

SUMMARY OF IMPROVEMENT PRACTICES

Seventy *Lespedeza bicolor* plots are well established on the area. Most of these were planted during the first and second years of the project. They will average well above the minimum recommended size one-eighth acre.

Millet, grain sorghums, sesbania, and cow peas have been planted annually. Presently there are 121 plots of these annuals. The locations of these plots are changed from year to year in order to partially combat the competing broomsedge.

Due to the uncontrolled growth of broomsedge, it was necessary to begin a burning program in the late winter of 1954. At that time 3,160 acres were burned in several large blocks. An area of 960 acres was marked off in blocks by fire lanes placed one-fourth mile apart. These blocks (40 acres each) were burned in a checkerboard pattern in March of 1954. (The alternate forties were burned in 1955). A total of 4,120 acres were thus burned in 1954. The program was continued in 1955 by burning 2,620 acres. Of this area 640 acres had been burned in 1954. The entire area has been burned since February, 1954, except 800 acres of upland timbered land.

CONCLUSION

We believe that as a result of former development, plus a continuation of our present practices, the Covich County Game Area can continue to support a fall quail population equal to or greater than that of 1954. The over-wintering population will remain on the area as a breeding population for the following summer.

We further believe that we are now in position to demonstrate quail management techniques which may be used on public and private lands throughout the state.

ROLE OF GAME MANAGERS IN GAME AND FISH LAW ENFORCEMENT ON THE NATIONAL FORESTS IN VIRGINIA

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The Commonwealth of Virginia entered into a cooperative agreement with the United States Forest Service for the management of wildlife as a result of legislation passed by the 1937 General Assembly. During this same period, the U. S. Forest Service was conducting a program of land acquisition in the mountainous counties of Virginia which culminated in the creation of the George Washington and Jefferson National Forests. While the underlying objectives in this acquisition program were watershed protection and timber production, it was quickly recognized by Virginia conservation leaders that this vast public domain of more than a million and one-half acres offered an unparalleled opportunity to initiate a comprehensive system of wildlife management.

One of the first steps that paved the way and set an example for cooperative work on the Forests was the establishment of the Big Levels Wildlife Management Area on the George Washington National Forest. The wildlife rights on this area were ceded to the Federal Government by the General Assembly of Virginia. As a result of experiments tried on this area, plans were developed to be applied to other areas. Please remember that this was back in the period of 1935 to 1938.

Various techniques for financing the wildlife program on the Forests about this time were discussed. The sportsmen were approached to help form a plan to make the wildlife program on the Forests self-supporting. Thus a plan was devised whereby the sportsmen using the Forests were charged an additional

dollar for the privilege of hunting, fishing or trapping on the National Forest lands. This dollar, "National Forest Stamp" is still the basis for our financing the wildlife program on both National Forests today.

The "National Forest Stamp" in Virginia is sold by the regular license issuing agent, normally the County Clerk in each county. These stamps are handled in the same manner as any other license. The money is collected by the State but held in a separate fund. Each year the wildlife workers of the Commission and the Forest Service get together to make out the overall wildlife budget and work plans. This budget includes Stamp Fund activities (law enforcement, public relations, predator control and fish management) and Pittman-Robertson activities (habitat improvement work). We feel that a combination of both give us a well balanced program; one alone is somewhat unbalanced.

The first plans included the following: Game and Fish Law Enforcement, Wildlife Stocking, Fish Stocking, Emergency Feeding, Control of Undesirable Species, Recommendations to the Commission of Hunting, Fishing, Trapping Seasons, Game Census, Habitat Improvements, Closed Areas (in place of the name refuge), Research Projects and Educational Projects. In view of the fact that the stamp sales the first year, beginning July 1, 1938 and ending June 30, 1939, amounted to \$11,690.00, it was a rather ambitious program. Our stamp sales have grown from that figure until during fiscal year 1955, 65,000 were sold.

Ranger Districts were divided into Game Management Units and Game Managers were employed to work on these areas which vary in size from 10,000 to 80,000 acres. Due to financing, the program was rather small according to our eyes today that are accustomed to bigger and better things. Game Managers were employed only a few days a month, generally five to ten days at a salary of \$3.00 per day. Their jobs were planting shrubs and food trees, reclaiming old house sites, making very small clearings (which were called micro-habitats), predator control, and enforcement of Game and Fish laws. While these men might have been paid only a portion of the month, their law enforcement and predator control was carried on a great many additional hours at their own expense.

With the enactment of the Pittman-Robertson program a great boost was given to the wildlife program on the Forests. This provided for the expansion of the habitat improvement work and enabled us to have more stamp money available for protection work. This also gave a great deal of momentum to the deer restocking in the mountain areas. Some organizations and private individuals had started restocking deer as far back as 1932. Practically all the deer had been killed out of the mountains by hunting with dogs around 1900-1910. This gave the Game Managers a project to protect for which they felt personally responsible. Our records show that a total of 1,790 deer were released during this time. In addition we know that there were some deer released by private individuals for which we have no record.

Dogs and poaching were two main problems that had to be overcome to bring back the deer. Our Game Managers were local people who were in a position to know the people and earn their help to bring back "their" deer. In some areas, money was collected to purchase deer so that the local people would have a stake in the program. This is an excellent piece of psychological warfare to help protect the deer in areas that are being restocked. However, it takes a local person, high in the public opinion and with a great deal of public support to carry this out.

Our Game Managers were made Special Game Wardens at the very beginning of the program, and this is still true today. As Special Game Wardens, they enforce the Game and Fish laws in and adjacent to their Management Areas. This work is done with the cooperation and help of the regular State Game Warden living in the county. A few of our larger counties (800 to 1,000 square miles) have two State Wardens in the county. Since most of our mountain areas are in the National Forests, the State Warden has a co-worker to help him in his best game areas. There is no such thing as competition between the Warden and the Game Manager for getting cases. It is strictly a job of each man helping the other to get the job done—that of protecting the game and providing more recreation for the sportsman.

A general plan of the Game Manager's work plan at the present time is included in this report for general information. The work of the Game Manager is divided so that 40% of his time is spent on Stamp Fund Activities and 60% of his time is spent on Pittman-Robertson Activities. Each Game Manager keeps a daily diary of his activities. He is given a new diary each month, the form of which is very similar to the attached illustration of his yearly work plan. It is from this that our quarterly and yearly reports are composed.

YEARLY WILDLIFE ACTIVITY PLAN

<i>Class of Work</i>	<i>Stamp Fund—40%</i> <i>P-R Fund —60%</i> <i>Percent of Time</i>
STAMP FUND ACTIVITY	
LAW ENFORCEMENT AND PUBLIC RELATIONS	75% of 40%
Information Given	
Fire Warnings Given	
Licenses Checked	
Permits Issued	
Foot Patrol	
Auto Patrol	
Investigation and Court Cases	
MANAGEMENT	24% of 40%
Wildlife Losses Investigated	
Restocking Game and Fish	
Predator Control	
MAINTAIN IMPROVEMENTS5% of 40%
PLANS, INSPECTION AND MEETINGS5% of 40%
OTHER	
PITTMAN-ROBERTSON WORK	
ESTABLISH ENVIRONMENTAL IMPROVEMENTS ..	31% of 60%
Clearings	
Trails	
Salt Licks	
Other	
SEEDING	31% of 60%
Clearings	
Trails	
Other	
RELEASE AND PLANT	3% of 60%
Food Trees and Shrubs	
Other	
RESTORATION	16% of 60%
Clearings	
Trails	
Food Trees and Shrubs	
Other	
CLOSED AREA BOUNDARY	6% of 60%
Signs replaced	
Wire Repair and Replace	
Lines Marked	
GAME CENSUS	0%
TOOL AND EQUIPMENT STRUCTURES	5% of 60%
PITTMAN-ROBERTSON STRUCTURES	1% of 60%
PLANS, INSPECTIONS, MEETINGS	4% of 60%
OTHER	3% of 60%

The working arrangement between the Game Managers and the Wardens has been a most cooperative one. Both are full time State employees; one is financed by the Law Enforcement Division and the other by the Game Division of the Commission. The money collected by the courts as fines for violations of the Game, Fish and Dog laws is turned over to the State Literary Fund;

none is returned to the Commission. A part of each Warden's monthly report is a list of the convictions of violations of the Game, Fish and Dog laws. It is not required that the Game Managers turn in this report to the Law Enforcement Division. As a result, cases obtained by the Game Manager alone or in cooperation with the Warden are turned over to the Warden in whose county the case was obtained and convicted. In most cases, the Warden appears in court with the Game Manager to aid in the prosecution of the case. The Game Managers, being Special Wardens, are required by law to submit a quarterly report to the Law Enforcement Division listing their activities in relationship to law enforcement. Since the Game Managers are under the supervision of the Game Division and since we do not want an element of competition between the Wardens and Game Managers, all cases for record purposes are turned over to the Warden. At the same time, we do keep a different record of our Game Managers' participation in Game and Fish law enforcement. A report is submitted monthly to the Forest Supervisor's office of each case obtained by a Game Manager in his activities; helped the Warden obtain by patrolling together; helped work up the evidence as presented in court, or in which the Game Manager appeared in court to contribute to the case. As in the case of all Wardens, the ability of the individual in this type of work varies. Some of our Game Managers are listed to indicate the amount of their activity along these lines:

GEORGE WASHINGTON NATIONAL FOREST GAME MANAGERS (1938-55)

<i>Name</i>	<i>Years Worked Approximately</i>	<i>Total Game, Fish, Dog Cases</i>	<i>Total Fines and Court Costs</i>
R. D. Hodge	16	154	\$2,470.00
W. D. Wade	12 (Res. '52)*	113	2,065.00
G. B. Smith	14	85	1,844.45
C. E. Huffer	17	91	1,810.00
J. M. Wade	3	56	1,149.50
J. Miller	7	41	704.75
C. Higgs	7	13	185.00
J. G. Lightner	15	10	155.75
W. Fadely	3	8	124.50
G. Fisher	7	0	None

JEFFERSON NATIONAL FOREST GAME MANAGERS (1939-53)

C. R. Sparks	5	82	\$1,981.75
Fred Roop	16	44	1,289.50
V. C. Boone	15	47	799.25
Joe Rose	17	34	488.75
A. R. Ford	2	22	348.75
R. C. Webb	3	6	89.25
W. W. Ramsey	3	4	80.00

The Game Managers take part in the enforcement of all Game and Fish laws. The Game Managers and Wardens work together at night, so that no one has to work alone on night patrol. We have been very fortunate in not having any serious accidents as result of conflicts with violators in the western part of the State. We have had several close calls and one Game Manager ambushed and shot with fine shot. Two of our Game Managers have in recent years been promoted to County Warden positions in their county as vacancies have occurred. One Game Manager has been promoted to Associate Biologist because of his unusual qualifications.

We have several laws and regulations that have been put into practice since the program on the National Forest was started that have proven very helpful in protecting and bringing back our game in the mountain areas of Virginia. One of our big problems in bringing back the deer was in protecting the deer from free-running dogs. Our mountains do not have lakes, swamps or rivers that enable a deer to shake a dog from its trail. It was through dogging the deer that they were practically exterminated previously. This problem has been a big one for the Game Managers and Wardens; it is also a very difficult

* Now Warden, Augusta County.

one to handle. In some counties we have had wonderful cooperation, but in others we have been unable to do very much. As an example, the following law was in effect in Augusta County (1,006 square miles) as the deer herd was building up. The acts of the General Assembly of 1936, Chapter 319, page 519 provided:

"Unlawful for dogs to track or pursue deer or elk. Protect deer or elk by providing for the killing of any dog found to be or proven to have been pursuing or tracking any deer or elk; to provide hearings for owners of such dogs in certain instances and prescribing penalties; said act to be effective only in counties having more than 37,000 population and not more than 40,000, upon adoption by the Board of Supervisors of such counties."

This law was thought to be a little too strict by the public in the county after the deer herd was established, and was changed in 1944 to make it unlawful for any person to permit or allow or fail to prevent his dogs from chasing deer or running at large on National Forest lands from April one through September one, both inclusive, of any year. Anyone found guilty of this provision shall be punished by a fine not less than \$5.00 nor more than \$25.00 on the first charge, not less than \$25.00 nor more than \$50.00 on the second charge, and on the third charge, a fine of \$50.00 and the Game Warden shall destroy the dogs or deliver the dogs to an individual in some county that allows hunting of deer with dogs, on condition that the dogs not be returned to the county in which the offense occurred. In 1947 a second county, Smyth County, was covered by this law also.

Another regulation which has been of great benefit in increasing the game on National Forest areas is what we call our "cased gun law." In the opinion of our Wardens and Game Managers, this is one of their best tools. This regulation was passed by the Commission and the portion covering the cased gun is quoted as follows:

"* * *. The foregoing shall be subject to the provision that it shall be unlawful to have in possession any firearms in National Forest areas during the general closed hunting season, except that this provision shall not apply to persons holding permits from the Commission authorizing possession in such National Forest areas or to officers of the peace while actually engaged in the performance of their duties as such, or to persons transporting firearms across such lands if such firearms are unloaded and cased or otherwise dismantled. For the purpose hereof the word "possession" shall include having a gun in one's car or other conveyance while on the above mentioned area. * * *"

This regulation is generally accepted by the public as necessary and worthwhile for the protection of our game.

A useful tool in carrying out the protection of our game and fish has been our ability to search automobiles without obtaining a search warrant. This is provided by Section 19-33 of the Code of Virginia (1950). It states:

"Provided, however, that any officer empowered to enforce the game laws may without a search warrant enter for the purposes of police inspection any freight yard or room, passenger depot, baggage room or warehouse, storage room or warehouse, train, baggage car, passenger car, express car, Pullman car or freight car of any common carrier, or any boat, automobile, or other vehicle, but nothing in this provision contained shall be construed to permit a search of any occupied berth or compartment on any passenger car or boat or of any baggage, bag, trunk, box or other closed container without a search warrant."

This law might come as a surprise to some other states; it does to our own State Police as this is a power not normally given to law enforcement officers. It comes in very handy for inspecting the trunk of an automobile that is suspected of containing illegal game or fish.

It has long been a tradition in Virginia to hunt squirrels during September. To have or not to have a September squirrel season is a very controversial subject. Biologically speaking, we should not have a season until around October 15. This is approximately a month before our opening of the general hunting season. The wildlife workers in the National Forest areas thought

that by allowing hunters in the woods with guns during September resulted in a pre-season loss of turkeys and grouse. Through the efforts of the wildlife workers, the public was educated to the point of view that an early squirrel season was bad for wildlife. This thinking is by no means uniform throughout the western part of the state, but there is no early squirrel season on National Forest lands. In some areas the turkey population is on a very definite increase to which the local people attribute the elimination of the early squirrel season.

A good measure of the success for the protection of the deer herd is shown by our deer kill. In areas that had no deer 15 years ago, we are now developing problem areas from deer damage to crops and the forest. By regulation of our Commission, it is required that all deer, bear and turkeys killed must be checked at a big game checking station. These stations are scattered at convenient places through the counties and are run on a voluntary basis. While we know that we do not get all of our big game checked, it does give us a very good idea of how our harvest is going. We do think that of the deer, bear and turkey killed, we get the most accurate check on the deer kill. This technique, now employed state wide, was started in our National Forest Counties.

DEER KILL IN NATIONAL FOREST COUNTIES OF VIRGINIA

	1946	1947	1948	1949	1950	1951	1952	1953	1954
No. counties open to deer hunting	22	25	25	27	27	27	27	27	27
No. deer killed	1,366	1,341	1,729	1,968	2,273	3,485	5,591*	5,256	7,463*

While our deer kill has been increasing each year, our bear kill has shown a very steady increase. Where or why is subject to much discussion by the bear hunters as well as the wildlife workers. It is felt, however, that our protection from dogs and help of our cased gun regulation, the bear have been helped a great deal. Some 15 to 20 years ago, it was not unusual for bear hunters to hunt a week to jump a bear, whereas now it is frequently possible for bear hunters to jump two or three bears in one day. It might be added here that bear hunting with dogs is permitted after the deer season, and the bear season lasts approximately six weeks. During the 1954 season a minimum size limit of 100 pounds was placed on bear. This was in an attempt to prevent the killing of cubs. This size has been reduced to 75 pounds for the coming 1955 season. We have a few bear killed in the vicinity of the Dismal Swamp (Southeastern part of the State), but approximately 98% of the kill comes from the National Forest areas.

VIRGINIA BEAR KILL AS CHECKED AT BIG GAME CHECKING STATIONS

Year	Kill
1954	270
1953	359
1952	327
1951	148

In summarizing, it would be well to point out that the Game Managers working on the wildlife program are not habitat improvement men alone. It is a combination of protection and habitat improvement that gives a well-rounded program. Several laws and regulations tried out on Game Management areas on National Forest lands have been adopted statewide. It is thought that the protection of restocked deer has been the main reason for the steady and rapid increase in the legal kill. The only areas in which our restocking has failed were those having little protection. The bear kill is on the increase. Whether it can continue to increase, we do not know, but we feel that protection has been the main reason for this increase. Our turkeys are on the increase which may be due to several factors such as our habitat improvement and a series of good nesting seasons. However, we feel that our cased gun law, elimination of the September squirrel season and protection from free-running dogs have had a great deal to do with it.

* Hunters' choice season on last day of season.