

YELLOWSTONE BIRD REPORT 2001



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Yellowstone Center for Resources
National Park Service
Yellowstone National Park, Wyoming

YCR-NR-2002-03

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*Cover and title page drawings: One of the many benefits of being married to a talented artist and a giving person is having access to original art. Special thanks go to my wife, Karen McEneaney, for permission to print her wonderful pencil drawings of a Bald Eagle (*Haliaeetus leucocephalus*) skull and a Common Raven (*Corvus corax*) skull. Both species are members of a guild of birdlife adapted to a dual life of predator and scavenger, depending on the time of year and food availability.*

The photographs in this report are courtesy of Terry McEneaney.

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Mountain Chickadee.

INTRODUCTION

This report summarizes Yellowstone National Park (YNP) bird information. The report started as a quarterly publication, and then in 1996 it became an annual report summarizing all results and activities that occurred within the calendar year. Information found in this publication is also referenced in the Superintendent's and the YCR annual reports, and provides valuable information for the Yellowstone historical record and interested public.

WEATHER PATTERNS AND SUMMARY

Milder-than-normal weather conditions ended the 20th century and started off the 21st century, causing a below-average snow pack in Yellowstone. Below-average precipitation and above-average temperatures continued through the spring, summer, and fall. Yellowstone Lake continued a trend of thawing out early (Figure 1). Snow runoff was uneventful, vegetative conditions very dry, and precipitation episodes rare, resulting in drought conditions. Water levels in the park were even lower than last year. The hardest hit and most noticeable areas were the Yellowstone River, Yellowstone Lake, the northern range, and the Bechler area. In the fall, many small ponds that typically hold water were either completely or almost dry.

Seasons in Yellowstone are highly variable, but the summer of 2001 was relatively warm and dry, particularly at high elevations. There were a fair amount of lightning strikes; therefore, wildfire reports were normal, but the park was spared any major fires due to small amounts of precipitation that fell at critical times. The fall, on the other hand, was quite dry, windy, and warm. By late fall and early winter, precipitation was slow in coming, leaving very little snow on the high peaks. Large numbers of elk remained in the park until late November, when the first major snows came. Bouts of thawing and freezing continued throughout the month of December.

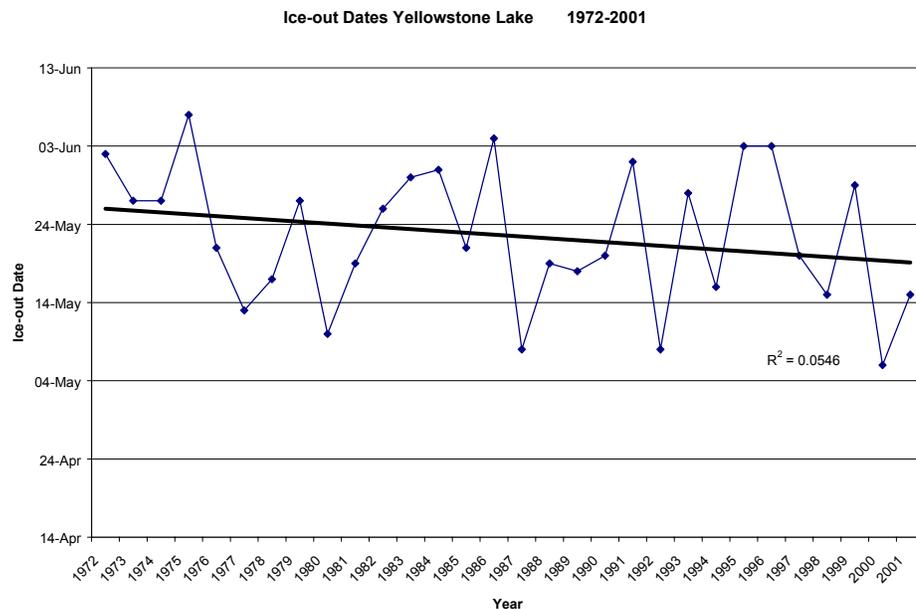


Figure 1. Data courtesy Phil Farnes.

THREATENED AND ENDANGERED SPECIES

BALD EAGLE

In 1995, the U.S. Fish and Wildlife Service downlisted the Bald Eagle from endangered to threatened due to significant population gains made over the last three decades. Certain specific populations, however, are not completely recovered due to heavy metal contamination problems in the Great Lakes region, and habitat encroachment and development problems associated with riparian zones in the desert southwest.

In Yellowstone, a total of 15 eaglets fledged from 31 active nests during 2001 (Figure 2). The Yellowstone Bald Eagle population continues to incrementally increase, and new nests are appearing in unexpected places. This year was no exception, with four new Bald Eagle nests located in the park. Nest substrate instability, as a result of the 1988 Yellowstone wildfires, caused minimal problems this year for nesting pairs. However, in the next couple of decades we expect large numbers of trees to topple to the ground, which will undoubtedly result in nest failure, loss of nest sites, or sudden changes in location of a nesting territory. Although Bald Eagles have occasionally been documented taking over previously occupied Osprey nests, the incidence of takeover appears to be gradually increasing due to competition for nest sites.

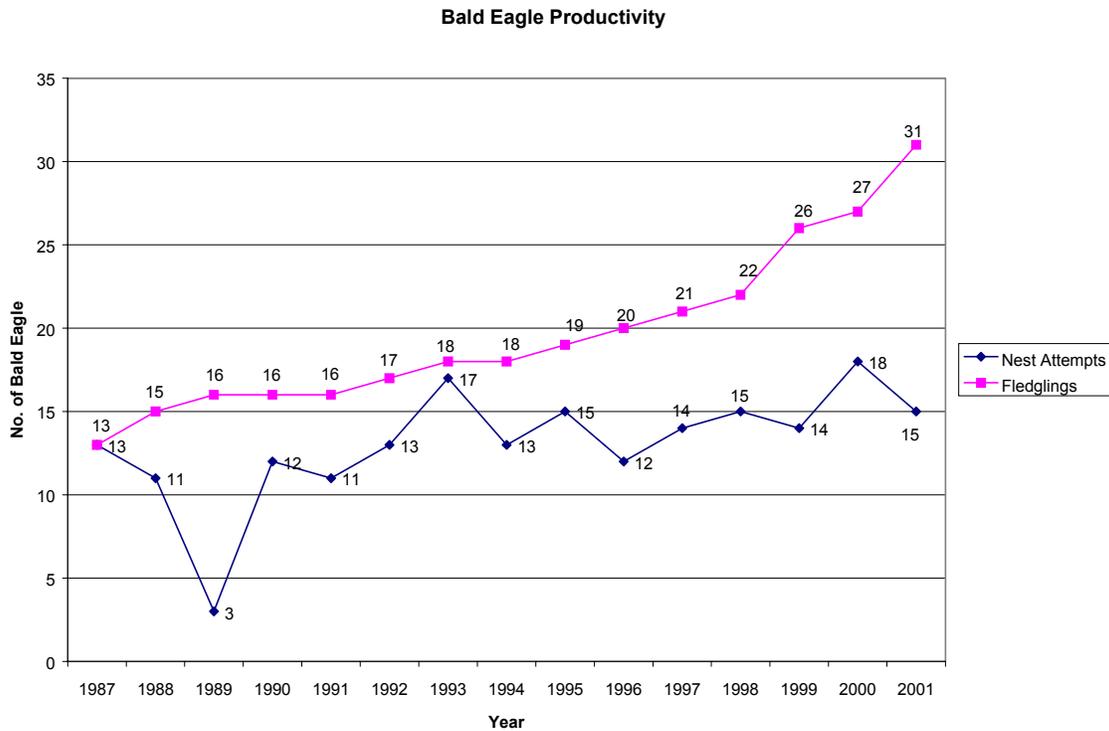


Figure 2.

WHOOPING CRANE

The Whooping Crane is currently classified as an endangered species. The worldwide population consists of both wild and captive populations. This endemic North American species continues to rank as the rarest and most endangered crane in the world. Population figures as of 2001 placed the wild population at 277 cranes and the captive population at 121 cranes, for a total world population numbering 398 Whooping Cranes. (Table 1, Figure 3).

TABLE 1. 2001 WILD AND EXPERIMENTAL WHOOPING CRANE POPULATIONS

WILD POPULATIONS

Area	Adults	Young	Total
Aransas/Wood Buffalo NP	160	14	174
Rocky Mountain	1	0	1
Florida: Non-Migratory	85	12	97
Wisconsin/Florida: Migratory	0	5	5
Subtotal in the wild	246	31	277

CAPTIVE POPULATIONS

Area	Adults	Young	Total	Breeding Pairs
Patuxent WRC, MD	53	8	61	10
International Crane Foundation, WI	28	0	28	5
Devonian WCC/Calgary, Alberta, Can.	18	0	18	3
Calgary Zoo, Alberta, Canada	1	0	1	0
San Antonio Zoological Gardens, TX	6	0	6	2
Lowery Park Zoo, Tampa, FL	1	0	1	0
ACRES, New Orleans, LA	4	0	4	0
New Orleans Zoo, LA	0	2	2	0
Subtotal in captivity	111	10	121	20

Total (wild and captive)

398

Figure 3. Worldwide Whooping Crane Population

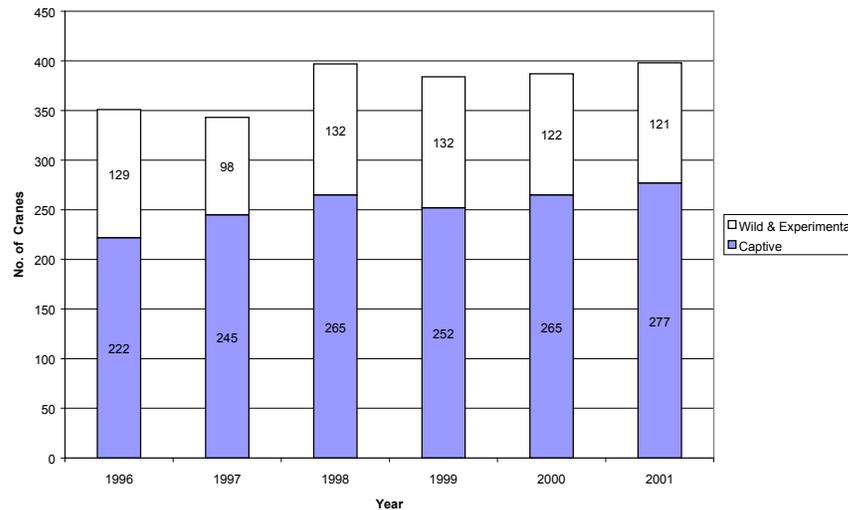


Figure 3.

A cross-fostering experiment to create a new migratory flock of Whooping Cranes took place in the Rocky Mountains in 1975. Under the direction of the U.S. Fish and Wildlife Service, researcher Rod Drewien transported Whooping Crane eggs from Wood Buffalo National Park in Alberta, Canada, and placed them under incubating Sandhill Cranes on Gray's Lake National Wildlife Refuge in Idaho. The main focus of the cross-fostering experiment was to have Sandhill Crane adults hatch and raise Whooping Crane young, thus leading immature Whooping Cranes on migration to a Sandhill Crane winter safehaven known as Bosque del Apache National Wildlife Refuge in New Mexico.

Initially, the cross-fostering experiment showed promise, but eventually problems began to develop. Of particular concern were high crane mortality and Whooping Crane mating behavioral problems associated with the experiment. However, a significant amount of valuable information was gained as a result of this study. A total of 289 eggs were removed from the wild for this experiment, which resulted in the Rocky Mountain Whooping Crane population reaching a peak of 35 subadults and adults in 1985. As of 1999, only two adults survived from the original experiment, and they resided within the greater Yellowstone. These birds were not paired. One bird had resided in a remote area of YNP for many years, and the other frequented the Centennial Valley of Montana.

In addition, the YNP bird program had been monitoring a "sandhill-whooper" hybrid since it was discovered in 1992. The bird was frequently seen with a Sandhill Crane. However, this crane could not be located during the 1999 field season and presumably died on the wintering grounds. This bird had significant scientific value, since it would have allowed us an opportunity to determine whether it could be reproduce successfully in the wild. This important piece of information could have assisted Whooping Crane recovery efforts in the future. However, these hopes faded with the death of this crane.

Another Whooping Crane management experiment occurred in the Rocky Mountains in 1997–1998 that had a bearing on YNP. Four young Whooping Cranes raised in captivity at Patuxent Wildlife Research Center in Maryland were transported to a ranch in eastern Idaho as part of an experiment to learn how to establish a new migratory flock of Whooping Cranes in North America. The birds were trained to follow an ultralight aircraft. In the autumn of 1997, these cranes traveled from eastern Idaho to Bosque del Apache National Wildlife Refuge in New Mexico following the aircraft. Two of the cranes were killed by predators on the wintering grounds. The two remaining "ultralight" cranes began their spring travels north on March 5, 1998, staging for a month in the San Luis Valley of Colorado. Once moving again, the birds had problems with fences and powerlines. Collisions with wires continues to be the greatest cause of mortality for immature Whooping Cranes. Therefore, these cranes were quickly recaptured and released into a safer environment in YNP.

In May 1998, the two ultralight Whooping Cranes were released in the Slough Creek area of the park. This area proved to be troublesome. Large numbers of visitors were coming in close contact with the birds, creating further imprinting problems. Later that summer, an effort was made to recapture the cranes, but only one "ultralight" bird was caught and transported to a remote area of the park. The other crane remained in the vicinity of Slough Creek, until it migrated out of the area that fall. Both ultralight birds returned to the wintering grounds in the fall of 1998. Then in the spring of 1999, one bird died in northern Utah of undetermined causes, leaving a lone ultralight survivor residing in eastern Idaho for the summer. In 1999, all that remained in the greater Yellowstone were two Whooping Cranes: one from the Gray's Lake experiment, and one from the ultralight experiment.

Rocky Mountain Whooping Cranes have had a history of being plagued by powerlines. In the *Yellowstone Bird Report 2000*, we reported more disappointing news. On March 15, 2000, YNP lost its famed 16-year-old female Whooping Crane (from the Gray's Lake experiment) when it collided with a powerline at Monte Vista National Wildlife Refuge in Colorado. This bird was YNP's best hope, since it was the only wild Rocky Mountain Whooping Crane to build a platform nest. The carcass of this crane was salvaged and currently resides in the YNP museum scientific collection. As of 2000, all that remained were two Whooping Cranes in the Rocky Mountains: one crane surviving from the original Gray's Lake experiment that summered in the Centennial Valley of Montana, and one ultralight crane resided in eastern Idaho.

In the greater Yellowstone and Rocky Mountains, only one Whooping Crane remains alive. The ultralight whooping crane was last seen on September 6, 2001, near China Hat, a geologic formation located 15 miles north of Soda Springs, Idaho, where it had been spending the last few summers. This bird was not found in the fall in the San Luis Valley of Colorado during fall migration, nor in the Rio Grande Valley of New Mexico (two winter concentration areas for cranes). The Whooping Crane Recovery Team has classified this missing ultralight bird as a mortality of a four-year-old, unless new information to the contrary surfaces. The lone surviving Whooping Crane in the Rocky Mountains continues to summer in the Centennial Valley of Montana.



Whooping Crane.

SPECIES OF SPECIAL CONCERN

PEREGRINE FALCON

On August 26, 1999, the Peregrine Falcon was delisted, or removed, from the list of threatened and endangered species. Under provisions afforded by the Endangered Species Act, even though this species is no longer listed as endangered, YNP plans to monitor peregrines closely for five years post-listing (until 2004) to ensure its recovery.



The Peregrine Falcon is now managed in Yellowstone as a species of special concern. YNP continues to be a stronghold for peregrines in the northern Rockies. No new eyries were found in 2001, which leaves the total number of peregrine eyries at 16. This remains the most peregrine eyries ever recorded in Yellowstone National Park. Additionally, 31 young fledged from these eyries, which is also a record production for YNP (Figure 4).

Monitoring peregrine eyries is a time consuming task. The year 2001 marked the third year since delisting, and only two more years of intensive monitoring are required to fulfill federal requirements for full recovery. After that period, a sampling scheme will be developed, in which perhaps only one third of the eyries in the park will be checked each year, thus completing a full parkwide production survey every three years. This will allow us time to check for new eyries and move on to other bird projects.

Peregrine Falcon Productivity Yellowstone National Park

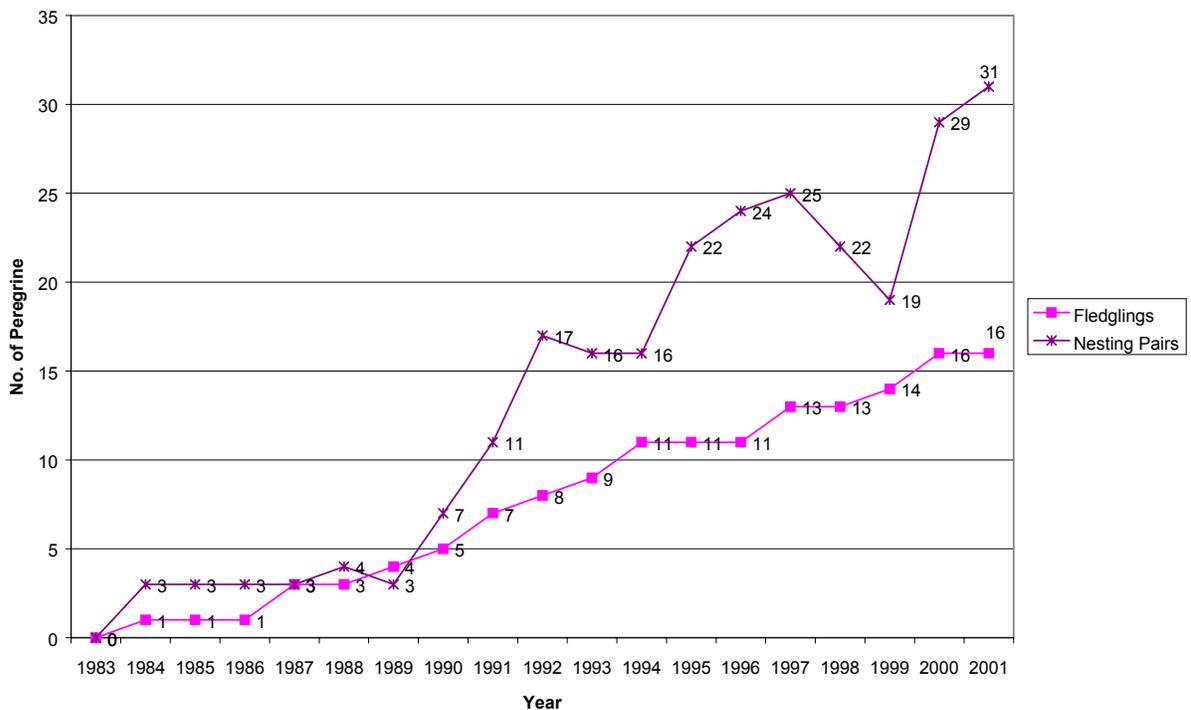


Figure 4.

TRUMPETER SWAN

The Yellowstone National Park resident Trumpeter Swan population continues to show signs of a population at risk. Traditionally, the Centennial Valley of Montana has been a hot spot for cygnet production in the greater Yellowstone area. Swan recruitment from outside of Yellowstone National Park is a critical factor in maintaining the resident swan population. Historically, swans from outside the park (namely the Centennial Valley) eventually replaced swans that died in the park. However, events over the last several years have led to a reduction of breeding swans in the greater Yellowstone and low numbers of fledged cygnets in YNP (Figure 5), causing serious concern.

The number of adult swans in Yellowstone National Park has declined steadily since 1961 and currently stands at only 17 individuals (Figure 6). This is the fourth lowest number of adults ever recorded since we have been collecting trend data, and represents numbers reminiscent of the early 1930s. Swan recruits from Paradise Valley have helped in maintaining the Yellowstone swan population for the time being. In recent years, Trumpeter Swan nest attempts have ranged from two to 10 per year (Figure 7). There were only two nest attempts in 2001, compared with seven in 2000, six in 1999, and nine in 1998. In 2001, no cygnets fledged in YNP. This was somewhat unexpected, since years with drought-like conditions are usually favorable for swan production. During two other severe drought years (1988 and 2000), Yellowstone National Park fledged seven cygnets per year. Except for these anomalies, cygnet production has been dismal over the last 13 years, ranging from zero to five cygnets per year.

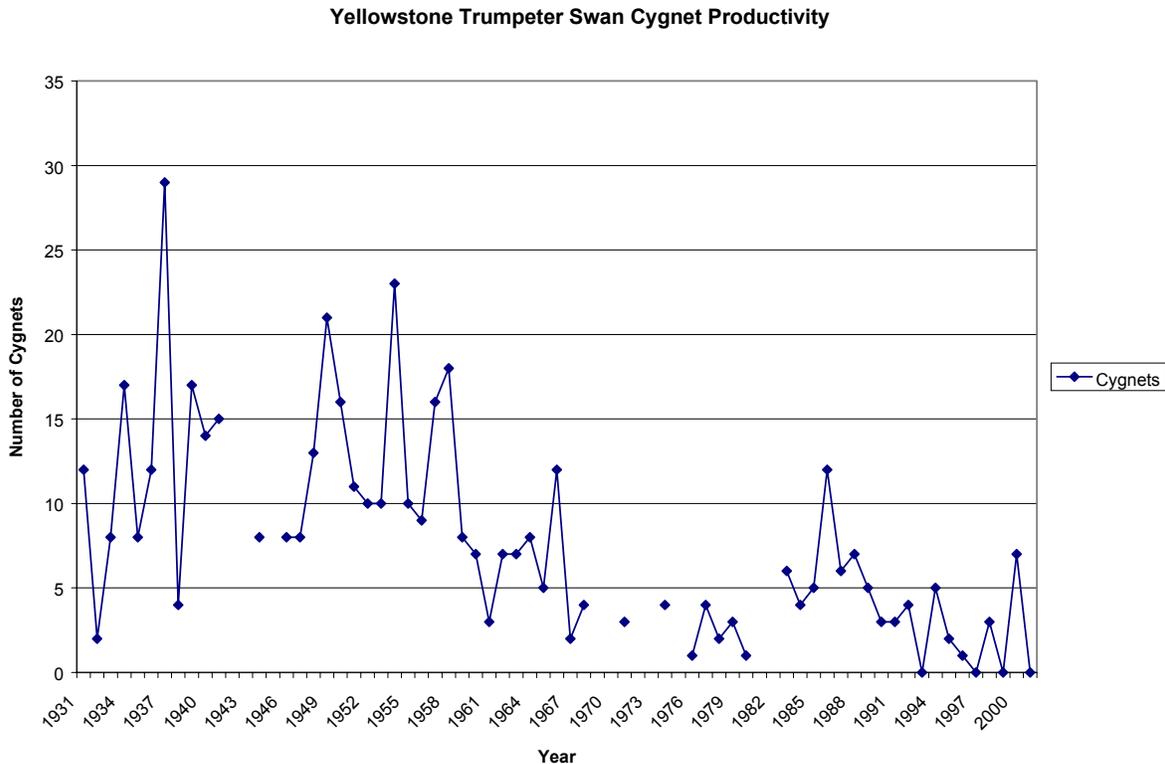


Figure 5.

Adult Trumpeter Swan Population Dynamics Based on Fall Aerial Surveys

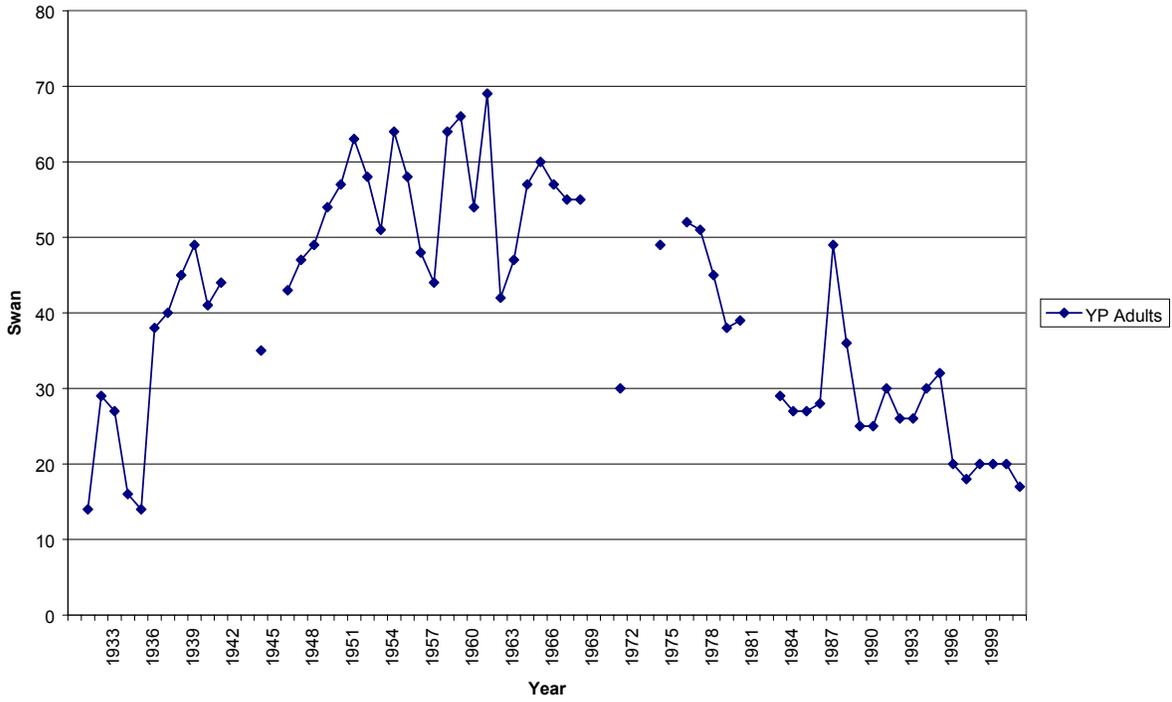


Figure 6.

Yellowstone Trumpeter Swan Nest Attempts

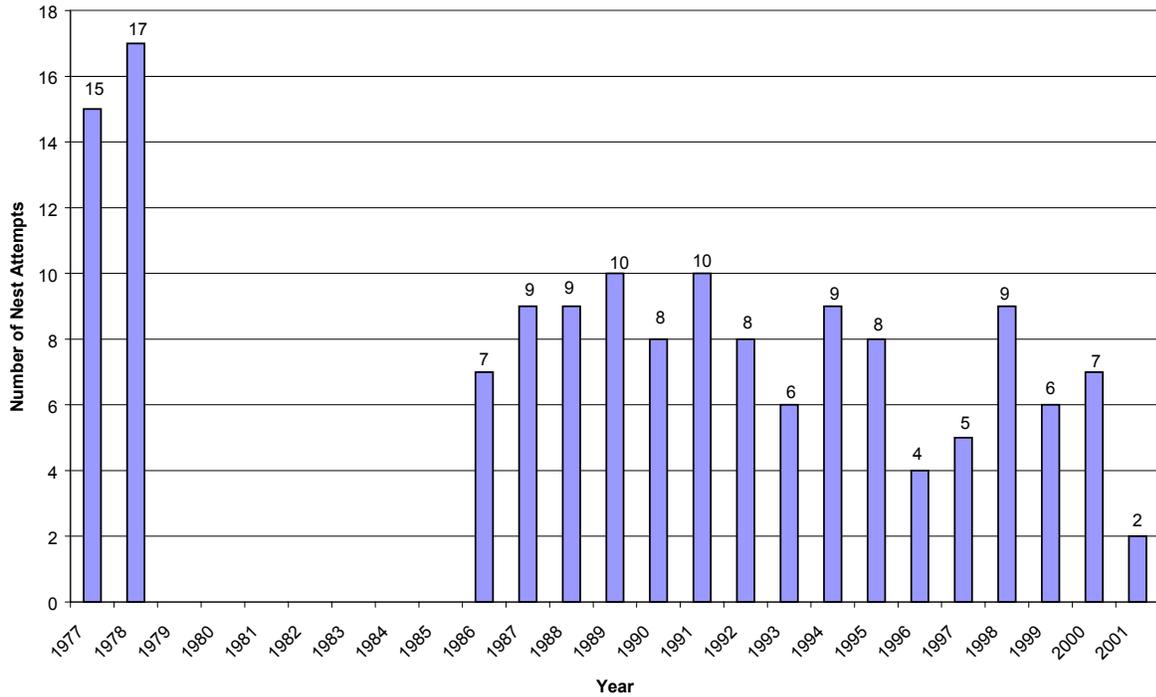


Figure 7.

Paradise Valley Trumpeter Swan Flock. Yellowstone National Park began to participate in Trumpeter Swan conservation issues in Paradise Valley (north of the park in Montana) due to the potential threat posed by exotic Mute Swans. In the 1960s, a private landowner purchased a pair of Mute Swans for aesthetic purposes. By the late 1970s, the Mute Swan population had grown to a high of 120 individuals. Fearing potential competition with native Trumpeter Swans in Yellowstone National Park, the National Park Service became involved in a program to reverse this alien threat to native swans. In 1987, a slide program was presented by park staff to Paradise Valley landowners interested in helping resident Trumpeter Swans. After the initial presentation, an informal agreement was reached indicating the importance of eliminating Mute Swans immediately and replacing them with captive-raised Trumpeter Swans. The biggest obstacle was finding private funding to pay for the program, particularly since the purchase of captive Trumpeter Swans can be very expensive. Generous support from the Cinnabar Foundation and the Chevron Corporation, in addition to contributions from private citizens, allowed this program to proceed on schedule.

The first order of business was the elimination of Mute Swans. The staff ornithologist, through the help of landowners and park rangers, began to eliminate the first Mute Swans in the fall of 1987. By 1989, the Mute Swan population was reduced to 13 individuals, and Trumpeter Swans were introduced into Paradise Valley. In 1991, Trumpeter Swans outnumbered Mute Swans nine to two in Paradise Valley. By the mid-1990s, Mute Swans were eliminated from Paradise Valley altogether. Therefore, the threat posed by an alien species was extinguished in a relatively short period of time.

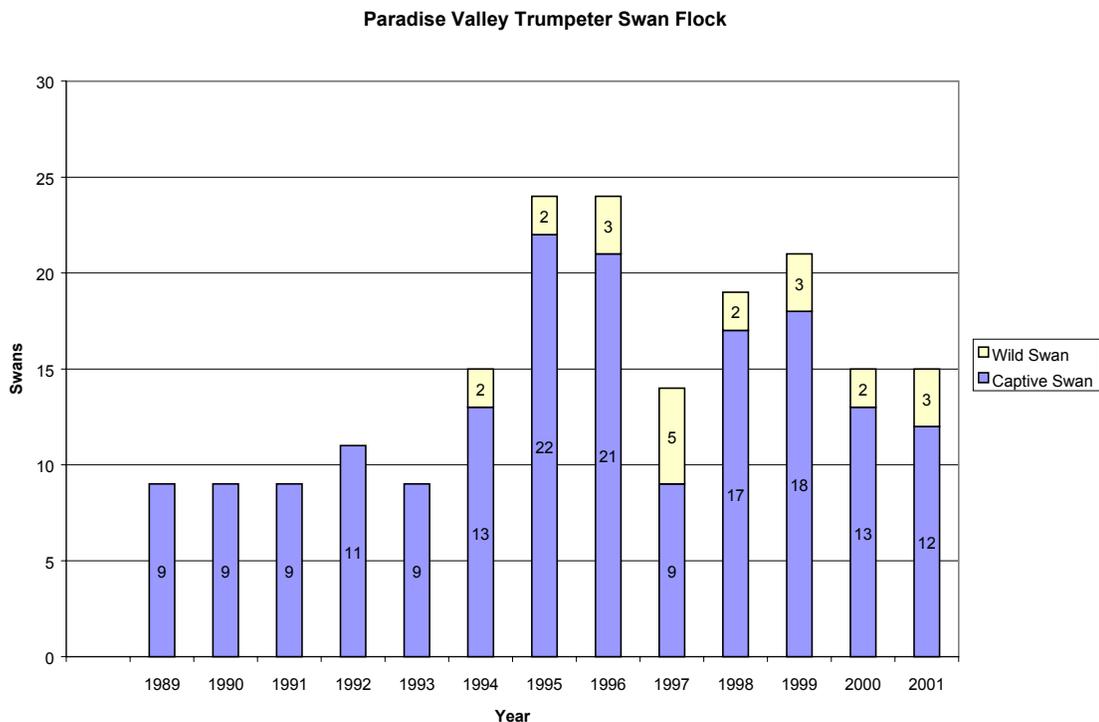


Figure 8.

Throughout the years, the Paradise Valley Trumpeter Swan program has experienced two major setbacks: 1) two captive swans and one wild swan were illegally shot on the DePuy Ranch on December 2, 1995; and 2) severe floods on the Yellowstone River during the spring and summer of 1997 and 1998 flushed many swans downriver, leading to a major decline in the swan flock. In 1999, one captive swan pair managed to fledge five cygnets on one ranch and a wild swan pair fledged a single cygnet. In both 2000 and 2001 there were two nest attempts that were successful in fledging one and two cygnets, respectfully. In 2001, the Paradise Valley flock totaled 15 swans (Figure 8), compared to 15 in 2000, and 21 in 1999 (Table 2). The primary reasons the population declined were mortality due to collisions with wires and recruits exploring the confines of YNP and Paradise Valley. Banded swans from Paradise Valley were seen in Yellowstone National Park, so the program continues to pay off.

TABLE 2. 2001 TRUMPETER SWAN PRODUCTION

Parameters	Yellowstone National Park	Paradise Valley
Occupied Sites	7	5
Nesting Pairs	2	2
Successful Nests	1	2
Cygnets Hatched	4	3
Broods w/Fledged Young	0	1
Cygnets Fledged	0	2
Adults	17	13
Total Swans	17	15

MOLLY ISLANDS COLONIAL NESTING BIRDS

The Molly Islands Colonial Nesting Bird Census was conducted in mid May, early June, early August, and mid September 2001. Because of the sensitivity of the area, the Molly Islands are closed to public entry. The Molly Islands consist of two small islands appropriately named Rocky Island and Sandy Island, due to the nature of the nesting substrate. The census techniques applied this year were consistent with those conducted over the last several years; however, this year surveys were conducted both by boat and air.

Yellowstone Lake thawed out from the deep freeze slightly earlier than normal in 2001 (see Figure 1); therefore, pelicans arrived at the islands well before Yellowstone Lake was ice-free. On Rocky Island, a total of 154 pelican nests were initiated on the highest part of the island (Table 3). Pelican nesting was restricted to one aggregation. Double-Crested Cormorants constructed 76 nests within this pelican aggregation. High water levels did not threaten the colonial



American White Pelicans nesting on Sandy Island, 2001.

nesting birds this year. Once the season progressed, a total of 122 American White Pelican nests and 60 Double-Crested Cormorant nests remained, and all of these were successful. Of the 90 pairs of California Gulls that attempted to nest, 60 pairs were successful in raising young. There were three Caspian Tern nest attempts on Rocky Island in 2001. The following young fledged from Rocky Island in 2001: 120 American White Pelicans, 65 Double-Crested Cormorants, 95 California Gulls, and three Caspian Terns.

TABLE 3. 2001 MOLLY ISLANDS COLONIAL NESTING BIRD PRODUCTIVITY

Area	Species	Nests Initiated	Successful Nests	Young Fledged
Rocky Island	American White Pelican	154	122	120
	Double-crested Cormorant	76	60	65
	California Gull	90	60	95
	Caspian Tern	3	3	3
Sandy Island	American White Pelican	110	98	85
	Double-crested Cormorant	35	18	10
Molly Islands Totals	American White Pelican	264	220	205
	Double-crested Cormorant	111	78	75
	California Gull	90	60	95
	Caspian Tern	3	3	3

On Sandy Island, 110 American White Pelican nests were initiated in three large aggregations, and 35 Double-Crested Cormorants nested, but only 18 successfully fledged young. California Gulls did not nest on Sandy Island in 2001. The following young fledged from Sandy Island in 2001: 85 American White Pelicans and 10 Double-Crested Cormorants.

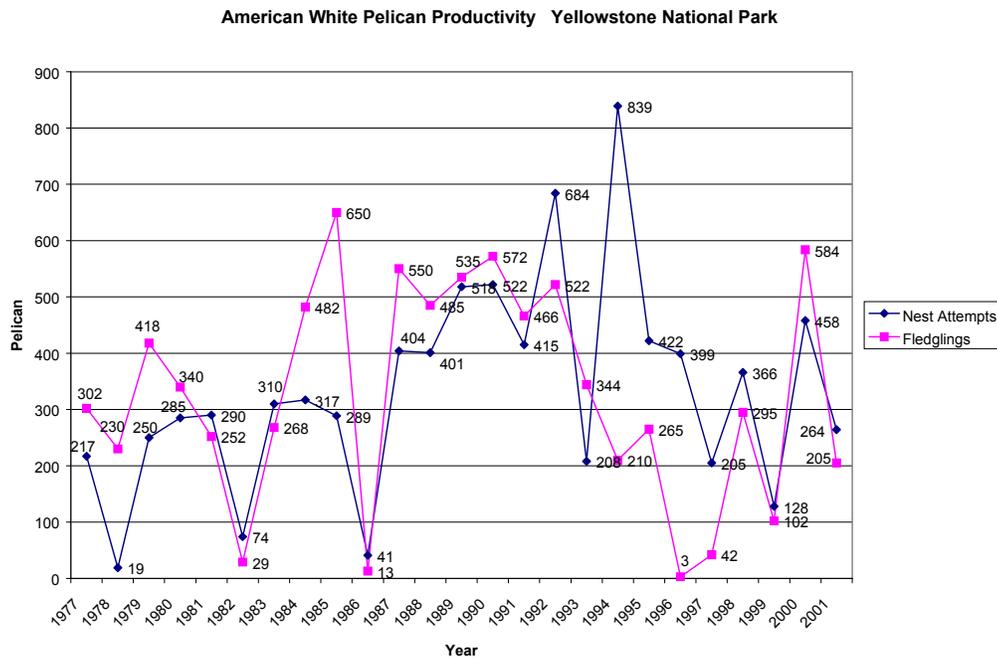


Figure 9.

In summary, 2001 was a surprising year for colonial nesting bird production due to the drought and low water levels on Yellowstone Lake. Total production on the Molly Islands resulted in fledging 205 American White Pelicans (Figure 9), 75 Double-Crested Cormorants, 95 California Gulls, and three Caspian Terns. As the lake trout management program continues on Yellowstone Lake, the status of the Molly Islands birds will play a more critical role in assessing the impacts of this non-native species on endemic piscivorous birds. At this time, lake trout do not appear to have adversely affected colonial nesting bird production. Climatic conditions appear to play the most important role in influencing bird production on these islands.

OSPREY

The YNP Osprey population continues to show signs of natural annual variation. A total of 96 Osprey pairs nested in both 2001 and 2000, and they fledged 54 young in 2001 and 64 in 2000 (Figure 10). Tree nest-site instability and weather continued to play a role in influencing Osprey productivity. (The photo on the right by Terry McEneaney shows a typical Osprey nest site.) The incidence of Bald Eagles taking over Osprey nest sites was noticeable this year and was documented at two sites. Monitoring the population dynamics of Ospreys and other piscivorous bird species is especially important as we chart lake trout numbers over time.

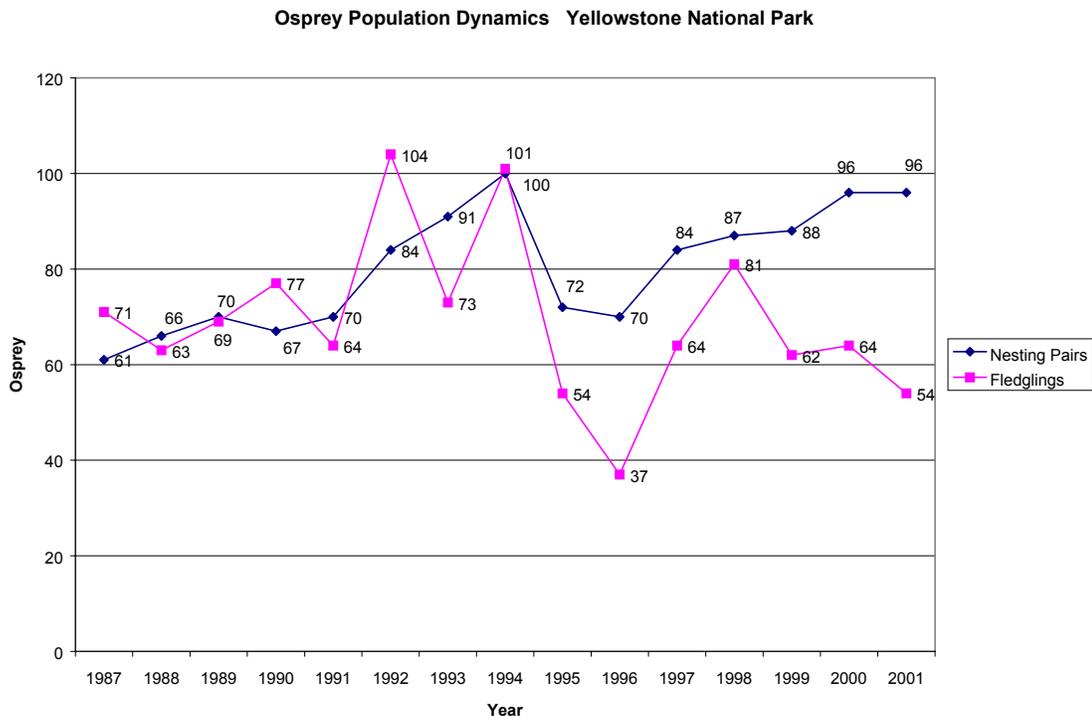
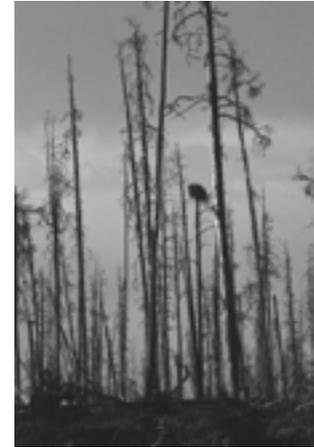


Figure 10.

HARLEQUIN DUCK

The Harlequin Duck population in YNP continues to maintain itself and is only mildly variable from year to year, with generally 16–20 pairs residing in the park. Monitoring adults is the most effective method of keeping track of population vigor and trends. Monitoring annual productivity is not cost effective, as data collection is extremely time-consuming and difficult due to the remoteness of many of the areas in which harlequins are found. Productivity is extremely variable from year to year and is highly influenced by weather, such as flooding.

COMMON LOON

The Common Loon population in YNP continues to fluctuate from year to year. There were nine nest attempts in 2001, yet only seven young managed to reach fledgling age, compared to nine nest attempts and eight fledglings in 2000, and 14 nest attempts and two fledglings in 1999 (Figure 11). A total of 35 adults were found in the park in 2001, compared to 34 adults in 2000, and 42 adults in 1999. These adult numbers have ranged between 34 and 51 individuals over the last 13 years. Yearly fluctuations in adult numbers and in the production of young are the result of variable weather conditions. The moderate loon production and the low adult numbers are a reflection of drought conditions.

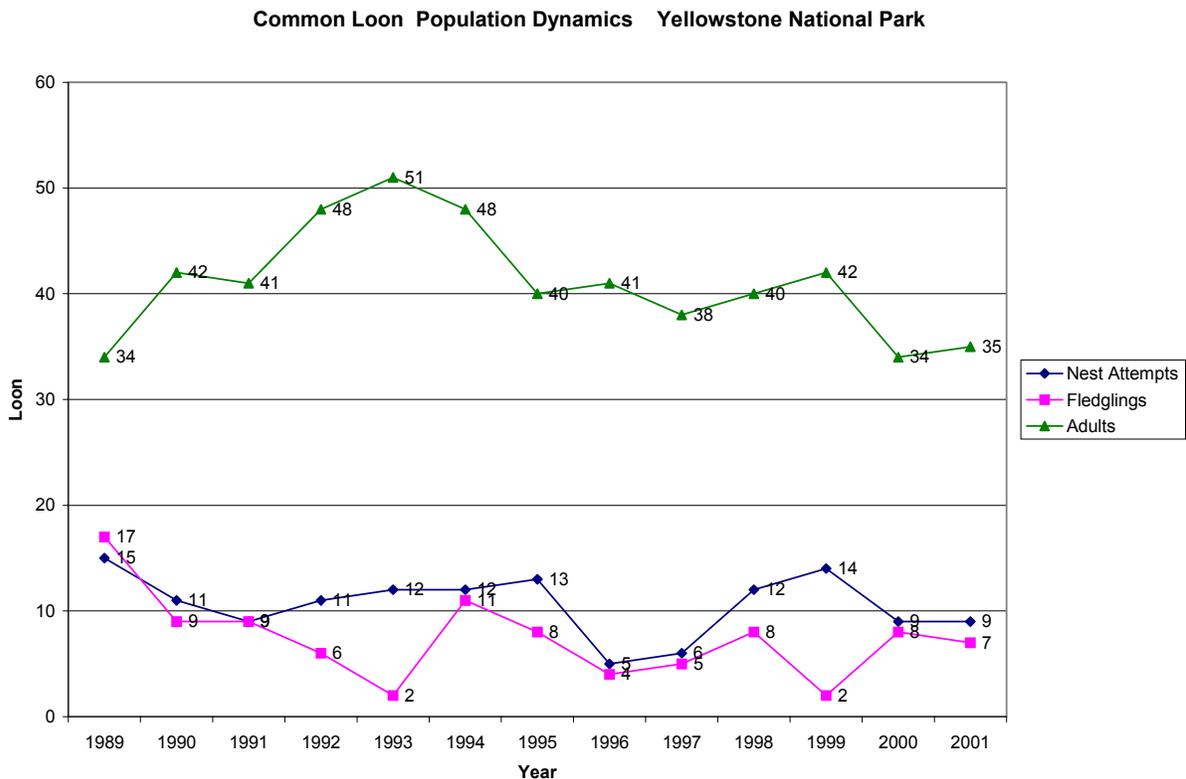


Figure 11.

OTHER STUDIES AND POPULATION MONITORING

NORTH AMERICAN BIRD MIGRATION COUNT

YNP participated in the North American Bird Migration Count for the ninth consecutive year in 2001. Originally designed to collect quantitative and qualitative spring bird migration information on a continental scale, the count has turned into a low-key social event. The survey is traditionally scheduled each year on the second Saturday in May, and occurred on May 12 in 2001. Five observers recorded a total of 1,697 individual birds (Table 4). A total of 91 bird species were recorded during the count, including 65 species within YNP. The count originates on Yellowstone Lake and ends 70 miles north of the park in the Shields Valley of Montana.

**TABLE 4. NORTH AMERICAN BIRD MIGRATION COUNT SUMMARY
YELLOWSTONE NATIONAL PARK AND VICINITY**

Year	1993	1994	1995	1996	1997	1998	1999	2000	2001
Number of Species Recorded	72	74	61	82	93	91	85	85	91
Revised Number of Species (1996 Standards and Route)	86	74	75	82	93	91	85	85	91
Total Number of Species in YNP	69	73	52	73	70	69	70	61	65
Total Individual Birds									
YNP, WY	1,545	1,793	2,408	1,797	1,038	1,073	826	750	967
YNP, MT	289	145	242	113	94	64	163	912	74
Outside YNP (Park Co., MT)	139	89	248	313	949	413	1,974	936	656
Grand Totals	1,973	2,027	2,898	2,223	2,081	1,550	2,963	2,598	1,697
Number of Observers	2	5	7	4	4	4	3	5	5
Hours in the Field	16	47.5	76.5	28	42	48	36	69	44

MID-WINTER EAGLE SURVEY

A mid-winter Bald Eagle/Golden Eagle survey was conducted for the 15th consecutive year in Yellowstone National Park and on portions of the northern range outside the park. A total of 61 eagles were counted on January 12, 2001 (Figure 12). Of the total, 55 were identified as Bald Eagles and six were identified as Golden Eagles. The northern range outside of Yellowstone National Park continues to be the hot spot for wintering eagles, possibly in relation to carrion availability from the regular- and late-season elk hunts. Weather and prey and carrion availability continue to play a major role in eagle distribution.

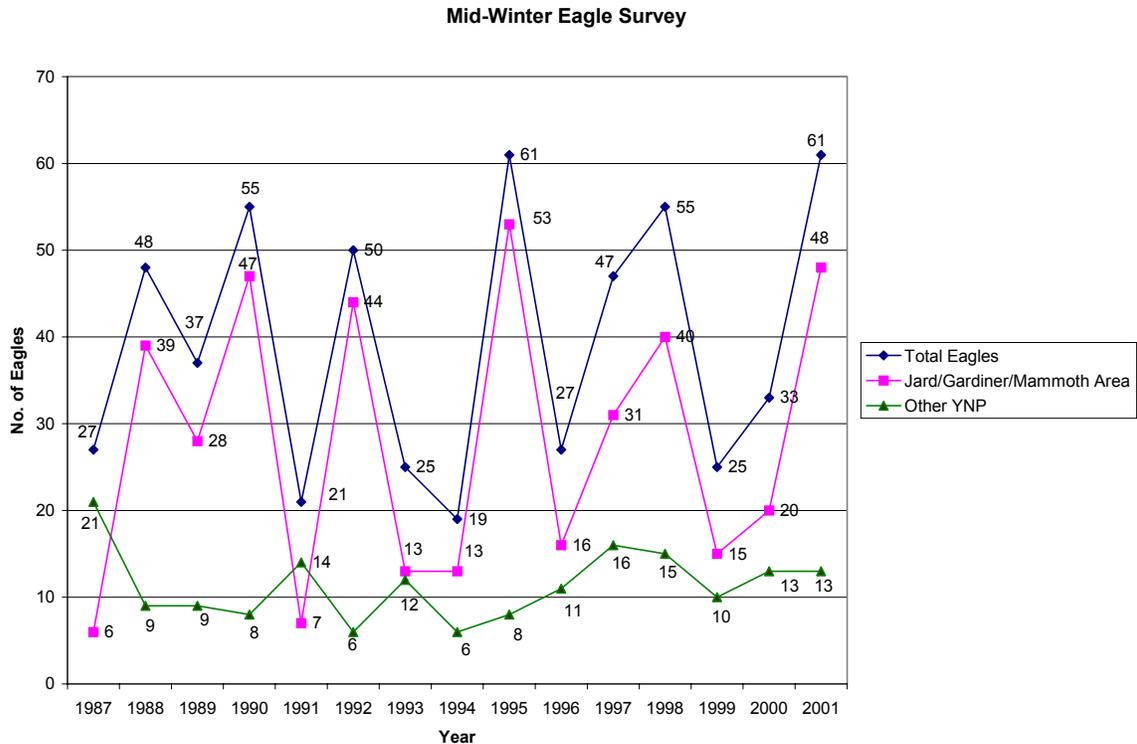


Figure 12.

BREEDING BIRD SURVEYS

Three Breeding Bird Surveys were conducted in 2001. This songbird data was sent to the continental database clearinghouse located at the Patuxent Wildlife Research Center in Laurel, Maryland, and is included in the information available online at www.mp2-pwrc.usgs.gov/bbs. Data from these surveys are used to develop population trends for North American songbirds. Yellowstone National Park Breeding Bird Surveys date back as far as 1982.

GLACIAL BOULDER ROUTE SURVEY

The Glacial Boulder route survey, which documents birdlife found exclusively in lodgepole pine, was conducted for the sixth year in a row in 2001, establishing additional baseline data for neotropical migrant landbird monitoring. The transect begins at the Glacial Boulder trailhead near Inspiration Point. The point count census consists of 30 stations and is conducted entirely on foot. Census protocol for this survey is similar to that of a Breeding Bird Survey. Traffic noise during the summer is beginning to affect Breeding Bird Survey routes, and for this reason routes are being developed away from established roads.

CHRISTMAS BIRD COUNT

The 2001 Yellowstone Christmas Bird Count (YCBC) marked the 29th year that the survey has been conducted in the Yellowstone area. During count day, December 17, a total of 34 species comprising 1,675 individuals were recorded (Table 5). Two additional species were recorded during count week: a Northern Shrike on 12/17/01 in Gardiner, MT; and a Great

Horned Owl on 12/18/01 in Mammoth, WY. YCBC highlights included these records: 389 Common Redpoll, compared to the previous 1989 record of 148; two Yellow-Rumped Warblers, compared to the previous record of one in 1983, 1987, and 1990; seven Song Sparrows, compared to six recorded in 1988; two Marsh Wrens, tying last year's record; and four Northern Flickers, tying the 1987 record. As of 2001, a grand total of 95 species have been recorded on YCBC day, and 97 species during YCBC week.

The Yellowstone Christmas Bird Count had above average public participation, with 22 people attending the event (Figure 12). Temperatures ranged from 12 to 27°F. Conditions were extremely mild, and even the edge of rivers that would usually have been frozen were not.

TABLE 5. YELLOWSTONE CHRISTMAS BIRD COUNT

Species	YNP-WY	YNP-MT	Outside	Totals
			YNP- MT	
Green-Winged Teal	25	11		36
Mallard	51	66		117
Barrow's Goldeneye		12		12
Common Merganser			5	5
Bald Eagle	6	5	6	17
Rough-Legged Hawk		1		1
Golden Eagle		2	2	4
Common Snipe	2			2
Rock Dove	26		22	48
Belted Kingfisher	1	1		2
Northern Flicker	1		3	4
Horned Lark	1			1
Gray Jay	4			4
Steller's Jay	1		4	5
Pinyon Jay			35	35
Clark's Nutcracker	39		22	61
Black-Billed Magpie	63	8	46	117
Common Raven	49	13	58	120
Black-Capped Chickadee	3		8	11
Mountain Chickadee	50		21	71
Red-Breasted Nuthatch	9		10	19
Marsh Wren	2			2
American Dipper	10	28	4	42
Townsend's Solitaire	22	5	20	47
Bohemian Waxwing	19		50	69
Yellow-Rumped Warbler	2			2
Song Sparrow	4		3	7
Gray-Crowned Rosy Finch			120	120
Black Rosy Finch			2	2
House Finch			36	36
Common Redpoll	75		314	389
Red Crossbill	17			17
Pine Siskin	55		60	115
House Sparrow	15		120	135
Totals	552	152	971	1,675

2001 Yellowstone Christmas Bird Count, continued.

Bald Eagle Classification

Class I	2
Class III	1
Class IV	1
Class V	13
Total	17

Golden Eagle Classification

Adult	4
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Gray-Crowned Rosy Finch Classification

Gray-Crowned race = 97

Hepburn race = 23

Total = 120

Observers: Dejan Corvach, Bill Edwards, Terry McEneaney, Brian Suderman, Andy Stolzenburg, Sue Williams, Woody Martyn, Carl Anderson, and Erin Bentley.

Feeder Watchers: Shelly Buranek, Meredith and Tory Taylor, Karen McEneaney, Doug and Christine Smith, Mark Donahue, Drew Thate, Pat Flaherty, Dave Hahn, Julie Mao, Jody Hilty, and Danielle Chalfant.

General Observations:

Average winter conditions resulted in an average number of species and a slightly above average number of individuals observed.

No Common Goldeneye, Hairy Woodpecker, Dark-Eyed Junco, Downy Woodpecker, or American Tree Sparrow were located.

Temperatures: 12–27 °F. Snow depth: 3–12". River edges were not frozen.

As of 2001, a grand total of 95 species have been recorded on the YCBC, and 97 species with the YCBC day and count week combined. This represents 29 years of data.

Compiler: Terry McEneaney.

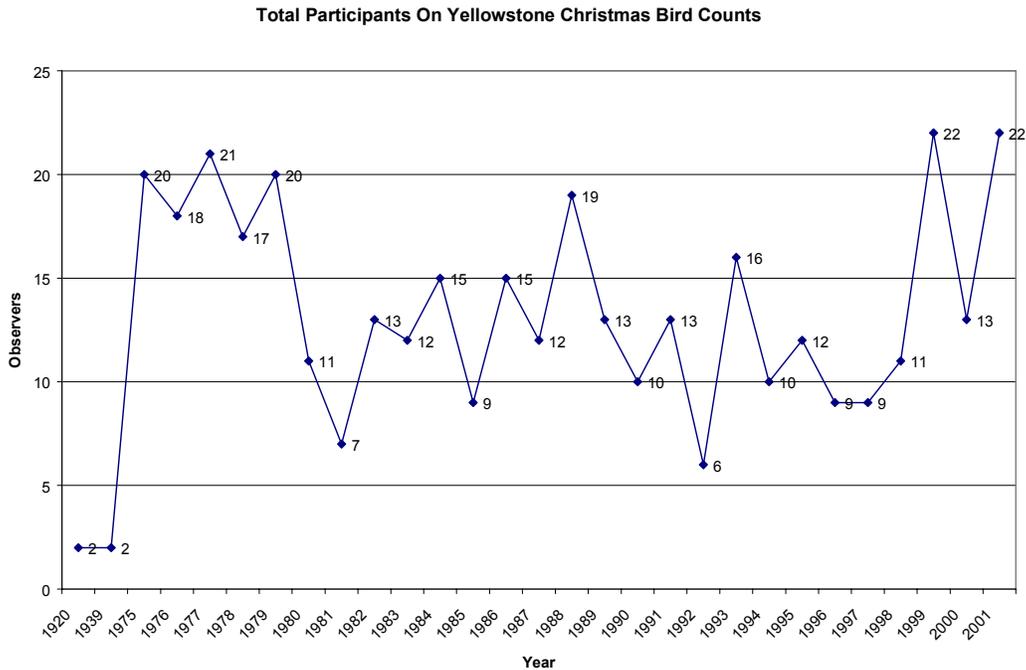


Figure 12.

MISCELLANEOUS PROJECTS AND PROGRAMS

NEW BIRDS FOR YELLOWSTONE NATIONAL PARK

Two new bird species were added to the Field Checklist of Birds of Yellowstone National Park in 2001. Two previous bird records were discovered in the files that deserved attention. On April 15, 1993, Terry McEaney observed a Red-Shouldered Hawk on Fountain Flats. This marks the first Red-Shouldered Hawk record for Yellowstone National Park. Additionally, on August 25, 1997, a Palm Warbler was observed with a group of warblers on the Old Gardiner Road (Montana) in Yellowstone National Park by the staff ornithologist.

As of 2001, 315 bird species have been documented in the park since it was established in 1872. The Field Checklist of Birds of Yellowstone National Park was last revised in April 2000 by the staff ornithologist. A newly revised bird checklist was made available to the public in March 2001. This checklist is available on the park web site at www.nps.gov/yell. Updates to this checklist are scheduled for March 2003.

GLOBALLY IMPORTANT BIRD AREA DESIGNATION

On March 17, 2001, Yellowstone National Park was designated a Globally Important Bird Area (GIBA) by the American Bird Conservancy in association with the Nature Conservancy. YNP joins the ranks of only 100 GIBAs in the U.S. and approximately 3,500 sites worldwide. Only six U.S. national parks have this unique designation: Yellowstone, Big Bend, Big Cypress, Channel Islands, Denali, and Everglades.

Yellowstone National Park was selected in recognition of its value to the conservation of birds and their habitats. Some of the attributes for the Yellowstone GIBA designation include:

- one of the most significant American White Pelican breeding colonies in the northern Rockies, and the only one in the NPS system;
- an important migratory stopover, wintering, and nesting area for Trumpeter Swans;
- one of the highest concentrations of nesting Peregrine Falcons in the northern Rockies;
- home to one of the highest concentrations of Great Gray Owls in North America;
- an important nesting area for Harlequin Ducks;
- one of the most intact coniferous forests in the world;
- an important regional molting area for waterfowl (Yellowstone Lake); and
- one of the highest concentrations of nesting Barrow's Goldeneyes in North America.

ENVIRONMENTAL ASSESSMENTS, STATUS REVIEWS, TECHNICAL DOCUMENTS

The most important YNP bird assessments in 2001 included: Madison-to-Norris road construction, Canyon Contractors Camp, Swan Hunt EA, and the Trumpeter Swan Implementation Plan. The U.S. Fish and Wildlife Service also contacted the staff ornithologist regarding status reviews for the Yellow-Billed Cuckoo. Because of the large number of bird species, more status reviews are expected in the future.

GREATER YELLOWSTONE BALD EAGLE WORKING GROUP

Established in 1982, the Greater Yellowstone Bald Eagle Working Group is still in existence. Bald Eagle productivity and other management information are communicated to the group via email or an annual meeting, but a meeting has not been held in the last three years. Hopefully, the working group will continue to exist. The Bald Eagle is doing remarkably well and is ecologically recovered in the greater Yellowstone area. The group is unified in its belief that the Bald Eagle can be delisted in this area, and the U.S. Fish and Wildlife Service is expected to take such action in the near future.

GREATER YELLOWSTONE PEREGRINE FALCON WORKING GROUP

Peregrine Falcon working groups are primarily organized by state. The park participates in two Peregrine Falcon working groups (Montana and Wyoming), and has been an active participant ever since peregrines have been found in the greater Yellowstone area. Wyoming has an informal working group, and most of the coordination is done over the telephone. Montana has a more formalized working group. Yellowstone National Park works closely with both state agencies and the Peregrine Fund. These teams are one of the main reasons the peregrine has made such a remarkable recovery. The Peregrine Falcon was officially delisted on August 26, 1999. The staff ornithologist attended the PFWG meeting in January 2001.

GREATER YELLOWSTONE TRUMPETER SWAN WORKING GROUP

The Greater Yellowstone Trumpeter Swan Working Group was organized in 1997. The staff ornithologist was the first chairman of this group. Yellowstone National Park and Wyoming Game and Fish have been taking the lead to ensure that greater Yellowstone area Trumpeter Swans are conserved. The group collects annual population and production data for greater Yellowstone area Trumpeter Swans, and management activities are communicated between agencies at these meetings. A joint GYTSWG/Trumpeter Swan Implementation Plan meeting took place in West Yellowstone in June and in Idaho Falls in September.

MONTANA BIRD RECORDS COMMITTEE

The Montana Bird Records Committee meets once or twice a year, depending on the volume of information, to review new bird records. This is a very high profile committee, which keeps the park up-to-date on the latest advances in ornithology. The staff ornithologist has been chairman of this committee for several years.

WYOMING BIRD RECORDS COMMITTEE

The staff ornithologist was elected to the Wyoming Bird Records Committee in 1998. Similar to the Montana program, the Wyoming Bird Records Committee meets once a year in the spring to review bird records. The staff ornithologist was selected as committee chair. Due to time commitments, the staff ornithologist resigned from this position as of fall 2001.

HARLEQUIN DUCK WORKING GROUP

Yellowstone National Park is a member of the Harlequin Duck Working Group. Although unable to attend a formal meeting in recent years due to budget constraints, the staff ornithologist is planning on attending future HDWG meetings.

NEOTROPICAL MIGRANT WORKING GROUPS

Yellowstone National Park typically participates in three neotropical migrant working groups. The two state working groups are the Montana Partners in Flight and the Wyoming Partners In Flight. The third group, an international working group, is called the Western Working Group Partners in Flight. Ornithologists from all over the West are in this group, including colleagues from Canada and Mexico. They are currently focused on prioritizing species and developing conservation plans. Meetings occur twice a year, usually in different areas of the West. A tight travel budget prevented the staff ornithologist from attending many of these meetings.

MUSEUM SCIENTIFIC BIRD COLLECTION

The Albright Visitor Center museum bird collection continued to increase. Barbara Williams of Rockford, Illinois, prepared study skins for the collection again this year. These specimens are used for scientific purposes only.

SWALLOW, WOODPECKER, AND RAVEN MANAGEMENT AND MITIGATION

Swallows, Northern Flickers, and Ravens continue to pose obstacles for the people responsible for the care and management of buildings in the park. In addition, there are some health risks associated with some of these bird species. These birds are protected by law under the Migratory Bird Treaty Act, so mitigation options are very limited. With proper installation, plastic netting can be used to discourage nesting in selected areas of high public use.

SPEAKING ENGAGEMENTS AND PUBLIC CONTACTS

Public contacts are increasing each year. The park concessioners annually request bird lectures for summer and winter guides. In addition, there are hundreds of letters of inquiry and emails about bird information. Speaking engagements were also popular again in 2001.

INJURED AND ROAD-KILLED BIRDLIFE

A protocol for handling injured and road-killed birds has been in place for the last few years and appears to be working well. Procedures were followed very well in recent years, and there have been no problems associated with this protocol. The only professional bird rehabilitator we are involved with is Big Sky Wild Care of Bozeman, Montana. All road-killed birds are to be salvaged, if possible, for future placement in the Albright museum collection. In 2001, we are planning on adding all road-killed birds into the road-kill database housed in the bear management office.

NEWS RELEASES, SCIENTIFIC INQUIRIES, INTERVIEWS, AND MEDIA CONTACTS

Working with the public demands a fair amount of time, but it is always time well spent. However, each year it seems to occupy a large percentage of the staff ornithologist's work schedule. The public is keenly interested in new information about YNP's birds. It is difficult to quantify this type of information request, but a concerted effort will be made to do a better job of documentation in the future.

COMMON RAVEN PREDATION OF EARED GREBES

On May 1, 2001, the staff ornithologist witnessed a remarkable Common Raven predation event. Hundreds of Eared Grebes were migrating through the park that day. As the grebes maneuvered through the snow squalls, some began to land on the cloud shadows on the ice of the West Thumb of Yellowstone Lake, confusing the frozen lake for open water. One by one the grebes landed on the ice, spread out over an area measuring approximately two square miles. The grebes were unable to take off because the ice was too slippery for their feet, and take-offs require that their feet make contact with open water.

Over the course of a three-hour period, 141 Eared Grebes were stranded on the ice. A raven was observed flying out to one of the stranded grebes and pulverizing the helpless prey with its long beak until it was dead. The raven then did the same thing to the next closest grebes. Later, three other ravens joined in on the killing. Two Bald Eagles also joined in and consumed grebes that were previously dead. Employing this technique, ravens killed 92 of the 141 grebes. It was an important ecological event, and the staff ornithologist was fortunate to witness it.



An Eared Grebe trapped on Yellowstone Lake ice in spring 2001.

ACKNOWLEDGMENTS

Special thanks go to Tami Blackford for her editorial comments and layout of this report, and Glenn Plumb for his review. Thanks also go to Peter Hamel for his important assistance during the summer field season, and to pilot Roger Stradley for his friendship, expertise, and sharp eyes. He continues to be an important part of the bird management program.



Trumpeter Swan tracks in the mud.