

THE HISTORY
OF THE
VIRGINIA DIVISION OF FORESTRY
1914 - 1981

CHAPTERS I THROUGH VIII

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CHAPTER X

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I.- FORESTRY BACKGROUND AND BEGINNINGS OF ORGANIZATION

The importance of forest products, forests, and forestry in the total economy of the Commonwealth of Virginia has been great even from the earliest days of the colony, although the history of an active effort to "do something about it" dates back only some forty short years. The writings of the earliest days of colonization remark the "vast forests of oak and pine" in this new country, which doubtless applies mainly to the Atlantic seaboard and the bays, estuaries and tidal rivers first seen by the settlers at Jamestown Island and elsewhere in "Tidewater Virginia." One should take note of the wording-- "vast forests of oak and pine." The original forests of that area apparently were mixed forests. The pure stands of yellow pine, so typical of later days and even of today, were the result of a sort of 'accidental forestry' which was to follow as a result of early agriculture, war, sociological changes, and their resultant upsets of the economy of the state. This 'accidental forestry' was to play an important role in the future of the Commonwealth and in the Reconstruction following the upheaval of the sixties.

The first objective of the early settlers, of course, was subsistence, which meant clearing land for agriculture -- a sort of negative forestry, perhaps, but forestry none-the-less, as it was an effort to balance the land-use economy. Even through this phase, the forest products industry was growing, for timbers were being shipped back to England. Statistics, of course, are missing, but we find that in 1839, the earliest year for which we find statistical data, the dollar value of lumber produced annually in Virginia was in excess of half a million, that this annual dollar value of lumber cut nearly doubled in the decade following, and that by 1859 it had grown into a business in excess of \$2,200,000 annually. These, we must remember, were dollars, not the inflated currence of 1952 and must have represented a very material portion of the total state income of the time.

The Forestry Economy of the Post-war Years

Through the later colonial days and the statehood days up to the outbreak of the Civil War, agriculture had played a large part -- perhaps an abnormal part -- in the Virginia economy. True, industries were developing, but with slave labor available the mainstay, at least east of the Blue Ridge, was agriculture -- the vast plantation. And it was cash crop agriculture on a large scale. Tobacco was king. Other crops were mainly for subsistence.

Changing times even before 1860 were making slave labor rather less profitable. Lands devoted to tobacco growing for years were wearing out. The abandonment of land from cultivation had long since begun, although this was offset to a rather great extent by the clearing of new land. With the end of the war in 1865, Virginia devastated and impoverished by war, was without the necessary labor to operate its vast acreage of agricultural land, and land abandonment was wholesale. Those abandoned fields in eastern Virginia made ideal seed beds for loblolly pine in the coastal plain and shortleaf in the Piedmont, and through this means grew up the pure stands of pine which became typical of the region. Since some limited abandonment of worn-out fields had been going on for many years, eastern Virginia already had a considerable stock of merchantable yellow pine in pure stands.

The lumber industry grew apace. By 1869, with which pine king and lumbering centered in New England, New York, Pennsylvania and Michigan, Virginia was producing 144 million board feet of lumber annually, mainly yellow pine, ranking twentieth among the states in production. Ten years later, with centers of production rapidly shifting to the Lake States, Virginia had climbed into sixteenth place with her production more than doubled.

Through the succeeding years, with the end of heavy production in the Lake States and with new centers of production in the Pacific Northwest and in the deep south, production of lumber in Virginia grew steadily to a peak of more than two billion one hundred million board feet in 1909. About seventy percent of this production was pine. A hardwood lumber business was well under way in the mountain section of the state but the principal lumber business of eastern Virginia was then, as it still is, pine.

Whether the passing of this peak of production was responsible for an interest in forestry which began to grow at this time is problematical. Probably this had a stimulating effect, but it is unlikely that it was the principal cause. The public thinking nationally was directed at conservation at about this time. Protection and forest fire control were beginning to attract attention. The Weeks Law, directed at the protection of navigable streams, was enacted by the Congress in 1911, and this law, among other things, provided for the first Federal-state cooperation in forest fire control. This general trend of public thinking may have turned the attention of Virginia lumbermen and conservationists toward the condition of Virginia's forests; toward the fact that these forests supplied the raw material for one of the state's major industries, and that good tracts of mature pine timber were not as easy to find as they had been for a decade or so before. Whatever the cause, public spirited Virginia citizens did begin to think about the problem and their deliberations bore fruit in 1914. By that time, annual lumber production had dropped (1913) to a little more than a billion and a quarter board feet -- approximately the production of today. With some fluctuations, production continued to decline until it leveled off some seven years later at about nine hundred million board feet, to slump more sharply in the economic crisis of the early thirties. Thus we may see that forestry action in Virginia did not await disaster before becoming effective. But it did follow closely upon the heels of the first slump, and a certain amount of timber shortage no doubt was a stimulating factor.

Establishment of the Office of State Forester

Forestry thinking prior to 1914 had reflected itself in the enactment of certain forest fire laws, many of which are the basic laws of today. Some of these laws date back almost to the turn of the century. But there had been no organized enforcement agency. Probably the spearhead of sentiment for a forestry department was Tom M. Gathright, a large landowner on Jackson River in Alleghany and Bath counties.

The General Assembly of 1914, under Governor Henry C. Stuart, created the Office of State Forester, under the State Geological Commission. The Commission was charged to "observe, keep in view, and, so far as it can, ascertain the best methods of reforesting cut-over and denuded lands, foresting waste land, preventing the destruction of forests by fire, the administering of forests on forestry principles, the instruction and encouragement of private owners in preserving and growing timber for commercial and

manufacturing purposes, and the general conservation of forest tracts around the headwaters on the watersheds of all water courses of the state."

The administrative and investigative duties of the State Forester were defined as follows:

"The State Forester shall have the supervision and direction of all forest interests and of all matters pertaining to forestry within the State; he shall have charge of all forest wardens who may be appointed by said commission, and the appointment, direction, and superintendence of the persons and laborers whom the commission may deem it necessary to employ to perform labor in the forest reservations or the nurseries herein provided for; he shall take such action as is authorized by law to prevent and extinguish forest fires; he shall enforce all laws pertaining to forest and woodlands; prosecute any violation of such laws; collect information relative to forest destruction and conditions; direct the protection and improvement of all forest reservations; make the investigation required by section seven of this act with reference to the streams and navigable rivers within and bordering upon the State, and report in writing with regard thereto to the said commission; cooperate with landowners as provided in section eight (thirteen) of this act; and, as far as his duties as State Forester will permit, carry on an educational course on forestry at the University of Virginia for credit toward a degree of farmers' institutes and similar meetings within the State. He shall also recommend to said commission and prepare for its use plans for improving the State system of forest protection, management, and replacement, and prepare for said commission, annually and also whenever required so to do by said commission, a report on the program and conditions of State forest work."

It will be noted that the State Forester was charged with the duty of carrying on an educational course on forestry at the University of Virginia. This cooperative relationship between the University of Virginia and the office of the State Forester led into an arrangement which lasted until 1928, whereby the State Forester did carry on such a course. During that period the University of Virginia paid one-half of the State Forester's salary, the other half being received from forestry funds. Since 1928, the State Forester has been completely divorced from his teaching duties, but Virginia Forest Service still continues to have the headquarters office at the University of Virginia and to that extent the old relationship between the Virginia Forest Service and the University of Virginia, set up in 1914, still exists.

The enabling act of 1914 also contained this provision:

"Prior to the meeting of the General Assembly of Virginia in nineteen hundred and sixteen, the commission herein provided shall organize and put into operation the purposes of this act, and the expenses incurred by this organization and its operation for that period of time shall be paid out of the budget of the University of Virginia." Pursuant to this provision, the University of Virginia made an allotment of \$5000 for the general expenses of the work for the first year. The Geological Commission appointed as State Forester Mr. Chapin Jones, who took office on March 1, 1915, and began the job of organizing the work.

The first year's work under State Forester Jones was necessarily mainly informative, and during that first year a policy began to shape up which was expanded and developed up to this date with no major basic changes. Just as at this date, the effort was directed at (1) forest fire control, (2) practical assistance to landowners, (3) demonstrations in forest management, and (4) the encouragement of tree planting. In addition to these, an outline was drawn up for county forest resource studies, an activity which was later discontinued. However, through the years of effort along this line a considerable number of such studies were made and worthwhile informative bulletins published. These provided information on timber stands not supplied by any other source. All are, of course, sadly out of date now and are interesting mainly for historical reasons, just as the latest Forest Survey reports will be obsolete in a dozen years or less.

Chapin Jones in 1915 was not only the State Forester -- he was the whole Forest Service. He initiated a forest fire prevention campaign by having a series of five posters printed, on cardboard for indoor use and on cloth for outdoor posting. All five contained considerable reading material and were the "stop and read" type, somewhat like our present "law" posters. Much highway travel then was behind old Dobbin and 50 MPH posters were not indicated. As to distribution, we find that one poster was sent each postmaster in Virginia, and that the Norfolk and Western Railway volunteered to distribute one thousand of them along its lines. Posters were mailed to all who requested them, and in this manner nearly 20,000 posters were distributed.

Late in the year the U. S. Forest Service cooperated to the extent of \$100.00 in the printing of 36,000 posters in 24 subjects. These, too, were rather verbose, but why worry? Travel was still nearer 6 miles per hour than 60. Undoubtedly these posters did much to develop the increasing fire consciousness of the people in the state.

Nine press bulletins were released to all newspapers and three special articles were written for magazines published in Virginia. Seven of these releases dealt with fire control, two with planting and gully control, and the three magazine articles had to do with the new venture of the State in forestry.

Other "I & E" activities included the publication of six leaflets and six lectures, of which four were illustrated with lantern slides. Leaflets included compilations of forestry and forest fire laws, and plans for forest fire protection in Virginia, assistance to owners of forest land, and the aims of the new forestry department.

During the year, cooperation under the Weeks Law was established with U. S. Forest Service on an annual allotment of \$2000 "to pay the salaries of patrolmen and watchmen." Patrol work was started in the fall of 1915 in two districts in the southern part of Smyth County, western Grayson County, and the southeastern part of Washington County. Cooperation within that area was affected with Douglas Land Company of Marion, Virginia, and Hassinger Lumber Company of Konnarock, who cooperated to a financial extent "at least equal to the patrolmen's salaries" in the construction of fire lines along the top of Iron Mountain. These lands first patrolled under organized Virginia protection have long since been acquired by the U. S. Forest Service and are now a part of Jefferson National Forest.

County cooperation was offered in 1915 but no counties participated that year. However, three counties were lined up for 1916 patrol work, these being Norfolk, Chesterfield and Appomattox. County appropriations varied from \$75 to \$300 per year, with Norfolk putting up the larger amount. The following quotation from the Administrative Report gives a good picture of early efforts: "The patrolmen will be required to furnish their own horse and buggy, and it will be their duty to spend their entire time during the dangerous seasons driving throughout their districts, posting many warning notices, explaining the laws to everyone, and urging to be careful with fire." Also, of course, these patrolmen fought all fires they found, but their principal duty and value was educational and investigative.

During the year warden commissions were issued to nineteen persons, including the two patrolmen on the Smyth-Grayson-Washington project and 17 U. S. Wardens in Warren, Shenandoah, Page, Rockingham and Augusta counties. These 17 U. S. Wardens deserved special commendation, for they agreed to fight fires in the privately-owned areas without pay. The law permitted payment for warden service but no appropriation had been made.

In the field of management the State Forester found time to make examinations of 15 forest properties averaging about 200 acres each in Albemarle, Orange, Campbell, Pittsylvania, Halifax, Spotsylvania, Mecklenburg, Nottoway and Chesterfield counties. A thinning demonstration was held near South Boston, and an agreement entered into with Thomas F. Jeffress establishing a demonstration forest upon his "Meadowbrook Farm" in Chesterfield County. A cutting was marked and tallied in mature timber and the timber offered for sale.

The State Forester's report urged the establishment of a state forest nursery and the acquisition of state forests. We shall find that the first of these recommendations was acted upon quite promptly, but of course not in 1915.

Thus did the work of the Virginia Forest Service begin on March 1, 1915, and continue as a one-man effort throughout that year. That year is important because the State Forester was laying the foundation stones for the building of the organization. He wisely foresaw that the first duty of the State Forestry organization was the necessary though disagreeable chore of forest fire control. He envisioned a program of practical assistance to landowners, which was to bear fruit only sketchily until more than a quarter of a century later, but the foundation stones were there. He encouraged in his plans the establishment of a forest tree nursery and the encouragement of tree planting. This project was to get under way more quickly. He also envisioned demonstrations of forest management which were later to bear fruit in a system of state forests.

The first year's work, and in fact the first several years' work, had to be accomplished on a very low budget. However, the framework of plans put together in 1915 have been flexible and have lent themselves to application to all of the work and expansion which has come since. This first framework has had to be augmented somewhat, but in all the years since there has been no direct change. Virginia Forest Service still stands on those original foundation stones.

II - EARLY GROWTH OF THE VIRGINIA FOREST SERVICE

1916 - 1917

The General Assembly of 1916 apparently was impressed with the beginnings of forestry work in Virginia. At any rate, they appropriated \$10,000 per year for its continuation and development. The University continued to furnish office space, light, heat, etc., plus the first nursery site. As a part of this development, Walter G. Schwab became Assistant State Forester in May of that year.

The first nursery was established in December 1916, and in the spring of 1917 the first seed was sown. Loblolly pine, shortleaf pine, white pine, and Norway spruce were the species grown, most of the beds being loblolly pine. The inventory given as of the end of the year was 200,000 one-year seedlings.

To provide the initial money for a nursery Mr. J. P. Taylor, a large landowner in Orange County, and a tobacco dealer in Richmond, contributed some \$500.00. Mr. Taylor subsequently planted some 650 acres of land in various species. Today, these are some of the oldest and finest plantations in the State.

To meet the extra work load, W. B. Dunwoody was employed as Assistant Forester, but he entered the Army shortly thereafter, and was replaced by G. D. Marckworth, who likewise entered the armed forces within two or three months. So the end of the year came with one vacant position.

In 1916, a cooperative forest fire control agreement was made with Clinchfield Coal Corporation and W. M. Ritter Lumber Company in Dickenson County. On this project, which followed initial efforts already begun by these companies on some 70,000 acres, two patrolmen were employed and local wardens were appointed. Each warden headed a fire suppression crew, and the companies arranged to pay wages of the crew members. The wardens, of course, were paid by the Virginia Forest Service. This plan was at variance with standard procedure, which was based upon volunteer fire fighters.

In 1917, two more large cooperators came into the cooperative forest fire control field -- Virginia Coal and Iron Company in Wise County and Round Mountain Mining and Manufacturing Company in Bland. The first wooden tower on Little Stone Mountain near Big Stone Gap was built that year and was in service until 1934 when the present steel tower was built by CCC and put into service. The original tower stood at a point six or seven hundred yards to the southwest of the present structure.

Clinchfield Coal Corporation and the W. M. Ritter Lumber Company built three towers to cover the area, one of which was later abandoned. Keel and Nealy Ridge towers are still on the original locations, but the original wood towers were replaced by steel in 1928.

Round Mountain Mining and Manufacturing Company had previously (about 1914) established forest fire protection, and had built a wooden tower on Round Mountain. Cooperation on a similar basis was established with this company on its holdings of some 50,000 acres in Bland County.

The list of patrolmen for 1916-17 has forty-five names. The local warden list had begun to grow. Fourteen counties were cooperating in 1917 on a county basis, and in addition, cooperation with landowners as outlined above included five large properties in Southwest Virginia. An attempt was made to compile statistics on forest fires for the entire state by adding figures given by volunteer reporters in the unorganized territory to those received from forest wardens and from U. S. Forest Service. Certainly, this gave a very sketchy coverage, but for 1917 the following figures were compiled:

Number of fires - 1,460

Causes:	Lightning	2%	Campfires	4%
	Railroads	19%	Incendiary	5%
	Lumbering Opera-		Miscellaneous	7%
	tions	18%	Unknown	18%
	Brush Burning	27%		

Area burned	305,000 acres
Total damage	\$809,000
Lives lost	2

The standard of county cooperation was a sharing of expense on a 2-1 basis to finance a chief warden, several district wardens, and within each district, local wardens or crew leaders. Help in fighting fires was calculated to be on a volunteer basis. Necessarily, the greatest work of this organization was prevention, but it did a good job in stimulating fire consciousness. Also, this flimsy suppression machine did actually stop a good many fires.

Assistance to landowners was rendered in 52 cases during the biennium, averaging about 200 acres each. These consisted mainly of advice given, in about the same measure as is provided in our present reports, with some effort, too, toward bringing buyer and seller together. Also, a list of sawmill operators was compiled. This must have been a fairly complete coverage, since the list comprised about 3500 names.

The State Forester also assisted in National Defense, one project being assistance to the War Department in the enlistment of woodsmen, sawmill operators, and foresters in the 20th Engineers, one of the forestry regiments of World War I.

1918-1919

By 1918, the work of the Virginia State Forester was well established and the organization had begun to grow, slowly but surely. The vicissitudes of war and of the war boom were being felt, as the biennial report notes that the Assistant State Forester (Walter Schwab) resigned early in May 1918 "to accept a much higher salary than allowed here," and a qualified successor could not be secured until January 1919. The new Assistant State Forester was Alfred Hastings, a name well known among State Foresters. The report also notes that the Assistant Forester, who left to join the Army in 1917, did not return to duty and his place was filled in December 1919. Wilbur O'Byrne was the new assistant. The report also mentions the difficulties encountered in the effects of war "increasing the costs of all labor, supplies, etc. and increasing the difficulty of securing the services of men

of the high type employed as Forest Patrolmen." Verily, the effect of wars is always the same.

Fire control progressed to 19 cooperating counties in 1918 and 20 in 1919. The expenditures in forest fire protection in 1918 are given as:

U. S. Forest Service (Weeks Law cooperation)	\$3,178.74
Office of State Forester	3,369.02
Counties	<u>1,800.50</u>
TOTAL	\$8,348.26

The 1919 expenditures were approximately the same - some \$250.00 higher.

The 1918 fire seasons were apparently rather severe, with 1919 just as much the other way. An effort was made both years to summarize the fire occurrence throughout the state by volunteer observations. Listed in the summary are 1920 fires in 1918 and 354 in 1919. Total acreage burned was 98,869 in 1918 and 32,379 in 1919. Even in light years the average ran close to 100 acres per fire. Brush burning caused 15% in 1918 and 19% in 1919. Railroads accounted for 14% in 1918 and 28% in 1919. These were the principal causes, but it is interesting to note that 48% of the 1918 fires and 25% of the 1919 fires were listed as of unknown cause.

The nursery established in 1916 was continued and a total inventory of 25,730 seedlings and transplants was given for the end of 1919. The first inventory, apparently, was optimistic.

Note is also made of an agreement made with the Extension Division for cooperation of the two agencies in demonstrations in the practice of farm forestry. The State Forester became also Extension Specialist in Farm Forestry in Virginia. He or his staff was to conduct demonstrations in the proper practice of forestry on farm woodlands in cooperation with County Agents. The Extension Division allotted \$500.00 per year for travel expense, but entered into no salary obligations. Activities included speeches at several agricultural meetings and demonstrations in Franklin, Henry, Appomattox, Prince Edward, James City, and Loudoun counties. Unfavorable weather kept most of these (which were held in January, February and May) from coming up to expectations.

The Gallion State Forest was acquired under the will of the late Emmett D. Gallion in 1919. This was the first state forest land acquired, and for many years this was to be the only state forest. It consisted of 588 acres in Prince Edward County.

In spite of the handicap of lack of staff, the office of State Forester was able to examine some 3,600 acres of forest land for 18 co-operators. Much of this work was marketing assistance. One of those for whom an examination was made was Dr. W. M. Seward, of Brunswick County, upon whose bequest the University of Virginia now has Seward Forest, a research unit with headquarters at Triplett.

1920 - 1921

During the 1920-21 biennium, the office of State Forester began to grow in earnest. Prior to that time the management of the entire organization was from headquarters, with an authorized personnel consisting of the State Forester, Assistant State Forester, and Assistant Forester, with vacancies persisting in the secondary positions for a considerable time due to war-time man-power shortage. Thought was given to a district organization during these years and a tentative ultimate set-up of seven districts adopted. In the fall of 1921, two of these districts were established; one with Petersburg headquarters embracing sixteen counties in the southeastern part of the state, and one with Bristol headquarters with twelve counties in the southwestern part of the state. The administrative report states that these new District Foresters were in charge of all forestry work in their respective districts, -- "with special emphasis at first on fire protection."

For the Petersburg post, Alfred Akerman was appointed. Akerman was identified with the State Forester's office for several years, later becoming Associate Forester in charge of the nursery. Later he worked in other states and finally returned to the University of Virginia as Professor of Forestry.

To fill the Bristol District Forestership, Fred C. Pederson was appointed. With the exception of one year, Fred was destined to give the rest of his life to Virginia Forest Service, and to his long years of service, to his unselfish love of this organization and what it stands for, to his genius for organization and for making a few dollars go a long way, and to the unusual spirit of loyalty he engendered in all those associated with him, is due in no small part the success of the Virginia Forest Service of today.

By 1921, the state appropriation for the work of the office of State Forester had increased to \$16,920 per year. The more spectacular increase, however, was in the Federal allotment under the Weeks Law. This grew from a mere \$4000 to \$18,200. This of course was entirely for cooperative forest fire control, and in order to match this, the greater part of the state expansion had to be in the protection work. This was both logical and fortunate. Forest fire protection had to be the first step, and the fall season of 1921 ended with 43% of the State under some kind of organized protection. This represented considerable expansion from earlier years. From 19 cooperating counties at the beginning of 1920, the territory grew to 38 counties at the end of 1921. Over and above this was cooperation with four corporations in Southwest Virginia, which probably represented the most intensive portion of the pattern of protection.

The total of the amounts appropriated by the 38 counties was \$6,036.00. The plan of organization within the county was a skeleton warden set-up; Chief, District and Local. The Chief Forest Warden headed the county organization, but delegated a great part of available prevention time to his District Wardens who posted, visited schools, and kept the Local Wardens on the ball within their respective districts. The Local Wardens were minute-men, designed to provide leadership in fire fighting and utilizing volunteer help. This system worked surprisingly well, thanks to the devotion to duty of the wardens, then, no less than now.

Obviously the main effort, then as now, was on prevention. This, through the years, proved to be a wise policy. The District Warden set-up may now seem cumbersome, and it was. But it was a necessity of the times, because of a lack of good roads and travel facilities. In illustration of this, consider Buchanan County in the Bristol district. The District Forester in order to work this county, found it necessary to drive to Bluefield (100 miles) by Model T. travel by rail to DeVonn, West Virginia, spend the night there, catch a log train to Grundy in the morning, hire a mule and spend the rest of the week in the saddle with said mule in mud often half way to his knees. To get back out to base was a reversal of the trip in.

So District Wardens were justified. Good roads and better cars came soon, however, and with their coming the District Warden plan was eliminated. The Chief Forest Warden then became the principal working cog in the machine.

During this biennium the State Forester successfully defended a suit by the heirs of Mr. Gallion to set aside his will, and title was perfected to the Gallion State Forest. This forest was mapped, boundaries established, etc.

Publications included the Administrative Report, a forest fire prevention bulletin by Hastings, the first Forest Wardens' Manual by Hastings, a planting bulletin and list of stock available, and a bulletin on "The Forests of Russell County" by O'Byrne. This was another in the series of county studies which had been initiated earlier.

This nursery was continued and in the spring of 1921, 7,920 trees were distributed. In the fall of the same year 4,734 more were sent out, making a total of 12,654 for the year. The nursery inventory at the end of the year 1921 was given as 49,415 seedlings and transplants -- a considerable expansion.

1922 - 1923

In 1922 and 1923, growth was slow but sure. The State appropriation for each year was \$18,000 -- up from \$16,920 the last year of the preceding biennium. Not a big increase, it is true, but an increase nevertheless. The State Forester continued to also act as Professor of Forestry at the University of Virginia and as such, to teach one class in forestry at the University.

During the biennium, studies were underway on the southern white cedar of the Dismal Swamp, on the forests of Wise County, on the forests of Lee County, the forests of Brunswick County, and other projects in cooperation with U. S. Forest Service. Publications included a bulletin on the forests of Russell County by O'Byrne, one on "The White Cedar of the Dismal Swamp" by Akerman, the usual Administrative Report, nursery announcement, etc., and, what is probably most important, the first edition of "Common Forest Trees of Virginia." This last has stood the test of years and is still in considerable demand. It has gone through many printings.

Assistance to landowners was confined to such examinations as the staff could attend to when not tied up with fire and other duties. The number of cases was necessarily low. Fire control was the big problem.

Organized fire protection, on the warden system with volunteer fire fighters, was extended during this biennium to fifty counties. Exceptions to this skeleton organization occurred in associations of timberland owners in Tazewell and Rockingham counties, and in independent cooperation with Clinchfield Coal Corporation and the W. M. Ritter Lumber Company in Dickenson. In these areas, private contributions, with matching state and federal funds bolstered up the basic system, provided lookout service, and in some cases, at least, made possible the employment of fire fighters in remote areas where volunteers were not available.

The volunteer system did yoemen service in the early days, and to those public spirited citizens who helped the wardens out enough credit cannot be given. But, by 1924 the system was beginning to crack in the weak spots. Generally speaking the average citizen would gladly help out if a neighbor was in danger of being damaged, but he'd be durned if he was going back on that "Big Survey" for two or three days to stop a fire on lands belonging to some non-resident owner or "the Company." Hence, the protection offered large areas of 50 to 150 thousand acres was pretty sketchy unless the owners were willing to put up the additional funds to provide for paid fire fighters.

The report for this biennium estimates 1,019 fires in 1922 burning 219,156 acres; and for 1923, 897 fires burning 137,807 acres. However, the data is admittedly inaccurate. Surely the number of fires must have been greater. Probably a lot of small ones were unreported.

The nursery was continued at the old site. The tree seedlings distributed totaled 31,240 in 1922 and 28,546 in 1923. The spread of species distributed is indicative of the experimental aspects of the nursery at that time. About one-half the out-put was Scotch pine, with only about two thousand seedlings of loblolly pine per year. Other species included white pine, Norway spruce, Douglas fir, Japanese larch, catalpa, locust and other hardwoods and conifers. The nursery inventory at the close of 1923 was 61,000 seedlings.

The cooperative effort with the Extension Division was continued on a relatively small basis, but a groundwork of cordial relations with county agents was established.

Gallion State Forest was surveyed, and a topographic map, type map, and preliminary working plan established.

1924 - 1925

During the 1924-25 biennium growth of the organization as measured by the State appropriation was at the same old pace -- up from \$18,000 in 1922 and 1923 to \$19,960 in 1924 and \$20,240 in 1925. But appropriations are a poor yardstick for growth, especially when applied to a young organization. Other factors are significant, even from a financial standpoint.

One milestone of the period was the enactment by the Congress of the Clarke-McNary Act, with added assistance to the states in forest fire control. The first allotment of Clarke-McNary funds became available July 1, 1925. One effect of this was the expansion of the cooperative forest fire protective association idea. Three such associations had been organized previously, the Rockingham, Tazewell-Buchanan, and Alleghany-Bath. Within six months, two more associations, the Wise-Lee and Bland-Smyth, had been formed and the total membership acreage was built up to 364,983 acres. The

older associations had been reinforced and strengthened generally.

More than half of the one hundred counties of the state were under protection, -- 53 counties in 1925. These counties embraced a total forest acreage amounting to approximately 62 percent of that of the state, exclusive of the half million acres protected by the National forests. And these 53 counties were voluntary cooperators. Each made an annual appropriation for forest fire control, ranging from \$75.00 in Clarke County in 1924 to \$400.00 in Wise. No county appropriated less than \$100 in 1925. These appropriations theoretically created for each county a budget of three times the amount appropriated, since all expenditures within the county were charged 1/3 against the county appropriation and 2/3 against State and Federal funds. All outside supervision, supplies and the like, were provided from State and Federal funds, with the county budget applying only to the wages and travel of Chief Wardens, District Wardens, and Local Wardens. There was still no provision for paid fire fighters. The need for this was beginning to be felt more strongly.

The fire records for this period are more dependable than those previously given, for they include only the fires actually reported from the organized territory. Previously, estimates had been used for the non-co-operative counties, which were susceptible of considerable error. Here they are in digest form:

	<u>1924</u>	<u>1925</u>
No. counties cooperating	52	53
No. fires	796	1,332
Area burned (acres)	122,873	212,527
Average fire (acres)	258	159
Approximate percent burned	1.28	2.22
No. prosecutions	51	78
No. convictions	48	61
Total cost of Forest Fire Control	\$39,342.38	\$43,732.27

Other milestones we should note are the achievements in physical improvements (8 towers; 41 miles of telephone line), equipment (7 pairs of binoculars; 43 Rich fire rakes), and the beginning of the registered crew idea (8 crews of 8 men each). All of these "extras" were on association areas, financed by association funds. The pledge of assistance signed by registered crew members contained no mention of pay. We have many times paid tribute to our warden forces, past and present. This is fitting, fair and just. But let's again say our hat is off to those 64 original registered crew members, buck privates in the fight against fire! Where could we find such crusaders today?

Some important changes in personnel occurred during this biennium. Fred Pederson resigned as District Forester in Bristol in the fall of 1923 to enter private employ in the lumber business. He was replaced by Harry Lee Baker, Baker resigned in the summer of 1924 to become Assistant State Forester in North Carolina and Fred Pederson returned to his old job in Bristol.

In the summer of 1925, Alfred Hastings resigned as Assistant State Forester to assume duties with the Division of State and Private Forestry, U. S. Forest Service, and Pederson was promoted to replace him. Sam Suiter, Chief Forest Warden of Bland County, was given the title of District Agent and assigned the Bristol District until such time as a new District Forester

should be appointed. To all intents and purposes Sam was a district forester, and a good one. He guided the destinies of the Bristol District through two fire seasons and performed yeoman service in the organization of two associations.

Beginning July 1, 1925, Wilbur O'Byrne became Extension Specialist in Farm Forestry with headquarters at Blacksburg. As such, his salary was paid jointly by Virginia Forest Service and the U. S. Department of Agriculture, and his travel expenses were paid by V.P.I.

This left vacant the nursery position of Assistant Forester, which was filled by the promotion of Alfred Akerman, then District Forester at Petersburg. Affairs in the Petersburg district were taken care of by foresters from headquarters, and by J. P. Andrews, who had previously been employed six months of each year. Late in 1925 Jim became a full time District Forester and moved to Charlottesville early in 1926. Thus an appointment as Forest Warden in the earliest days of the organization bloomed into a full time professional relationship.

The nursery still was maintained at the old site and continued to grow. Seedlings distribution in 1924 was 23,454 and in 1925, grew to 38,290. We are told that the nursery grew "native species, mainly," but details are lacking. This apparently was a change from the previous biennium when the inventory ran heavily to Scotch pine.

The Gallion State Forest was hampered by lack of funds for repairs and development. It is noted that through agreement with John J. Owen, Assistant Commissioner of Agriculture, and his son, T. Venable Owen, Chief Forest Warden of Prince Edward County, the open fields were rented to them for agricultural purposes, and Venable Owen acted as caretaker. Those "open fields" are now 20-year old plantations, most of which are about ready for their first thinning.

1926-1927

The General Assembly of 1926 increased the State appropriation for forestry work by 50 percent -- a \$10,000 increase, bringing the annual appropriation to \$30,000 per year. Also this General Assembly revised their basic law in such a manner as to provide that "forest wardens shall employ such persons and means as they deem expedient to extinguish forest fires, and that it shall be the duty of the Boards of Supervisors to issue warrants for the payment of such expenses." Both of these actions are milestones in Virginia Forest Service history.

With a material increase in funds, a decision had to be made as to how the additional money would be used. It would have been easy to decide to extend the sketchy protection then being provided to more and more counties. Nearly all of the state could have been covered on a minimum basis, provided the counties themselves would cooperate. Instead, it was decided, wisely, to intensify rather than to go in for wholesale expansion.

Section 541, amended as outlined above, gave promise of relief from the volunteer system, which was still functioning in farming communities but which was falling down badly on the "big survey." But the joker in this deal was the fact that we could not offer protection to every county, and there was

still opposition enough to the section, which, as some county supervisors expressed it, allowed the State Forester to "put his hand in the County's pocket and take out any amount he thought he needed." The law was a good one but at that stage, it had to be handled with kid gloves.

As a result, it was decided to make it effective on an optional basis, and to try to sell the counties upon its voluntary adoption. And here are the names to write upon the honor roll; the first three counties to adopt the plan and make it effective with the spring season of 1927 were Brunswick, Buckingham and Bedford.

In line with the policy of intensification, the State was organized in four districts, known as the Tidewater, Piedmont, Northwest and Southwest. This was a net gain of two district foresters. The Tidewater headquarters were established in Richmond instead of Petersburg where they had originally been set up. Wilbur O'Byrne having been transferred to full-time extension duties and moved to Blacksburg, Alfred Akerman was transferred from the Tidewater District to headquarters to succeed him as Associate Forester in charge of the nursery. Winslow L. Gooch was employed to succeed Akerman as District Forester. Piedmont headquarters were established at Charlottesville with James P. Andrews in charge as District Forester.

Northwest headquarters were also established at Charlottesville. As District Forester, William H. Stoneburner came to us from the U. S. Forest Service. Bill grew up in the U. S. Forest Service, mostly on the old Shenandoah National Forest, which is now the George Washington. He had been Ranger, Deputy Supervisor, and had been transferred to Bristol as Supervisor of Unaka National Forest, where he had served for two or three years. His wide and varied experience has been of great value to Virginia Forest Service.

The Southwest district headquarters remained at Bristol. It will be recalled that Fred Pederson had been transferred to Charlottesville as Assistant State Forester late in 1925 and that Sam Suiter was handling fire control as District Agent. To succeed Fred as District Forester, Seth G. Hobart was appointed. Seth had put in the previous nine years as forester for Cauley Coal Land Company at Rupert, West Virginia.

The plan originally contemplated the continuance of Sam Suiter as Assistant District Forester in charge of newly organized Protective Association activities in the Southwest district. In this capacity he served until July 1, 1926, when he resigned to accept a District Forestership at Pineville, Kentucky, in the newly organized Kentucky Forest Service. For one reason or another (mainly lack of funds) he was not replaced and the original plan was abandoned.

In the early months of 1926 two new counties, Smyth and Wythe, were added to the organization. This, however, was not expansion, for these two counties replaced Patrick and Franklin, cooperating in 1925, but which discontinued organized fire control, Patrick in June 1925, and Franklin in July 1926. Including Franklin, the total net acreage protected in 1926 was 9,004,026 acres.

Six forest fire protective associations by the end of 1926 had a total membership of 524,500 acres.

It may be well here to clarify the position of the association in the protection plan. Association organization was undertaken only in organized counties and the one cent per acre dues were matched on a 50-50 basis. This amounted to the purchase of extra protection on the lands of association members. The additional money could be spent in any manner approved by the State Forester and the Association members in annual meeting. Typical expenditures were towers, telephone lines, tools, lookout or patrol wages, and, at this stage, to an increasing extent in suppression wages.

Added to equipment in 1926 were 43 Rich tools, 100 Council rakes, 27 brush hooks, 7 Indian fire pumps, 24 potato hooks, 24 spading forks, and 25 axes. These, of course, went to Association areas. In addition, 80 miles of ground circuit telephone line was built and four lookout towers were constructed, these being of pole construction. Also, Clinchfield Coal Corporation built 16 miles of ground circuit line and three towers on their own initiative in Dickenson and Buchanan counties where we enjoyed a rather loose and informal cooperative arrangement with them.

Results within the protected area were as follows:

Number of fires	825
Area burned	138,481 acres
Average per fire	167.9
Percent of Protected area burned	1.54%

After considerable discussion in staff conference in the summer of 1926, it was decided to abolish the position of District Forest Warden. With gradually improving travel conditions the district wardens were becoming "fifth wheels" in the organization and their employment cut down the available employment for Chief Forest Wardens to an undesirable degree. This change of organization placed the whole responsibility directly upon the Chief Wardens and gave them all the time formerly divided among the district and chief wardens to maintain the organization and do prevention work. This staggering total averaged perhaps 25 man-days per county per year.

Another landmark of the year 1926 was the action of the legislature creating the Conservation and Development Commission. W. E. Carson was named Chairman, with Elmer O. Fippin as Executive Secretary. The new commission took over the Forest Service, together with the Geological Survey, from the old Geological Commission on November 10, 1926.

The year 1927 was definitely a respite, so far as forest fire hazards were concerned, except in Southwest Virginia for a period in the fall.

The summary for total organized territory exclusive of National Forests in the State was as follows:

Number of fires	409
Area burned	31,233½ acres - 0.34% of total
Average per fire	76.36 acres

During the summer of 1927 Hanover, Orange, Madison and Rappahannock counties were organized for forest fire control, along with portions of Greene and Warren counties lying within the boundaries of the then proposed Shenandoah

National Park. The park counties were organized at the specific direction of the Conservation and Development Commission - a wise move looking forward to the future acquisition and establishment of the area, in which the Commission had an important obligation to fulfill. Thus the total number of cooperating counties increased from 53 to 59 during the year. Protected area increased to 9,261,693 acres.

Active cooperation was begun this same year with the Spotsylvania Forest Fire Protective Association, Inc. Progress was also made toward the creation of a forest fire protection area in the Dismal Swamp, and individual cooperative agreements with landowners were executed covering about 71,000 acres, but active work did not begin until 1928.

Equipment added included 1936 Council fire rakes, 429 Council brush hooks, 12 axes and 2 Smith Indian fire pumps. Council rakes and brush hooks were standard equipment in the new "541" counties - those in which paid fire crews were provided for - and also Association areas. Forty-five miles of telephone line was constructed, most of which was ground circuit line.

Alfred Akerman left Virginia Forest Services in 1927, accepting a position in Georgia. To succeed him as Associate Forester in charge of the Nursery, James O. (Hap) Hazard was employed. Hap was in the organization only until early fall of 1930, when he became State Forester of Tennessee, but in these three years he did much to build up our nursery program. About the time he came on the job it became necessary to vacate the nursery site for further University development and a new site was provided at what is now Scott Stadium. Seed beds were prepared at the new site in the fall of 1927 and the move was completed the following spring.

Not much was done other than normal maintenance of buildings on Gallion State Forest. The open fields (now in plantations) were still rented for agricultural use to Venable Owen, a neighbor, who was then Chief Warden of Prince Edward County.

Management work as it is now known did not exist. A service of timberland examinations and advice was offered which was carried on as far as the time of District and Headquarters personnel would permit and requests might require, but aside from the nursery operations the job was just about 99.44 percent forest fire control.

1928-1929

The year 1928 marked the beginning of steel lookout tower construction in Virginia. The first such structure in the state was an 80-foot Aermotor erected in Spotsylvania County in February. In May, two of the wooden towers in Dickenson County, which had been erected by Clinchfield Coal Corporation and W. M. Ritter Lumber Company in 1916 as a backbone of that cooperative project were replaced by 50-foot steel structures. In June, two 100-foot steel towers were erected in the Dismal Swamp at the beginning of the first ill-fated attempt to protect that area. One of these was near Suffolk, in Nansemond County, and the other was near the Dismal Swamp Canal about six miles north of the Virginia-North Carolina line in Norfolk County. To complete the year's building program, a 50-foot Aermotor was erected on Buck Knob in Wise County.

It will be noted that all of these six towers were on lands covered by cooperative projects. There still were no funds available for much structures except on these projects, where fifty percent or more of the costs was available from landowner contribution.

Fifty-nine counties in the spring of 1928 sent in reports of 762 fires, falling short only 36 fires of the record in the serious spring season of 1926. The total for the year was 896, the fall season being generally favorable. These fires burned 84,991½ acres, an average of 98.85 acres per fire, and 0.96 percent of the total area protected. It may be interesting to note the distribution of these fires by standard causes. Many similarities with recent years will be noted. Here they are:

Lightning	0.22%	Smokers	21.55%	Lumbering	6.36%
Railroads	12.61%	Brush burning	23.43%	Misc.	4.80%
Campfires	3.68%	Incendiary	13.17%	Unknown	14.18%

In comparison with the previous 5-year average, the total acreage burned was down 7.78% while the number of fires was up 33.3%. The average fire was 94.85 acres against 137.14. The tool equipment and registered crews were beginning to show results.

No additional counties were organized during the year. In fact, there was actually a decrease in protected area through the loss of Lee County during the summer. A new Board of Supervisors in that county, economy minded, refused to renew the \$200 appropriation for the old 2-1 cooperative plan. However, 15 counties adopted resolutions requesting organization as set up by Section 541, with registered crews and paid fire fighters, bringing the total number of such counties as of January 1, 1929, to 35. The number of forest wardens on that date was 2376. There were no changes in full-time personnel.

In addition to the six steel towers which have been described, one frame lookout cabin was built on the crest of the Blue Ridge to overlook a part of the proposed national park area, and 30 miles of telephone wire was hung.

Fire tools purchased included 1344 Council rakes, 204 brush hooks, 2 axes, 4 spade forks, 3 potato diggers, 3 lanterns, and 3 hoes.

The following summary of information and educational work is given in the Clarke-McNary report:

Number of news interviews	81
Number of news items written	76
Addresses, schools, -illustrated	7
Addresses, schools, not illustrated	66
Addresses, other than schools, illustrated	10
Addresses, other than schools, not illustrated	25

It is also noted that District Forester W. L. Gooch made several radio talks over Station WRVA, Richmond. This is the first of Virginia Forest Service's use of the radio in the prevention field.

In 1928 the "Virginia Forest Warden," a quarterly house organ, was initiated and three issues were published.

Ninety-three forest fire violations were prosecuted but only 79 convictions were secured. Fines and costs amounting to \$1295 were imposed, one man sentenced to one year in the penitentiary, one was given a jail sentence of six months, and a boy was sent to reform school.

The moving of the nursery to the new site at what is now Scott Stadium was completed and "Hap" Hazard was able to "get down to business" in nursery work. The output for the year totaled 49,278 seedlings. This stock, of course, was from the old nursery site below Lambeth Field and was about the maximum amount that area could produce. At the new nursery the sights were set on a production of some 250,000 seedlings for 1929.

The greatest part of the 1928 production was, of course, loblolly pine, but the list included arbor vitae, Austrian pine, Scotch pine, white pine, Norway spruce, ash, locust, white oak, slash pine, redwood, red pine, bald cypress, and longleaf pine. This was quite an assortment. The seed beds established included still other species, but in general the list was being shortened.

The first plantings on the Gallion Forest were made in 1928. Two acres were planted, including the slash pine and the oldest of the loblolly.

An important personnel change came on January 1, 1929, when W. L. Gooch resigned as District Forester in the Tidewater District to enter the employ of Hummel-Ross Fibre Company as forester. His employment by a pulp and paper company was hailed as a step forward in forestry in Virginia. It is believed that this was the first time a technically trained forester had been employed by a wood-using industry in Virginia.

To succeed Gooch as District Forester in the Tidewater District, George W. Dean was appointed, taking up his new duties shortly after January 1, 1929. George was born at Monroe Center, Ohio, but spent most of his boyhood in northern Pennsylvania. He attended Mont Alto, earning the degree of B.S.F. in 1926. He earned his M.F. from Yale in 1927. Following his graduation from Yale he entered U. S. Forest Service, serving about a year as Assistant Ranger on the Natural Bridge National Forest in Virginia and about six months as a Ranger in Arkansas. Some fifteen years later he was to become Virginia's third State Forester.

The year 1929 was marked by an increase in number of fires reported and a marked decrease in the acreage burned. This was no doubt due to the fact that nearly 60 percent of the spring fires occurred in five short periods of high hazard totaling only 23 days, with total precipitation well above normal for the critical months in most of the state. This set of conditions made for high incidence of fires, but less severe burning conditions because of the higher amount of soil moisture. The fall season was relatively light.

The total number of fires reported from the 58 counties protected was 923, an increase of 19 percent over the average for the preceding five-year average. Acreage burned was 52,544 which represented a 28 percent decrease from that average. The area burned represented 0.54 percent of the total area protected, and this was an enviable figure in those days. The average acreage

per fire was 56.9 acres, the lowest of any year up to that date.

Bath County was hit the hardest with 5118 acres burned, but Nansemond had the doubtful honor of the largest number of fires - 53.

Causes included 25.5 percent smokers, 19.7 percent brush burning, 14.0 percent unknown, 13.8 percent incendiary, and 11.6 percent railroads. Other causes included campfires, lightning, lumbering and miscellaneous.

Chesterfield, Greenville, Henrico, Surry, Alleghany, Botetourt, Clarke, Fairfax, Fauquier, Prince William, Tazewell, Wise and Wythe counties adopted the "541" plan of cooperation in 1928, increasing the total number of counties in which paid fire fighters might be employed to 48. No new territory was placed under protection.

Steel towers were erected in Bland (Chestnut Ridge), Tazewell (Bearwallow), Bath (Bald Knob) and Madison Counties. The Madison tower was known as Stony Man, and is now within the park area. Seventeen miles of telephone line were built to serve these towers. These towers, like those erected in preceding years, were built to serve areas of special cooperation.

Progress was made in building up equipment. Some 1688 fire rakes and 384 brush hooks were purchased, mainly to supply the "541" counties. Other purchases included axes, shovels, buckets, corn knives, Indian back pack pumps, one Evinrude power pump, and 2000 feet of hose, much of which was for the Diamal Swamp and other cooperative associations.

Sixty-seven violations were prosecuted with 60 convictions. Suppression costs of \$1388.74 were collected. The record relates that one man was committed to the insane asylum and one was sentenced to one year in the penitentiary. It is recalled that the case resulting in the penitentiary sentence certainly was expedited. The culprit was caught in the act, arrested on the spot, and taken to the county seat where court was in session. He was immediately indicted, tried, and by the time the blue report came to the district office he was on his way to Richmond to begin his penal servitude.

It again became necessary to move the nursery to make way for Scott Stadium and the present site was developed approximately one mile south of Charlottesville on Route 29, on property owned by the Virginia Commission for the Blind. This move had to be made rather hurriedly and all stock was taken up on shallow flats and reset on the new site. A water system was a necessity and it was provided through donated funds.

In 1929 we fell heir to a rather large number of seedlings from a nursery which has been operated at Camp Lee. Camp Lee had been up to that time handled by the U. S. Forest Service as a "military forest," but it was then returned to the War Department and the nursery which had been established to provide seedlings for planting on the post was abandoned. These seedlings were distributed mostly on a free basis in accordance with a demonstration planting plan hurriedly set up for the purpose.

Total distribution of nursery stock for the year amounted to 446,968 of which 275,611 were loblolly pine. Other species supplied from our nursery included arbor vitae, Austrian pine, Japanese red pine, shortleaf pine, longleaf pine, slash pine, black locust, green ash, white ash, and tulip poplar. There were a few European larch at the Lee nursery.

Some 16 acres of plantation were established at Gallion State Forest in 1929. The record shows that the following were planted:

Loblolly Pine	8000	Red Pine	1000
Shortleaf Pine	1000	Austrian Pine	500
Longleaf Pine	2625	Jap. Red Pine	500
Scotch Pine	1000	Red Cedar	60
White Pine	1000	Jap. Larch	500

Some of these species may be hard to find today, but the loblolly, shortleaf and white pines certainly succeeded.

The nursery goal for 1930 was set at 400,000 seedlings. At last the State Forest Service had a nursery site susceptible for considerable expansion and one from which it was not likely to be ejected for years to come. The nursery was beginning to get on its feet.

The history of these formative years has been followed biennium by biennium in some detail in order to trace the development of the Virginia Forest Service carefully and logically through its earlier stages, and also to paint a careful background for the crucial test which was ahead. Now the "Year of the Big Drought" was just around the corner, and the infant Forest Service, only four years from the date of state-wide districting, must stand or fall on the quality of its organization and the reputation it had built.

III - THE FIRST REAL TEST: 1930-1933

Then came 1930!

That year will be long remembered in Virginia, not only for its year-long fire season and unprecedented, disastrous summer fires, but also because it brought disaster to many farmers and stockmen. Coming as it did immediately following the crash in the fall of 1929, its economic effects were severely felt. It was the year of the Great Drought.

Perhaps a few quotes from the 1930 Section 2 Clarke-McNary report will serve to throw a bit of light upon the situation encountered that year:

"_____, for the periods of subnormal humidity were unusually frequent and high winds and temperatures at critical periods aggravated what was already a bad situation."

"_____, lack of sub-surface moisture during most of the year also made for a slower recovery by plant life of the moisture lost by transpiration during periods of low humidity."

"_____, only one fire season was experienced during the twelve month period, but this season----lasted from January 1 to ---- November 30."

"_____, the wind would carry sparks, which would set new fires, for a half mile or more from the edge of the fires."

"_____, the forest wardens and fire fighters ---- had never known fires to burn so hard and spread so rapidly_____."

"_____, the drought of 1930 in Virginia was by far the severest on record."

These excerpts should be sufficient to give a rough idea of what the young and growing Forest Service was up against. It might be added that in some cases, even drinking water for fire fighters was at a premium, with some farmers refusing to permit it to be removed from their rapidly failing wells. Hundreds of rural citizens were hauling drinking water, not only for domestic use but for their cattle and other livestock as well.

In many fires in mountain areas which had ages ago been wooded with spruce and hemlock, but now entirely in hardwoods, the ground was so dried out that fire lines had to be trenched, frequently as deep as three to four feet to get through duff which in ordinary seasons was well soaked and non-inflammable a few inches below the surface. This was a new set of conditions for the wardens and fire fighters to learn to recognize and until they caught on they had numerous break-overs a week or sometimes two weeks after fires had been considered out. Another unusual source of break-overs was encountered in "fat" pine stumps near the fire line. Even after these stumps appeared to be completely extinguished, fire would sometimes persist for days or even weeks in lateral roots, often to pop out on the other side of the fire line, maybe ten, fifteen or even twenty feet from the stump itself.

To make things still more uncomfortable, a very serious run of fire weather in July, with many fast-running fires occurred. Fire fighting is hard work at best, but on a hot day, with temperatures well above 90°, and with smoke dense from green leaves, it was well nigh intolerable. Some fire fighters were ill from breathing smoke from fires in poison ivy thickets.

The writer recalls coming home late on Saturday night in July, 1930, dog tired, and falling asleep about midnight in his comfortable bed, after a refreshing bath, with the thought that tomorrow being Sunday he could sleep and sleep and sleep! Well, at four a.m. the phone rang and he hit the road again. From one bad situation to another, it was a week from the following Monday night before he again knew the luxury of a bed. It was grab a bite to eat when you could find it, drop down on the ground for forty winks when you could go no farther, then up and at it again. Tough? Well perhaps it was. But somehow when it was over one had a sort of comfortable feeling of a challenge met and a job accomplished.

The year 1930 demonstrated adequately the impossibility of attempting to protect the Dismal Swamp on the shoestring financing upon which the Swamp organization was then based. One fire illustrates this. This fire started on October 4, 1930. It was brought under control October 14, thanks to a light local rain. Crews were still at work on this fire in December. The control line had to be trenched and watered out. The total area burned in this fire was 10,600 acres.

Statistics for 1930:

Number of fires (58 counties)	2,869
Total area burned	391,604 acres
Average area per fire	136.5 acres
Percent of protected area burned	3.9 percent

The appropriation for F.Y. 1391 (July 1, 1930 to Juen 30, 1931) was exhausted by October and the work continued from that date on a deficit authorized by the Governor.

Several personnel changes in 1930 must be recorded:

Early in April, just when the fire situation was getting well under way, W. H. Stoneburner was placed on leave from the Forest Service and assigned to the Division of Parks for the purpose of assisting S. H. Marsh in the acquisition of the required nucleus of land for the Shenandoah National Park. Under the agreement with the National Park Service, Virginia Conservation and Development Commission was required to acquire and transfer to the Federal Government a certain area in the Blue Ridge amounting to something like 175,000 acres as a preliminary to the establishment of the National Park. S. H. March who had been for a year or two out of the U. S. Forest Service and in business in Staunton, was employed to head up this job, and Stoneburner whose years of experience with U. S. Forest Service eminently fitted him for the post was transferred to act as his chief assistant. This left a vacancy in the District Forestership of what was then known as the Northwest District at a rather critical time.

To succeed him as District Forester, Fred Shulley was employed. Fred had served for a number of years as District Forester in the northeastern district in Tennessee and was well experienced in forest fire work, although of course Tennessee's organization and terrain were vastly different from those in Virginia. Shulley reported for duty early in April, and probably no district forester ever tackled a new job under any more difficult and discouraging conditions. Fires were going everywhere -- or at least so it seemed to him. There was no chance to become acquainted with the district and personnel in a normal fashion. Shulley was given a car, a map and a warden list and told to get on those fires just about as soon as he entered the office door the first morning.

In August of 1930, J. O. (Hap) Hazard resigned as Associate Forester in charge of nursery work to accept the State Forestership of Tennessee, a position in which he was to round out twenty years of service. The vacancy left by his resignation was filled by the appointment of R. S. Maddox who had been for a considerable number of years State Forester of Tennessee. He was the man "Hap" was replacing in that state. It amounted to an exchange of positions.

Shortly after Hazard's departure to Tennessee, Shulley followed him to resume his former post as district forester at Knoxville. To fill this vacancy, Berlin Eye was appointed District Forester in the Northwest District. Berlin whose untimely death occurred in 1950, served in this capacity for nearly eighteen years, and at his death was well into his twentieth year in the service of Virginia Forest Service. He served well, and in this period, both as District Forester and Nursery Superintendent, he cemented many a stone

firmly into the structure of its organization. To the loyal and unselfish efforts of Berlin and others like him, the people of the Commonwealth owe a deep debt of gratitude. Long may his memory flourish.

The severity of the fire season undoubtedly influenced State Forester Jones to undertake a new phase of prevention work which had been under consideration for some time. J. P. Andrews was relieved of his duties as District Forester on July 1, 1930, and assigned to a visual education program. He was provided with a panel-body truck equipped with a 110-volt generator and 35 millimeter motion picture projector, with which he carried the message of forest fire protection to the country schools and churches back beyond the realms of commercial power. The projector was equipped with a sliding lamp-house and supplementary lens whereby it could serve also as a projector for 3½ x 4½ glass stereopticon slides. Jim's usual program consisted of a lecture illustrated by slides running from twenty to thirty minutes, followed by a four or five reel feature and capped off by a rodeo picture or animated cartoon "to send the folks home feeling good." A favorite feature picture had to do with the experiences of "Old Jeff," a no-account individual some place down in the longleaf pine country who informed on a neighbor who "swinged" his field and whose fire (thanks to a little help from Jeff) got away; and by his informing collected a reward and blew it on a \$50 Model T. Of course he was converted to a booster for prevention by the Old Warden who wound up the picture with a proclamation that "forest fires ain't never any good, -- no time, no place, no how!" -- and they all lived happily ever after!

Corny? Beyond a doubt it was -- dreadfully corny. But movies in the back country in those days were a novelty and that old film, which the writer has watched through so darned many times that he has only to close his eyes to see it all again, undoubtedly did a lot of good -- more, perhaps, than some of the less corny and more artistic films of later days.

Joseph Pike, a forestry graduate from the University of Maine, was appointed to succeed Andrews as District Forester in the Piedmont District and reported for duty July 1, 1930.

Hunter H. Garth was first identified with Virginia Forest Service in 1930, when he became Chief Forest Warden of Albemarle County. At that time he was engaged in farming near Charlottesville.

1931

Two noteworthy pieces of literature came out of World War I from the German point of view; -- Eric Maria Remarque's "All Quiet on the Western Front" and "The Road Back." The forest fire histories of 1930 and 1931 characterize in some degree a parallel to these items of fiction. Nineteen-thirty, a year of tough hard fighting, of heart breaks and back aches, finally came to an end, but the effects of this fight carried over into 1931 and left its imprint. That year might well be characterized as "The Road Back."

First of all, the 1930 drought continued without much let-up through January and February. Those months brought 108 fires. Frequent showers in March helped some, but the total rainfall for the month was subnormal and the soil still lacked much of attaining its normal moisture content. April was about normal as to precipitation throughout the state, with an average surplus

of a quarter of an inch, but no rain from the 9th to the 21st, coupled with the deficiency of the preceding sixteen months, brought severe burning conditions and 30 percent of the year's forest fires. May, fortunately, had an excess of rainfall and the spring season was quite well over by the 8th of the month.

Only April, May, July and August had normal or better rainfall and the total for 1931 was only 37.99 inches, average for the state, -- short of normal by 3.77 inches. As may have been expected, this light rainfall did not bring soil moisture back to normal and a serious fall fire season was experienced. The severity of this was exceeded only by that of 1930. It was ended, however, by general rains about November 27 and by well distributed although light rains through December. By the end of the year most of the smoke of 1930 had finally blown away.

Forest fire control in the Dismal Swamp had to be discontinued May 1, 1931. There was no way to pay fire fighters. The fires of 1930 had built up astronomical figures in the suppression accounts against Norfolk and Nansemond counties -- accounts which they could not and did not pay. Virginia Forest Service was left holding the bag, having advanced the money to the fire fighters as was customary up to that time. That policy had to be abandoned. From then on, under Section 541 we submitted the accounts to the Boards of Supervisors and fire fighters were paid by county warrants. Some counties were prompt while others often let the accounts ride until tax time. Some fire fighters did not get their checks for almost a year after the fire.

The 1930 accounts were finally cancelled by legislative action.

Not only were we drought-stricken, but we were also caught in the depression. The rate of pay for fire fighters was cut from 30¢ per hour to 15¢ per hour. In Bland County the Board of Supervisors took the bit in their teeth and flatly laid down a rate of 10¢ per hour. The writer well recalls attending the meeting at which this action was taken. One of the Supervisors made this statement: "We need forest fire control and want to keep it, but I can hire all the men I want to work on my farm from sun to sun for 50¢ and dinner. I know fire fighting is hard work and I'm willing to double that wage. Ten cents per hour is enough; it's all we can pay, and it's all we're going to pay." The others agreed with him and no arguments could change their minds. Incidentally, the depression was pretty well over before that rate could be changed, which worked a considerable hardship in securing help in Bland County.

As for the fire record, 1711 fires (as against an average of 1184 in the previous five-year period) burned 151,131 acres (compared with 139,780 average in the period), or an average of 88.3 acres per fire. (Average 1926-1930 -- 118.1 acres).

On January 1, 1931 an addition was made to the staff in the person of Henry Hodge, who was given the title of Supervising Forest Warden and who took over the direction of work in Highland, Bath, Alleghany, Botetourt, Craig, and Roanoke Counties. Headquarters for Henry were established at Clifton Forge, and his territory was treated as a sub-district under District Forester Berlin Eye. Henry promptly demonstrated that he was distinctly District Forester material, and that when it comes to forest fire control and the administration of a district he bows to no man. A fortunate choice was made

back in 1931 and that choice was to materially influence the future of the organization, for Henry has left his brand, like the imprint "sterling" on the Virginia Forest Service of today. His death in December of 1951 was a severe blow.

1932

By 1932 Virginia Forest Service was about on an even keel again after the 1930 disaster. The authorized deficit of fiscal 1931, made necessary by the drought, was wiped out by a deficiency appropriation and it was again operating within appropriations and allotments. But, to quote a line from Robert W. Service, "a promise made is a debt unpaid," and the Forest Service felt morally obligated to offset that \$40,000 deficiency appropriation eventually through unexpended balances allowed to revert at the end of biennia. It took several biennia to accomplish this, but in the end every red cent of that 1931 deficit was offset. The annual appropriation was still quite low, so strict economy had to be the rule.

Of course there was no legal necessity to follow this course. The obligation was entirely moral. Was such a quixotic viewpoint foolish? The writer must acknowledge that there were times when he had his doubts. But in clearer vision of "hind sight" it seems certain that this manifestation of moral as well as legal honor contributed a great deal to the growing reputation of the Forest Service for integrity. The respect in which the service was held by the state government as a whole, and the confidence placed in it by the General Assembly began to grow rapidly from about this time. Perhaps this idealistic viewpoint had as much to do with this as the accomplishments in the field.

The tough times of 1930 had still further repercussions. In April of 1932 the Boards of Supervisors of Nelson and Wythe counties served notice that they would pay no bills contracted by forest wardens under the authorization given wardens under Section 541 as it was then written. This meant, of course, the abandonment of fire protection in those two counties and thus the protected area was reduced to 37 counties embracing 9,840,784 forest acres. In vain was the opinion of the Attorney General cited that such refusals could not be made. Without financial means to apply Section 541 in all of the hundred counties the Forest Service was to all intents and purposes unable to make it stick in any one of them except on a voluntary basis.

Being financially unable to expand in fire control, certainly there could be no expansion in other directions. The big job was fire control. Virginia Forest Service continued to operate and develop the nursery under "Rufe" Maddox, and the district foresters occasionally looked over a tract of timberland and offered a little advice, which was usually pretty general in scope. A few seedlings were planted on the Gallion Forest. Otherwise it was fire, fire, and more fire! But the foundations for the vast expansion to come in the forties were being laid, none the less.

In 1932 fire seasons were not too severe, but rather long. The woods in eastern Virginia began to get pretty dry in February and the end of the season in the mountain areas came on May 9, with several days of warm wet weather. No rain fell from April 13 to 23 and in this period 297 fires within the protected area burned 22,067 acres -- an average of 74.4 acres per fire.

The total for the first six months of the year was 1085 fires, burning 63,827 acres, averaging 58.8 acres per fire.

The fall fire season as such was almost non-existent except for a brief run of fire weather early in December, but the months of July, August and September were very dry and brought us some 457 fires in the state. The new result for the entire year was 1735 fires which burned 86,281 acres. The average fire of 49.7 acres was the lowest of any year up to that time. The percent of protected area burned was 0.88 percent. Only two previous years were lower.

1933

The relationship between the State Forester and the Conservation and Development Commission, or at least between the State Forester and the Executive Secretary and Chairman of the Commission, had been none too cordial since the change from the old Geological Commission, and things came to a head in the fall of 1932. The dismissal of Chapin Jones as State Forester was threatened. This controversy got into the newspapers and Chapin's friends took up the cudgels for him. The result was a rather prolonged hearing before Governor Pollard, with both Chapin and the Commission represented by council. It was a most unfortunate and unpleasant affair, and resulted in undesirable publicity both for the State Forester and the Commission. It also placed the Governor in a rather uncomfortable position.

The issues were largely personal. There was no major criticism of Virginia Forest Service as an organization, nor of its accomplishments. Rather, the general and somewhat vague charge was made that the State Forester lacked executive ability. After a rather lengthy hearing, the Governor made Chapin "Director of Education and Research," setting forth the desirability of intensifying our efforts along educational lines, and Assistant State Forester Fred C. Pederson was named acting State Forester, entering upon those duties January 1, 1933. The professional staff as of that date consisted of Fred C. Pederson, Acting State Forester; Chapin Jones, Director of Education and Research; R. S. Maddox, Associate Forester in charge of the nursery; J. P. Andrews, Staff Assistant in visual education work; George W. Dean, District Forester in Tidewater Virginia; Joseph Pike, District Forester in Piedmont Virginia; Seth G. Hobart, District Forester in Southwest Virginia; Berlin Eye, District Forester in Northwest Virginia; and Henry Hodge, Supervising Forest Warden, handling six counties nominally in Berlin Eye's district. There was no Assistant State Forester in charge of Fire Control, for the first time since that office was established back in 1918.

Probably no man ever took over the reins of any state forestry organization under more difficult circumstances than did Fred Pederson at that time. Relationships with the Commission could perhaps best be described as "armed neutrality." The former State Forester had been involved in an unfortunate controversy with the Commission and this controversy had been aired in public with results which, however logical they may have been, pleased no one. The entire staff had been loyal to their chief. To still further complicate matters, the nation was in the midst of a depression which was affecting state finances just as it was affecting everything else financial. The new Acting State Forester and the Commission eyed each other with a feeling which might be put into words as "What's going to happen next?" Virginia Forest Service had truly reached a cross-roads.

Early in 1933 Pederson was called in and told that the Forest Service must retrench, and that that retrenchment would call for the elimination of two positions on the staff. After pondering the situation, it appeared best to him to stick strictly to seniority, and accordingly the two most recently employed men, who were R. S. Maddox and Joe Pike, were released. Chapin Jones took over the nursery; the visual education project was abandoned and J. P. Andrews returned to his old job as District Forester. Thus the Forest Service was stripped down to bare essentials; State Forester, Nurserymen, four District Foresters, and a Supervising Warden, with no provision for a Fire Control man and no immediate prospect of getting one. As a matter of fact, Pederson handled that work along with the other duties of the State Forester until 1942.

But the darkest night has its dawn. Within a month after this staff reduction both men released had been absorbed by Emergency Conservation Work, the technical agency directing the field activities of Civilian Conservation Corps. Within the same period, the new-born CCC was extended to apply to private land work in fire control and other fields through the State Forestry agencies, and Virginia Forest Service became proprietors of a number of camps, thus bridging depression times with what eventually became the biggest boost to conservation agencies known since their origin. And what is more to the point, a feeling of mutual trust and respect quickly grew up between Virginia Forest Service and its Commission.

Truly the sun was beginning to rise again.

IV - THE EARLY CHIEF FOREST WARDENS - A TRIBUTE

Perhaps a note should appear at this point in tribute to those men who served the Commonwealth so valiantly through the early days as Chief Forest Wardens. For 1932 or 1933 probably represents the end of an era which was marked, however gradually, by a change in the type of men required in those positions. The old-timers in these positions had little "paper work" to bother them. Formal education was decidedly secondary to other, more important qualifications. What was needed then, particularly in the rough, mountain areas were rough and rugged community leaders, crusaders, men who had learned to hate a forest fire and to impart that hatred to their neighbors and fellow-men. Men tough as pine knots were needed; men able to tackle forest fire, single handed if necessary, and "lay with it" until it was whipped, be that one hour or fifty. In the mountains, that meant mountain men. The low country had their comparable types. These men, rough, tough, and forceful, but respected by their neighbors, more often than not almost wholly unlettered, have left their imprint upon the Virginia Forest Service of today in unmistakable letters one needs no eye-glasses to read. They have served ably, unselfishly, and well. Today's needs indicate a more polished type of higher educational levels, -- but please note that the word used was educational, not intellectual. The old-timers had "plenty of sense." There are still two or three of them left -- men with a bit more education and more adaptable than their contemporaries. But most of them are gone.

Of such a type was a certain Chief Forest Warden in a certain mountain county who has become legend in Virginia Forest Service. His name was

James M. Roberts, known to most folks as "Jeems." He was typical of many, and in illustration of his qualities a brief yarn or two may not be amiss.

Back in the twenties, when each Chief Forest Warden had to be his own lawyer in prosecution work, Jeems hauled a coal miner into court for letting a brush burning fire get away. On the day of the trial, the defendant showed up with the best lawyer in the county as his council. This lawyer, a very polished gentleman, recognized the fact that his case was weak, so he resorted to table-pounding oratory instead of sound legal facts. Jeems listened attentively, took no notes, (he could write with difficulty, but didn't like to) and when his turn came to argue the case he arose and in his inimitable mountain dialect systematically reduced every point of the lawyer's case to an absurdity. It was a beautiful piece of work. Needless to say, he won his case.

Later, toward the end of his career, Jeems discovered just before fire season that the shack on the mountain at the lookout tower had been broken into. Nothing had been stolen and aside from the loss of the hasp and padlock not much damage had been done. As evidence he found an exploded .22 cartridge on the floor. From this meager beginning after a month or two, he had a water-tight case against the miscreant and secured a warrant for his arrest. The accused went "on the dodge" and was not apprehended until some time later, when he was also wanted for assault with a shotgun upon a prohibition officer. Just a few minutes before the case came to trial, the Commonwealth's Attorney told Jeems he had an offer from opposing council to plead the defendant guilty if he were sentenced to no more than 18 months. He asked Jeems' approval to this. Jeems' answer:

"I don't keer what the Judge gives him for shootin' the officer, but he's got to serve one year in the pen for breakin' into Virginia Forest Service's cabin on Buck Knob."

The Commonwealth's Attorney thought a minute, said O.K., fixed it up with the Judge, and that's how it was: - one year for breaking into a Forest Service cabin; six months for shooting a prohibition officer.

In 1932 the edict was issued that Jeems was both old and incompetent and must be replaced. The first allegation was admittedly true; and second was certainly not. Not Jeems Roberts! But times must change and the world progress. Jeems was replaced -- with two men!

What happened to Jeems? Why, he died a year or two later, having been in poor health almost from the time of his resignation. The writer has often wondered if he died from a broken heart. Be that as it may, the passing of Jeems Roberts marked the end of an era in Virginia Forest Service. The Service had needed men who could conquer forest fires and inspire crews by their own prowess, whether they could write a polished letter or not. But the turning point had been reached, and in the future the job would expand to a point requiring more education and less brawn. Jeems was one of the first to go. We must bow to progress with no regrets, but what a man he was!

Another such man was R. H. ("Uncle Bob") Taylor of Dinwiddie County. Although at the age of 81 he is deaf and gets around with difficulty he still proudly wears his original forest warden badge wherever he goes.

V - 1933 - 1940: THE CCC ERA

The Idea Is Born (Early 1933)

The early months of 1933 found all America looking with desperation, curiosity, hope, or expectancy to the newly-elected Franklin Delano Roosevelt, wondering what strange new tools he would pull from his bag of tricks to combat depression and implement his promised New Deal. The first one was hastily pulled out on his inauguration day. Both political parties were loud in their praise of his skill and adroitness in handling a difficult situation by declaring a banking holiday.

This first act of the new administration was to usher in a vast amount of emergency legislation, among the earliest of which was the creation of the Civilian Conservation Corps. Although at its inception the State Forester did not for a moment expect its provisions to be extended beyond federally or state-owned land, this movement was to exert a vast influence upon forestry and forest fire control on privately owned lands in Virginia and project the program of physical improvements many years into the future. In fact, it paved the way for an undreamed-of expansion not too far in the future.

Before we consider the forestry implications, however, let us paint a bit of background by a bit of reminiscing. To illustrate how grave was the banking and economic situation, the writer recalls making a deposit of his salary check at his bank on March 2, 1933, at which time he was informed that it could be entered for collection only. Being a Commonwealth check, the teller added that the bank was not afraid of the credit of the Commonwealth, but - "Mister, we don't trust any bank." The next man in line had a federal warrant on which he wanted cash, but even though it was the equivalent of currency, it, too, was "entered for collection." Times were tough. Money just couldn't be had.

But hospitality and fellowship never die. To the contrary, they are usually enhanced by troublous times. If the writer may be pardoned another personal experience, he recalls that on Monday following the declaration of the banking holiday he had a week-long trip scheduled. To keep his family going, he gave his wife all the currency in his pocket and departed from headquarters with just twenty-seven cents in change. Upon his return at the end of the week he still had a few odd pennies. Credit cards had supplied the car with gasoline and oil, and Virginia hospitality did the rest.

The earliest days of the newly established Civilian Conservation Corps were heralded by considerable fanfare from the press, and Virginia as a state came in for a bit of added publicity in the establishment of Camp F-1, the first one in the country, on George Washington National Forest not far from New Market. This bit of reflected glory, however, was of small importance to Virginia Forest Service, and it was business as usual throughout most of a rather long, but not too unfavorable, forest fire season. Toward the end of the fire season word came down the line that there was some remote possibility that eventually the CCC movement might be extended to private lands for the purpose of constructing forest fire protection improvements. At least some rough estimates of needs and projects were desired.

To this end, the staff was assembled and under the guiding hand of the then Clarke-McNary inspector -- Charles Evans -- began working up a preliminary work plan by administrative districts, with some rough attention to possible work units, of forest fire control improvements for possible future CCC use. Most of the projects which first came to mind were, of course, towers and telephone lines, projects in which material costs were high and the labor involved relatively low, and therefore not well adapted to the CCC undertaking as it was then constituted. At that time it appeared that materials such as steel and wire and insulators for telephone lines would have to be provided by the using agency. In the case of Virginia Forest Service, "the spirit was willing but the flesh was weak." It was operating on a curtailed budget, which had been a rather tight one even before curtailment, and it could foresee little chance of financing such materials. But a few such items were set down anyway on the outside chance of securing some sort of financial assistance outside the budget. However, the man-days work load for this sort of project, even at the most generous estimates, totalled up to a pitifully low total when measured in camp-years.

The item of improvements looking toward improved accessibility of ; hazardous areas to forest fire crews was suggested. Trails were on the approved list, but roads as such were definitely out of the picture. The idea solved the materials problem and the labor involved created a rather more satisfying total in planning a camp, but it was realized that maintenance would be extremely high and in some instances, at least, utility correspondingly low. But several such projects were put on paper.

Finally Berlin Eye, one of the District Foresters, came up with a new angle. In his district, he explained, there were many old logging roads extending back into the woods from travelable roads, which could be made travelable by no more labor than would be expended on a trail or firebreak. Thus fire crews could be landed by truck nearer the head of a future fire and thus could such future fires be more cheaply and efficiently controlled. As he talked, he warmed to his subject, and concluded with a question: Could such improvement of old roads be included in the work plans, or, better yet, could new low-service roads be built?

Charlie Evans hesitated a long moment before he replied. Then he said, "Well -- new roads definitely are out of the picture. Perhaps you could do a little improvement of these old roads, but try to keep the work done on them down to an absolute minimum." So this initiated work plans including quite a liberal sprinkling of this type of improvement.

No doubt similar evolutions of thought occurred in other states as well. But this was the beginning of Virginia's truck trail program which was to constitute a high percent of the CCC effort in the private-land camps later to be established in the state. There was little reason to believe at that time that before the end of the CCC movement Virginia Forest Service would be building so-called truck trails after the detailed specifications of a forthcoming regional truck trail handbook calling for Form MR-1, plat, profile, and detailed location survey calling for enough stakes every fifty feet to guide the building of a four-lane dual highway! Virginia Forest Service was about to enter the construction game and for some years to come, this was to consume a major part of their time.

The First CCC Camps (1933)

With the end of the work-plan conference at Charlottesville the thought of any immediate participation in CCC was still unborn. The State Forester and his staff figured the consideration being given to the extension of CCC to privately-owned lands might bear fruit some time -- maybe a year or two hence, and it might not. The work plan data was a job accomplished and everyone returned to "business as usual."

But this was not for long. Things moved with surprising speed and within a week or two eight companies of CCC were promised to Virginia Forest Service, with an almost alarming shortness of time remaining before they were to arrive. Camp sites were hastily chosen prior to a whirlwind tour of inspection by army officers, when leases were executed and the most important of the last minute details were attended to. The ink on the leases was scarcely dry before the eight companies arrived on June 4. These first eight camps were in Tazewell, Bland, Craig, Roanoke, Albemarle, Chesterfield, King and Queen, and Charles City counties.

Probably no agency was ever less ready for a labor force of 1600 men than was Virginia Forest Service on June 4, 1933. There was no equipment other than what the companies brought with them, which was meager, indeed. There were no tools at all adaptable to the field work contemplated other than the standard axes, brush hooks, and fire rakes of the fire tool caches, and these were in insufficient numbers, even for fire fighting. No trucks or other transportation was available other than two Army trucks per camp which arrived a few days behind the men.

Fortunately, the job of employing the initial supervisory personnel had been accomplished and these men were available when needed. The original authorization called for eight "technical or practical foresters" per camp. Foresters? They weren't to be had. That young profession was under-manned at best, and the few unemployed foresters there were had been drawn into personnel of the earliest camps. Civil engineers seemed to be the rule of the day. Depression times had left many of them unemployed and little difficulty was experienced in lining up camp superintendents and foremen from their ranks with a few rough, tough old construction men on the side and a handful or two of forest wardens to inject a bit of forestry viewpoint and forest fire control "know how." All in all, a pretty good supervisory set-up resulted. Several of these men later became able and valued permanent personnel of the Virginia Forest Service of post CCC years.

Fortunately, too, the Company Commanders needed all hands for a few days to make camp. Immediately, the Army authorized a kitchen and mess hall at each camp, and getting these buildings under way gave the forestry organization a few more days of grace in which to await the arrival of hastily requisitioned hand tools and transportation. Odd lots of tools began to arrive from this surplus or that within a few days, and these together with what state-owned tools could be had got the initial field crews at work on nearby projects as soon as the men were released to the field. About a month later the first trucks arrived and the camps were set for work.

Additional camps were authorized in July and occupied early in August, but in these later camps the Forest Service had more notice and were better able to cope with the situation. In many instances it was possible to have the essential using agency buildings, such as office, shop, etc., well under way by the time the company arrived, with transportation, tools, and equipment arriving at the same time, so that immediate work on planned projects could be done. The number of camps varied with conditions. At "high water mark" Virginia Forest Service had 35, but this was in a period of rapid expansion which over shot its mark and the number was soon reduced to 28.

The administration of the camps rested heavily upon the shoulders of Virginia Forest Service, with little CCC paid overhead to offset this during 1933. The State Forester was given an Administrative Assistant and Purchasing Agent along with some clerical help at the outset. This was just about the minimum assistance which would enable him to carry the load. To further facilitate matters, purchases during the initial period were made in accordance with State rather than Federal regulations, which lightened the load somewhat. As the movement developed, Federal procedures were initiated and gradually a more adequate Fiscal Department came into being. An engineering division came along a bit later with a Chief Engineer and from two to four field engineers to undertake most of the detailed field inspection. Later, each camp had its own engineer, but in the rather hectic days of 1933, and carrying well over into 1934 surveys and location work fell upon the District Forester and Camp Superintendents. In the fall of 1933, a foreman was detached from one of the camps to act as inspector in an attempt at some sort of uniformity, but most of the detailed inspection as well as administration and engineering fell on the shoulders of the District Forester.

With this sudden shift and increase of field duties it was inevitable that the regular work of Virginia Forest Service should suffer. With so limited an amount of time for work other than CCC, most District Foresters gave what time they could to those areas outside the influence of a CCC camp in an attempt to maintain the fire fighting organization. Where there were camps, the fire crews fell apart badly. Times were hard. Members of fire fighting crews and even wardens had in the past served as a public service rather than for the paltry pay involved. They would be willing to serve again, but for the time being, when a forest fire occurred there was a "let George do it" attitude. "The CCC boys will get that one; I'll go over to see what's up if the smoke doesn't die down right away!" The regular forces in CCC counties just quit functioning. The Chief Forest Wardens kept up the normal amount of prevention work, but their efforts to keep their fire crews together met with little success. The CCC did, of necessity, take over a large part of the suppression work within their respective camp areas. The CCC was not an unmixed blessing, but the price paid was a low one for the benefits returned.

The more adequate suppression forces in these CCC areas, and the effect of the intensive training given the CCC crews was reflected in a rather striking reduction of the percentage of protected area burned. This reduced percent-burned figure, presumably brought about by more efficient suppression work, did not closely approach the similar figure for recent years when the availability of well trained adequate suppression forces have been much less favorable. In other words, suppression excellence can never replace intensive, well-planned prevention.

Thus did Virginia Forest Service enter upon the CCC era -- a period during which Virginia was destined to move many years forward in physical improvements. But what is considerably more important, the CCC movement was generally popular in Virginia from its inception, and interest in the camps, their doings and their accomplishments in the field of sociology rapidly generated an interest in the forests and in conservation generally. This interest paved the way for undreamed-of expansion and intensification in the decade following the CCC era.

Results and Accomplishments: The Later Years of the Era

Maintenance of CCC Improvements

At the outset of the CCC program, and as a prerequisite to that program, some sort of declaration of policy was required from the Governor of Virginia, as from all other governors of states in which the CCC functioned on privately-owned lands, giving some assurance that state funds for the maintenance of improvements would be provided. The then Governor of Virginia, John Garland Pollard, gave such assurance. In the budget which he submitted to the General Assembly of 1934 was set up a fund of \$20,000 "for the maintenance of improvements constructed by the Civilian Conservation Corps."

This budget item was not one of momentary interest, to be soon forgotten. Each succeeding budget bill since that time has carried an appropriation to the fund then created, and the amounts appropriated have been sufficient to preserve these improvements for use. Maintenance may have been sketchy in some years, but nearly all of the original CCC improvements have been kept in operation. The few which have not are those which changing times, changing ownerships, and changing risks or hazards have rendered obsolete. The promise made by Governor Pollard nearly two decades ago has been kept, and is still being kept.

The initiation of this maintenance fund is a more than passing importance, for it added materially to the total funds available. As a matter of fact, with the general economic situation what it was at the time, it represented the only material addition at that time.

Forest Fire Control:

As for the results and accomplishments of the CCC movement itself in Virginia, they must be measured by two yardsticks. First of all, the physical accomplishments of the camps assigned to it gave Virginia Forest Service a forest fire control plant to work with which was far beyond its rosiest dreams. Almost overnight, as it were, tools were placed in its hands to accomplish work it had for years been attempting to do barehanded. But important though this may have been, it fades to the commonplace when we consider the stature of the movement by the second yardstick, for it focused the attention of the public on conservation in general and upon Virginia Forest Service in particular.

At the outset of the movement in 1933, there were in Virginia only nine lookout towers of permanent design. Of temporary structures for this purpose there were but four in use. A few federally operated towers provided a meager amount of cooperation, but protection in Virginia was being carried on virtually without a detection system. Telephone communication from these

thirteen towers provided only the barest minimum of communication necessary to make them effective. These towers and telephone lines comprised the entire roster of physical improvements of Virginia Forest Service in their undertaking to protect 10,194,671 acres in 58 counties.

By the end of the CCC era, in 1941, the protected area had grown to 12,119,269 acres in 80 counties, and the Forest Service had a waiting list of eleven counties awaiting organization as soon as funds became available. These 80 organized counties had a fairly adequate detection system of 100 towers, with adequate communication to make them effective. Almost all of this expansion of detection facilities had been made possible by the CCC program. In addition, a large part of the protected area had been opened up for more efficient attack by a well-planned system of truck trails. Considerable experimentation had been done on the development of water holes to supply water for fire fighting use along these truck trails, and Timber Stand Improvement demonstrations were beginning to focus public notice upon forest management practice.

A summary of major forest fire control improvements constructed by the CCC in Virginia through 1941 is relevant:

Truck trails	1,363.8 miles
Horse and foot trails	392.7 miles
Telephone lines	744.9 miles
Vehicle bridges	27
Lookout towers	88

The State appropriation for the protection and development of forest resources had grown by 1941 from approximately \$35,000 in 1933 to about \$72,000 plus \$24,000 for the maintenance of CCC improvements, plus \$3,000 in a special fund for extending forest fire protection to additional counties -- a total of about \$99,000 for all purposes. Much of the additional funds had been required for extension of fire protection to the additional counties, but there had at the same time been a gradual intensification of the forest fire control effort.

The combined effect of this intensification and the availability of CCC help as a second line of defense may be illustrated, though perhaps imperfectly, by a comparison of the pre-1933 five-year averages with those of the pre-1941 five-year period:

<u>Period</u>	<u>Size of Average Fire (Acres)</u>	<u>Average Annual Percent Protected Area Burned</u>
1929 - 1933, inc.	84.5	1.44
1937 - 1941, inc.	24.5	0.48

For the purpose of a true comparison, the figures given for the pre-CCC five-year period are undoubtedly too high, for they include the disastrous drought year 1930 when the average fire reached 136.5 acres, and 3.9 percent of the total area protected was burned. Had 1930 been a near-normal year the results for the period would have been approximately 59 acres in the average fire, and an average annual percent of protected area burned of about 0.84. The net gain through the CCC period, therefore, may be summed up approximately by the statement that the fire losses were cut in half.

This is a striking record for eight short years, especially when note is taken of the facts that there was no striking increase in fire control funds other than the CCC maintenance fund, and that a great deal of the actual in-

crease in funds had to go into expansion rather than intensification of effort. Much of the increased efficiency must be credited to the CCC effort, directly. Some must be given to the normal intensification. But the portion of credit we must give to the intangible, hard-to-measure efforts of the CCC movement upon public thinking is not inconsiderable.

Important Legislation

The General Assembly of 1940 amended the section of law governing brush burning in a manner which accomplished a great deal in the development of forest fire control in Virginia. To the restrictions on brush burning already in effect, it was provided that from March first until May fifteenth of each year it should be unlawful to set fire to any brush or inflammable material capable of spreading fire, within three hundred feet of any wooded or brush land except between the hours of four p.m. and midnight.

This important and unique provision was secured in a rather odd fashion. What State Forester Pederson had in mind originally was a brush-burning permit law somewhat similar to such laws in some of the other states. Such a bill was introduced and referred to the appropriate committee. Upon appearing before the committee to defend the bill, Pederson found that the senators were rather cold on the subject. That word "permit" struck an unresponsive chord. It was explained that a permit system would give an opportunity for a contact through which the brush burner might be influenced to burn late in the day. After a bit of discussion the bill was killed and a new one prepared to provide for the 4 p.m. to midnight provision. This was reported favorably and passed with hardly a dissenting vote in either House.

Thus did Virginia Forest Service secure a law which has been of infinite help in reducing forest fires; one which is easy to enforce; and one which no one dreamed of asking for because it was assumed that opposition would be overwhelming.

State Forests

An important though unrelated phase of what we have chosen to call the CCC era was the development of the State Forests program. At the outset of the period, Virginia Forest Service had but one State Forest -- the Gallion; which, as has been previously noted, was acquired by a bequest in the early twenties. It consisted of 588 acres in the South Piedmont region.

In 1934, a Resettlement project was initiated in this same general area which eventually involved the counties of Appomattox, Buckingham, Cumberland and Prince Edward. It was proposed that the land, or part of it, involved in this project ultimately be leased to Virginia for state forest purposes, and eventually in 1939 such a lease was made, involving some 40,000 acres in three units, one of which was adjacent on two sides to the old Gallion State Forest. A fortunate choice of project leader was made in the appointment of District Forester "Jim" Andrews.

It is not within the province of this history to comment upon the sociological qualities of the Resettlement movement in Virginia. Probably it contributed its part in the relief of the serious situation which existed in the early and mid-thirties. However that may have been, it certainly con-

tributed much to the advancement of land use conservation in the Commonwealth and set Virginia Forest Service up in business as a forest manager. Here at least was an instrument with which to demonstrate the possibilities of sound forestry practice, even upon the poorest sort of soils. Here upon these acres submarginal for timber growing was a challenge which was met squarely. The land had been purchased and a program of improvements was carried on by the Resettlement Administration simultaneously. A large part of these improvements were recreational, but the existing system of roads had been overhauled and enlarged, and perhaps the greatest asset of this improvement program was the 702 acres of old fields which were replanted to trees, mainly shortleaf and loblolly pines. A more than adequate equipment of administrative buildings was also a part of this program.

When Virginia Forest Service took over these three units, the most important immediate need was for a timber inventory. This was set up as a CCC project and carried out during the last year or so of the CCC era. Aside from this, the principal activities of the first years were purely custodial, and the operation and maintenance of the recreational facilities. This was financed by the transfer of a small sum annually from the Virginia Conservation Commission's Division of Parks. There was not then, nor has there been since, any other appropriation of public funds for the operation of the areas. As forestry projects they had to "stand on their own two feet," and this fact has done much to make them in later years practical demonstrations in forest land management.

By the end of 1940, a decision was reached to operate the lakes and beaches directly under the Division of Parks. That agency was a specialist in that line, and it seemed illogical to bring Virginia Forest Service into the recreational field. This wise decision has contributed much to the later development of the areas by permitting the Forest Service to concentrate upon the problem of rehabilitating the areas -- to operate them strictly as forests and wildlife objectives. The Forest Service and Division of Parks, both bureaus of the same department, have had no difficulty in cooperating smoothly and efficiently.

In applying the same psychology to the wildlife aspects of the area, a cooperative plan was drawn up with the Commission of Game and Inland Fisheries, which has functioned perfectly through the years and is still in effect. In this case, since the two agencies are not under the same department, a veto power is retained by the Forest Service, but it has never yet been used.

Other development of state forests during the CCC era include the further development of Gallion State Forest and the acquisition of the Conway Robinson State Forest, four hundred acres in Prince William County. Early in the CCC era a camp was established upon the Gallion, which was occupied almost to the end of the CCC movement. While a large part of the work of this camp was on privately-owned areas in fire control improvements, it did accomplish the planting of all the remaining open areas on the Gallion, the establishment of a forest road system, and a certain amount of timber stand improvement work.

The four-hundred acre tract in Prince William County was a gift to the State as a memorial to the late Conway Robinson. This tract was acquired in 1938. Only about two-thirds of the area was in forest cover. The remaining land was planted with stock from the Virginia Forest Service by CCC labor, and

the area was mapped and fenced. The development of the area included a picnic area and foot trails.

Nursery

The total production of tree seedlings at the one nursery of Virginia Forest Service at the outset of the CCC movement did not much exceed 300,000, yet this modest production approximated the annual demand. With the spurred interest in conservation and as this interest reflected itself in demand, production was increased to meet it, reaching a million seedlings in 1939, and jumping to about two and a quarter million in 1941. It was a period of expansion.

Through CCC projects, the nursery was built up physically and by 1941 an adequate stand of buildings had been provided, including a nurseryman's residence, equipment shelter, garages and warehouse as well as those structures more directly connected with the production of seedlings. Virginia Forest Service is indebted to the CCC movement primarily for the increase in demand, the increased rate of reforestation, but in a practical sense it gained a modern up-to-date nursery plant and general headquarters, even though that plant was small for the expansion to follow in later years.

Personnel:

In 1933, as has been mentioned, the professional personnel was of necessity curtailed by two positions. It was stripped to bare essentials; State Forester, Assistant Forester in charge of the nursery, four District Foresters, and a Supervising Warden. These included F. C. Pederson, State Forester; Chapin Jones at the nursery; George W. Dean, Seth G. Hobart, J. P. Andrews, Berlin Eye, District Foresters; and G. H. Hodge, Supervising Forest Warden. There were several personnel changes through the CCC years, yet in 1941 there had been but one addition to the professional staff. An Associate Forester in charge of Forest Management and State Forests had been added as a consequence of the expansion of the state forest program through the leasing of the Land Use areas.

In October 1934, District Forester J. P. Andrews, as has been previously mentioned, was granted leave of absence to become Project Manager in charge of the Resettlement project which has been previously mentioned. Mr. Hunter H. Garth was appointed Acting District Forester to succeed him. Mr. Garth later became District Forester in 1938.

Early in the year 1936 W. H. Stoneburner, who had been granted leave in 1930 to assist in the acquisition of the initial nucleus of Shenandoah National Park, returned to duty and in the fall of the same year Chapin Jones resigned to become Professor of Forestry at the University of Virginia. Mr. Stoneburner succeeded him at the nursery. On January 1, 1940, J. P. Andrews returned to duty and was assigned to Richmond headquarters, the plan being to divide the large and unwieldy Coastal Plain district (Administrative District No. 1), with the James River being the dividing line, Mr. Dean to retain the area south of the James, and Mr. Andrews that to the north. However, before the plans could be completely activated Mr. Andrews' health failed and he found it necessary to resign. The expansion was, therefore, postponed.

In July 1940, District Forester George W. Dean was promoted and transferred to the Charlottesville office as Associate Forester. His duties in his new position were primarily the assistance of timberland owners with their forest management, utilization, and marketing problems. He was also placed in charge of the newly leased state forest areas. Mr. T. Brantley Henderson was appointed District Forester to succeed him at Richmond.

With the leasing of the Resettlement areas as state forests, Mr. Joseph C. Hayes who had previously been identified with Resettlement Administration in the acquisition and development of the areas, was appointed as Custodian, with headquarters on Cumberland State Forest. Mr. Hayes was responsible to District Forester Hunter H. Garth and although at the time this was not considered a staff position, it has since grown into an important place on the staff. This history would be incomplete without a note here of his original appointment.

Cooperation with Tennessee Valley Authority

With the establishment of the Tennessee Valley Authority, which included most of seven counties in the Southwestern part of Virginia, a rather close cooperation with that organization developed in the Bristol District, particularly in the field of forest fire prevention. In September 1936, Mr. Myles J. Mulholland was detailed by TVA to the Virginia Forest Service Office in Bristol, charged with an intensive prevention campaign in Washington County, using the medium of motion pictures. A regular schedule of forest fire prevention motion picture programs each week was set up to cover a month's work, with return with a new program on the same date each month for six months. Upon completion of the trial run in Washington County, similar series of programs were run in Lee and Russell counties, Mr. Mulholland remaining in the district until May of 1938.

As is the case in all such prevention activities, the efficiency of this effort was hard to measure at the moment. It was difficult to determine whether the occurrence of fires the following season was measurably less than should have been anticipated without this program. Looking back fifteen years, it is certain that this effort, as one of many prevention activities, played its full part in the vast improvement of fire protection in the area. However, upon the completion of the Russell County program in May 1938, it was decided that changing times and the loss of novelty of motion pictures in the back country had decreased the effectiveness of that type of prevention effort to the point that the prevention program should be re-vamped. Accordingly, Mr. Mulholland was assigned other duties elsewhere and the intensive motion picture program was abandoned, replaced in part by spot showings from time to time with Virginia Forestry Service equipment.

In May 1941, the TVA assigned William G. Grieve to the Bristol office of Virginia Forest Service as a forest fire prevention specialist, and functioning as a sort of assistant district forester. The prevention program he initiated was general in character, making use of any media considered best adapted to the area involved. This was to continue indefinitely upon a district wide basis and it did continue until it was upset by World War II. It was an effective and worthwhile effort.

Summary:

The CCC era was one of accelerated progress for Virginia Forest Service---vastly and widely accelerated progress in physical fire control improvements, but only moderately accelerated progress in the growth of the organization and its work. Most of the growth was in fire control, but a staff specialist in management appears in the final year, and the organization had entered the state forest field in earnest with the leasing of the land use areas. Demand for planting stock had increased by seven or eight times and the small nursery was valiantly trying to keep ahead of this demand. Public acceptance of all phases of forestry was growing.

But the Forest Service was still carrying on a small, compact, closely-knit organization. Administrative districts were still one-man jobs, although the days of the portable typewriter and a stack of files in the corner of the bedroom were gone. All districts had full time clerks by the end of the period. Perhaps it may be said that Virginia Forest Service came of age in the nineteen-thirties. They had reached majority, had been prepared for greater things to come, but had laid only foundation stones of the structure to be built. Now they were ready to erect the walls.

VI - NATIONAL DEFENSE AND WORLD WAR II - 1941-1945

Beginnings of ExpansionBreaking Away from CCC

With the demobilization of CCC getting well under way in 1941 and being completed early in 1942 and recalling the difficulty encountered during CCC years in holding civilian crews together in territory served by a CCC camp, perhaps some let up, or deterioration of the fire record was to be expected as the camps were abandoned. Some such movement would have been considered normal. This tendency was further exaggerated by the fact that both 1941 and 1942 were abnormally severe fire seasons. While the worst of these two years, 1942, was by no means another 1930, and had no prolonged drought comparable in any way to that of 1930, it did bring periods of extremely hazardous fire weather, and it was definitely the worst fire year, from the aspect of fire weather, since 1930.

It is probably both unfortunate and fortunate that this was true. Unfortunate for the record and the acres of timberland burned, it was nevertheless fortunate because the challenge it laid down enabled the Chief Forest Wardens to quickly rebuild their rusty crews and step into the breach caused by the withdrawal of CCC forces. The local forest wardens and fire fighters, when they saw what was happening, were quick to step back into harness again.

In 1941 the percent of protected area burned jumped to 0.91, and in 1942 to 1.90. How much this could have been bettered with CCC support is problematical. The National Defense production program and mobilization for World War II had made available man-power scarce and the lack of the strong second line of defense which had been available from CCC undoubtedly had considerable effect, but even with the normal help of the CCC the percentage of burn would still have been high.

Such of the CCC Camps which were still in the field in 1942 were away below full strength, and most of them were manned by boys of tender years who were not certified for fire duty by their Company Commanders and Medical Officers. About the only use made of the remnants of CCC during the spring fire season of 1942 was transportation and equipment. Perhaps that, too, was fortunate. A quick plunge into a cold pool is better than inching in gradually

National Defense:

As America tightened its belt for war, Virginia's coastal section became a critical area of first importance. Late in 1941 a beginning was made toward planning the adequate protection of that section which centered about the port of Norfolk and consisted of counties not then organized for protection. This undertaking was financed from Federal funds from the Sixth National Deficiency Appropriation, but the organization was within the State plan and administered by the State. Under the direction of the State Forester the Norfolk Defense Area was intensively organized, temporary appointments being made to provide the necessary field supervision and administration. At the same time it became imperative to tighten and strengthen the protection organization throughout the state.

1942 Expansion:

The General Assembly of 1942 increased the total state appropriation for all forestry purposes by nearly \$35,000, bringing the total up to \$135,000. With emergency Clarke-McNary Section 2 funds and with the Sixth National Deficiency funds available for this war-time emergency work, the total activities of the Forest Service were vastly increased. New needs had arisen and to meet them considerable expansion was indicated.

First of all, the re-establishment of the post of Associate Forester in charge of fire control could no longer be postponed. When the intensive protection of the Norfolk Defense Area was made possible, Associate Forester George W. Dean, then in charge of Forest Management, necessarily took the leadership in that important job. As of July 1, 1942, Mr. Dean was officially transferred to forest fire control with the title of Chief of Forest Protection.

As of the same date, District Forester Seth G. Hobart, then in charge of the Bristol District, was transferred to Charlottesville to succeed Mr. Dean in the field of forest management with the title of Chief of Forest Management and State Forests. To succeed Mr. Hobart at Bristol, Mr. John B. Heltzel was appointed to the position of District Forester and placed in charge of District VI at Bristol.

Also on July 1, 1942, the Richmond, or Tidewater, District was divided into two districts with the James River as the dividing line. District Forester T. Brantley Henderson, Jr., remained at Richmond, and was assigned to the northern portion, designated as District II. Mr. Charles C. Steirly was as District I, with a new headquarters created at Waverly.

Thus the administrative framework grew in 1942 to include a State Forester with a staff of three division heads and six district foresters, and also including a temporary, emergency organization under the administrative supervision of a field officer with most of the authority of a district forester although not officially a member of the staff. Later in the year still more

expansion became possible, although the same administrative set-up was retained.

Late in the fall, the availability of Norris-Doxey Act funds released from the termination of the Shelter Belt project, appropriately matched by State expenditures, made possible the establishment of three Marketing Assistance projects. These were forest management assistance efforts calculated to stimulate the availability of timber for products needed in the prosecution of the war. One project each was assigned to Districts I (Waverly), II (Richmond), and IV (Farmville). About the first of December Mr. Ellis L. Lyon was appointed Project Forester and assigned to Waverly; and Mr. Robert P. Brierley, a forester formerly employed by CCC and in charge of the inventory survey of the land use leased areas, was given a similar appointment with assignment to Farmville.

On December 15, District Forester T. Brantley Henderson, Jr. was transferred to the position of Project Forester in the Richmond District. To succeed him as District Forester, Mr. William G. Grieve was appointed. Mr. Grieve had been for a number of years employed by Tennessee Valley Authority, and since May, 1941 had been assigned by that agency to District VI (Bristol) office as a forest fire prevention specialist. Another TVA forester carried on briefly in District VI, but soon war man-power shortages required his service elsewhere in the Tennessee Valley and the project was abandoned.

As has been previously noted, the end of CCC, (which we are considering as the end of 1941) found eight of the ninety-nine counties of Virginia needing protection organized for forest fire control. The creation of the Norfolk Defense Area provided protection to eight more: Nansemond, Norfolk, Princess Anne, Accomack, Northampton, Elizabeth City, Warwick and York, although these counties were not counted a part of the state's forest fire control organization. Three more counties were regularly organized: Floyd, Franklin and Patrick. Thus by the end of the year ninety-one of the ninety-nine counties were receiving protection, and Virginia Forest Service was within sight of the objective it had sought since 1915--State-wide forest fire protection.

Expansion in 1943-1945:

With the progress of the war, numerous critical defense areas were designated in the vicinity of important war industry plants, army and navy posts, powder plants, and ammunition loading plants, with special forest fire protection afforded from W.F.F.C. funds. Such special protection in most cases was supplemental to the regular organized effort of Virginia Forest Service, and in all cases was administered by that organization. This administration flowed from State Forester Pederson through Chief of Protection Dean and a staff assistant paid from W.F.F.C. or 6th ND funds to the appropriate field officer---The District Forester in all cases except the Norfolk Defense Area which being entirely unorganized territory, was handled by a special field officer.

Through the office of Civilian Defense a system of emergency fire control crews was organized. The official O.C.D. name of Forest Fire Fighters Service was used and the high schools of the state were the source of man-power. Under O.C.D. thorough training was required, and a training officer to supervise this training was provided from O.C.D. funds.

Like all of the war time emergency measures, this movement was dropped with the end of the war and with the end of O.C.D. The plan was so successful, however, that it was revived with some admendment as "Keep Virginia Green" crews. Not only have these crews been valuable as second lines of defense, but also most of the members become sufficiently interested in forestry and conservation to materially influence public thinking after they leave high school and attain majority. It is a most worthwhile undertaking.

The organization of new counties steadily continued. In 1943, Buchanan and Pittsylvania, both of which are counties of high forest acreage, were organized along with the Shenandoah valley counties of Frederick and Shenandoah. In 1944, King George, Wythe and Craig were added to the list, and on January 1, 1945, a date to be remembered, state-wide protection was achieved with organization of Scott County.

This still left the eight counties in the Norfolk Defense Area outside of the State Organization. However, with end of the war in Europe when Defense funds began to be curtailed, it was possible to transfer Accomack, Elizabeth City, Northampton, Warwick, and York counties to state protection; after the war, late in 1945, Norfolk, Nansemond, and Princess Anne counties were likewise transferred. By the end of the fall fire season the entire state had protection under the state organization.

In the summer of 1943 an especial need for a Marketing Assistance Project in the Northern Piedmont section of the state was felt and to meet this need the Waverly project was abandoned and Project Forester Ellis L. Lyon was transferred to Charlottesville in charge of the newly organized Charlottesville Project. The primary objective of the new project was to stimulate production of oak ship timbers, a commodity becoming harder and harder to find.

Late in 1943 a fourth Marketing Assistance project was created in the Salem District, and Rodney M. Hoy was appointed Project Forester at that headquarters.

On January 1, 1944, a new administrative district (No. VII) was established with headquarters at Staunton. The new district included parts of the older Districts III and V (Charlottesville and Salem) but the revision of district lines as a result of this addition affected also District IV (Farmville) and VI (Bristol). The re-organization consequent to this expansion was far-reaching and resulted in more efficient realignment of boundary lines throughout the entire western part of Virginia. Mr. F. J. Iobst was appointed District Forester at the new Staunton headquarters.

Personnel Changes:

More than the usual number of personnel changes marked the period, primarily as a result of the war. In August, 1942, District Forester William G. Grieve, of the Richmond District entered the Navy and Mr. John H. Eisinger, who had been employed briefly under the emergency organization, was appointed District Forester to succeed him. In September of the same year, District Forester Charles C. Steirly entered the Army. Mr. C. H. Dale, a Chief Forest Warden in Mr. Steirly's district was designated Acting District Forester to carry on fire control work in the Waverly District during his absence.

In February, 1944, Project Forester Ellis L. Lyon entered the Army. Difficulty was experienced in finding a forester to succeed him, but finally on June 1, Charles J. Witter was appointed Project Forester and assigned Charlottesville headquarters. Rodney M. Hoy, Project Forester on the Salem Project, resigned to accept other employment in April, 1944. It was impossible to replace him immediately.

Mr. Randolph Bibb, who had been staff assistant to the Chief of Forest Protection under the emergency organization, was appointed Maintenance Superintendent on July 1, 1944. He assumed the responsibility of the maintenance of all physical improvements, CCC and otherwise, together with part-time fire chief for District 3.

Project Forester T. Brantley Henderson resigned August 15, 1944 to enter the field of consulting forestry. Again it was impossible to make immediate replacement.

District Forester John H. Eisinger resigned October 23 to accept other employment. To succeed him Mr. Albert C. Worrell was appointed District Forester and assigned to Richmond headquarters.

A severe blow was dealt Virginia Forest Service and the Commonwealth of Virginia in June, 1944, when the State Forester Fred C. Pederson, became ill. After a short illness he died on June 27th. Chief of Forest Protection George W. Dean had been designated Acting State Forester at the beginning of his illness and continued in that capacity until August 21 when he was appointed State Forester.

The appointment of George W. Dean to succeed Fred Pederson was both wise and fortunate. Well trained, able and experienced, he was eminently fitted for his new duties. Of still more importance was the fact that he had served in the organization for fifteen years during which time he had helped to evolve policy and to build the organization in administering this policy. He was well known and liked by his fellows. His appointment meant that the Forest Service was in position to continue its development and expansion according to long-established policy and plan. It meant that the original general policies evolved by Jones and developed by Pederson could be continued without interruption or lost effort; and it meant, too, that the new State Forester held the unswerving loyalty of the entire organization.

To fill the position of Chief of Forest Protection left vacant by Dean's promotion, District Forester Hunter H. Garth was promoted on October 1, 1944. The vacancy thus created at the Farmville office was filled by the promotion of Robert P. Brierley from Project Forester to District. Mr. T. R. Jones was appointed Project Forester to succeed Brierley.

With the transfer of the last of the Norfolk Defense Area counties to state organization and the deactivation of the emergency measures a new administrative district was formed with headquarters at Portsmouth, designated as District VIII. Thomas S. Turner, who had been in charge of the Norfolk Defense Area during the war, was designated as the new District Forester, and E. G. Jones was named as Assistant District Forester in fire control. This became effective in October of 1945.

The Salem Marketing Assistance Project, vacant since the resignation of R. M. Hoy in April, 1944, was reactivated in April, 1945 when John C. Goode was appointed Project Forester. The Charlottesville project was sadly in need of help, and in April, 1934, it was divided, the Warrenton Marketing Assistance Project being acitvated and manned by the appointment of John D. Atkins, Jr., as project forester.

On December 1, 1945, the Richmond Marketing Assistance Project was reactivated by the appointment of C. Edward Gill as Project Forester.

The year 1945 marked the beginning of the plan of Assistant District Foresters in charge of fire control, or fire chiefs, in the districts. During the year appointments of this type were made in the Salem and Richmond Districts, as well as the newly formed Portsmouth District. C. B. Boone was sent to Salem and Robert G. Hasty to Richmond.

With the increased amount of motor equipment, trucks, cars, and the like, the need for a central shop and a mecnanical division was felt. Such a shop was established at the Charlottesville Nursery and Oscar Bellomy was appointed as Chief Mechanic June 1, 1945. Mr. Bellomy had served previously at the nursery, with the CCC and with the war time forest fire emergency organization.

Also in 1945, the first of the full time Chief Forest Wardens were appointed. By the end of the year A. J. Horner was in charge of Chesterfield County, S. R. Neblett of Elizabeth City County, Warwick and York, and Floyd C. Duncan of Washington and Russell.

Important Legislation:

The General Assembly of 1944 amended and re-enacted the basic law which since 1926 had placed the burden of suppression costs, other than forest officers, but including forest wardens, upon the county, with no limit as to the amount to which these suppression costs might go. The amended version of the act placed a limit of one cent per forest acre upon the amount to which any county might be obligated, but removed the stipulation that suppression costs only could be charged. In effect, therefore, each county might be called upon to share in the cost of forest fire control--- whether prevention, preparedness or suppression---up to a maximum of one cent per forest acre per year. This act made possible the additional forest fire control work up to a maximum of some \$121,000 per year. This factor was important in placing Virginia Forest Service in position to capitalize upon gains made through war time emergency efforts, when these projects terminated at the end of hostilities.

Financial Progress:

At the outset of this period, the total of state money appropriated for all forestry purposes was approximately \$100,000 per year. The Clarke-McNary Section 2 allotment for cooperative forest fire control amounted to around \$54,000. During the period considerable amount of emergency money was available as a consequence of the war, but that was the basic, regular amount available for all purposes.

By 1945 the total state appropriation had grown to about \$160,000 and the "one cent per acre" law made available for fire control purposes only any amount needed up to \$121,000. In effect, therefore, around \$280,000 was available from state and counties. The forest fire control allotment more

than doubled. Varying amounts of emergency money, up to a peak of about \$152,000 in 1944 were poured in. Let us see what this money bought.

Results - Fire Control:

One hundred percent protection was achieved by January 1, 1945.

Intensive protection was afforded critical defense areas.

Expressed in terms of percent of protected area burned, the success of the protection effort was:

<u>Year</u>	<u>Percent Burned</u>	<u>Total Expenditures in Fire Control</u>
1942	1.90	\$167,562
1943	0.81	365,047
1944	0.212	352,577
1945	0.224	366,607

Nursery:

Production was curtailed during the war. Demand fell off materially due to the shortage of labor. Results:

<u>Year</u>	<u>Seedlings Distributed</u>
1942	1,326,450
1943	606,810
1944	388,600
1945	593,300

Management:

Three Marketing Assistance Projects were established late in 1942. A fourth was added late in 1944, and a fifth in 1945. Wartime shortages of foresters kept two of these inoperative at times, but the others were continuously operated from the date of establishment and within their respective areas contributed materially to the filling of wartime needs for forest products. These projects within their zones of influence did much to advance public interest in forestry and operator acceptance of marked timber.

State Forests:

One tract interior to Appomattox-Buckingham State Forest, in extent 247 acres was purchased.

A program of timber cutting was initiated, which placed all of the forests on a paying basis. Total cut from state forests, converted to cords, was as follows:

1943 - 604 cords; 1944 - 5780 cords; 1945 - 6395 cords.

The war years were of necessity years of advancement. Before they had ended the objective of thirty years had been achieved; fire control, the prerequisite of all other forestry, had been provided; Virginia Forest Service was on the threshold of expansion into extensive new fields.

VII - POST-WAR EXPANSION, 1946-1950

Early in 1946, a new administrative district was created with headquarters at Tappahannock, Virginia. This new district embraced nine counties which had previously been a part of District II (Richmond), in the northern part of that district. District Forester William G. Grieve was assigned to this district upon his release from active duty in the Navy. Later in 1946, upon his release from the Army, Project Forester Ellis L. Lyon was assigned to Tappahannock in forest management work. Thus, early in 1946 the present nine district plan of organization was initiated.

Forest Fire Control:

The increase of state appropriation of all categories applicable to forest fire control to some \$170,000, along with benefits derived from the "one cent per acre" law of 1944 and a somewhat increased federal allotment under Section 2 of the Clarke-McNary Act enabled Virginia Forest Service to hold the ground gained during war years and convert to peace-time status without undue inconvenience. The nine district organization was retained, and progress was made in 1946 toward providing each district with a full time Assistant District Forester in charge of fire control. By the end of 1946, all but two of the districts were thus organized. In order to maintain gains made in fire prevention, a staff division of Information and Education had been created late in 1945, and this new division was headed by Harry Lee Baker, who had formerly functioned under the wartime emergency organization.

The year 1946 was not a year of prolonged or severe fire weather. A total of 1,967 fires were reported, burning 26,955 acres, or 0.207 percent of the total area protected. This was about the same as the two years immediately preceding, and exceeded the objective set up for the state by the negligible amount of 0.007 percent. In 1947, 1,669 forest fires resulted in a burn of only 0.185 percent. The Clarke-McNary Act Section 2 allotment for that year had been materially increased, which gave opportunity for considerable expansion. By the end of the war, each administrative district had an Assistant District Forester in charge of fire control except one, and in this one district a comparable amount of service was provided on a per diem basis. Some districts had additional full time fire administrative officers. Another factor which undoubtedly played a part was the increase of full time personnel in Forest Management, which gave the Forest Service a reservoir of well trained fire bosses.

Legislation of great importance to forest fire control as well as to all phases of the work of Virginia Forest Service was enacted by the General Assembly of 1948. The budget as presented for the Forest Service was a carefully studied account of its practical needs for the biennium, based upon the existing organization along with such expansion or intensification as were believed to be urgent and necessary. The over-all budget presented to the Assembly fell some \$200,000 short of this figure, although it did provide a not inconsequential increase over the previous appropriations.

A member of the General Assembly, Senator Garland Gray of Waverly, who is himself a lumberman, with the backing of a large part of the forest products industry in the state, in effect challenged the legislature to meet half of this shortage from general funds, with the other half to be raised by a special tax against the forest products industry. To fulfill the latter

part of this challenge, he introduced the Forest Products Tax Bill which was geared to produce \$100,000 annual revenue. The challenge was accepted, an additional \$100,000 was added to the appropriation bill, and the Forest Products Tax Bill was enacted. The net proceeds of this tax are segregated to the Forest Service and are appropriated in advance for its use. Thus, in 1948 for the first time, Virginia Forest Service was provided with practically the entire budget requested---funds calculated to be adequate to its needs.

While these additional funds were not segregated to forest fire control, they permitted necessary expansion in that division as well as in the others. The expansion permitted included additional district personnel where needed, full time chief forest wardens, and some additional equipment. This has contributed considerably to the favorable records made in the years following. Expressed in terms of percent of the protected area burned, they are: 1948, 0.060 percent; 1949, 0.093 percent; 1950, 0.150 percent, and 1951, 0.123 percent. In 1948, for the first time in its history, Virginia Forest Service had completed a five year period with an average annual percent burned under the State objective of 0.20. For 1944-48, inclusive, this figure was 0.178 percent. For the past eight years, the average is but 0.156 percent.

It is true that some of these years have been favorable from the standpoint of weather conditions. However, there have been years of severe weather conditions, too. For instance, 1950 was a year when weather would compare with that of 1942, when the percent burned went to 1.90 percent. Severe fire years will be encountered, no doubt, but a real test came in 1950 which proved that Virginia Forest Service's forest fire control was no "fair weather" organization.

While facilities for efficient suppression have been materially increased, it is felt that the principal contributing cause for the improvement is in the field of prevention. The number of fires has been reduced, but probably the most important change was in the general attitude of the public, toward the fires which did start. What had been commonplace two decades ago now was regarded as catastrophe. Prompt, rigid and impartial enforcement of the fire laws contributed much to fire reduction.

Reforestation:

By 1942 the limit of seedling production at the Charlottesville nursery had been reached. The war years, with their attendant man-power shortage, gave a brief respite, but at the end of World War II the demand again was felt, still further stimulated by the development of planting machines which materially reduced the cost of planting. Seedling production had to be increased.

Funds for the acquisition of a suitable nursery site being non-existent, an agreement with the U. S. Navy provided a site at Camp Peary near Williamsburg where development of a second nursery began in 1947. Production at the two nurseries was geared to anticipated demand. During the shipping season of 1947-48 nearly two and one half million seedlings were distributed. The following year this grew to 2,840,000 and the next two years (1949-1950) production averaged about 4,350,000. Production for the current season (1951-1952) is estimated at nine million seedlings.

By 1950 the state of world affairs plainly pointed toward the necessity of abandoning the Camp Peary site and developing a new one. Accordingly, steps were taken in 1951 to acquire a new nursery site some 20 miles west of Camp Peary and its development was begun. As soon as the 1951 crop is lifted and shipped, the Camp Peary site will be returned to the Navy and the 1952 production load will be borne by the new Windsor and the Old Charlottesville nurseries.

A number of planting machines were purchased in 1948 in order to provide the public with an economical means of planting trees on sites of eight acres or more. These are rented at nominal rates. Additional machines have been added to this pool, and one machine has been assigned mainly to State Forest plantings. At the end of 1951 eleven of these machines were owned.

Current demand for planting stock is around nine million seedlings per year. The new nursery now being established is susceptible of expansion to almost any volume of production likely to be necessary.

Forest Management:

At the end of World War II Virginia Forest Service was administering four marketing assistance Projects upon which five full-time foresters were engaged. The acceptance of these projects by the public had been good, and a need for an enlarged program of assistance to landowners was felt. Already the objectives of the old projects were changing in that direction, but more expansion was desirable. To meet this need, the General Assembly of 1946 under the persuasion of Delegate E. O. McCue of Charlottesville, enacted the so-called Forestry Service to Landowners Act. This is in effect an enabling act, setting forth the authority of the Virginia Forest Service to examine tracts of timberland and make recommendations for its management free of charge; also, when the conditions warrant and the landowners so requests, the authority to select, mark and estimate the trees to be cut, charging a fee for such selecting and marking, and setting up limits within which such fees must fall. And what is also important, this act included an appropriation for this work for the two years of the ensuing biennium. This appropriation found its place in future budgets and has been continued and increases.

In line with authority granted in this act, the number of service foresters was increased in the summer of 1946 to seventeen full-time foresters. Considerable work of this nature was performed by part time foresters -- men whose principal duties were in other fields of forestry, or men specifically employed to devote half their time to service work and half to some other field.

The further developments of the 1948 session of the legislature increased funds available to some extent, fees collected were considerable, and the forest products tax added a bit more. By 1948 the full-time service forester personnel was up to 24, and in 1951 to 36 full-time professional foresters.

In fiscal year 1946, a total of 48,703 acres were examined, 4640 acres were marked, yielding 14,778,000 board feet and 3,179 cords. This grew up to 199,876 acres examined, 45,100 acres marked, with 68,727 seed trees designated, 13,688 cords, and 72,149,000 board feet marked in 1951. In 1951 it was estimated, that the seed trees selected represented a forestry influence on the cutting of 130,117,000 board feet, which brings the total cut influenced by Virginia Forest Service up to a figure well over two hundred million, or roughly sixteen percent of the total annual cut. After five years of the program results were apparent outside the direct efforts of Virginia Forest

Service--the better cutting practice on unmarked tracts by operators who had become accustomed to marked timber. Considering this gain, and other forestry efforts of industries, on state and national forests, and the like, it seems a very great portion of the annual cut.

State Forests:

By working out a cooperative arrangement with Fire Control personnel, the L.U. Areas and Gallion Forest, which comprise more than 85 percent of the total were manned by a State Forest Supervisor and three Rangers, with a labor force averaging four men. All of the ranger personnel administer forest fire control in the three counties within which the forests lie. The fire control fund supports one ranger in exchange. A systematic management program was set up in these areas. During the period, cutting annually was substantial but well under growth. The quality of the stands was improved by this management and a large part of the remaining old fields were planted up. In the later years of the period a considerable amount of reinforcement planting was done in cut-over areas, a practice calculated to secure mixed stands running strongly to pine rather than lowgrade hardwoods. Stand improvement and planting were utilized in the improvement of the poplar sites.

In 1946, title to the area formerly known as Swift Creek Park was vested in the Department of Conservation and Development, and the Park areas were segregated, with 5600 acres of the project designated as State Forest. Considerable thinning of young pine stands was accomplished at a good profit.

In 1947, an agreement with the U. S. Navy resulted in State Management of the Camp Peary property. In addition to the nursery site, some 6000 acres were managed as a State Forest until the summer of 1951, when it was returned to the Navy. The Peary Forest was operated at a net profit during those years, which net profit, of course, accrued to the Navy when the property was returned. It served as an excellent demonstration of practical forest management.

Progress was also made in acquisition of interior alienated lands within the Land Use Areas. By 1951 about 1000 acres had been acquired in small tracts and the ownership pattern had been much improved.

Administrative Headquarters:

Prior to 1946 the field forces of Virginia Forest Service were quite compact, with district headquarters rarely manned by more than one or two men. It was relatively easy and economical to find the simple office accommodations required for them. Storage facilities presented more of a problem in the later years of World War II. The CCC movement had provided garage, warehouse at Salem and at field headquarters of some of the old forest fire protective associations (specifically in Bland, Dickenson and Wise Counties) as well as at the Charlottesville nursery site. These buildings were fully utilized, but they had to be augmented by rented space, most of it inadequate and unsatisfactory, at other district headquarters. District office space was rented in all districts. With the rapid expansion beginning in 1946, these offices became crowded and inadequate.

The same crowded, inadequate office space conditions extended also to the State Headquarters provided by the University of Virginia at Charlottesville. The University had expanded rapidly and space was at a premium. The storage situation at the nursery, however was not acute.

Forced by the pressures, a beginning was made toward remedying these conditions in 1949 when a suitable lot was purchased at Farmville and a garage-warehouse-shop building was erected. All lumber for this building was produced on the state forests which resulted in a material savings. Most of the labor was performed by regular employees. Space upon the lot was set aside for an office building to be erected later.

In the fall of 1950, a complete headquarters building was erected at Waverly, housing adequate office space, garage space for equipment storage and shop space. This proved to be a satisfactory solution of the district headquarters problem, and early in 1951 a similar building was erected at Sandston to serve the Richmond district. Currently (January, 1952) similar buildings are under construction at Tappahannock and Staunton.

Bills of material are now being cut on the State Forests for office buildings to supplement the existing buildings at Salem and Farmville, as well as for an adequate building at the newly established Windsor Nursery. These projects are contemplated for the coming year.

To relieve the congestion at State Headquarters at Charlottesville, an appropriation has been made for a new building at the University of Virginia which will provide ample space for Virginia Forest Service, both headquarters and district, and the Division of Water Resources and Power, which is another bureau of the Department of Conservation and Development.

Personnel:

Through this history up to the end of World War II we have followed all personnel changes in some detail because nearly all, if not all, of the men whose names are given have contributed much to the growth and development of Virginia Forest Service. The same principles are no doubt still true to a large extent. But with the expansion which began in 1946 the Virginia Forest Service "grew up" from a tight, compact little organization to one embracing more than one hundred men. To continue to list these men in this history would serve no good purpose. Therefore, personnel in these later years will be named only to the District Forester level, thus being restricted to administrative positions.

In 1946 the administrative personnel was as follows:

George W. Dean, State Forester
 Hunter H. Garth, Chief, Forest Protection
 Seth G. Hobart, Chief, Forest Management
 William H. Stoneburner, Chief, Reforestation
 Harry Lee Baker, Chief, Information and Education
 Charles C. Steirly, District Forester, District I
 Albert C. Worrell, District Forester, District II
 Berlin Eye, District Forester, District III
 Robert P. Brierley, District Forester, District IV

G. Henry Hodge, District Forester, District V
 John B. Heltzel, District Forester, District VI
 Fritz J. Iobst, District Forester, District VII
 Thomas S. Turner, District Forester, District VIII
 William G. Grieve, District Forester, District IX

Robert W. Slocum was added to the headquarters staff as Management Assistant in the summer of 1946.

Albert C. Worrell resigned as District Forester in District II in 1947, and Robert W. Slocum succeeded him. Charles J. Witter then became Assistant in Management.

Harry Lee Baker resigned in 1947 and was succeeded as Chief of Information and Education by John B. Heltzel. To succeed Mr. Heltzel in District VI, Mr. Ralph J. Bartholomew was promoted to District Forester.

Berlin Eye was assigned to other duties in 1948 and F. J. Iobst was transferred from District VII to District III to succeed him. Mr. E. E. Rodger was promoted to District Forester in District VII.

Thomas S. Turner was assigned to other duties in the summer of 1948 and Ralph J. Bartholomew was transferred from District VI to District VIII to succeed him. David M. Waite was promoted to District Forester in District VI.

Charles J. Witter was assigned to other management duties in 1948 and was succeeded by Wallace F. Custard as Staff Assistant.

William G. Grieve was transferred to headquarters office as Staff Assistant in Information and Education in 1948 and Fay M. Straight was promoted to District Forester to succeed him in District IX. Mr. Grieve resigned in 1949 to accept another position and E. E. Rodger was transferred to succeed him at headquarters. Thomas R. Elliott was promoted to District Forester to succeed Mr. Rodger in District VII.

Fritz J. Iobst resigned late in 1949 and Dallas G. Wilfong, Jr. was promoted to District Forester to succeed him in District III.

During the summer of 1951, both Fay M. Straight and Robert W. Slocum were recalled to duty in the Army. Arthur L. Jolly, Jr. was promoted to District Forester to succeed Mr. Slocum in District II and John N. Graff was likewise promoted to succeed Mr. Straight in District IX.

Early in 1951 William H. Stoneburner retired and John B. Heltzel was transferred to succeed him as Chief of Reforestation. E. E. Rodger was promoted to the position left vacant by Mr. Heltzel.

On December 17, 1951, G. Henry Hodge died suddenly. This was a serious blow to Virginia Forest Service. Early in January 1952 Raymond L. Marler was promoted to District Forester and transferred to District V to succeed him.

PERSONNEL CORRECTED TO SEPTEMBER 1, 1953

Berlin Eye died suddenly in 1950, and to succeed him at the Charlottesville Nursery, William H. Haag was transferred from the Staunton District.

The recall of Fay M. Straight and Robert W. Slocum to military duty in the summer of 1951, and the death of Henry Hodge in December of that year placed three men in quasi District Forester appointments in positions only one of which could become permanent. After the return of both Straight and Slocum, after considerable study of the situation, the permanent appointment as District Forester went to Arthur L. Jolly, Jr., who assumed charge of District V at Salem. Ray Marler returned to his old position as District Management Chief at Richmond and John Graff to his as District Fire Chief at Farmville.

As of September 1, 1952, the field roster of Virginia Forest Service was as follows:

Headquarters:

State Forester:	George W. Dean, Charlottesville
Chief, Protection:	Hunter H. Garth, Charlottesville
Chief, Management:	Seth G. Hobart, Charlottesville
Chief, Reforestation:	J. B. Heltzel, Charlottesville
Chief, I & E	E. E. Rodger, Charlottesville
Chief, Insect & Disease Control:	G. H. Plumb, Charlottesville
Ass't Chief, Management:	W. F. Custard, Charlottesville
Draftsman:	F. A. Wagener, Jr., Charlottesville
Staff, I & E	W. M. Carter, Charlottesville

Shop:

Chief Mechanic:	Oscar R. Bellomy, Charlottesville
Mechanic:	Leroy Collins, Charlottesville
Mechanic:	Robert F. Perkins, Louisa

Nurseries:

Superintendent, New Kent:	Geo. W. King, Boulevard
Superintendent, Charlottesville:	Wm. G. Haag, Charlottesville
Foreman, New Kent	John A. Rudisill, Roxbury
Foreman, Charlottesville:	J. B. Cleveland, Scottsville

State Forests:

Superintendent:	J. C. Hayes, Cumberland
Ranger:	Edward H. Robertson, Cartersville (also CFW)
Ranger:	Frank Gowin, Andersonville (serves as CFW)
Asst. Ranger:	C. E. Franklin, Jr., Andersonville

District I:

District Forester:	Charles C. Steirly, Waverly
Chief, Management:	Thomas E. Yancey, Waverly
Chief, Protection:	C. H. Dale, Homeville
Service Forester	H.H. Hudson, Waverly
Service Forester	John F. Kundt, Waverly

District II:

District Forester:	Robert W. Slocum, Richmond
Chief, Management:	R. L. Marler, Richmond
Chief, Protection:	C. M. Pennock, Jr., Richmond
Service Forester:	Edward D. Lett, Richmond
Service Forester:	Wm. A. Tyler, Sandston
Service Forester:	E. P. Furlow, Richmond

District III:

District Forester:	D. G. Wilfong, Jr., Charlottesville
Chief, Management:	C. J. Witter, Charlottesville
Chief, Protection:	B. R. Bibb, Charlottesville
Service Forester:	H. W. Bashore, Orange
Service Forester:	G. I. Blain, Fredericksburg, Va.
Service Forester:	John V. Jackson, Charlottesville
Service Forester:	F. D. Kidwell, Charlottesville
Service Forester:	John M. Shavis, Charlottesville
Service Forester:	Maynard Stoddard, 4th, Charlottesville
Service Forester:	Wm. C. Vernam, Warrenton
Service Forester:	P. F. Crank, Charlottesville
Tallyman:	Wm. E. Clarke, Charlottesville

District IV:

District Forester:	Robert P. Brierley, Farmville
Chief, Management:	A. D. Wilson, Farmville
Chief, Protection:	John N. Graff, Farmville
Service Forester:	H. H. Broyles, Farmville
Service Forester:	Robert F. Holmes, Buckingham C. H.
Service Forester:	Wm. L. Pierce, Farmville
Service Forester:	W. H. Searcy, Halifax
Service Forester:	Nevin Slusser, Farmville
Tallyman:	Morris Walden, Farmville

District V:

District Forester:	A. L. Jolly, Jr., Salem
Chief, Management:	J. C. Hinkle, Jr., Salem
Chief, Protection:	C. L. Boone, Salem & C. W. Taylor, Salem
Service Forester:	T. E. Jones, Salem
Service Forester:	R. L. May, Salem
Service Forester:	G. W. Peery, Chatham

District VI:

District Forester:	David M. Waite, Bristol
Chief, Management:	Eugene Ohlson, Bristol
Chief, Protection:	Ray F. Duncan, Bristol
	Clarence Branham, Big Stone Gap
Service Forester:	Harold K. Calhoun, Bristol

District VII:

District Forester:	T. R. Elliott, Staunton
Chief, Management:	J. Walter Hodge, Jr., Staunton
Chief, Protection:	Raymond Hostetter, Lexington
Service Forester:	W. S. Campbell, Staunton
Service Forester:	R. L. Dunn, Woodstock
Service Forester:	J. A. G. Rasmussen, Staunton

VII - CONSOLIDATION AND DEVELOPMENT, 1952-1961

We have noted the period of rapid expansion during the years immediately following World War II, which was primarily in two spurts made possible by action of the General Assembly in 1946 and 1948. This post-war expansion was followed by slower, more deliberate, growth, with changes attendant upon this development which, though gradual, were important and far-reaching. In this chapter we shall deal with the more important items of development during this nine-year period.

1. Administrative Districts:

No new districts were added. The nine-district set-up remained intact, but in two districts, the location of headquarters was changed. In District II (Richmond) the erection of a district headquarters building on lots acquired in Sandston, (or, to be more specific, in the nearby community of Seven Pines) was noted in the preceding chapter. In the beginning this headquarters was planned primarily as a forest fire headquarters and equipment storage unit, with the District Forester and District Management Chief officing in Richmond. Now, at the end of 1961, the Richmond office is still maintained, but all administrative personnel have their principal office in the headquarters at Sandston.

District VI originally had its headquarters at Bristol. As a road center, Abingdon had long been recognized as a preferable headquarters, but Bristol had remained as headquarters primarily because it was a better rail travel center. When a site was to be acquired for a headquarters building, the best available lot was found at the southern limits of Abingdon, and the district headquarters were moved there upon the completion of the building in 1954.

The boundary line between Districts II and IX was changed early in the period to follow the Mattaponi and York Rivers, thus detaching Gloucester and Mathews counties from District II and adding them to District IX. This change was made primarily to save travel and travel time. The number of counties in the Tappahannock district was increased to 11, and in the Richmond district the number was cut to 12. Subsequently Elizabeth City and Hampton counties were abolished and became independent cities, which further reduced the number to 10, though it had no effect on the forest area of the district.

2. Headquarters Buildings:

The new building erected by the Department of Conservation and Development on the Grounds at University of Virginia was completed and occupied in October, 1953. The main floor of this building occupied by Virginia Division of Forestry houses both the Headquarters and District III personnel. More than adequate when occupied, by 1960 every room was occupied, and the possibility of future need for an addition began to be recognized as a probability. In 1961, three rooms on the basement floor, no longer used by Water Resources, were made available to us, relieving the situation somewhat, temporarily.

The erection of district headquarters buildings, begun in 1950 at the Waverly headquarters and followed by buildings at Sandston (1951), Tappahannock (1952) and Staunton (1952), has continued with buildings completed and occupied in Farmville (1954), Abingdon (1954), Portsmouth (1958), and Salem (1959). With the completion of the Salem building, all of the district headquarters were housed in Division of Forestry-owned buildings. In addition, a small office building was built at Big Stone Gap in 1956 to supplement the garage-warehouse erected there by the CC about 1940. This serves as sub-district headquarters.

Office space at the State Forest headquarters at Cumberland became an increasing problem which was solved in 1959 by the addition of an office wing, designed to harmonize with the architecture of the headquarters house. The original one-room office in the main house was retained as the Forest Superintendent's private office, a window was cut out as a door into a large room which serves as office for the Chief Warden-Rangers, which in turn opens into the front office, occupied by the desk of the clerk and a large table suitable for conferences or other occasional use. Adequate storage closets and toilet facilities are provided, and a small cash-box type safe, cast in reinforced concrete, built into the wall and fastened by a tempered steel chain to the I-beam supporting the addition solved the problem of the safe keeping of cash received after banking hours. This building, unlike the district headquarters structures, has reserve space which may be developed easily as the need arises. The position of the house to which the addition was attached was such that a high, dry, basement was necessary, with full-sized windows above ground. This could at relatively small expense be finished into three additional offices.

Following the completion of the State Forest Headquarters, an office building was erected and occupied in 1960 near Accomac on the Eastern Shore to house the office, supplies and equipment of the Eastern Shore subdistrict. This building follows the general plan of the district headquarters buildings tailored down to fit the needs of the subdistrict.

The Waverly headquarters building set the general pattern for all of these headquarters with the exception of the State Forest headquarters, which was an addition to an existing building and therefore had to fit unusual surroundings. However, with experience on a dozen of these headquarters over ten years, a number of alterations and refinements of plans evolved, as also did a continuing realization of the necessity to plan more fully for the future. On the completion of the Waverly building it was believed there was ample room for expansion for years to come, yet within six or seven years it was overcrowded. In 1959 an addition was built. This has been true in a number of other districts. In early 1961, work was completed on an addition to the Farmville building. The Sandston building is being expanded as of January 1, 1962. The building at Tappahannock is over-crowded and needs to be enlarged. Some others are moderately crowded.

When the Sandston building was erected, one room was fitted up as quarters for the overnight use of Division of Forestry men. Use of these quarters was optional, but their use has been almost completely universal. The savings in hotel bills would represent a surprising sum. No such accommodations were planned for the next two buildings (Staunton and Tappahannock) but all headquarters buildings erected since have had that feature, and a slight alteration of the Waverly building in the early 1950's provided quarters there. Some of the latest buildings located at points where considerable emergency travel is likely in severe fire seasons have included two such rooms, with bath between.

(Note: Buildings, including office and quarters, at the New Kent Nursery, will be discussed under Reforestation.)

3. Legislation:

Perhaps of most importance during the period covered by this chapter was Senate Joint Resolution No. 22, adopted by the General Assembly of 1954, which provided for a commission to study the growth and utilization of forestry resources of the people of Virginia, to determine what regulatory measures, if

any, were needed to provide adequate supplies of timber for industrial use and to maintain stable income for owners of timber land, and to develop information and recommend educational programs, if needed, to increase the returns to landowners from timber resources and to advise landowners as to how best to develop the same.

In pursuance of this resolution, Governor Thomas B. Stanley appointed to the Commission:

Lee J. Spangler of Johns-Manville Corporation, representing the pulpwood interests.

Jesse Glick and T. Hubert Wheeler to represent farmers and landowner Robert S. Burruss, Jr., to represent the sawmill industry.

Senator Garland Gray and Paul D. Sanders, Editor, Southern Planter W. H. King to represent the hardwood lumber industry.

Paul D. Sanders was elected Chairman at the organization meeting.

The committee employed the firm of Pomeroy & McGowin, Forestry Consultants, of Monticello, Arkansas to conduct a sampling survey in twenty counties to secure up-to-date information on cutting practices by class of owners or operators, etc. The information thus obtained was augmented by public hearings of all interested and information requested and obtained from interested State departments.

After a study of well over a year, the Commission submitted a report making eleven recommendations which may be summarized as follows: -

1. Forest Fire Control: That adequate mechanized suppression equipment, prevention material and sufficient trained prevention and suppression personnel be made available. Results: Considered favorably in 1956-7 appropriation bill.

2. Timber Service to Landowners: That program be substantially expanded. Results: Considered favorably in 1956-7 appropriation bill. (8 new positions sanctioned)

3. The Seed Tree Law: That funds be made available to employ sufficient forest officers to insure rigid enforcement and that law be amended to include white pine, pond pine and tulip poplar, and to require the posting of a bond of \$20 per acre to insure replanting of violated acres.

Results: Manpower increase provided for in budget, but eliminated in balancing the appropriation bill. Law amended as recommended. In effect, in addition to the inclusion of the new species and the requirement of a bond, the action of the Commission was a vote of confidence in the law.

4. Tree Planting: That a Statewide tree planting program be vigorously conducted, and that funds be made available to grow sufficient tree seedlings to meet the requirements of the landowners. Also urged that all landowners plant their idle and abandoned land and reinforce understocked woodlands, and that interested groups cooperate in Governor's Plant More Trees program.

Results: Increased nursery funds. Plant More Trees Program exceeded its goal.

5. Tree Diameter Limit: That legislation be enacted setting minimum diameter limit of 8" on cutting of sound trees of loblolly, shortleaf, pond and white pines, yellow poplar, white and red oaks.

Results: Discarded. No action taken.

6. Forest Products Tax: (a) That State Tax Commissioner provide sufficient personnel to prevent evasion of tax; and (b) that all persons subject to this tax be required to register annually with the local commissioner of revenue and pay a fee of \$2.00.

Results: (a) Strengthened enforcement of tax laws and tax rate increased.
(b) Such a law was enacted.

7. Board of Conservation and Development: That the membership of the Board include five persons familiar with the problems of forestry, either as manufacturer, trained forester or forest landowner.

Results: This recommendation has not found its way into law, but may have had an effect on selection of Board members.

8. The Extension Service and Virginia Polytechnic Institute: (a) That county agents be required to take at least a fundamental course in forestry.
(b) That all agricultural students be given as much forestry as possible as a part of the requirement for a degree in Agriculture at V.P.I. (c) That all forestry taught on a college level in Virginia be centered at V.P.I.

Results: Some stir-up in opinion that some simple forestry is necessary in agricultural collegiate training, but so far as we know no hard and fast rules laid down.

9. Forest Research: That Lee Forest Research Center be transferred from the Federal government to the Virginia Agricultural Experiment Station, and that a reasonable annual appropriation be made to cover cost of operation.

Results: An appropriation covering this undertaking was actually included in the 1956 Appropriation Act, but was made to Virginia Division of Forestry instead of Virginia Agricultural Experiment Station. This was discovered by the principals involved after the adjournment of the General Assembly. Before the negotiating of the transfer and the solving of the attendant problems was completed, the groundwork for the present Federal Research Center in Charlottesville, since accomplished, were under way. This assured the reopening of Lee Experimental Forest and the matter was dropped. This recommendation may have had some influence toward the establishment of the Charlottesville Research Center.

10. Financing the Forestry Program: That additional funds be made available through joint action on the part of industry; specifically, that the Forest Products Tax rates be increased by 50 percent provided the State "substantially meets its increased obligations".

Results: This was done by revision of the Forest Products Tax Act and in the general budget.

11. General: (a) Endorses and urges active support of the Governor's "Plant More Trees Program". (b) Urges participation and support by "all types of industry depending in any way on forest resources, and all citizens of Statewide forestry activities". (c) Commendation of the Vocational-Agricultural Division of the Department of Education for good work in teaching the principles of forestry land management, and the public school system for the support given the "KVG" program.

Results: Though this general recommendation may have been regarded by some as "window dressing" it certainly did no harm to the Division's prestige and offered encouragement to the Department of Education in their venture into what was a new field when they entered it.

All in all, the work and findings of the Study Commission accomplished a great deal in advancing the cause of forestry and in making possible the further advancement of the Division of Forestry.

Senate Joint Resolution No. 55, adopted by the General Assembly of 1958, was less comprehensive in character. It directed the Virginia Advisory Legislative Council to "study the laws of Virginia relating to the harvesting of timber, reforestation and rehabilitation of forest land, -----" - in other words, the Seed Tree Act - and consider whether these laws were adequate and proper to encourage the best forestry practices. Also added to the package was a direction to the Council to consider the standardization of log rules and recommend what legislation, if any, should be considered.

The report to the Governor and the General Assembly, published as Senate Document No. 4 was the work of the V.A.L.C. headed by John H. Daniel, Chairman, Robert Y. Button, Vice Chairman, C. W. Cleaton, John Warren Cook, Harry B. Davis, Charles R. Fenwick, Tom N. Frost, Charles K. Hutchens, Baldwin G. Locker, W. Tayloe Murphy, Mosby G. Perrow, Jr., Edward E. Willey and J. J. Williams, Jr. This Advisory Legislative Committee appointed John H. Daniel, Chairman, with Thos. H. Blanton, Vice Chairman, and Paul W. Bartholomew, W. H. King, Dabney S. Lancaster, J. Clifford Miller, Jr., Garnett S. Moore, Earle E. Shaffer, Shelton H. Short, Jr., R. M. Smith, Lee J. Spangler, Victor W. Stewart, A. L. Wenrich and Herman Work to make the initial study. This committee was also charged with a study under House Joint Resolution No. 79, directing a study and report upon the means of providing "adequate and accredited" training in forestry for Virginia students. A summary of their recommendations follows:

Forest Management

1. Statutory period of leaving seed trees uncut should be reduced from 10 to 5 years.
2. Number and size of seedlings required to exempt an acre from the operation of the seed tree law should be reduced from 600 to 400 in number and from 6 feet to 4 feet in size.
3. If an optional forest management plan is filed with the office of the State Forester and not disapproved with a statement of his reasons within 60 days, such plan should be deemed to be approved.
4. The seed tree law should be amended to make it clear that a person who cuts timber and complies with the law cannot be held liable if the landowner or some other person later cuts the seed trees within the five-year period.
5. Sufficient staff should be provided the State Forester to enable him to meet all requests for services to landowners.

The first three of these recommendations were in accordance with our views as expressed to the committee, and were amended into the law at the 1960 session of the General Assembly. The fourth, included in the bill drafted by the committee as Sec. 10-79.2, was rejected, probably because it appeared to be superfluous. The law, as amended included a rewrite of Sec. 10-79.1, changing the procedure by which bonds posted by convicted violators are handled. As amended, the bonds are held by the State Forester.

The fifth recommendation resulted in an increased authorization for service foresters in the budget bill, but budgetary troubles arising at the session all but knocked this out.

Forestry Training

The recommendation was also made that forestry training at V.P.I. should

be strengthened to the end that "basic courses in forest management" will be available to and required of all students who are training for careers as county agents or vocational agriculture teachers, and students majoring in agriculture who in the judgement of the college administration and faculty would profit by such training.

Further, it was recommended that an amount not to exceed \$10,000 per year should be appropriated to pay the cost differential for those students who wish to pursue specialties in forestry at out-of-state institutions.

As a result of the above, some appropriation was made under the last recommendation.

As to the log rule change, it was recommended that no legislation should be adopted to require the use of a single unit of measurement for timber; but the International Rule should be adopted as the standard unit of measurement, which would be applicable in case of any dispute in the absence of agreement by the buyer and the seller on a different unit. This was enacted by the General Assembly. See Sec. 59-101.2 Va. Code - 1960 revisions.

The foregoing discussion of Senate Joint Resolution No. 22 (1954) and Senate Joint Resolution No. 55 (1958) included changes in the Seed Tree Act (Title 10, Chapter 4, Article 6). Other legislation between 1952 and 1961 included:

1. Change of name of department to "Department of Conservation and Economic Development".
2. Enacted Sec. 10-61.1 defining liability for fires originating from faulty transmission lines and rights of way.

It may be well noted in passing that the title "Virginia Forest Service", used generally through many years, was without sanction of law. When it was adopted it was officially "Office of State Forester". The name caught on, but was somewhat confusing due to similarity to Virginia Forests, Inc. Also, references to the Forest Service left one confused as to whether the State or Federal service was meant. Section 10-8.1 of the Code, which goes back at least to 1948, designates us as the "Division of Forestry", and the change of title in 1955 was both logical and wise, though a bit difficult at the time.

Also worthy of note is Article 8, added to Title 10, Chapter 4 of the Code, comprised of Sections 10-90.2 through 10-90.9, entitled "Insect Infestation and Diseases of Forest Trees". This article, enacted by the General Assembly of 1952, noted its purpose as follows: - "The purpose of this article is to place within the Department of Conservation and Development, Division of Forest Service, the authority and responsibility for investigating insect infestations and disease infections which affect stands of forest trees, devising and demonstrating control measures to interested landowners and others". Much of this responsibility had been previously undefined, except that authority for quarantine procedure was vested in the Department of Agriculture and Immigration, where Article 8 carefully left it by an exception contained in Section 10-90.3. This legislation placed in our hands the basis for a Division of Insect and Disease Control. The law spelled out the duties and powers of the State Forester within this program area, set up machinery for implementing voluntary cooperative control measures, but carefully avoided any sharp-toothed compulsory plan for coping with epidemics. Instead it required notice to landowners faced with epidemics with technical advice, but no compulsory remedial plan involving either private or public funds

other than the appropriations made for routine operations.

Article 8 also transferred the white pine blister rust control cooperative project with U.S. Department of Agriculture from the Department of Agriculture and Immigration to the Department of Conservation and Development, Division of Forestry.

4. Education: - Old Dominion Foundation Grant

During the summer of 1956 an agreement with Old Dominion Foundation was signed, under which a grant to us was made, enabling us to send three men per year for three years to various schools or colleges for a semester of work in some phase of the job and in order that they might bring back to us the latest word in new knowledge in the subject studied. Arrangements permitted such assignments to be on all-expense, full pay basis.

Those participating under this grant were:

- E. E. Rodger, to Richmond Professional Institute - Subjects pertaining to I & E.
- R. F. Holmes, to University of Michigan - Subjects pertaining to Watershed Forestry
- W. F. Custard, to Duke University - Subjects pertaining to Management & Silviculture
- J. B. Heltzel, to Valparaiso Technical Institute - Subjects pertaining to Radio & Electronics
- A. L. Jolly, Jr., to Richmond Professional Institute - Subjects pertaining to Personnel Management
- Tom Dierauf, to North Carolina State College - Forest Soils
- R. L. Marler, to North Carolina State College - Subjects pertaining to Forest Genetics
- J. C. Hinkle, to West Virginia University - Subjects pertaining to Hardwood Management & Silviculture
- C. L. Morris, to Syracuse University - Entomology and Pathology

This schedule of three per year was discontinued after the three years, in 1959. However, opportunity was found to send Custard and Marler to a four weeks series of lectures at North Carolina State College on Biological subjects in August of 1959, to send Cal Pennock to North Carolina State College for Forest Management subjects in 1960, and Clark Lantz to North Carolina State College for Forest Genetics in 1961. The plan has worked well in keeping us up to date, and especially valuable is its influence on study habits of the personnel. But to have three key men absent on educational leave for six months does put a strain on the organization.

5. Divisional Expansion

New Division of Insect & Disease Control:

Under the authority of Article 8, added to Title 10, Chapter 4 by the General Assembly of 1952, a Division of Insects and Disease was established in the late summer of the same year and Dr. George H. Plumb was employed as Chief of the new division. At the outset this was a one-man Division so far as headquarters was concerned. A laboratory was adequately equipped and the work of identification of specimens, advice to landowners, etc. began. Dr. Plumb, whose genius leaned more to research than to administration, resigned April 30, 1955 and was succeeded by Caleb L. Morris.

The Division fell heir to several severe spot infestations of sawfly along the coast in extreme northeastern Virginia, and almost immediately thereafter was faced by a severe epidemic of southern pine beetle, quite widespread

in the south Piedmont area. As that epidemic waned, another sawfly, affecting mainly shortleaf and Virginia pine in the Piedmont and Coastal Plain, appeared and reached epidemic proportions. More help became necessary and Hubbard Trefts was employed as an assistant in June of 1958. The appearance of oak wilt in the east had already made necessary seasonal survey assistance which was afforded by the employment of summer student assistants. Trefts resigned April 1, 1960 to accept another position and was succeeded by William J. Schroeder, who returned to us after a couple of years of specialization, having previously spent several years as Service Forester in District 3.

In the spring of 1961, pursuant to authorization in the biennial budget another assistant was added, primarily to assist in sawfly research. Kenneth Knox was appointed to fill this position.

This set-up, with help afforded from district personnel, has been well organized and the new division has become a smoothly operating, efficient unit.

Research:

Although it still lacks divisional status, the implementation of work in practical research deserves comment in this chapter. Under consideration since 1952, a trial run was made in 1954, when R. L. Marler, then District Management Chief in the Richmond District, was temporarily detached and assigned to a study of the older plantations in the State. Field work was completed and a report written in late summer. The results have been of value in many ways and the several leaflets and minor publications derived from the original report have attracted attention. For the first time the State Forester's Office has a factual appraisal of growth rates and monetary returns from planting returns up to first thinning age and somewhat beyond. An answer to the often-repeated question "What return may I expect from planting trees as compared to other land uses?" was at last available, factual for at least the first twenty years and by projection through a rotation.

As a result of this try-out, Marler was transferred permanently to the Headquarters Office January 1, 1955 to head up practical research, carrying on some projects himself and directing others through the district level. Organizationwise, he was attached for convenience to the Division of Reforestation, but actually his responsibility has been direct to the State Forester and he works in other divisions as well.

In 1957, interest in genetics and a seed orchard was aroused. Marler was sent to North Carolina State College for the fall semester to study under Dr. Bruce Zobel, followed by a trip to the southern states to observe some of the work under way toward production of superior seed. On his return a seed orchard was laid out on the New Kent nursery property and the hunt for superior trees was initiated. Some preliminary experimental grafting was done in the spring of 1959, and full scale effort followed in the grafting seasons of 1960 and 1961. Given necessary assistance by part-time assignment of foresters from District 2, this has been Marler's primary project since, but he also finds time for well-organized growth studies, and experimental investigations in the use of silvicides and in direct seeding as well as other subjects.

As this type of work grows it is entirely possible and perhaps likely that it may eventually be afforded divisional status, hence we have discussed it under the "Divisional Expansion" heading rather than under any single division.

6. Forest Fire Control

Fire Seasons

Fire weather appears to be cyclical. A severe drought in 1952 and 1953 brought extremely high hazard and severe fire weather in the fall of 1952 to much of the State, and particularly to southwestern Virginia, as well as to Tennessee, Kentucky and West Virginia. Much, but by no means at all, of Virginia's troubles stemmed from fires originating in other states and burning across state lines into Virginia. Visibility fell as the smoke haze built up, and towers often could not distinguish fires at a distance of a half-mile during daylight hours. As a result of this situation - and probably, too, the odd working of the human mind that causes some persons otherwise of normal balance to become pyromaniacs when such conditions build up - Wise and Lee Counties suffered burns of 19.86 and 18.55 percent, respectively, and all of southwest Virginia staggered under an average of 5.93 percent of the protected area burned - 81,648 acres out of a total protected area of 1,376,284 acres. Most of this burn was suffered during the period October 17 to November 9. Elsewhere in the state serious, but not disastrous, burning conditions prevailed, but tower visibility was not so completely impaired and the average was well under one percent.

Serious as the situation was, particularly in southwest Virginia, it taught some lessons. First of all, it taught the folly of complacency. Virginia had experienced a period of years of normal to below normal hazard. Her Division of Forestry had expanded rapidly. Many of the Division Fire Chiefs and some of the District Foresters had not experienced a real tough fire season. The writer well recalls scouting a large fire in Tazewell County in company with District Fire Chief Ray Duncan in the critical period beginning on the 17th of October. We reached a high point on the mountain affording a complete view of the fire, then amounting to a thousand acres or more. Ray took a long look, turned to me, and said, "I have a confession to make. I've been on this job several years and seen what I thought was tough fire weather. I kidded myself into the feeling that my organization was so good that no fire in the district could possibly burn as much as a hundred acres. But look at that - one thousand acres at least and still out of control." Since that time Ray Duncan has lost no opportunity to preach to his men "It can happen here!" And Ray is no exception. Others, too, learned that primary lesson.

Secondly, it taught the folly of leaving a controlled fire unguarded over night - even for only a few hours. Those October and early November nights were dry. More than one fire was lost because someone said "It'll be all right until daylight in the morning." And the night crew won't stay unless the boss stays too. Someone in authority should be on the job, even if he sleeps most of the time.

It taught the necessity of centralized control. The District Forester had the toughest job of all - in the office directing by radio and telephone dozens of fires widely scattered.

It taught the wisdom of flexibility. Other districts were stripped to skeletons and more than thirty out-of-district fire bosses, with some outside equipment were used.

And it taught, too, that alertness to gradual build-ups of fire danger is a must. This run of fireweather could have been predicted. The dry nights,

lack of precipitation, daily wind pattern and other observable signs were all there, yet everyone was surprised when it happened. The addition of the build-up factor to danger-reading records tends to keep fire officials alert in more recent years.

In pride it may be said that under stress the fire organization did not break - it may have been severely bent, but it did not break.

In 1953 another severe fall season was encountered, though much less so than in 1952. Six fires burned areas of more than 500 acres each, against 42 in 1952. The remaining eight years have been medium to light. Complacency is no longer a problem. "It can happen", it has, and it will again. But when it does, we shall be better prepared.

Equipment:

Although crawler type tractors with special fire plots began in our Division with the purchase of the D-7 caterpillar tractor and Mathis fire plow for use in the Dismal Swamp in the late forties, followed later by the purchase of a very limited number of Caterpillar D-2's with plots for use in the eastern districts, motorization did not begin in earnest until the early fifties. Not only was adequate man-power increasingly difficult to secure in sufficient numbers to cope with our forest fires, but also it became increasingly clear that a need existed for machinery which could complete fire lines more rapidly than was possible with hand labor even when an adequate supply was available. The first conception of the required tractor size was toward heavy types - perhaps because the first purchase was a D-7. The D-2's purchased found some situations too tough in the Coastal Plain and most of these were replaced with D-4's, the D-2's being moved to easier going. Eventually it was found that lighter crawlers, such as the John Deere 40, were adequate in the Piedmont and made good companion pieces even in the Coastal Plain. This type of equipment became standard except for special requirements, such as the swamps and other areas of heavy dense cover in the Coastal Plain.

With the development of the John Deere 440 - a crawler in the D-2 class - and the new John Deere 1010 - a bit lighter and more compact than the old 40, though in the same class - the range of fire-control tractors was complete. The old D-7 in reserve for use in the heaviest going; the D-4 class for usual use in the Coastal Plain, backed occasionally with a lighter tractor for easier cover, with the 440 type in the Piedmont and the 1010 type being used in the upper Piedmont and to some extent in the Mountains. By 1961, some attention was being given to light, hand-operated special motor equipment on an experimental basis, looking for machines to reduce necessary manpower in rough mountain terrain. Late in 1961 a leaf blower was purchased for tryout.

By the end of 1961, about 41 tractors with fire-line plows were in service. This number included a number of tractors acquired from military surplus and rebuilt in our shops. Trucks to haul these tractors were, of course, necessary and these were acquired by purchase, either new or from surplus.

Radio:

The initial purchase of radio equipment was made in 1955, in amount limited to a skeleton network in some of the Coastal Plain and Piedmont Districts. The type chosen was a two-frequency system designed to make use of relays strategically located on carefully chosen high points. This original

well-planned layout has been intensified and increased, and by the end of 1961 it had become an excellent system of communication embracing the entire state. It is continuously being augmented and revised as new principles and equipment are being developed. Developed primarily for forest fire control, it is also of inestimable value in general administration as well.

Personnel:

From a modest beginning immediately after World War II, the list of full-time salaried Chief Forest Wardens had built up to a total of 75, handling 79 counties. The remaining 18 counties were still handled by part-time Chief Wardens.

While the Chief Forest Wardens are considered here under the heading Fire Control, and while their duties are primarily fire, the business of forest fire control by no means constitutes the whole of the job. In keeping with the long-time policy, any full-time employee is expected to participate in any phase of the work of the organization which may at the time require his attention and efforts. As the number of full-time Chief Wardens has grown, so also has grown the duties outside of fire control which he is expected to perform. In line with this, training programs were in the making in late 1961 to provide the Chief Forest Wardens with the necessary knowledge to make them first rate Forestry Aides, and thus pave the way for an increased participation, under adequate supervision, in the fields of Management, Reforestation, and in fact, in any of our fields of endeavor. Thus this expansion not only improved Fire Control - it vastly increased possibilities in other divisions as well.

7. Reforestation:

With the abandonment of the Peary nursery and the acquisition of the former game farm near Providence Forge, the development of that site proceeded rapidly with the construction of a standard office building, necessary sheds, packing house, seed extractory, water system and other necessities of a nursery. Seedling production went smoothly forward, and with the "Plant More Trees" program sponsored by Virginia Forests, Inc., it reached a peak of some 42,000,000.

With the establishment of nurseries by some of the pulp and paper industries, the demand was reduced somewhat and in 1960-61 was around 32,000,000. About 1960, direct seeding operations in Louisiana and other southern states received considerable publicity and a demand arose for seed for that purpose, treated with arasan, endrin, a sticker and coated with aluminum flakes. Seed thus treated was made available in 1960 and in 1961 stratified seed thus treated was offered on special orders placed in advance.

The interest in direct seeding broke before adequate tests had been made locally. Some were experimented with in 1960 with poor results, generally. The 1961 tests showed generally good results, where satisfactory site preparation had been made. These experiments are continuing.

8. Forest Management:

Not only did the demand for assistance to landowners continue to increase rapidly, but also of necessity the field of work of the Management Division had to broaden considerably. Participation in the administration of forestry practices under the A.C.P. program turned the attention of the division more and more toward cultural practices in the entire State, and the

increase in clear-cut and plant silviculture in the pine land greatly reduced sawtimber marking and attention was turned more and more toward thinnings. All this was healthy progress. However, without the diversification being forced upon us our change of direction might have been less abrupt.

All these new ventures combined with the old required more professional help, and by the end of 1961 the foresters giving a major part of their time to forest management numbered 68. The total number of professional foresters in the Division of Forestry at the end of 1961 was 93 - more, we were told, than were employed by any other state in the nation.

Another new field was participation in the Small Watershed Program under P.L. 566, and the expansion of the Potomac Flood Control project. Local management foresters were usually assigned to going projects, but the planning work along with general supervision made it necessary to create the position of Supervisor of Watershed Forestry within the Management division. Charles J. Witter was transferred and promoted to that position in 1958.

In the new position, Witter's main task was for some time the conducting of hydrology surveys on projects approved and reconnaissance of those suggested. He also did the hydrology on a good portion of the lower Potomac in cooperation with the U. S. Forest Service and the Corps of Engineers as a part of the long term planning phases of the Potomac project.

As of the end of 1961, in addition to the Potomac project, which had increased to a three-forester size, going projects under P.L. 566 had increased to 9, with several more in preparation. Two had been completed and another was in its last year. These projects usually were designed for five-year periods.

Another project which demanded considerable time and effort was the National Inventory of Soil and Water Conservation Needs. This was a land use study looking toward needs to meet demands in the year 1975, for forests, crop land, pasture and other lands and other land uses. It was a national effort in which Soil Conservation Service was the leader, conducted on a county basis with review on the state and national levels. Other agencies stemming from the Department of Agriculture were assigned duties, including the Forest Service, which of course passed them down to the State. The Chief of Forest Management served as forestry member of the review committee and also on the training team in demonstrating the proper use of the forms provided on the county level.

9. State Forests:

In 1954 the United States of America deeded to the Commonwealth of Virginia, "for the use and benefit of the Department of Conservation and Development, Division of Forestry" the surface of all of the Land Utilization Forests which had been leased to us for a 99-year period in 1939. The deed also carried one-fourth interest in all minerals, except that the United States retained sole right to any fissionable materials which might underlie these lands. This made all state forests the property of the Commonwealth except for the reserved minerals. It also made possible the reorganization of these areas into separate forests, integrated with the state-owned lands which formerly had to be administered separately.

Accordingly, the reorganization set up State Forests as follows:

<u>Name</u>	<u>Acreage, 1954</u>	<u>Acreage, 1961</u>
Appomattox-Buckingham	19,129.64	19,290.61
Cumberland	15,569.92	16,106.07
Prince Edward-Gallion	6,903.81	6,935.46
Pocahontas	5,604.00	5,604.00
Conway Robinson Memorial	400.00	400.00
Total	<u>47,607.37</u>	<u>48,336.14</u>

By the end of fiscal year 1961, the total annual income from State Forests had increased to \$104,996.09. A part of this increase was, of course, due to the increase in price for forest products, but with the decrease in price in 1959, 1960 and 1961 the gross income continued to increase. Much of this increase was brought in from thinnings for pulpwood, both in natural and planted stands. Almost all of the older plantations were given their first thinning within the period covered by this chapter.

This period also showed a large increase in the use of the State Forests for applied research - a very important use for such forests. New chemicals and methods of application were tested and the results of this research put to work. Chemical release became commonplace. The direct seeding of pine was tried out, and these experiments are still being carried on at the end of 1961.

Clear-cutting of inferior hardwood stands for fuelwood, or for oak pulpwood marketable at the Mead plant at Lynchburg have paved the way for type conversion, replacing unwanted hardwoods with pine. Currently in 1961 the annual plantings run to better than 300,000 seedlings, almost all of which went into type conversion efforts.

The use of the L. U. Forest for hunting is on a firmer foundation than in earlier years. Instead of limiting the hunt each year to a week, with pressure very high during the period, the forests were from 1959 on open for the same open season as that in effect in the county, and all laws and regulations, bag limits, etc. were uniform with those of the county. It has been found that the daily pressure is far less, and game is on the increase, though the annual take of deer and turkey is somewhat more. Better hunting for the sportsman is provided without the sustained pressure which appears to have been so detrimental to the game supply in the earlier years.

The timber inventory is increasing and it is felt that the cut and resultant income can continue to increase for some time to come. These forests become more interesting each year as practical demonstrations of common sense forest management. They give an opportunity for keeping up with new equipment, new practices, and new concepts. They also fill a needed spot in training programs for professional and non-professional personnel alike.

Mention should also be made here of the Conway Robinson Memorial State Forest, which since its acquisition in 1938, has been a white elephant. The plantations reached thinning age and have been given a first thinning. Although the pulpwood prices prevailing locally were quite low, the Forest is now "in the black." On a five-year period of return the income from the proper operation of these plantations should pay operating expenses, at least, although the restrictions on the proper management of the natural areas precludes realization

of income compatible with the true capability. This forest should be used as a park or a natural area rather than for forest protection.

10. Forestry Relations (Information & Education):

Under the leadership of E. E. Rodger, the Division of Forestry Relations has continued to grow and develop. The demand for exhibit material, both for fairs and similar gatherings and for meetings, store windows, banks, etc. became heavy and taxed the ability of Division personnel to supply. When the new headquarters office building was erected, space was included in the garages for a well-equipped shop for the construction of exhibits and floats. The draftsman, Frank Wagener, who had considerable genius for such items and who was adept with a brush, began to help out, and finally devoted practically all of his time to such construction. Upon the resignation of William M. Carter in 1960, and of Frank Wagener later in the same year, both positions were vacant for some time. In Wagener's place an illustrator rather than a draftsman was employed. Jack Gibbs again activated the exhibit construction efforts, with Cameron Thomas as helper, in 1961.

This important complement to the other divisions had by the end of 1961 reached a position high among similar divisions in other states, and was a leader in its field.

11. General Interest:

The growth of the Division of Forestry and its personnel is interestingly reflected by the periodic personnel training meetings held. The first of these was held in the summer of 1946 at the old CCC Camp on Gallion State Forest near Green Bay. The capacity of the camp was by no means taxed. Future meetings of similar nature were held there for a number of years, but by the early 1950s it began to be crowded. At two-year intervals, meetings were successively held at North River on the George Washington National Forest, at a 4-H Camp near Virginia Beach, and at Douthat State Park. The interval was increased to three years and in 1958 the meeting was held at William and Mary College. Three years later it was at Augusta Military Academy, with attendance between 250 and 300 employees.

12. Personnel:

The current organization as of January 1, 1962, was as follows:

Headquarters

State Forester:

Chief, Forest Protection:

Chief, Forest Management:

Chief, Reforestation:

Chief, Forestry Relations:

Chief, Insects and Diseases:

Asst., Insects and Diseases:

George W. Dean

Hunter H. Garth

Seth G. Hobart

John B. Heltzel

Edwin E. Rodger

Caleb L. Morris

William J. Schroeder

Kenneth A. Knox

Asst. Chief, Forest Management: Wallace F. Custard
 Asst. Chief, Forestry Relations: Jack Gibbs
 Research: Raymond L. Marler
 Watershed Forestry: Charles J. Witter
 Buildings & Grounds: Ernest R. Shelton
 Master Mechanic: Oscar Bellomy

Districts

- I District Forester: Charles C. Steirly
 District Chief, Management: William A. Tyler, Jr.
 District Chief, Protection: Thomas E. Yancey
- II District Forester: Robert W. Sloçum
 District Chief, Management: Caleb M. Pennock, Jr.
 District Chief, Protection: Cloyd C. Morris, Jr.
- III District Forester: Dallas G. Wilfong, Jr.
 District Chief, Management: John M. Shavis
 District Chief, Protection: John V. Jackson, Jr.
- IV District Forester: Robert P. Brierley
 District Chief, Management: Wilbur C. Stanley
 District Chief, Protection: Maynard Stoddard, IV
- V District Forester: Arthur L. Jolly, Jr.
 District Chief, Management: James C. Hinkle, Jr.
 District Chief, Protection:
 (1) Charles W. Taylor
 (2) Corbett L. Boone
- VI District Forester: Eugene Ohlson
 District Chief, Management: Robert L. May
 District Chief, Protection: Ray F. Duncan
- VII District Forester: Thomas R. Elliott
 District Chief, Management: J. Walter Hodge, Jr.
 District Chief, Protection: P. Raymond Hostetter
- VIII District Forester: Ralph J. Bartholomew
 District Chief, Management: Richard H. Woodling
 District Chief, Protection: William L. Pierce
- IX District Forester: John N. Graff
 District Chief, Management: Thomas A. Dierauf
 District Chief, Protection: Roland B. Geddes

State Forests

Superintendent: Joseph C. Hayes
 Assistant: Edward H. Robertson

Nurseries

1. New Kent - Superintendent: G. William King
2. Charlottesville - Superintendent: Thomas S. Turner

APPENDIX

List of Employees - past and present - with dates of employment and termination.

(Current employees as of January 1, 1962 typed in capitals)

Employees - Past and Present

(Currently Employed in Upper Case Type)

I. FORESTERS

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Ackerman, John E.	6/16/55	5/10/57
Atkins, John D., Jr.	4/ 5/45	3/31/47
AUGSBURGER, GENE W.	6/16/55	
Baker, Harry L.	11/15/43	12/ 6/46
BARTHOLOMEW, RALPH J.	7/ 1/46	
BASHORE, HENRY W.	7/ 1/46	
Beard, Paul O.	2/ 8/56	7/31/56
Bennett, Robert K.	7/ 1/48	4/20/51
Bibb, Randolph B.	12/ 7/42	12/15/55
BISHOP, DONALD D.	7/ 1/57	
BLAIN, GEORGE I.	5/ 1/48	
BOONE, CORBETT, L.	2/16/45	
BRIERLEY, ROBERT P.	11/ 9/42	
BROOKS, MARION T.	7/ 1/56	
BROYLES, HUBERT H.	7/ 1/51	
Bylsma, Donald E.	4/ 1/48	12/17/48
CABELL, LAWRENCE E.	1/26/59	
Calderson, Donald S.	9/ 1/56	6/15/57
CAMPBELL, WILSON S.	6/ 1/47	
Carter, William M.	6/16/52	6/30/60
CHASE, CHARLES W.	7/ 1/61	
CLARKE, WILLIAM E.	1/16/51	
Conner, Posie C.	3/16/47	11/15/47
Crank, Porcius F., Jr.	2/ 1/53	2/ 5/54
CROSS, WILLIAM J.	2/16/57	
CUSTARD, WALLACE F.	3/25/46	
Dale, Claude H.	10/ 1/43	12/31/55
DEAN, GEORGE W.	1/11/29	
DeWinter, Arlo L.	7/ 1/48	12/31/52
Dickson, George L.	7/ 1/56	9/15/59
Diehl, Edward L.	2/ 1/46	1/31/47
DIERAUF, THOMAS A.	2/ 1/57	
DILL, ROBERT	10/ 1/59	
Donegan, Alfred W.	3/ 1/61	12/ 1/61
Dorn, Donald E.	3/ 1/52	2/15/53
DRAKE, DONALD G.	10/ 1/60	
Draper, Richard G.	1/ 1/57	4/15/57
Drumheller, Daniel R.	7/ 1/46	2/15/50
DUNCAN, RAY F.	12/16/47	
DUNN, ROBERT L.	10/ 1/48	
Ebert, James B.	7/ 1/49	6/15/51
Edwards, Acie Co.	5/ 1/50	7/15/56
EDWARDS, LARRY C.	7/ 1/61	
Eisinger, John H.	5/ 6/43	10/15/44
ELLIOTT, THOMAS R.	3/16/46	
Eye, Berlin	10/23/30	3/23/50

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
FOLEY, WILLIAM P.	3/ 1/57	
FRAME, ELVIN D.	7/16/61	
FRAZIER, DOUGLASS H.	7/ 1/56	
FREEMAN, HAROLD B.	7/ 1/61	
Friend, Edwin A., Jr.	2/16/48	5/15/52
Furlow, Edward P.	2/16/52	4/30/55
GABBERT, LEROY C.	3/ 1/57	
Gannon, Glenn L.	6/16/58	9/ 9/60
GARNER, JAMES W., JR.	6/16/58	
GARTH, HUNTER H.	10/22/34	
GEDDES, ROLAND B.	12/16/48	
Gill, C. Edward	12/ 1/45	11/30/47
Gillespie, William H.	6/15/53 & 6/1/54	9/15/53 & 8/31/54
Good, John C.	6/27/45	12/31/45
GRAFF, JOHN N.	3/ 1/49	
Greth, John W.	2/ 1/54	10/31/54
Grieve, William G.	12/16/42	3/31/49
Griffin, Ralph H.	7/16/47	8/31/51
GUERRANT, WILLIAM H.	2/16/57	
HAAG, WILLIAM G.	2/16/49	
HANDORF, HOWARD H.	9/ 1/61	
HANNAH, HAROLD D.	9/16/59	
Hardy, Percy L., Jr.	7/ 1/58	1/15/60
Harris, Richard L.	11/ 1/51	8/22/52
Hayes, John Ralph	1/ 1/46	5/31/48
HAYES, JOSEPH C.	11/ 1/39	
Hebb, Donald G.	2/16/54	2/28/55
HELTZEL, JOHN B.	7/ 1/42	
Hendricks, Herbert R.	7/ 1/51	12/31/57
HINKLE, JAMES C., JR.	12/ 1/48	
HOBART, SETH G.	4/ 1/26	
Hodge, G. Henry	1/ 1/31	12/17/51
HODGE, J. WALTER, JR.	1/ 1/52	
HOLMES, ROBERT F.	7/ 1/52	
HUBBLE, WILLIAM A., JR.	6/16/51	
Hudson, Harold H., Jr.	10/16/51	12/31/53
HUNTER, THOMAS G.	8/16/60	
Huttinger, William D.	4/16/47	11/30/47
Iobst, Frederick J.	1/ 1/44	11/15/49
JACKSON, JOHN V., JR.	6/16/52	
Jeffries, Andrew R.	11/16/51	9/15/53
JEFFRIES, KENNETH F.	2/ 7/61	
JOLLY, ARTHUR L., JR.	7/ 1/46	
JOHES, SIDNEY M.	12/ 1/57	
Jones, Theodore R.	10/16/44	1/15/47
JONES, THOMAS E.	2/16/52	
Jones, William D.	4/26/48	5/ 4/51
KAPPES, KARL E.	4/ 1/51	
KECK, JOHN G.	9/16/61	
KIDD, WILLIAM E., JR.	6/16/57	
KIDWELL, FRANKLIN D.	7/ 1/52	
KING, G. WILLIAM	7/ 1/48	
Kinghorn, John H.	9/10/56	8/15/59
KNOX, KENNETH A.	4/ 1/61	
Knudstorp, Niels Benny D.	12/16/56	9/15/58
Kundt, John F.	2/ 1/52	4/31/57

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
LANTZ, CLARK W.	8/16/60	
Lett, Edward D.	7/ 1/52	8/31/55
LITTEN, CHESTER D., JR.	1/16/58	
Looney, Ernest W., Jr.	9/16/53	12/27/57
LOUIS, FREDERICK W.	12/ 1/57	
Ludeke, Lyle E.	10/ 1/49	12/26/52
LaDuc, Francis M.	1/ 1/48	8/31/49
Lyon, Addison B.	1/ 1/48	7/ 2/48
Lyon, Ellis L.	12/10/42	6/30/51
Markley, Jack H.	8/16/55	9/15/56
MARLER, RAYMOND L.	7/ 1/48	
Martz, Ray C., Jr.	2/ 2/49	2/15/52
MAY, ROBERT L.	6/16/51	
MCBEE, WAYNE L.	12/ 1/59	
McElfresh, William A.	7/ 1/56	12/31/57
Messenger, Aubrey S.	7/16/56	9/15/58
MIHALIC, GREGORY F.	9/16/61	
Moore, Julian M., Jr.	8/ 1/46	2/28/50
MORRIS, CALEB L.	6/ 6/55	
MORRIS, CLOYD C., JR.	8/ 1/52 & 6/16/57	8/31/53
MORTON, DON T.	9/ 1/58	
Munger, Ernest L.	12/17/48	1/15/52
NICELY, PHILIP D.	5/ 1/56	
O'HARE, JAMES T.	3/ 1/61	
OHLSON, EUGENE	7/ 1/48	
OLINGER, HAROLD	6/16/55	
Ordel, Arthur W., Jr.	11/ 1/49	1/31/52
Osborn, Robert M.	7/ 1/48	11/30/48
Paxton, James S.	2/16/58	7/31/60
Pederson, Fred C.	10/ 1/21	6/27/44
PEERY, GEORGE W.	1/16/51	
PENNOCK, CALEB M., JR.	2/16/48	
Pfalzgraf, Marcel C.	7/ 1/46	8/31/51
Pierce, Milton A.	1/16/49	1/15/50
PIERCE, WILLIAM L.	1/16/50	
Plumb, George H.	10/ 1/52	4/30/55
Pomerening, Donald A.	7/ 1/48	9/30/48
PRICE, CLEVELAND M., JR.	4/ 7/58	
Putney, Reid T.	3/ 1/52	6/27/52
RASMUSSEN, JOHN A. G.	10/16/48	
Reynolds, Eugene E.	7/ 1/49	5/ 9/52
RHINES, STANLEY W.	7/ 1/55	
RODGER, EDWIN E.	11/ 1/46	
Rogers, Gordon L.	2/ 4/49	3/20/51
ROLLER, WILLIAM O.	7/ 1/61	
ROSE, PATRICK C.	7/ 1/60	
Ruckel, James M	3/16/57	9/15/59
Santopolo, Frank A.	1/25/43	5/13/44
Scholtes, William E.	8/ 1/51	3/31/56
SCHROEDER, WILLIAM J.	7/ 1/56 & 1/16/61	3/10/59
Searcy, Walter H.	5/ 1/56	8/31/56
SHAVIS, JOHN M.	9/28/50	
Shrauder, Paul A.	9/ 1/54	1/15/55
Simons, Walter	1/ 1/50	2/15/52

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
SLOCUM, ROBERT W.	1/16/46	
Slusser, Nevin F.	7/ 1/53	9/15/56
SMITH, HOMER G., JR.	9/16/56	
Smith, Waring W., Jr.	4/ 1/51	10/31/51
Snider, Ralph K., Jr.	8/16/46	9/30/47
STANLEY, WILBUR C.	3/12/56	
STEIRLY, CHARLES C.	8/ 1/42	
STODDARD, MAYNARD, IV	9/ 1/52	
Stoneburner, William H.	4/ 1/26	12/31/50 Retired
Straight, Fay M.	2/16/47	7/31/54
SWIFT, JOHN G.	9/ 1/56	
TAYLOR, CHARLES W.	12/ 1/45	
Tekel, Joseph E.	9/ 1/55	12/31/56
THOMPSON, PAUL R.	7/ 1/61	
Trefts, Hubbard	6/16/58	3/31/60
Trew, Frederick	1/ 1/48	8/31/49
TURNER, THOMAS S.	9/12/41	
TYLER, WILLIAM A., JR.	8/ 1/51	
VERNAM, WILLIAM C.	8/ 1/51	
Waite, David M.	10/16/46	5/15/56
Ward, Edward H.	12/16/47	9/16/48
WARNER, STANLEY F.	7/ 1/61	
West, William J.	3/ 1/48	12/31/48
Whitt, Thomas W.	1/16/50	9/15/51
WILFONG, DALLAS G., JR.	2/ 1/47	
WILSON, ALVIN D.	1/ 1/49	
WITTER, CHARLES J.	6/ 5/44	
WOOD, THOMAS B.	12/16/58	
WOODLING, RICHARD H.	3/ 1/49	
WOODSON, LEROY D.	8/16/56	
Worrell, Albert C.	10/23/44	10/ 3/47
YANCEY, THOMAS E.	1/ 1/49	
ZAZWORSKY, EMIL W.	2/ 1/55	

II. FOREST WARDENS

ADAMS, ARTHUR S.	5/ 1/58	
Adams, Clarence M.	3/ 1/58	4/15/58
Aldrich, Robert C.	7/ 1/48	10/22/48
ALLIO, FRANK	7/ 1/53	
ANDERSON, HERMAN L.	3/16/55	
BAKER, JOSEPH M.	2/ 1/57	
BALDOCK, JOHN W.	6/ 1/54	
Barbour, Luther M.	7/16/56	5/31/58
Barnard, Fred J.	11/ 1/58	10/ 1/59
BIRDSONG, PERCIE T.	7/24/43 & 9/1/58	2/19/44
Boggs, Francis C.	4/ 1/52	2/15/57
BOSTON, HOLLIS G.	8/16/61	
BRADSHAW, NATHANIEL H.	2/15/43	
Branham, Clarence	3/ 1/43	8/31/58
Branham, Quinten	9/16/59	1/15/60
Brinkley, Norfleet J.	3/ 1/43	9/30/45

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
BROADDUS, JOHN M.	7/ 1/57	
BROOKS, CARL, JR.	2/16/57	
BROWN, GEORGE R.	7/16/45	
BURTON, WILLIAM H.	7/16/59	
CALDWELL, F. PORTER	8/16/61	
Carner, Earl I.	5/16/47	5/31/48
Carpenter, William A.	11/ 1/43	7/19/44
Carr, Calvin L.	10/ 6/44	6/23/45
CARTER, HERBERT K.	3/16/58	
CEASE, EVERETT R.	2/ 1/58	
CHAFIN, SHIRLEY B.	9/ 1/61	
Christley, William G., Jr.	3/16/47	8/27/48
CLARKE, ROBERT E.	3/16/58	
CLEATON, JOHN A., SR.	10/16/61	
Cornwell, Edwin E.	10/19/43	6/21/44
CURRIE, HORACE L.	6/ 1/61	
DALTON, CARL B.	3/16/57	
Darden, Charles W.	3/ 1/43	6/17/44
Davidson, June O.	4/ 8/45	6/13/45
Dowdy, Floyd L.	6/18/45	9/30/45
Dowdy, Otha C.	8/ 1/61	
DRIGGS, MELVIN L.	7/16/56	
Duncan, Floyd C.	12/ 1/45	10/31/51
DUNFORD, CHARLES W.	7/16/56	
Dunn, F. L.	2/22/43	6/23/44
Dunston, William H.	1/16/43	6/30/45
EGGBORN, WILLIAM H., III	10/ 1/61	
Ellis, Charlie W.	3/ 1/45	3/13/45
Farmer, Edgar M.	3/16/52	5/15/54
FARMER, HARRY W.	7/ 1/58	
FERGUSON, FRANKLIN L.	10/ 1/61	
Fleming, William L.	10/ 4/43	7/17/44
FORBES, CHARLES R.	5/16/56	
FRANCIS, VERNIE W.	7/16/48	
Garth, William A.	9/16/47	1/26/49
GOWIN, FRANK B.	2/ 1/45	
GRIFFIN, DOUGLAS B.	4/16/60	
Hale, Ernest C.	10/ 4/43	9/12/44
HALE, RICHARD T.	1/16/50	
Hamlet, Ivan B.	7/ 1/58	9/15/60
Hassell, Jesse	2/ 9/43	7/19/44
Hasty, Robert G.	10/27/44	7/ 3/46
HATCHER, JOHN W.	10/ 1/61	
Heflin, Harrell H.	4/ 1/43	6/17/44
Hill, Christopher C.	4/ 8/43	9/30/45
HILL, JAMES B., JR.	9/16/61	
HOBACK, ARTHUR B.	10/16/47	
HODGES, GEORGE D.	7/16/59	
HOLMES, J. LUTHER	11/ 1/51	
HOOD, EUGENE G.	3/16/58	
HORNER, ALDEN J.	9/16/45	
HOSTETTER, FLOYD E.	4/ 1/61	
HOSTETTER, P. Raymond	7/16/53	
HUFFMAN, RAY W.	7/16/56	
Hughes, James E.	2/24/43	9/30/45
Hunt, William J.	1/ 3/44	7/21/44

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Jamison, Riley	8/ 1/49	2/24/55
JARRATT, EDWARD C.	1/ 1/57	
JONES, EMMETT G.	11/ 1/42	
Kay, Harry L.	10/ 3/43	6/28/44
KEMPER, JOSEPH R.	7/ 1/57	
KIDD, HENRY C.	4/16/61	
KILLMON, JAMES B.	8/ 1/56	
King, Jesse M.	3/ 1/51	7/15/56
LONG, ORVILLE L.	7/16/59	
MADDOX, GEORGE E.	4/ 1/61	
Mansfield, J. Roger	3/ 1/46	4/30/47
MARSHALL, CHARLES L.	3/16/61	
MARTIN, BENJAMIN E.	7/ 1/56	
Matthews, Ryland J.	9/16/43	6/30/45
McCarthy, William L.	7/ 1/54	4/16/55
McClanahan, Bert	7/16/56	4/30/59
MCCLANAHAN, KYLE E.	5/ 1/59	
MCDONALD, WILLIAM C.	7/16/58	
METTINGER, STANLEY N., SR.	7/27/59	
Minetree, James A., Jr.	2/19/51	10/16/51
Money, Ivan J.	5/ 1/43	6/20/44
Moore, Willis W.	7/ 1/48	2/28/58
MORGAN, WILLIAM B.	7/ 1/55	
MORRIS, MILTON A.	9/16/48 & 10/16/56	8/31/50
MULLINS, ROY	3/ 1/60	
Mullins, Warren E.	9/16/58	8/31/59
NASE, PHILIP S.	8/16/50	
Neblett, Sterling R.	9/13/43	6/30/48
NEWMAN, WILLIAM M.	7/ 1/57	
NICHOLS, ARTHUR L.	4/10/45	
OSBORNE, OTIS E.	8/16/57	
Outlaw, William R.	3/ 4/43	6/10/44
OWEN, ODELL H.	8/ 1/50	
PARROTT, N. Brightberry	8/16/61	
Pemberton, Robert A.	11/30/42	6/17/44
Potts, Allen F.	3/ 3/43	6/17/44
PRYOR, MARVIN F.	7/27/59	
RACEY, JOHN A.	9/ 1/61	
RAMSEY, ROSCOE W.	10/ 1/60	
Rawles, Edward B.	11/ 1/42	4/ 7/45
Reid, Richard L.	2/26/43	6/19/44
ROBERTSON, EDWARD H.	4/ 1/47	
Rogers, James W.	3/ 1/43	2/ 7/44
Rogers, Richard H.	9/14/43	1/27/45
Rose, James W.	11/ 1/46	3/15/55
ROYSTON, WILLIAM S.	9/ 1/61	
RUMSEY, GENE E.	3/ 1/57	
Ryman, Issac R.	9/ 1/51	6/15/56

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
SANDERS, GARRISON H.	8/ 1/61	
SCRUGGS, WALTER J.	9/ 1/61	
Sculthorp, James A.	4/11/45	5/30/45
SHEADS, DELBERT E.	9/ 1/51	
SIMMS, LASCO	8/16/61	
SMITH, DAVID M.	7/ 1/58	
SMITH, F. ROY	9/ 1/49	
Spiker, Carlisle T., Jr.	7/ 1/48	5/31/49
TATUM, GARLAND E.	11/ 4/59	
TAYLOR, CARTER H.	8/ 1/61	
Taylor, John E.	11/ 1/42	6/30/45
Thomas, John E.	1/30/45	6/ 8/46
THOMAS, JULIAN D.	9/ 6/45	
Tyree, Gordon T.	3/ 1/55	2/28/57
VAUGHAN, JOSEPH B.	7/16/49	
Watson, Marvin G.	7/18/44	1/ 2/45
WEBB, CLAUDE A.	7/16/59	
WELLS, HENRY C.	7/20/59	
West, George K.	8/ 1/49	10/31/49
Westbrook, John J.	1/21/46	7/31/50
Wheeler, J. Ward	6/ 1/48	3/10/51
WHITEHEAD, W. WITHERS	7/16/56	
Wilkinson, Harry B.	7/ 1/46	3/31/47
Wilkinson, Joseph E.	3/12/44	6/30/44
Wise, Lawrence E.	8/21/44	9/30/45
Wright, Orville J.	11/16/50	1/31/51
Young, Oscar D.	11/ 1/43	7/19/44

III. ENGINEERING AND MECHANICAL

Avery, William C.	2/16/48	5/15/48
BEASLEY, LEONARD E.	3/16/46	
BELLOMY, OSCAR R.	5/ 5/29	
BICKLEY, FLOYD E., SR.	5/ 1/53	
BURTON, ELLIOT S.	3/ 1/47	
Caldwell, James E., Jr.	5/16/45	10/24/47
Carter, Carroll O.	9/ 1/48	7/31/50
Childress, Arlie W.	8/ 1/45	8/31/45
Clark, Arnold B.	9/ 1/55	12/31/60
COLLINS, ELWOOD L.	3/16/48	
Counts, George	5/16/42	1/16/46
DAVIS, DOUGLAS V.	12/ 1/58	
DeHart, Roy W.	1/16/48	8/27/48
Dickinson, Ryland S.	7/ 1/48	5/17/55
Dungan, Sanders J.	7/ 1/37	2/15/48
EASTERLING, H. Earl, Jr.	8/ 1/61	
EPPARD, BILLY E.	8/ 1/61	
Flanary, Lonnie H.	10/21/40	4/30/46
Garber, Edward E.	10/ 1/42	4/30/47
Goens, Charles W.	10/ 1/43	3/15/44
Grubb, Leo L.	8/ 1/46	12/15/46
Hayes, James E.	7/ 1/45	12/15/45
HENDERSON, CHARLES W.	3/16/43	
Hill, Bernie B.	7/16/44	9/ 9/44

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Leary, Hubert C.	7/16/44	9/ 9/44
LeGrande, Archie A.	1/16/48	1/31/48
Lipscomb, J. L.	2/ 1/45	7/31/45
Mann, Wilson T.	5/ 1/48	8/31/49
Mays, Harry T.	12/16/45	4/12/56
McCoy, Clarence R.	9/20/43	9/30/45
McFall, Hubert D.	10/ 1/45	11/ 8/45
Morehead, Harold F.	5/16/47	12/31/47
MORRIS, GEORGE	2/16/52	
Neugent, George P.	10/16/44	1/27/45
Olinger, Gilbert T.	7/16/44	11/ 4/44
PERKINS, ROBERT F.	7/16/45	
Phipps, John T., Jr.	5/16/48	8/20/48
Pheoxix, Fred W.	4/ 1/43	8/31/50
Prescottm Leone A.	10/ 1/48	9/30/50
Roop, Edward L.	5/ 1/44	8/14/44
Sacre, Carroll L.	2/ 2/44	7/ 1/44
SEILER, ROBERT H.	4/ 1/57	
Shelton, Robert L.	5/ 1/51	6/15/52
Shifflett, George W.	11/16/44	1/15/45
Tooley, William S.	5/ 1/46	10/25/46
WILLIAMS, WILLIAM E.	10/16/53	
Wooten, James A.	8/16/45	11/ 3/45

IV. FORESTRY AIDES & ASSOCIATES

BARTON, JOHN W.	6/16/54	
Bickley, Floyd E., Jr.	9/ 1/50	4/30/53
CARTER, CHANCELLOR O., JR.	11/ 1/60	
Cleveland, J. Beckwith	12/ 1/44	6/30/60
COVINGTON, MARTIN B.	3/16/49	
EPPARD, ELIJAH H.	3/ 1/52	
Farrish, Shirley D.	9/ 1/56	9/ 6/57
FRANKLIN, CLIFFORD E., JR.	7/ 1/48	
Franklin, Robert E.	8/ 1/56	11/15/56
GARMAN, RUSSELL J., JR.	7/ 1/56	
GRUBBS, JOHN R.	9/ 1/57	
HARLOW, AUBREY J.	8/ 1/56	
HOPKINS, HARRY A.	8/ 1/56	
JARRATT, JAMES B.	12/16/57	
JOHES, HOWARD	5/16/55	
MEADOR, HUBERT L.	9/ 1/56	
NOWLIN, ALBERT P.	4/16/56	
Phoenix, Edgar T.	5/16/53	5/31/54
RUDISILL, JOHN A.	2/16/51	
Sadler, Kermit P.	8/ 1/57	4/15/59
STEWART, THOMAS G.	11/ 1/52	
WALDEN, MORRIS F.	3/ 1/50	

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
V: <u>CLERICAL</u>		
Adams, Mabel T.	1/1/47	1/31/47
Baskerville, Evelyn S.	3/16/43	1/31/44
Berbaum, Dorothy D.	5/5/52	9/15/55
Bolick, E. Frances	7/1/44	1/17/47
Bowen, Shirley H.	1/1/60	7/31/60
Bowman, Ilar E.	5/16/56	7/31/56
Brill, Judith F.	2/16/60	6/15/60
Broglin, Peggie L.	10/16/53	4/5/55
Brooks, Gladys M.	9/1/46	2/28/47
Brooks, Peggy J.	9/1/55	12/16/55
Butt, Helen W.	1/1/50	6/15/50
Bynum, Mary C.	7/1/43	10/13/45
CARLISLE, JANICE L.	7/1/60	
Caul, Myrtle C.	8/1/48	9/17/48
Chambers, Rachel L.	3/1/44	8/26/44
CHASE, CATHERINE P.	8/16/50	
CHEAVACCI, Daisy B.	11/1/43	
Chewning, Nettie P.	10/1/45	9/30/51
Clark, Helen K.	9/16/51	5/2/52
CLARK, MARGUERITE U.	10/1/44	
CLATTERBUCK, CAROLYN H.	7/1/60	
Cleveland, L. Catherine	7/16/48	9/15/54
Colcock, Lucy D.	3/16/45	9/4/45
Coleman, Mary M.	12/1/44	6/30/45
COOK, ETHEL S.	10/16/45	
Copeland, Dorothy W.	5/1/41	11/30/44
Copeland, Mary E.	7/1/42	7/25/45
COPENHAVER, LOLA W.	7/1/58	
DAVIS, ANNIE B.	10/1/56	
DAVIS, JEANETTE D.	6/16/59 & 2/16/62	12/31/61
DISHNER, VIRGINIA R.	3/16/52	
DONALD, BESSIE L.	7/1/46	
DREWRY, INEZ B.	8/1/48	
Dulaney, Lucille S.	3/1/47	5/11/48
Eary, Katherine W.	9/1/56	7/8/58
Eels, Margaret H.	4/1/59	4/17/59
Estes, Doris K.	1/1/43	5/15/52
Estes, Marjorie	1/1/43	2/15/44
Evans, Leona L.	1/16/49	1/16/51
FIDLER, DOROTHY G.	3/1/51	
Fleenor, Grace J.	8/10/45	10/15/53
FORBES, MARY M.	8/1/61	
Gatlin, Gladys T.	9/16/50	9/30/50
GODDIN, NORMA D.	10/16/51	
Hale, Nancy M.	7/16/55	7/25/56
Haney, Frances M.	10/1/41	2/28/45
Harding, Frances B.	10/16/54	6/15/55
Hartman, Alice T.	9/16/45	6/15/49
Hayes, Betty R.	6/16/47	3/31/50
Hayes, Marie L.	3/1/54	5/31/54
Heffner, Shirley H.	11/16/45	7/31/46

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Hockett, Maxine E.	5/1/55	12/15/58
HOTRON, JUANITA M.	8/1/56 & 8/1/61	6/60/60
Hunt, Geneva C.	2/2/43	6/15/47
HURTT, Bessie M.	1/15/26	
JOHNSON, JOYCE F.	12/16/58	
Key, Hazel H.	5/1/40	12/10/44
Knight, Eva L.	10/1/50	6/30/55
Knight, Ruth W.	12/1/55	6/30/57
Lambert, Rosetta D.	9/1/56	12/31/59
Lanahan, Mary D.	2/16/47	9/3/48
Lewis, Eleanor L.	6/16/49	8/31/50
Lewis, Peggy H.	9/1/55	4/30/56
Lockard, June L.	7/1/43	3/15/52
Lucas, Glenice N.	1/16/41	9/30/45
Luck, Maxine K.	5/1/46	4/30/48
Lynch, Mary A.	9/1/44	8/31/45
Markham, Aileen M.	7/26/56	5/15/58
Maupin, Patricia Ann	6/16/56	6/23/58
Mays, Olivia C.	7/16/53	3/31/59
MCDANIEL, JOANNE W.	8/1/60	
MICHAEL, JUNE M.	9/1/58	
Miller, Dorothy M.	10/1/44	2/15/47
Miller, Gleodora S.	4/16/46	3/31/48
Mooney, Mary Anne	6/16/47	7/31/47
Morris, Barbara G.	7/16/55	7/30/56
Morris, Shirley I.	3/10/44	8/15/45
Morris, Virginia D.	8/1/45	3/15/46
Morrison, Virginia	2/1/44	3/31/45
MOYER, EILEEN S.	8/1/46	
MULLINS, MARGARET L.	11/16/55	
MYERS, RUTH S.	8/16/50	
Page, Betty R.	7/16/46	6/15/48
Parker, Glenice L.	9/1/46	7/15/48
Parrott, Patricia A.	3/16/52	5/31/55
PATTON, RUTH M.	3/16/50	
Payne Amanda	11/1/43	6/10/44
PENNINGTON, MARJORIE N.	7/16/58	
Phillips, Elizabeth E.	10/16/45	1/31/46
Phillips, Jane B.	6/14/48	7/15/52
Pope, Jessie E.	10/1/43	8/28/46
Powell, Alma S.	4/16/48	8/15/50
Powers, Emily E.	7/16/50	2/15/51
Pugh, Nancy M.	8/16/50	1/15/52
Ramey, Tillie P.	11/1/54	6/30/56
Richardson, Lucy F.	3/16/47	5/15/47
Ripley, Goldie A.	8/1/52	4/27/53
Robson, Alice F.	4/1/45	6/22/46
Rose, Marguerite G.	6/16/51	6/30/60
Sandridge, Helen M.	3/16/46	4/15/46
SHIFFLETT, S. JOANNE	12/1/61	
Sis, Evelyn T.	7/1/45	6/15/49
Skeppstrom, Virginia J.	6/16/47	3/10/50
Smith, Julia M.	7/1/44 & 10/16/51	5/31/49 & 7/15/55
Snoddy, Joanne M.	7/1/49	7/31/50

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Taylor, Maxine G.	1/1/42	11/30/46
TOMS, ALICE D.	3/1/45	
Tooley, Clarice M.	1/1/45	5/15/46
TROGDEN, MARY B.	8/1/60	
Tyler, Evelyn M.	1/16/45	8/30/45
Van Buren, Catherine M.	9/16/47	1/28/48
Van Fossen, Diane S.	1/1/54	1/31/54
Vest, Lelia B.	9/1/50	5/15/56
Walters, Frances E.	7/1/52	10/31/59
Warner, Jean R.	6/16/46	5/31/47
WEST, MARGARET E.	7/1/58	
WILSON, EDITH M.	6/2/33	
Wingfield, Helen E.	2/1/27	4/30/44
Wingfield, Kathleen	2/1/43	5/31/48
Wise, Anna C.	10/1/45	10/19/53
Wolfe, Eva J.	4/1/44	9/30/44
Wolford, Muriel P.	11/1/59	12/31/59
Wood, Charlotte L.	6/16/47	5/31/51
Woods, Dorothy M.	5/1/48	1/31/52
Young, Lorriezon	6/1/49	6/30/50

VI. OTHER

ALLEN, THOMAS J.	10/16/53	
GIBBS, JACK	3/16/61	
Holloway, Robert B.	2/1/27	8/15/52
Johnston, Ralph E., Jr.	7/1/48	7/16/52
Lawson, Dock H.	4/16/43	5/13/44
McMahon, William J., Jr.	8/16/50	10/31/50
SHELTON, ERNEST R.	Forest Warden A Bldgs. & Gr. Supt.	2/1/57 3/1/61
THOMAS, CAMERON M.	6/16/61	
Tuttle, William A.	11/1/50	3/2/51
Wagener, Frank A., Jr.	7/1/42	11/18/60
Ware, David W.	4/16/50	7/16/50

IX. Development and Progress continued, 1960-1973

The former chapters I through VIII were prepared by S. G. Hobart who retired June 8, 1962, at the statutory retirement age of 70 years. Chapter IX was prepared by George W. Dean who retired on July 1, 1973 at the statutory age of 70 after having served 44½ years as an employee of the Division of Forestry. This update will set forth the more salient occurrences throughout the years 1960-73.

Legislation1960

- (a) Section 59-101.2 of the Virginia code was amended to make the "International 1/4 inch long rule" the standard legal rule except where buyer and seller specifically agree to some other rule.
- (b) A bill sponsored by the railroad interests would have repealed Section 56-426 requiring the railroads to keep rights-of-way cleaned of flammable material. Due to public pressure the patrons of the House Bill #65 withdrew the bill.
- (c) The Seed Tree Law was amended to insure the proper reforestation by requiring a person found in violation to set up an escrow fund.

1962

No General Assembly action affecting the Division.

1964

- (a) An act to permit the State Forester to render forestry services and rent specialized equipment to landowners, municipalities, etc.
- (b) The Seed Tree Act was further amended to correct defective language and to provide the manner in which a judge should require bond, and to authorize expenditure by the State Forester.
- (c) Section 27-54.1 permitting closure of forestland by the Governor was amended to permit fishing or hunting from a boat in marsh land provided the boat does not touch dry land.
- (d) Amended several sections which permits the State Forester to provide forest fire protection to cities.

1966

- (a) Amended several sections placing the sale of tree seed under provisions of the Virginia Seed Law.

- (b) Added Section 10-57.1 authorizing the State Forester to offer a reward for information leading to the conviction of a person for intentionally setting a forest fire.
- (c) Amended Section 46.1-267 to permit forest wardens to use a siren and flashing light on a vehicle.
- (d) The first law intended to control strip mining in Virginia was enacted. State Forester Dean was on a 1964-65 Study Committee which recommended appropriate legislation.
- (e) A bill requiring the registration of foresters was introduced but was not enacted.

1968

- (a) Section 10-76 "Seed Tree Law" was amended to require eight pine seed trees.
- (b) Authorized the Director of the Division of Engineering and Buildings to sell timber from land under his control provided such sales are made in accordance with forest management practices recommended by the State Forester.

1970

- (a) Enacted Sections 10-90.10 through 10-90.18, Chapter 4, Title 10, "The Reforestation of timberlands" Act, wherein the landowner is offered an incentive payment to aid in reforestation. Funds are made available from a tax imposed on pine timber cut and from the State General Fund. Bill passed both House and Senate without a single opposition vote.
- (b) Amended Section 10-37 increasing the amount of unadvertised sales on the State Forests from \$1000 to \$3000.

1971 (Special Session)

- (a) During the fall of 1970, a statewide referendum approved certain changes in the State Constitution. The purpose of the 1971 session was to amend the Code to conform with the changes. Upon the advice of the Attorney General Miller, the Reforestation Act was submitted for re-enactment, and it was re-enacted without an opposing vote. Provisions of this Act are explained under "Reforestation."
- (b) A land use tax act based on "productivity" of the land was enacted. Forestland is included in this legislation (see Chapter 15 of Title 58, Article 1.1., Sections 58-764.4 through 58-764.16).

1972

- (a) The railroad interests again introduced a bill to repeal Section 56-426 which requires that the rights-of-way be clear of flammable material. Due to public pressure a committee vote was delayed until the 1973 session at which time the patron withdrew the bill.
- (b) The "Seed Tree Law" was amended to update certain language due to changing costs, and to include tulip poplar only where it constituted 10% or more of live trees on each acre.
- (c) As a matter of historical interest there is below listed the appropriation for 1964-1972; the first and second years are similar, usually the second year is 5%+ greater.

FUND	1965-66	1967-68	1969-70	1971-72	1973-74
404-01--Protection & Development of Forest Resources	\$1,779,875	\$2,079,330	\$2,364,935	\$2,821,750	\$3,272,770
404-02--Maintenance & Improvements Constructed by CCC	109,460	120,620	127,695	154,345	144,940
404-04--Forestry Services to Landowners	379,645	475,800	548,915	638,555	678,320
404-05--Reforestation of Timberlands	---	---	---	1,200,000	1,070,000
404-06--Investigation & Control of Forest Pests	50,265	83,710	89,545	97,620	151,105
404-90--Administration & Protection of State Forests	137,785	174,300	280,835	312,715	324,570

Forest Fires

Records reveal that drought periods and forest fire occurrence increase in intensity on an approximate 11 year cycle; 1963 was an intense year. During this year 3,300 fires burned 44,823 acres which is 0.795 percent of the 14,004,000 acres protected. The year 1964 witnessed an abrupt drop to 1,655 fires and a burn of 7,274 acres or 0.052 percent of protected area. Fire occurrence and acres burned have ranged around the 1964 figure for the average year, except for 1972 when there occurred only 762 fires and a burn of 2,192 acres.

Prompt, rigid and impartial enforcement of the forest fire laws continues to be one of the effective methods of preventing fires. The Division consistently collects suppression costs on 50 percent or more of the fires.

Due to the changing pattern of population distribution, less rural people and more urbanization, the county forest warden organization is diminishing in effectiveness; more dependence must be placed on small, more mobile paid suppression crews and on urban volunteer fire companies. The Division and more volunteer companies cooperate closely in fire suppression. Since 1968 the Division has held a statewide training school for volunteer company members. Local district personnel also hold training sessions with local companies.

The Division training officer is on the faculty of the Virginia State Police Training School and gives a series of lectures on forest fire prevention and law enforcement to every class of new recruits. It is a pleasure to be associated with such a fine, effective cooperative agency as the Virginia State Police.

In 1966 the General Assembly authorized the Division to join the "Middle Atlantic Interstate Forest Fire Compact." Virginia is also a member of the Southeastern States Forest Fire Compact.

Depending upon the funds available, a program of continuous upgrading of fire suppression equipment in the form of tractors, fire plows and transports is in effect. As of 1972 the Division has some 60 tractor fire plow units ranging in size from the early 1960, 1010 John Deere to heavy caterpillar D-7 type.

Reforestation

On July 11, 1966, the Division received a deed to the 186-acre "Nick" Hackworth farm property, 8 miles north of Waynesboro. Improvements designed to establish a modern forest tree nursery were begun. Several miles of underground drainage tile were laid. The plan of drainage and the flow grades were laid out by Wayne Hypes, local representative of the U. S. Soil Conservation Service, an organization which has been most helpful at the Augusta and New Kent Forestry Centers. Adequate buildings and equipment have been made available. Wayne McBee, a former service forester, was appointed superintendent.

One of the problems in effective reforestation is the delivery of the seedlings to the planting sites in good condition. To provide the best of care of seedlings, cold storage rooms and distribution have been constructed on both the New Kent and Augusta Nurseries, and at Waverly, Abingdon, Tappahannock, and Charlottesville District Headquarters. In 1972, a cold storage building and a grading room were constructed at the Cumberland State Forest. Cold storage facilities for seed are available at both Augusta and New Kent. Seedlings in bulk are transported to Cumberland from New Kent in

the field bundles. This system relieves the labor strain which exists at New Kent.

Labor is an ever-increasing problem at New Kent due to competition from the Richmond, the Peninsula and the Williamsburg areas.

"Necessity being the Mother of Invention," talents of the organizations were combined, chiefly Bill King, Superintendent of the New Kent Nursery, Leroy Collins and Billy Eppard, Mechanics, and Branch Chief John Heltzel, to design and construct a satisfactory tree seedling lifting machine. Such a tree lifting was perfected and will lift a million seedlings per 8-hour day. It is pleasing to note that representatives from 15 states and three foreign countries (Sweden, Australia and Canada) visited the Nursery to inspect the machine. The U. S. Forest Service made a complete set of mechanical drawings of the machine which have been widely distributed.

During the 1973-74 season, the combined tree seedling production will approximate 55 million. So far as we know, the New Kent Nursery produces annually more seedlings than any other one in the world.

A report issued by the U. S. Forest Service dated May 1973 containing comparative accomplishments in the States during 1972, Virginia ranks first in three important accomplishments on non-industry owned forest land, as follows:

	<u>Number of Cases</u>	<u>Acres Treated</u>
Tree Planting	2,910	49,292
Direct Seeding	43	2,213
Site Preparation	947	37,414

During the years 1971-73, the Division initiated the organization of County planting crews, whereby the landowner would pay the planters direct, or the State would plant an area for \$20 per acre; the State hiring and paying the crew.

Also during this period the Division worked out a cooperative agreement with the Department of Welfare and Institutions wherein trusty prisoners from certain correctional road camps were released to the Division for tree planting. This arrangement worked out reasonably well.

The Forest Survey of 1967 confirmed the conviction of the Division that the annual drain of pine was greater than the annual ingrowth. The survey showed that over the previous 10 years, the annual drain had reduced the capital growing stock by 15%.

In March 1970, the State Forester called an ad hoc committee of leaders of the pine users industry to consider a plan wherein industry would accept a per unit tax which would be matched from the General State Fund, and from which the small landowner would be offered an "incentive payment"

of one-half of the cost of site preparation and planting. After five public hearings and several committee meetings, a draft of a proposed bill was agreed upon, which was enacted in 1970 and re-enacted in 1971.

Briefly, the Act imposed a 20¢ per standard cord of pulpwood and 50¢ per thousand board feet of lumber, which raised approximately \$350,000 tax per year which was matched by the General Assembly on an annual basis. The ready acceptance of the "incentive payment" by small landowners proved the worth of the plan.

Buildings and Land

Concurrent with the decision to expand the establishment of County Foresters, plans were made to construct county forestry headquarters as rapidly as funds would permit. Accordingly, County Forestry office-shop buildings were constructed in the following counties: Eastern Shore - 1960; Gloucester and Caroline - 1964; Spotsylvania - 1965; Halifax, Louisa, and Buchanan - 1966; Shenandoah - 1967; Brunswick and Grayson - 1968; Amherst and Fauquier - 1969; Goochland - 1970; and Pittsylvania - 1972-73; with Southampton scheduled for winter of 1973-74.

In 1966 with the planned construction of Interstate Highway 64, and the relocation of U. S. Route 29, the shop-nursery area 1½ miles south of Charlottesville was disrupted. The nursery was closed. After considerable negotiation, title to 44 acres was conveyed from the Commission of Visually Handicapped to the Department of Conservation and Economic Development, Division of Forestry. This acreage lies on both sides of relocated Route 29, and permits retention of auto vehicle repair shops and the old nursery buildings. The land east of Route 29 will be available for a new Natural Resource Building.

What appeared at first to be a disaster proved to be a bonanza in that the Division received title to the 44 acres at Charlottesville, and the 1966 General Assembly provided funds for the purchase of 186 acres of land and the construction of adequate buildings and facilities for a new forest tree nursery located 8 miles north of Waynesboro on the South River flats one mile north of Crimora in Augusta County.

The Charlottesville state headquarters motor vehicle repair shops were enlarged and upgraded during the winter of 1972-73. The shop is now modern in every respect--equal to any similar shop in Charlottesville.

To fulfill a need for a suitable area to out-plant genetically superior tree seedlings in a progeny test area the Division acquired by purchase from the Chesapeake Corporation a 319-acre tract located approximately 5 miles east of West Point near Gressit and known as the Hockley tract. This tract will be used to progeny test coastal region loblolly pine. Piedmont region loblolly will be progeny tested on the Buckingham State Forest in Buckingham County.

On May 16, 1969, a dedication ceremony was held in Nelson County on the occasion of Mrs. Arthur de T. Valk (formerly a duPont) deeding to the State 229 acres, and in 1970 she deeded an additional 192 making a total of 421.59 acres. Mrs. de Valk has also donated some \$30,000 to develop the area as a research project to restore the native American chestnut. In memory of her father, of the duPont family, the area was named the Lesesne State Forest. An active research program is in progress concerning chestnut hybrids and growth of seedlings from irradiated chestnuts.

During the fall of 1972 Mrs. Helen Whitney Gibson generously gave to the Division a 147½ acre tract of forestland in Fauquier County located about 3 miles due south of Warrenton. This is a memorial forest to her father and is named the Whitney Forest.

From time to time, as land becomes available within the State Forest proclaimed boundaries, available tracts were purchased. Also, small tracts were purchased on which the various county office buildings were constructed.

During 1972 a new ranger's house was constructed at the Buckingham Forest headquarters. Several buildings on the State Forests were renovated and upgraded as were several of the District office buildings.

Administration

Upon the retirement of S. G. Hobart, June 1962, W. F. Custard was promoted to Chief of the Branch of Forest Management with C. M. Pennock as Assistant. District and Branch organization remained constant. Establishment of county forester offices was intensified so that the forester, representing the Division, would be closer to his work area and become a part of the community. Establishment has been particularly active since 1968.

In 1972, to comply with an executive order from the Governor to State agencies, District lines were adjusted to conform with Planning District boundaries as established by the General Assembly. Present Division Districts include one, two, or more planning districts. The transition was made with little disruption.

All counties which are in need of a full-time Chief Forest Warden have such an employee except King George, Middlesex, Giles, Craig, Smyth, and Russell.

R. L. Marler, Chief of the Branch of Applied Forest Research resigned on February 28, 1970, to join the Research organization of Syracuse University. T. A. Dierauf was promoted as Branch Chief with Jim Garner as Assistant.

On July 1, 1973, George W. Dean retired as State Forester, after serving with the Division for 44½ years. Dean entered the Division on January 11, 1929, and served as District Forester for the Tidewater area.

until 1940 when he was transferred to the Charlottesville Headquarters as Management Chief and in 1942 was transferred to Fire Control Chief. In June, 1944, upon the death of State Forester Fred C. Pederson, he became Acting and was appointed State Forester in August 1944. Dean was succeeded by W. F. Custard who was serving as Chief of Forest Management and had been with the Division since March 25, 1946.

Miscellaneous

During 1962, a warrant was issued in Albemarle County against the Southern Railroad Company for failure to clean their right-of-way (Section 56-426). The Railroad Company was found in violation in the County Court; the decision was later upheld by the Circuit Court. An appeal was made to the Virginia Supreme Court which, in an opinion rendered on March 9, 1964, upheld the decision of the Circuit Court, and thus firmly established the validity and Constitutionality of Section 56-426. (See Supreme Court Case 5724, Commonwealth vs. Southern Railroad Company, March 9, 1964.)

In a case submitted to the Goochland County Circuit Court in 1960, the Court held that Louis L. Payne was in violation of the Virginia Seed Tree Act. An appeal was made to the Virginia Supreme Court which, on March 1, 1961, refused to grant an appeal hearing, this confirming the validity and Constitutionality of the Virginia Seed Tree Act.

As a result of the Supreme Court's establishing the Constitutionality of the Seed Tree Act, there since has been excellent compliance with its provisions; only a few violations have occurred, which have been satisfactorily settled in the local courts.

With an increase in the required number of seed trees to be left standing to eight, and the increase in the dollar value of stumpage, many owners and operators have taken advantage of Code Section 10-83 of the Seed Tree Act. This section authorizes the State Forester to permit that seed trees not be left standing provided that the owner or operators agree to reforest the area in accordance with a reforestation plan submitted to and approved by the State Forester. This provision has resulted in thousands of acres being well reforested each year, which, in the absence of the Seed Tree Act, would be left as "cut-over areas."

The 1968 General Assembly authorized and directed the appointment of a Committee to make a study of the "Industry of Agriculture," the study to include all crops from soil. The Committee reported to the 1970 General Assembly "Forestry is in many respects the biggest business in Virginia. Forestry is: first in the number of establishments; first in the number of persons employed and second in terms of payroll, accounting for approximately \$47 million before it is removed from the forest. This value increases to over \$110 million by the time the annual harvest is delivered to the initial processing plant -- larger than any other single agricultural crop. Once

manufactured into furniture, paper and allied wood products, the value approaches \$900 million annually." "Of the total 1964 agricultural income of \$605 million, the forest crop of \$110 million (18.2%) was second only to the \$149 million (24.7%) for the combined crops of wheat, tobacco, peanuts, soybeans, and other crops. Of the total forestland, industry owns 11%, public 10%, and small private owners 79%." The findings and the report of the Committee proved helpful in developing and securing enactment of the Resorestation Act.

During the winter of 1972-73 there were established on the State Forests several so-called "natural areas," on which there will be no future timber cutting. Although small in acreage, these areas represent typical stands or unusual stands of timber types and/or species found in the locality. Suitable maps were printed showing the location of the areas and the routes of accessibility.

With the increasing population and resultant expansion into urban areas, particularly in the Fairfax-Prince William and the Chesapeake-Virginia Beach regions, the need for "urban foresters" became increasingly apparent. Although the Division had been doing considerable of this type of forestry, it was decided to assign a forester to Warrenton and to Sandston with the definite assignment as Urban Forester.

In 1972 a "utilization" forester was added to the Headquarters staff whose duties were, and are, to work with the mill operators to improve manufacturing procedures. His services are well received.

During the period 1970-73, two former, but retired, members of the Division died: William Stoneburner, Chief of Reforestation; and Hunter H. Garth, Chief of Forest Fire Control.

X. Developments continued 1973 - 1981

Chapters I through IX were prepared by Seth G. Hobart (Retired 1962) and George W. Dean (Retired 1973). Ed Rodger, employed in 1946, prepared the update through the years 1973 - 81.

Administration

Wallace F. Custard took over as State Forester following George Dean's retirement July 1, 1973. Wally became Virginia's fourth State Forester since the founding of the Division in 1914.

During Wally's administration, several noteworthy changes were made in the organization. In 1975, R. J. Bartholomew was promoted to new position of Deputy State Forester. Cal Pennock, Assistant Chief of Forest Management, took over as Chief following Wally's advancement to State Forester. John Graff, Assistant Chief of Forest Management, was promoted to Chief of Forest Protection. Jim Garner, Assistant Chief of Applied Research, transferred to Assistant Chief of Forest Management and Harold Olinger was promoted from Assistant District Forester in Portsmouth to fill the vacant slot in Applied Research. Frank Burchinal, the Brunswick County Forester replaced Olinger in Portsmouth.

While these changes were taking place, the Division embarked on a fresh approach to administrative management known as "Management by Objectives." Intensive training was given to all levels of supervision to acquaint them with the new concepts. The training was partially financed through a special grant and was conducted by Arthur Beck and Ellis Hillmar of the University of Richmond.

Administrative changes also occurred in the Districts. A pilot effort in several districts proved to be effective and eventually all except the Portsmouth District were divided into two subdistricts by 1976. As a result, the Assistant District Foresters were no longer specialists in fire or management but were each assigned total administrative responsibilities for approximately half the district. Concurrently, County Foresters were assigned full supervisory responsibility for the employees in their work areas. Thus, the Division adopted a line officer administratively responsible for all field operations and field personnel including districts, forestry centers, and state forests. The other employees such as Branch Chiefs, other Headquarters staff, Secretaries, Mechanics, Road and Maintenance Crews were support or resource persons.

During the fall of 1980, several changes were made in Headquarters. John Graff and Cal Pennock exchanged job responsibilities. Pennock became Fire Management Chief and Graff, Forest Management Chief. Maynard Stoddard, who had come to Headquarters as Training Officer in the Forestry Relations Branch, was transferred to Fire Management as Assistant Chief. The training duties accompanied the transfer.

Dave Stoner was employed in June, 1976 to serve as Fiscal Officer upon the resignation of Don Gray.

In May 1974, Jim Cook was promoted to District Forester to replace John Jackson who resigned to enter the consulting forester field. Jackson returned to the Division in December, 1974 as Assistant District Forester in the Charlottesville District and upon the retirement of Charlie Steirly, Waverly District, in March 1976, Jackson was promoted and transferred to Waverly. Brian Edson, Buckingham County Forester, replaced Jackson in Charlottesville. In September, 1977, John Jackson again resigned to go with the Division of Litter Control and Crockett Morris, Jr., was promoted to District Forester at Waverly. Bill Davis, Hanover County Forester, took over Crockett's position as Assistant District Forester of the Richmond District. When Jim Bowen was promoted to Superintendent of State Forests in July 1979, Greg Winston, Amelia County Forester, became Assistant District Forester at Farmville. Upon the resignation of Ted O'Neal in 1978, Bob Mengel served as Assistant District Forester in the Tappahannock District. Mengel resigned in July 1979 and was replaced by Sidney Jones, Gloucester County Forester.

The July of 1977 witnessed the employment of the Division's first female forester. Miss Cheryl Weston came with us as a graduate of Virginia Tech and was assigned to the Tappahannock District. Shortly after this "break through" for the ladies, additional women foresters were hired. These women perform very capably and are well accepted by their peers and by the public with whom they work.

Shortly after the advent of a woman forester, we hired a female forestry technician, Ms. Diane Casper Kiernan, who was located at the Portsmouth District. The summer of 1980 witnessed another "first" for the women. Ms. Betty Hunter was employed as the first female Chief Forest Warden. Her work area was Tazewell County.

The Forester-Planner program launched in 1972 was designed to function somewhat different from urban forestry type programs in certain other states. The Virginia program, under the leadership of Bill Vernam supervising Planning Districts 8, 9 and Leon App in charge of Planning District 15, had as its major thrust working with developers, contractors, local planning groups, neighborhood associations and government agencies. The pilot effort was successful so the program was expanded. David Tice was transferred to Salem to work with Planning Districts 5, 12; Matt Simons worked with Planning District 15 and Debbie Mills had Planning District 21. Budget problems in 1981 eliminated the Salem and Richmond Forester-Planner positions.

The Division recognized the need to get more deeply involved in resource planning, wood utilization and marketing. To provide leadership in these areas, the headquarters staff was expanded. To head up the planning work, State Forest Superintendent W.C. Stanley was transferred to Charlottesville and assigned to the Forest Management Branch in 1979. Jim Bowen replaced Chuck Stanley as Superintendent of State Forests.

In the winter of 1980-81 the State Forester recommended a shifting of headquarters assignments. After approval in Richmond, these changes took effect April 1981: the Branch of Reforestation and Communications

was eliminated and replaced with the Branch of Administrative Services for which John Heltzel was appointed Chief. This Branch's responsibilities include administration of the Headquarters office, Automotive Maintenance, Buildings and Grounds, Communications, Property, and certain personnel functions. Nursery operation was transferred to the Applied Research Branch and seedling allotment and sales were assigned to the Forest Management Branch. Jim Copony, formerly of the I & D Branch, was designated full-time Communications Officer and assigned to the Administrative Services Branch. Tim Tigner of the I & D Branch was given the added assignment of Coordinator of Environmental Education.

Concurrent with the previously mentioned major changes were many minor changes required to effect the reorganization.

Custard, when he became State Forester in 1973, challenged himself and the Division to give a high priority to the training and development of leadership in the ranks. To accomplish this goal, special projects were given to field and headquarters staff. Although these were usually assignments of short duration, they provided excellent opportunities to test skills.

In the spring of 1972, District boundaries were adjusted to conform to Planning Districts. The change created several problems especially with radio coverage and administration. In January 1978, the State Forester transferred Amherst to D-3; Halifax to D-4; and Bedford to D-5. The District Boundaries effective the summer of 1981 were:

<u>Waverly</u>	<u>Richmond</u>	<u>Charlottesville</u>
Brunswick	Charles City	Amherst
Dinwiddie	Chesterfield	Albemarle
Greensville	Goochland	Culpeper
Mecklenburg	Hanover	Fairfax
Prince George	Henrico	Fauquier
Surry	James City	Fluvanna
Sussex	New Kent	Greene
	Powhatan	Loudoun
	York	Louisa
		Madison
		Nelson
		Orange
		Prince William
		Rappahannock
<u>Farmville</u>	<u>Salem</u>	<u>Abingdon</u>
Amelia	Alleghany	Bland
Appomattox	Bedford	Buchanan
Buckingham	Botetourt	Carroll
Campbell	Craig	Dickenson
Charlotte	Floyd	Grayson
Cumberland	Franklin	Lee
Halifax	Giles	Russell
Lunenburg	Henry	Scott
Nottoway	Montgomery	Smyth
Prince Edward	Patrick	Tazewell
	Pittsylvania	Washington
	Pulaski	Wise
	Roanoke	Wythe

Staunton

Augusta
Bath
Clarke
Frederick
Highland
Page
Rockbridge
Rockingham
Shenandoah
Warren

Portsmouth

Accomack
Chesapeake
Isle of Wight
Suffolk
Northampton
Southampton
Virginia Beach

Tappahannock

Caroline
Essex
Gloucester
King George
King & Queen
King William
Lancaster
Mathews
Middlesex
Northumberland
Richmond
Spotsylvania
Stafford
Westmoreland

Clean Air & Clean Water Acts

National legislation plus federal regulations had an impact on Division activities. The Clean Air and Clean Water Acts, for example, required the Division to assume leadership roles in these areas. The Clean Air Act could have curtailed prescribed burning. In order to comply with the regulations, the Division worked very closely with the State Air Pollution Control Board. Smoke management guide lines were developed and training sessions were held for industry, Division and others involved in prescribed burning.

Virginia decided to go the voluntary rather than regulatory route to meet the requirements of the Clean Water Act (Public Law 92-500). This placed the burden of training, publicity, and monitoring on the Division. Pilot logging road stabilization projects were established, meetings were held with forest industries and loggers, special stabilization equipment was purchased and "how to" printed materials were distributed. A very important and time-consuming job was required to meet the Environmental Protection Agency requirements for non-point source pollution from forestry practices. The task was to identify possible problems created by timber harvesting operations, forest road construction or silvicultural treatments. The finished product was known as "Best Management Practices." The recommendations were submitted to and approved by both the State Water Control Board and E.P.A. The Division must monitor and evaluate the non-regulatory approach and show desirable results by 1983 to be permitted to continue as a voluntary compliance state.

Rural Community Fire Protection Program

The Federal Rural Development Act of 1972 (now the Cooperative Assistance Act of 1978), which provided grant money for the Rural Community Fire Protection Program, proved to be a real boon to the

struggling volunteer fire departments. The Division requested the responsibility of handling the grant program and decided to reallocate every nickle of the appropriated money rather than "cream off" any operational costs. The first appropriation, \$56,697, was made available in 1975. A system for publicizing and judging grant requests was developed. To qualify, a rural volunteer fire department must serve a community with a population of less than 10,000. Emphasis was placed on requests for training and the purchase of small equipment. During the first year of the program, more than 114 fire departments applied for grant assistance totaling \$400,000. Unfortunately, only \$56,697 was available for distribution. From the pilot effort in 1975 through the spring of 1981, more than 1,600 requests (some departments applied each year) were made with a total of \$391,677 being disbursed to 1,102 companies. The program was of tremendous value, not only as a means to financially assist needy fire departments, but also as a public relations tool to tie the Division and the departments even closer together to meet a common goal -- better fire protection for the Commonwealth. The Division also earned respect from the departments because no overhead costs were retained to administer the program.

Reforestation of Timberlands Act

The Reforestation of Timberlands Act of 1971 proved to be an effective tool, especially with the uncertainty of federal incentives through F.I.P. and A.C.P. Several amendments to the R.T. were made either through the change in the Code or a change in the Regulations. The 1980 General Assembly extended the R.T. program for 10 more years. The most noteworthy change occurred in 1981 when the General Assembly voted to double the Severance Tax on pine to be matched by like amounts from the General Revenues. The new Tax Increase and Appropriations Bill should make about \$1.2 million available for landowner incentive payments for 1981-82 and about \$1.4 million for the following program year. Credit for the "smooth sailing" of this amendment through the General Assembly was due to the good advance work of the R.T. Committee, Delegate Ray Ashworth, Senator Elmon Gray and many others interested in the incentive program. The funding increase was needed to keep pace with inflation and the increased demand for the program benefits. When the Act was passed in 1971, incentive payments were 50 percent of the costs incurred for site preparation and planting, with a maximum payment of \$20 per acre. In 1974 the payments were increased to \$30 per acre, and in 1979, the payments were increased to \$60. In 1980, another increase was approved to raise the payments to 75 percent of the cost incurred not to exceed \$90 per acre.

Landowner Liability

The high price of energy caused many to return to wood as a fuel source. Firewood cutting and sales permitted more intensive T.S.I. programs and better cleanup in cutover areas. A problem arose--liability to the landowner for accidents during fuelwood sales. The General Assembly amended the Code (29-130.2) to protect the landowners from such suits.

Forest Management of State Lands

In 1950 the General Assembly enacted Code 2.1-153 which authorized the Division of Engineering and Buildings to manage, harvest and sell timber on State lands. This Act dealt exclusively with the Elko Tract near Richmond. The proceeds from timber sales reverted to the General Fund. In 1978 following a Joint Legislative Advisory Review Commission (JLARC) study, the Code was amended to include all State-owned properties with Division of Forestry, Commission of Game and Inland Fisheries and certain "gift" properties excluded. The proceeds from timber sales from non-exempt lands still reverted to the General Fund. Recognizing the need for a change in the law to permit timber sale proceeds to be used for reforestation, site preparation, release, road building and stabilization and other associated forest management practices, the State Forester appealed for a Code change. The 1980 General Assembly enacted Section 10-45.1 to 10-45.4 which transferred forestland management to the Division of Forestry, established an escrow account (Forest Management of State-owned Lands Fund) and gave the Division responsibility for negotiating timber sales and follow-up forest silviculture. Joel Artman, Assistant Chief of Insect and Disease Investigations, has been in charge of this program since the JLARC study and is well pleased with the results.

Virginia State Fire Services Commission

The 1978 General Assembly enacted legislation that established the Virginia State Fire Services Commission. The Commission, aside from the full-time staff, has 10 Governor-appointed representatives from fire departments, associated industries, and fire associations plus four representatives from State agencies. The State Forester is one such State Agency Commissioner. The purpose of the Commission is to help develop a statewide fire incident reporting system; study the arson problem; provide technical assistance to communities in developing more effective fire protection; develop and recommend adoption of B.O.C.A. statewide; suggest legislation; assist volunteer fire departments find sources of funding; develop personnel standards for fire fighters, officers, drivers, etc., and other programs to assist with improved fire protection in Virginia. The Division had long advocated a second-home development protection program. The Commission was so informed and set up a committee to study the problem. Legislation enacted by the 1981 General Assembly transferred the Fire Services Training from the Department of Education to the Fire Services Commission. Affiliation with this new Commission has helped others to better understand the Division's responsibilities and goals in forest fire prevention and suppression.

Use-value Taxation

Use-value taxation (Code of Virginia 58-769.4) enabling legislation was enacted by the 1971 session of the General Assembly. This law permits the land portion of the qualifying real estate to be valued and taxed in accordance with the class of use for which it has qualified rather than being taxed at its fair market value. The Constitution of the

Commonwealth states that all real estate shall be assessed at fair market value. However, the Constitution also grants the General Assembly power to authorize use-value taxation for agricultural, horticultural, forest or open space uses. To qualify, the local governing bodies must first approve the law and, following this, landowners must apply for the reclassification of their property. Standards for the forest real estate were developed by the Division. As of the spring of 1981, 69 legal jurisdictions had adopted use-value taxation.

Agricultural and Forestal Districts

The 1977 General Assembly passed the Agricultural and Forestal Districts Act (Chapter 36; 15.1-1506). This Act makes farm and forestland eligible for use-value assessment and taxation even if a local ordinance land use plan has not been adopted. A District must consist of a minimum of 500 acres and be initiated by the landowners of at least 50 percent of the included land. Forestal Districts permit a tax break similar to that given to landowners in counties/cities having adopted the use-value taxation law. Both of these laws were drafted and passed to provide financial incentives, through reduced taxation, to landowners to encourage them to retain their real estate in agriculture, forest or open space.

As of April 1981, 48 agricultural and forestal districts totaling 187,126 acres had been approved in 18 counties.

Fire Management

To provide better law enforcement training for the field forces, arrangements were made with the Department of State Police to provide an intensive one-week course at the Police Academy near Richmond. The program, begun in 1977, has provided training to chief wardens, technicians and certain assistant district foresters and foresters. The training has been well received by the students and, budget permitting, this will be held annually.

Deputy State Forester Bartholomew, while he was Branch Chief for Fire Management, was given the coveted Fire Management Award. The award is presented annually to only one person in the nation. The Division shared in Bartholomew's pride in being the recipient for 1975.

Various methods of training fire fighters have been used over the years, but none has been more effective than the Forest Fire Simulator. In the 1960s, Virginia joined the Northeastern states in helping design and acquire a portable simulator that was shared with 13 other states. Eventually, a new portable unit was fabricated and such was purchased by the Division. Time consuming set-up was a problem, so in the summer of 1975 a used semi-trailer was reworked to accommodate the simulator. Creature comforts such as air conditioning, heat and other amenities were installed. The unit can be set up in several hours and classes started. It is used for training Division personnel and has been extremely useful in training fire departments and other fire control cooperators.

For many years the Division and local fire departments worked closely both in training and fire suppression. In 1973 the Division

and the Department of Education - Fire Services Training held a two-day weekend forest fire training credit course for firemen. One hundred seventy-five firemen from all corners of the state attended. Division personnel served as instructors. Since 1973 the course has been repeated four times with excellent attendance.

The state enjoyed a reasonably good fire record following a bad experience in 1963.

The Record

	1973	1974	1975	1976	1977	1978	1979	1980
No. Fires	914	1,501	1,067	2,479	1,811	1,404	1,046	1,150
Acres Burned	3,291	7,388	3,729	11,741	9,455	8,826	3,743	5,037
Average Size	4.0	4.9	3.5	4.7	5.2	6.3	3.6	4.4

The severe drought beginning in the summer of 1980 and continuing through the spring of 1981 set the stage for high fire occurrence and sizeable loss of acreage. Quick response, an aware public and luck worked together to hold the fire record to a respectable figure.

Spring 1981

No. Fires	Acres	Average Size
1,689	12,092	7.2

The Division had long wanted to try helicopter/water bucket equipment for fire suppression. Through the generous contribution of The Chesapeake Corporation of Virginia, a bucket was purchased and given to the Division. Arrangements were made with a company in West Point, Virginia to provide helicopter service. Training was held and the water bucket was successfully used several times. The Division purchased one bucket in 1979 and three in 1981 and contracted with the Army National Guard to provide water drops in a 50-mile radius of Richmond. In 1978 and continued each year, arrangements were made with the U. S. Forest Service to hire their contract units for suppression work in Districts 5 and 6. An agreement was made with a private operator in Nelson County who had helicopter/water bucket capability. Even though the Division was unable to use the helicopter units to any great extent, enough experience was gained to prove they are a very useful tool.

Although the Division had used fixed wing aircraft for many years for detection and reconnoitering large fires, it was not until the spring of 1979 that regular detection flights were scheduled. The first flight pattern began at Charlottesville, went south to Lynchburg, east

to Chesterfield County, north to Fredericksburg, west to Warrenton and south to Charlottesville. The Charlottesville District was given the aerial detection responsibility. The following year the Portsmouth District was given aerial detection capability. Their flight pattern covered the Portsmouth and Waverly Districts. The western districts had enjoyed aerial coverage from U. S. Forest Service flights for several years prior to the Division's initiation of such a program.

The major portion of the Great Dismal Swamp, traditionally a serious fire problem, was given to the Nature Conservancy by the Union Camp Corporation in 1973. The Nature Conservancy in turn deeded the Swamp to the Department of Interior, Fish and Wildlife Service. The question then arose as to who would be responsible for fire control. The Division offered to contract fire suppression but Fish and Wildlife did not approve the terms. As of the summer of 1981, the Fish and Wildlife Service will continue to provide their own fire control capability for the Swamp.

Forest Management

The demand for assistance to forest landowners continued to increase. The involvement in site preparation for reforestation placed a heavy work load on the field units. The Division was directly involved, through the three-year period 1977-1980, with the following site preparation work:

SITE PREPARATION METHODS ON NIPFL.
(All data in Acres)

Year	Burn Only	Chop Burn	Spray Burn	Doze	Disc Chop	Spray	Other	Total
1978	10,231	6,678	880	6,678	1,295	335	724	26,821
1979	9,336	7,995	534	6,543	1,418	158	396	26,380
1980	12,845	15,414	74	9,355	2,150	163	560	40,561

Problems arose, depending on the economy, in locating contract crews to handle site preparation and planting. A part of the problem was solved when the A.A.A. (Arkansas Adventists Association) moved into Virginia. These tree planting crews could hand plant three to five thousand seedlings per person per day and often placed 30 to 40 people on one job.

Because of the difficulty coordinating aerial herbicide spraying for site preparation and release, the State Forester approved a contract system that was unique for the Division and perhaps many other states. The contract system proved effective for the one year it was used. The Environmental Protection Agency banned the use of 2,4,5-T which temporarily stopped the Division's aerial spray program in the spring of 1979. The Applied Research Branch had been evaluating other approved and some unlabeled herbicides for forestry use. The tests indicated that Roundup was reasonably effective. In the spring of 1981 the Division once again entered into an aerial spraying contract program. The contract concept provides better control of the spraying program with the Division handling evaluation of the effectiveness of the treatment and the fiscal work involved.

The Division's involvement in wood energy was partially supported by the Department of Emergency Services and Energy. To help acquaint the public, especially wood stove dealers and safety inspectors, a series of conferences were held throughout the state. The coordinator was Jim Garner and the conference "teacher" was Jay Shelton, the author of the wood stove bible, "The Wood Burner's Encyclopedia." The first series of conferences was held in the fall of 1979. These were so successful that a second series was held in the fall of 1980. The major thrust of the meetings had to do with wood stove safety but this also gave the Division an opportunity to explain fuelwood, forest management and marketing.

Buildings and Land

New office buildings were erected on the Appomattox/Buckingham State Forest in 1972 and the Pocahontas in 1978. A tremendous amount of improvement work was done at the Waverly, Farmville, Abingdon, Portsmouth and Tappahannock District offices as well as the New Kent office. Also, because of greatly increased cost of fuel, all District, County, Forestry Center, State Forest and Headquarters offices were equipped with storm windows, additional insulation and heating changes. This proved to be a cost-effective effort.

Of special interest was the construction of a solar cone-drying building during 1980 at the New Kent Forestry Center. The unit was put into operation to eliminate the consumption of more than a gallon of fuel oil per bushel of cones dried. Although a limited number of cones were dried, it was apparent that the basic concept was practical. Changes will be made during the summer of 1981 and the new building will be expanded to accommodate increased production. Special trays were designed and built to expedite the handling of cones. Solar panels were installed at the Augusta Center to assist with the drying of seed. This, too, saved energy costs and was effective.

Recognizing the value of and need for tree seedling cold storage units, the Division now has field storage capability at Waverly, Charlottesville, Salem, Abingdon and Tappahannock District offices and at the Pittsylvania County Office.

The genetically improved tree program began in 1959 with the selection of superior trees, and the development of seed orchards is still a high priority project. The large orchard at New Kent suffers from frost damage to the loblolly pine flowers. Because of the uncertainty of the production, studies were made of other Virginia locations for an orchard but none were found suitable. Everything pointed to an orchard location farther south. A twist of events provided an opportunity to consider a land purchase adjacent to the Baldwin State Forest in Georgia. State Foresters Wally Custard and Ray Shirley of Georgia reached an agreement whereby Georgia would manage the Virginia seed orchard on a direct cost basis. Virginia agreed to grow and grade white pine seedlings at cost for the State of Georgia.

The land, 120 acres, was purchased in January, 1980. Immediately, the Georgia Forestry Commission began shaping the area, built roads and set out trees grafted with Virginia's improved scions. Virginia's Georgia orchard is under the direct supervision of the Branch of Applied Research. This out-of-state ownership and operational agreement is undoubtedly a unique and unprecedented move by a state forestry agency.

Tree Nurseries

Although few major changes occurred at New Kent and Augusta, there are several items of interest to report. The annual demand for white pine increased from four to seven million 2-0 seedlings. Part of the increased demand came from mounting interest in Christmas tree growing.

During the early and mid-1970s, federal and state spoil bank legislation required the planting of tree species for soil stabilization. Black locust was the recommended species. The Division produced four to five million locust to meet the demand. In the late 1970s seedling demand dwindled. Other types of ground cover were in vogue. As of 1981, it appears that tree planting will once again capture the mine spoil stabilization market.

The New Kent nursery was established to produce 35 to 40 million seedlings. Demand for trees forced production to 55 to 60 million. Good land management practices, labor supply and other factors necessitate reducing production. Before this can be done, a third nursery must be established. A search is underway for a new facility to be located in the southern section of the state.

Although seedling prices have increased because of inflation, innovative production and handling practices have helped to offset cost of production. This has permitted the Division to hold down the sale price of seedlings but still recover production costs.

Forest Survey

The forest survey of 1966 revealed a serious deficit in pine growing stock in the Piedmont and Coastal Plain. Virginia was cutting 15 percent more pine than was being grown. This triggered a move to remedy the problem. It was decided, after much deliberation by the Division, forest industry, forest land and others that financial incentives were the best of many possible routes considered. The decision led to the enactment of the Reforestation of Timberlands Act in 1970.

The forest survey of 1977 indicated that the R.T. and other pine planting incentive programs had a desirable effect. However, additional studies questioned the growth/drain ratio and some doubt began to surface. The State Forester contacted forest industry, forestry associations and other agricultural and forest school leadership to more carefully evaluate the status of the pine resource.

In June 1980, the State Forester recommended that an interim survey be conducted for pine only. The U. S. Forest Service Southeastern Research Station agreed to handle the survey if money for their involvement could be provided and the field work could be done by the Division or others. The State Forester then approached the large paper companies and they offered the necessary survey crews, and the Lumber Manufacturers Association of Virginia said they would raise \$20,000 to reimburse the Asheville Station for their work. The remarkable thing about this special project was the speed with which it fell into place and the cooperative spirit of all involved to see it through. District Forester Gene Augsburger was assigned the task of coordinating the field effort that was completed in three months. The S.E.F.E.S. released a report in March 1981.

An analysis of the interim survey showed a serious annual loss of forestland and a critical need to increase pine reforestation. An increase in pine reforestation would place a strain on the New Kent Nursery capability. This triggered a search for a third nursery site. As of the summer of 1981, 24 prospective areas had been evaluated. An advisory committee will screen out the three best sites for consideration.

State Forests

The gated road/walk-in program developed for many of the State Forest trails has been effective. Ample vehicle parking space was provided at the trail entrances and the hunters, hikers and other forest users were required to stretch their leg muscles. By reducing vehicle traffic, road maintenance was held to a minimum. The trails were graded, limed, fertilized and seeded with wheat, fescue, and lespedeza. This treatment not only helped meet water quality standards but also provided wildlife habitat.

The sale of fuel wood, especially on the Pocahontas State Forest, assisted in the cleanup operations, helped with T.S.I. projects and was a moneymaker. Those working directly with the sales program have stories to tell that are very entertaining and almost unbelievable. Some fuel wood cutters loaded little pickups until they literally broke down and had to be towed away. Others had the chains in their saws backwards and worked hours to cut through an eight-inch stick of wood. Some dropped trees across their vehicles and others endangered the lives of anyone within 100 yards.

To help expedite the handling of seedlings, grading and cold storage capability was installed at the Cumberland State Forest complex. Several factors lead to this move. One was the availability of a dependable labor source in the Cumberland area and the other was the central location to help reduce mileage during distribution.

The Seed Orchard located adjacent to the Appomattox/Buckingham State Forest headquarters was increased from approximately 50 to over 100 acres. This is a loblolly orchard with only 12 acres devoted to Virginia pine.

Although the State Forest system does not operate a sawmill, it does run a planing mill, post peeler and treating plant. During 1980-81, a shed was constructed for storing dressed lumber, the rough lumber drying yard was reworked and the pole and post storage area improved.

The State Forests have always given a high priority to applied research. Not only is the Division's research efforts an on-going program on the forests but there is added emphasis in research from Virginia Tech. The Lesesne State Forest, given to the Commonwealth by the Valks, continues to be a "testing" area for radiated and hybrid chestnut as well as those American chestnut trees that appear to be resistant to the blight.

The State Forests have, since the beginning, been a self-supporting enterprise. Even though more and more emphasis is being given to non-paying programs such as hiking trails, stream improvements, wildlife habitat improvements, natural areas and other environmental amenities, the State Forests pay their own way. Nearly a hundred thousand dollars is paid to the County Treasuries in lieu of property taxes annually. All operating revenues are generated from timber sales and are not dependent on General Fund revenues.

Radio Communications

The Division has continued to "enjoy" having one of the best radio communication networks in the state. In the early 1970s, the Division embarked on a 12-year replacement schedule. The move reduced maintenance costs tremendously and increased dependability. Improvements in the system included the relocation and addition of repeater stations to eliminate blind spots and the purchase of multiple channel mobile units for Headquarters personnel.

Perhaps the most welcomed addition to the radio system was the purchase of hand-carried units for Chief Forest Wardens, foresters and technicians. The use of aircraft for fire detection and helicopters for suppression necessitated radio capability. Multifrequency radio units were purchased and put to good use in the aircraft.

Of Special Interest

A state without a forest or pine queen--that was Virginia's status until District Forester Crockett Morris appointed Gayle Crumpler, Waverly District Secretary, as an official Pine Queen for the 1979 Pine, Peanut and Pork Festival held at Chippokes State

Park. Gayle wore a Pine Queen sash and was crowned during the first morning of the Festival. She reigned until the following year, 1980, when the Wakefield Junior Women's Club decided to have a Pine Queen Pageant. Nine attractive young ladies entered the contest and the winner was Mrs. Diane Wheeler of Waverly. To capitalize on the opportunity to promote forestry, Mrs. Wheeler appeared at the Pine, Peanut and Pork Festival, the Buckingham County Forest Festival, the State Fair, and the Virginia Forestry Association's Annual meeting and other festivities. The sponsoring Club was given recognition for their efforts by the Virginia Chapter of the Soil Conservation Society of America.

Virginia was the first state to receive the coveted Golden Smokey. The day of this momentous occasion was April 20, 1977 and the place was the Annual Cooperative Forest Fire Prevention meeting in Washington, DC. The State Forester accepted the trophy on behalf of the Division.

While thinking of Smokey, it was a sad day when the first living symbol and his good wife Goldie retired in May 1975 from their quarters in the Washington Zoo. Little Smokey, an adopted cub, had been in training at the zoo and was capable of taking over old Smokey's role. The living symbol lives on.

When several thousand people converge on a fifty-acre tract of woods with picks, axes, snow shovels and saws--that's news. The event, in the fall of 1973 occurred at the edge of Richmond and was cosponsored by the Division and the Henrico County Junior Women's Club. It was called a "dig-in." The folks in the Richmond District had learned of similar programs in other states so decided to try it in Virginia. The basic idea was to permit the public to remove any and all plant material from areas that were to be developed for highways, shopping centers, housing, water impoundments, etc. Possible interested sponsors were contacted, a date was set, publicity was given the project and ample help (police, volunteers, Division people, Scouts and others) were recruited. Such was done for the Henrico Dig-in but no one suspected what would happen. Small trees and shrubs were literally torn from the ground. People tied their treasures on car tops without so much as a bag over the bare roots. The weather was dry, hot and windy. The conclusion was, "that the guests appeared to enjoy the outing." If any transplants lived, it was a miracle. However, the plants would not have survived the dozer anyway. Several dig-ins were held later with the same results--the public enjoyed the outing.

On March 20, 1978, Mr. Fred Walker was appointed Director of our Department of Conservation and Economic Development. Fred replaced Marvin Sutherland who had been Director for many years prior to his retirement. Fred had been a member of the Board for eight years and was knowledgeable of this Department's role in State Government.

Personnel

The current organization as of July 1, 1981 was as follows:

State Forester	Wallace F. Custard
Deputy State Forester	Ralph J. Bartholomew
Administrative Officer	John B. Heltzel
Superintendent of Buildings & Grounds	E. R. Shelton
Supervisor Automotive Maintenance	E. L. Collins
Communications Officer	J. A. Copony
Chief, Fire Management	C. M. Pennock, Jr.
Assistant Chief, fire Management	Maynard Stoddard, IV
Chief, Forest Management	J. N. Graff
Assistant Chief, Forest Management	J. W. Garner
Supervisor, Forest Products	E. D. Frame
Assistant Supv., Forest Products	P. T. Grimm
Supervisor Watershed Forestry	C. J. Witter
Forest Resource Coordinator	W. C. Stanley
Chief, Forestry Relations	E. E. Rodger
Illustrator	Leo Napoleon
Exhibit Shop Foreman	E. L. Morris
Chief, Insect & Disease Investigations	C. L. Morris
Assistant Chief, I & D Investigations	J. D. Artman
Entomologist	T. C. Tigner
Chief, Applied Research & Reforestation	T. A. Dierauf
Assistant Chief, Applied Research & Ref.	H. L. Olinger
Chief Fiscal Officer	D. W. Stoner
State Forest Superintendent	J. E. Bowen
Forestry Centers:	
New Kent Superintendent	G. W. King
Augusta Superintendent	W. L. McBee
Districts:	
Waverly District Forester	C. C. Morris, Jr.
Assistant District Foresters	W. A. Tyler, Jr.
	T. E. Yancey
Richmond District Forester	G. W. Augsburger
Assistant District Foresters	W. F. Davis
	E. D. Rountree
Charlottesville District Forester	D. G. Wilfong, Jr.
Assistant District Foresters	B. W. Edson
	J. M. Shavis
Farmville District Forester	J. E. Cook
Assistant District Foresters	G. H. Winston
	J. D. Starr
Salem District Forester	A. L. Jolly
Assistant District Foresters	M. T. Griffin
	D. T. Morton
Abingdon District Forester	Eugene Ohlson
Assistant District Foresters	H. D. Hannah
	J. R. Parris

Personnel (contd.)

Staunton District Forester	T. R. Elliott
Assistant District Foresters	J. W. Hodge, Jr.
	J. A. G. Rasmussen
Portsmouth District Forester	R. H. Woodling
Chief, Forest Management	F. E. Burchinal, III
Chief, Fire Management	W. L. Pierce
Tappahannock District Forester	R. B. Geddes
Assistant District Foresters	S. W. Rhines
	S. M. Jones

Employees - Past and Present

(Currently Employed in Upper Case Type)

I. FORESTERS

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Adams, Peter D.	11/16/64	9/16/65
Agens, Kenneth L.	1/ 1/67	6/30/70
Ambrose, Gary F.	10/16/78	11/22/78
ANDERSON, DENNIS W.	1/ 1/78	
App, Leon E.	4/16/66	12/31/77
ARTMAN, JOEL D.	2/16/62	
AUGSBURGER, GENE W.	6/16/55	
Bailey, Samuel W.	2/ 1/74	9/15/78
Ball, William R.	4/ 1/61	10/ 6/61
BARKLEY, SAMUEL R.	8/16/75	
Barrett, Harold J.	6/21/66	2/15/67
BARTHOLOMEW, RALPH J.	7/ 1/46	
BASHORE, HENRY W.	7/ 1/46	
BAXLEY, JAMES M.	7/ 1/66	
Benavitch, David W.	1/16/74	7/25/74
Bishop, Donald D.	7/ 1/57	6/30/72
BLAIN, GEORGE I.	4/ 1/67	
BLOUNT, D. TYLER	7/ 1/78	
Boone, Corbett L.	2/16/45	1/31/76
BOWEN, JAMES E.	6/24/68	
Bower, Michael T.	7/ 1/78	1/12/79
BOWMAN, WAYNE F.	9/16/75	
BOYER, CLARK A.	8/16/77	
Boyette, Allen C.	10/16/62	10/ 2/64
BRADSHAW, GARY M.	11/16/78	
BRAFORD, WILLIAM L.	1/16/73	
Brierley, Robert P.	11/ 9/42	6/30/73
BROOKS, M. THOMAS	7/ 1/56	
BROYLES, HUBERT H.	7/ 1/51	
Burby, Edward R.	5/16/69	2/28/70
BURCHINAL, FRANK E., III	3/ 1/69	
BURRELL, SCOTT F.	4/ 1/80	
BUTLER, RICKY A.	4/ 1/79	
Byerly, John A.	9/ 1/71	12/ 1/73
Cabell, Lawrence E.	1/26/59	11/22/74
Calhoun, Donald P.	6/10/63	11/15/65
Campbell, Wilson S.	6/ 1/47	12/31/79
CARROLL, JOHN M.	5/ 1/78	
Carter, Alex R., Jr.	2/16/69	8/31/73
Chandler, Woodrow B.	9/16/78	5/ 6/79
Chase, Charles W.	7/ 1/61	4/15/69
CLARK, JAMES C.	2/16/70	
Clarke, William E.	1/16/51	12/31/78
COBURN, WARREN E.	6/ 1/79	
COCHRAN, LARRY J.	12/ 1/79	
COOK, JAMES E.	6/ 1/67	
Conover, Gary R.	12/16/70	6/15/77

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
COPONY, JAMES A.	2/ 1/70	
Cross, William J.	2/16/57	3/15/69
CROWELL, GERALD R.	7/ 1/74	
Czelusta, Lawrence S.	6/16/79	3/ 2/81
DAVIS, WILLIAM F.	8/16/67	
Dickerson, M. Teresa	1/16/79	5/31/79
DIERAUF, THOMAS A.	2/ 1/57	
Dill, Robert E.	10/ 1/59	3/31/70
Dinsmore, Clifford C.	9/16/67	2/29/68
Divis, Wayne G.	7/ 1/65	6/30/69
DRAKE, DONALD G.	10/ 1/59	
Duncan, Ray F.	12/16/47	2/28/67
DUNN, LAWRENCE M.	8/ 1/75	
DUNN, ROBERT L.	10/ 1/48	
EBBERT, JAMES N.	1/16/71	
Eckenrode, Leonard C.	10/16/64	12/31/65
EDSON, BRIAN W.	10/26/64	
EDWARDS, LAWRENCE C.	7/ 1/61	3/15/66
	4/ 1/67	
ELLIOTT, THOMAS R.	3/16/46	
Fisher, Neal R.	6/ 1/73	8/25/78
FOLK, RICHARD L.	6/16/70	7/24/81
Foley, William P.	3/ 1/57	5/31/71
FORD, WESLEY, J.	7/ 1/75	
FRAME, ELVIN D.	7/16/61	2/28/66
	5/ 1/67	
Frazier, Douglas H.	7/ 1/56	9/15/69
Freeman, Harold B.	7/ 1/61	1/31/64
Frizzell, Bruce C.	7/ 1/71	12/ 1/77
Gabbert, C. LEROY	3/ 1/57	7/22/77
GARDNER, JOSEPH D.	6/10/63	4/30/66
	1/ 1/67	
GARNER, JAMES W., JR.	6/16/58	
GARRISON, CARL E., III	12/16/80	
Garth, Hunter H.	10/22/34	4/24/64
GEDDES, ROLAND B.	1/ 1/49	
GEYER, PAUL B.	3/24/80	
GRAFF, JOHN N.	3/ 1/49	
GRIFFIN, MICHAEL T.	7/16/62	
GRIMM, PHIL T.	11/ 5/69	
GUERRANT, WILLIAM H.	2/16/57	
HAAG, WILLIAM G.	2/16/49	
Handorf, Howard F.	9/ 1/61	8/31/67
Hamlet, Ivan B.	6/16/64	2/15/66
HANNAH, HAROLD D.	9/16/59	
Hauck, Will R.	7/16/67	4/16/69
Hayes, Edward M.	2/16/78	3/22/79
Hayes, Joseph C.	11/ 1/39	10/31/68
HELTZEL, JOHN B.	7/ 1/42	
Heverling, Donald C., Jr.	1/16/70	11/15/71
Henley, Robert J.	7/ 1/62	9/ 9/63
Herrala, H. Theodore Jr.	8/16/71	2/28/78
Herrala, James W.	7/ 1/75	7/15/78
Hinkle, James C., Jr.	12/ 1/48	1/11/71
Hitke, Kurt M.	5/16/79	10/19/79

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Hobart, Seth G.	4/ 1/26	6/ 8/62
HODGE, JAMES W., JR.	1/ 1/52	
Hodge, Robert F.	7/ 1/52	12/31/63
Hubble, William A., Jr.	6/16/51	4/15/66
Hundley, Allen C.	9/16/75	6/ 3/77
Hunter, Thomas G.	8/16/60	9/30/66
Jackson, John V.	6/16/52	3/31/74
	12/16/74	9/30/77
Jeffries, Kenneth F.	2/ 7/61	4/ 8/65
JENKINS, RONALD S.	7/ 1/77	
JOLLY, ARTHUR L., JR.	7/22/46	
JONES, SIDNEY M.	12/ 1/57	
Jones, Thomas E.	2/15/52	2/28/79
Kappes, Karl E.	4/ 1/51	8/31/76
Kick, John G.	9/16/61	9/15/72
KEENON, RODNEY W.	2/16/68	
KENNEDY, ROBERT C.	8/ 1/69	
Kidd, William E., Jr.	6/16/57	3/15/63
KIDWELL, FRANKLIN D.	7/ 1/52	
Kincaid, James E.	8/ 1/66	6/30/71
KING, G. WILLIAM	7/ 1/48	
Kirchner, Ralph F.	3/ 1/70	9/15/71
KLINE, EVERETTE L., JR.	2/ 1/80	
Knox, Kenneth A.	4/ 1/61	1/31/64
Kroh, Edward L.	6/18/65	11/15/69
Kubisiak, Bernard G., Jr.	7/ 1/71	8/15/73
Lantz, Clark W.	8/16/60	12/31/65
LAYMAN, LARRY W.	6/16/73	
LEHNEN, JOSEPH L.	6/ 1/79	
Lewis, Ralph A.	8/16/62	8/31/67
Litten, Chester D., Jr.	1/16/58	2/29/72
Little, Norman G.	10/ 1/65	8/31/66
Long, Eugene D.	12/ 1/71	4/30/75
Louis, Frederick W.	12/ 1/57	10/ 9/64
Lueke, Stephen S.	1/ 1/68	9/15/73
Mague, Timothy J.	12/ 1/78	1/19/79
MALLETTE, STEPHEN D.	5/ 1/78	
MALONE, DANA G.	6/ 8/70	
Marler, Raymond L.	7/ 1/48	2/28/70
May, Robert L.	6/16/51	8/15/71
MAY, THOMAS D.	3/ 1/66	
McBEE, WAYNE L.	12/ 1/59	
McDANIEL, WILLIAM R.	7/ 1/64	
McDonald, Thomas J.	7/ 1/78	10/31/80
McNeel, Victor E.	6/16/63	10/31/64
Medley, David R.	8/ 1/69	8/15/74
Mengel, Robert L.	7/ 1/67	4/30/79
Mihalic, Gregory F.	9/16/61	10/31/69
MIKKELSON, LAWRENCE W.	7/ 1/78	
MILLS, DEBORAH L.	7/ 5/78	
Moore, Allen B.	6/16/64	8/31/67
MORRIS, C. CROCKETT, JR.	8/ 1/52	8/31/53
	6/16/57	
MORRIS, CALEB L.	6/ 6/55	
MORRIS, MILTON A.	9/16/48	8/31/50
	10/16/56	

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
MORTON, DON T.	9/ 1/58	
Moser, Thomas E., II	2/ 1/70	10/31/78
MUNDEN, PAUL N.	3/ 1/77	
Mueller, Richard A.	7/ 1/67	5/15/68
Myers, James P.	8/ 1/66	2/15/67
NEWMAN, WALLACE S., JR.	4/16/77	
NEWTON, JEFFREY D.	6/16/81	
Nicely, Philip D.	5/ 1/56	4/30/63
Niswonger, Bill E.	5/ 1/66	11/11/69
Nopper, William R.	5/16/67	3/18/68
O'Hare, James T.	3/ 1/61	5/31/75
OHLSON, EUGENE	7/ 1/48	
OLINGER, HAROLD L.	6/16/55	
O'Neal, William S., III	7/ 1/65	8/31/78
Osborn, Earnest B.	9/16/77	4/30/78
Paisley, William M., Jr.	6/ 1/69	6/15/77
Parker, William H., Jr.	6/16/58	7/15/61
PARRIS, J. RANDALL	9/ 8/65	
Peery, George W.	1/16/51	8/12/69
PEMBERTON, SUSAN L.	6/ 1/81	
PENCE, J. STEPHEN	8/16/77	
PENNOCK, CALEB M., JR.	2/16/48	
Peregoy, Kenneth I., Jr.	5/ 1/71	9/23/73
PIERCE, WILLIAM L.	1/16/50	
Pinnick, Warren D.	9/ 2/66	6/30/74
Poe, David J.	7/ 1/65	2/25/66
POIROT, MATTHEW M.	10/ 1/78	
Price, Cleveland M., Jr.	4/ 7/58	8/ 3/62
PUFFENBERGER, JANA	10/ 1/80	
Rago, Kenneth L.	7/ 1/78	8/ 4/78
Rapp, Richard M.	6/16/66	8/31/78
RASMUSSEN, JOHN A. G.	10/16/48	
Reverley, John G., III	10/16/64	4/23/65
RHINES, STANLEY W.	7/ 1/55	
Richardson, Herbert W.	7/ 1/75	2/ 4/77
RIFE, JO D.	7/ 1/80	
Rilee, William H.	9/ 1/66	3/15/67
Roberts, Bruce E.	6/ 1/75	10/31/80
ROBERTS, WOODRIDGE R.	8/ 1/64	
RODGER, EDWIN E.	11/ 1/46	
Rodgers, Charlene A.	4/16/78	7/15/80
Roller, William O.	7/ 1/61	6/15/66
Rose, Patrick C.	7/ 1/60	3/15/63
ROUNTREE, EDWARD D.	10/16/63	
RUBY, C. ERIC	2/16/79	
RUBY, WILLIAM R.	3/ 1/71	
SAUNDERS, WILLIAM L.	12/ 1/67	
Schafer, Pamela A.	8/16/79	6/15/80
SCHEURENBRAND, HOWARD, J. JR.	3/16/64	
Schollaert, William J.	6/16/70	8/13/71
Schroeder, William J.	7/1/56 & 2/28/61	3/10/59 & 2/28/66
Scott, John C.	1/ 1/63	2/15/66
Serian, Steven A.	2/ 1/78	1/31/79

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Wert, Philip L.	6/12/67	2/18/72
Weston, Cheryl L.	7/ 1/77	5/15/79
Weissert, David W.	6/16/69	10 /1/70
Wiblin, Michael D.	8/ 1/68	11/30/69
WILFONG, DALLAS G., JR.	2/ 1/47	
Williamson, Gerald D.	5/16/71	12/15/72
WILSON, ALVIN D.	1/ 1/49	
Wilson, Stephen L.	10/16/77	9/ 8/78
WINSTON, GREGORY H.	6/ 1/68	2/1/74
	7/30/71	
WITTER, CHARLES J.	6/ 5/44	
Wolf, Noel E.	7/ 1/67	8/30/68
Wolf, Wilbur E., Jr.	3/16/64	11/15/65
Wood, Thomas B.	12/16/58	3/31/64
WOOD, JULS R.	1/16/79	
Wood, Lyttelton W., II	9/ 1/74	6/30/81
WOODLING, RICHARD H.	3/ 1/49	
WOODSON, LEORY D.	8/16/56	
Woodyard, Robert W.	10/ 1/69	5/30/70
Wright, Jim T.	4/ 1/67	9/30/69
WYMAN, CANDACE D.	2/16/79	
Yagle, William R.	5/ 1/63	2/15/66
YANCEY, DON J.	3/ 1/79	
YANCEY, THOMAS E.	1/ 1/49	
Younkin, Gary A.	7/ 1/71	12/31/78
Zazworsky, Emil W.	2/ 1/55	5/15/80

II. CHIEF FOREST WARDENS

ADAMS, ARTHUR S.	5/ 1/58	
Allen, Robert S.	2/ 1/65	2/25/68
Allio, Frank	7/ 1/53	7/ 1/65
Anderson, Herman L.	3/16/55	3/23/69
APPERSON, WILLIAM L.	10/16/64	
ATKINS, EARL N.	11/ 1/66	
BAILEY, JERRY W.	8/ 1/71	
BAKER, J. MACK	2/ 1/57	
Baker, Mark P.	8/ 1/71	8/31/72
Balderson, James N.	10/16/64	12/15/64
BARTLETT, ROBERT E.	9/16/78	
Bird, Glen R.	8/ 1/75	6/23/77
Birdsong, Percie T.	7/24/43	2/19/44
	9/ 1/58	9/14/68
BLACKWELL, JAMES H., III	6/ 1/79	
Blevins, Frederick M.	6/16/79	7/15/80
Bockrath, Robert G.	7/16/65	12/16/66
Bolen, Gary D.	10/16/73	4/18/74
BOOTH, WAYNE G.	11/16/67	
Boston, Hollis, G.	8/16/61	5/24/71
Bradshaw, Nathaniel H.	2/15/43	10/30/62
BRIGHT, JAMES W.	7/ 1/69	
Broaddus, John M.	7/ 1/57	12/31/62
Brooks, Grover E.	7/ 1/70	2/29/72
Boston, Timothy L.	11/16/75	3/31/78

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Brooks, Carl, Jr.	2/16/57	6/15/71
Brown, George E.	7/16/45	4/ 6/69
BRUCE, J. RILEY	7/16/77	
Bruso, Edward J.	10/16/69	1/30/70
BRYANT, DONALD J.	12/ 1/63	
Burton, William H.	7/16/59	11/30/66
BURLINGAME, T. FREDERICK, JR.	6/16/74	
Butler, Wilbur B.	7/16/66	7/31/73
Caldwell, F. Porter	8/16/61	3/ 1/70
CARLTON, WILLIAM B.	2/ 1/76	
Carnright, Marshall W.	2/16/72	6/15/73
CARTER, CHARLES J.	1/23/67	
Carter, Herbert K.	3/16/58	8/31/73
Carter, Julian H.	5/16/72	4/30/77
Carter, Kenneth H.	3/ 1/69	4/30/72
CARY, CHALRES L.	8/16/72	
CASSELL, SAMUEL H.	1/ 1/62	
Chafin, Shirley B.	9/ 1/61	10/31/70
Clark, Andrew J., Jr.	5/16/76	11/15/78
CLARK, RALPH K.	8/16/65	
Clarke, Robert E.	3/16/58	9/30/75
COFFELT, IVAN W.	4/ 1/62	
COMPHER, LANDON P.	1/ 1/63	
COX, ARTHUR G.	9/16/74	
CRAFT, ALAN D.	1/ 1/74	
CRAWFORD, RAYMOND B.	6/16/67	
Cullop, John D.	11/ 1/79	7/15/81
Currie, Horans L.	6/ 1/61	7/31/67
DALTON, BOBBIE B.	6/16/81	
Dalton, Carl B.	3/16/57	12/ 1/78
Dalton, Gary R.	1/ 1/80	4/30/81
Daniel, Earnest N.	7/ 1/74	1/17/75
Daugherty, Charlie C.	11/ 1/62	7/15/66
DAVIDSON, THOMAS E.	9/ 1/68	2/28/71
	9/16/77	
Davis, Donald M.	3/16/77	6/30/79
Davis, Howard F.	3/23/64	9/30/66
Davis, Melvin N., Jr.	8/16/63	9/15/64
DEAVER, PRESTON L.	1/16/78	
Dowdy, Otha C.	8/ 1/61	10/31/69
Driggs, Melvin L.	7/16/56	3/15/64
Dunford, Charles W.	7/16/56	7/15/72
DYE, FREDERICK L.	2/ 1/80	
EDWARDS, JAMES B.	11/16/75	
Eggborn, William H., III	10/ 1/61	7/15/63
Elkins, Claude E.	5/ 1/66	7/23/70
Emert, Johnny F.	1/ 1/70	9/ 3/78
EMBREY, EDWARD L.	1/ 1/72	
ENSOR, RANDY M.	6/ 1/78	
FALLIN, B. LESLIE	4/ 1/69	
FALLIN, JOHN D.	1/ 1/63	
Farmer, Harry W.	7/ 1/58	12/31/62
FAUBER, LARRY R.	7/16/79	

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Ferguson, Franklin L.	10/ 1/61	6/30/64
FLETCHER, WENDELL C.	12/16/73	
Forbes, Charles R.	5/15/66	12/31/73
Frances, Vernie W.	7/16/48	6/30/70
Frank, Edwin L., Jr.	1/ 1/75	2/15/81
Gouldin, Harvey S., Jr.	1/ 1/63	10/31/66
Gowin, Frank B.	2/ 1/45	1/ 1/67
GRAVLEY, RICHARD A.	2/16/73	
GREEAR, HAROLD R.	12/16/65	
Griffin, Douglas B.	4/16/60	11/15/74
GREENWOOD, LEWIS C., JR.	9/16/78	
Hale, Richard T.	1/16/50	4/30/65
HALL, WILLIAM B.	2/16/81	
Harrell, Milton E.	7/ 1/64	10/15/67
Hatcher, John W.	10/ 1/61	12/31/78
HELMS, RAYMOND S.	11/ 1/66	
HEPLER, THOMAS M., JR.	10/16/72	
Hill, James B., Jr.	9/16/61	6/30/74
Hoback, Arthur B.	10/16/47	4/15/68
Hodges, George D.	7/16/59	1/21/64
Hogge, John W.	4/16/67	9/ 9/73
Holmes, J. Luther	11/ 1/51	12/31/63
Hood, Eugene G.	3/16/58	3/15/62
Horner, Alden J.	9/16/45	12/31/62
Hostetter, Floyd E.	4/ 1/61	3/31/81
Hostetter, P. Raymond	7/16/53	7/ 1/66
Huffman, Ray W.	7/16/56	7/31/80
HUNTER, SARAH E.	9/ 1/80	
Hutcherson, Robert D., Sr.	4/ 1/62	12/31/64
HYLTON, VICTOR M.	10/ 1/66	
INGE, JOHN R.	6/ 1/71	
JENKINS, CLIFTON W.	7/ 1/70	
JERRELL, HAROLD L.	9/ 1/73	
Johnson, Raymond M.	11/ 1/62	6/30/70
Jones, Charles H.	1/11/71	6/ 9/72
Jones, Emmett G.	11/ 1/42	12/31/61
Justus, Ezra	3/ 1/76	8/16/77
Kellam, H. Cosby	6/16/67	10/15/76
Kemper, Joseph R.	7/ 1/57	6/30/75
Kidd, Henry C.	4/16/61	1/31/66
Kilmon, James B.	8/ 1/56	8/31/63
King, Lester	11/16/68	6/15/71
KLOPP, MARK M.	4/ 1/71	
Lane, Charles E.	9/16/70	1/31/72
Lane, John H., III	1/ 1/63	4/10/79
Loftis, Richard D.	7/16/71	7/23/74
Long, Orville, L.	7/16/59	
Maddox, George E.	4/ 1/61	1/14/66
Marshall, Charles L.	3/16/61	8/31/64
Marsh, Carl H., Jr.	11/ 1/72	8/31/75
Martin, Benjamin E.	7/ 1/56	4/19/72
Matney, Carl L.	1/ 1/69	2/15/71
McClanahan, James A.	3/16/79	7/ 9/81
McClanahan, Kyle E.	5/ 1/59	8/15/65
McDONALD, GEORGE B., JR.	11/ 1/74	

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
McDonald, William G.	7/16/58	3/31/62
Mettinger, Stanley N.	7/27/59	6/30/68
MILES, RICHARD H.	8/16/74	
MITCHELL, HORACE R.	7/ 1/71	
MOHLER, KENNETH W.	4/16/81	
Morgan, W. Berkley	7/ 1/55	6/30/74
Mooney, Edmund T.	4/ 1/76	2/28/79
MOYER, STEPHEN M.	8/ 1/80	
Mullins, Roger W.	6/16/72	1/31/76
Mullins, Roy	3/ 1/60	5/31/72
Nace, Phillip S.	8/16/50	8/ 6/64
Newman, Alfred H., Jr.	9/ 1/78	12/31/79
Nichols, Arthur L.	4/10/45	1/17/63
Norton, Charles E.	10/ 5/64	8/25/66
Osborne, Otis E.	8/16/57	12/31/65
Owen, Odell H.	8/ 1/50	5/19/63
Owens, Donald T.	12/ 1/67	9/30/68
PACE, T. KEM	3/16/77	
PARROTT, DONALD L.	3/16/74	
Parrott, N. Brightberry	8/16/61	12/31/73
Phillips, Jimmy J.	2/16/75	7/31/76
Porter, Billy R.	8/16/65	3/13/66
PRYOR, MARVIN F.	7/27/59	
Racey, John A.	9/1/61	7/ 1/66
Rackley, Elmer C.	3/ 1/75	9/29/78
Raddatz, Curtis E.	4/16/64	4/19/68
RAMMELL, CHARLES L.	4/ 1/78	
RAMSEY, ROSCOE W.	10/ 1/60	
Rea, George E.	2/ 1/64	7/15/66
Reding, Michael	7/16/77	9/15/78
RICE, EARLE O.	7/ 1/71	
Rinkle, William W.	7/ 1/63	10/20/65
Royston, William S.	9/ 1/61	9/30/72
RUSSELL, S. PARKER	4/ 1/72	
Sanders, Garrison H.	8/ 1/61	2/28/69
Scruggs, Walter J.	9/ 1/61	1/15/74
SELF, DANIEL W.	1/ 1/63	
SETTLE, ALBERT B.	9/ 1/63	
Shackelford, Richard E.	1/ 1/67	11/17/75
SHELLEY, STEVEN N.	10/16/78	
SHORT, PHILLIP B.	6/ 1/81	
SIBLEY, CARROLL C.	9/ 1/78	
Simms, Lasco	8/16/61	8/31/78
Slagle, Ralph W., Jr.	9/16/73	12/31/74
SMILEY, GUY H.	9/16/66	
Smith, Charles	1/ 1/63	9/ 5/63
SMITH, DAVID M.	7/ 1/58	
Smith, Frank R.	3/11/68	6/30/73
Smith, Glenn D.	3/16/61	3/31/61
Smith, Homer G., Jr.	9/16/56	5/31/68
Sowers, James L.	2/ 1/65	9/12/66
SPICKARD, PAUL J.	8/ 1/70	
SPIEGEL, ANDREW	5/ 1/78	
SPROUSE, RUSSELL D.	1/ 1/68	
Stallard, Thomas D.	12/ 1/76	4/ 4/81

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Stargardt, James D.	3/18/65	7/15/65
Stewart, Richard H.	3/16/51	3/18/52
SULLENBERGER, JOE	10/ 8/63	
Sutherland, Linden, Jr.	3/16/71	12/31/75
Tatum, Garland W.	11/ 4/59	7/15/65
Taylor, Samuel M.	10/16/66	2/ 2/77
Thomas, Julian D.	9/ 6/45	12/31/72
Thomas, Julian D., Jr.	1/16/73	11/22/74
TILLMAN, KENNETH B., JR.	7/16/74	
TIMBERLAKE, JAMES B.	1/ 1/79	
TUCK, ROBIE L.	12/ 1/76	8/15/77
	1/ 1/79	
Turner, Terry L.	1/16/72	6/15/78
Tyree, Austin C.	1/ 1/63	10/31/66
UPSHAW, E. PICKETT	7/ 1/74	
VAUGHAN, JOSEPH B.	7/16/49	
Walker, C. Ray, Jr.	10/ 1/73	4/15/76
WARF, LOUIS I.	3/ 1/70	
Watson, Willie M.	10/16/71	7/20/74
Webb, Claude A.	7/16/59	8/31/74
Wells, Floyd M.	9/ 1/74	8/ 1/78
WELLS, HENRY C.	7/20/59	
Whitehead, W. Withers	7/16/56	12/31/71
Williams, Charles L.	1/ 1/63	8/ 1/65
Williams, Doyle W.	8/16/72	6/ 8/79
WILLIAMSON, W. ALEXANDER	9/16/74	
WILLIS, LARRY R.	12/ 1/74	
WOMACK, CHARLES, III	1/ 1/63	
WOMACK, HENRY E.	9/16/68	
Wood, Douglas T.	1/ 1/79	12/31/80
Wydner, William H.	2/16/66	5/31/79
YOPP, CHARLIE M., JR.	11/ 1/70	

III. FORESTRY TECHNICIANS

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
BALDOCK, JOHN W.	6/ 1/54	
Barton, John W.	9/16/64	9/30/63
BRENNEN, TERRY H.	8/16/72	
BROWN, CLAYTON I.	8/ 1/68	
Carter, Chancellor O., Jr.	11/ 1/60	6/30/73
CEASE, EVERETT R.	12/ 1/58	
CLEATON, JOHN A., JR.	10/16/61	
Davis, Erville A.	4/ 1/72	6/30/78
Deeds, Daniel B.	7/ 1/71	6/30/73
DICKERSON, WILLIAM M., JR.	1/ 1/67	
DUKE, HERMAN B.	8/ 1/66	
FREY, ROBERT C.	6/16/74	
GARMAN, R. WAYNE	10/ 1/63	
GARMAN, RUSSELL J., JR.	7/ 1/56	

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
GASTON, DENNIS C.	7/ 1/81	
GUESS, JAMES H.	7/ 1/73	
Hankins, James M.	10/16/76	8/31/78
HANCOCK, HOWARD F.	1/ 1/63	
HART, WALTER T.	1/ 1/67	
HASS, WILLIAM S.	11/ 1/66	
HIKSON, DONALD L.	5/ 1/71	
Hefferman, Robert	7/ 1/70	8/28/70
Houseman, Frank E.	1/ 1/71	1/19/73
Hudson, Billy A.	10/ 1/68	8/ 3/70
Huskey, Carl N.	9/ 1/70	10/31/72
JARRATT, EDWARD C.	1/ 1/57	
JARRATT, JAMES B.	12/16/57	
JOHNSON, JOHN A., JR.	9/16/63	
JONES, HOWARD	5/16/55	
Jones, Joseph H.	2/16/75	11/15/78
KENNEDY, LESTER	2/ 1/62	
Kerns, George C.	8/ 1/65	3/15/72
Kinsch, Richard J.	8/ 1/79	8/10/79
Kiernan, Diane C.	1/ 1/80	5/31/81
KISER, HIRAM C., JR.	2/ 1/64	
Lambert, Christopher A.	7/ 1/71	8/31/76
Loving, James P.	9/16/70	3/31/72
Marquette, David W.	7/ 1/70	8/15/72
McCormick Kevin B.	10/ 1/76	11/30/79
MIDKIFF, HARRY C.	3/16/66	
Newberry, Norman K.	10/ 1/65	10/15/68
	4/ 1/69	4/ 1/77
NEWMAN, WILLIAM Mc.	7/ 1/57	
PASSAGALUPPI, WILLIAM T.	9/16/78	
PICKLE, HARMON E.	7/ 1/63	
Powell, Michael W.	7/ 1/70	12/ 4/70
REIER, PAUL M.	4/ 1/79	
RICKS, CALVIN E.	8/16/70	
RUMSEY, GENE E.	3/ 1/57	
SCHROCK, ALVIN M.	9/16/70	
SEVERT, JOHN I.	5/16/72	
SHIPP, BERNARD L.	11/ 1/64	
SMITH, EARL N.	7/16/65	
Southern, Leonard L.	8/ 1/74	8/27/76
STECH, EMIL P.	12/16/68	
Stoneburner, Paul D.	9/16/72	6/15/74
STRADER, W. WAYNE	1/ 1/66	
TAYLOR, CARTER H.	8/ 1/61	
TURNER, ROBERT L.	3/ 1/73	
Timberlake, J. Harold, Jr.	6/ 1/70	6/ 7/74
Tipton, Maurice E., Jr.	2/ 1/68	7/ 1/70
Turner, Daniel H., II	7/ 1/71	9/15/72
Waddell, William G.	7/ 1/71	11/30/73
Wadhera, Renu	4/ 1/74	9/15/75
WILBORN, TIM Mc.	3/ 1/65	
Wilcox, Dorson W.	11/16/50	1/12/51

IV. FORESTRY FOREMAN (Nurseries and State Forest)

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
ESTES, LARRY W.	4/16/71	
HARRIS, JOHN M.	11/ 1/69	
JONES, CHARLES W.	2/16/70	
Dennis, Vernon A.	6/ 1/76	2/28/77
Gentilini, Donald J.	8/16/74	3/26/76
Gray, Millard C.	5/16/68	4/20/70
Hoar, John O.	6/ 1/67	3/15/73
Malecheck, Bruce W.	2/16/70	2/15/73
SHOCKLEY, WILLIAM L.	4/ 1/77	

V. GRAPHIC ARTIST ILLUSTRATORS

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Arave, Calvin R.	12/ 1/63	4/ 4/77
Burruss, Lawrence R., Jr.	5/16/77	8/31/79
Gibbs, Jack	3/16/61	12/15/63
MORRIS, EDWARD L.	5/16/62	
NAPOLEAN, LEO	11/ 1/79	

VI. BUILDINGS AND GROUNDS MAINTENANCE

Adkins, Wiley S.	7/16/79	9/21/79
Angle, Dean A.	10/ 1/70	7/31/72
BANTON, RAYMOND E.	7/16/79	
Barbour, William G.	8/16/77	1/31/79
Beasley, Leonard E.*	3/16/46	1/31/77
Bickley, Floyd E., Sr.*	5/ 1/53	5/ 7/62
Blankenship, Junior	4/ 1/63	6/16/65
Boone, Joe A.	2/16/72	4/30/72
Boone, Roger L.*	4/ 1/71	3/15/73
BROWN, MARVIN W.*	2/ 1/64	
Burton, Elliott S.*	3/ 1/47	3/31/63
Carter, Carl W., Jr.	8/ 1/64	10/26/64
Covington, Martin B.	3/16/49	5/25/62
CROPP, W. GORDON	3/ 1/80	
Deaton, Alan	9/ 1/68	9/18/70
Denlinger, Ronald E.*	6/ 1/66	4/30/68
Denlinger, Thomas E.	5/ 1/68	3/31/70
Dowdy, Edward M., Jr.	4/ 1/66	10/31/66
Estep, Cecil J.	4/16/67	12/31/68
Finch, Oakley*	11/16/72	3/31/79
Franklin, Raymond S.	6/ 1/62	11/15/63
Henderson, Charles W.*	3/16/43	8/17/63
Hopkins, Harry A.*	8/ 1/56	11/30/68
Jones, William C.	6/ 1/62	9/30/62
Lecklider, Donald E.	2/16/69	2/15/71
Lovin, Martin L.	1/ 1/80	9/25/80
Miller, Robert L.*	3/ 1/68	2/28/70

*Foreman

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Nowlin, Albert P.*	4/16/56	2/28/79
QUEEN, DAVID E.	8/ 1/79	
Rigney, James D.	3/ 1/79	5/15/79
RIGNEY, J. SWANSON*	1/ 1/73	
RIGNEY, LEON H.	11/16/80	
Rigney, Luther L.	7/16/73	5/15/74
SHELTON, ERNEST R., Superintendent	2/ 1/57	
SILER, JOHN E., Asst. Superintendent	11/ 1/70	
SMITH, WALTER E.	4/16/70	
Southall, Woodrow W.*	3/16/70	9/15/70
STONEBURNER, MICHAEL S.*	4/16/73	
Sullivan, William C.	4/16/79	11/15/79
Thomas, William A.	7/ 1/74	10/ 3/74
Thompson, Frederick D	7/ 1/69	7/30/71
Williams, John C.*	4/16/79	5/15/79
Williams, Kenneth R.	10/16/65	1/31/66
Williams, Robert D.	7/16/65	12/15/65

*Foreman

VII. FORESTRY AIDES AND ASSISTANTS

ADKINS, WILLIAM L.	7/16/79	
ALLEN, JOHN J.	3/ 1/73	
Armistead, Calvin W.	2/ 1/72	9/30/72
Blackburn, William L.	2/16/70	2/28/73
Blevins, Johnny R.	5/ 1/73	10/19/73
Bryant, Johnny J.	4/16/66	4/30/75
Carter, Bobbie C.	2/ 1/75	9/15/75
Coles, James W.	2/ 1/72	4/30/73
Crowe, Charles E.	3/15/71	9/ 3/71
Cummings, Martin B.	8/ 1/65	9/23/66
DAVIS, SEBERT	8/ 1/74	
Detweiler, R. Eugene	3/ 1/73	8/15/73
Franklin, Billy E.	7/16/68	8/ 1/68
Franklin, Clifford E., Jr.	7/ 1/48	1/31/70
Franklin, Roger E.	7/16/66	6/15/68
Frazier, Nancy J.	4/16/73	5/31/77
FRAZIER, THOMAS L.	6/16/74	
GARNETT, GARY L.	7/ 1/75	
Gibson, Lothyott	4/16/66	5/18/66
Grubbs, John R.	9/ 1/57	12/31/65
HAMPTON, JAMES M.	8/ 1/74	
Harlow, Aubrey J.	8/ 1/56	5/31/68
HARRIS, BLANCHE E.	8/ 1/74	
HARRIS, JAMES W., JR.	2/16/70	
HARRIS, JANIE E.	2/16/73	
HARRIS, JOHN W.	5/16/73	
Hazelwood, John A.	3/ 1/73	7/23/76
Henderson, Donald H.	9/ 1/73	4/19/74
BRADBY, HERMAN I.	2/16/70	

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
HUSKEY, L. WAYNE	3/ 1/73	
HOLMAN, RICHARD	3/ 1/73	
Hostetter, John M.	1/16/70	4/23/70
Hubbard, John M.	2/ 1/72	10/30/72
JEFFRIES, ANDREW L.	5/16/73	
JEFFRIES, EDITH M.	8/ 1/74	
JOHNSON, ELLEN W.	8/ 1/74	
Jones, Walter B.	8/ 1/74	12/12/78
Mazwell, Arlis W.	3/ 1/73	11/ 7/79
Meador, Hubert L.	9/ 1/56	5/12/71
MEEKINS, BERNICE C.	2/16/70	
MEEKINS, EUGENE B.	6/16/70	
MILES, JUNIUS	1/ 1/80	
MILES, ROBERT L.	3/ 1/73	
Miller, Blanche K.	8/ 1/74	2/15/80
MOSS, SARAH R.	5/ 1/71	
Mullins, Walter A.	2/16/70	5/22/70
PLEASANTS, THOMAS M.	8/ 1/73	
PLEASANTS, WAYNE L.	11/ 1/71	
Patterson, William H.	3/ 1/73	12/31/79
ROACH, RALPH	10/16/66	
ROACH, RAY	3/ 1/68	
Robins, David M.	3/16/80	5/20/80
Rudisill, John A.	2/16/51	2/ 2/68
SMITH, BETTY J.	8/ 1/74	
SMITH, HOWARD C.	7/ 1/74	
STEWART, THOMAS G.	11/ 1/52	
Shifflett, James F.	7/ 1/70	10/15/71
Shifflett, Jesse J.	7/16/68	8/30/68
Sours, Bruce W.	10/ 1/78	7/31/79
Stout, Paul D.	4/16/77	1/15/78
Street, Harry T.	4/16/71	6/ 4/71
Terry, Donald W.	10/ 1/72	5/15/73
Thomas, Cameron M.	6/16/61	4/30/62
	7/ 1/63	7/30/65
Thornton, William N.	7/16/77	8/11/78
Timberlake, Charles E., Jr.	8/16/73	1/12/76
VAUGHAN, JAMES C.	7/ 1/74	
Walden, Morris F.	3/ 1/50	8/10/66
Washington, Edward	1/ 1/79	5/31/79
WASHINGTON, WALTER	11/ 1/71	5/15/72
	8/ 1/74	
Wells, James W.	8/ 1/74	11/15/74
WHALEY, EDDIE R.	3/16/78	
Wiseman, Evelyn L.	3/ 1/70	9/30/72
ZIEGER, ROBERT W.	10/ 1/73	

VIII. AUTOMOTIVE EQUIPMENT MECHANICS

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
BELEW, CARL B.	9/16/79	
Bellomy, Oscar R.	5/ 5/29	12/31/74
Brown, Phillip W.	10/ 1/66	4/30/67
BRUBAKER, RALPH J.	12/ 1/66	
Brubaker, Ralph V.	7/ 1/72	7/20/74
Cannon, Coy B.	3/ 1/69	5/31/74
CARPENTER, PHILIP N.	9/16/79	
CASON, DALLAS R.	7/16/62	6/ 4/65
	6/14/65	
CLAYMAN, JACK D.	7/ 1/74	
COLLINS, ELWOOD L., Supervisor	3/16/48	
Davis, Douglas V.	12/ 1/58	12/31/74
Durham, Stephen R.	11/16/70	12/ 3/71
EASTERLING, H. EARL, JR.	8/ 1/61	
EPPARD, BILLY E.	8/ 1/61	8/26/66
	10/ 1/69	
FARRISH, JAMES S.	6/ 1/63	3/31/79
	2/ 4/80	
Hall, Richard E.	9/ 1/70	2/28/71
HANCOCK, JOSEPH P.	7/ 1/76	
HARRIS, PETER F.	10/ 1/67	
Hutchinson, George D., Jr.	7/16/65	10/29/65
JOHNSON, HERMAN	10/16/71	
Johnson, Herman, Jr.	8/ 1/76	10/15/79
Keyton, Robert L.	3/ 1/74	3/ 2/79
MORGAN, LUNDY H.	3/ 1/71	
Miles, Edward M.	9/ 1/69	1/15/71
MOYER, C. WILLIAM	3/16/71	
MUNDEN, CHARLES A.	5/ 1/71	
Morris, Jerry L.	9/ 1/69	9/ 1/70
NEWSOME, C. CARRINGTON	5/16/70	
Orange, Henry M.	7/16/62	11/30/71
Perkins, Milford E.	1/ 1/64	12/31/68
Putnam, Albert F., III	7/ 1/73	3/31/74
Sebera, James C.	1/ 1/73	5/15/74
SEILER, ROBERT H.	4/ 1/57	
THACKER, M. BRUCE	9/25/78	
WASHINGTON, ROOSEVELT	10/ 1/76	
Walker, Bradley R.	4/16/72	4/30/73
WILLIAMS, WILLIAM E.	10/16/53	
Wyatt, Julian D.	4/16/67	3/ 8/68
	9/ 1/68	11/30/69
Wyndham, Lyston V.	7/16/65	3/31/69
Yancey, Wallace H.	4/16/75	5/21/76

IX. FISCAL AND SECRETARIAL

Argenbright, Clara M.	9/ 1/77	12/31/77
Atkisson, Shelby B.	11/ 1/63	4/15/68
Aylor, Dorothy E.	7/ 1/63	2/28/64
BANTON, JOYCE S.	7/16/77	
Bailey, Martha J.	4/ 1/66	8/ 5/66
BARKER, BETTY H.	9/ 1/63	
BARR, JANET W.	6/18/76	

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
BOUSH, ALBERTINE T.	7/16/73	
Bowen, Shirley H.	1/ 1/60	7/31/60
	4/ 1/63	6/15/70
BRAND, VIRGINIA C.	3/16/67	
Breeden, Janice D.	8/ 1/66	9/22/67
Brown, Janet L.	6/16/67	7/31/72
Brozowski, Shelia L.	9/16/67	7/15/68
Buck, Terry L.	6/16/76	6/15/77
Bundy, Mary E.	10/16/67	1/19/68
Burch, Danielle L.	3/ 1/78	4/10/81
BURGESS, NANCY R.	11/16/79	
Cantrell, Sandra C.	10/16/72	7/15/74
Carlisle, Janice L.	7/ 1/60	6/30/63
CHASE, CATHERINE P.	8/16/50	
CHEATHAM, SHIRLEY P.	8/16/73	
Cheavacci, Daisy B.	11/ 1/43	8/15/78
Clark, Margurite U.	10/ 1/44	4/30/78
CLARKE, JANE R.	2/16/81	
CLARKE, SHIRLEY G.	7/ 1/72	
Clatterbuck, Carolyn H.	7/ 1/60	8/31/67
Cook Ethel S.	10/16/45	12/31/70
Copenhaver, Lola W.	7/ 1/58	1/13/67
Craver, Betty S.	6/16/68	9/13/76
CRUMPLER, GAYLE B.	6/ 1/76	
Daniel, Betty L.	7/16/66	2/29/72
Daniel, Mary C.	4/16/69	1/31/75
Davis, Anne B.	10/ 1/56	4/15/71
Davis, Jeanette D.	6/16/59	12/31/61
	2/16/62	12/15/65
DISHNER, VIRGINIA R.	3/16/52	
Donald, Bessie L.	7/ 1/46	1/31/81
Dotson, Sue W.	6/16/70	12/15/75
DOSS, KATHY C.	10/16/76	
Drewery, Inez B.	8/ 1/48	4/15/69
Durham, Carolyn C.	7/ 1/63	4/15/66
	8/16/66	5/ 5/67
Fidler, Dorothy G.	11/ 1/50	12/31/80
Fleetwood, Karen J.	9/ 1/76	4/22/77
Fletcher, Shelia L.	9/ 1/69	11/30/69
Frise, Alpha J.	5/16/67	8/25/67
Garrett, Johnnie M.	6/16/63	6/16/65
Garrett, Nadine G.	8/ 1/73	8/25/76
Gawryla, Isabel M.	7/16/66	7/ 1/75
Goddin, Norma D.	10/16/51	6/30/63
Graves, Diane M.	10/ 1/71	3/ 8/76
Gray, Donald E.	10/16/69	4/25/76
GREEN, S. JEAN	7/ 5/77	
Greer,, Shirley L.	4/ 1/69	6/ 4/71
Haney, Shirley S.	4/ 1/62	8/31/63
Harrell, Margaret F.	5/ 1/63	1/31/76
Hazelwood, Bonnie K.	8/16/73	3/31/74

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
HICKS, BETTY P.	3/ 1/73	
Hiers, Judith A.	12/ 8/69	4/30/72
HOCKETT, MAXINE E.	5/ 1/55	12/15/58
	10/ 1/64	
Hoffman, Charlotte L.	9/16/67	3/31/69
HOY, DONNA S.	7/ 1/73	
HUFF, EDITH M.	3/16/81	
HUGHES, MAE A.	10/16/76	
Hurttt, Bessie M.	1/15/26	4/30/65
HURTT, BONNIE J.	12/ 1/65	
Isbell, Judy C.	11/16/67	7/ 1/70
Jeffrey, Margaret P.	10/16/68	9/21/76
Johnson, Elizabeth K.	4/ 1/72	6/23/72
Johnson, Joyce F.	12/16/58	9/30/64
JONES, SYLVIA L.	6/ 1/66	
Lamb, Brenda B.	4/16/69	7/ 1/69
LAMBERT, LOMA J.	10/ 1/74	
Layne, Mary M.	8/ 1/61	8/15/72
Lett, Marian R.	12/ 7/70	3/15/73
Martin, Shirley A.	4/16/71	12/31/76
Mast, Nancy L.	9/16/67	8/30/68
	4/ 1/72	8/15/72
Mawyer, Carolyn F.	6/16/70	7/ 1/70
Maynard, Linda B.	6/16/71	11/30/72
MAZZONE, DEBORA A.	10/ 1/78	
McDaniel, Joanne W.	8/ 1/60	3/15/62
MEAD, MARY L.	5/ 1/72	
Michael, June M.	9/ 1/58	6/15/63
MOORE, RITA D.	8/16/74	
Morris, Doris S.	7/ 1/70	2/ 1/75
MORRIS, M. Anne	5/ 1/81	
Moyer, Eileen S.	8/ 1/46	10/15/63
Mullins, Margaret L.	11/16/55	3/15/72
Nance, Judy K.	11/1/73	8/31/74
Napier, Vickie H.	2/16/76	7/22/77
NEWELL, DOROTHY K.	8/16/69	
Nicholson, Evelyn W.	7/16/68	12/ 8/72
Otey, Margaret A.	9/16/74	10/31/74
Owens, Margaret M.	3/ 1/64	7/31/69
Patton, Ruth M.	3/16/50	7/15/73
Pennington, Marjorie N.	7/16/58	8/11/67
Persinger, Jean B.	12/ 1/74	3/31/77
Pfeiffer, Nancy B.	1/ 1/71	6/20/73
Plymale, Ada K.	5/ 1/74	8/23/74
Polson, Sue D.	4/16/73	6/30/73
Powell, Mallory W.	3/15/68	8/30/69
Presley, Martha D.	3/25/63	10/ 1/63
Price, Joan D.	9/ 1/72	12/31/73
Prince, Virginia B.	6/16/67	7/10/75
Proffitt, Margaret E.	7/ 1/58	8/15/65
Pugh, Joanne S.	12/ 1/61	10/15/63

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Rabe, Mary A.	6/ 1/77	8/31/78
Rader, Beverly D.	1/16/71	5/31/73
Roberts, Rachael H.	8/16/65	4/15/67
ROBERTSON, ANNETTE M.	2/ 1/73	
ROMENESKO, JEAN A.	9/ 1/74	
Ruhle, Carolyn E.	1/ 1/63	6/30/63
RUPE, MOLLIE E.	5/ 1/77	
Sanders, Nannette H.	7/ 1/77	2/29/80
SCHMIDT, CATHERINE H.	3/ 1/74	
Seward, Jacqueline N.	10/ 1/73	5/31/76
SHELBORSE, JUDY M.	9/ 1/78	
Sheretz, Charlotte C.	1/16/67	7/15/69
Shifflett, Irma R.	3/ 1/67	8/15/68
STONER, DAVID W.	6/ 1/76	
Stout, Patricia G.	4/16/73	6/21/74
Suddarth, Carolyn M.	2/ 1/64	6/ 1/66
Tatum, Celeste W.	10/ 1/75	5/31/79
Taylor, Phyllis J.	6/ 16/65	9/16/67
Toms, Alice D.	3/ 1/45	10/31/73
Trogdon, Mary B.	8/ 1/60	5/31/66
Ward, Betty L.	7/ 1/65	8/15/67
Ward, Rebecca G.	11/16/73	9/15/74
Ward, Virginia L.	10/16/69	6/30/73
Weakley, Freida M.	8/ 1/72	2/28/73
Webster, Suzanne B.	8/16/72	8/31/73
WHITLOCK, CAROLYN G.	8/16/74	5/31/77
	5/16/80	
Williams, Lois M.	8/16/64	2/28/67
Wilson, Edith M.	6/ 2/33	7/31/66
Winkler, Maben W.	4/25/68	3/15/69
WORRELL, BARBARA A.	9/ 1/68	

X. CUSTODIAL AND UTILITY SERVICES

Adkins, Darlene Y.	10/16/76	10/ 6/77
Allen, Thomas J.	10/16/53	2/28/70
BROWN, THEODORE P.	10/20/80	
Coleman, James W.	5/16/76	10/15/80
DARLING, CHARLIE B.	12/ 1/77	
Fitz, Terry L.	7/16/75	4/ 1/76
GIBSON, SHERWOOD W.	3/ 1/70	
Roberts, Robert L.	10/16/64	6/ 6/75

XI. RADIO COMMUNICATIONS

EPPARD, ELIJAH H.	3/ 1/52	
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A review of our files indicates that the following persons were also employed by our Division:

I. FORESTERS

<u>Name</u>	<u>Date Employed</u>	<u>Date Terminated</u>
Andrews, James P.	4/ 1/ 25	3/ 9/40
Gooch, W. L.	5/ 1/26	1/ 1/29
Hazard, James O.	9/20/26	8/20/30
Hoy, Rodney M.	11/16/43	4/10/44
Maddox, R. S.	8/21/30	5/15/33
O'Byrne, Wilbur	12/ 1/19	8/ 1/28
Pike, Joseph B., Jr.	7/ 1/30	4/ 1/33
Shully, Frederick J.	4/ 1/30	9/15/30

II. ROAD MAINTENANCE

Barton, Everette J.	5/16/42	12/ 2/42
Beasley, William H.	11/ 1/42	1/15/43
Boyle, Henry A.	4/10/39	8/ 8/40
Butler, John O.	4/10/39	10/22/40
Coursey, C. F.	2/21/38	4/15/39
Elliott, Mack C.	9/16/35	11/30/35
Gordon, J. W.	4/19/37	4/22/37
Griffin, Alexander B.	5/22/39	11/18/39
Hogan, S. Garnett	4/19/37	7/ 1/37
Smyth, Gordon L.	9/16/35	11/30/35
	4/ 1/36	12/15/36

III. FOREST WARDEN

Bond, John M.	1/16/43	1/20/43
Graves, Carter E.	1/16/45	1/16/46

IV. NURSERYMEN

Gibson, Roy W.	11/23/36	8/21/37
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V. CLERICAL

Brooking, Anne C.	2/ 1/30	7/ 1/31
Brydon, Anne Page	12/28/27	11/ 7/42
Cheape, Dorothy	6/ 1/29	10/ 1/29
Glass, Arnita	3/14/30	4/ 1/33
Cowles, Jane V.	7/ 1/36	1/ 1/41
Hall, R. E., Mrs.	6/ 1/20	—
Tony, Virginia H.	11/28/38	4/11/40

XI. Developments continued 1981-1982 (Ed Rodger prepared this update).

Economy

The national and state economy had, as might be expected, a serious impact on the Division. Faced with a reduction of \$3.4 million for the 1982-84 budget, the State Forester met with Legislators, forest industry, forestry associations, the Farm Bureau and others in an attempt to forestall such a serious loss of funds. The loss would have required the dismissal of 50 Division employees. Fortunately the General Assembly, with the Governor concurring, funded 25 positions for just one year. As for the other 25 positions, they were lost. However, 12 of the employees faced with layoff were retained because of attrition through resignation and retirements of other employees. It was difficult for the State Forester to tell the other 13 employees that their services were terminated. The impact was felt in the forester, road crew, secretarial and State Forest ranks.

During the 1983 session of the General Assembly, through the efforts of State Forester Custard and Deputy Garner, funds were provided to retain 22 of the 25 positions that had been temporarily funded the year before. This meant that three more positions were lost bringing our authorized full-time staffing down to 340 positions.

The budget restraints affected more than people. Badly-needed equipment and supply purchases had to be delayed. In spite of the financial problems, the Division rose to the occasion and by the end of fiscal year 1982/83 had turned in record accomplishments.

Administrative

Upon the retirement of Deputy State Forester R. J. Bartholomew, James Garner, Assistant Chief of Forest Management, was appointed Deputy effective October 1, 1981. When John Heltzel retired July 1, 1982, W. C. "Chuck" Stanley was promoted from the planning position to Administrative Officer, Heltzel's former position.

During the transfer of persons, several changes were made in job assignments. Tom Dierauf, Chief Applied Forest Research, was given the added responsibility of running the nurseries.

Harold Olinger, Assistant Chief of Forest Research, was transferred to the Forest Management Branch as one of the Assistant Chiefs to head up the aerial spraying contract program, the tree seedling distribution and sales program as well as other duties.

This period witnessed quite a few retirements. Walter Hodge, Assistant District Forester in Staunton, retired with Larry Edwards, Chesterfield County Forester, taking over Walt's position. Candy Wyman, was transferred from the Warrenton office in D-3 to replace Edwards as Chesterfield County Forester. Tom Yancey, Assistant District Forester in Waverly, retired and Sam Bailey was promoted to A.D.F. The Staunton District was especially hard hit when Bessie Donald, the long-time

secretary for District 7 retired. Virginia Brand, the Assistant Secretary, took over Bessie's job and later retired.

Charlie Witter, Watershed Supervisor, retired in December, 1982. Charlie had gained the reputation of being one of the most capable forest hydrologists in the southeast. He was recognized by the Virginia Wildlife Federation as 1982 Water Conservationist of the Year. Budget and personnel restraints prevented the retention of the Forest Hydrologist position.

George "Scotty" Blain, Forester in the Spotsylvania office, retired after 34 years with the Division.

Deborah Mills, Forester Planner for Planning District 21 in the Richmond District, was transferred to Headquarters to work as a Wood Energy Specialist with Phil Grimm who was put in charge of wood energy. All Forester-Planner positions were eliminated in 1982. This included Bill Vernam's position in Planning Districts 8 and 9. Bill returned to the position he previously held as County Forester for Fauquier and Rappahannock Counties.

Because of the heavy work loads in Halifax, Pittsylvania and Brunswick/Dinwiddie Counties, additional county forester positions were established. These counties each have two foresters.

The budget cut affecting personnel resulted in quite a few shuffles across the state. Several foresters, who had been laid off, applied for and got jobs as Chief Forest Wardens. Gary Mitchell became CFW of Orange County Chris Thomsen became CFW of Gloucester.

To maintain a chronological sequence of retirements and promotions, I was forced to report State Forester Custard's announced retirement at the end of this section rather than the beginning of the chapter. Wally retired June 30, 1983. This marks the end of a 37-year tour of duty with the Division. He started as Assistant District Forester in Richmond, transferred to Charlottesville, then to Williamsburg to develop a nursery at Camp Perry. He was later promoted to Assistant Chief of Forest Management, later became Chief, and in July 1973, became Virginia's fourth State Forester. Wally's successor was not named when this chapter went to press.

Clean Air and Clean Water Acts

The Division has been able to meet the Clean Air Act requirements because of acceptance of the restrictions imposed by federal and state legislation and regulations. The fear we had was the possible loss of prescribed burning. A Smoke Management Program, developed by District Forester Roland Geddes and implemented by the Division and forest industry, helped meet the clean air standards.

To meet the Clean Water Act (Public Law 92-500) the Division developed the Best Management Practices document which was approved by the Federal Environmental Protection Agency and the State Water Control Board. To date measurable results indicate that Virginia is meeting the voluntary compliance standards.

A second series of Logger Training meetings was held in 1981 and 1982. More than 500 loggers attended the evening training sessions. To supplement the training, sixty 4' x 8' signs were fabricated and installed at log buying yards, equipment dealers and other places frequented by loggers. Also, a loggers handbook (BMP emphasis) was printed and distributed to loggers and a popular version was developed for landowners.

Everything indicates that Virginia will continue to be accepted as a voluntary compliance State.

Reforestation of Timberlands Act

The 1980 increase to 75 percent in incentive payments was reduced in 1982 to 60 percent then in 1983 to 50 percent of the cost incurred not to exceed \$50 per acre with a five-acre minimum.

Coupled with the changes in the incentive payment, the General Assembly approved doubling the forest products tax. Forest industry was not in opposition to this increase.

The R.T. program has proven to be a very successful venture. The Virginia program has been studied by many states and basically "copied" by several.

Reforestation of Timberlands Progress Report

<u>Program Year</u>	<u>No. of Projects</u>	<u>Acres</u>	<u>Program Year</u>	<u>No. of Projects</u>	<u>Acres</u>
1971-72	478	17,930	1977-78	268	8,303
1972-73	867	30,006	1978-79	316	9,081
1973-74	763	26,167	1979-80	309	8,039
1974-75	687	25,648	1980-81	472	17,392
1975-76	497	18,816	1981-82	<u>1,011</u>	<u>32,923</u>
1976-77	408	14,662			
			GRAND TOTAL	6,076	208,967

Forest Management of State Lands

Following the change in the Code (10-45.1 to 10.45.4) which established an escrow account resulting from timber sales on state-owned lands, more than \$352,000 were received between 1980 and 1983. These funds have been used to site prepare and plant 522 acres. The funds also provided for pine release on 90 acres and 6 miles of road Stabilization. Fuel wood sales amounted to 2,300 loads.

Joel Artman has been in charge of the program from the beginning and is well pleased with the results.

Fire Management

After several years of reasonable fire occurrence and acreage loss, 1981 "hit" the Division for 2,176 fires and 14,867 acres. Incendiary fires have been increasing and are now tied for second place with smoker fires. Debris burning is still number one.

During 1981, our neighbors to the south and west suffered high fire losses. We attribute our relatively acceptable loss to wonderful cooperation from the media and public plus prompt action by Division personnel and volunteer fire departments.

Except for some high hazard days in April 1982, Virginia had a respectable fire record--1,272 fires with 11,170 acres burned.

The most critical period was April 4 when a 4,700 acre fire started in Brunswick County and roared through Greensville County destroying one occupied dwelling and several unoccupied buildings. A wildfire in Suffolk City burned 17 houses plus 200 acres of forestland and a Division tractor. York County and the City of Newport News suffered a 750-acre loss from a fire on city watershed land. All of these fires burned on the same day. There were two fire-related deaths and 12 injuries during 1982.

The experience gained with the use of helicopter/water buckets was convincing enough to expand the program. During the spring of 1983, the Division was the proud owner of 7 buckets. The Army National Guard renewed their agreement to service fire calls within a 50 mile radius of Byrd Field. A contract was signed with Omniflight Airways, Inc. of Baltimore, MD to station a helicopter and crew at Tappahannock. Mr. Stevens of Nelson County and Mr. Overstreet of Bedford County agreed to provide helicopter/bucket capability when called. These units, plus a cooperative agreement with the Forest Service helicopter contractor, gave the Division unusually good coverage.

The aerial detection system which began as a pilot effort in the Charlottesville District in 1979, proved its worth. By the spring of 1983, the Division had statewide coverage. In the west the coverage was provided by an agreement with the Forest Service with District 6 providing an observer for the far southwest. Other flights originated in Charlottesville, Portsmouth, Richmond, Tappahannock, Amelia, Lynchburg, Salem and Danville.

For many years, fire control people had attempted to develop a practical one-person mechanical device to construct fire lines. Everything from rotatillers to lawnmowers was modified. Chain flailer, blowers and diggers were tried. Eventually the Division purchased a unit known as the Low Blower. This was a gasoline powered engine which turned a fan developing a tremendous air stream. The unit was mounted on bicycle wheels. The idea was great but it was a monster to drag through the woods. Then came the advent of small, powerful, light weight gas engines. Again the thoughts went to portable line building equipment. Out of this came a compact machine, easily carried that could blow a nice clean fire line especially through hardwood leaves.

The Division purchased and tried several and liked the results. As dollars become available, more units were acquired until we had 61 by the spring of 1983.

Forest Management

Site preparation, tree planting and pine release are high priority programs. The use of helicopter for spray/burn is still an effective tool. The low bid on the contract for 1983 was \$45.25 per acre. The release program, contracted by the Division in 1982 averaged \$40 per acre using Roundup^R.

The contract system has proven to be a practical method of handling aerial application of herbicides. The Division has better control of the applicators, effectiveness of the treatment, protection of the environment.

Site Preparation on Private Land (Non-Industry)

Year	Burning		Chop & Burn		Spray & Burn		Doze		Disc Chop		Spray Release	
	No.	Ac.	No.	Ac.	No.	Ac.	No.	Ac.	No.	Ac.	No.	Ac.
1981	416	15,216	189	13,482	13	632	249	6,424	29	1,376	464	19,421
1982	396	13,861	180	11,084	16	1072	248	5,380	28	1,469	410	14,141

Prescribed burning is a hot, bone tiring job. Eyes burn, lungs rebel, throats get parched and legs get tired dragging the torch through laps and brush. During the summer of 1982, a new firing technique was tried and liked. The technique is known as Heli-torch. This is where alumajell powder is mixed with gasoline in a bucket slung under a helicopter. The pilot can release "jelly" globs that are ignited by an electric arc under the bucket. The burning globs drop to the ground and do a beautiful job of setting the "intended to burn" material afire. Control of the dropped material is phenomenal and the time required to ignite an area is reduced to the point that smaller crews are needed and much more can be accomplished on an acceptable burning day. This method is best suited for large tracts.

Wood Energy

The oil crisis of the "70s" caused governments, industry and the academic community to more seriously explore alternate energy sources. One such source was wood. The Division attempted to meet the challenge. A series of meetings was held to acquaint safety inspectors, wood stove dealers and the general public with home heating with wood. Special emphasis was given to the safe installation of stoves. During 1982 a meeting was held for industrial leaders with emphasis on converting industrial boilers to wood energy. Phil Grimm was given the task of "keeping on top" of the wood energy program. The 1982 General Assembly authorized the employment of another person to assist Phil. Deborah Mills, Forester Planner for the Williamsburg office, transferred to the State Headquarters to accept this assignment.

With the drop in oil prices and the "infighting" among the major oil producing countries, industrial and government installations appear to have tempered their interest in wood energy.

The wood energy program is also currently addressing fuelwood. One landowner workshop was held, and more are planned to educate landowners in TSI, marketing and liability. Different ways of marketing fuelwood are being evaluated on several State Land and State Forest timber sales.

Buildings and Land

The Division applied for and received a grant to better insulate our buildings, purchase storm windows and build a large solar drying building for cone and seed treatment at New Kent. All this work was done by Bud Shelton and his crew and has proven to be cost/effective.

While making improvements at District offices in Waverly, Portsmouth and Tappahannock, major changes were made in old shop areas. These were converted to conference rooms. At Tappahannock, we took out the old oil furnace and went to all electric on a room-to-room basis. The savings are paying dividends. The same was done at the Portsmouth office.

The New Kent Center finally got their much needed mechanics shop. This 40'x100' building is a dream come true. A special stove designed by Bud Shelton and fabricated by Buddy Morgan, Chief Mechanic at the State Forest, is wood fired. Another of the wood energy efforts of the Division. In support of the use of wood for heating, most of the county office buildings, the exhibit shop and other facilities, added wood stoves as their primary heat source retaining gas, oil or electricity as a backup.

Tree Nurseries

Because of the loblolly pine seedling production requirements, New Kent soils were overtaxed. The solution was to establish a third nursery. John Heltzel, prior to his retirement, searched throughout the southeastern area of the State for a suitable site. One was found in Sussex County and State Forester Custard set out to get Capitol Outlay funds to purchase the land. His persistence prevailed. The funds were set aside, consultants approved the area and hopefully the property will soon be ours.

This is the first step. The second is to acquire funding to develop the nursery. The money needed is plugged into the 1984-86 budget and time will tell how we come out.

Several approaches were used to pick cones from the superior loblolly orchard at New Kent. One time we tried using prison labor. This was not the most cost/effective method. Another time we used local labor. This was a little better. In the fall of 1982, because of budget restrictions, we used full-time Division employees from throughout the State. Camp was set up at New Kent with J. B. Jarrett and Wayne Garman alternating as chefs. The hours were long, the work was hard and the food was superb. A first-class job was done in record time.

The property purchased in Georgia for our loblolly seed orchard is now in operation. Two thousand grafted seedlings have been transported from New Kent and planted in Georgia and two thousand more are scheduled for transport the winter of 1983-84. The Georgia Forestry Commission is managing our orchard in exchange for white pine grown at our Augusta Nursery.

Radio Communications

Prior to the retirement of John Heltzel, Jim Copony had been devoting 50 percent of his time to learning about the Division's radio system. Upon John's retirement, Jim took over and has been doing an outstanding job.

To meet the 12-year radio replacement target, Districts 5, 7 and 9 are scheduled for new units during the fall of 1983.

The Division has been an active participant in the FCCA (Forest and Conservation Communication Association). This group keeps abreast of new developments in the communication field and monitors the Federal Communications Commission's frequency assignments. Jim Copony, as President of the FCCA, did an outstanding job keeping abreast of the threats to forestry frequencies and protecting them thus far.

Of Special Interest

The summer of 1981 witnessed a first for Virginia. The Commonwealth was host to the National Boy Scout Jamboree. Thousands of Scouts converged on Fort A. P. Hill in Caroline County. Charlie Witter was the liaison for the Division's part of the occasion. A beautiful wooded area of the Fort was selected for the Conservation Trail. Along the trail, "hands on" educational exhibits were installed. The SCS, Game Commission, BLM, U. S. Forest Service, Division of Forestry and others put together some of the finest and most appropriate displays one can imagine. Without a doubt, the Division's was one of the best. The exhibit material was saved and has been used at other Scouting camporees since. In 1986 Virginia will again be host to the International Scouting program and you can bet the Division will be there.

Over the years, Division folks have been recognized for their cooperation with other agencies and associations as well as for outstanding work in their field. The Virginia Forestry Association's "Man of the Year" award has gone to George Dean, Seth Hobart, Joe Hayes, Charlie Steirly, Ed Rodger and Wally Custard.

The Virginia Wildlife Federation awards have been presented to George Dean, Wally Custard, Bill Pierce, Crocket Morris, Ed Rodger, Charlie Steirly, Charlie Witter, Tim Tigner, Roland Geddes and Cal Morris.

The Appalachian Society of American Foresters Distinguished Service Award, one of the highest professional awards, has been given to George Dean, Seth Hobart and Wally Custard. The Division shares in the pride these person's undoubtedly have in being singled out for these honors.

Because of the close relationships with the Future Farmers of America, many Division employees have received Chapter, Federation and State FFA awards.

Yes, it finally arrived. The plague of the northeast for decades hit Northern Virginia as well as isolated spots in Charlotte, Floyd and Richmond. Gypsy moth--defoliator, killer, and terrible nuisance around homes, recreation areas--is now with us. Cal Morris and his staff have tried to prepare for the onslot for many years well knowing that eventually it would be here. All sorts of control methods were used in the Fairfax area but at the present it appears that we will just have to learn to live with the beast.

Computers, those mysterious, intimidating machines, are fast becoming an integral part of small and large business and home record keeping. Well, now the Division has one as part of a portable display. The Virginia Wildlife Federation purchased the computer and the Division built the accompanying display. The plan is to use the exhibit at Science museums, shopping malls, schools and any place people congregate. The computer, the center attached on the display, contains a series of environmental questions and answers. The "player" gets a score at the completion of the quiz.

The media (newspaper, radio and television) have always been cooperative. In 1977 one TV station, WTKR in Norfolk, put together a 60-minute documentary covering all phases of forestry (seedlings to the finished product rolling out of the factory). As a follow-up in 1983, they produced a 30-minute documentary. Stars of the second show were Dick Woodling, Crockett Morris and Joe Gardner.

A tremendous amount of effort has gone into the Resource Planning and Social Assessment programs. Under a special grant from the U. S. Forest Service, the Division enjoyed the expertise of University of Virginia School of Systems Engineering and the assistance of planning specialists from the Forest Service Atlanta office. During 1982 citizen workshops were held in Charlottesville and Richmond for those social assessment units and two are planned for the summer of 1983.