US FISH AND WILDLIFE ELKO FIRE STORM 1964 NARRATIVE ELKO FIRE STORM AND FIRE REHAB

The narrator is telling a story about the fire season in Elko District, Nevada in 1964. The narrator was showing slides or photos of the fire and damage, talks about where the fires were, how they happened, and the cooperation of various federal and state agencies such as the Bureau of Land Management, Forest Service, Nevada National Guard, and many more. He/she explains the efforts of trying to contain and put out the fires and the rehabilitation afterwards.

Keywords: Elko District, Nevada; Bureau of Land Management; Forest Service; Nevada National Guard; fire; Palisade and The Boulder Maggie Complex; rehabilitation operation; State Director J. R. Penny

...to date. This is the story of that fire season the huge rehabilitation project initiated by the Bureau of Land Management to lessen the impact of the fires on the resources and on the users of the resources in the Elko district.

A combination of three wet growing seasons had produced an abundant growth of vegetation. This meant dry grass was carried over from 1962 and 1963 in addition to the lush growth of 1964. Cheat grass, an annual belonging to the broam [sic] family was thick and tall where it had invaded old burns. And also in between perennial plants in areas where is rarely occurs. Sandburg Bluegrass, which usually grows to six or eight inches reached heights of eighteen to twenty-four inches. The fire areas were mostly covered with grass and sagebrush. However some Pinion Juniper and Aspen draws, and mountain brush, including plants such a Bitterbrush and Serviceberry also burned. Wet whether lasted until about June 25. Over night the temperatures went up and the humidity went down. Stronger than normal winds extended into the night. The first fire of any consequence was June 27, and by the first week in July, it was obvious that the district was in for a tough fire season. Scenes like this were every day occurrences. Most were man-caused. For instance, here is a seven thousand acre fire that started from an exploding stove at a roadside rest. The anonymous tourist departed for parts unknown.

Here is the three thousand, five hundred acre aftermath of a summer afternoon wiener roast in a cheat grass draw. The children fortunately were not injured. Here is a forty-five thousand acre fire that started from a mining camp trash barrel that was being burned in the mid afternoon on a hot, windy July day. By August 15, we had taken action on seventy-five fires, which had burned over sixty-five thousand acres. But the worst was yet to come. All of the conditions were right for a conflagration. On August 15 a dry lightening storm crossed the district starting over thirty fires. This map shows the concentration of lightening strikes indicted here by the small red darts. At least sixteen of these fires were suppressed that night by BLM, State of Nevada, and rancher

crews. The others continued burning forming six fires or fire complexes. Sunday, August 16 was rough. The fire complexes were burning out of control. Firefighters, overhead teams, and equipment were moved in from all over the west. By Monday morning, August 17 there were twelve hundred firefighters on the line. Fire bosses reported that control could be expected that day. About 11:30 that morning the roof started to fall in. A man-caused fire erupted three miles northeast of Elko and a sleeper from a lightening storm, which had smoldered in a Juniper tree, took off six miles southwest of Elko. Almost simultaneously blowups were reported from all fires. Our firefighting resources were extended to the limit. The Forest Service also had a large fire out of control near the Idaho border. Burning conditions were explosive. Fire vehicles were starting fires from the exhaust systems. Every resource available was thrown into the fight. A thousand more firefighters were ordered, along with more overhead and equipment. The fires ran all that night and into the next day when all were contained except the Boulder fire. The Boulder made a final run Tuesday evening and was finally brought under control early Wednesday, August 19.

The burning conditions were as extreme as most of the firefighters have ever coped with. Gusty, changing winds made firefighting extremely hazardous. These slides show daily spreads on two of the fire complexes; Palisade and The Boulder Maggie complex. The north tip of Boulder Maggie, for instance, show here in light green resulted from a twister that spread the fire four or five miles in fifteen minutes on a narrow front. Every suppression method available was put into action. Including, men and hand tools, pumper trucks, crawler tractors. The air operation looked like something out of a Latin American revolution. A news wire article indicated that more traffic was run out of the Elko airport on Tuesday, August 18 than from Los Angeles International Airport the same day. The slurry mixing plant at Elko was kept busy from dawn to dusk. During Elko district changed from bentinite slurry to fire trall and ammonium phosphate compound. These slides show converted TBMs dropping slurry on one of the fires. Helicopters were used both for surveillance and to transport men and supplies. One or more fire camps were established for each fire complex. Keeping food and supplies rolling to all of the camps on time was a real problem. Over two thousand Indians and Spanish American firefighters in twenty-five man crews were brought to Elko. To handle them in town, a staging area was set up on the High School football field. They were transported to and from Elko by airplane. From Elko to the fires, school buses, commercial buses and trucks were used. Patrolling took place around the clock after the fires were controlled. Administrative personnel from other BLM offices and other agencies assisted with pay rolling and contract payments. Makeshift offices were set up as space allowed. When it was all over two hundred and twenty-five thousand acres had burned in less than a week. During the season, over three hundred thousand acres had burned. This is the result of those fires, burned over land as far as you can see. Losses were extensive. In livestock over one hundred were dead, and at least that many injured. Forty-five miles of fence were burned. Firefighting equipment was lost. Soil was denuded and exposed to the erosive forces of wind and water. While the last smokes from the firestorm were being put out a plan to rehabilitate a large acreage was being hurriedly prepared. Arrangements were made for the Nevada Air Guard to make aerial photographs of the fire areas. Inventories of damage and surveys of potential

rehabilitation projects were made by a team of technicians who converged on Elko from Bureau offices all over the west. State Director J. R. Penny, and his staff made a pitch to our Washington office. Our Washington office staff made a successful appeal to Congress for authorization and the rehabilitation operation was launched. Here employees are laying out panels to mark section corners, to help in identifying land ownership. Projects were laid out. Cooperative agreements were arranged with range users and private landowners. District and State office personnel arranged to buy, beg or borrow equipment. They prepared contract requests for work, equipment, and seed. Rangeland drills were borrowed from other BLM districts, from the Forest Service and the Bureau of Indian Affairs. They came from as far away as Phoenix and Albuquerque and as near the BIA warehouse, next to our yard. Prospective contractors were shown project areas. Large amounts of seeding equipment were needed. All tractors and grain drills were contracted. This slide shows contracted tractors and grain drills in operation. This shows a contractor using his own tractors with rangeland drills provided by the Bureau of Land Management. Forty-eight thousand acres of Federal land and twenty thousand acres of private land, the latter at private cost were drilled to wheat grasses. Twelve thousand acres of Federal land were broadcast aerially with a mixture of several grasses and legumes. Here is the loading and mixing operation. This shows the seed after it was broadcast. Sixteen thousand acres were ribbed on the contour to a depth of eighteen to twenty-four inches. A mixture of Bitterbrush and other desirable deer food species was seeded on approximately three thousand acres. Special brose seeders were used for this operaton. This is one of the largest brose seedings yet attempted. Twentyfive detention dams containing over two hundred and fifty-five thousand cubic yards of earth and scattered through each fire complex were constructed. Compaction testing was done to measure the volume of sample of compacted fill in the dams. These dams are designed primarily to retard runoff and store silt and debris. Little or no storage is contemplated. The result of this rehabilitation program was quickly apparent. Contour ribbing paid off by quickly stabilizing denuded slopes. This practice was new to the Bureau on this scale and as a burned area remedy. Water was prevented from running off rapidly. Water was stored in the plant root zone, and percolated into the subsurface water channels. Above average precipitation produced an excellent stand of grass where seed was drilled into the ground. These pictures show crested wheat grass in the Rodeo Creek seeding. This area was also contour ripped. These are scenes from an area broadcast with grass and legumes. This slides show intermediate wheat grass and clover. This shows cereal rye, intermediate wheat grass, and clover. This is Ladeck Alfalfa. The first results from the brouse seeding indicate that we got a very good stand of Bitterbrush and other big game forage species. The water detention structures were completed just in time to check heavy run off from summer thundershowers, twenty-three of the twentyfive caught run off this first season. Silt that would have been carried downstream was deposited. The water ran off over an extended period rather than as a flash flood. The debris shown here was as a result of heavy rains on a part of the burn that we were not able to treat. About one third of the burned area was treated with one or more conservation practices. This was at a cost of about one million, three hundred thousand dollars. This project represents about five times the regular Elko district conservation program. In other words, the project accomplished in one year what normally would have taken five years under our regular appropriation. It was accomplished only through

the cooperation of many people and many agencies. Above all, the damage done by the fires has been partially repaired and the burned areas will soon be contributing their share of needed resources.