DEPARTMENT OF THE INTERIOR

INFORMATION SERVICE

BUREAU OF BIOLOGICAL SURVEY

For Release FRIDAY, JUNE 28, 1940.

FILLERS ON WILDLIFE

NOTE TO EDITORS: Below are a series of short paragraphs that may be used for fillers from time to time. These were taken from "The Status of Wildlife in the United States," a report of the special committee on the conservation of wildlife resources, Senate Report No. 1203, 76th Congress 3rd session, copies of which are available from the Biological Survey until the available supply is exhausted.

MUSK OXEN REESTABLISHED IN ALASKA

In 1930 the Biological Survey placed an order with an experienced collector in Greenland for delivery in the United States of an initial herd of musk oxen for transportation to Alaska. In 1931, 15 males and 19 females of musk oxen from this purchase were introduced into Alaska, where they were confined in a pasture near Fairbanks, and careful study made of them until 1936 when 4 of them were transferred to Nunivak Island. The following year, the balance of the herd, 27 animals, was also placed on Nunivak Island. As a result of this effort to reestablish musk oxen in Alaska, the Survey reports for 1939 that the herd has increased to 50 animals.

CROSS REINDEER WITH CARIBOU

Reindeer experiments have been conducted by the Biological Survey in Alaska in recent years, with particular efforts being given to breeding, to improving stock by selection and by cross-breeding with the Alaskan caribou, and to nutrition, parasites, and food and range conditions. The cross-breeding experiments were conducted on Nunivak Island and showed that crossbred animals ranged 50 to 100 pounds heavier than those of pure reindeer stock. Several publications have been issued as a result of these studies, the most recent of which is "Raising Reindeer in Alaska," Miscellaneous Publication No. 207. Copies are available to the public upon request.

TRY TO SAVE RARE FUR ANIMALS

The marten, many years ago a common fur animal of the coniferous forested regions, is now becoming exceedingly rare in many parts of the United States. It has already been extirpated in some sections. A study on the habits and ecology of this species is being made in Idaho by the Biological Survey, with hopes that some measures for saving this important fur animal can be found.

RARE ALBINO FOUND

A small buffalo herd had been introduced by the Biological Survey several years ago into the Big Delta River and Jarvis and Granite Creek region near McCarty, Alaska. During the last 2 years a careful check has been kept on this herd, and the last inventory showed the herd has increased to about 200 animals. Among them is an albino buffalo, one of the three albinos of the species known to be alive in North America.

COLLECTIONS HELP IDENTIFY ANIMALS

During the last decade, 8,523 specimens of birds and 6,077 mammals have been added to the Biological Survey collection of animals. Survey workers cooperated with other institutions and individuals by identifying for them more than 14,000 birds and 9,800 mammals. Type specimens representing newly described forms have been set aside for 251 mammals and 17 birds. The Biological Survey laboratories have been utilized almost constantly by cooperating individuals in their studies. Thousands of specimens have been loaned to institutions for taxonomic research purposes only.

COOPERATIVE UNITS BRING RESULTS

Practical results of benefit to wildlife conservation is the story of cooperative wildlife research units. There are 10 cooperative wildlife management research units, supported financially by the State game and conservation commissions, land-grant colleges and universities, the American Wildlife Institute, and the United States Biological Survey. These units are located in Alabama, Iowa, Texas, Virginia, Maine, Utah, Ohio, Oregon, Missouri, and Pennsylvania. Eight of the units are now in their fifth year, while Missouri began in 1937 and Pennsylvania in 1938.

Some of the results of the investigations of these units are as follows:

1. The mourning dove season in the South moved back 2 weeks over considerable area based on work in Alabama showing previous conflict with nesting season.

2. Initiation of practices favoring the blue-winged teal, resulting from an Iowa project.

3. Plans for wildlife management completed and development on several Maine lakes under way.

4. Open season on antelope in Oregon for 2 successive years.

5. Gray squirrel management programs initiated in Ohio and Texas.

6. Closed season placed on Attwater prairie chicken in Texas to save this upland species.

7. Large area in Virginia under management and being built up through stocking and protection.

8. Results of Ohio controlled hunting and pheasant refuge system being applied over wide area.

9. Limiting factors and requirements of chukar partridges in Missouri determined through study of extensive plantings in nine different areas.

10. Pheasant censusing techniques developed in Iowa, Oregon, and Ohio, used in basing protective regulations. Quail census technique developed in Iowa, Missouri, Texas, Alabama, and Virginia used over wide area.

11. Findings on white-tail and mule deer, now the basis for management by State game and conservation commissions.

12. Natural rearing techniques for wild turkey now used in Missouri, Virginia, and Pennsylvania.

The State game and conservation commissions are relying on the findings of these units to the extent of changing their rules and regulations, and setting up Pittman-Robertson Federal aid projects to apply them on a large scale.

Over 400,000 acres are being used as trial demonstration areas, where facts learned on sample plots are tried out on a much larger scale. Areas involved in research total more than 5,000,000 acres.

One of the major activities of the units is the specialized training given graduate students in the field of wildlife management. In the 4-year period (1935-39) 75 have completed advanced training.

CHECK DISEASES ON FUR FARMS

In the beginning of the fur-farming industry, fur farmers were confronted with a multitude of hazards in the form of destructive diseases. Lack of information on the maintenance of adequate sanitation encouraged excessive parasitic infestations as the earliest recognizable form of disease. The development of suitable anthelmintic treatments for silver foxes in the form of carbon tetrachloride and later tetrachlorethylene for the removal of hookworms was worked out by Biological Survey investigators and resulted in saving many animals. With this also were worked out systems of management for fur farms which would interrupt the life cycle of these parasites, thus preventing to a large extent reinfestation.

Extensive studies were also conducted on the removal of lungworms causing bronchial pneumonia in silver foxes. Since effective medication could not be applied in the lungs, the mechanical removal of these parasites with a tracheal brush was developed. More recently a plan of preventing reinfestation with these parasites by use of wire-mesh floors has served important needs in the control of this destructive disease. The Biological Survey operates a rabbit experiment station at Fontana, California, a fur animal experiment station at Saratoga Springs, New York, and conducts investigations of fur animals throughout the country.

$50,000,000 FUR MARKET JEOPARDIZED

It was not until the discovery of North America that the world fur trade got into its stride. That it early became an enormously profitable business on this continent is attested by the fact that great fortunes were amassed from dealing in furs. In these circumstances, with pelts readily obtainable and profits large, no attention whatever was paid to the question of the possible exhaustion of this source of wealth that nature provided with a prodigal hand. Naturally depletion of fur resources resulted. This cannot be attributed, however, entirely to overeagerness in trapping. The disappearance of the wilderness, natural habitat of the fur animals, was a major factor.

Nevertheless, even today the trappers and fur farmers of the United States receive $50,000,000 a year for the raw furs they bring to the market. The annual retail turn-over of finished articles is several times that amount; in 1929, the peak year, it reached half a billion dollars. The United States is, in fact, the largest fur consuming market in the world. Today, instead of the United States being the world's chief source of fur supply, this country depends upon imports for one-half of its requirements.

If war conditions prevent normal importation of furs, it probably will mean dependence upon domestic fur resources. This would bring the danger of taking more fur animals than the supply warrants and thus unduly depleting the breeding stocks. Trappers still take fur animals from the wild with the same extravagant disregard of the necessity for maintaining or increasing whatever supply is left.

Unless measures are taken to strike a proper balance between supply and demand, the nation's natural fur resources will be completely exhausted. Almost every State has some fur resources that are a source of income for some of its citizens. The methods of managing these resources are almost entirely haphazard, and in fact few conservationists have given serious thought to the matter.

For several years the Biological Survey has been assembling data on the annual production of furs in the United States from figures or estimates of the annual catch received from various State game commissions and other sources. Not until every State inaugurates a system of recording the number of furs taken and enforces the report requirement will it be possible to calculate the total annual catch or estimate the value of this resource for the entire United States.

The Bureau's wildlife refuge program has undoubtedly developed more favorable natural habitats for wildlife and this has directly benefited the fur resources found naturally on these areas. A more profound realization of the purpose and possibilities for developing all forms of wildlife on these refuges is developing.

BIRD-BANDING DATA VALUABLE

The mass of bird-banding data in the files of the Biological Survey constitutes the foundation upon which has been built every important publication on the distribution and migration of birds issued during the last 50 years. This applies not only to the history-making reports in the series of the Departments of the Interior and Agriculture, but also to elaborate reports and

treatises issued by State governments, universities, museums, and individuals, for the reason that these storehouses of information are always open to any accredited research worker. Bird-banding is also of direct interest and importance to several million American citizens who are unquestionably more keenly alive to the study of birds than to any other branch of natural history.

The banding work, taken over by the Biological Survey in 1920, has continued to grow, particularly during the last 8 or 9 years. Including all species, the total marked each year with Survey bands is now between 300,000 and 450,000 and the grand total has climbed to more than 3,300,000. Nearly every species of North American bird is represented in the banding files and the work has been extended to those species protected on the Laysan Refuge in the Hawaiian Islands. From these activities more than 200,000 case histories of banding and subsequent recovery are now available for study.

BELIEVE ALASKA GOOD DUCK PRODUCING AREA

It has become customary to think of Canada as the producer of all but a fraction of the continental supply of waterfowl. While accumulated evidence confirms the importance of the Canadian habitat, reconnaissance work in the vast marshlands of Alaska indicates that in the past the Territory has not been rated up to its true value as an important producer of wild fowl. This is a field that will be more adequately explored when funds for such research are made available.

FEDERAL AID ACT POPULAR

The wide State support of the Federal Aid to Wildlife Restoration Act is demonstrated by the fact that 43 States had adopted legislation assenting to the provisions of the act and are fully eligible to participate, according

to Biological Survey officials. Of these, 38 States had projects in operation in 1940, and 4 additional States submitted projects which were in process of being approved. Florida, Georgia, Montana, Nevada, and Louisiana failed to enact the necessary State laws.

One hundred and forty-five projects were approved during the 17-month period between July 1, 1938, when the act became effective, and November 30, 1939, and $1,183,053.35 were obligated to finance the undertakings. Forty-two other projects have been submitted and are in the process of being approved June 1940. If approved as submitted, they will obligate an additional $1,233,817.59.

As a result of this program, some very worthwhile projects have been initiated to provide additional lands dedicated to the needs of wildlife. In all, 29 land-acquisition projects have been approved, obligating $355,103.57 for the purchase of 79,800 acres, while 23 proposals are still under consideration which will require the expenditure of an additional $992,497.17.

PROTECT LIVESTOCK ON WESTERN RANGES

During the past decade the Biological Survey and cooperating State, local, and Federal agencies have done much to reduce losses from predators and rodents, and to protect the public health. The regular work of the Biological Survey and its cooperators has been augmented through the use of emergency funds in State and county projects, although in most cases relief labor has not been satisfactory in predator control. Since the Biological Survey's participation in control operations, the following predators have been taken: (Total 1916-1939) 5,128 bears; 1,031,951 coyotes; 21,411 wolves; 4,953 mountain lions; 110,642 bobcats; total 1,174,085. The taking of these predators has afforded protection to livestock and game on many western ranges.

RESTRICTED HUNTING HELPS BIRDS

While other factors have to some extent aided in the recovery of waterfowl populations since 1934 the principal cause of increase has been the reduction of shooting in the United States, according to Biological Survey officials.

DUCKS, GEESE NOT YET SAFE

Despite the fact that the migratory game bird population increased from less than 30 million in 1934 to 65 million in 1940, the population is not yet so large as to occupy and use all the areas available to them, Biological Survey officials say. The status of the waterfowl cannot be considered wholly satisfactory until breeding and wintering grounds on the continent are carrying quotas of birds nearly to the limits set by available food and cover.

DUCK BOOTLEGGERS DO GREAT DAMAGE

"Undoubtedly the illicit traffic in game conducted by organized groups of poachers and racketeers has caused more destruction and damage to waterfowl and quail than all other violations committed by individual poachers," Biological Survey officials declare. The operations of a single group in one season may run to figures that are impressive even when compared to those of other better known forms of outlawry.

The men directing these raids upon a national resource are equally shrewd and equally as conscienceless as those who engage in the smuggling of narcotics or any other vicious traffic. The task of breaking up these rings is one of the most difficult and dangerous of any undertaken by enforcement officers.

During the past few years when additional funds have been available the Survey has been remarkably successful in its attacks upon this traffic and many of the well-intrenched gangs have been broken up and the individual members convicted in the courts.

RESTORE WILDLIFE AREAS FOR WILDLIFE USE

The rapid decrease of wildlife during the past half century has been hastened by the appropriation for other purposes of millions of acres that originally produced an abundance of game, fur bearers, and fish. Restoring these tracts that are less valuable for other purposes to their original function of producing wildlife has been a principal objective of the national wildlife program.

For many years waterfowl have been in a precarious situation. Drainage of millions of acres has deprived the birds of large areas of their natural habitat, and improved roads and better means of transportation have made it easier to hunt them. The birds each fall have had to run the gauntlet of increasing numbers of hunters and, in addition, throughout the year they have to withstand unpreventable natural losses from predators, disease, and drought.

Careful estimate shows that 120,000,000 acres of former waterfowl habitat have been taken from use by agriculture, manufacturing, and other industries. It has been figured that about 7,500,000 acres of marshland,

properly distributed throughout the continental United States, will take care not only of the existing population of migratory waterfowl but of a considerably increased population, and thus insure the return of a breeding stock to the northern nesting grounds sufficient to maintain the population. The Biological Survey considers this the minimum that will insure the future of the migratory waterfowl population of this country.

Beyond the 7,500,000 acres it has not been possible to look. Should the population of migratory waterfowl greatly increase, additional acreage might be needed in the Southern States for wintering grounds, and of course additional nesting grounds in the breeding territory are always desirable. At the present time approximately 3,500,000 acres of refuge areas primarily suitable for waterfowl or in the process of restoration have been secured. Another 500,000 acres has been secured either by transfer or by purchase principally for upland and big game, but some of this land has secondary waterfowl potentialities.

Number of refuges: (1930) 86 with 5,076,705 acres; (1939) 266 with 13,619,121 acres.

Migratory waterfowl refuges in 1939: 178 with 3,415,542 acres.

Special refuges (chiefly islands for colonial birds) in 1939: 50 with 107,666 acres.

General wildlife refuges (migratory birds, upland game, and other wildlife) in 1939: 26 with 3,532,417 acres.

Big game preserves and ranges in 1939: 12 with 6,563,496 acres.

EARLY SETTLERS HAD PLENTY GAME

The pioneer settlers and native Indians had little or no occasion to concern themselves with scientific research in wildlife management; though hunting was done extensively, wildlife and wildlife habitat were abundant and, in general, the supply of game was equal to the demands made upon it. Now, however, our population of hunters is tremendously greater (by 3,000 or more percent) than at that early date, whereas natural wildlife habitat has gone into a tailspin of reduction.

RESEARCH STATION TO STUDY FOOD AND COVER NEEDS

Effective management of wildlife areas with a view to producing game animals for sporting purposes requires a great deal of detailed information regarding the food and cover needs of the various species. Just as it is important to know exactly the type of condition on the range best suited for grazing of domestic stock so it is important to know what type of environment is best suited for maximum production of game. Detailed knowledge on many species of plants, their value to wildlife, and methods for their propagation, is essential to planning a well-balanced wildlife program. Studies on food habits and on foods, to be carried on accurately, must be done in a laboratory well equipped with plant and animal collections. The Biological Survey now has a laboratory under construction at the Patuxent Research Refuge, Bowie, Maryland, where studies on wildlife food plants and the food habits of birds and animals can be carried forward.

The activities of this laboratory will be of national importance in the wildlife conservation field. The data obtained from its researches will be utilized not only in carrying forward State programs for wildlife conservation but will also be utilized in the important work now being done by the Soil Conservation Service in rehabilitating depleted and worn-out lands. Similarly the laboratory will help in developing better coordinated plans for development of wildlife on our national parks and forests. Serving as a clearing house for scientific information on the food preferences and environmental requirements of wild game and other animals, the construction of this laboratory marks a milestone in wildlife conservation.

PREDATORS KILL BIG GAME

The size of the problem of controlling predators and injurious rodents, which is a function of the Biological Survey in the United States, can be appreciated when one contemplates the vastness of the territory over which some of these animals range. In the 11 western range States, with an area of some 761 million acres, the coyote and rodent pests find wide and abundant range and a goodly part of this vast domain is infested with these animals. Incidentally, some 360 million acres of this area, or over 47 percent, consist of public lands on which many of the species of predators and rodents find ideal breeding grounds. On these areas the grazing of livestock and game is one of the most important elements of land-use.

The enormity of big-game losses due to predators is evidenced by reports of the U. S. Forest Service, which indicate that during the year 1936 predators destroyed 129,152 big-game animals on national forests alone. During the grazing season of the same year, the Forest Service reported 78,404 sheep and goats killed by predatory animals on national forests in the United States. The following report of estimated numbers of game animals killed by predatory animals in a period of 12 years has been compiled by the Forest Service of the Department of Agriculture: 7,853 antelope, 24,192 elk, 1,089,710 deer, 351 moose, 7,786 mountain sheep.

SOIL CONSERVATION CAN HELP WILDLIFE

Practices designed to encourage wildlife production invariably conserve soil and water resources and build back some of the fertility wasted through unwise agricultural practices, according to Biological Survey officials. For instance, nut-bearing trees, berry-producing shrubs, and legumes such as sweet clover and lespedeza can be planted in gullies and on thin, worn-out lands to prevent further erosion, yet furnish nesting cover and winter food for pheasants, quail, rabbits, and other wild animals and birds.

"DUCK" COUNTS VALUABLE

Discovery by Biological Survey workers of a method for making reasonably accurate estimates of duck concentrations has been of inestimable value in calculating the supply of these birds available for shooting and breeding. Annual inventories made by Survey investigations and cooperating agencies and individuals throughout the country give authoritative information on the trends in population. In 1940, it is estimated that there are some 65 million migratory birds in North America.

STUDY MORE THAN 800 BIRDS

Investigators of the Biological Survey make continuous studies of the relative abundance, distribution, and migration of about 800 species (with hundreds of subspecies) of North American birds, for the purpose of determining the precise limits of their breeding and wintering ranges, times of migration, flyways, and routes to and from summer and winter quarters, and the changes in these ranges and routes that are brought about by natural causes or the work of man.

The possession of such knowledge is vital to the regulatory activities pertaining to the game species, and of no less importance to the protection and encouragement of other beneficial species and the control of those that are harmful. With the constant changes affected by man in the ecological situation throughout the habitable parts of the continent, correlated changes are to be expected in the ranges and movements of the native avifauna, some of which may be of beneficial and others of harmful economic interests.