

FY 2017 SOUTHERN FIRE EXCHANGE ANNUAL PROGRESS REPORT

Highlights & Achievements

In FY17 the Southern Fire Exchange (SFE) had another milestone year. We met goals for fire science delivery with partners and stakeholders while also expanding our audience (see Table 1). Program participation (see Table 2) and post-event surveys, demonstrate that we are a successful and innovative fire science delivery program for the South. We wrapped up FY17 with a new half-time outreach specialist who brings valuable experience and strengthened connections to the Southern Regional Extension Forestry (SREF) program.



In the spring of 2017, SFE and the Osceola National Forest hosted the JFSP Board and Program Office for a field tour in the Osceola National Forest.

In FY17 SFE:

- Gave 20 talks or briefings on fire science topics that reached over 1,500 people.
- Led and/or contributed to 11 workshops, field tours and related events that collectively connected with 1,100 attendees across the Southeast.
- Hosted 14 webinars that reached 1,859 live viewers and another 2,461 viewers via archived recordings - a huge increase from FY16. Post-webinar surveys showed that viewers were overwhelmingly satisfied with the webinars (Figure 1).
- Expanded the SFE email contact list by 39% resulting in an increase in all stakeholder categories.
- Co-planned the Association for Fire Ecology's 2017 International Fire Ecology and Management Congress (Nov. 28-Dec. 3 in Orlando, FL). This massive undertaking included organizing fire circles, field trips, workshops, sessions and more.
- Demonstrated more than 80% of SFE stakeholders sometimes, often, or always use SFE information and resources (Figure 2).
- Received positive feedback from workshops, events and webinars through event evaluations as well as unsolicited emails or personal communications. These interactions provide both quantitative and qualitative data that suggest that we are reaching our goals of fire science delivery in the South.

"I write conservation plans for private landowners and use the fact sheets often, my Rx recommendations often reflect knowledge I have gained from SFE."

"As a fire training specialist, working with participants from outside the geographic area, the SFE Fact Sheets have been extremely helpful in accelerating the learning on numerous subjects for these participants."

"In yesterday's world where we drove 100s of miles and spent days to participate in conferences and technical sessions your webinars are a welcomed venue to help us field professionals stay both current and better understand state-of-the-art technical subject matter."

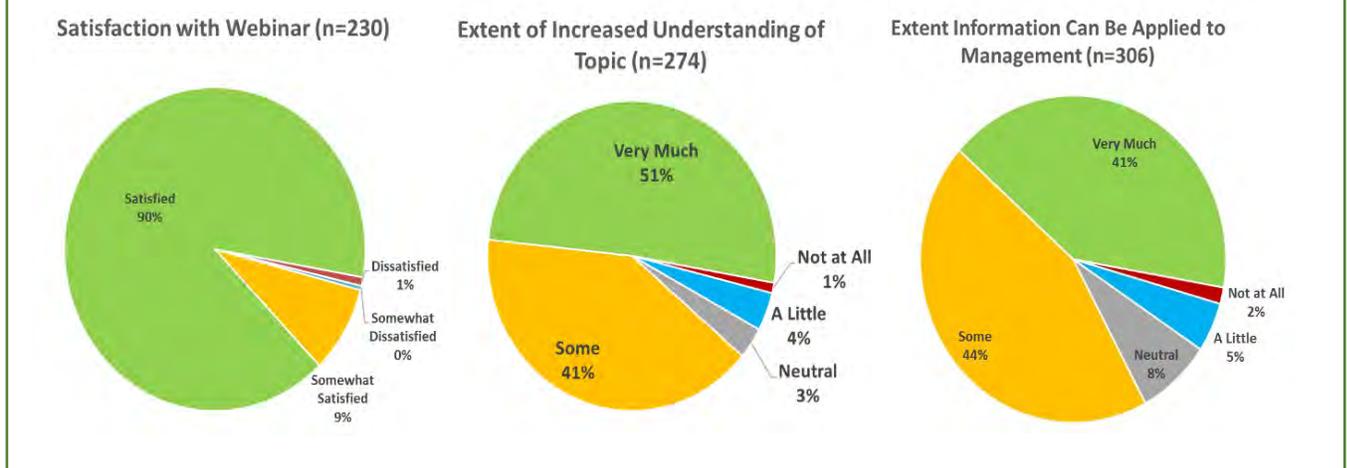
A selection of some of the encouraging comments and feedback we received in FY17.

Other Accomplishments

In FY17, SFE “increased access of fire science research and SFE resources”, which is one of our high-priority logic model outcomes. This accomplishment was demonstrated through our growing contact list, high number of webinar attendees and over 2,000 contacts through workshops and presentations. Webinars continue to be an effective medium to provide a direct exchange between scientists and land managers across the region. In post-webinar evaluations, 90% of respondents were satisfied with the webinar content, 92% indicated that webinars increased understanding of fire science topics, and 85% responded that webinars provided information that could be applied to their fire management activities (Figure 1). Furthermore, 60% of webinar participants are land managers in positions where they can apply this information. Delivering information is only one component of a successful outreach and science transfer program. For the program to be effective, participants must find the information relevant and apply

“Unlike many webinar experiences, I was not able to multi-task...it was too fascinating!”

Figure 1. FY17 SFE Webinar Series Participant Evaluation Results



it to their management, which is reflected in one of our medium-term logic model outcomes: “Managers adopt/use new and existing fire science information and technology (models, tools, etc.)”. Evaluations from individual workshops, webinars and the 2017 UNR FSEN survey indicate that we are meeting this goal. SFE stakeholder groups indicated that they frequently use information or resources they receive from SFE (Figure 2). Our program participants indicate that they use information received through our programs in a wide variety of fire and land management activities and decisions (Figure 3). Interestingly, 75% of respondents indicated that they used and shared the information they received from SFE with others. Thus, the number of stakeholders we ultimately impact across the region is likely larger than the number we can count via direct interactions (webinars, field tours, etc.).

Figure 2. Use of SFE Resources in Fire Related Work (2017 UNR FSEN Survey)



The bimonthly SFE *Fire Lines* email newsletter provides relevant research summaries and news items to everyone on our email list, which grew 39% in FY17 to almost 2,900 subscribers. While the list includes participants from nearly all U.S. states, most subscribers (82%) are in the southeastern region. Through email subscribers our newsletters and resources are forwarded to a larger audience through partner networks (e.g. state fire chiefs, prescribed fire councils, regional forest stewardship programs, extension agents, Fire Learning Networks and the Southeastern Regional Partnership for Planning and Sustainability) facilitating greater reach and impact. The 2017 UNR FSEN survey indicated that for 80% of responding managers/practitioners, 84% of responding public and 90% of responding scientists our *Fire Lines* newsletter is a “useful” or “very useful” resource.

Use of our SFE website increased again this year, with 12,030 sessions by 7,630 users which represents a 26% increase in page views (36,749) compared with previous years. While, these data only show visitation to the website, the 2017 UNR FSEN survey results suggest that individuals are in fact finding valuable and usable information on our website. One significant accomplishment in FY17 was moving the “Simple Smoke Screen Tool” to a new permanent home on the SFE website. This popular online smoke modeling tool was removed from its original website in 2016. After receiving numerous requests from prescribed fire managers across the region, in late FY17 SFE worked in collaboration with the US Forest Service Southern Research Station and the University of Georgia to update and host the tool on our website. We have received very positive feedback on the updates and revival of this easy to use smoke modeling tool.

The 7th Association for Fire Ecology (AFE) International Fire Ecology and Management Congress has been a major planning event for SFE since the beginning of the year, and especially over the last six months. We are excited to have this major event held in the South and we have invested significant efforts towards increasing opportunities for fire science exchange among scientists and managers at this event. Dr. Long is the conference Program Chair and Dr. Godwin is a member of the Field Trips Committee. In addition, all members of our Leadership Team will be giving presentations and/or moderating a fire circle. The conference will include a variety of meetings, trainings, and learning opportunities, including: 20 special sessions with about 150 presentations, over 150 general session presentations, 83 posters, 18 interactive fire circles, 12 training workshops, 7 field trips, 10 Fire AFEx talks and 8 plenary speakers.

One of the plenary talks and several special sessions are specifically planned to showcase JFSP, FSEN and SFE programs and accomplishments. Two of the interactive fire circles have been designed to solicit information about SFE impacts on regional fire management as well as to gather feedback on regional research and science needs – all of which we will use to guide future SFE programming. SFE has been instrumental in working through the Fire Congress Planning Committee to encourage conference presenters to submit a short ‘Research Highlight’ document related to their presentation that describes the management implications and applications of their

Figure 3. How managers and practitioners use information from SFE (2017 UNR FSEN Survey)



work. These Research Highlights will be publicly available in an online database and we anticipate that this will be a rich starting point for creating science delivery products beyond the conference.

Staff Changes

Annie Oxarart was a key player in all SFE programs since its beginning in 2010 and we knew she would be greatly missed when she left to assume the Administrative Director position with the Association for Fire Ecology. Although losing her experience presented a challenge, SFE was fortunate to find an excellent replacement in Leslie Boby, an Extension Associate in the Southern Regional Extension Forestry (SREF) office. Ms. Boby splits her time between SFE and SREF and provides us with a great new link to this important regional partner. Leslie has a long history with fire research and outreach as well as private landowner education and extension. We also welcomed Dr. Raelene Crandall, Assistant Professor of Fire Ecology at UF, to our SFE Leadership Team. Rae joined the UF/SFRC faculty in 2016 with teaching and research responsibilities in fire ecology and management but also a yearning to participate in fire outreach. She will strengthen the SFE partnership with the UF faculty that was on hold when Leda Kobzior left several years ago.

Comparison with Planned Work

As in past years, SFE had a full set of activities planned for FY17 and focused on its stated objectives while remaining flexible to respond to new opportunities and additional work. In most cases, SFE met or exceeded its planned obligations for the year. For example, we planned to provide eight webinars, but were able to conduct 14 overall, by taking advantage of new opportunities. One of the added webinars was quickly assembled during the spring wildfire season in Florida and Georgia to provide critical timely information about research conducted by the Missoula Fire Science Lab on the accuracy and variability of weather instruments for measuring temperature and relative humidity in the field. The Florida and Georgia wildfire season impacted the delivery of our duff fire science workshop until early FY18 due to the incident commitments of many of our partners and participants.

The FY16 and FY17 POWs listed planning for the Fire Ecology and Management Congress as a major output, especially in the last year. However, we did not anticipate the impact of that effort on other POW programs, nor did we anticipate the departure of our Outreach Specialist to AFE mid-year. Our staff commitment to the conference has delayed completion of five fact sheets until FY18. Cost savings that were accumulated during the transition to a new Outreach Specialist will assist in accomplishing those extra tasks in the new year.

Priorities & Initiatives

Evaluations from meetings and the 2017 UNR survey, as well as input from our SFE Advisory Board support the continuation of the four program focal areas identified in our 2015 refunding proposal (see box).

Specific outputs for each theme will be listed in the POW Update in November and will be reevaluated during preparation of the refunding proposal in early 2018.

A key challenge was summarized by a scientist responding to the UNR evaluation: *“there are just too many issues that are important to single out the most important. Everything smoke, weather, fuel, safety and risk reduction are the most important.”* That being said, smoke and air quality will continue to be prominent issues as understanding and managing for them have huge impacts on conducting prescribed fires.

SFE FY16 Program Focal Areas

- Smoke and air quality
- Prescribed burning
- Fire ecology
- Wildfire mitigation and suppression

New Audiences & Partnerships

Interaction with several partners increased this year, especially in the area of educating landowners and the public about wildland fire. The Gatlinburg wildfire last fall and wildfires in

Florida and Georgia this past spring stimulated efforts to expand and strengthen landowner and homeowner education about fire, especially through the SREF office, Southern Regional Cohesive Strategy and state Cooperative Extension Service programs. The SERPPAS prescribed fire working group, which promotes prescribed fire on private lands, joined in these renewed efforts. SFE worked with this collaborative group to provide a science backstop for new programs and products. The AFE Fire Ecology and Management Congress will have one special session and fire circle focused on expanding public education about wildland fire in the region.

Tall Timbers Research Station initiated a Prescribed Fire Science Consortium (PFSC) in 2016 that was briefly mentioned in our last annual progress report. SFE was a partner in several field activities organized by the PFSC this year and will engage in the Special Session on Prescribed Fire Science at the AFE Congress. We will also record all the talks in that session to be used in future science delivery and workshop activities. SFE looks forward to playing a key role in future PFSC outreach efforts.

Developing Trends

We firmly believe that the trend of SFE being increasingly recognized as a valuable partner for science delivery will continue with the organizations mentioned previously as well as with new partners. We already have a request to develop several webinars to share prescribed fire science with air quality staff in the southern states as part of the ongoing collaboration between state fire and air quality agencies.

Finally, we anticipate that following the AFE International Fire Congress in November, we will focus on the development of several new fact sheet series, especially in the smoke and fire ecology/effects themes. We also hope to use the 'Research Highlights' that AFE Congress presenters are encouraged to submit as a starting point for a number of new SFE outputs.

What We Will Build On and Do Differently

As we move into FY18 we will be focusing on integrating our 2017 UNR survey results, SFE workshop, webinar and PFC survey results as well as the qualitative information gleaned from the AFE 2017 Fire Circles to make decisions and plans through our Advisory Board for our next JFSP refunding proposal. We have a substantial amount of survey data and we plan to use those data to ensure that our science delivery plans are novel, targeted and successful in achieving our logic model desired outcomes. We anticipate that developing this proposal will be a significant task in early FY18. Another priority for FY18 will be to create more publications and to work with partners on the development of larger guides to key topics.

“Various SFE documents have helped me communicate complex fire weather and fire behavior topics to managers that I’ve been working with.”

Last year we started developing a template science update Power Point presentation, complete with notes, that we could share with Advisory Board and Leadership Team members to reduce our travel costs and increase our ability to reach geographically diverse audiences. This year we continued that effort by creating a new presentation that included science briefs relevant to a variety of key topics such as smoke management, longleaf restoration and natural fuels, drip torch burns and more. We have used and shared that presentation at meetings in Alabama, Florida, North Carolina and South Carolina so far.

Our webinars continue to be extremely successful and we will explore ways to offer more webinars this year based on UNR survey results and comments from the webinar evaluations. SFE’s website continues to be a popular source for information and we will investigate opportunities to make it easier to update and navigate.