Smoke Signals

September 2006 Volume 3

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New National Indian Program Training Center Opens In Albuquerque

~Jerry Chavez, Public Affairs Office of the Special Trustee



(Left) Rolinda Benalli, BIA, Office of Information Resources Management and (Right) Karyn Kinsel, BIA Division of Safety and Risk Management on the lobby's second level walkway.

Construction of the National Indian Program Training Center (NIPTC) located in Albuquerque, New Mexico is complete. The Center's mission is to provide training and development opportunities critical to Department of the Interior employees, tribal representatives and federal agencies responsible for administering Indian programs.

With 11 rooms, the facility has a seating capacity of 552, is 48,000 square feet in size, and boasts 5 breakout rooms and 2 meeting rooms. The meeting rooms can seat 165 people. The facility also includes 5 computer labs and 43 computers. The center offers distance training and information sharing capabilities via digital broadcasting systems as well as print and duplicating services. The center offers a broad range of mission critical, leadership and career development courses. Since the Center is administered by the Department of Interior, barriers to internet connectivity common in Bureau of Indian Affairs training facilities do not exist.

Training

New National Indian Program Training Center



Former Secretary of the Interior Manuel Lujan covers shows his respect as the Colorguard raises the American Flag during the dedication of the new Training Center.

The Center sits on a 44 acre site at 1011 Indian School Road NW which was once home to the Albuquerque Indian School and to numerous Native American students who attended the boarding school from the 1880s to the 1980s. The Albuquerque Indian School began as a federal, off-reservation boarding school administered by the Bureau of Indian Affairs (BIA) in 1884; by 1912 the school had eight primary grades and over 300 students; by 1925 enrollment increased to over 800 students and grades 11 and 12 were added; by the 1930's enrollment peaked at about 1,400 students. The BIA continued to manage the school until it was transferred to the All Indian Pueblo Council in the 1980's. The school continued operating until 1982 when its programs were transferred to the Santa Fe Indian School. The school

structures eventually fell victim to fire in 1985.

The Indian Pueblos of Federal Development Corporation, the forprofit development arm of the All Indian Pueblo Council, constructed new facilities on the site beginning in 2003 that now comprise over 300,000 square feet of space within two structures. The two buildings house numerous Indian program functions, including the Bureau of Indian Affairs Southwest Regional Office, Office of Indian Education Programs, Office of Management Support Services, Office of Hearings and Appeals, Law Enforcement, **Environment Policy Regional Office** and the National Indian Programs Training Center.

The NIPTC which occupies one of the buildings continues the tradition

of the old Albuquerque Indian School by providing education and training to Native Americans and to individuals who work in improving the quality of programs and services offered to Indian people. The Center is the first government facility to be located on Indian trust land within Albuquerque's central business district. The training center's modern classrooms, stateof-the art equipment and distance learning capabilities are designed to provide a learning environment that fosters personal and organizational development intended to improved Indian programs and services.





National Fallen Firefighters Foundation Memorial Services, October 2004



The families of fallen firefighters Rick Lupe and Randall Bonito Jr. and helicopter pilot Jess Pearce lend moral support to each other at the 2004 Fallen Firefighters Foundation memorial service in Emmitsburg, Maryland.

Standing, from left, are Daniel Lupe, Sean Lupe, David Miller and Ronald Bonito; second row, Jillene Miller, Evelyn Lupe and Melissa Bonito. Kneeling is Brent Lupe. Photo courtesy of Ben Nuvamsa, Kiva Institute.

On the first weekend of October 2004, more than 6,000 solemn attendees gathered under unseasonably mild skies in Emmitsburg, Maryland to honor 107 firefighters who had given their lives in 2003. An additional three fallen firefighters from earlier years were also commemorated.

A total of 34 states and the U.S. Territory of Guam experienced line-of-duty deaths last year. Four of the fallen heroes were from Arizona – three died on the Fort Apache Indian Reservation in eastern Arizona's White Mountains.

Survivors representing firefighters Rick Lupe and Randall Bonito, Jr. and contract helicopter pilot Jess Pearce were welcomed to the twenty-third annual National Fallen Firefighters Foundation memorial ~ Wendell Peacock, Western Regional Office

weekend. There, they were assigned escorts to tour the facilities and participate in the scheduled programs.

The families were housed in hotels in Frederick, Maryland and bused each day to the memorial at the National Fire Academy campus in Emmitsburg. Saturday's Family Day activities included orientation, presentation of a memorial lithograph and attendance at several solemn ceremonies, including a visit to the Fallen Firefighters Memorial Chapel.

At the chapel, built in 1839, family members were invited to light candles in honor of their loved ones and leave commemorative long-stemmed roses in a large vase shaped into a Maltese cross, the traditional symbol of the fire service. Members of the foundation's Fire Service Survivors Network stood vigil to answer questions and provide support.

Volunteer staff members were available to assist attendees in locating their appropriate sponsored bricks among the more than 4,500 dedicated to the fallen firefighters and set into the Walk of Honor running throughout the central quad area of the academy.

A highly moving candlelight service was held exclusively for survivors on Saturday night at the historic Basilica of the National Shrine of St. Elizabeth Ann Seton. Extended family, friends and co-workers of the fallen firefighters viewed the service via closed circuit broadcasts at auditoriums on the academy campus. Service attendees were called forward to the altar of the Basilica where they lighted luminaria as photographs of their departed loved ones were projected on a viewing screen and a series of vocalists performed. Honor Guard escorts accompanied the family members to and from the altar as dedicational music was played.

On Sunday morning, the memorial service was held on the grounds of the academy. As guests arrived by bus, their assigned formal escorts positioned them to witness the Red Helmets Ride, an appropriately slow-moving parade of fire and other emergency services personnel on motorcycles paying their respects to the weekend's honorees.

The walk to the memorial service was lined with Honor Guard members representing scores of local, volunteer, state and federal fire services from throughout the country. As the families followed the promenade to the seating area, the 1,000-strong awesomely and impressively attired Honor Guard members greeted each family with slow, deliberate salutes.

A formal welcome and Presidential message was presented by Michael D. Brown, Under Secretary for Emergency Preparedness and Response of the Department of Homeland Security.

As the fallen firefighters' names and tributes were announced by an assembly of U.S. Senators, Representatives and other

Administration

Memorial Services continued

dignitaries, uniformed officials presented each family with a rose from the candlelight service and a flag that had flown over the memorial. Honor Guard members marched in formation to deliver the flags for the family presentation, accompanied by an impressive array of bagpipe and drum ensembles.

Steny H. Hoyer, U.S. Representative from Maryland, read a tribute submitted by the family of Ft. Apache firefighter Rick Lupe, who died in June 2003 of burns suffered on a prescribed fire in eastern Arizona's White Mountains.

"It was very emotional for me and my family when Representative Hoyer started reading that letter," Lupe's widow Evelyn explained. "But we held it together pretty well until the singer started 'I Believe' about angels watching over us. That's when our escorts and our whole delegation really let our feelings flow."

The Lupe family expressed their sincere appreciation to the Foundation, the Honor Guard and the massive network of individuals and groups that organized and carried out the memorial services. "We especially are grateful to our escorts, Ft. Apache Agency Superintendent Ben Nuvamsa and the family's liaison Wendell Peacock, for their constant ~ Wendell Peacock support and encouragement ever since Rick's accident," Evelyn Lupe said.

Family members of Ft. Apache firefighter Randall Bonito Jr. and contract helicopter pilot Jess Pearce, who lost their lives in a helicopter crash in July 2003, also extended their heartfelt gratitude for the organizers and the escorts assigned to the surviving family members.

A ceremony was held to dedicate the unveiling of the 2003 memorial plaque at the site. The plaque was the most current addition to those already in place, listing the men and women of the fire service who had given their lives in the past 23 years.

Constructed in 1981, the seven-foot-tall stone monument features a sculpted Maltese cross, at the base of which an eternal flame reflects the firefighter spirit. A stone and marble wall frames the Maltese cross-shaped stone walkway encircling the ring of plaques.

Contact: Wendell G. Peacock, Public Affairs Specialist, Bureau of Indian Affairs, Western Regional Office, Phoenix, Arizona, 602-379-6798 ext. 282, cell 602-228-8399



Fuels

Fuels Welcomes Mary Tabor



Mary Tabor

The Fuels Program welcomes Mary Taber to the BIA-NIFC staff as our new Fire Ecologist. Mary comes from the National Park Service where she was the Canyon District Ranger in Yellowstone National Park. She is from Grand Rapids, Michigan originally, and has worked in Yellowstone and Joshua Tree National Parks. She has a B.S. in Park and Recreation Resources from Michigan State University, and a Master of Natural Resources degree in Fire Ecology, Management and Technology from the University of Idaho. Mary also participates on Incident Management Teams as a Situation Unit Leader and Plans Section Chief trainee, and she spent a season on the Bitterroot Interagency Hotshot Crew in 2003.

After many years in multi-disciplinary positions with the NPS, Mary is looking forward to focusing her efforts on fire and its impact on the land. She will be coordinating the SCA/ FIREMON and LANDFIRE programs for the BIA, and representing the agency in smoke management and Wildland Fire Use interagency working groups. A great deal of her time will be spent coordinating and communicating with the four Regional Fire Ecologists, providing guidance and support on the NEPA process, monitoring protocols and national policy.

Mary's initial emphasis will be on the SCA/FIREMON program. This program is expanding, and has a great deal of potential to provide a costefficient method of measuring our effectiveness in fuels management, as well as providing a valuable natural resource-based work experience for young people interested in land management careers.

If you have questions about the FIREMON or LANDFIRE programs or other aspects of applied fire ecology, contact Mary Taber, BIA Fire Ecologist at (208) 387-5042 or by email at mary taber@nifc.gov.



Native Village of Chitina is in Third Year of Hazardous Fuels Reduction Project

~ Carrie Hale



CTIVC Hazardous Fuels Crew

The fire season of 2004 was the largest in the State of Alaska since 1950, burning a devastating 6.7 million acres. Large areas of the State have been infested with the Alaskan Spruce Bark Beetle, predominately in the Kenai Peninsula and the Copper River Region. Thousands of acres of White Spruce stands, once majestic are now dead and dying. These diseased trees intermixed with highly volatile Black Spruce, result in the perfect environment for catastrophic wildfire, especially in the spring before green up occurs when the tundra and annual grasses dry out.

Chitina is a town of approx. 189 residents. It sits in a beautiful setting of towering rock walls and small deep lakes, to the east the mighty Copper River is joined by the Kotsina and the Chitina Rivers. The beauty of our valley and safety of our residents has been compromised by the Alaskan Spruce Bark Beetle. Over 75% of our conifers are now dead, standing and fallen. The annual winds that keep us safe from the mosquito are just another element in the imminent fire danger facing our community. We are 66 miles from the nearest town of Glennallen and 60 miles from our Division of Forestry Regional Wildland Fire Suppression Station. Due to the distance and response times as well as available equipment, it is extremely important for our community to have fire breaks and defensible space.

Local Chitina Volunteer Fire Department Chief Dean Lenard, recognized the danger to our community, and working for (CTIVC) Chitina Traditional Indian Village Council (a federally recognized Tribe and the local governing body of Chitina) proposed to the Bureau of Indian affairs to start a Hazardous Fuels Reduction Project in and around our community.

Dean Lenard managed the project until the spring of 2006, when he handed it over to CTIVC's new Natural Resource Director, Carrie Hale. Since the spring of 2004 the Bureau of Indian Affairs has provided funding to Chitina Traditional Indian Village Council. In that time we have treated 90 acres around and in our community, greatly reducing the dead and diseased trees and brush and drastically reducing the risk of wildfire starts and spread. At a conservative estimate of 20 tons per acre we have removed 1800 tons of slash and debris. The high fuel loadings, tangled and intertwined trees as well as steep terrain, make it all the more difficult, however we feel that these are the areas that present the most risk to us. With additional funding this summer we hope to complete our project of securing our Wildland/Urban Interface Boundaries, and creating defensible space around all structures.

The CTIVC Fuels Reduction Crew is a ten to fifteen person Type II hand crew that also doubles as our local Copper River Type II fire suppression crew. Fuels are removed using chainsaws, hand tools and prescribed burns coordinated with the State of Alaska Division of Forestry.

We are very grateful to the Bureau of Indian affairs for their financial support in our endeavors, and would like to especially thank Regional Fire Management Officer, Steve Heppner and Regional Fuels Management Specialist, Larry Adams for their continual support and encouragement of our projects, and for all the extra efforts I know they have put in for us.

Project: Rattlesnake Ranch

~ Bob Gilrein - Spokane Agency FMO





Figure 1 Pre-Mechanized Treatment

Figure 2 Post-Mechanized Treatment

The goal of the project is for hazardous fuel reduction of old decedent stands of bitterbrush (Purshia tridentate) and thinning of coniferous forest within the identified location of the riverbreaks zone of the Spokane Indian Reservation over a three-year period. The project would have two benefits; reducing the potential of a large scale stand

Fuels

and/or habitat replacing fire along the riverbreaks area while also increasing the quality of wildlife habitat for big game. The project is located in an area of the Spokane's Wildlife Program has identified as critical mule deer winter range habitat.

In past years there have been numerous fires on the Spokane Indian Reservation within similar habitat types, as an example, Jackson Springs Fire, Two Rivers Fire, the Paddle Fire, and Switch Backs Fire. These fires were not only costly to fight but had caused adverse impacts on one source on income (timber) to the Tribe as well as destruction of wildlife habitat. With this hazardous fuels reduction project the Wildlife Department is hoping to reduce the fire intensity of a wildfire within the area and also protect, through manipulation, the habitat.

The proposed project area will consist of two phases, the Design and Implementation Phase that would consist of funding for personnel to layout the treatment units and the Contracting Phase through which the work will be completed.

The proposed project area will consist of approximately 1059 acres with 687 acres of treatment. We will use various types of treatment within the treatments within the treatment units to meet our objectives of reducing stem densities of both bitterbrush and coniferous trees. The Project is being proposed at a total cost of \$582,069. The Project will be completed over a three years time frame.

There are three different treatment units located within the project area and various treatment methods will be used within these treatments units. The four treatments types will consist of cut and chip, mechanical, lop and scatter, and prescribed burning.

Prescribed burning will be used in the third year on all treatment areas to help the Wildlife Department achieve the objectives of hazardous fuel reduction within the riverbreaks zone while attempting to increase the grass and forbs component by re-introducing native species through seeding.

To date mechanized treatments have accomplished 360 acres and prescribed burning has accomplished 75 acres of area treated. Lop and scatter treatments are planned for 162 acres to be accomplished for FY '06. Winterization of Model 52 Units

To prevent costly repairs to your Model 52 unit, it is fundamentally important that you know how to winterize the plumbing system. *The leading cause of plumbing breakage during winter is cold temperatures*.



Before Leaving Your Station

Check the following items on your model 52 unit and vehicle:

- □ Battery
- □ Antifreeze (EXTRA FOR PUMP)
- □ Wipers and windshield washer fluid
- □ Lights
- \Box Flashing hazard lights
- □ Exhaust system
- □ Heater
- □ Brakes
- □ Defroster
- □ Oil level (if necessary, replace existing oil with a winter grade oil or the SAE 10w/30)
- □ Maintain at least a half tank of gas during the winter season.

Winterization / storage of model 52 unit

Steps for storage:

Mix anti-freeze at 50:50 or 1 gallon of anti-freeze to 2 gallons of water. If there is an air fitting available pressurize the system with 50psi and open the valves ~ NW Model 52 Center, Missoula MT

slowly. Do this systematically for each valve.

- 1. Run fuel out of carburetor.
 - \Box a. start and run pump.
 - □ b. close fuel valve while motor is running
- 2. Vehicle should be parked, facing uphill. Let gravity drain tank and plumbing.
- 3. Open all valves, uncouple hose from reel and uncouple hose from reel and drain. Drain, with the nozzle removed.
- 4. Open petcocks on the pressure gauge and primer. Pull primer/ operate until the unit is water free.
- 5. Disconnect foot valve assembly and drain. Pour antifreeze mix into the foot valve and re-install.
- 6. Pour antifreeze into the hose connect on the reel and reinstall hard line hose.

Antifreeze should then be added through the access hole atop of the pump end keep all valves cracked open to allow the antifreeze to enter the valves. As soon as the antifreeze starts to drain out of the valves shut them. This will be done systematically and it will take approximately three gallons of 50/50 mix and anticipate about 30 minutes to completely winterize the entire plumbing system. The remainder of the antifreeze can be poured into the tank.

Bear in mind that automotive antifreeze is toxic. Always wear the proper eye and hand protection.

During an Assignment

If weather changes in your area during assignment

Leave your pump running. Keep the water circulating in the plumbing system during the operational period.

Fuels

When shift is over obtain antifreeze and follow the steps above.

When there is no anti-freeze available, then open all valves a little over halfway. Hand crank motor to remove most or all water from pump end.

Open petcocks located behind the pressure gauge.

After operating the primer to extract the residual water open the pet cock located at the bottom of the primer unit.

Remove the foot valve and drain all the H2O and re-install.

Drain hose reel

Residual Moisture in the system could freeze, preventing the valves from moving, but there should be no serious damage in result of using this system.

If this should happen this is a tip on how to become operational after a freeze-up:

- Hand crank pump to see if pump head is frozen (small amounts of anti freeze will prevent Hard Freeze). Pour hot water on the pump head to free up.
- 2) Pour boiling water on all the valves and move to operational positions.
- 3) If primer is hard to operate pour boiling water on the primer valve.
- 4) Check the foot valve. (thaw if necessary)

Move quickly to fill tank. Start pump and keep it running for recirculation.

BE AWARE: Storing a small amount of water in the tank during a hard freeze may damage the recirculation and gravity/fill valves.

For technical assistance, feel free to call the NW Model 52 Center in Missoula, MT at 406-829-6756 or your respective Model 52 center.

Jicarilla Apache Helitorch ~ Have Torch Will Travel



Helitorch crew from left to right; Gene Manwell, William Muniz, Walter Gomez, Elliot Vigil, and Carl Romnes. Not pictured; Andy Mora.

The first helitorch burn on the Jicarilla Apache Nation was conducted on October 9, 1991; the burn was called the Wirt Canyon Prescribed Burn. Fire Management Officer Carl Romnes was burn boss and a Forest Service Helitorch Module from the San Juan National Forest in Colorado was used on the burn. With the success of this wildlife habitat improvement burn, and with requests from the Jicarilla Apache nation Wildlife Department for more burns, Mr. Romnes saw the need for the Jicarilla Agency to start a helitorch module of its own.

The Agency acquired a Simplex 5000 helitorch in the spring of 1995. Training of the crew members began with the help of the San Juan National Forest. In the fall of 1995 the helitorch module participated in 3 burns on the reservation and the Black Horse burn on the Southern Ute Reservation. A module consists of a Helitorch Manager, Helitorch Mixmaster, and Helitorch Parking Tender as a minimum. Depending on the burn sometimes a Helitorch Crewmember is added to the module.

By 1997 more and more prescribed burns were being planned in the Southwest and Fire Managers fealized

Carl Romnes that aerial ignition was a method of ignition that could accomplish more acres. The Plastic Sphere Dispenser was a common method with a good number of qualified operators available. But in many of the Southwest's fuel types, managers could not get

the fire effects they wanted with this device. So interest grew in using the helitorch. With few helitorch modules available the Jicarilla Helitorch Module started to get considerable interagency business.

The first interaggency burn was the St. Francis burn on the Bitter Lakes National Wildlife Refuge in 1997. In 1998 the module was participating in the large and very complex



Wilderness West Prescribed burn on the Bitter Lakes National Wildlife Refuge, when the pilot accidentally punched off the full helitorch at 300 ft. and 45 knots. The crew managed to fix the helitorch in

a few hours but it stopped the burn, which had a large amount of resources committed to it. So via a subsidiary request in 1999 we acquired a second helitorch for situations such as this.

Carl Romnes is the BIA representative to the Interagency Aerial Ignition Working Group. This group produces the Interagency Aerial Ignition Guide. In 1999 the group decided that safety changes had to be made in the missing procedures and mixing equipment. The mixing crew was being over exposed to gasoline vapors. In conjunction with

Fuels





Helitorch and modular mixing system Big Bend National Park



Start of Santa Elena Canyon prescribed burn Big Bend National Park.

several vendors a closed mix transfer system was devised. The Interagency community was given until the end of 2001 to meake the conversion to the new systems. The Jicarilla module switched to the new system in the spring of 2001. Many agencies did not want to make this investment in new equipment. This produced even more interest in using the Jicarilla Module. The module now has 2-3 people qualified at each position. In 2003 the module worked with Missoula Technology and Development Center (MTDC) and OSHA on prescribed burns on the Gila National Forest. OSHA placed sensor badges on the module members while they worked. Results showed very low expose levels to the crew members from toxic chemicals while using this new mixing system. During these burns MTDC worked closely with the module, trying various gelling compounds and solutions looking for better practices for the future.

The module has participated in prescribed burns in New Mexico, Colorado, Arizona, Wyoming, Texas, and Nevada. They have also gone to wildfires in Montana and Colorado. These burns have been on Bureau of Indian Affairs, Bureau of Land Management, Forest Service, Fish and Wildlife Service, National Park Service, and Department of Defense lands. Twice the module has been on huge burns on the White Sands Missile Range in conjunction with San Andres National Wildlife Refuge. These burns were interesting because the module had to go through unexploded ordinance training before going on the White Sands Missile Range.

The latest burn the module worked on was the Santa Elena Canyon burn along the Rio Grande River in Big Bend National Park in June 2006. This burn was to remove salt cedar to allow for reintroduction of native species to the area. If this burn would have jumped the river it would have been burning in Mexico. During the burn the temperature reached 106 degrees, although slightly wilted the module crew members produced a good product and over 600 acres was burned in one day, completing the project.



Helitorch operating perfectly Santa Elena Canyon Big Bend National Park.

Cooperative Fuels Treatment Prioritization Project

The Coeur d'Alene Tribe has taken the lead in developing a cooperative project that includes two Counties, six Federal and two State land management agencies, and four major land owners within the reservation boundaries and Benewah County. Seven Tribal departments are also involved in the project. The objective of the project is to develop a method of prioritizing the hazard fuels reduction projects regardless of ownership so that the potential for catastrophic wildfire is reduced while the critical resource, cultural, and social values receive proper consideration. Once the prioritization is set then there will be an effort to seek funding through the various channels to address the highest priority sites first. Data on most of the structures in the study area has been collected previously though funding from the Idaho Department of Commerce and the National Fire Plan (BIA funding).

The project incorporates existing data where it is available and will try to project those values into the areas without data using remote sensing methodology. Since no current fuels inventory exists for most of the area, a series of data points linked to the continuous forest inventory data from the various owners was collected in the summer of 2004 and 2005 using the FIREMON protocol to gather this base data. This local data has been used to adjust the available satellite data (30 meter) to reflect current conditions. Using the high resolution orthophotography (1 meter) for the entire area and LiDAR coverage from the reservation, the project has projected fuel models and fire hazard for the entire study area.

The cooperators (over 17) met to develop the rating system for various social, cultural and natural resources to be used in prioritizing the treatment areas. The preliminary plan is expected to be completed by October 2006. During the creation of this initial plan several needs have been identified. The first of which is to obtain LiDAR coverage for the county portion of the study area in order to better project fuels loading and conditions. None of the existing models seem to do a good job of including the identified variables of this type of project. There is a need to develop an analysis tool that will better address the special, social and cultural needs this project has identified.

The first 1.5 years of this project was dedicated to acquiring the special data from the NAIP Imagery to the LiDAR and creating base maps with the existing data from the various collaborators in the group. The field acquisition of FIREMON data supplemented the existing spatial data and was used as training data for the remote sensing analysis to develop full coverage for the study area. With all the data in place a series of meetings and online review of products is expected to take about 8 months to finally arrive at a list of prioritized projects.

The key inputs identified by the group were, values at risk, fire ignition risk, and stand hazard risks. . For each

~ Erick Geisler - Fuels Forester Coeur D'Alene Tribe

input a rating scale was established and mapped for the group to review. By combining the inputs as layer coverages, it was possible to come up with a final prioritization. After several initial attempts the group was able to suggest ways to tweak the inputs to separate the combined hazard assessment. The maps presented here may not be the final priority the group settles on but we are getting closer with each iteration of the process. We may include overlays of FLAM MAP runs to assist in breaking some areas into smaller units for treatment recommendations.

The objective is to identify the highest needs for hazard fuel reduction for the entire area for a 10 year period and develop a process to define individual projects on an annual basis. By working from the highest priority down to the lowest we should be able to apply funds in a logical manner. This will become a dynamic tool where we can input the areas already treated or harvested to adjust the plans for future years. Although this will allow treatments to proceed in a priority order there is no guarantee that fires will occur in the order suggested.





Tribal Wildfire Resource Guide: Reducing Wildfire Risk and Increasing Opportunities for Tribes in Fire and Forest Management

~ Kathy Lynn, Resource Innovations - Institute for Sustainable Environment

Over the last twenty years, catastrophic fires of 100,000 acres or more have increased thirteenfold across the United States. ¹The necessity of providing fire protection services and implementing longterm restoration and hazardous fuels reduction efforts to restore fire-adapted ecosystems yields opportunities for tribal employment in the natural resources. There is a significant need for professionally qualified fire personnel. In 2001, the Intertribal Timber Council Symposium conducted a workshop on "Balancing Recruitment and Retirement among *Resource Professionals Within Indian* Country." This workshop examined the large portion of the current qualified workforce nearing retirement, and the future need for qualified professionals.

"Future Trends in Employment of Resource Professionals in Indian *Country*," an article presented at the 2001 Symposium, highlighted a retirement "binge" among BIA professionals, particularly in the field of natural resources.²The report summarizes findings from a 2000 study by the Brookings Institute called "Where Have All the Firefighters *Gone?*" that indicates that during the period studied, 60% of BIA firefighters were over the age of 40. ³ To identify whether or not an impending retirement binge existed, the article's authors surveyed resource agencies in Indian Country, primarily those working in forestry sectors. Survey results showed BIA staff closer to retirement and with more experience than tribal forestry organizations.

⁴Further underscoring the potential for a shortage in natural resource professionals, under the Federal Employee Retirement System eligible employees can retire at the age of 50 if they have accumulated at least 20 years of covered experience. ⁵Many Bureau of Indian Affairs firefighters may become eligible for this early retirement, which could result in opportunities for new professionals in firefighting and restoration.

Given the opportunities for tribal employment in fire and restoration, there is a need to develop training and curriculum focused on increasing tribes and tribal members' knowledge on fire protection and forest and landscape management. The opportunities to address these needs are illustrated in a new resource guide highlighted in this article.

In June 2006, the Intertribal Timber Council and Resource Innovations at the University of Oregon announced the release of the *Tribal Wildfire* **Resource Guide**; an important resource for tribes and agencies engaged in wildfire planning and management across the United States. The Tribal Wildfire Resource *Guide* provides tribes with a wealth of information on community fire planning, fire, forest, and natural resource policy, opportunities for economic development through fire management, and extensive grant information related to wildfire and forest management, business development, capacity building, and environmental and natural resource management.

The *Tribal Wildfire Resource Guide* also provides information to help forestry and land management

agencies better understand the role of consultation with tribes and the opportunities for cross-jurisdictional planning, as well as gain a greater understanding of tribal affairs, culture, and traditions. Case studies are also highlighted throughout the Guide to serve as current examples of wildfirerelated activities in Indian country. A unique partnership between the Intertribal Timber Council, Resource Innovations, and the Bureau of Indian Affairs, along with a tribal and interagency advisory group has resulted in the development of the Guide. The Confederated Salish and Kootenai Tribes contributed artwork and provided design services to complete the production of the Guide.

Why are these issues important?

Wildfire knows no boundaries. It strikes communities that are rich and poor, large and small, native and non native. The impact of recent catastrophic wildfires is exacerbated by the growth of the wildland-urban interface (WUI)⁶, which is fueled by population growth, urban expansion, land-management decisions, and

⁴ Ibid.

⁵ Gilmore, Michael, June 2006. Firefighter Retirement, Smoke Signals, Volume 2,

¹ National Interagency Fire Center, http://www. nifc.gov

² Blomstrom, Greg and Ladwig, Jim, June 2001. *Future Trends in Employment of Resource Professionals in Indian Country*. Final Proceedings, 2001 National Indian Timber Symposium

³ Ibid.

⁶ The National Fire Plan defines the WUI as "The line, area, or zone where structures and other human development meet or intermingle with undeveloped wildland or vegetative fuels"

Operations

the preference of homeowners to be closer to the natural environment. The expansion of the WUI and the cumulative effects of federal fire-suppression policy have made thousands of communities across the United States at risk to wildfire.

Wildfire may have a more severe impact on communities in Indian country for several reasons. These include limited wildland and structural fire-protection capability, lack of community awareness of fireprotection and prevention measures, limited funding to establish and maintain structural and wildland-fire programs and services, lack of or limited control of land-management practices adjacent to trust lands (especially on reservations with checkerboard land-ownership patterns), and/or more relaxed fire and building code standards. Some or all of these factors may pose severe consequences for tribes in the event of a wildland fire. Wildland fire has cost and will continue to cost many tribes important natural and cultural resources, infrastructure, and community members. Such losses may threaten the social and economic stability of many tribes.

Recent changes in federal policy provide tribes with opportunities to protect tribal resources from wildland fire, incorporate traditional ecological knowledge into land-management practices, and pursue innovative economic development opportunities through fire management. Tribes also have an opportunity to collaborate with local, state, and federal agencies to implement fire-protection measures and create plans that integrate tribal traditions and values into the fireplanning process.

This guide aims to assist tribes in the local fire-planning process through the provision of up-to-date policy and grant information, a tribal-oriented framework for community wildfire protection plans, existing economic development opportunities through fire management, and additional technical assistance resources. The guide also provides information to help agencies better understand the role of consultation with tribes and the opportunities for cross-jurisdictional planning, as well as to gain a greater understanding of tribal affairs, culture, and traditions. Case studies highlighted throughout the guide serve as examples of wildfire management-related work across Indian country.

Intended Audience

Audiences for the Tribal Wildfire Resource Guide include:

- Tribal government: tribal council and committees;
- Tribal departments: forestry, fire management, natural resources, community development, emergency management, cultural resources;
- Tribal enterprises
- Local jurisdictions that may work or coordinate with tribes; and
- Federal, state, and agencies that consult and collaborate with tribes to implement fire-protection measures.

Where to find the Guide

The Guide was officially released at the June 2006 ITC Symposium in Fairbanks, Alaska and is available on an interactive CD or in hard-copy form. For more information, please visit the Intertribal Timber Council web site at http://www.itcnet.org or Resource Innovations at http://www.itcnet.org or Resource Innovations at http://tribalwildfireguide.html. To request a CD or a hard copy, email kathy@uoregon.edu or call 541-346-0687.



Fire Season

The summer of 2006 brought another challenging fire season to the Eastern **Oklahoma and Southern Plains** Regions in Oklahoma. Following record breaking fall and winter fire seasons in 2005-2006, fire managers became concerned once again after field reviews and predictive services confirmed drought conditions for much of the state. In response to the growing concern of tribal officials and rural fire departments, both regions increased staffing levels beginning the first week of July. The south and west portions of Oklahoma were the areas of most concern due to the high fire indices.



The Prairie Road fire was just one of many wildland-urban interface fires that occurred in Oklahoma this year

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2006 Oklahoma Fires

Fire Occurrence

 Table 1. Number of fires and acres for Eastern Oklahoma and Southern Plains Regions during July, August and September, 2006

July 4, 2006 – September 14, 2006			
BIA Region	# of Wildfires	Trust Acres	*Other Acres
Eastern Oklahoma Southern Plains	214 64	127.55 513.00	9,037.95 1,349.70
TOTAL	278	640.55	10,387.65

*Other Acres refers to acres of non-trust land burned.



The Honey Creek fire burned nearly 500 acres, including Trust land in Okmulgee County

Suppression Resources

Following the suppression of numerous wildfires during the month of July, both regions decided to bring in additional suppression resources under severity funding received. The Southern Plains Region pre-positioned additional resources at various agency and tribal locations in Western Oklahoma. In order to centralize their operations functions the Eastern Oklahoma Region established an Incident Command Post in Ardmore, Oklahoma on July 20th. During recent fire sieges this location proved capable of supporting a large number of suppression resources, including aircraft. Choosing Ardmore also allowed a rapid response to any fires occurring in the Arbuckle Mountains, which is an area of extreme concern due to a history of devastating wildland-urban interface fires. During the peak of the operation both regions supported the following 'non-local' resources:

- 18 Miscellaneous Overhead
- 18 Type 6 Engines
- 06 Type 2 Dozers
- 02 Type 3 Airtankers (SEATs)
- 01 Air Attack Platform

In an interagency effort the Southern Region also established the Portable Airtanker Base in Ardmore to support wildland fires in Texas and Oklahoma.

Safety First, Last, and Always

Since a majority of Oklahoma's wildfires occur in the wildland-urban interface, it takes a collaborative effort between the Bureau of Indian Affairs and rural/volunteer fire departments to ensure safe and effective firefighting tactics are employed. Thanks to the experience and expertise of our local fire personnel, the Eastern Oklahoma and Southern Plains Regions reported no major injuries during the summer fire siege. This occurred on nearly three-hundred wildfires over a twoand-a-half month period.

"What the mind of man can conceive and believe, the mind of man can achieve."



A Dose of Prevention Wildfire Prevention Programs in Minnesota Are Working Together to Break New Ground Addressing The Protection of Tribal Wildland/Urban Interface Communities

Human caused fires account for the vast majority of fires in Minnesota. These fires, often started by careless residents, children or arsonists, end up costing thousands of dollars each year. The Bureau of Indian Affairs recognized early on that one way to address our ever shrinking budgets would be to try to reduce our suppression costs by decreasing the number of fire starts each year. While there is little we can do to influence natural starts, fire prevention activities can have a dramatic impact on human caused fires. By educating and empowering residents to take responsibility for their actions and safety, fire prevention activities can help to protect lives, communities and precious resources.

Tribes throughout Minnesota recognized the importance of addressing fire prevention and committed to the process early on with the help of the Bureau of Indian Affairs Regional Fire Prevention Forester, Gary Hilton. In 2003 the Red Lake Tribe became the first Tribe in the U.S. to submit a Wildland Fire Prevention Plan. The plan outlined the Reservation's fire history, community values, communities at risk and a comprehensive plan for addressing the root causes of fire setting in the Red Lake community with the goal of reducing fire starts by 10% over the life of the plan. After a careful review of the plan, the Tribe received funding from the BIA for one fulltime fire prevention specialist and one part-time fire prevention technician in 2004. Mike Beaulieu and Michelle Reynolds have been working in these positions for two years and the results of their motivation and dedication

are beginning to be seen. Reaching out to the young people of Red Lake has been a major focus for the pair, who hope to help youth recognize the importance of protecting their natural resources. Mike and Michelle are meeting this goal by conducting school presentations, attending community events, and sharing fire prevention messages through their local media. One very special project has been the development of a Smokey Bear trash bag that presents Smokey's message in English on one side and in Ojibwe on the other. Another project they are very proud of is the trailer they call "Smokey's Den". This 12 ft. enclosed trailer allows them to transport and display their prevention materials at public events. Mike and Michelle worked hard to obtain permission to adorn the sides of the trailer with several Wendelin Smokey Bear prints. Also in 2003, the Fond du Lac Band



Fond du Lac Firewise Recognition

of Lake Superior Chippewa received recognition as the first Firewise Reservation in the United States. This recognition was achieved with the assistance of the BIA Regional Fire Prevention Forester, Gary Hilton and a group of volunteer interns from the Student Conservation Association Fire Education Corps. The most important contribution came from the Fond du Lac Forestry staff and

the residents of the Fond du Lac Reservation who provided the energy and workforce for the Firewise projects. An extensive program of public education and outreach led to the development of a community Firewise Board and the completion of home fire risk assessments on all of the Tribal homes within the boundaries of the Reservation. These home assessments helped to identify future fuels reduction projects that are completed by the Fond du Lac Forestry staff with assistance from the BIA Fuels Management Program. One of the most exciting developments to emerge from the Firewise project was the development of a close partnership between the Fond du Lac Planning, Housing, Construction and Forestry departments. With an ever-increasing demand for Tribal homes, new housing developments are now evaluated for their fire safety and receive Firewise fuels treatments before the homes are built. Fond du Lac has maintained their Firewise status through 2005 and will be renewing again in 2006.

Another fire prevention development that deserves note was the writing of a cooperative Minnesota Agency Wildland Fire Prevention Plan. This plan includes six reservations located throughout Minnesota: Bois Forte, Fond du Lac, Grand Portage, Leech Lake, Mille Lacs and White Earth. The five-year plan was written in 2004 and approved in 2005. By working together the six reservations have been able to identify funding for full or partial prevention positions at each reservation and have begun a comprehensive program of community prevention education. Prevention staff from each Reservation meet quarterly

~ Daria Day

Prevention

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Smokey Bear visits Fond du Lac Ojibwe School

to share information, ideas and training. This cooperative approach allows the whole to be greater than the parts by utilizing the unique talents and different focuses of each Reservation. Bois Forte has created new prevention signage to help alert band members to changing fire danger levels. Fond du Lac continues its Firewise development fuels reduction projects, while Grand Portage has completed almost all of the home assessments on the Reservation and has been working collaboratively with the nearby Cook Co. Firewise Committee, Leech Lake Conservation Officer Jamie Mitchell's efforts in fire investigation helped to lead to a first degree felony arson conviction.

Jamie's consistent presence, investigation and ticketing has helped to reduce the number of fire starts on the Leech Lake Reservation. Mille Lacs Reservation, which has three geographically separate districts, is addressing community education through a focused media campaign in the Tribal paper and working with the local Headstart programs. The White Earth Reservation, which has the highest fire occurrence of the six Reservations, now has a full time Fire Prevention Technician, Brad Estey, who has been reaching out to children on the Reservation through events like the White Earth Equipment Day. Students from area schools are invited to have a hands-on learning experience about fire fighting and hear fire prevention messages from the firefighters themselves. Brad will be teaming up with the Student Conservation Association to help design and implement an outreach program to develop community support and direction for conducting home assessments and addressing community hazard reduction needs.



White Earth Equipment Day 06



The success of all of these fledgling programs will be directly related to their ability to connect with the communities they serve. This relationship will be based on trust and consistency and will not be built overnight. One of the challenges fire prevention personnel see is the possibility that it will take 5 to 10 years or more to truly see a change in the cultural perception of fire and fire use in the people they serve. It is the sincere hope of all of the fire prevention personnel that they will be able to continue to devote their energy to nurturing the fire safety and awareness of their communities into the future.

"The first and best victory is to conquer self."

Mille Lacs Headstart

Prevention

BIA Develops the Next Level of Wildland fire Prevention Training

~ Mallory Eils

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The BIA is defining a new strategy in agency-specific training techniques with its Fire Prevention Academy. This course is split into three one-week tracks that cover an array of fire prevention materials applicable to the novice as well as the more advanced course participants. The goal of the Academy is to go above and beyond what other prevention trainings provide by equipping the students with more than standardized course instruction A few of the areas addressed include training in agency-specific matters such as tribal policies, laws and ordinances; and cultural awareness. Communication skills training, arson investigation, hazard assessment training, and planning and fire prevention tools are other key topics the Academy covers. Pat Durland, the now retired Department of the Interior's National Program Leader for Wildland/Urban Fire and Wildland Fire Prevention and Fire Education, praised the course saying, "The BIA training went beyond the successes I have seen in agency-designed wildland fire prevention training! They have chosen to act rather than wait, and to lead rather than follow."

The first two tracks of this year's inaugural Academy have already been completed with the third track taking place in early June. Approximately thirty participants from across the country attended each of the trainings, which were



Communication Skills Training with Dr. Joe Trahan.

hosted by the Mount Tolman Fire Center of the Colville Indian Reservation. Participation was not limited to BIA or tribal employees, but was open to anyone who works within the realm of fire prevention. Most participants were from the BIA; however other National, State, and local agencies were represented.

Many students of this course, and many fire prevention personnel in general, were at one time wildland firefighters. BIA's Prevention Academy is leading the way as a good first step in bridging the gap between a reactive and a proactive approach to wildland fire. For many participants, this was the first formal training they had received in fire prevention. By combining concepts from a standardized course with the specific needs of an agency and the course participants, this course very effective at reaching the participants

on their level. The incorporation of cultural awareness segments into the training allowed for the opportunity to see how fire prevention can be successfully implemented in Indian Country. Feedback from the attendees revealed that courses of this caliber are needed, welcomed, and very effective.



"Every job is a self-portrait of the person who did it. Autograph your work with excellence!"

Winston Churchill

From the Publishers

We apologize for the lateness of this issue due to the severity of this year's fire season.

Thanks again to all of you who submitted articles and photographs and, thanks to our readers! Keep up the great work!

When submitting articles, please include the author's name. Photographs should be taken at the highest resolution possible. The article submission deadline for "Smoke Signals" is as follows:

> March 1 June 1 September 1 December 1

If you've submitted an article and don't see it right away, look for it in the next issue.

Please route this publication to your staff. If you need additional copies for your staff, or need copies sent to ~ Dave Koch and Laurel Simos an another address please contact us. We'd like to hear from you about your summer successes.

We're happy to edit your submissions for you! Keep the articles and high resolution photographs coming in!

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