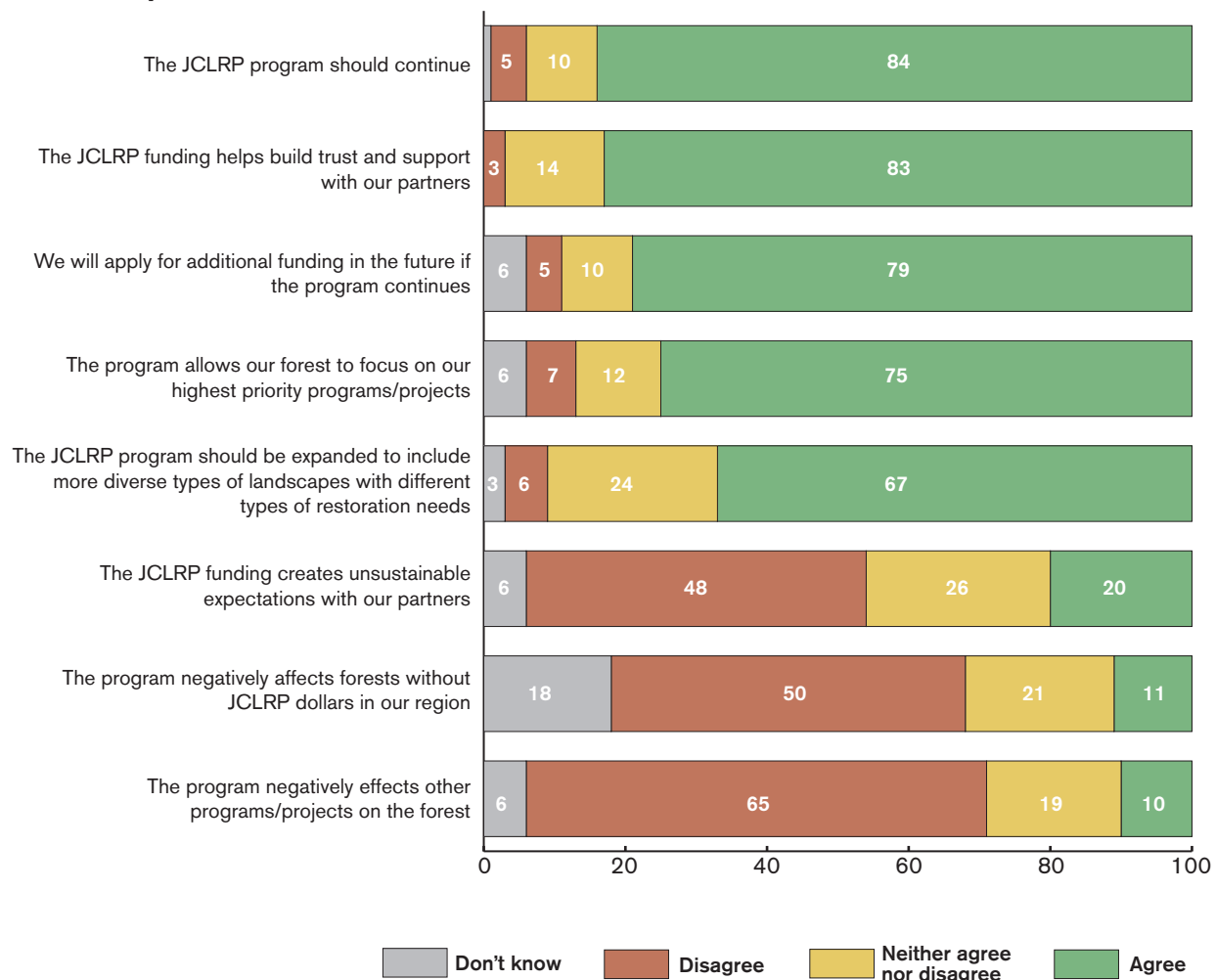
Participants said that funding mechanisms and internal allocation processes could be improved.

- About a quarter of participants said that NRCS processes can be cumbersome, lengthy, limiting, and expensive, which can frustrate landowners and drive them away.
- NRCS processes and requirements limited the number of adjacent landowners that could participate in the project. For example, income thresholds made some landowners ineligible for assistance in some cases.
- Participants from both agencies said that, to be successful, they needed to know the amount of funding they would be receiving and when they would be receiving it.
- Several people said it is essential to ensure that JCLRP funding was an augment and that it did not replace existing funding on a unit.

Study participants had several suggestions for the future, if the JCLRP continues.

- A common suggestion was staged funding, along with some suggestions for a multi-stage application and evaluation process to build capacity and ensure groups are ready to hit the ground running with implementation.
- Staff said it is critical to ensure that capacity exists to utilize the additional funding, and that hiring a project coordinator is essential.
- Staff from both agencies requested better communication throughout the organizational hierarchy about the purpose of the initiative, funding approaches, funding timelines, and proposal process.
- People recommend improved accountability mechanisms to encourage focus on initial project goals and targeting the ‘right’ acres instead of any acres that have willing landowners.
- People indicated that the proposal process could be refined to look for the factors that commonly underlie success and pose challenges; several interviewees emphasized that the strength of NRCS and Forest Service relationships must be demonstrated at the proposal stage, along with an explanation of the presence of willing landowners and local NRCS forestry expertise.

Figure 4 Survey respondent agreement with statements about the JCLRP, by percentage of respondents





Conclusions and recommendations

Our data indicate that these approaches were successful and allowed the agencies to focus on their high priority projects and programs.

- Strong majorities of survey respondents said they had met project goals and also reported success in building collaborative capacity, identifying efficiencies and innovations, and leveraging partner capacity and resources.
- Strong majorities of respondents said the CFLRP and JCLRP allowed them to focus on their high priority work.
- Agency personnel in our survey overwhelmingly support the continuation of these approaches.
- Almost everyone we interviewed, even those on less successful projects, suggested the CFLRP and JCLRP continue, with some refinements to improve project selection, support, and success, given that success was not universal.

Multi-year investment, with a collaborative and landscape focus, is essential to successfully leveraging resources and affecting ecological conditions at meaningful scales.

- Survey respondents rated the multi-year and collaborative aspects of these approaches as highly valuable.
- The multi-year commitment to a place gives a landscape credibility and incentivizes partners to focus their capacity and leverage funding in a specific place.
- For most projects, the landscape-scale focus of both the CFLRP and JCLRP led to improved landscape-scale planning, which is essential for affecting ecological processes like fire.
- The partnership between the NRCS and Forest Service allowed the agencies to combine their areas of specialization to complete cross-boundary work; if this partnership continues, more attention should be given to strengthening the partnership, sustaining interagency communication, and building NRCS capacity where it is currently limited.

These types of focused investments need to be coupled with a transformed business model for the Forest Service that orients staff capacity, leadership, and agency-wide attention to support priority projects and landscapes.

- Our findings indicate that more needs to be done to reorient the agency's structure and culture toward the model of prioritization and focused investment.
- Our findings overwhelmingly found that staff and line officer turnover, lack of capacity and training, and lack of leadership and support from the district level on up were key factors that either led to success or undermined projects. Strong majorities across all projects said that staff turnover and limited agency capacity were barriers to success.
- If the agency is going to invest funds in priority landscapes, it must ensure adequate staff capacity and strong leaders also are directed to these projects.
- We also suggest concerted attention be paid to how to train and identify leaders who can effectively support collaborative, multi-year, landscape-focused projects and to discourage turnover during the life of these projects.
- Measurement approaches and the ability to allocate additive funding to these projects also need attention.

A key question is whether more can be done to revitalize industry for landscapes that are priorities for investment but have low-to-no value wood products and minimal industry infrastructure.

- While the CFLRP boosted existing industry, the biggest failing of the program was the inability to substantially support new wood-products industries. We found that multiple companies went bankrupt, several places continue to have minimal prospects for engaging new industry, and that the CFLRP projects were not enough to lead to substantial expansion of existing industry.

- Strategic investments in new industry partners, facilities, and models, along with more certainty about treatment plans on a landscape, likely would be necessary to successfully rebuild or expand industry capacity where it currently is limited or does not exist.
- In some places there may not be enough prospect of timber harvest to support capital investment in forest products utilization. In these cases, it may be best to simply focus investments in service contracts and contracting business capacity.
- In many of these places, improving planning approaches or increasing targets will not address current market limitations that result in a lack of implementation or wood products being piled, and occasionally burned, with no improvements to the cost of treatment.
- Contracting options and requirements, and funding mechanisms to support work on private lands, need additional improvement to support current management needs and approaches.



CFLRP and JCLRP approaches are not equally suited to all places; more work is needed to assess where different restoration approaches should be targeted.

- Our findings indicate that CFLRP might be best suited to places with large-scale, contiguous landscapes in need of restoration and where there is currently either limited industry capacity or industry partners who rely on large amounts of low-value product. These situations necessitate a multi-year, landscape-level focus.
- Other places where conflict is high, timber has high value, or where restoration needs are more dispersed across the landscape also may benefit from focused investment; however, these places may be better suited to regional prioritization processes that can focus investment for shorter periods of time when collaborative agreement and planning processes are aligned to support forward progress.
- The JCLRP investments could be more strongly coupled with assessment of places with the highest need for fuels reduction, wildlife habitat restoration, or watershed restoration, depending on agency priorities.
- Staff were utilizing multiple authorities to accomplish restoration but would benefit from more training on these authorities and a better understanding of where these best match management needs and can be combined effectively (see Appendix B for more information on questions in the survey about the use of multiple authorities).
- Respondents in this and previous studies we have conducted have said that there should be focused investment approaches to support restoration needs beyond those related to wildfire.

Our findings offer numerous criteria that could be used to improve proposal evaluation processes going forward.

- A history of collaboration, established relationships, and agreement around restoration goals were the primary variables people consistently said led to successful projects; we also identified multiple other variables, specific to each program, that would indicate likelihood of success.
- Continuing to refine proposal processes to assess for these items would help to ensure that priority investments are made in the locations with the best chance of success.
- Better proposal evaluation could also help to identify places that may be high priorities for work but need additional support and capacity to move forward successfully.

Many projects would benefit from continued funding to maximize the return on investment to date.

- It will be necessary to support maintenance of treatments and improve application of prescribed fire in order to maximize the value and long-term benefits of investments; this is particularly true for projects in frequent-fire landscapes.
- Many of these landscapes have built partner and stakeholder agreement and capacity. Although they intend to work together going forward, many participants in our study were concerned collaboration would wane if additional funding is not allocated to these landscapes. The agencies may want to consider how to maximize the return on investments that have been made in building collaborative capacity, under the CFLRP in particular.

Appendix A. Project methods in detail

Interview methods

For the CFLRP interviews, we conducted a total of 81 semi-structured interviews at the time this report was written, including 41 internal agency staff and 40 external collaborators associated with 22 of 23 CFLRP projects across the United States (see Table A1, below, for a summary). There was one project that did not respond to requests for interviews. Interviews were conducted in-person or over the phone and were approximately 60-90 minutes in length. Our goal was to get program-wide perspective rather than conduct case studies. We aimed to interview two internal agency staff and two external collaborators per project to obtain diverse perspectives regarding project success, challenges, and potential improvements to the program and its administration.

To identify participants, we started by contacting all Forest Service CFLRP coordinators for interviews

via email, and upon interviewing coordinators we asked for recommendations of additional internal and external contacts with a strong knowledge of the project. We then contacted one recommended external stakeholder per project for an interview, also asking this person for recommendations for people to interview, to triangulate in identifying another external and internal interviewee. While our goal was to interview four participants from each project, there were multiple participants that did not respond to email or phone requests; we recognized that some people have been interviewed about their projects likely 5-10 times, and so we limited our attempts to contact people. Solicitation requests for interviews were emailed to participants twice with a final follow-up call. In the event of no-response or negative response, we worked to identify another potential participant and solicit their participation; however, several projects had a short list of potential interviewees or had participants that did not

Table A1 Interview summary for CFLRP projects

Project	Region	Year Funded	Total Interviews
Selway-Middlefork Clearwater	1	2010	5
Southwest Crown of the Continent	1	2010	3
Front Range Round Table	2	2010	4
Uncompaghre Plateau	2	2010	4
4 Forest Restoration Initiative	3	2010	4
Southwest Jemez	3	2010	4
The Dinkey Landscape Restoration Project	5	2010	4
Deschutes Skyline	6	2010	4
Tapash	6	2010	0
Accelerated Longleaf Pine Restoration-FL	8	2010	2
Kootenai Valley Resource Initiative (KVRI)	1	2012	4
Zuni Mountain Project	3	2012	3
Weiser-Little Salmon Headwaters Project	4	2012	5
Amador Calaveras Consensus Group Cornerstone Project	5	2012	5
Burney Hat Creek Basins Project	5	2012	3
Northeast Washington Forest Vision 2020	6	2012	4
Lakeview Stewardship Project	6	2012	2
Southern Blues Restoration Coalition	6	2012	4
Grandfather Restoration Project	8	2012	5
Ozark Highlands Ecosystem Restoration	8	2012	4
Longleaf Pine Ecosystem Restoration and Hazardous Fuels Reduction- MS	8	2012	4
Shortleaf Bluestem Community Project	8	2012	1
Pine-Oak Woodlands Restoration Project	9	2012	3
TOTAL			81

respond. The likely bias in our approach is that we may not have spoken to those least satisfied with the program, if this was a reason for their non-response or if those less-satisfied individuals were no longer participating with the CFLRP project or were not recommended to us. About a third of all external interviewees were from conservation or environmental organizations, about a quarter were industry representatives, and about a fifth represented industry partners, with another fifth being from science providers or other bridging groups. One person we spoke to was an active litigant on CFLRP projects, and about a quarter of our interviewees were from groups that had previously been parties to legal challenges against the Forest Service.

All interviews were recorded, transcribed, and analyzed through coding in Dedoose, an online platform for qualitative researchers. Codes are essentially labels that can be attached to excerpts of texts. We used codes to organize our data and identify emergent themes including successes, challenges and barriers, future recommendations, and innovations. Memos were written according to our primary areas of inquiry after each interview. We reviewed transcripts and also examined excerpts for individual codes, writing a memo for each code, which provided an additional analytical step for looking at all

comments on a topic together at once.

For the JCLRP projects, we utilized similar methods, interviewing participants from 17 projects sampled from the 28 that were awarded funding in 2014 and 2015 (see Table A2, below). Sampled projects were selected, in part, by regional diversity, and included eight projects from fiscal year 2014 and nine projects from fiscal year 2015. We conducted semi-structured interviews with individuals on these projects, including, at a minimum, one Forest Service staff member, one NRCS staff member and one external stakeholder from each project. Several projects were initially treated as case studies, with more people being interviewed, but we determined that this approach did not yield additional, valuable information pertinent to our questions, which focus on the program as a whole, and decided instead to aim for both internal staff and external stakeholder interviews for the 17 sampled projects. We focused on 2014 and 2015 projects because these would have more time on the ground to identify lessons learned. We completed more than 60 interviews, including 21 with Forest Service staff, 19 with NRCS staff, and 22 with external partners. These were confidential, recorded, transcribed, and systematically coded in Dedoose with a similar memoing and analytical strategy.

Table A2 Interview summary for JCLRP projects

Project	Region	Year Funded	Total Interviews
Western Arkansas Woodland Restoration Project	8	2014	5
East Face Elkhorn Mountains	6	2014	3
New Hampshire Drinking Water Quality Improvement	9	2014	4
Upper Black Creek Watershed Restoration	8	2014	3
Upper Mississippi Headwaters Restoration	9	2014	4
Mid-Klamath River Communities Restoration	5	2014	3
Upper Susquehanna	9	2014	5
Lake Superior Landscape Restoration	9	2014	3
Ashland Forest All-Lands Restoration	6	2015	5
Upper North Fork	4	2015	5
North East Washington Joint Chiefs Landscape	6	2015	4
Texas Forest Ecosystem Improvement	8	2015	3
Lake Superior North Shore Coastal Restoration	9	2015	3
Prescott Basin Cross Boundary	3	2015	3
Ko'olau Forest Protection	5	2015	3
Collaborative Oak Management	9	2015	3
San Juan	2	2015	3
TOTAL			62

Survey methods

General approach and sample population: With the help of the Washington Office, we identified project leads for all of the CFLRP and JCLRP projects. Our target population included any staff members and line officers with active involvement with a CFLRP or Joint Chiefs project. We sent a request for the names of all involved personnel to the project coordinators for all CFLRP projects (n=23), and for all JCLRP projects awarded in FY '14 and FY '15 (n=28). We omitted FY '16 and '17 awarded JCLRP projects due to the short timeline of these projects: FY '16 projects were awarded funding less than one year prior to our survey and we wanted respondents who had adequate time during active projects to answer the survey questions.

Twenty-two of the 23 CFLRP projects and 27 of the 28 JCLRP projects responded to our request for survey participants. Contacts included line officers and staff members from a wide range of disciplines or departments. The final sample size was 331 people for the CFLRP survey and 296 people for the JCLRP survey. Our results reflect the bias inherent in the fact that only some projects responded to our inquiry and that project coordinators may not have included all relevant personnel in their responses.

We emailed the sample populations in late June 2017 to inform them of our study and invite them to participate in the online questionnaire hosted by Qualtrics through the University of Oregon. We provided a brief overview of the project and informed them of our project goals. A total of three reminder emails were sent to contacts in the sample that had not completed the survey two weeks, three weeks, and four weeks after the initial distribution, and the survey was closed the first week of August 2017.

Overall, 229 people completed the CFLRP survey (69% response rate) and 196 people completed the JCLRP survey (66% response rate). One of the questions in the beginning of the questionnaire asked respondents to describe their level of knowledge associated with the specific project. The response options included, "I am actively involved in the project and can respond to questions on these topics"; "I am not actively involved in the project but have a good understanding of it and can answer questions on these topics"; and "I have heard about this

project but I don't know enough about it to respond to questions on these topics." Participants who selected the third option ended the questionnaire there and their responses were excluded from further analysis. Six respondents in the CFLRP survey and 25 respondents selected the third option in the JCLRP survey. Given the small number of participants from any Forest Service region or particular project, we do not draw conclusions about variation in responses across these variables.

Questionnaire items/ topics: The questionnaires for CFLRP and JCLRP projects were nearly identical, with a few minor differences to reflect different participants (i.e. NRCS staff in the case of JCLRP). There were four main sections in the questionnaire: 1) background information about the respondent, 2) background information about the project, 3) factors that supported or hindered project success, and 4) respondents' perspectives about the future of their project and the initiative overall. Some responses were on a five-point Likert-type scale, while other responses were ordinal and included pertinent categories from which to choose. In addition to the questions with predetermined response options, each section included several opportunities for respondents to type in open-ended comments.

Data analysis: After cleaning the data of any entry mistakes, we examined descriptive information for each questionnaire item. This generally included generating frequencies (% of respondents), as well as mean calculations for scale variables. Mean comparisons were conducted for scale variables across subpopulations (e.g., line officer vs. non-line officer, Forest Service vs. NRCS employees) using independent sample t-tests. Nonparametric tests (Mann Whitney U test and Kruskal-Wallis test) were conducted for comparing frequency counts across subpopulations for ordinal variables. Two-tailed probability tests with $p < .05$ (i.e., 95% confidence that the results are not due to random chance) were used to determine statistically significant differences between subpopulations, and we note when statistically significant differences were identified between groups.

We also reviewed open ended-comments throughout the survey and used them to augment our interpretation of other questionnaire responses.

Appendix B. Supplemental data

This appendix includes supplemental data to support our findings that we presented in the body of the report. In addition, supplemental data on project goals, funding approaches, and the use or potential of multiple restoration authorities and initiatives is included here.

Findings on the Collaborative Forest Landscape Restoration Program

Project Goals, Funding, and Implementation Strategies

When asked about project goals, CFLRP respondents emphasized improving/enhancing vegetation conditions, increasing the pace of restoration, reducing the threat of fire to communities and restoring natural fire, and strengthening collaborative relationships (see Fig-

ure B1). All but one goal was rated as a priority by at least 80% of respondents, demonstrating that these projects were aiming to affect multiple resources at a faster pace and scale. Reducing treatment costs, supporting service contractors, and working across boundaries were the least-rated as priorities, but more than 70 percent of respondents still considered each of these at least somewhat of a priority.

Projects have received funding from numerous sources, including other federal agencies, intraregional funding competitions in all regions, state natural resource agencies and private organizations, with the Nature Conservancy and National Wild Turkey Federation both acting as partners on a number of projects (see Table B1).

Figure B1 Rating of CFLRP project goals, by respondent percentage

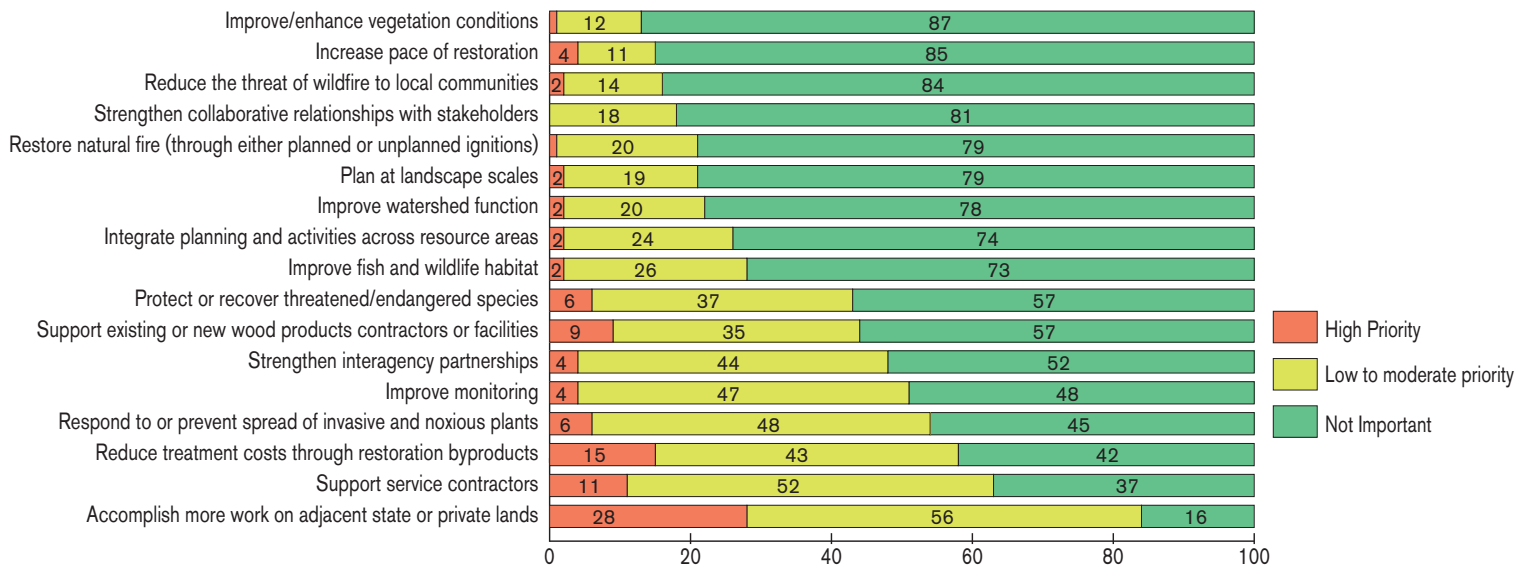


Table B1 The number of CFLRP respondents reporting that their projects received each funding sources

Funding source	# of respondents (total = 229)
CFLRP	215
A state agency	66
Private organization(s)	56
Other competitive intraregional processes	52
Another federal agency	46
I don't know	29
JCLRP	28
National Forest Foundation	28
Other	26
National Fish and Wildlife Foundation	16
Cohesive Strategy investments	10
None of the above	3

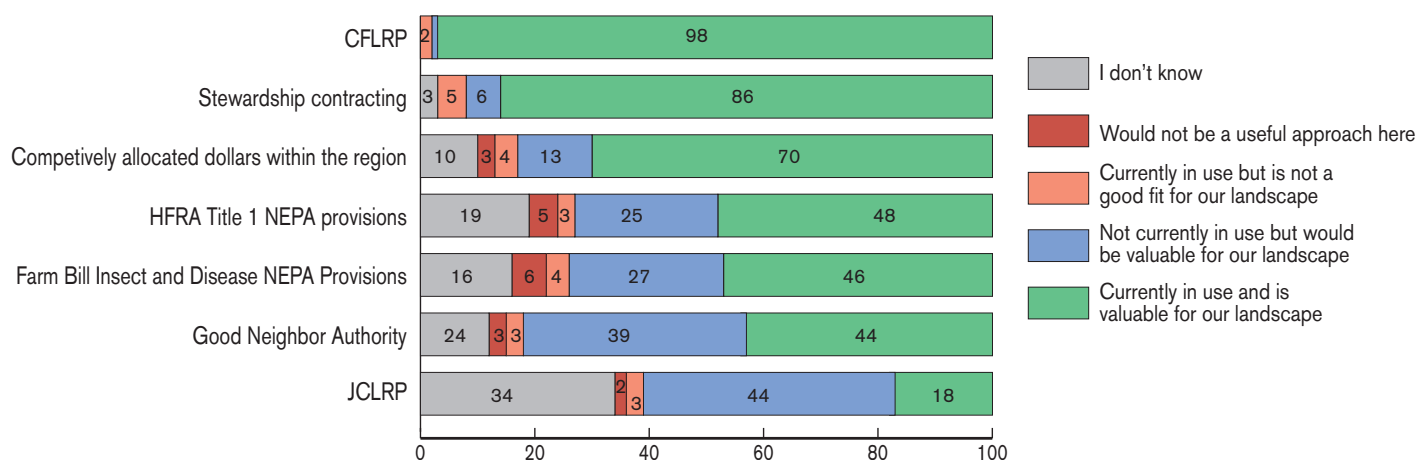
To understand where restoration authorities are complementary, we asked about the current and potential utility of other restoration authorities on CFLRP project landscapes (see Figure B2). Eighty-six percent of respondents said they were already using the stewardship contracting authority, although several respondents from Region 3 expressed strong opinions that stewardship contracting is not an ideal model for their forest types, given low value of the product from forests in the region. Eighty-three percent of respondents indicated that competitively allocated dollars in the region were valuable. Slightly fewer than half of the respondents said that Healthy Forest Restoration Act (HFRA) Title 1 NEPA provisions, Farm Bill Insect and Disease NEPA provisions, and the Good Neighbor Authority (GNA) were in use and valuable, but respondents indicated there is room to expand the use of these authorities; at least a quarter of respondents said that although these authorities were not currently in use, they would be valuable on their landscape. There is some overlap of CFLRP and JCLRP projects, and most people said they complement each other well; respondents without JCLRP projects on their landscapes indicated it would be valuable for their landscapes.

Successes and Value-Added by the CFLRP

Survey respondents reported the biggest successes under CFLRP as strengthening collaborative relationships, with 65% saying they had been highly successful and over 95% saying they had at least moderate levels of success in this area (see Figure B3). This is followed closely by success in planning at landscape scales (83% of people said they had moderate to high levels of success), integrating planning and activities across resources (85% reported success), and increasing the pace and scale of restoration (75% reported success). More than 2/3rds of survey respondents said they had moderate to strong success in supporting service contractors, restoring natural fire and reducing the threat of wildfire to local communities, and improving vegetation conditions, fish and wildlife habitat, and watershed function. Almost all of the potential effects of the CFLRP were realized by a majority of project respondents in our survey. However, a few written-in comments from survey respondents said it was too early to document success.

We asked respondents how much they agreed with statements about accomplishments since they received CFLRP funding (see Figure B4). Over 80% of people said that since CFLRP funding they (in

Figure B2 Percentage of CFLRP respondents reporting value of different restoration authorities



decreasing order): had more money to implement projects, engaged in restoration at landscape scales, worked more effectively with stakeholders, accelerated restoration activities, and reduced fire threats in the project area. Over 60% said it helped them leverage more funds, increase integration, work more effectively with other agencies, improve monitoring, and identify implementation efficiencies. Almost all of the intended effects of the CFLRP were

reported as being achieved by a majority of project respondents in our survey. Multiple respondents said that they had completed planning but had not yet moved to implementation. Others said they had just begun implementation and that it was too early to say whether they had successfully affected ecological conditions; based on average responses in our survey, it is likely that over time percentages reporting success would increase.

Figure B3 Percentage of CFLRP respondents reporting success in making progress on project goals

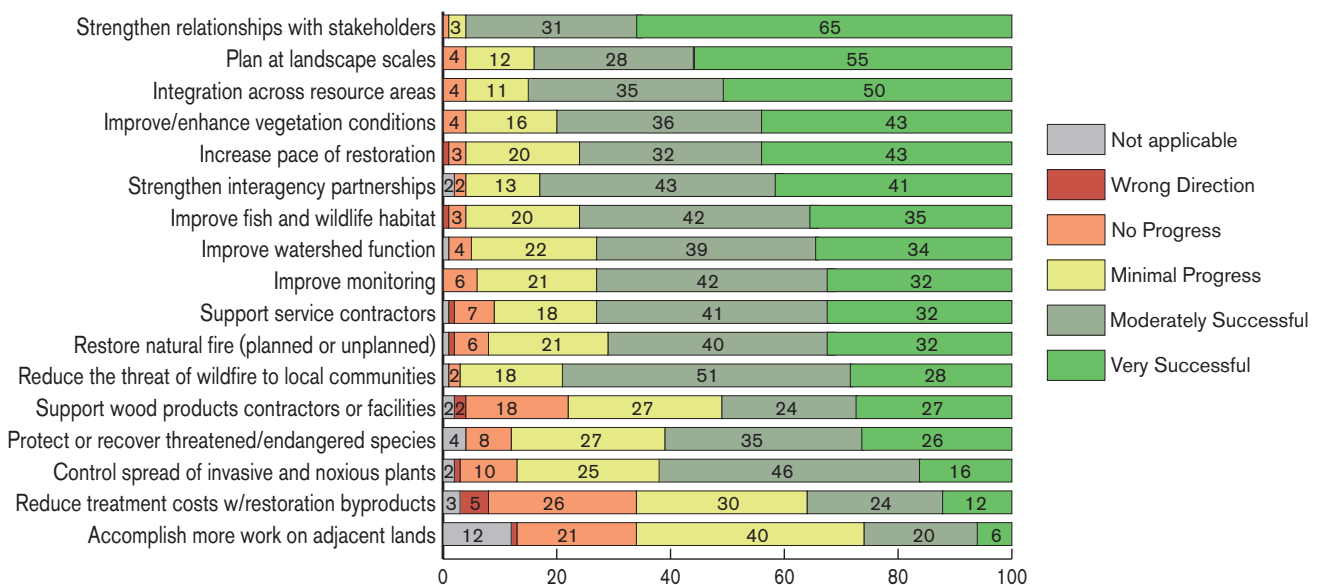
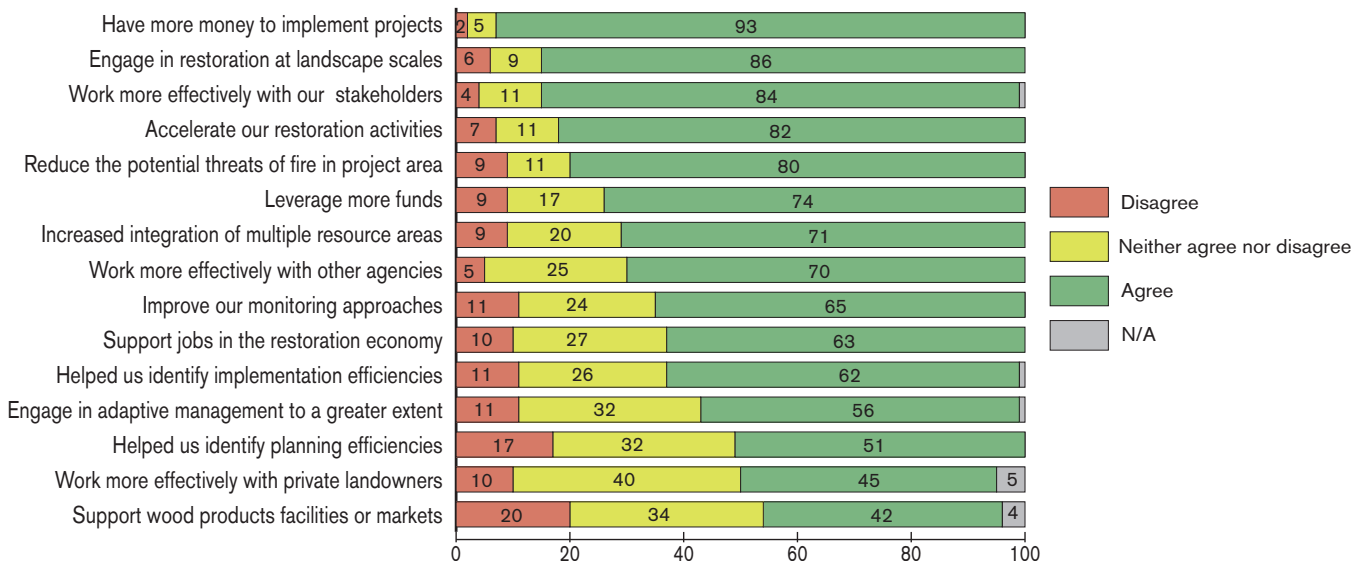


Figure B4 Percentage of CFLRP survey respondents that agreed with statements about accomplishments since receiving CFLRP funding



The Value of Collaboration

According to agency and stakeholder interviewees, partners were more willing to invest in the landscape with an initial investment and ongoing commitment from the Forest Service. Stakeholders said CFLRP funding made both the collaborative group and agency more competitive for additional outside funding sources. Many stakeholders noted they will rely on their increased competitiveness and landscape-focus initiated by CFLRP to continue identifying and competing for outside funding streams.

Interviewees said CFLRP legitimized collaboration and set an example for how collaboration should work across the forest on other projects. Many felt it forced the agency to take collaboration seriously and engage participants in meaningful ways throughout the lifetime of projects. Eighty-three percent of survey respondents agreed that collaborators have influenced planning, 78% agreed that they influenced monitoring, and 76% agreed collaborators have helped them communicate effectively with the broader public. Two-thirds said collaborators had influenced implementation, and about half said that collaborators had expanded capacity and helped the agency engage in adaptive management. Interviewees said they will continue to collaborate at a larger scale focusing on forest-wide issues post-CFLRP.

Several collaborators noted that their relationships allowed them to hold the agency accountable, increase transparency, and improve the quality of discussions regarding restoration treatments, budgets, performance measures and metrics, areas of disagreement, and future projects. At least 70% of survey respondents agreed that they have improved levels of trust, transparency, accountability, and communication with their collaborative partners since receiving CFLRP funding; no more than 7% of respondents disagreed that any of these aspects improved.

In our survey, 75% of respondents said they had seen decreased conflict, 61% said they had decreased litigation, and 27% said they had found ways to make consultation under the Endangered Species Act more efficient. Many stakeholders reported seeing a decrease in conflict, litigation, or

NEPA objections on their projects and throughout their forest due to CFLRP. One Forest Service interviewee reflected on the collaborative group and decreased litigation, saying, “They filed amicus briefs for us on projects. And so, it’s really cut down our deliberation time, our objection process that we’re in now. But litigation has been essentially non-existent, because of the collaborative.”

Improvements in Planning, Implementing, and Monitoring Restoration Activities

Interviewees across multiple projects reported that CFLRP has allowed them to increase the pace and scale of restoration and improve integration of restoration activities because of increased funding, social license, and regional prioritization of interdisciplinary team capacity to conduct NEPA analyses. Many people said their project included restoration activities that would not typically get funded, including treatments associated with long leaf pine in the Southeast or culvert replacement and watershed restoration in the Pacific Northwest. For example, one Forest Service interviewee stated, “We would not be doing these landscape scale vegetation restoration treatments because they just can’t economically stand on their own two feet. This infusion of funding has enabled us to just get thousands and thousands of acres of really good work done on the ground.... If CFLRP was not here, that would not be happening.”

In response to another survey question, 80% of respondents said because of CFLRP they had reduced potential threats of fire in their project area; similarly, in interviews, several participants said the CFLRP funding allowed them to decrease overall fire risk and fire severity within their project area. While this was true to some extent for most projects, several projects highlighted it as a significant accomplishment. Multiple projects had fires that burned close to or through the project area in places, and interview participants from these projects reported that treated areas reduced the intensity of fire behavior and provided safe access for fire crews. For example, one participant from Region 6 believed the treatments they implemented allowed their forest to survive the 2015 wildfire season that affected the region. Likewise, a project in Region 2 reported that their treatment areas allowed fire crews to ac-

cess the fire safely and reduced overall damage from the fire to communities.

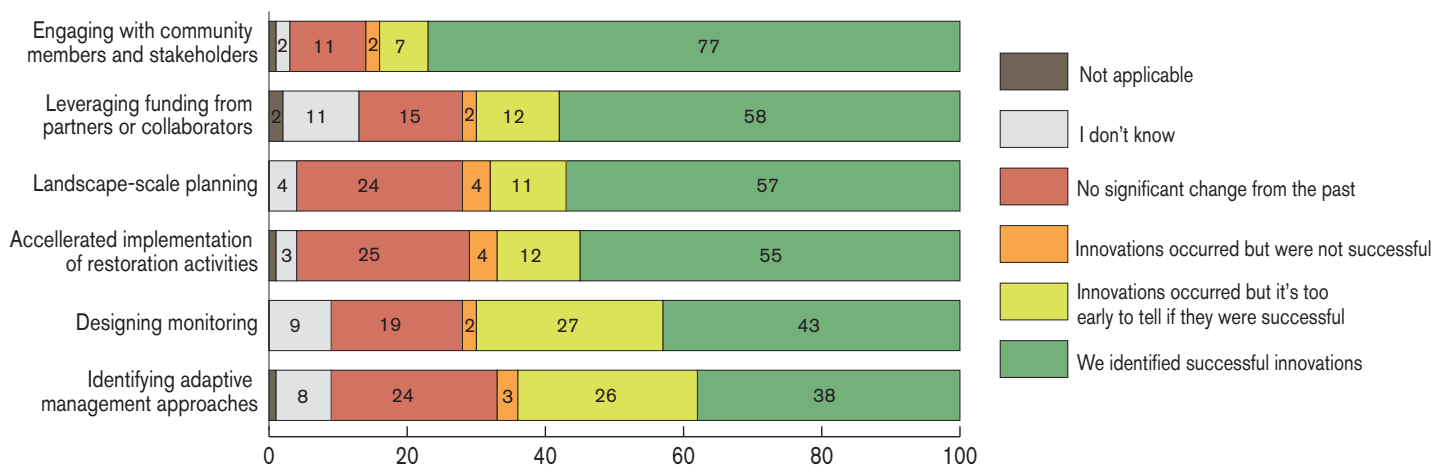
Respondents on a few projects noted they were able to make significant economic impacts in their local communities either by supporting local mills or training and using local contractors. One project reported adding an extra shift at their local mill because of the CFLRP project, and interviewees on another project reported being able to keep the last remaining mill open. One interviewee stated, “[I]t’s been very helpful for our contracting partners and the mill infrastructure, and it has allowed them to really invest and to build new infrastructure, to hire, to buy equipment, that sort of thing, because there’s a sustained program of work on the table that everybody can see and that is well-supported within the stakeholder community.”

Survey respondents reported finding innovations in multiple areas, including engaging with community members and stakeholders (77%), leveraging funding to support restoration (58%), landscape-scale planning (57%), and accelerating implementation (55%) (see Figure B5). Multiple interviewees indicated that they would continue to utilize innovative approaches beyond the life of the CFLRP and said innovations had spilled over to other activities on their forest, including forest planning and planning

of other projects. One interviewee noted, “I mentioned before it’s spilled over into other projects like the [large vegetation project EIS] that the forest did. The local stakeholders were asking the forest to basically model the CFLRP type of process as far as working on that large project. There’s definitely been spill over there that’s been helpful.”

About half of interviewees reported that CFLRP has allowed them to do larger-scale NEPA in faster time frames. Stakeholders said the larger-landscape focus and collaborative involvement gave their projects the social license to experiment with larger NEPA documents that encompass more types of restoration work. One project reported getting more NEPA documents done annually, with an increase from one to three planning documents per year. They said this was because of a strategic request for funding dollars from the regional office to ramp up planning across the national forest and hire permanent staff. At least two projects noted they are using more conceptual NEPA documents focusing on zones of agreement to plan at larger scales and altering treatments as they conduct field trips and begin on the ground implementation. On some projects, the scale of NEPA documents is unprecedented, but this has not always translated into accelerated implementation.

Figure B5 Innovations identified since receiving CFLRP funding



Multiple interviewees also reported improved monitoring as a success of the CFLRP, although it is too early to say whether this has led to adaptive management, and some stakeholders have been frustrated by a perceived reluctance by the agency to utilize monitoring information to inform subsequent projects. Survey respondents highlighted monitoring as an area of innovation, but many said it was too early to tell whether their approaches would be successful. An interviewee stated, “One thing CFLR money is very helpful on [is that] we’ve dedicated a chunk of that to monitoring.... [H]istorically, in the Forest Service, monitoring is talked about but never funded. So I think that’s a success, is actually getting the multi-party monitoring funding through the CFLR act....” While some CFLRP collaborative groups monitored strictly for compliance, several groups incorporated both effectiveness and compliance monitoring into their monitoring protocols. Monitoring programs varied from Forest Service-led initiatives to collaborative, multi-party monitoring efforts. Frequently, groups utilized university partners to develop, implement, and interpret monitoring data. Several interviewees noted groups were incorporating an adaptive management component into their monitoring protocol, where the groups would interpret data and use results to guide future management strategies, not only within the project boundaries, but across similar forest landscapes. Multiple external collaborators reported using monitoring and field trips to hold agency partners accountable for implementing collaboratively agreed upon treatments and prescriptions.

A few projects mentioned as an innovation working with utilities including water and energy providers to accomplish work within the CFLRP boundary. One project had a subsection of their collaborative that applied for outside state funding sources and brought in over 10 million dollars in grants. Several projects also reported using partner fire crews to complete prescribed burning, and a few projects worked with local high school students to offer internships and add monitoring capacity.

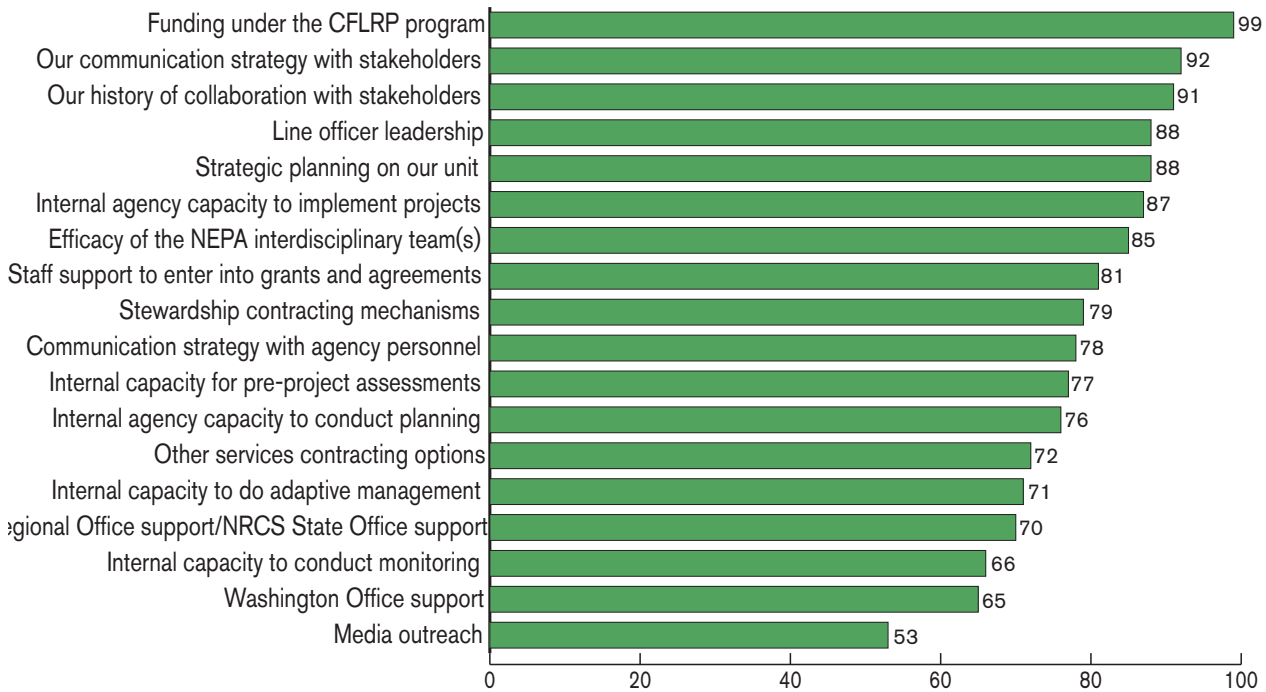
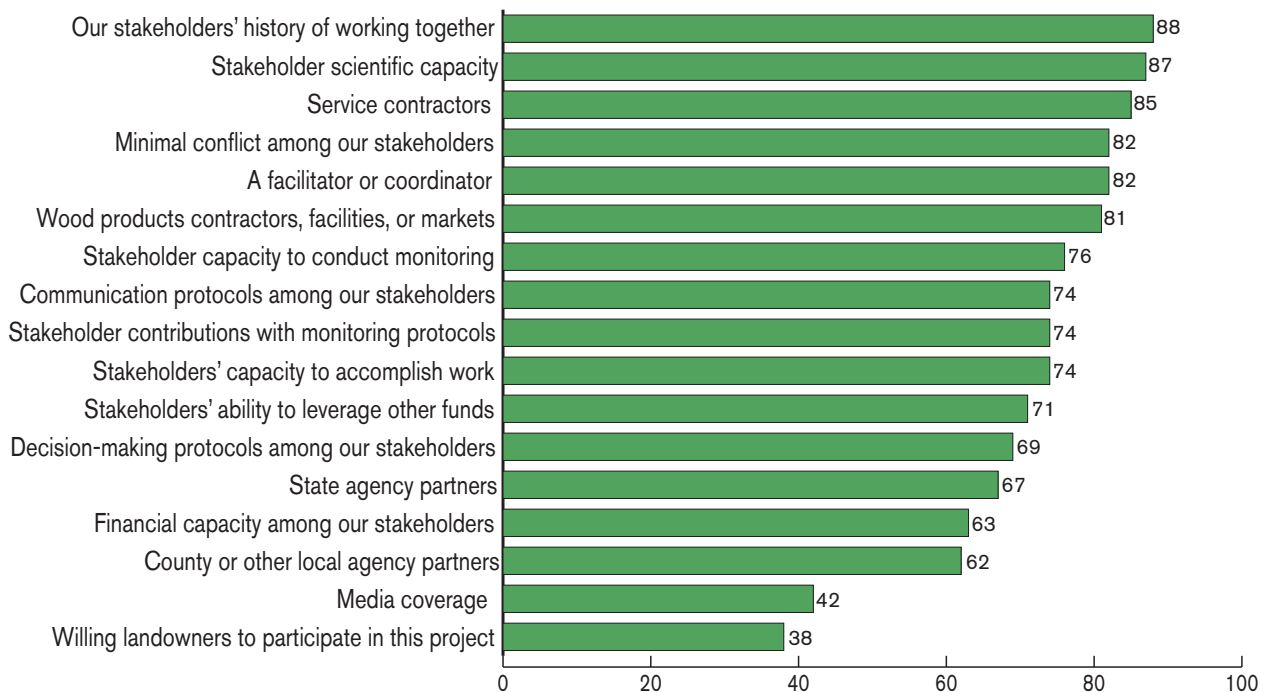
Factors that Facilitated Success

We asked survey participant and interviewees to highlight internal and external factors that allowed them to be successful (see Figures B6 and B7).

Collaboration and Communication

Over 80% of survey respondents said a history of collaboration between the agency and among partners and an effective communication strategy with stakeholders were factors that supported project success. Similarly, over 80% of people pointed to other aspects of collaboration, like science capacity among stakeholders, facilitation, limited conflict, and a history of working together as the most important external factors for success. Interviewees said that having a collaborative history allowed their group to get through differences early on, develop strong working relationships, and forge a track record of success prior to CFLRP planning and implementation. One stakeholder stated, “The project was already in formation as a collaborative group, prior to CFLRP. So they were already positioned very well to receive and essentially support the CFLRP initiative when it came to fruition. And that continuity is something that’s been invaluable. We didn’t have to go through the process of developing a collaborative group and growing pains associated with that.”

Partners particularly emphasized strong and established lines of communication within stakeholder groups and with agency personnel as being critical. For example, one interviewee stated, “When something really bothers me, I call the Forest Service Supervisor and I set up a meeting and talk to them quietly, out of the press, out of the public eye and try to solve it so that no one gets stuck in an uncomfortable position that no one really wants to be in. The reason I can do that is I build relationships and they trust me. They’ve seen that I’m not out to get them. I’m out to create pragmatic solutions.” Many interviewees noted their collaborative groups meet monthly with the Forest Service to review projects, attend field trips, discuss implementation, and voice concerns. The Forest Service also frequently used the collaborative groups to add capacity and credibility when communicating with the broader public; strategies included pub crawls, bar coasters, coffee klatches, pamphlets, billboards, trail signage regarding projects and prescribed fire, PBS specials, and press releases. Seventy-four percent of agency respondents said clear communication protocols within the group also were key to success.

Figure B6 Internal factors reported as somewhat or major contribution to project success, by percentage of respondents**Figure B7 External factors reported as somewhat or major contribution to project success, by percentage of respondents**

Interviewees said field trips in particular were crucial to building personal relationships and trust amongst participants, fostering communication, and instilling accountability and transparency in the process. Almost all projects and associated collaborative groups we interviewed reported engaging in some level of field trips. Field trips usually entailed the Forest Service and collaborative group touring projects (and sometimes camping out) pre- and post- treatment to discuss planning, implementation, and monitoring. Interviewees reported that field trips offer excellent opportunities to engage the public and political representatives out in the field.

Over 80% of survey respondents said strong facilitation is key. Likewise, in interviews, facilitation by a neutral third-party facilitator was consistently reported as helpful in achieving agreement, maintaining communication between stakeholders and the agency, and ensuring collaborative engagement. The majority of stakeholders reported that facilitation helps organize the group and maintain accountability and consistency, which translates to a stronger relationship with the agency.

Over 80% of people pointed to science capacity among stakeholders as being key to success. Several interviewees referenced the importance of having partners involved who bring science capacity, like the Colorado Forest Restoration Institute or the Nature Conservancy. Many interviewees felt these groups were critical in facilitating success, specifically by providing technical and scientific expertise and capacity, bringing the benefit of their established agency relationships, or helping to resolve disagreement as being instrumental to success. Similarly, partners said that larger, regional collaborative groups and networks, like Rural Voices for Conservation Coalition or the Washington Forest Collaboratives Network, provide a forum for smaller collaborative groups to share lessons learned, resources, and strategies. A few interviewees mentioned that they lobby or advocate for their smaller project through these regional collaborative bodies.

Infrastructure and Ecology

Multiple interviewees noted the importance of working in a landscape where there is a high level of agreement regarding restoration activities. They

said having clear restoration principles or areas with few endangered species made it easier to make progress. Interviewees particularly felt that focusing on smaller, easier projects at the beginning helped build trust and confidence for the agency as well as the collaborative group. For example, one project in Region 2 chose a highly agreed upon landscape in terms of restoration principles and future vision that was close to public access and roads so the community could see the positive effects of treatment on the ecosystem. Conversely, there were a few projects that attempted to work in highly contentious landscapes because they felt these were the most critical landscapes for restoration; these projects met with more mixed success.

A few interviewees mentioned the importance of having marketable timber in their project areas. Retained receipts from timber sales can be incorporated back into the project area. Valuable timber products also ensure a more robust timber market locally in terms of mill capacity. The areas that have merchantable timber appear to have more intact infrastructure, which generally allowed for easier implementation.

Some interviewees said low overhead and strong community ties made small, local industry partners highly valuable. People said these businesses have a stronger connection to the area and community and are more willing to invest than larger, national companies. Several interviewees went on to explain that smaller, local contractors have generational ties to the place and community, which make them more willing to take risks if it means economic returns for their local community and continuing a “way of life.” The focus on “mom and pop” industry and diverse products was identified in four or five projects that were generally in smaller, rural landscapes.

Internal Factors that are Key to Success

Most interviewees and survey respondents said that strong agency leadership is crucial to success under the CFLRP; people said this about line officers on national forests and about Regional and Washington Office personnel. Many interviewees noted the importance of agency leadership in terms of setting expectations with their own staff and establishing a culture supportive of collaboration. A stakeholder interviewee noted, “Our local leadership on the for-

est has been phenomenal. Our forest supervisors have been great. They also have been very clear from the top that this is how we do business and that we collaborate and work together and we do science and work in a large scale and we monitor.” A few interviewees noted that strong leaders were key to ensuring adequate resources are available for accelerated planning and implementation. Multiple projects stated that their forests had established five-year restoration plans.

Multiple interviewees noted that a combination of forest supervisor and district level support for CFLRP projects was crucial to success. Some forests were able to redirect existing staff to a CFLRP program of work, but this required strong communication and leadership. Interviewees said that CFLRP can overburden staffs that are already at full capacity, and having strong local leadership and support for these projects and collaboration was key for maintaining morale, particularly when a CFLRP program of work supplanted existing plans and priorities.

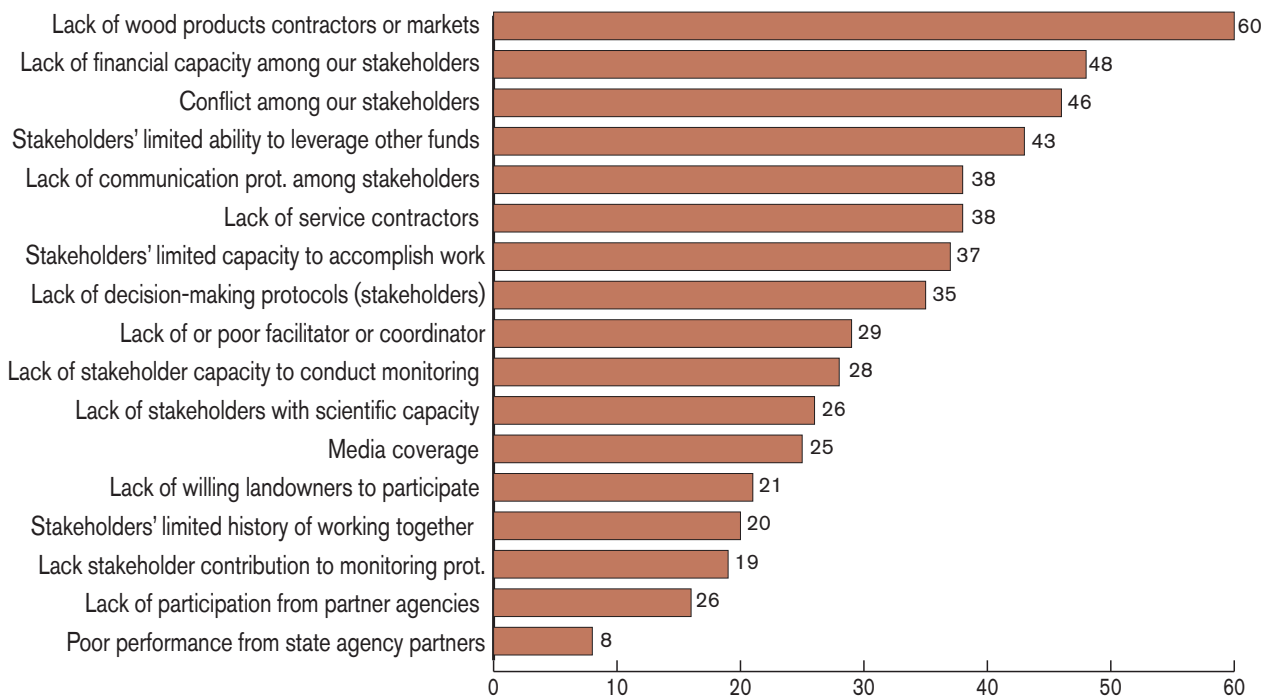
Adequate agency capacity, and particularly a full-

time CFLRP coordinator, was critical for planning, implementation, and entering agreements. Some forests were able to request an increase in staff capacity, but this was unusual. Interviewees reported that full time CFLRP coordinators were critical and acted as a liaison between the collaborative group and the agency, facilitating effective communication. It was uncommon for a project to have a full-time CFLRP coordinator; several projects had multiple CFLRP coordinators throughout their tenure, which posed issues in terms of continuity, stability, and effective long-term relationship building and communication.

Common Challenges

All interviewees reported some level of challenges, whether they were challenges the projects were able to overcome or more persistent barriers that plagued projects. In our survey, the top tier of external challenges included having a lack of wood products, contractors/facilities/markets, lack of financial capacity among stakeholders, conflict among stakeholders, and stakeholders limited ability to leverage other funds (see Figure B8). The most frequently noted internal agency barriers were staff and line of-

Figure B8 External factors that were rated as a major or somewhat major factor hindering project success



ficer turnover and inadequate agency capacity (see Figure B.9).

External Challenges

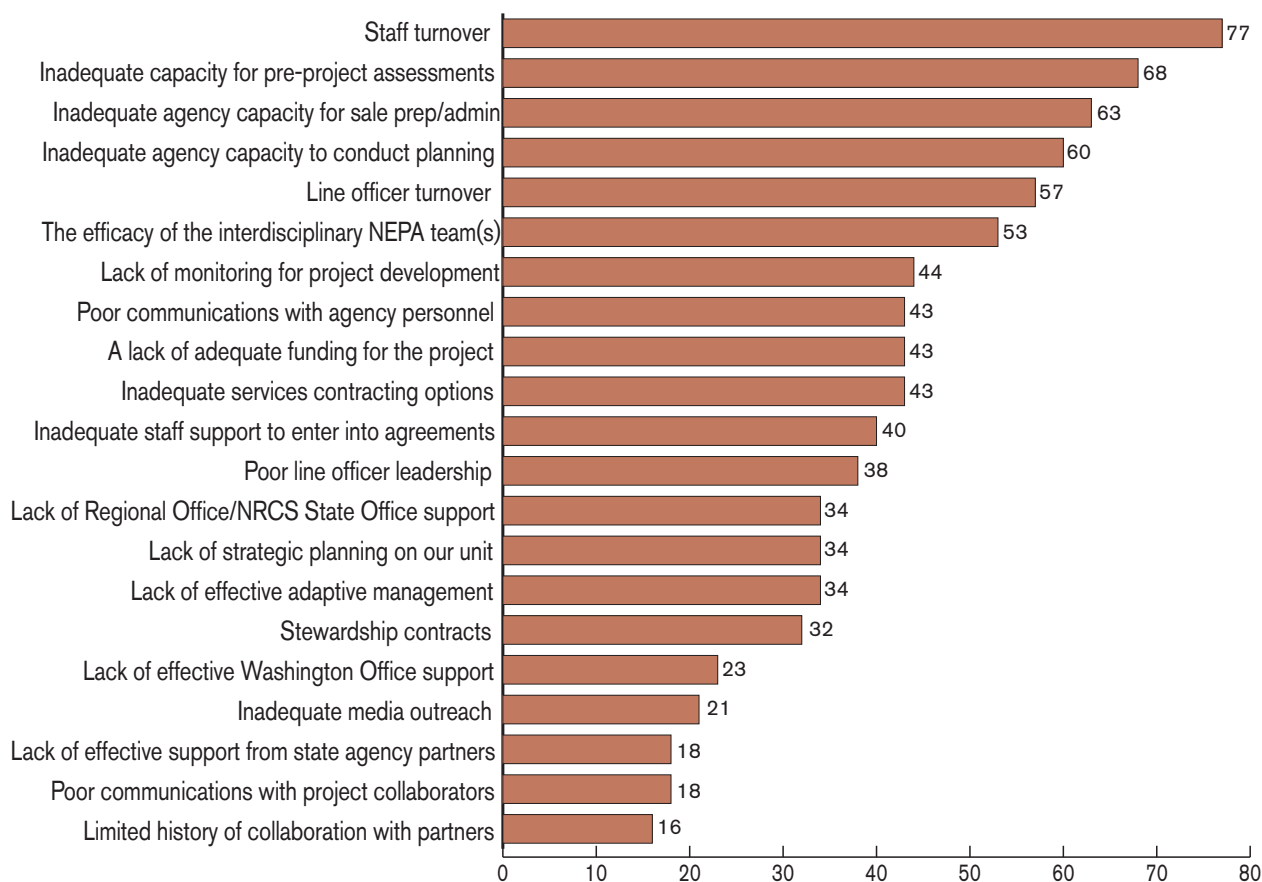
Lack of wood products facilities, contractors, or markets was rated by 60% of survey participants as a challenge for their projects and ranked as the most significant challenge external to the agency (Figure B.8). One person said in an interview, “We have lost two of our larger mills in the area and those are really the only ones that are capable of handling large saw logs. I think there’s only two places left in the region that are able to handle those. Where we’ve seen the decline on merchantable timber coming off of Forest Service lands, it has had a direct effect on the local economy and communities that are associated with logging.” While the program attempted to address market uncertainty by providing funding for implementation for 10 years and promoting stewardship contracting, in most places this was

not enough to jump-start new industry. For projects without local infrastructure, long haul distances to mills or facilities for non-merchantable timber products and biomass often were cost prohibitive.

Other factors that were among the top tier of challenges in our survey included conflict among stakeholders and stakeholders’ limited ability to contribute or leverage funds. Around 45% of respondents stated that these had been challenges.

Interviewees from several projects reported unforeseen ecological issues or disturbances as barriers to achieving maximum success on their projects; disturbances included beetle kill, large wildfires, and drought. A few interviewees reported that when these types of events occurred they drastically changed what restoration looked like for that landscape and frequently made already-finalized NEPA documents obsolete. In addition, wildfires

Figure B9 Internal factors that were rated as a major or somewhat major factor hindering project success



that burn near or through project boundaries can tax agency capacity and resources as staff are pulled away from the CFLRP to focus on the effects of the wildfire. These events sometimes slowed CFLRP project progress and the collaborative momentum surrounding projects in general.

A few interviews reported issues with litigation in the area, primarily in Region One. The majority of stakeholders reported using the collaborative group to engage litigants and objectors; however, a few mentioned that key parties remain unwilling to participate. Litigation primarily focused on salvage sale opposition and wildlife conservation issues. One interviewee stated, “The social issues that we face such as litigation against salvage and activities in the WUI present the biggest challenge to us.” Another interviewee believed CFLRP has caused more litigation or controversy in the region, stating, “We were a very challenging spot in Region One; in fact it’s probably created more controversy than it’s solved or reduced. We have a couple other players, environmental groups here, that absolutely hate the idea that we’re doing this.... They’re challenging on us FACA violations on the ... philosophically, on the democratic processes of working with collaborative groups and catering to special interest groups.”

Internal Challenges

Staff and line officer turnover, along with internal agency capacity to conduct pre-project surveys and assessment, planning, sale preparation and administration, and to enter into grants and agreements were all among the top internal challenges identified in our survey (Figure B.9).

Staff turnover was the most frequently cited challenge associated with the CFLRP program, and a majority of interviewees, both internal and external, reported struggling with nearly constant turnover of Forest Service positions, specifically in leadership roles. For example, one Forest Service interviewee said, “As an example, we’ve had six of the eight [interdisciplinary] team level positions that we need for planning this landscape-level projects; six of the eight have turned over two or more times. So we just don’t maintain the continuity that we need to keep the vision going.”

Collaborative stakeholders felt agency staff turnover undermines trust and relationships built and slows down projects significantly. Interviewees noted a loss in institutional knowledge when agency personnel leave positions. In terms of turnover amongst stakeholder and agency participants, people said one way to combat this is to have at least one participant who maintains continuity or longevity. Another strategy people identified is using onboarding documents that capture that institutional knowledge and memory; these documents codify and capture agreement, progress, and future next steps.

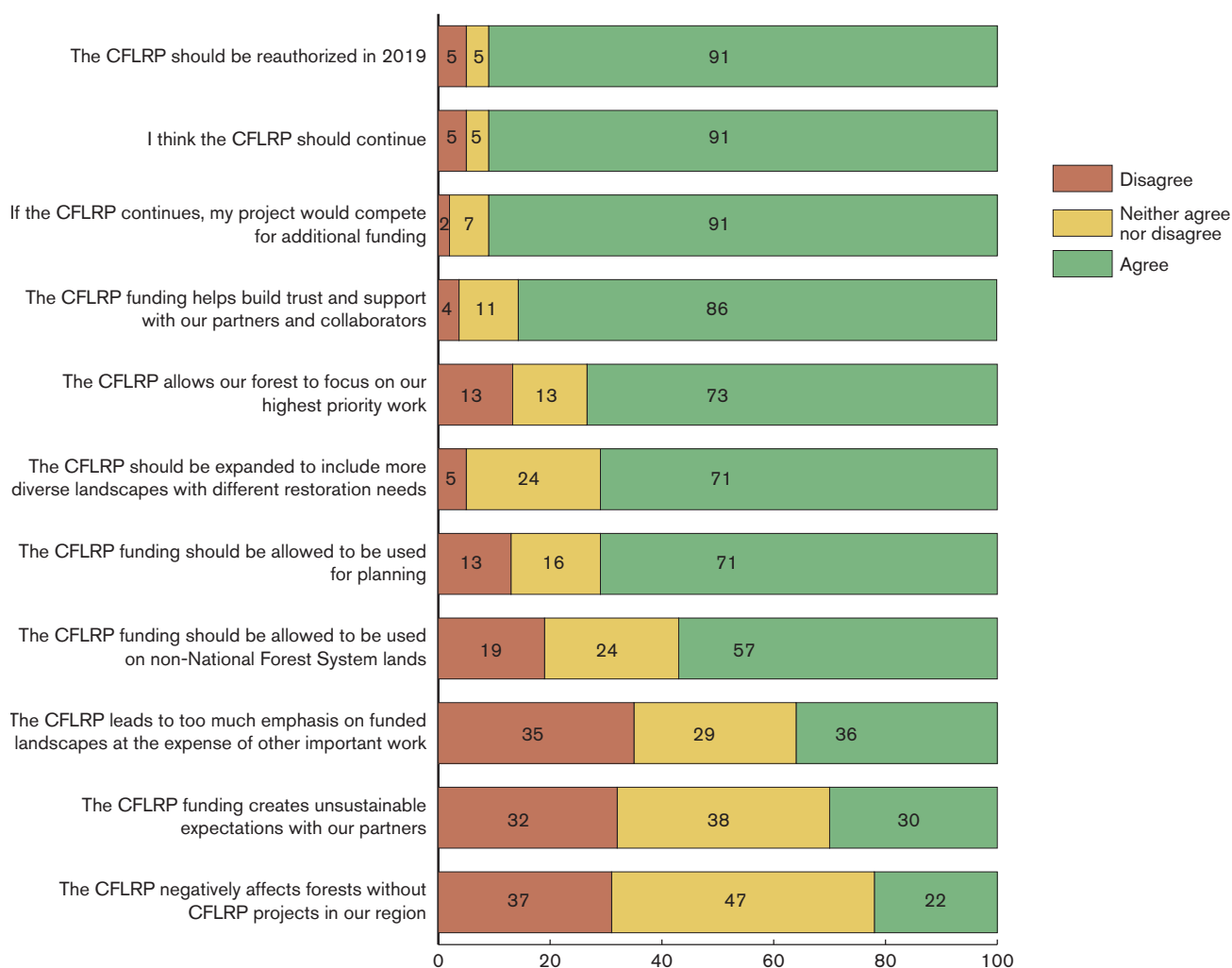
Almost everyone said they faced major agency capacity issues, which slowed work and overburdened remaining staff on a unit. This presented challenges for working to increase the pace and scale of restoration. Interviewees noted the hiring freeze also poses a challenge for getting work done. Although capacity issues are a challenge beyond the CFLRP, they were compounded with the influx of funding and expectation to accelerate work, particularly when this came with no additional capacity.

Almost all interviewees reported struggling to accomplish prescribed fire, not only within their project boundaries, but across their national forests. Interviewees listed several reasons for this, including weather, agency risk aversion, capacity, and air quality standards. Weather poses an issue in both dry and wet climates by limiting burn windows necessary for successful prescribed burns. Several interviewees felt their Forest Service staff was risk averse to prescribed burning, with one stakeholder noting agency staff is not incentivized to do large prescribe fires. Multiple interviewees also noted the agency simply does not have the staff to conduct prescribed burning especially during fire season. Some projects reported using partner fire crews to plan and implement prescribed burns. Several projects reported strict air quality standards associated with their state air quality boards that made prescribed burning prohibitive in terms of permitting and time constraints. The challenge of getting prescribe fire on the ground is significant in terms of CFLRP project completion. Many of these projects have a large fire component, without which, restoration is incomplete.

Although this was not universal, multiple interviewees reported challenges associated with the Forest Service contracting process. Some said contracts were awarded to inappropriate contractors that lacked the track record of success necessary to handle the scale and pace of intended activities. There were several instances of contractors going bankrupt during the tenure of their stewardship contract, leaving the agency and collaborative group struggling to identify next steps and achieve implementation. Second, multiple people said contracting officers were already stretched thin and lacked

the capacity to complete contracts at the increased pace and scale necessary for CFLRP. Lastly, a few interviewees reported that current agency contracting mechanisms focus on merchantable timber; however, many of these projects are working in areas with low value products. One interviewee stated, “The Forest Service is using out of date processes on valuing their timber...they’re doing the same thing they did when they were selling valuable trees. Right now the value the Forest Service...need[s] to get rid of these trees as quickly as possible, and they’re not doing that. The risk of catastrophic fires

Figure B10 Survey respondent agreement with statements about the CFLR Program



is so extreme and so costly that the tools that they are using to remove these trees just are not working at the pace and scale we need.” Another interviewee reflected on the regulations in place for timber accountability, explaining, “We’re already asking [industry] to take out a very low value product and then any regulation we put on top of that to make it more difficult. It ends up being a losing proposition for them. It doesn’t make sense, because they’re doing us a service. That product is a liability for the United States, so we’re our own worst enemy.”

Future of the CFLRP Projects and Program

Survey respondents were positive about effects of the CFLRP, with 91% of individuals saying the program should continue (Figure B10). Even interviewees that reported significant challenges or barriers in terms of success were optimistic regarding CFLRP’s value. Almost all interviewees said they would reapply for funding and that the program should be expanded to other types of restoration needs. Seventy-three percent said the program allows forests to focus on high priority work, and line officers felt even more positively about this item than the rest of staff. Sixty-four percent of people said they will see negative effects on the community when funding ends, and 30% said the CFLRP creates unsustainable expectations with partners.

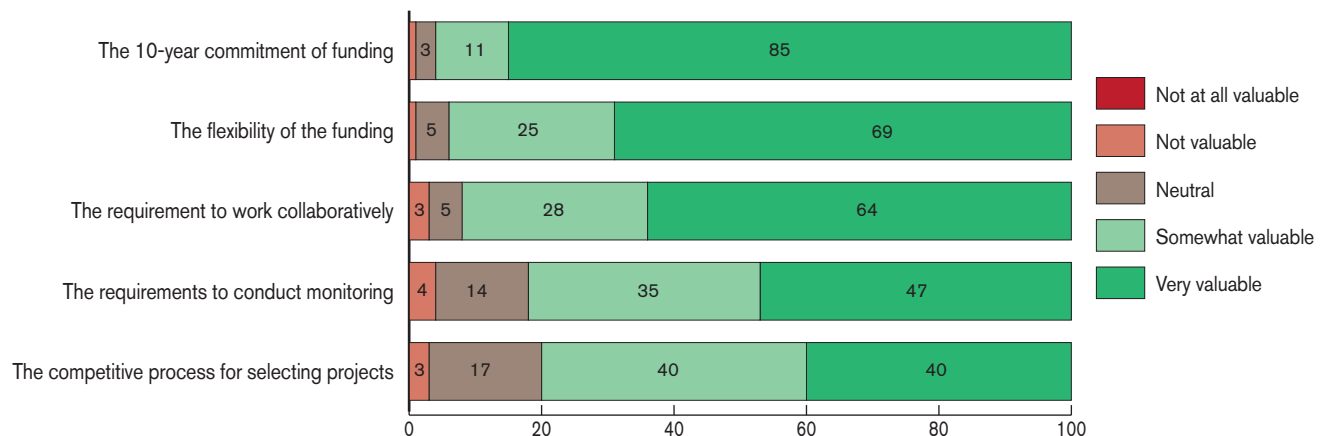
Regardless of whether they receive additional funding, a majority of interviewees and 86% of survey respondents reported they will continue to work

with their stakeholders on collaborative restoration. Forty-six percent said their ability to work at larger scales will continue regardless of funding, but only 15% said restoration will continue at an improved pace if they do not receive additional funding. Many felt they will rely more in the future on their partners in terms of funding and capacity. Several projects reported that their collaborative is looking to expand in the future and focus on forest level projects including forest plan revision. However, a few interviewees and projects reported they believe their collaborative group will dissolve and the Forest Service will shift gears to focus on other landscapes and projects. These interviewees were usually from projects that have struggled to achieve success.

Many interviewees were concerned about maintaining treatments into the future especially without continual funding and given the challenges of applying prescribed fire. In the survey, 84% of people said they would not be able to maintain their restoration treatments if the CFLRP funding goes away. This raises concerns about the lost return on CFLRP investments.

Of the different aspects of the program, people thought all aspects were valuable, and nearly everyone (96%) rated the 10-year commitment of funding as valuable (Figure B11). This was followed in importance by the flexibility of the funding and the requirement to work collaboratively.

Figure B11 Respondent evaluation of different CFLRP aspects



Suggestions for Changes to the Program

Multiple interviewees suggested allowing CFLRP dollars to go towards planning and the completion of NEPA. Several projects struggled with not having shelf-stock NEPA ready when they were awarded CFLRP funding, which made it difficult to start implementing immediately. One interviewee suggested developing a two-tiered funding program for CFLRP where initial funding was awarded for planning collaboratively, after which the project could compete for implementation dollars.

Several interviewees and a majority of survey respondents would like to see a broader scope and definition of restoration activities under the CFLRP. A few interviewees suggested expanding the scope of CFLRP past restoration of fire regimes. Another person suggested that some money should be allowed to be used in the project area for improving roads and attending to recreation needs. In other research, forests with primarily range programs or restoration needs have told us that they are at a systematic disadvantage for funding.

Suggestions for Improved Agency Implementation of CFLRP

Several interviewees suggested that it is imperative that groups have a professional facilitator so that collaborators can more effectively work through difficulties, identify zones of agreement, and communicate. Some said this would require changes to how funding can be used. In addition, agency capacity was one of the most frequently cited challenges projects face in achieving success. If the CFLRP program continues the agency needs to ensure adequate capacity exists to support projects and take steps to limit staff turnover.

Interviewees want metrics and measurement systems to be streamlined and aligned more closely with other metrics the agency already reports. Interviewees noted there are separate metrics associated with CFLRP that need to be reported. Many interviewees felt they spend too much time reporting, drafting annual reports, and trying to track accom-

plishments in multiple databases. Several people said frequently there is a disconnect between what the Forest Service must track and what the collaborative group wants to report. For example, with culvert replacement, the collaborative group is more interested in the number of culverts replaced while the agency measures miles of stream restored.

A few interviewees felt CFLRP should incorporate some level of accountability measures other than the annual reporting. Several interviewees suggested there need to be communication requirements associated with CFLRP outside of the annual reporting mechanism, specifically including communication between the agency and the collaborative group about annual programs of work, accomplishments, and funding.

The majority of interviewees reported they would like to see incentives for agency staff staying in place for the lifetime of a project, particularly for the CFLRP coordinator. A few stakeholders believed there should be incentive programs for innovation and experimentation. One Forest Service interviewee remarked, “What you need to do is you shorten the timeframe where you recognize innovation when you see it, and you reward it. Then you send a message to all the other units and say ‘We want you to step out of the box and think in new ways and develop partnerships in new and different ways and bring in the science community in new and different ways. If you do that, we’ll double your budget.’ That’s how you’ll get innovation.”

One stakeholder noted that allowing more fire is the long-term goal of many of these projects, and that the agency should be incentivizing prescribed fire application. They suggested that rewarding successful or innovative prescribed burning will help build an agency culture and increased comfort around fire. Multiple people indicated that maintaining treatments would be a major challenge and indicated this is a problem the agency will need to address head-on.

Findings on the Joint Chiefs' Landscape Restoration Partnership

Project Goals, Funding, and Implementation Strategies

In our survey, we asked respondents to tell us their primary goals under the JCLRP (Figure B12). The goals indicated as high priority by over 2/3rds of respondents were to: strengthen collaborative relationships with stakeholders, plan at landscape scales, improve/enhance vegetation conditions, accomplish more work on adjacent/private lands, and strengthen interagency partnerships. Forest Service

employees emphasized increasing pace and scale, fire management, stakeholder relationships, and supporting contractors more than NRCS, which emphasized more the importance of accomplishing private land work.

We also asked respondents to indicate who else was contributing funding to their projects. Numerous partners were listed: state fish and game and natural resource agencies were abundant, as were nongovernmental organizations (NGOs) focused on wildlife habitat, landowner assistance and water quality (consolidated lists of NGO and other partners are available on request) (Table B2).

Figure B12 Rating of JCLRP project goals, by respondent percentage



Table B2 The number of JCLRP respondents reporting that their projects received different funding sources

Funding source	# of respondents (total = 196)
JCLRP	151
Another federal agency	49
A state agency	49
Private organization(s)	31
Other competitive intraregional processes	26
CFLRP	21
Other	21
Cohesive Strategy investments	11
National Forest Foundation	10
National Fish and Wildlife Foundation	1

To understand where restoration authorities are complementary, we asked respondents about the value of different restoration authorities for their project landscapes (Figure B13). Our findings indicate that many JCLRP projects were also using stewardship contracting and finding it valuable. Competitively allocated funding within regions, something that all regions were providing to some extent, also was useful for a majority of projects. While about a third of respondents said their projects are using the Good Neighbor Authority and HFRA Title 1 NEPA provisions, about as many respondents said these were not in use but would be useful for their landscape. Although relatively few of the surveyed JCLRP project landscapes also have active CFLRP projects, a significant number of respondents indicated that CFLRP funding would also be a good fit for their landscapes. Although findings were mixed for Farm Bill Insect and Disease NEPA provisions, this item had the greatest amount of uncertainty on whether it would be a good fit, as well as the greatest number of respondents reporting that it would not be a good fit for the project landscape.

Successes and Value-Added by the JCLRP

The JCLRP led to success for most projects across three areas: 1) Strengthened interagency partnerships and collaborative relationships, 2) Increased capacity and cross-boundary coordination, and 3) Improved pace and scale of restoration.

Improved collaboration and interagency relationships

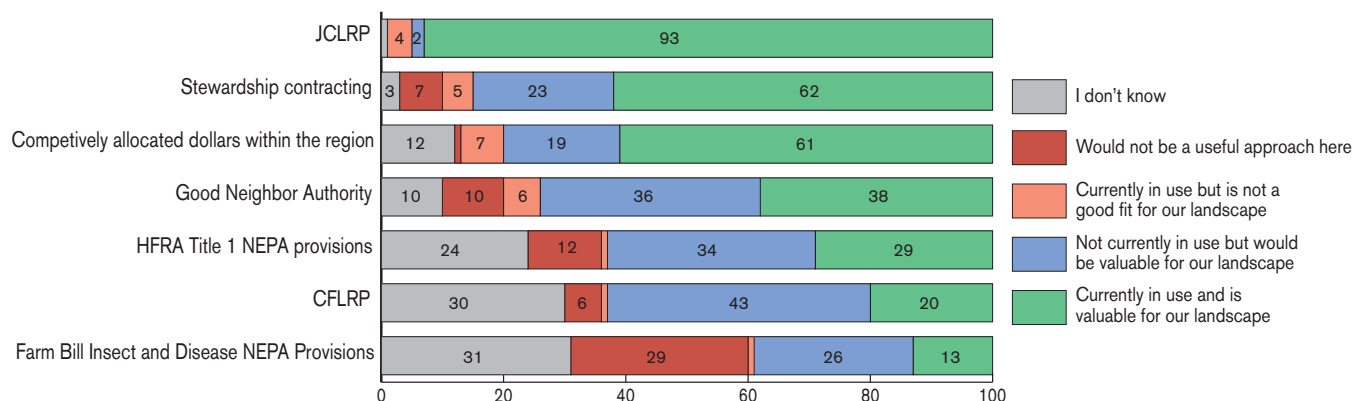
Survey respondents reported they had been successful at accomplishing multiple goals (Figure

B14), and the greatest accomplishments were in improving interagency partnerships specifically and overall collaboration more generally. Eighty-eight percent of respondents said they had strengthened interagency partnerships, and 87% said they had strengthened collaborative relationships with stakeholders. When asked about the added value of the JCLRP, 81% of respondents said they were working more effectively with other agencies and 80% said they were working more effectively with stakeholders specifically as a result of the JCLRP (Figure B15). About 2/3rds of respondents said they had identified innovations in engaging with community members and stakeholders.

In response to other questions, 56% of respondents said the JCLRP had reduced conflict (5% disagreed that it had), and 33% percent said it had decreased litigation (8% disagreed). Respondents were split on whether the JCLRP had made consultation more or less efficient. Sixty-one percent said they had identified successful innovations in engaging with community members and stakeholders. At least half of all respondents agreed that trust, transparency, communication, and accountability with collaborative partners had improved since receiving JCLRP funding; with improved communication getting the most agreement (85%) and improved accountability with stakeholders the least of the four items (59%).

In interviews, the most frequently reported success of JCLRP was the strengthening of existing relationships or creation of new ones. This is a specific requirement and goal of the JCLRP, which emphasizes the importance of collaboration in requests for

Figure B13 Percentage of USFS respondents reporting value of different restoration authorities



proposals and requires Forest Service, NRCS, and private landowners' participation. According to one Forest Supervisor, "One of the goals we had was to reach out to NRCS specifically and strengthen our partnership with them.... Because of the nature of the treatments and the land ownership patterns with federal land and private and other lands, the NRCS was a natural partner." A majority of interviewees

reported an increase in understanding between the Forest Service and NRCS in terms of their processes and areas of expertise. Although this was not universal, interviewees on multiple projects indicated that better community relationships with partners and landowners mitigated negative perceptions of the federal agencies and built trust in the community. Most hoped their improved partnerships would

Figure B14 Percentage of JCLRP respondents reporting success in making progress on project goals

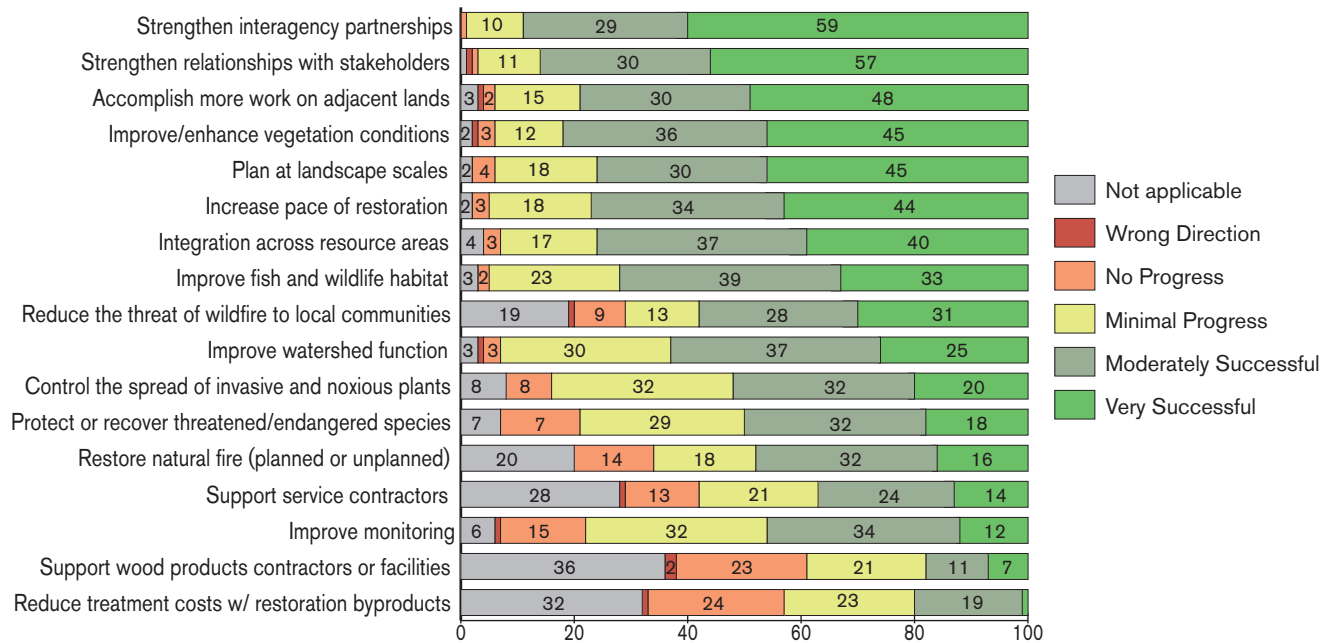
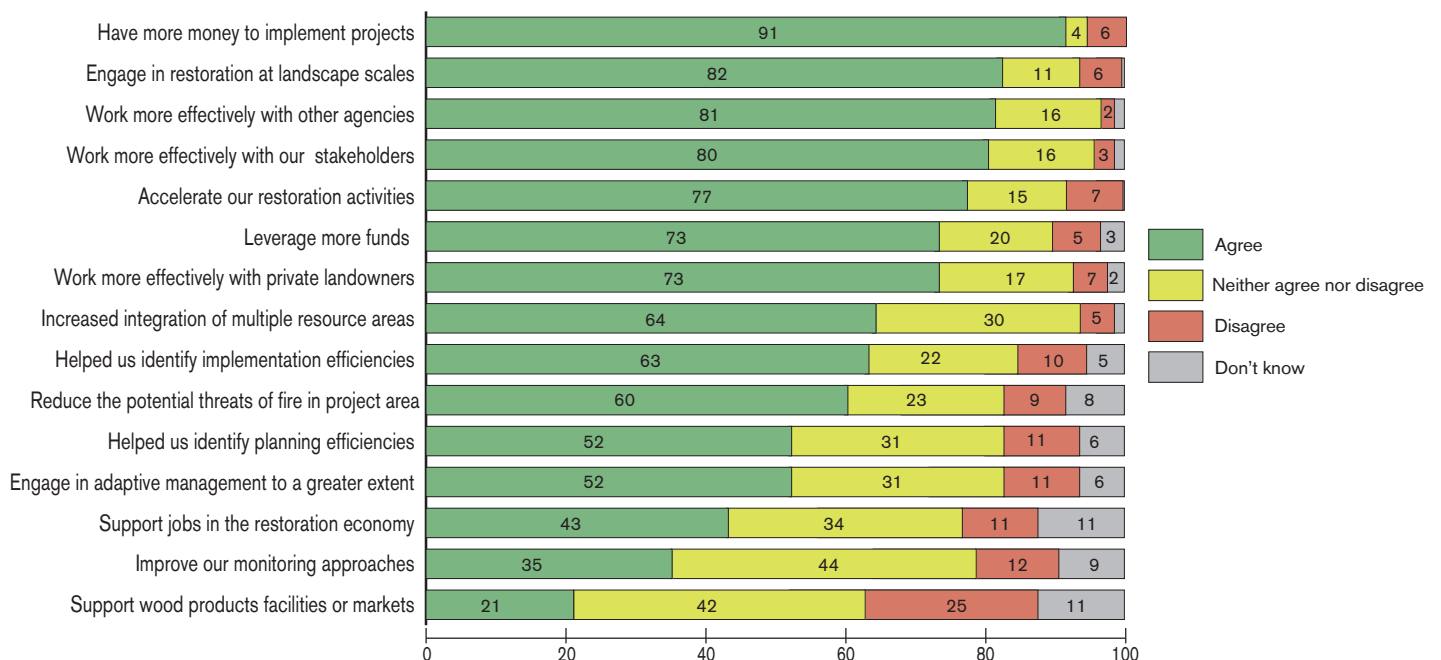


Figure B15 Percentage of JCLRP survey respondents that agreed with statements about accomplishments since receiving JCLRP funding



endure, although some were unsure this would be the case after only three years of funding.

Interviewees consistently said that the influx of funding gave a project credibility, legitimacy, and priority over other projects because the money demonstrates that the agencies are committed to investing in a landscape and the associated collaborative partners for a consistent period of time. Respondents across all projects indicated, to some extent, that increased funding incentivized partner and landowner participation. Landowners, in particular, were reportedly more willing to work on their own land if work was also being done across the fence on Forest Service land or when state and local entities had some “skin in the game,” which helped drive participation for those landowners that may not have historically participated in similar initiatives. One interviewee said, “[We] made connections with a whole new customer base (Nonindustrial Private Forest Owners) and other partners” and another emphasized the opportunities to provide “landowner education on fish passage and flood resiliency topics.” NRCS interviewees reported that working on JCLRP projects with landowners made the agency more relevant in those communities, where in some cases they had previously had little contact with private, forest landowners. More landowners, they reported, were now coming to NRCS offices for assistance. On a few projects interviewees reported they were not being able to work with the partners they wanted to, or that they were disappointed in the landowner participation. In later sections, we discuss why this was the case.

Collaboration Led to More Capacity and Cross-Boundary Work

Most participants discussed this funding as “seed money” or a “shot in the arm” to get projects off the ground or to hire necessary coordinators and staff capacity, which in turn led to greater partner investments. Seventy-three percent of JCLRP survey respondents said that because of the JCLRP, they had leveraged more funds from partners, other agencies, or stakeholders, and about a third of respondents said they had identified innovative ways to leverage funding.

Several interviewees discussed the value of working cooperatively to achieve more than any single

entity could, and emphasized the importance of collaborative efforts when dealing with complex land management goals. One NRCS employee explained, “None of us is strong individually but stronger together, and we can pull our staff resources, our technical resources, our financial resources together to make an impact.” Survey respondents reported that project collaborators helped the agency communicate more effectively with the public (75%), influenced planning of new restoration projects (75%), expanded capacity to get work done (65%), influenced implementation (59%), and helped the agency engage in adaptive management (50%). Those who disagreed with these statements were $\leq 10\%$ of the respondents for JCLRP projects. When asked to elaborate, people offered the following statements about improved collaboration:

- “By providing a uniform message to the public about the need to improve forest health on private and public land we were able to more effectively increase the knowledge and understanding of the community as a whole.”
- “By increasing the integration in our planning and communication, we are expanding capacity through collaboration and shared resources.”
- “JCLRP funding facilitated greater engagement across partners leading to efficiencies and expanded work.”

The technical forestry capacity of NRCS was often expanded through trainings and implementation by the Forest Service, the state’s forestry department, or an NRCS forester from another area. In some states, the NRCS is agriculturally focused and in those cases, people said that the agency had limited forestry experience or customer base. If the local NRCS had little landowner connection before a project, projects generally took longer to get rolling, but research participants said the JCLRP increased NRCS’ knowledge of forestry and wildlife practices in those cases, expanding their technical capacity for future projects.

People also said that successful JCLRP projects can create momentum for continuing similar restoration efforts. They noted that established partnerships and plans could be leveraged to support other programs by providing match for grants. About a third of JCLRP interviewees said that coordinators hired specifically for a JCLRP project had developed

good relationships with agencies and collaborators, which would likely facilitate continued collaboration after a project's end.

Increased pace and scale of restoration

Seventy-eight percent of respondents said they had increased the pace of restoration on their project areas and attributed this to the JCLRP. In part, this was simply because projects had more money than before. Ninety-one percent said that the JCLRP allowed them to have more money than in the past, and, as discussed above, participants also said they had had success in leveraging new funds. Fifty-one percent said they had identified innovations in accelerating implementation of restoration activities, with about two-thirds saying they had identified implementation efficiencies and about a half of respondents saying they had identified planning efficiencies.

The JCLRP led to greater landscape-scale and cross-boundary planning and coordination. Eighty-two percent of survey respondents said they were engaging in landscape scale restoration more than in the past, with 44% indicating they had identified innovations in landscape-scale planning. Seventy-eight percent said they were accomplishing more work on state and private lands. For example, one person said, “[The JCLRP] brought more funding to private landowners near national forests, enabling them to implement prescribed burns and/or forest stand improvement that would otherwise not [have] been done.” Another person reported the same situation and added, “This means more forest restoration is occurring on the landscape which is a good investment, when considering the skyrocketing costs of firefighting and the damaging effects of forest health insects and diseases across the landscape.”

In interviews, almost every project reported a general increase in pace and scale of restoration, and several said they had improved landscape-scale thinking because of JCLRP. One Forest Service employee stated, “To me the biggest value added with this is working across borders. We can do what we can do on Forest Service land but if there's not additional treatment done on private land it's kind of a moot point. The forest doesn't stop at an arbitrary political boundary, and the work needs to be done across borders.” Working collaboratively toward a

landscape-scale approach caused a shift in the way partners and agencies conceptualize land management, according to many interviewees. A Forest Service staff member working on one project said they had looked at how they could improve their internal planning to facilitate this kind of work with NRCS in the future, thinking more critically about their priorities and working with landowners to meet mutual need.

Although we did not measure projects outcomes, interview respondents reported that the JCLRP had led to improved forest health, albeit to different extents on different projects. Seventy-two percent of survey respondents said they had improved fish and wildlife habitat, 62% said they had improved watershed function, and 59% said they had reduced the threat of fire to communities. All interviewees working on a fuels-focused project said their work had resulted in reduced fuel loads. Many said they believed projects had created safer communities who will have more time to evacuate, increased opportunity to use natural ignitions in the future, and safer conditions to allow firefighters to be more effective and have a tactical advantage should a fire occur. Participants often also discussed project successes in terms of acres treated, wildlife habitat restored, fuel load reduction, and increased forest resiliency. They said the JCLRP allowed treatment and fuels reduction at a faster pace than would have occurred without additional funding and believed these treatments were effective.

Although it was not reported consistently across projects, some research participants said that the JCLRP infused the local economy with money or provided funding for long-term workforce development in cases where local contractors or crews were hired or fuels reduction was implemented. One interviewee who provides leadership for a collaborative group explained, “We were very interested in long-term workforce development, so this created new mechanisms for private fuels reduction crews to be hired, to do work on private land. So, there was economic development and job creation opportunities that would be created through this funding mechanism.” JCLRP money has gone to training crews, tribes, partners and landowners to do forest management, which has reportedly had a positive, lasting impact on those individuals or groups.

Factors that Facilitated Success

We asked participants to highlight the factors that allowed them to be successful. The major factors they identified were a history of collaboration and strong coordination with partners and stakeholders (Figure B16), along with internal agency capacity to implement projects (Figure B17). The projects for which respondents reported high levels of success had the following in common: an established and active collaborative group working in their area, high levels of coordination between the Forest Service and NRCS, willing landowners, established relationships with partners who had clear and consistent goals, project coordinators, NEPA readiness, history of successful implementation, and goals that aligned with local community and agency goals.

Collaboration and Communication

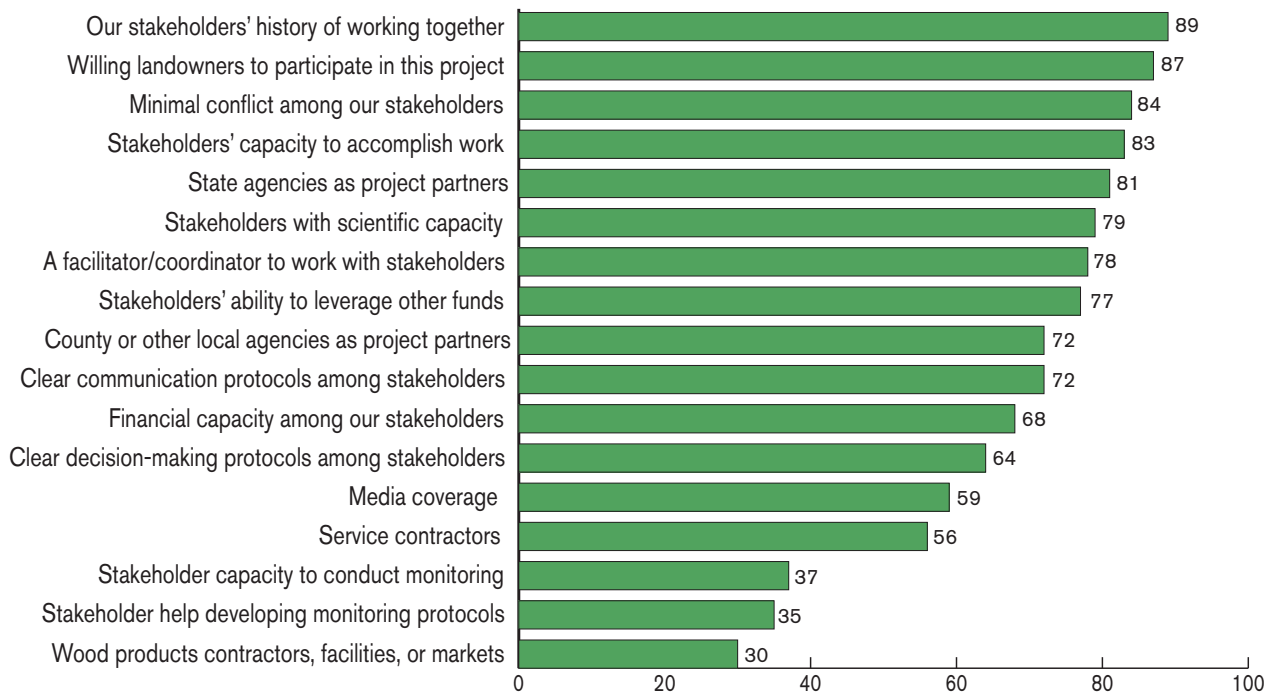
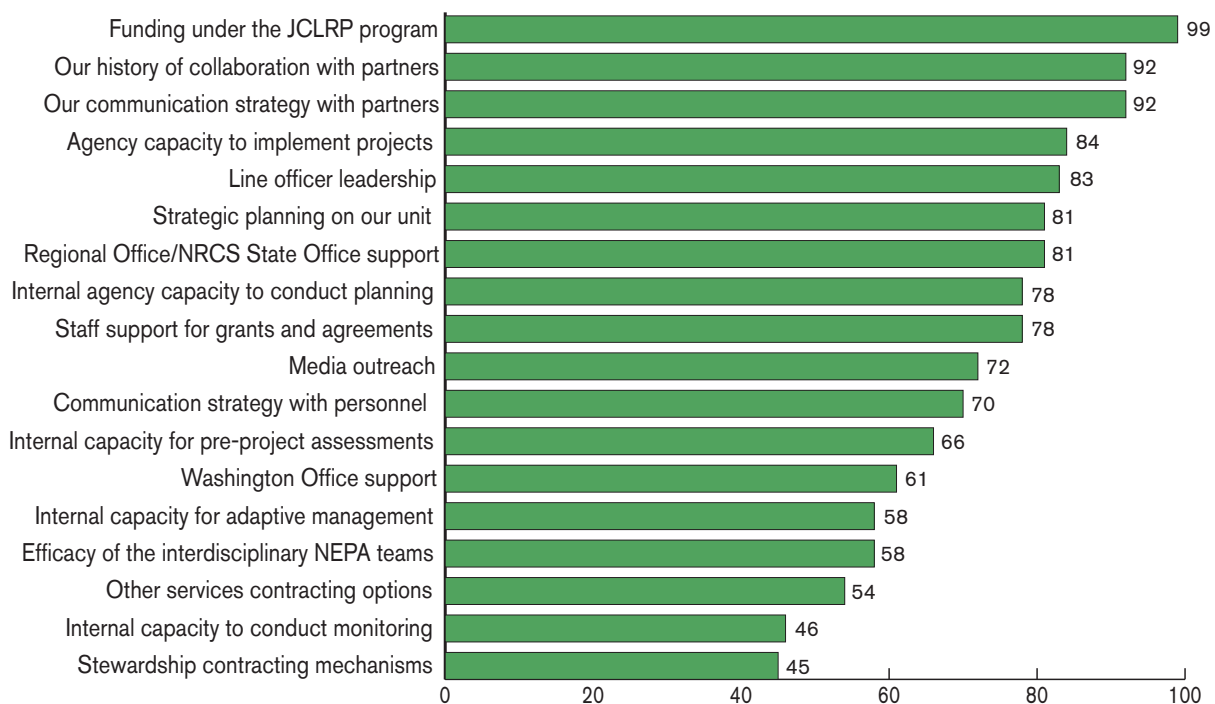
The most critical factor underlying success was having established collaborative relationships within the community and between the agencies and stakeholders. Ninety-two percent of survey respondents said their own history of collaboration with stakeholders was a factor for success, while 89% of people pointed to a history of collaboration among external partners and collaborators as key to success. Interviewees said established collaboratives or working groups often have greater degrees of credibility within the community and have systems in place to handle dissention or differences in opinion that can occur. They also often had built agreement around relevant topics prior to the JCLRP project planning and implementation. As one District Ranger noted, “I think if you were trying to start from scratch on the collaborative and the first time you tried to get people together was around this funding it may take you a lot longer to really start up and be effective and agree on the best approach.”

Interviewees said having partners who could add capacity was an important factor, particularly in cases where NRCS had less technical forestry expertise or capacity. Projects used tribal crews, private landowners, state agencies, collaboratives and volunteers to get work done on the ground, which included inventory, technical assistance, monitoring, and identification of priority landscapes. For example, tribal partners on some projects were able to provide both cultural and biological knowledge as well as leverage other funds to accomplish proj-

ect goals. However, it is important to note that being involved with or having a collaborative group or established partners in an area did not guarantee success, particularly if communication by the agency with collaborators was weak. Rather, a positive working relationship and history with collaborative groups and external partners was a much greater predictor of success than just the presence or prior activity of these external entities alone.

Collaborative groups and key partners also acted as communication facilitators, stretched the capacity of their federal partners, and provided trustworthy outreach and education to the public and landowners. Non-federal partners were often involved in outreach when they had established relationships or communication with landowners or more sophisticated outreach strategies than the Forest Service or NRCS. One project saw a “full blown community engagement strategy” enacted by the city to promote the project. Federal agencies said they would not be able to do this kind of outreach or have the capacity to enact it. On a few projects, outreach was done through a local, trusted partner. A state natural resource employee discussed the value of using partners who have community trust, like local NGOs, watershed associations, and county offices to send outreach mailings to landowners. One Forest Service employee said, “We’ve used funding from the Joint Chiefs Project pool to implement different types of fuels reduction projects within that permit area that then the [local museum] developed an interpretive product around so that we can garner more public understanding and support for the fuel treatments that we do.... People trust them more than they trust us.” Having historical memorandums of understanding was reported as being a factor of success and trust among partners. Several project champions were identified on projects; these ranged from city mayors to project liaisons and well-connected hydrologists that were able to coordinate between agencies. Other partners helped to gather data to support project planning and monitoring.

Local buy-in and willing landowners were key to success. Nearly all (87%) survey participants reported willing landowners on a project as a factor underlying success. One person explained, “The success depends heavily at times on local stake-

Figure B16 External factors reported as somewhat or major contribution to project success, by percentage of respondents**Figure B17 Internal factors reported as somewhat or major contribution to project success, by percentage of respondents**

holders sharing their successes with their neighbors, local conservation districts, and partnerships with county foresters, etc. Many of these projects are implemented in very rural areas where landowners may or may not have ever participated in a government program so it takes that local presence of the conservation district, local forester, or landowner for maximum success.”

Internal Factors Underlying Success

Internally, capacity is critical; in particular, hiring a coordinator or liaison to work between partners and encourage communication and trust is crucial to the success of the individual projects. Interviewees working on a project that had a coordinator almost universally believed that their projects would have been less successful without their coordinators. Both interviewees and survey respondents consistently indicated that having capacity at each phase of the project, including planning and implementation, was key to success.

Interagency relationships between NRCS and the Forest Service, and with other state and country agencies was key to hitting the ground running with a cross-boundary approach. Eighty-one percent of survey respondents reported state agency partners as facilitators of success. The ability and willingness to share data and info between the two agencies and their partners was also reported as a facilitating factor. In some cases, the NRCS was unable to share landowner data due to a privacy-related internal policy. One project was able to overcome this by going through each county assessor’s office and acquiring a database on private lands in those areas in order to send targeted mailings about the project to those who owned lands adjacent to National Forest land. Another project reported they were able to overcome this information sharing issue by having conversations and building trust between NRCS and Forest Service leadership on the project. Structured communication strategies throughout the life of projects were reported by about 25 percent of respondents as important to success, especially between the Forest Service and NRCS.

About two-thirds of interviewees said that doing work prior to the proposal process can make a project more competitive and is key to successfully implementation. Having a wildland fire protection

plan, forest plan, or NEPA document can all help with identifying priority areas and treatment options. Applying for or participating in similar programs, like the CFLRP, prior to being involved in JCLRP allowed projects to be more efficient and organized as planning approaches, priorities, and templates/processes were already in place. Having a track record of success was also reported in many cases as a facilitating factor because it established credibility and convinced landowners to work with agencies.

Having project goals that fit well within the culture of the surrounding area and local agency staff members was beneficial. For example, respondents for a project in Hawaii said there is a “great conservation ethic on the island”, and that projects there had very supportive landowners and agency staff. In landscapes with a history of doing similar restoration practices around private lands, landowners had a better understanding of project goals and were more willing to participate. Another interviewee said the surrounding area could not afford to have a catastrophic wildfire if the community wanted continued tourism, so they have been proactive in addressing fuel loads. Conversely, on another project, riparian buffers were prioritized at the state level and in the JCLRP proposal, but those priorities reportedly did not match the priorities of field staff or they were inadequately relayed to them by agency leadership. This situation resulted in challenges in accomplishing project objectives. Having support and committed leadership at every level of an agency is ideal, and local or field-level support is especially critical for success.

Common Challenges (L3)

Research participants described a variety of challenges across projects and interviewee comments. Of the 17 JCLRP projects we interviewed, three reported that they had met with limited success, with a few more projects reporting significant challenges. Those projects that were not as successful reported consistent challenges: lack of coordination and communication between the Forest Service and NRCS, staffing limitations compounded by hiring delays, lack of willing landowners, lack of planning or unified vision, and issues with NRCS processes. We Delays related to policy requirements were not reported as a major factor by most interviewees, al-

munication between the Forest Service and NRCS, staffing limitations compounded by hiring delays, lack of willing landowners, lack of planning or unified vision, and issues with NRCS processes. We elaborate on each of these challenges below. Those that were largely unable to accomplish project goals were all funded in 2014. Similarly, many of the projects that were perceived as being most successful were funded in 2015, indicating that proposal evaluation and implementation may have improved since the first year of the JCLRP.

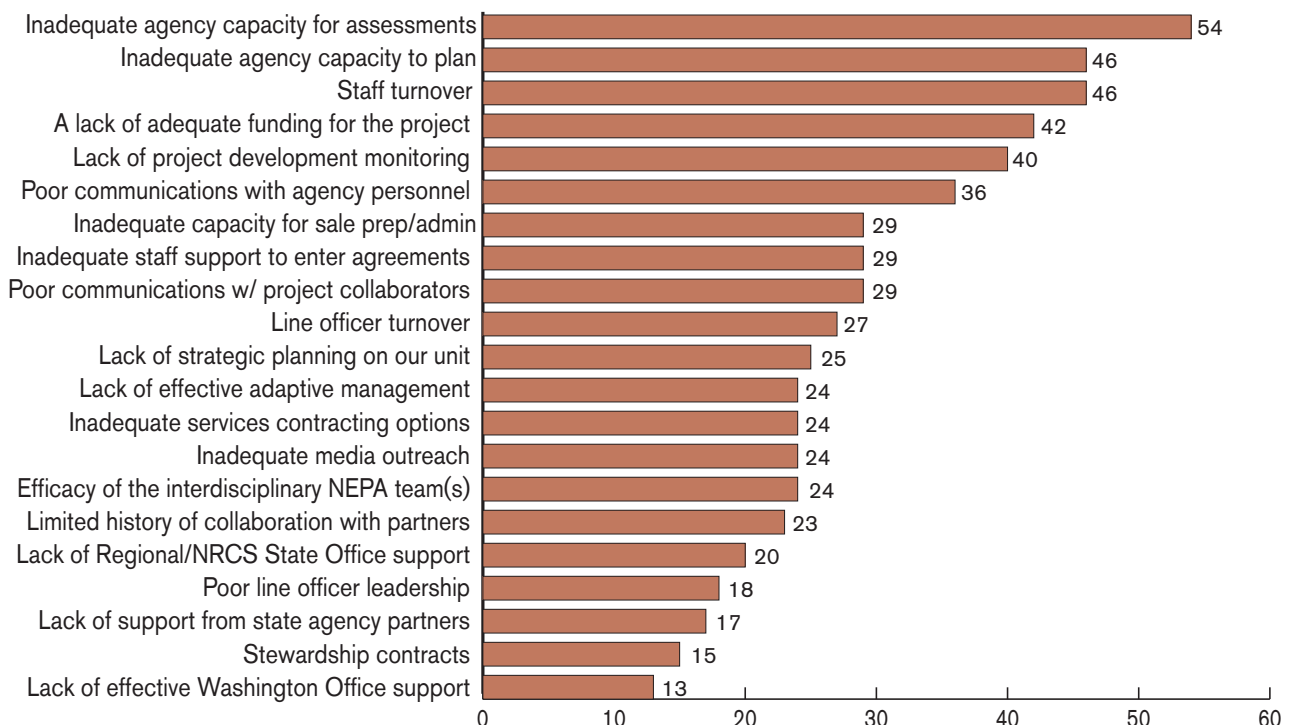
Internal Challenges

Survey respondents most frequently reported internal agency challenges that revolved around agency capacity, primarily inadequate capacity for pre-project surveys and assessments and staff turnover (see Figure B18). NRCS respondents more often indicated limited history of collaboration with partners as a challenge, although overall this was still a relatively less commonly reported limiting factor.

Interviewees reported limited staff capacity and turnover, especially within NRCS, almost universally as a significant challenge to the JCLRP, and some projects attributed their lack of success pri-

marily to this issue. Lengthy hiring processes and hiring freezes caused delays on several projects, even stopping one project completely. Many interviewees, including NRCS staff, said NRCS offices often could not accommodate the sudden increase in funding because they were understaffed, overwhelmed by responsibilities, and lacking necessary forestry expertise to meet JCLRP objectives in some cases. Where NRCS had little to no forestry expertise or technical capacity, this required leveraging of partner capacity to mark timber, take inventory, talk with landowners, etc., and in those cases projects were delayed. While an increase in NRCS staff capacity was reported as necessary for success, without a flexible strategy for funding and staffing a position, interviewees said hiring new staff might not be sustainable as JCLRP funding is only three years long. Staffing limitations and turnover in both agencies delayed projects, limited the degree of coordination possible, and caused frustration between the agencies. A lack of accountability within agency and project leadership also led to poor contracting, project goals being ignored, or inefficient use of funds. These problems were reported on about one quarter of projects.

Figure B18 Internal factors reported as somewhat or major challenge to project success, by percentage of respondents



though cultural resource requirements and heritage surveys delayed projects up to one year, primarily, people said, due to lack of capacity. Not being NEPA-ready was reported as a problem in only a few cases, but being NEPA-ready was discussed as very valuable in many cases. In one case, the Forest Service was not NEPA-ready, which delayed their work for two years, causing some frustration and misunderstanding in the public eye. A few people said it would be helpful to streamline NEPA processes for projects that get funding. There are less regulations on private land as compared to federal and state lands, so most legal barriers were experienced by the Forest Service, based on our interview data.

The timing and structure of funding under JCLRP was almost universally reported as a major challenge. Project participants often said they were unsure if or when funds would come through and did not know how much funding they would be receiving. These interviewees said that money sometimes came through late in the fiscal year in Spring, posing obligation challenges that impacted the efficacy and efficiency of some projects. This was particularly problematic when trying to enter into contracts, hire staff, or sign up landowners for the initiative. Sometimes the result was that funding was obligated to any willing landowner or to management actions that were not necessarily consistent with a project's main goals. One person stated, "There was a serious delay in receiving the 2nd year funding, and the 3rd year funding was not from the WO, but rather was funded at the regional level. It seemed to me that after the first year, the interest and support for this project in the WO seriously dropped. Communications from the WO have been poor since this project began." These issues have likely improved in recent years, based on our conversations with Washington Office staff who had worked to address these problems.

About a quarter of participants said that NRCS processes can be cumbersome, lengthy, limiting, and expensive, often frustrating landowners and driving them away. Complex and costly matching requirements for landowners caused frustration and limited the number of adjacent landowners that could be targeted for JCLRP. Sometimes, NRCS processes and requirements limited the amount of adjacent landowners that could participate in the project, for instance due to income thresholds that can make a

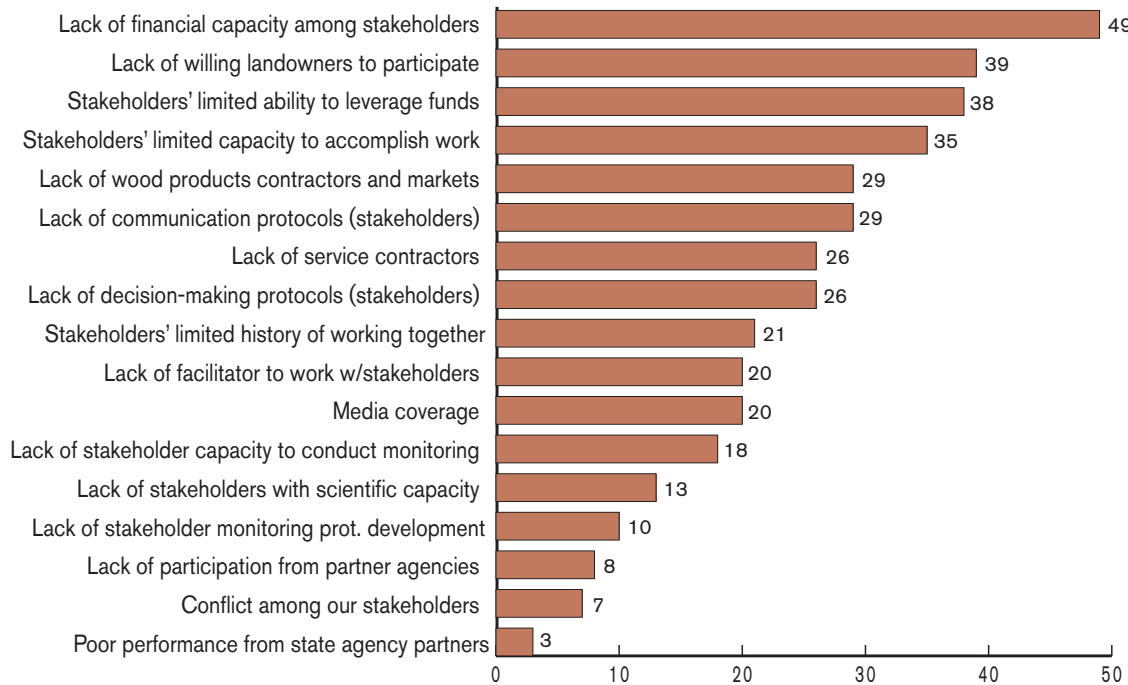
landowner ineligible for assistance. NRCS privacy rules also limited information sharing between partners on a few projects, making it difficult for partners to effectively outreach to appropriate landowners. One interviewee suggested that NRCS staff acquire signed waivers from each landowner throughout the project to allow for sharing of that information to partners. Strict requirements for landowners often caused delays to the projects. Another person explained that funding mechanisms for hazardous fuel reduction on private land adjacent were unwieldy and required a substantial up-front outlay from the landowner that many in the area were unable to meet.

About ten interviewees reported a mismatch of Forest Service and NRCS processes. In these cases, agencies did not understand each other's processes, jargon, expertise, funding streams, and timelines. On one project, the lack of understanding of each other's processes was reported as a key reason the project was unsuccessfully coordinated. Most projects, however, were able to overcome this mismatch of processes as more coordination and learning occurred.

External Challenges

Lack of financial capacity among stakeholders, lack of willing landowners to participate in the project, stakeholders' limited ability to leverage other funds, and stakeholders' limited capacity to accomplish work were the most frequently reported external challenges in the survey, although less than half (35-49%) of respondents said these were a challenge (Figure B19). More NRCS respondents than Forest Service reported a lack of communication protocols among stakeholders as a major challenge.

About a quarter of interviewees reported a lack of landowner willingness or ability to participate in their JCLRP project. They indicated that sometimes this was because the landowner did not trust the federal government. Getting in touch with small or absentee landowners also was difficult. In some cases, working with a diverse set of landowners posed logistical issues, requiring an increase in coordination and resources. Interviewees noted that working on a lot of small acre parcels is more difficult than working on a few large acre parcels, but that large parcels often could not participate due to income thresholds that disqualified landowners from the project.

Figure B19 External factors reported as somewhat or major challenge to project success, by percentage of respondents

Limited markets, contractors, engineers and infrastructure posed problems for fuels reduction projects, particularly at the pace and scale a JCLRP project affords. In certain areas, the timber being removed from a project site had little to no commercial value, so most of it was burned or sold as firewood—both very low to no-value options. Lacking infrastructure led to longer implementation timelines and limited management options.

Accomplishing broadcast burning was a challenge for about one quarter of projects, due to short burn windows and having qualified personnel to burn. Limited availability of smoke permits and other state policies concerning prescribed burning also reportedly reduced the number of acres treated. Public perceptions were also reported as a barrier. As one collaborative member explained, “When I talked about community buy in, we definitely had it. And then you light your first prescribed fire in Spring on a day when there’s a big horse sale in town and people start calling the Governor. And then you realize that there are people who are very supportive of the project, but it doesn’t take very many who just don’t like smoke and start complaining to shift the dynamic pretty fast. That definitely is an issue.”

Complex ecology can pose challenges in communicating management goals and practices to the public, and even within the agency, requiring more coordination. Several project areas also required expensive equipment because of rugged terrain, isolation, certain management goals, and the needs of species-at-risk. One project area was only accessible by at least a day’s hike or via helicopter. With this project, NRCS had to trust in state partners to complete an inventory and evaluation process because the state had the resources for multiple site visits. However, the ecological context of an area can be a facilitating factor, making a project more competitive for funding or more important to local partners when there is an agreed-upon need or risk. For example, some areas, such as the headwaters of the Mississippi or in Hawaii, where there are many species-at-risk, are commonly understood to be high-priority areas. One interviewee noted that forest types where there is agreement around the science and restoration need is a facilitator. In a few cases, disturbance events, like hurricanes or recent wildfires, were seen as a rallying point for an area, motivating restoration and collaboration efforts by agencies and landowners alike.

Future of the JCLRP Projects and Initiative

Research participants were overall supportive of the JCLRP continuing (see Figure B20). In the survey, when asked whether the initiative should continue 84% of respondents said it should, and 79% said they would apply for more funding. A strong majority of people (75%) agreed that the initiative allows forests to focus on high priority programs and projects, and 67% said the JCLRP should be expanded to landscapes with different restoration needs. Every participant, when asked in interviews, said they would always have a use for additional funds and have more work to do. Some said they would replicate the general concept somewhere else, while others said they had more work to do in the same landscape.

In interviews, almost every participant reported they would like to continue working cross boundary with their partners in some capacity; those that believed they would continue this style of management were generally working with established collaborative groups or partners that had other sources of funding, broader priorities, or broader community support to achieve specific goals. One Forest Service employee stated, “We have a good collaborative group in place, and we have a purpose. We just fold all these projects into it.” However, as one external partner emphasized, “All of this happened because of a funding source, and if the funding source goes away, then the motivation for maintaining partnerships is lessened.” People said a decrease in funds limits the potential to conduct work on private lands and the level of engagement with private landowners. Staff turnover or loss of those in leadership positions will make it difficult to sustain partnerships.

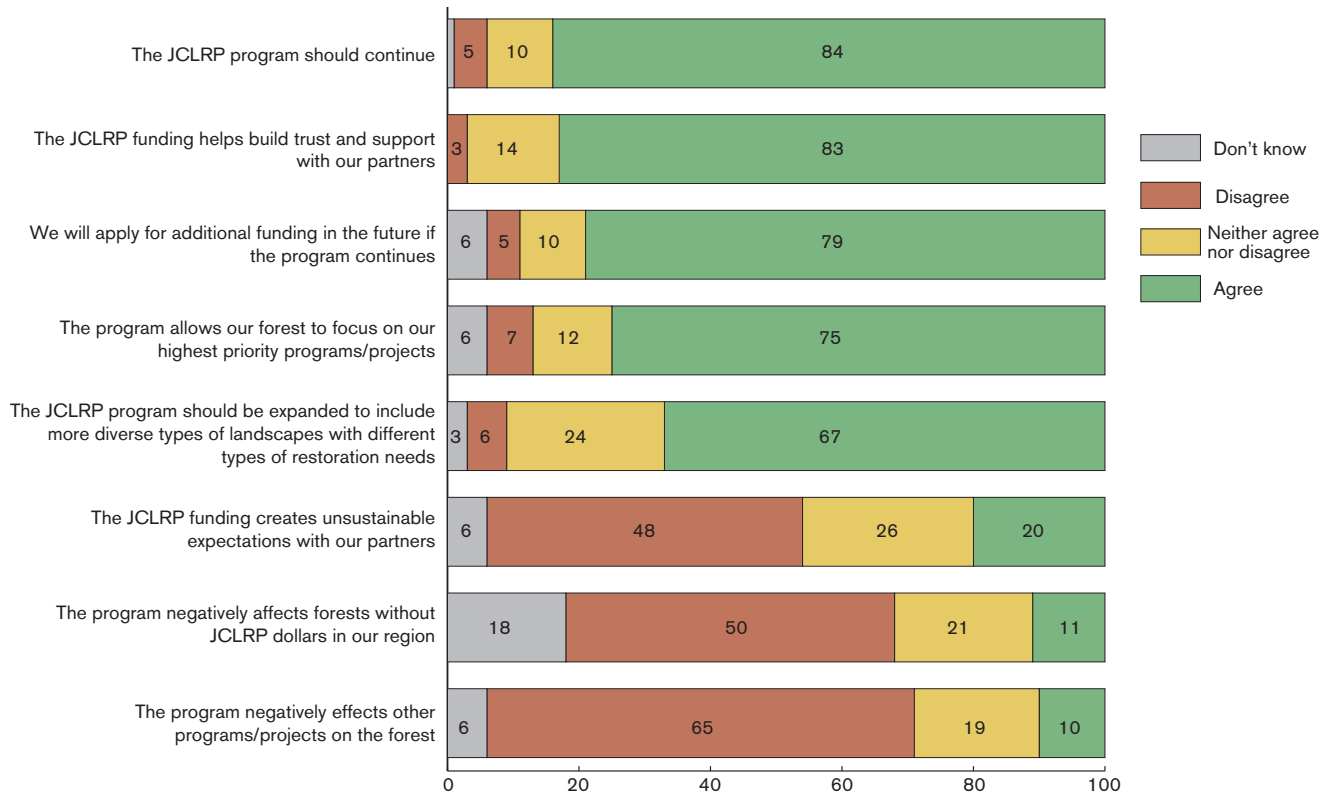
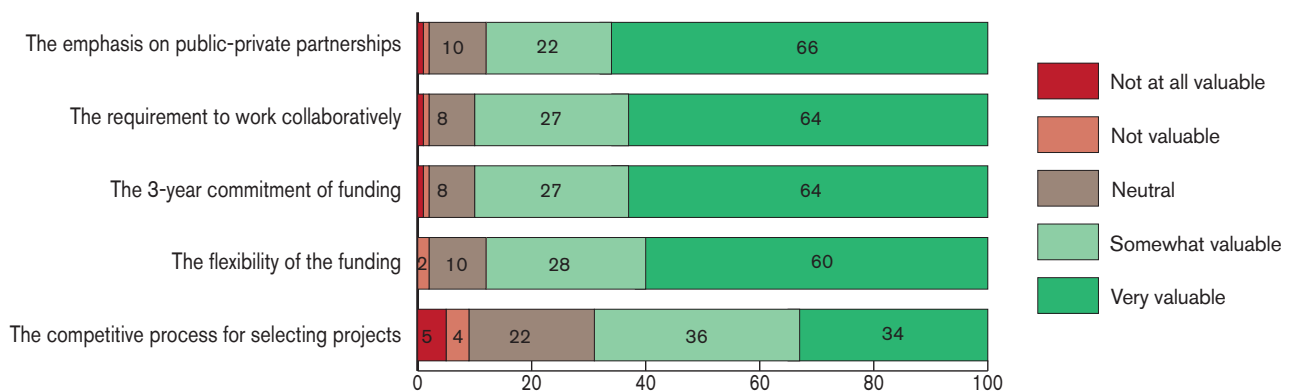
About a fifth of interviewees highlighted the need for and challenges associated with future maintenance and monitoring. Many of the JCLRP projects that focused on fuels reduction have the next step of reintroducing fire in areas that were mechanically treated and may need additional funding to do this. In the few cases that private landowners were tasked with implementation, there is a need for follow-up or monitoring with those landowners to be sure they completed the management actions they committed to. Among survey respondents, 60% said that their ability to work across jurisdictions will continue even without additional funding, but 48% said that

they will not be able to maintain their JCLRP restoration treatments after funding ends.

Ten percent of survey respondents believed that the JCLRP negatively affect other programs/projects on the forest, and 11% said that the initiative negatively affects forests without JCLRP dollars in the region. However, on a few projects, Forest Service respondents reported resentment from other sectors of the Forest Service. There was a perception in these areas that the JCLRP project ‘stole’ money from other forests across the region. A Forest Service employee explained, “[The Region] also decreased particularly the fire funds and [vegetation] and watershed funds across all the other forests in order to make sure they funded the Joint Chiefs stuff. And so, although we were getting some of that money, I heard complaints from my counterparts on other forests about how we stole money from them.” As another Forest Service employee working on a different project explained, “Other programs that first and second year got hit pretty hard, and money was not exactly off the top money from the [Washington Office]. So, across the region, like wildlife budgets, other watershed, other budgets were reduced to fund these Joint Chiefs projects. It didn’t exactly give everybody the best taste in their mouth the first couple of years.”

Finally, about 20% of respondents said that JCLRP funding creates unsustainable expectations with partners. Comments indicate this might be due to delays for planned implementation or money being redirected away from other programs to the JCLRP. For all of these items, the Forest Service’s responses were significantly higher (i.e. they indicated negative effects were greater). A quarter of respondents said they would see negative effects on local communities after funding ended.

All aspects of the initiative that we asked about in the survey, including requirements to work collaboratively and with private landowners, the three-year commitment and flexibility of partnerships, and the competitive selection process were rated as valuable by at least 70% of respondents (see Figure B21). Line officers rated the flexibility of the funding as more valuable than non-line officers. Several interviewees spoke of JCLRP as being simple and flexible compared to many other grant opportunities they have worked with in the past.

Figure B20 Survey respondent agreement with statements about the JCLRP, by percentage of respondents**Figure B21 The value rating of different aspects of the JCLRP, by percentage of respondents**

Recommendations for Initiative Improvement

Improving Funding Approaches

The primary recommendations were about improving how and when funding is allocated. Participants from both agencies said that in order to be successful, they needed to know the amount of funding they would be receiving and when they would be receiving it. People said they need their funding earlier in the fiscal year to allow for efficient and meaningful obligation. Many said it would be helpful if their funds were multi-year to give them some flexibility in spending funds. Some said that they requested funds in multiple budget line items (BLIs), but received it all in a single BLI, which constrained their ability to implement projects. One person explained that it is critical to address these issues for National Forest System BLIs, and particularly important that this be addressed for funding coming from State and Private Forestry, which is crucial to conducting work on private lands.

Several people said it is essential to ensure that receiving JCLRP funding augments and does not replace existing funding on a unit. Several units said that the JCLRP money was not additional, and that it resulted in reduced funding for other programs on the same forest or for other forests in the region.

Interviewees said there needs to be more flexibility in timelines for obligating NRCS funds, in part to make sure funds are used effectively, and some said the initiative would work better if there were more flexibility to partner with larger, wealthier landowners. One person requested that the agency ensure watershed enhancement work is included under permissible activities within applicable USDA authorities. Others asked whether limitations on grants to private landowners might be changed or waived, in terms of various income thresholds or limitations on grants to organizations or landowners (e.g. some mentioned a payment limitation under the Farm Bill).

Participants recommended using existing funding mechanisms or programs, like EQIP, to limit any learning curve. However, a handful of participants

said using those existing mechanisms stifled creativity, did not work well with the project, or that the money could have been utilized more effectively through another pathway. This issue would benefit from more exploration. Some said there were extra hoops to jump through to use this money to pay for salary, resulting in a long process that could delay the progress of meeting a project's goals. Several tribal contacts and collaborative contacts recommended some money be focused directly to tribes and partners, respectively.

Suggestions for Changes to the Design of the JCLRP

The following were primary suggestions for improvement:

- Some would like other goals besides fire management to be weighted more significantly in the proposal process so other restoration needs and more diverse landscapes can be funded by the JCLRP.
- Recommendations for changes to the length of the funding cycle varied; most were content with the three-year cycle, with others requesting closer to five years. Some projects said they needed more time, or the option to apply for a longer period of funding to accomplish their work and to build a self-sustaining collaborative group. One reason they gave was to support long-term hiring of staff or more time to hire a project coordinator.
- A common suggestion was staged funding, along with some suggestions for a multi-stage application and evaluation process. Some suggested, for instance, allocating smaller amounts of money in the first year as seed money to build relationships and bring partners to the table, begin NEPA, prepare for implementation, and make the broader public aware of the initiative. People said this would allow for more targeted landowner outreach and limit the instances when NRCS has to obligate funds quickly to any willing landowner. Other suggestions included a bell-curve structure, with seed money, followed by more implementation funding and then some follow-up funding for project maintenance. As one external interviewee said of maintenance funding, "It would be a small in-

vestment, but it would be a really worthwhile investment to maintain landscape resilience.” Others suggested a trial year followed by the possibility of continued funding if a project showed success.

Suggestions for Improved Agency Support and Oversight

- Staff consistently stated that hiring a project coordinator is essential.
- Staff said it is critical to ensure that capacity exists to utilize the additional funding. Contracting in particular appears to be a bottleneck on some units.
- Staff from both agencies requested better communication throughout the organizational hierarchy about the purpose of the initiative, funding approaches, funding timelines, and proposal submission or project existence, especially to regional offices and among affected staff. This included clearer annual announcements and communications between agencies, with associated timelines and deadlines.
- Some said they need more notice in order to have more time to apply for JCLRP. Several individuals reported issues with being made aware of this initiative and proposal process very late in the game, giving them just days or weeks to come up with a proposal; this may have been more true for projects in 2014 and 2015.
- Several interviewees recommended there be a venue to allow for peer learning, knowledge sharing, and demonstrations of success to encourage enthusiasm about the initiative and improve projects across the nation.
- People recommend improved accountability mechanisms to encourage focus on initial project goals and targeting the ‘right’ acres instead of any acres that have willing landowners. Some suggested the NRCS develop a more strategic approach to landowner engagement.
- Several interviewees recommended clearer reporting requirements and communication of those requirements to both agencies. One person explained, “It seemed like the Forest Service was receiving a lot more information than the NRCS was about the Joint Chiefs program as a whole...both in terms of what our project

and proposals need to look like and monitoring the reports, [and] what needed to be included in our yearly monitoring report.” Another said, “On the federal side, it’s cumbersome to keep track of multiple special funds, especially when they occur on the same landscape. If we could streamline that tracking/reporting into distinct outcomes or goals regardless of funding source, it could help tell a better story cumulatively.”

Suggestions for Improving the Proposal Process

For future selection of projects, interviewees and survey respondents had several suggested areas for improvement:

- Staff suggested that the strength of the NRCS and Forest Service relationships be demonstrated in the proposal. Many suggested a single proposal process that both agencies contribute to.
- Some suggested that, during the proposal process, there needed to be improved communications with NRCS about landowner base and roles and responsibilities. This might help to identify gaps in NRCS forestry expertise and whether the local office has the necessary willing landowner base to participate. Many said it was critical to make sure there were willing private landowners as part of the proposal process.
- Some suggested involving collaborators and non-agency partners in the proposal process, to demonstrate capacity, and build trust and accountability with partners; we also suggest that it might be helpful to assess the extent to which a proposal fits with community goals and culture. People said that the strength of established collaborative partnerships should be an important consideration, as it is critical to success.
- NEPA readiness and partner potential to contribute to funding were also identified as important factors to consider. However, interviewees also said it is difficult to do NEPA at larger scales without some certainty that the funding will follow. This makes the case for some seed funding to promote larger scale planning.



