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Forest Statistics for North Carolina, 2002

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## Foreword

This report highlights principal findings of the seventh forest survey of the State of North Carolina. Field work began in January 1998 with was completed in December of 2002. Six previous surveys, completed in 1938, 1956, 1964, 1974, 1984, and 1990, provide statistics for measuring changes and trends over the past 64 years. This report primarily emphasizes changes and trends since 1990. It discusses the extent and condition of forest land, associated timber volumes, and rates of timber growth, mortality, and removals.

Periodic surveys of forest resources are authorized by the Forest and Rangeland Renewable Resources Research Act of 1978. These surveys are a continuing, nationwide undertaking by the regional experiment stations of the U.S. Department of Agriculture, Forest Service. In the Southern United States, the Forest Inventory and Analysis Research Work Unit (FIA) at the Southern Research Station conducts these surveys in 13 Southern States and the Commonwealth of Puerto Rico. The FIA unit operates from its headquarters in Knoxville, TN, and offices in Asheville, NC, and Starkville, MS. The primary objective of these surveys is to periodically inventory and evaluate all forest and related resources. These multiresource data help provide a basis for formulating forest policies and programs and for the orderly development and use of the resources.

Additional information about any aspect of this survey may be obtained from:
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# Forest Statistics for North Carolina, 2002 

Mark J. Brown

## Highlights

This report summarizes results from a 2002 inventory of the forest resources of the State of North Carolina (fig. 1). Current estimates of forest area, timberland area, related classifications such as ownership and forest type, and timber volumes are presented and compared with previous values. It summarizes the average annual rates of growth, removals, and mortality since 1990. Although the previous and current inventories are similar in scope, they differ in sampling design and intensity, standards and definitions, and in methods used to determine key attributes such as stocking, forest type, and stand-size class. Many of the changes in methods, plot design, and sampling intensity were necessary to increase national consistency between Forest Inventory and Analysis (FIA) Research Work Units. These changes complicate the comparison of data between surveys and make detection of genuine resource trends difficult. However, some general comparisons are possible where differences between inventories can be reconciled or are considered minimal. Resource data are presented in 49 tables and 9 graphs. A summary of major findings follows.

Forest land area-Since 1990, forest cover has decreased 5 percent. In 2002, forests covered 18.3 million acres, or 59 percent of the land area compared with 19.3 million acres and 62 percent previously. Three percent, or 552,000 acres, of these forests were classified as reserved timberland, mostly located in the Great Smoky Mountains National Park, national forest wilderness areas, and State parks. Ninetyseven percent, or almost 17.7 million acres, of the forests in North Carolina were classified as timberland. Since 1990, the area of timberland in the State has declined 5 percent, or by more than 1.0 million acres. Urban and other land uses were the predominant cause of the net loss, agricultural uses were a distant second.

Ownership-Nonindustrial private forest (NIPF) landowners continue to dominate ownership of timberland in North Carolina, although acreage held by this owner category fell by 5 percent. In 2002, NIPF owners accounted for 78 percent, or 13.8 million acres, of the timberland in the State. The NIPF owner group is composed of individual and corporate timberland owners. Individual ownership decreased 9 percent since 1990, from 12.5 million acres to 11.4 million acres. In contrast, timberland under corporate ownership increased 22 percent
since 1990, from 2.0 to 2.4 million acres. Public ownership of timberland increased by 401,000 acres to almost 2.4 million acres. National forest timberlands comprised almost half (47 percent) of the public timberland in the State with 1.1 million acres. Miscellaneous Federal timberland, primarily on military bases, accounted for 586,000 acres or one-fourth of the public timberland. State owned lands accounted for 469,000 acres or one-fifth of the public timberland. Local government holdings made up the remaining 192,000 acres of public timberland. Timberland owned by forest industry declined 33 percent, from less than 2.3 million acres in 1990 to 1.5 million acres in 2002 .

Forest type—Hardwood forest types occurred on 72 percent of the timberland in North Carolina compared to 66 percent in 1990. Overall, area of hardwood types increased 2 percent to nearly 12.7 million acres. Area of oak-hickory, the predominant forest-type group, increased 5 percent to 7.3 million acres in 2002. Area of oak-pine increased 18 percent to 3.0 million acres. Area of oak-gum-cypress decreased 18 percent to 2.0 million acres. Area of elm-ash-cottonwood at 167,000 acres and area of maple-beech-birch at 116,000 acres, both experienced declines. Softwood forest types accounted for 28 percent of the timberland in the State of North Carolina compared to 33 percent in 1990. Area of softwood types declined 20 percent, from 6.2 million acres in 1990 to 5.0 million acres in 2002. Loblolly pine continued to be the predominant softwood type with 3.5 million acres, down 5 percent. Virginia pine remained the second most abundant softwood type with 479,000 acres, although down 37 percent in area. Pond pine type stayed third in abundance with 307,000 acres, despite a 49-percent reduction in area. White pine type rose to fourth in abundance with 196,000 acres because of a 24 -percent increase in area. Longleaf pine type again registered fifth in abundance with 177,000 acres despite a 30 -percent reduction in area. Shortleaf pine type dropped to sixth with 155,000 acres after it declined 62 percent in area. Among the pine types, all yellow pine lost acreage, only white pine type increased in area. Planted stands occupied 15 percent of the total area of timberland in North Carolina in 2002 compared with 12 percent in 1990. The area in planted stands increased 375,000 acres, or by 17 percent, to 2.6 million acres. These planted acres consisted of 2.1 million acres of pine forest types and 0.5 million acres classified as oak-pine stands.

Stand-size—Sawtimber-size stands continued to dominate the State of North Carolina. Although the area of sawtimber stands decreased by nearly 1.6 million acres to less than 7.6 million acres, they still accounted for 43 percent of the timberland in the State. Area of poletimber-size stands decreased as well, by 1.3 million acres to 3.6 million acres. Poletimber-size stands accounted for 20 percent of the timberland in the State. In contrast, area of sapling-seedling size stands rose by 2.0 million acres to 6.5 million acres. Sapling-seedling stands accounted for 37 percent of the timberland in the State of North Carolina. Area of nonstocked stands decreased to 61,000 acres and remained well below 1 percent of the total timberland in the region.

Stand treatment-The predominant type of cutting across North Carolina was final harvest. Final harvests averaged 246,000 acres annually, down from an average of 295,000 acres annually between 1984 and 1989. Partial harvests occurred on an average of 79,000 acres annually since 1990, up from an average of 53,000 acres during the 1984 to 1989 period. Thinning and other stand improvement occurred on 66,000 acres annually, also up slightly from 62,000 acres previously. New stands were established, both artificially and naturally, on 314,000 acres each year through reforestation and afforestation. Reforestation of existing forest land accounted for 255,000 acres annually and afforestation of former nonforest land accounted for more than 59,000 acres annually. Area of new stands exceeded area of final harvest by 27 percent. Artificial regeneration averaged 102,000 acres annually, nearly the same as 103,000 acres between 1984 and 1989. Natural regeneration averaged 212,000 acres annually, down from 253,000 acres between 1984 and 1989. Natural disturbances damaged many acres annually; the greatest of these was weather, followed by fire and insects. Weather damage averaged 122,000 acres annually since 1990 . Fire damage averaged 43,000 acres annually and insect damage averaged 26,000 acres annually.

Softwood volume-Volume of softwood species accounted for 34 percent of total volume in North Carolina compared to 36 percent in 1990. Volume of softwood live trees declined from 12.6 billion cubic feet in 1990 to 11.4 billion cubic feet in 2002, a drop of 10 percent. Loblolly pine remained the predominant softwood species at 59 percent of the total softwood volume. In fact, loblolly pine accounted for the most volume of any individual species, whether softwood or hardwood. Volume of loblolly pine increased 2 percent to 6.7 billion cubic feet, all other yellow pine species declined in volume. Virginia pine decreased 29 percent to 1.1 billion cubic feet and shortleaf pine decreased by 44 percent to 727 million cubic feet. Pond pine dropped 44 percent to

452 million cubic feet. Longleaf pine declined only 3 percent, retaining 409 million cubic feet. In contrast, volume of white pine increased 22 percent to 879 million cubic feet. Cypress declined 7 percent to 424 million cubic feet. NIPF lands accounted for 73 percent of the softwood volume. Softwood volume was down 11 percent on NIPF land to 8.3 billion cubic feet. Public lands contained 14 percent of the softwood volume. Softwood volume was up 22 percent on public lands to 1.6 billion cubic feet. Forest industry had 13 percent of the softwood volume, where it dropped 23 percent to nearly 1.5 billion cubic feet. Planted pine forest types accounted for 28 percent, or 3.1 billion cubic feet, of North Carolina's softwood volume compared to 17 percent, or 2.2 billion cubic feet, in 1990.

Hardwood volume-Volume of hardwood species made up 66 percent of total volume in North Carolina compared to 64 percent in 1990. Yet, hardwood live-tree volume decreased 2 percent-from 22.1 billion cubic feet in 1990 to 21.6 billion cubic feet in 2002. Yellow-poplar was the predominant individual hardwood species and second of all species, followed by soft maple and then sweetgum. Volume of yellow-poplar increased 24 percent to 4.1 billion cubic feet. Volume of soft maple was relatively unchanged at 2.5 billion cubic feet. Sweetgum rose less than 2 percent to 2.1 billion cubic feet. Collectively, other red oaks accounted for 2.3 billion cubic feet, down 12 percent. Collectively, select white oaks accounted for 1.9 billion cubic feet, down 10 percent. Collectively, select red oaks accounted for 1.0 billion cubic feet, down 5 percent. Together, tupelo and blackgum accounted for 1.7 billion cubic feet, down 18 percent. NIPF lands accounted for 80 percent of the hardwood inventory. Hardwood inventory on NIPF land was relatively unchanged at 17.4 billion cubic feet. Public lands had 16 percent of the hardwood volume, where it increased 19 percent to 3.6 billion cubic feet. Forest industry had just 3 percent of the hardwood volume after it dropped 58 percent to 664 million cubic feet.

Growth-Net growth of all live trees averaged more than 1.2 billion cubic feet annually in North Carolina. Softwood net growth accounted for 51 percent of all growth. Net annual growth of softwood live trees increased 5 percent to 623 million cubic feet annually. NIPF lands accounted for 67 percent of softwood net growth. NIPF softwood net growth increased 5 percent to 415 million cubic feet per year. Forest industry lands accounted for 25 percent of softwood net growth. Softwood growth increased 3 percent on forest industry lands to 159 million cubic feet. Public lands accounted for 8 percent of softwood net growth. Softwood growth on public lands rose 13 percent to 50 million cubic feet annually. Planted pine forest types made up 47 percent,
or 296 million cubic feet, of North Carolina's softwood growth in 2002 compared to 35 percent, or 209 million cubic feet, in 1990. Net annual growth of hardwood live trees increased 3 percent to 602 million cubic feet. NIPF lands accounted for 86 percent of hardwood net growth, where it increased 7 percent to 515 million cubic feet annually. Public lands accounted for 11 percent of hardwood growth, where it increased 11percent to 64 million cubic feet annually.

Mortality-Total mortality of all live trees averaged 426 million cubic feet annually in North Carolina since 1990. Hardwoods comprised 55 percent of the average annual mortality in the State. Hardwood mortality increased 20 percent to 235 million cubic feet per year. Mortality for all oak species combined accounted for 36 percent of the total hardwood mortality. Other red oaks accounted for more than half of the oak mortality. NIPF land accounted for 77 percent of the hardwood mortality. Hardwood mortality increased 22 percent on NIPF land to 181 million cubic feet annually. Softwood live-tree mortality increased 61 percent to 191 million cubic feet annually. Loblolly pine comprised 43 percent of the softwood mortality, Virginia pine accounted for 24 percent, and shortleaf pine made up 11 percent. NIPF land accounted for 73 percent of the total softwood mortality. Softwood mortality increased 45 percent on NIPF land to 139 million cubic feet annually.

Removals-Total removals of all live trees averaged more than 1.2 billion cubic feet annually in North Carolina. Softwoods made up 59 percent of the total annual removals in the State. Annual removals of softwood live trees increased 42 percent to 729 million cubic feet. Between 1990 and 2001, annual softwood removals exceeded annual softwood growth by 17 percent or 105 million cubic feet. Three-fourths of the softwood removals came from NIPF land, 22 percent from forest industry, and just 3 percent from public timberland. Planted pine forest types provided 31 percent, or 223 million cubic feet, of North Carolina's softwood removals in 2002 compared to 15 percent, or 79 million cubic feet, in 1990. Removals of hardwood live trees increased 8 percent to 498 million cubic feet per year. Between 1990 and 2001, annual hardwood growth exceeded the level of hardwood removals by 21 percent or 104 million cubic feet. NIPF owners provided 92 percent of the hardwood removals, 6 percent came from forest industry, and just 2 percent from public lands.

## Inventory Methods

The Southern Research Station, FIA unit secured data on forest acreage and timber volume using a three-step process. A forest-nonforest classification using aerial photographs was accomplished using points representing approximately 225 acres. These photo classifications were adjusted based on ground observations at sample locations representing approximately 3,919 acres. Finally, field measurements were made at each of the sample locations where the plot design sampled forest land.

The plot installed at each ground sample location was a cluster of four points spaced 120 feet apart. Each point served as the center of a $1 / 24$-acre circular subplot used to sample trees 5.0 inches diameter at breast height (d.b.h.) and larger. A 1/300-acre microplot, located at the subplot center, was used to sample trees 1.0 to 4.9 inches d.b.h. and seedlings (trees less than 1.0 inch d.b.h.). These fixedradius sample plots were established without regard to land use or land cover. Forest and nonforest condition classes were delineated and recorded. Condition classes were defined by six attributes: land use, forest type, stand origin, stand size, forest density, and major ownership class. All trees tallied were assigned to their respective condition class.

The cluster of four fixed plots sampled timberland at 3,987 ground sample locations in the State. Estimates of timber volume and forest classifications were derived from tree measurements and classifications made at these locations. Volumes for individual tally trees were computed using equations for each of the major species in the State. The equations were developed from detailed measurements collected from standing trees throughout the region.

Estimates of growth, removals, and mortality were determined from the remeasurement of 3,183 permanent sample plots established in the previous inventory. The plot design for the previous inventory was based on a cluster of 10 points. Variable plots were systematically spaced within a single forest condition at three to five points. At each point, trees 5.0 inches d.b.h. and larger were selected for measurement on a variable-radius plot defined by a 37.5 -factor prism. Trees less than 5.0 inches d.b.h. were tallied on a fixed-radius plot around points 1 through 3.

## Statistical Reliability

FIA inventories employ sampling methods designed to achieve reliable statistics at the survey unit and State levels. A measure of reliability of inventory statistics is provided by sampling errors. These sampling errors mean that the chances are two out of three that the true population value is within the limits indicated by a confidence interval. Sampling errors (in percent) and associated confidence intervals around the sample estimates for timberland area, inventory volumes, and components of change are presented in the following table.

| Item | Sample estimate and <br> confidence interval |  | Sampling error |
| :---: | :---: | :---: | :---: |
|  |  |  | Percent |
| Timberland (1,000 acres) | 17,684.4 $\pm$ | 60.6 | 0.34 |
| All live ( $M f t^{3}$ ) |  |  |  |
| Inventory | 33,011.9 $\pm$ | 544.7 | 1.65 |
| Net annual growth | 1,225.4 $\pm$ | 28.7 | 2.34 |
| Annual removals | 1,227.0 $\pm$ | 45.2 | 3.68 |
| Annual mortality | $425.8 \pm$ | 15.2 | 3.56 |
| Growing stock ( $M f t^{3}$ ) |  |  |  |
| Inventory | 30,324.9 $\pm$ | 515.5 | 1.70 |
| Net annual growth | 1,180.9 $\pm$ | 27.9 | 2.36 |
| Annual removals | 1,191.4 $\pm$ | 44.2 | 3.71 |
| Annual mortality | $367.8 \pm$ | 14.3 | 3.89 |
| Sawtimber ( M fbm) |  |  |  |
| Inventory | 106,078.9 $\pm$ | 2,280.7 | 2.15 |
| Net annual growth | $4,913.7 \pm$ | 123.3 | 2.51 |
| Annual removals | $4,225.9 \pm$ | 178.8 | 4.23 |
| Annual mortality | 1,160.6 $\pm$ | 57.7 | 4.97 |

Sampling error increases as the area or volume considered decreases in magnitude. Sampling errors and associated confidence intervals are often unacceptably high for small components of the total resource. Statistical confidence may be computed for any subdivision of survey unit or State totals using the following formula. Sampling errors obtained from this method are only approximations of reliability because this process assumes constant variance across all subdivisions of totals.

$$
S E_{s}=S E_{t} \frac{\sqrt{X}_{t}}{\sqrt{X_{s}}}
$$

where

$$
\left.\begin{array}{rl}
\mathrm{SE}_{s}= & \text { sampling error for subdivision of survey } \\
& \text { unit or State total, }
\end{array}\right\} \begin{aligned}
\mathrm{SE}_{t}= & \text { sampling error for survey unit or State total, } \\
\mathrm{X}_{s}= & \begin{array}{l}
\text { sum of values for the variable of interest } \\
\\
\\
\\
\\
\\
\text { unit or State, }
\end{array} \\
\mathrm{X}_{t}= & \text { total area or volume for subvey unit or State. }
\end{aligned}
$$

For example, the estimate of sampling error for softwood livetree volume on NIPF land is computed as:

$$
S E_{s}=1.65 \frac{\sqrt{33,011.9}}{\sqrt{8,326.3}}=3.29
$$

Thus, the sampling error is 3.29 percent, and the resulting confidence interval (two times out of three) for softwood live-tree inventory on NIPF land is $8,326.3 \pm 273.9$ million cubic feet.

County statistics are provided, but users are cautioned that the accuracy of individual county data is highly variable. Individual county statistics are provided so any combination of counties may be added together until the totals are large enough to meet the desired degree of reliability. Sampling errors for key resource items for individual counties are provided in the following table.

Sampling errors ${ }^{a}$ by counties and State for timberland, live trees, growing stock, and sawtimber,
North Carolina, 2002

| Counties and State | Timberland area | Live trees |  |  | Growing stock |  |  | Sawtimber |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Volume | Growth | Removals | Volume | Growth | Removals | Volume | Growth | Removals |
|  | Percent |  |  |  |  |  |  |  |  |  |
| Alamance | 4.6 | 13.7 | 16.6 | 55.7 | 13.9 | 19.1 | 55.2 | 18.0 | 18.4 | 56.9 |
| Alexander | 4.1 | 14.5 | 63.7 | 51.7 | 14.3 | 78.4 | 50.7 | 20.9 | 39.5 | 60.4 |
| Alleghany | 3.7 | 20.5 | 26.2 | 64.0 | 22.6 | 30.4 | 63.4 | 31.2 | 32.7 | 62.4 |
| Anson | 4.2 | 15.5 | 20.6 | 30.4 | 15.9 | 20.7 | 30.8 | 19.6 | 20.8 | 36.6 |
| Ashe | 4.3 | 11.1 | 17.1 | 37.2 | 12.5 | 16.0 | 37.3 | 15.2 | 13.5 | 39.9 |
| Avery | 4.6 | 12.1 | 24.4 | - | 12.0 | 23.4 | - | 14.7 | 21.2 | - |
| Beaufort | 2.4 | 11.8 | 10.5 | 14.4 | 12.0 | 10.6 | 14.5 | 13.7 | 12.1 | 17.3 |
| Bertie | 3.0 | 10.8 | 13.4 | 21.3 | 11.0 | 13.1 | 21.4 | 14.3 | 13.2 | 25.0 |
| Bladen | 2.2 | 10.5 | 16.6 | 27.8 | 10.7 | 16.7 | 28.1 | 15.3 | 16.5 | 31.0 |
| Brunswick | 1.7 | 11.4 | 16.7 | 18.7 | 11.7 | 16.7 | 18.8 | 16.5 | 16.6 | 25.9 |
| Buncombe | 2.9 | 10.6 | 20.6 | 40.5 | 10.4 | 18.8 | 40.6 | 13.1 | 19.6 | 43.7 |
| Burke | 2.4 | 10.6 | 15.3 | 29.5 | 10.9 | 15.1 | 29.7 | 14.6 | 17.8 | 31.8 |
| Cabarrus | 4.8 | 15.6 | 21.2 | 52.9 | 16.2 | 23.8 | 53.8 | 24.6 | 20.6 | 53.7 |
| Caldwell | 3.0 | 10.1 | 9.1 | 37.6 | 10.9 | 9.9 | 37.0 | 14.2 | 11.2 | 38.3 |
| Camden | 3.3 | 23.9 | 17.4 | 49.3 | 27.3 | 15.3 | 49.7 | 31.0 | 31.8 | 63.4 |
| Carteret | 3.1 | 17.6 | 28.1 | 64.0 | 18.1 | 27.1 | 64.0 | 23.8 | 24.3 | 65.4 |
| Caswell | 4.1 | 11.9 | 15.9 | 41.1 | 12.4 | 15.9 | 41.7 | 16.3 | 16.8 | 45.2 |
| Catawba | 5.6 | 20.3 | 24.5 | 40.3 | 20.4 | 26.6 | 39.7 | 28.8 | 29.3 | 43.1 |
| Chatham | 3.4 | 13.7 | 15.7 | 20.1 | 13.9 | 16.5 | 20.3 | 18.4 | 18.6 | 20.1 |
| Cherokee | 2.4 | 6.7 | 14.1 | 43.5 | 7.1 | 13.3 | 43.7 | 10.5 | 15.9 | 42.1 |
| Chowan | 2.1 | 22.1 | 98.5 | 32.4 | 23.8 | 89.2 | 32.4 | 36.2 | 104.2 | 39.4 |
| Clay | 4.2 | 12.5 | 32.8 | 84.3 | 13.0 | 29.2 | 84.3 | 18.4 | 38.5 | 85.0 |
| Cleveland | 3.9 | 19.5 | 20.5 | 48.2 | 20.9 | 23.3 | 46.9 | 31.9 | 26.8 | 55.9 |
| Columbus | 2.4 | 10.6 | 11.8 | 18.8 | 11.3 | 12.1 | 19.0 | 14.7 | 15.1 | 21.2 |
| Craven | 2.1 | 12.1 | 21.4 | 26.8 | 12.5 | 20.7 | 26.9 | 15.5 | 22.4 | 31.5 |
| Cumberland | 2.5 | 12.6 | 19.0 | 49.7 | 13.1 | 17.5 | 51.2 | 15.1 | 16.2 | 49.7 |
| Currituck | 4.3 | 35.2 | 25.5 | 39.4 | 35.8 | 23.5 | 39.5 | 43.7 | 31.4 | 46.4 |
| Dare | 4.5 | 16.5 | 26.9 | 100.1 | 17.5 | 30.7 | 100.1 | 23.0 | 40.8 | 100.1 |
| Davidson | 3.2 | 12.0 | 14.9 | 47.1 | 12.7 | 16.0 | 47.0 | 18.3 | 16.0 | 57.5 |
| Davie | 2.7 | 14.9 | 12.9 | 46.9 | 14.9 | 13.4 | 47.8 | 22.0 | 19.9 | 49.7 |
| Duplin | 2.1 | 16.7 | 77.0 | 26.0 | 16.9 | 73.1 | 26.2 | 24.0 | 112.1 | 27.7 |
| Durham | 5.2 | 19.9 | 15.4 | 37.2 | 21.3 | 13.7 | 37.3 | 25.4 | 13.7 | 39.6 |
| Edgecombe | 3.6 | 17.5 | 16.6 | 33.1 | 18.4 | 14.9 | 33.5 | 23.8 | 16.2 | 36.8 |
| Forsyth | 3.9 | 11.7 | 35.5 | 100.1 | 12.5 | 39.7 | 100.1 | 16.4 | 18.4 | 100.1 |
| Franklin | 3.5 | 16.3 | 17.5 | 31.7 | 16.6 | 17.8 | 31.6 | 26.3 | 27.5 | 33.5 |
| Gaston | 4.3 | 16.2 | 33.5 | 40.7 | 16.6 | 34.4 | 40.6 | 23.7 | 31.2 | 42.4 |
| Gates | 1.5 | 16.2 | 14.5 | 31.1 | 16.4 | 14.6 | 31.5 | 22.8 | 17.0 | 32.6 |
| Graham | 4.2 | 9.5 | 20.9 | 90.5 | 9.7 | 19.5 | 90.5 | 14.6 | 22.1 | 100.1 |
| Granville | 3.4 | 14.6 | 17.1 | 26.2 | 15.2 | 17.6 | 26.4 | 21.1 | 20.7 | 29.2 |
| Greene | 3.5 | 23.2 | 43.6 | 41.3 | 24.4 | 46.8 | 41.7 | 30.8 | 43.6 | 41.6 |
| Guilford | 2.6 | 9.6 | 12.9 | 43.0 | 10.2 | 13.8 | 43.1 | 12.4 | 16.4 | 47.4 |
| Halifax | 1.9 | 16.0 | 12.4 | 21.4 | 16.8 | 13.0 | 21.6 | 22.4 | 14.2 | 27.3 |
| Harnett | 3.0 | 15.2 | 21.0 | 23.3 | 16.2 | 22.4 | 23.3 | 22.6 | 32.4 | 25.6 |
| Haywood | 2.9 | 8.7 | 16.9 | 48.4 | 9.5 | 14.7 | 51.1 | 12.9 | 16.9 | 51.1 |
| Henderson | 3.8 | 10.9 | 35.8 | 55.4 | 11.6 | 33.7 | 55.7 | 15.3 | 27.2 | 63.7 |
| Hertford | 2.0 | 18.4 | 15.0 | 34.1 | 18.3 | 14.9 | 34.4 | 23.2 | 22.7 | 39.9 |
| Hoke | 4.7 | 11.6 | 17.2 | 54.1 | 12.5 | 17.0 | 54.3 | 14.9 | 17.9 | 54.4 |
| Hyde | 3.8 | 20.7 | 26.4 | 29.8 | 20.8 | 26.3 | 29.8 | 25.8 | 27.5 | 34.1 |
| Iredell | 3.6 | 14.2 | 22.4 | 56.0 | 15.1 | 25.1 | 56.6 | 20.6 | 37.9 | 67.1 |
| Jackson | 1.6 | 8.9 | 18.6 | 63.7 | 9.8 | 16.8 | 65.3 | 15.7 | 13.8 | 68.3 |
| Johnston | 2.4 | 16.6 | 21.1 | 26.7 | 17.6 | 20.6 | 26.5 | 22.8 | 21.4 | 28.9 |
| Jones | 2.7 | 11.3 | 20.7 | 20.7 | 11.5 | 19.7 | 20.9 | 15.5 | 19.5 | 24.2 |

Sampling errors ${ }^{a}$ by counties and State for timberland, live trees, growing stock, and sawtimber, North Carolina, 2002 (continued)

| Counties and State | Timberland area | Live trees |  |  | Growing stock |  |  | Sawtimber |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Volume | Growth | Removals | Volume | Growth | Removals | Volume | Growth | Removals |
|  | Percent |  |  |  |  |  |  |  |  |  |
| Lee | 3.6 | 15.4 | 17.2 | 46.1 | 15.5 | 17.4 | 47.9 | 22.4 | 20.0 | 51.7 |
| Lenoir | 2.9 | 19.2 | 35.1 | 60.9 | 18.9 | 33.2 | 61.0 | 27.7 | 52.0 | 58.0 |
| Lincoln | 4.1 | 20.8 | 22.6 | 47.2 | 21.7 | 22.7 | 47.2 | 28.7 | 22.1 | 49.9 |
| Macon | 3.2 | 12.3 | 47.1 | 67.5 | 13.7 | 49.1 | 67.5 | 16.7 | 33.3 | 67.5 |
| Madison | 2.7 | 13.2 | 17.2 | 30.2 | 13.5 | 17.5 | 30.7 | 15.6 | 17.7 | 31.4 |
| Martin | 1.8 | 9.7 | 29.4 | 47.6 | 10.3 | 29.5 | 48.1 | 15.0 | 24.3 | 53.1 |
| McDowell | 3.3 | 9.0 | 33.0 | 72.0 | 9.7 | 32.0 | 74.5 | 13.4 | 30.9 | 86.7 |
| Mecklenburg | 3.4 | 19.9 | 27.3 | 28.1 | 18.9 | 25.5 | 28.7 | 27.5 | 24.3 | 30.0 |
| Mitchell | 4.9 | 15.1 | 16.7 | 56.3 | 16.2 | 16.0 | 55.8 | 22.1 | 15.6 | 56.3 |
| Montgomery | 2.7 | 10.4 | 15.9 | 32.5 | 10.8 | 17.1 | 31.7 | 16.1 | 20.1 | 34.1 |
| Moore | 2.8 | 11.2 | 10.8 | 28.5 | 11.5 | 11.2 | 28.9 | 15.0 | 14.0 | 33.4 |
| Nash | 3.5 | 20.3 | 29.3 | 23.7 | 21.9 | 29.2 | 23.7 | 35.6 | 32.1 | 25.5 |
| New Hanover | 2.0 | 30.5 | 35.1 | 63.7 | 32.9 | 39.4 | 59.9 | 42.6 | 63.9 | 58.2 |
| Northampton | 2.4 | 14.3 | 13.6 | 21.1 | 14.1 | 13.6 | 21.1 | 17.4 | 13.1 | 21.2 |
| Onslow | 2.8 | 13.0 | 48.1 | 26.4 | 13.3 | 44.9 | 26.3 | 20.9 | 51.1 | 29.5 |
| Orange | 3.9 | 15.6 | 14.0 | 30.2 | 16.4 | 15.0 | 30.0 | 19.8 | 17.5 | 33.6 |
| Pamlico | 4.5 | 21.5 | 22.3 | 40.8 | 22.4 | 22.6 | 41.0 | 28.3 | 23.1 | 46.3 |
| Pasquotank | 2.8 | 28.3 | 37.1 | 100.0 | 30.2 | 26.4 | 100.0 | 39.4 | 32.9 | 100.0 |
| Pender | 1.6 | 12.3 | 13.2 | 21.6 | 12.2 | 12.7 | 21.7 | 16.1 | 16.8 | 23.8 |
| Perquimans | 3.2 | 14.7 | 26.5 | 53.4 | 14.8 | 26.1 | 53.6 | 21.1 | 35.6 | 55.9 |
| Person | 6.2 | 16.4 | 18.3 | 36.0 | 16.5 | 18.6 | 36.3 | 19.1 | 27.6 | 42.6 |
| Pitt | 2.8 | 16.2 | 14.1 | 28.8 | 16.8 | 14.8 | 29.0 | 20.5 | 19.0 | 32.0 |
| Polk | 5.5 | 21.5 | 20.8 | 36.6 | 21.7 | 21.9 | 36.6 | 25.9 | 29.6 | 59.0 |
| Randolph | 2.6 | 11.1 | 9.1 | 41.9 | 11.3 | 10.6 | 41.7 | 15.7 | 13.6 | 48.9 |
| Richmond | 3.5 | 16.8 | 14.1 | 25.8 | 17.7 | 14.2 | 26.1 | 23.4 | 20.5 | 28.8 |
| Robeson | 1.9 | 10.6 | 16.5 | 23.0 | 10.9 | 16.6 | 23.2 | 14.1 | 15.4 | 26.7 |
| Rockingham | 4.3 | 11.2 | 15.9 | 34.4 | 11.8 | 16.4 | 35.0 | 16.0 | 14.2 | 34.9 |
| Rowan | 3.5 | 17.9 | 24.2 | 57.2 | 18.5 | 23.8 | 56.2 | 24.2 | 21.0 | 61.7 |
| Rutherford | 3.3 | 11.9 | 43.6 | 41.5 | 12.3 | 44.6 | 41.5 | 15.0 | 57.0 | 50.0 |
| Sampson | 2.2 | 15.3 | 16.2 | 24.7 | 15.9 | 15.0 | 25.2 | 20.3 | 19.2 | 27.8 |
| Scotland | 3.9 | 19.3 | 24.2 | 54.8 | 20.7 | 24.7 | 55.5 | 26.1 | 27.9 | 67.2 |
| Stanly | 3.6 | 17.4 | 25.7 | 44.5 | 18.5 | 28.6 | 46.0 | 25.2 | 34.6 | 56.6 |
| Stokes | 5.7 | 11.5 | 16.5 | 47.6 | 11.7 | 17.1 | 47.4 | 15.1 | 19.5 | 52.0 |
| Surry | 3.2 | 9.3 | 14.9 | 40.7 | 9.6 | 14.9 | 40.4 | 12.5 | 12.7 | 39.5 |
| Swain | 1.7 | 14.5 | 31.2 | 68.9 | 15.0 | 34.2 | 74.8 | 23.8 | 31.8 | 76.9 |
| Transylvania | 2.7 | 8.1 | 21.9 | - | 8.9 | 19.9 | - | 12.7 | 22.1 | - |
| Tyrrell | 2.6 | 21.1 | 28.7 | 41.7 | 22.0 | 26.8 | 41.7 | 25.7 | 27.5 | 51.7 |
| Union | 3.0 | 10.3 | 34.0 | 46.1 | 11.1 | 37.8 | 44.6 | 14.2 | 37.8 | 56.7 |
| Vance | 6.3 | 22.7 | 26.4 | 35.9 | 23.2 | 25.9 | 35.9 | 31.0 | 30.7 | 44.6 |
| Wake | 3.6 | 16.0 | 25.4 | 17.4 | 16.6 | 24.8 | 18.0 | 21.7 | 20.3 | 22.2 |
| Warren | 3.3 | 17.6 | 18.9 | 21.8 | 18.2 | 17.5 | 22.0 | 26.9 | 21.4 | 27.2 |
| Washington | 3.9 | 22.1 | 23.6 | 46.4 | 23.6 | 24.6 | 47.6 | 30.6 | 28.5 | 57.6 |
| Watauga | 3.2 | 9.4 | 13.8 | 69.7 | 11.2 | 15.6 | 69.7 | 15.4 | 18.9 | 71.1 |
| Wayne | 3.1 | 22.1 | 41.5 | 39.8 | 23.5 | 42.1 | 39.8 | 29.2 | 45.9 | 45.0 |
| Wilkes | 2.8 | 9.2 | 17.5 | 27.2 | 9.8 | 17.4 | 27.3 | 13.9 | 18.3 | 28.6 |
| Wilson | 4.4 | 24.1 | 32.2 | 35.3 | 24.4 | 31.4 | 35.4 | 31.1 | 29.7 | 50.8 |
| Yadkin | 5.8 | 26.9 | 28.5 | 45.8 | 30.1 | 35.0 | 45.8 | 39.2 | 32.7 | 49.7 |
| Yancey | 4.3 | 14.4 | 32.2 | 57.9 | 16.5 | 34.4 | 57.9 | 20.8 | 31.5 | 60.0 |
| State | 0.3 | 1.7 | 2.3 | 3.7 | 1.7 | 2.4 | 3.7 | 2.2 | 2.5 | 4.2 |

A dash (-) indicates no sample for the cell.
${ }^{a}$ By random-sampling formula.

## Definitions

Afforestation. Area of land previously classified as nonforest that is converted to forest by planting trees or by natural reversion to forest.

Average annual mortality. Average annual volume of trees 5.0 inches d.b.h. and larger that died from natural causes during the intersurvey period.

Average annual removals. Average annual volume of trees 5.0 inches d.b.h. and larger removed from the inventory by harvesting, cultural operations (such as timber-stand improvement), land clearing, or changes in land use during the intersurvey period.

Average net annual growth. Average annual net change in volume of trees 5.0 inches d.b.h. and larger in the absence of cutting (gross growth minus mortality) during the intersurvey period.

Basal area. The area in square feet of the cross section at breast height of a single tree or of all the trees in a stand, usually expressed in square feet per acre.

Biomass. The aboveground fresh weight of solid wood and bark in live trees 1.0 inch d.b.h. and larger from the ground to the tip of the tree. All foliage is excluded. The weight of wood and bark in lateral limbs, secondary limbs, and twigs under 0.5 inch in diameter at the point of occurrence on sapling-size trees is included but is excluded on poletimber and sawtimber-size trees.

Bole. That portion of a tree between a 1 -foot stump and a 4-inch top d.o.b. in trees 5.0 inches d.b.h. and larger.

Census water. Streams, sloughs, estuaries, canals, and other moving bodies of water 200 feet wide and greater, and lakes, reservoirs, ponds, and other permanent bodies of water 4.5 acres in area and greater.

Commercial species. Tree species currently or potentially suitable for industrial wood products.
D.b.h. Tree diameter in inches (outside bark) at breast height (4.5 feet aboveground).

Diameter class. A classification of trees based on tree d.b.h. Two-inch diameter classes are commonly used by Forest Inventory and Analysis, with the even inch as the approximate midpoint for a class. For example, the 6 -inch class includes trees 5.0 through 6.9 inches d.b.h.
D.o.b. (diameter outside bark). Stem diameter including bark.

Forest land. Land at least 10 percent stocked by forest trees of any size, or formerly having had such tree cover, and not currently developed for nonforest use. The minimum area considered for classification is 1 acre. Forested strips must be at least 120 feet wide.

Forest management type. A classification of timberland based on forest type and stand origin.

Pine plantation. Stands that (a) have been artificially regenerated by planting or direct seeding, (b) are classed as a pine or other softwood forest type, and (c) have at least 10 percent stocking.

Natural pine. Stands that (a) have not been artificially regenerated, (b) are classed as a pine or other softwood forest type, and (c) have at least 10 percent stocking.

Oak-pine. Stands that have at least 10 percent stocking and classed as a forest type of oak-pine.

Upland hardwood. Stands that have at least 10 percent stocking and classed as an oak-hickory or maple-beechbirch forest type.

Lowland hardwood. Stands that have at least 10 percent stocking with a forest type of oak-gum-cypress, elm-ashcottonwood, palm, or other tropical.

Nonstocked stands. Stands less than 10 percent stocked with live trees.

Forest type. A classification of forest land based on the species forming a plurality of live-tree stocking. Major eastern forest-type groups are:

White-red-jack pine. Forests in which eastern whitepine, red pine, or jack pine, singly or in combination, constitute a plurality of the stocking. (Common associates include hemlock, birch, and maple).

Spruce-fir. Forests in which spruce or true firs, singly or in combination, constitute a plurality of the stocking. (Common associates include maple, birch, and hemlock).

Longleaf-slash pine. Forests in which longleaf or slash pine, singly or in combination, constitute a plurality of the stocking. (Common associates include oak, hickory, and gum).

Loblolly-shortleaf pine. Forests in which loblolly pine, shortleaf pine, or other southern yellow pines, except longleaf or slash pine, singly or in combination, constitute a plurality of the stocking. (Common associates include oak, hickory, and gum).

Oak-pine. Forests in which hardwoods (usually upland oaks) constitute a plurality of the stocking but in which pines account for 25 to 50 percent of the stocking. (Common associates include gum, hickory, and yellow-poplar).

Oak-hickory. Forests in which upland oaks or hickory, singly or in combination, constitute a plurality of the stocking, except where pines account for 25 to 50 percent, in which case the stand would be classified oak-pine. (Common associates include yellow-poplar, elm, maple, and black walnut).

Oak-gum-cypress. Bottom-land forests in which tupelo, blackgum, sweetgum, oaks, or southern cypress, singly or in combination, constitute a plurality of the stocking, except where pines account for 25 to 50 percent, in which case the stand would be classified oak-pine. (Common associates include cottonwood, willow, ash, elm, hack berry, and maple).

Elm-ash-cottonwood. Forests in which elm, ash, or cottonwood, singly or in combination, constitute a plurality of the stocking. (Common associates include willow, sycamore, beech, and maple).

Maple-beech-birch. Forests in which maple, beech, or yellow birch, singly or in combination, constitute a plurality of the stocking. (Common associates include hemlock, elm, basswood, and white pine).

Nonstocked stands. Stands less than 10 percent stocked with live trees.

Forested tract size. The area of forest within the contiguous tract containing each Forest Inventory and Analysis sample plot.

Fresh weight. Mass of tree component at time of cutting.
Gross growth. Annual increase in volume of trees 5.0 inches d.b.h. and larger in the absence of cutting and mortality. (Gross growth includes survivor growth, ingrowth, growth on ingrowth, growth on removals before removal, and growth on mortality before death).

Growing-stock trees. Living trees of commercial species classified as sawtimber, poletimber, saplings, and seedlings.

Trees must contain at least one 12 -foot or two 8 -foot logs in the saw-log portion, currently or potentially (if too small to qualify), to be classed as growing stock. The $\log (s)$ must meet dimension and merchantability standards to qualify. Trees must also have, currently or potentially, one-third of the gross board-foot volume in sound wood.

Growing-stock volume. The cubic-foot volume of sound wood in growing-stock trees at least 5.0 inches d.b.h. from a 1-foot stump to a minimum 4.0-inch top d.o.b. of the central stem.

Hardwoods. Dicotyledonous trees, usually broadleaf and deciduous.

Soft hardwoods. Hardwood species with an average specific gravity of 0.50 or less, such as gums, yellowpoplar, cottonwoods, red maple, basswoods, and willows.

Hard hardwoods. Hardwood species with an average specific gravity greater than 0.50 such as oaks, hard maples, hickories, and beech.

Industrial wood. All roundwood products except fuelwood.
Land area. The area of dry land and land temporarily or partly covered by water, such as marshes, swamps, and river floodplains (omitting tidal flats below mean high tide), streams, sloughs, estuaries, and canals less than 200 feet wide, and lakes, reservoirs, and ponds less than 4.5 acres in area.

Live trees. All living trees. All size classes, all tree classes, and both commercial and noncommercial species are included.

Log grade. A classification of logs based on external characteristics indicating quality or value.

Logging residues. The unused merchantable portion of growing-stock trees cut or destroyed during logging operations.

Net annual change. Increase or decrease in volume of live trees at least 5.0 inches d.b.h. Net annual change is equal to net annual growth minus average annual removals.

Noncommercial species. Tree species of typically small size, poor form, or inferior quality that normally do not develop into trees suitable for industrial wood products.

Nonforest land. Land that has never supported forests and land formerly forested where timber production is precluded by development for other uses.

Nonstocked stands. Stands less than 10 percent stocked with live trees.

Other forest land. Forest land other than timberland and productive reserved forest land. It includes available and reserved forest land which is incapable of producing annually 20 cubic feet per acre of industrial wood under natural conditions, because of adverse site conditions such as sterile soils, dry climate, poor drainage, high elevation, steepness, or rockiness.

Other removals. The growing-stock volume of trees removed from the inventory by cultural operations such as timber stand improvement, land clearing, and other changes in land use, resulting in the removal of the trees from timberland.

Ownership. The property owned by one ownership unit, including all parcels of land in the United States.

National forest land. Federal land that has been legally designated as national forests or purchase units, and other land under the administration of the Forest Service, including experimental areas and Bankhead-Jones Title III land.

Forest industry land. Land owned by companies or individuals operating primary wood-using plants.

Nonindustrial private forest (NIPF) land. Privately owned land excluding forest industry land.

Corporate. Owned by corporations, including incorporated farm ownerships.

Individual. All lands owned by individuals, including farm operators.

Other public. An ownership class that includes all public lands except national forests.

Miscellaneous Federal land. Federal land other than national forests.

State, county, and municipal land. Land owned by States, counties, and local public agencies or municipalities or land leased to these governmental units for 50 years or more.

Plant residues. Wood material generated in the production of timber products at primary manufacturing plants.

Coarse residues. Material, such as slabs, edgings, trim, veneer cores and ends, suitable for chipping.

Fine residues. Material, such as sawdust, shavings, and veneer chippings, not suitable for chipping.

Plant byproducts. Residues (coarse or fine) used in the manufacture of industrial products or for consumer use or as fuel.

Unused plant residues. Residues (coarse or fine) not used for any product, including fuel.

Poletimber-size trees. Softwoods 5.0 to 8.9 inches d.b.h. and hardwoods 5.0 to 10.9 inches d.b.h.

Primary wood-using plants. Industries receiving roundwood or chips from roundwood for the manufacture of products, such as veneer, pulp, and lumber.

Productive-reserved forest land. Forest land sufficiently productive to qualify as timberland but withdrawn from timber utilization through statute or administrative regulation.

Reforestation. Area of land previously classified as forest that is regenerated by planting trees or natural regeneration.

Rotten trees. Live trees of commercial species not containing at least one 12 -foot saw log, or two noncontiguous saw logs, each 8 feet or longer, now or prospectively, primarily because of rot or missing sections, and with less than one-third of the gross board-foot tree volume in sound material.

Rough trees. Live trees of commercial species not containing at least one 12 -foot saw log, or two noncontiguous saw logs, each 8 feet or longer, now or prospectively, primarily because of roughness, poor form, splits, and cracks, and with less than one-third of the gross board-foot tree volume in sound material; and live trees of noncommercial species.

Roundwood (roundwood logs). Logs, bolts, or other round sections cut from trees for industrial or consumer uses.

Roundwood chipped. Any timber cut primarily for pulpwood, delivered to nonpulpmills, chipped, and then sold to pulpmills as residues, including chipped tops, jump sections, whole trees, and pulpwood sticks.

Roundwood products. Any primary product such as lumber, poles, pilings, pulp, or fuelwood, that is produced from roundwood.

Salvable dead trees. Standing or downed dead trees that were formerly growing stock and considered merchantable. Trees must be at least 5.0 inches d.b.h. to qualify.

Saplings. Live trees 1.0 to 5.0 inches d.b.h.

Saw log. A log meeting minimum standards of diameter, length, and defect, including logs at least 8 feet long, sound and straight, with a minimum diameter inside bark for softwoods of 6 inches ( 8 inches for hardwoods).

Saw-log portion. The part of the bole of sawtimber trees between a 1 -foot stump and the saw-log top.

Saw-log top. The point on the bole of sawtimber trees above which a conventional saw log cannot be produced. The minimum saw-log top is 7.0 inches d.o.b. for softwoods and 9.0 inches d.o.b. for hardwoods.

Sawtimber-size trees. Softwoods 9.0 inches d.b.h. and larger and hardwoods 11.0 inches d.b.h. and larger.

Sawtimber volume. Growing-stock volume in the saw-log portion of sawtimber-size trees in board feet (International 1/4-inch rule).

Seedlings. Trees less than 1.0 inch d.b.h. and greater than 1 foot tall for hardwoods, greater than 6 inches tall for softwood, and greater than 0.5 inch in diameter at ground level for longleaf pine.

Select red oaks. A group of several red oak species composed of cherrybark, Shumard, and northern red oaks. Other red oak species are included in the "other red oaks" group.

Select white oaks. A group of several white oak species composed of white, swamp chestnut, swamp white, chinkapin, Durand, and bur oaks. Other white oak species are included in the "other white oaks" group.

Site class. A classification of forest land in terms of potential capacity to grow crops of industrial wood based on fully stocked natural stands.

Softwoods. Coniferous trees, usually evergreen, having leaves that are needles or scalelike.

Yellow pines. Loblolly, longleaf, slash, pond, shortleaf, pitch, Virginia, sand, spruce, and Table Mountain pines.

Other softwoods. Cypress, eastern redcedar, white-cedar, eastern white pine, eastern hemlock, spruce, and fir.

Stand age. The average age of dominant and codominant trees in the stand.

Stand origin. A classification of forest stands describing their means of origin.

Planted. Planted or artificially seeded.
Natural. No evidence of artificial regeneration.
Stand-size class. A classification of forest land based on the diameter class distribution of live trees in the stand.

Sawtimber stands. Stands at least 10 percent stocked with live trees, with half or more of total stocking in sawtimber and poletimber trees, and with sawtimber stocking at least equal to poletimber stocking.

Poletimber stands. Stands at least 10 percent stocked with live trees, of which half or more of total stocking is in poletimber and sawtimber trees, and with poletimber stocking exceeding that of sawtimber.

Sapling-seedling stands. Stands at least 10 percent stocked with live trees of which more than half of total stocking is saplings and seedlings.

Nonstocked stands. Stands less than 10 percent stocked with live trees.

Stocking. The degree of occupancy of land by trees, measured by basal area or the number of trees in a stand and spacing in the stand, compared with a minimum standard, depending on tree size, required to fully utilize the growth potential of the land.

Density of trees and basal area per acre required for full stocking

| D.b.h. <br> class | Trees per acre <br> for full stocking | Basal area <br> per acre |
| :--- | :---: | :---: |
| Seedlings | 600 | - |
| 2 | 560 | - |
| 4 | 460 | - |
| 6 | 340 | 67 |
| 8 | 240 | 84 |
| 10 | 155 | 85 |
| 12 | 115 | 90 |
| 14 | 90 | 96 |
| 16 | 72 | 101 |
| 18 | 60 | 106 |
| 20 | 51 | 111 |

Timberland. Forest land capable of producing 20 cubic feet of industrial wood per acre per year and not withdrawn from timber utilization.

Timber products. Roundwood products and byproducts.

Tree. Woody plants having one erect perennial stem or trunk at least 3 inches d.b.h., a more or less definitely formed crown of foliage, and a height of at least 13 feet (at maturity).

Tree grade. A classification of the saw-log portion of sawtimber trees based on: (1) the grade of the butt $\log$ or (2) the ability to produce at least one 12 -foot or two 8 -foot logs in the upper section of the saw-log portion. Tree grade is an indicator of quality; grade 1 is the best quality.

Upper-stem portion. The part of the main stem or fork of sawtimber trees above the saw-log top to minimum top diameter 4.0 inches outside bark or to the point where the main stem or fork breaks into limbs.

Volume of live trees. The cubic-foot volume of sound wood in live trees at least 5.0 inches d.b.h. from a 1-foot stump to a minimum 4.0-inch top d.o.b. of the central stem.

Volume of saw-log portion of sawtimber trees. The cubic-foot volume of sound wood in the saw-log portion of saw-timber trees. Volume is the net result after deductions for rot, sweep, and other defects that affect use for lumber.

## Metric Equivalents

1 acre $=4,046.86$ square meters or 0.404686 hectare
1 cubic foot $=0.028317$ cubic meter
1 inch $=2.54$ centimeters or 0.0254 meter
Breast height $=1.4$ meters above the ground
1 square foot $=929.03$ square centimeters or 0.0929 square meter
1 square foot per acre basal area $=0.229568$ square meter per hectare
1 pound $=0.454$ kilogram
1 ton $=0.907$ metric ton

## Graphs


17.7 Million acres

Figure 2—Distribution of timberland by ownership class, North Carolina, 2002.


Figure 3—Area of timberland by forest-type group and stand origin, North Carolina, 1990 and 2002.


Figure 4-Area of timberland by stand-size class and stand origin, North Carolina, 1990 and 2002.


Figure 5-Volume of live trees on timberland by species group and stand origin, North Carolina, 1990 and 2002.

11.4 Billion cubic feet

Figure 6-Distribution of softwood live-tree volume by ownership class, North Carolina, 2002.

21.6 Billion cubic feet

Figure 7-Distribution of hardwood live-tree volume by ownership class, North Carolina, 2002.


Figure 8-Volume of softwood live trees on timberland by diameter class, North Carolina, 1990 and 2002.


Figure 9—Volume of hardwood live trees on timberland by diameter class, North Carolina, 1990 and 2002.


Figure 10-Average net annual growth and removals of live trees on timberland by species group and stand origin, North Carolina, 1984-1989 and 1990-2001.

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| Core <br> table | Corresponding table <br> number in this report | Core <br> table | Corresponding table <br> number in this report |
| :--- | :---: | :---: | :---: |
| 1 | 1 | 14 | 22 |
| 2 | 3 | 15 | 24,26 |
| 3 | 4 | 16 | 27 |
| 4 | 5 | 17 | 28 |
| 5 | 6 | 18 | 32,34 |
| 6 | 7 | 19 | 35,37 |
| 7 | 8 | 20 | 38 |
| 8 | 10 | 21 | 38 |
| 9 | 11 | 22 | 40 |
| 10 | 18 | 23 | 41 |
| 11 | 20 | 24 | 43 |
| 12 | 21 | 25 | 23 |
| 13 |  |  |  |

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Table 1—Land area by county and land class, North Carolina, 2002

| County | Total land area ${ }^{a}$ | Forest land |  |  |  | Other <br> land ${ }^{b}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Total forest | Timberland | Productive reserved | Other |  |
|  | Thousand acres |  |  |  |  |  |
| Alamance | 275.6 | 129.8 | 129.8 | - | - | 145.9 |
| Alexander | 166.6 | 87.8 | 87.7 | 0.0 | - | 78.9 |
| Alleghany | 150.2 | 77.0 | 68.1 | 8.8 | - | 73.2 |
| Anson | 340.2 | 257.6 | 257.6 | - | - | 82.6 |
| Ashe | 272.7 | 169.2 | 166.6 | 2.6 | - | 103.5 |
| Avery | 158.1 | 137.2 | 132.8 | 4.4 | - | 20.9 |
| Beaufort | 529.7 | 277.3 | 271.6 | 1.6 | 4.1 | 252.4 |
| Bertie | 447.5 | 304.9 | 304.9 | - | - | 142.7 |
| Bladen | 560.0 | 393.1 | 390.2 | 2.9 | - | 166.9 |
| Brunswick | 547.1 | 422.0 | 422.0 | - | - | 125.1 |
| Buncombe | 420.0 | 263.6 | 258.0 | 5.6 | - | 156.4 |
| Burke | 324.3 | 215.7 | 188.6 | 27.1 | - | 108.6 |
| Cabarrus | 233.2 | 86.6 | 86.6 | - | - | 146.6 |
| Caldwell | 301.9 | 226.9 | 226.8 | 0.2 | - | 74.9 |
| Camden | 154.0 | 70.7 | 56.3 | 14.4 | - | 83.3 |
| Carteret | 340.1 | 154.0 | 141.6 | 12.4 | - | 186.1 |
| Caswell | 272.5 | 181.8 | 181.8 | - | - | 90.6 |
| Catawba | 256.0 | 119.5 | 119.5 | - | - | 136.5 |
| Chatham | 437.2 | 288.4 | 284.4 | 3.9 | - | 148.8 |
| Cherokee | 291.3 | 239.7 | 239.4 | 0.3 | - | 51.6 |
| Chowan | 110.5 | 44.6 | 44.6 | - | - | 65.9 |
| Clay | 137.4 | 101.2 | 94.0 | 7.1 | - | 36.2 |
| Cleveland | 297.2 | 133.7 | 133.7 | - | - | 163.4 |
| Columbus | 599.6 | 395.1 | 393.4 | 1.8 | - | 204.4 |
| Craven | 445.2 | 291.6 | 275.1 | 11.2 | 5.3 | 153.6 |
| Cumberland | 418.0 | 200.0 | 197.7 | 2.3 | - | 218.0 |
| Currituck | 167.5 | 51.6 | 51.6 | - | - | 115.9 |
| Dare | 244.3 | 131.6 | 120.6 | 0.8 | 10.2 | 112.7 |
| Davidson | 353.4 | 196.5 | 196.4 | 0.1 | - | 156.9 |
| Davie | 169.7 | 70.4 | 70.4 | - | - | 99.4 |
| Duplin | 523.4 | 279.9 | 279.9 | - | - | 243.5 |
| Durham | 186.0 | 84.0 | 82.1 | 1.9 | - | 102.0 |
| Edgecombe | 323.2 | 173.6 | 173.6 | - | - | 149.6 |
| Forsyth | 262.2 | 88.0 | 88.0 | - | - | 174.2 |
| Franklin | 314.6 | 192.3 | 192.3 | - | - | 122.4 |
| Gaston | 228.2 | 98.2 | 95.2 | 3.0 | - | 130.0 |
| Gates | 218.0 | 142.4 | 133.9 | 8.4 | - | 75.6 |
| Graham | 186.9 | 167.8 | 154.5 | 13.3 | - | 19.2 |
| Granville | 339.9 | 188.4 | 188.2 | 0.3 | - | 151.5 |
| Greene | 169.9 | 65.8 | 65.8 | - | - | 104.1 |
| Guilford | 416.1 | 170.3 | 170.2 | 0.1 | - | 245.8 |
| Halifax | 464.3 | 254.9 | 252.5 | 2.4 | - | 209.4 |
| Harnett | 380.8 | 210.0 | 206.4 | 3.5 | - | 170.9 |
| Haywood | 354.5 | 282.5 | 194.8 | 87.7 | - | 72.0 |
| Henderson | 239.3 | 118.6 | 118.0 | 0.6 | - | 120.6 |
| Hertford | 226.3 | 136.4 | 136.4 | - | - | 90.0 |
| Hoke | 250.4 | 171.0 | 171.0 | - | - | 79.4 |
| Hyde | 392.2 | 235.8 | 230.6 | - | 5.2 | 156.4 |
| Iredell | 367.6 | 135.9 | 134.4 | 1.5 | - | 231.7 |
| Jackson | 314.0 | 247.0 | 239.5 | 7.6 | - | 66.9 |
| Johnston | 506.9 | 244.7 | 244.7 | - | - | 262.2 |
| Jones | 302.9 | 219.1 | 209.9 | 9.2 | - | 83.8 |

Table 1—Land area by county and land class, North Carolina, 2002 (continued)

| County | Total land area ${ }^{a}$ | Forest land |  |  |  | Other <br> land ${ }^{b}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Total forest | Timberland | Productiv reserved | Other |  |
|  |  | Thousand acres |  |  |  |  |
| Lee | 164.7 | 107.6 | 107.6 | - | - | 57.0 |
| Lenoir | 255.9 | 101.7 | 101.7 | - | - | 154.2 |
| Lincoln | 191.2 | 76.4 | 76.4 | 0.0 | - | 114.8 |
| Macon | 330.5 | 259.8 | 245.3 | 7.3 | 7.3 | 70.7 |
| Madison | 287.6 | 227.7 | 227.7 | - | - | 59.9 |
| Martin | 296.1 | 177.2 | 177.2 | - | - | 118.8 |
| McDowell | 282.7 | 233.3 | 231.5 | 1.8 | - | 49.3 |
| Mecklenburg | 337.5 | 85.8 | 85.8 | - | - | 251.7 |
| Mitchell | 141.7 | 115.0 | 114.4 | 0.6 | - | 26.8 |
| Montgomery | 314.3 | 256.1 | 255.8 | 0.2 | - | 58.2 |
| Moore | 447.2 | 342.2 | 341.3 | 0.9 | - | 105.0 |
| Nash | 345.8 | 199.2 | 199.2 | - | - | 146.6 |
| New Hanover | 127.3 | 52.2 | 51.8 | 0.4 | - | 75.1 |
| Northampton | 343.1 | 188.0 | 188.0 | - | - | 155.1 |
| Onslow | 490.8 | 326.1 | 326.1 | 0.0 | - | 164.7 |
| Orange | 255.9 | 152.2 | 150.4 | 1.8 | - | 103.7 |
| Pamlico | 215.6 | 106.9 | 106.9 | - | - | 108.8 |
| Pasquotank | 145.2 | 41.0 | 41.0 | - | - | 104.2 |
| Pender | 557.3 | 420.8 | 420.7 | 0.1 | - | 136.5 |
| Perquimans | 158.2 | 67.7 | 67.7 | - | - | 90.5 |
| Person | 251.1 | 145.4 | 145.4 | - | - | 105.7 |
| Pitt | 417.0 | 181.9 | 181.9 | - | - | 235.1 |
| Polk | 152.2 | 98.7 | 98.7 | - | - | 53.6 |
| Randolph | 504.0 | 310.7 | 304.6 | 6.2 | - | 193.2 |
| Richmond | 303.4 | 233.6 | 233.6 | - | - | 69.8 |
| Robeson | 607.3 | 277.2 | 273.3 | 3.9 | - | 330.1 |
| Rockingham | 362.5 | 215.5 | 215.5 | - | - | 147.0 |
| Rowan | 327.3 | 125.3 | 125.3 | - | - | 202.0 |
| Rutherford | 361.1 | 235.1 | 235.1 | - | - | 126.0 |
| Sampson | 605.1 | 334.2 | 334.2 | - | - | 270.9 |
| Scotland | 204.3 | 137.6 | 137.0 | 0.6 | - | 66.7 |
| Stanly | 248.2 | 105.7 | 105.7 | - | - | 142.4 |
| Stokes | 289.2 | 187.6 | 181.1 | 6.5 | - | 101.6 |
| Surry | 343.4 | 187.1 | 182.8 | 4.3 | - | 156.3 |
| Swain | 338.0 | 301.2 | 87.9 | 213.3 | - | 36.8 |
| Transylvania | 242.2 | 206.8 | 199.3 | 7.6 | - | 35.3 |
| Tyrrell | 249.6 | 153.4 | 147.5 | 5.8 | - | 96.2 |
| Union | 407.9 | 146.2 | 146.2 | - | - | 261.8 |
| Vance | 162.3 | 88.2 | 86.2 | 2.1 | - | 74.0 |
| Wake | 533.7 | 177.3 | 167.5 | 9.8 | - | 356.4 |
| Warren | 274.4 | 218.5 | 218.5 | - | - | 55.9 |
| Washington | 222.6 | 84.2 | 83.2 | 1.0 | - | 138.4 |
| Watauga | 200.0 | 137.5 | 128.7 | 8.8 | - | 62.5 |
| Wayne | 353.7 | 142.4 | 141.6 | 0.9 | - | 211.2 |
| Wilkes | 484.6 | 328.8 | 312.2 | 16.6 | - | 155.8 |
| Wilson | 237.5 | 111.6 | 111.6 | - | - | 125.9 |
| Yadkin | 214.8 | 82.2 | 81.9 | 0.3 | - | 132.6 |
| Yancey | 200.0 | 151.9 | 147.8 | 4.1 | - | 48.1 |
| Total | 31,174.9 | 18,268.7 | 17,684.4 | 552.1 | 32.1 | 12,906.2 |

[^1]Table 2—Area of forest land by forest-type group and ownership class, North Carolina, 2002

| Forest-type group | All classes | Ownership class |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | National forest | Miscellaneous Federal | State | County and municipal | Forest industry | Nonindustrial private |
|  | Thousand acres |  |  |  |  |  |  |
| White-red-jack pine | 243.9 | 44.9 | 1.7 | 4.8 | - | - | 192.5 |
| Spruce-fir | 41.1 | 9.2 | 25.4 | - | - | - | 6.4 |
| Longleaf-slash pine | 242.5 | 2.5 | 68.6 | 47.1 | - | 12.2 | 112.0 |
| Loblolly-shortleaf pine | 4,498.3 | 77.2 | 173.0 | 110.3 | 42.2 | 874.1 | 3,221.5 |
| Oak-pine | 3,110.7 | 144.5 | 89.8 | 134.5 | 19.3 | 240.1 | 2,482.6 |
| Oak-hickory | 7,705.0 | 890.8 | 327.9 | 154.7 | 109.6 | 136.0 | 6,086.0 |
| Oak-gum-cypress | 2,050.0 | 17.9 | 205.2 | 130.8 | 7.7 | 201.8 | 1,486.4 |
| Elm-ash-cottonwood | 166.7 | - | 4.2 | - | 13.1 | 12.8 | 136.5 |
| Maple-beech-birch | 149.4 | 46.1 | 24.3 | - | - | - | 79.0 |
| Nonstocked | 61.2 | - | 4.2 | - | - | 25.7 | 31.2 |
| Total | 18,268.7 | 1,233.0 | 924.4 | 582.2 | 192.0 | 1,502.7 | 13,834.4 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 3—Area of timberland by county and ownership class, North Carolina, 2002

| County | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Ownership class |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | National | Miscellaneous |  | County and |  | Nonindu | l private |
|  |  | forest | Federal | State | municipal | industry | Corporate | Individual |
|  | Thousand acres |  |  |  |  |  |  |  |
| Alamance | 129.8 | - | - | - | 4.5 | - | 1.2 | 124.0 |
| Alexander | 87.7 | - | - | - | - | 4.7 | 7.0 | 76.1 |
| Alleghany | 68.1 | - | - | - | - | - | 6.2 | 61.9 |
| Anson | 257.6 | - | 13.8 | - | - | 32.7 | 30.5 | 180.7 |
| Ashe | 166.6 | 0.3 | - | 5.9 | - | - | 17.8 | 142.6 |
| Avery | 132.8 | 27.8 | - | - | - | - | 36.1 | 68.9 |
| Beaufort | 271.6 | - | - | 0.2 | - | 106.8 | 42.2 | 122.4 |
| Bertie | 304.9 | - | 18.0 | - | - | 55.3 | 76.2 | 155.3 |
| Bladen | 390.2 | - | - | 29.1 | - | 36.4 | 163.7 | 161.1 |
| Brunswick | 422.0 | - | 10.4 | - | - | 157.1 | 90.8 | 163.7 |
| Buncombe | 258.0 | 31.3 | - | - | 36.8 | - | 27.2 | 162.7 |
| Burke | 188.6 | 35.7 | - | 12.1 | - | - | 33.9 | 106.9 |
| Cabarrus | 86.6 | - | - | - | - | - | 12.6 | 74.1 |
| Caldwell | 226.8 | 49.3 | - | - | - | - | 20.6 | 156.9 |
| Camden | 56.3 | - | 4.1 | - | - | 4.1 | 8.2 | 39.9 |
| Carteret | 141.6 | 44.1 | 0.9 | - | - | 32.6 | 27.2 | 36.8 |
| Caswell | 181.8 | - | - | 15.3 | - | - | 10.9 | 155.6 |
| Catawba | 119.5 | - | - | - | - | - | 12.0 | 107.5 |
| Chatham | 284.4 | - | 8.7 | 1.5 | - | 22.5 | 22.8 | 228.9 |
| Cherokee | 239.4 | 92.4 | - | - | - | - | 18.8 | 128.2 |
| Chowan | 44.6 | - | - | - | - | 6.7 | 7.0 | 30.9 |
| Clay | 94.0 | 58.3 | - | - | - | - | 5.4 | 30.4 |
| Cleveland | 133.7 | - | - | 5.7 | - | - | 14.7 | 113.3 |
| Columbus | 393.4 | - | - | - | - | 134.7 | 29.4 | 229.3 |
| Craven | 275.1 | 48.6 | 18.6 | - | 2.6 | 117.3 | 15.0 | 72.9 |
| Cumberland | 197.7 | - | 16.5 | 5.9 | 4.7 | 9.4 | 18.8 | 142.3 |
| Currituck | 51.6 | - | 4.4 | 17.6 | 4.4 | - | 8.8 | 16.5 |
| Dare | 120.6 | - | 106.7 | - | - | - | - | 13.9 |
| Davidson | 196.4 | 1.0 | - | - | 5.8 | 11.7 | 15.3 | 162.6 |
| Davie | 70.4 | - | - | - | - | - | 13.3 | 57.0 |
| Duplin | 279.9 | - | - | 5.5 | 7.7 | 16.6 | 58.6 | 191.5 |
| Durham | 82.1 | - | 5.3 | 5.3 | 5.3 | - | 9.3 | 56.9 |
| Edgecombe | 173.6 | - | - | - | - | 14.1 | 14.5 | 145.1 |
| Forsyth | 88.0 | - | - | - | 4.5 | - | 4.3 | 79.2 |
| Franklin | 192.3 | - | - | - | - | 5.7 | - | 186.5 |
| Gaston | 95.2 | - | - | - | - | - | 18.2 | 77.0 |
| Gates | 133.9 | - | 4.4 | 1.2 | - | 8.7 | 48.8 | 70.8 |
| Graham | 154.5 | 98.2 | - | - | - | - | 3.3 | 53.0 |
| Granville | 188.2 | - | 5.1 | 3.8 | 5.1 | - | 10.2 | 164.0 |
| Greene | 65.8 | - | - | - | - | - | - | 65.8 |
| Guilford | 170.2 | - | - | 3.2 | 14.1 | - | 35.4 | 117.5 |
| Halifax | 252.5 | - | - | 3.4 | - | 48.3 | 13.8 | 187.0 |
| Harnett | 206.4 | - | 5.3 | 1.3 | - | 5.3 | 27.8 | 166.7 |
| Haywood | 194.8 | 41.1 | - | 6.0 | 4.8 | - | 22.9 | 120.0 |
| Henderson | 118.0 | 17.1 | - | 9.3 | - | - | 10.9 | 80.6 |
| Hertford | 136.4 | - | - | 2.6 | 1.3 | 10.3 | 30.7 | 91.5 |
| Hoke | 171.0 | - | 87.0 | 4.4 | 2.5 | - | 15.7 | 61.3 |
| Hyde | 230.6 | - | 64.1 | 5.2 | - | 35.3 | 28.8 | 97.1 |
| Iredell | 134.4 | - | - | - | - | - | 17.4 | 117.0 |
| Jackson | 239.5 | 71.0 | - | - | 3.1 | - | 57.7 | 107.6 |
| Johnston | 244.7 | - | - | - | - | 4.5 | 34.4 | 205.7 |
| Jones | 209.9 | 28.4 | - | 23.8 | - | 48.8 | 15.8 | 93.0 |

Table 3—Area of timberland by county and ownership class, North Carolina, 2002 (continued)

| County | All classes | Ownership class |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | National | Miscellaneous |  | County and | Forest | Nonindus | l private |
|  |  | forest | Federal | State | municipal | industry | Corporate | Individual |
|  | Thousand acres |  |  |  |  |  |  |  |
| Lee | 107.6 | - | - | - | 5.1 | - | 15.2 | 87.4 |
| Lenoir | 101.7 | - | - | - | - | 8.5 | 4.3 | 88.9 |
| Lincoln | 76.4 | - | - | - | - | - | 11.6 | 64.8 |
| Macon | 245.3 | 142.7 | - | - | - | - | 12.4 | 90.2 |
| Madison | 227.7 | 54.7 | - | - | - | - | 6.0 | 167.0 |
| Martin | 177.2 | - | - | 17.1 | - | 42.7 | 30.0 | 87.4 |
| McDowell | 231.5 | 67.9 | - | - | - | 12.4 | 49.6 | 101.5 |
| Mecklenburg | 85.8 | - | - | - | 19.1 | - | 22.6 | 44.1 |
| Mitchell | 114.4 | 18.4 | - | - | - | 7.4 | 29.8 | 58.8 |
| Montgomery | 255.8 | 35.5 | - | 6.3 | - | 9.1 | 41.0 | 164.0 |
| Moore | 341.3 | - | 10.0 | 15.0 | 5.0 | 62.6 | 21.0 | 227.7 |
| Nash | 199.2 | - | - | - | 2.2 | 12.5 | 30.6 | 153.9 |
| New Hanover | 51.8 | - | - | 5.0 | 0.5 | - | 19.2 | 27.0 |
| Northampton | 188.0 | - | - | - | - | 26.3 | 21.9 | 139.9 |
| Onslow | 326.1 | - | 98.4 | 42.7 | 23.3 | 16.8 | 43.8 | 101.0 |
| Orange | 150.4 | - | - | 13.7 | - | - | 6.9 | 129.8 |
| Pamlico | 106.9 | - | - | 5.0 | - | 14.9 | 23.1 | 63.9 |
| Pasquotank | 41.0 | - | 5.3 | - | - | 13.6 | 5.3 | 16.8 |
| Pender | 420.7 | - | - | 42.3 | - | 118.4 | 39.4 | 220.7 |
| Perquimans | 67.7 | - | - | - | - | 10.3 | 9.9 | 47.5 |
| Person | 145.4 | - | - | - | - | - | 26.7 | 118.7 |
| Pitt | 181.9 | - | - | - | - | 39.2 | 23.4 | 119.3 |
| Polk | 98.7 | - | - | 8.0 | - | - | 31.1 | 59.5 |
| Randolph | 304.6 | 4.3 | 6.5 | - | 4.9 | - | 28.7 | 260.2 |
| Richmond | 233.6 | - | 4.7 | 18.8 | 3.5 | 55.5 | 17.7 | 133.3 |
| Robeson | 273.3 | - | - | - | - | 20.9 | 44.7 | 207.8 |
| Rockingham | 215.5 | - | - | - | - | 0.3 | 12.0 | 203.3 |
| Rowan | 125.3 | - | - | - | 6.5 | - | 8.4 | 110.4 |
| Rutherford | 235.1 | - | - | 12.9 | - | 6.5 | 54.4 | 161.3 |
| Sampson | 334.2 | - | - | 6.1 | - | 12.1 | 78.9 | 237.1 |
| Scotland | 137.0 | - | - | 21.9 | - | 5.1 | 35.4 | 74.6 |
| Stanly | 105.7 | - | - | - | - | - | 7.6 | 98.1 |
| Stokes | 181.1 | - | - | 5.4 | - | 5.4 | 9.4 | 160.9 |
| Surry | 182.8 | - | 3.6 | - | - | - | 20.9 | 158.3 |
| Swain | 87.9 | 21.8 | - | - | - | 5.6 | 16.9 | 43.6 |
| Transylvania | 199.3 | 79.3 | - | 16.1 | 5.4 | - | 19.3 | 79.3 |
| Tyrrell | 147.5 | - | 50.3 | 27.9 | - | 19.7 | 31.4 | 18.3 |
| Union | 146.2 | - | - | - | - | - | 15.4 | 130.8 |
| Vance | 86.2 | - | 14.3 | - | - | 10.4 | 10.4 | 51.2 |
| Wake | 167.5 | - | 7.0 | 15.7 | 8.7 | - | 31.3 | 104.9 |
| Warren | 218.5 | - | - | - | - | 6.5 | 36.5 | 175.6 |
| Washington | 83.2 | - | 12.6 | 3.2 | - | 22.8 | 1.1 | 43.5 |
| Watauga | 128.7 | 0.4 | - | - | - | - | 36.4 | 91.9 |
| Wayne | 141.6 | - | - | 4.6 | - | - | 22.1 | 114.9 |
| Wilkes | 312.2 | - | - | 12.2 | - | 3.7 | 16.6 | 279.6 |
| Wilson | 111.6 | - | - | - | - | - | 13.1 | 98.5 |
| Yadkin | 81.9 | - | - | - | - | - | - | 81.9 |
| Yancey | 147.8 | 35.9 | - | - | - | - | 25.8 | 86.1 |
| Total | 17,684.4 | 1,105.4 | 585.9 | 468.5 | 191.6 | 1,498.7 | 2,391.2 | 11,443.2 |

[^2]Table 4—Area of timberland by county and forest-type group, North Carolina, 2002

|  | Forest-type group |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| County | $\begin{aligned} & \text { All } \\ & \text { groups } \end{aligned}$ | White-redjack pine | Spruce- <br> fir | $\begin{gathered} \text { Longleaf- } \\ \text { slash } \end{gathered}$ | Loblollyshortleaf | $\begin{aligned} & \hline \text { Oak- } \\ & \text { pine } \end{aligned}$ | Oakhickory | Oak-gumcypress | Elm-ashcottonwood | Maple-beechbirch | Nonstocked |


continued

Table 4—Area of timberland by county and forest-type group, North Carolina, 2002 (continued)

| County | $\begin{gathered} \text { All } \\ \text { groups } \end{gathered}$ | Forest-type group |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | White-redjack pine | Sprucefir | Longleafslash | Loblollyshortleaf | Oakpine | Oakhickory | Oak-gumcypress | Elm-ashcottonwood | Maple-beechbirch | Nonstocked |
| Thousand acres |  |  |  |  |  |  |  |  |  |  |  |
| Lee | 107.6 | - | - | - | 37.5 | 12.2 | 53.1 | 4.9 | - | - | - |
| Lenoir | 101.7 | - | - | - | 45.7 | 15.6 | 9.4 | 26.9 | 4.2 | - | - |
| Lincoln | 76.4 | - | - | - | 18.1 | 5.2 | 51.5 | - | 1.7 | - | - |
| Macon | 245.3 | 1.4 | - | - | 3.3 | 38.0 | 195.5 | - | - | 7.1 | - |
| Madison | 227.7 | 15.7 | - | - | 5.1 | 22.0 | 179.9 | - | - | 5.0 | - |
| Martin | 177.2 | - | - | - | 58.8 | 19.1 | 38.2 | 54.6 | 6.4 | - | - |
| McDowell | 231.5 | 9.9 | - | - | 12.2 | 27.2 | 182.3 | - | - | - | - |
| Mecklenburg | 85.8 | - | - | - | 10.1 | 22.6 | 49.7 | - | 3.5 | - | - |
| Mitchell | 114.4 | 4.2 | - | - | - | 5.6 | 75.0 | - | - | 29.6 | - |
| Montgomery | 255.8 | - | - | - | 103.4 | 74.0 | 78.4 | - | - | - | - |
| Moore | 341.3 | - | - | 44.8 | 111.3 | 57.7 | 104.8 | 18.9 | 3.8 | - | - |
| Nash | 199.2 | - | - | - | 43.1 | 55.9 | 67.3 | 28.3 | 4.7 | - | - |
| New Hanover | 51.8 | - | - | 5.2 | 13.4 | 10.8 | 3.9 | 18.5 | - | - | - |
| Northampton | 188.0 | - | - | - | 78.8 | 34.3 | 49.6 | 15.4 | 9.9 | - | - |
| Onslow | 326.1 | - | - | 12.8 | 101.6 | 93.0 | 41.4 | 77.2 | - | - | - |
| Orange | 150.4 | - | - | - | 49.0 | 41.4 | 60.0 | - | - | - | - |
| Pamlico | 106.9 | - | - | - | 53.9 | 14.4 | 15.6 | 23.0 | - | - | - |
| Pasquotank | 41.0 | - | - | - | 5.5 | 5.3 | 19.5 | 10.7 | - | - | - |
| Pender | 420.7 | - | - | 15.9 | 136.5 | 114.9 | 5.6 | 147.8 | - | - | - |
| Perquimans | 67.7 | - | - | - | 25.2 | 3.9 | 16.0 | 22.6 | - | - | - |
| Person | 145.4 | - | - | - | 28.9 | 47.9 | 62.3 | 6.4 | - | - | - |
| Pitt | 181.9 | - | - | 4.6 | 57.5 | 34.5 | 40.4 | 45.0 | - | - | - |
| Polk | 98.7 | 1.6 | - | - | 33.4 | 16.7 | 46.9 | - | - | - | - |
| Randolph | 304.6 | - | - | - | 42.1 | 36.6 | 219.3 | 6.5 | - | - | - |
| Richmond | 233.6 | - | - | 22.8 | 60.5 | 58.7 | 75.0 | 12.7 | 3.8 | - | - |
| Robeson | 273.3 | - | - | - | 72.8 | 60.6 | 37.7 | 101.2 | 1.0 | - | - |
| Rockingham | 215.5 | 1.1 | - | - | 66.1 | 31.2 | 107.0 | - | 10.2 | - | - |
| Rowan | 125.3 | - | - | - | 16.9 | 40.6 | 67.7 | - | - | - | - |
| Rutherford | 235.1 | - | - | - | 62.3 | 49.8 | 103.5 | 6.5 | 12.9 | - | - |
| Sampson | 334.2 | - | - | - | 101.8 | 51.2 | 87.8 | 91.9 | 1.5 | - | - |
| Scotland | 137.0 | - | - | 10.9 | 42.2 | 32.1 | 38.0 | 13.8 | - | - | - |
| Stanly | 105.7 | - | - | - | 34.6 | 22.3 | 48.9 | - | - | - | - |
| Stokes | 181.1 | - | - | - | 26.5 | 48.3 | 106.3 | - | - | - | - |
| Surry | 182.8 | - | - | - | 39.1 | 16.8 | 121.0 | - | 5.9 | - | - |
| Swain | 87.9 | - | - | - | 8.5 | - | 79.4 | - | - | - | - |
| Transylvania | 199.3 | 14.3 | - | - | - | 26.0 | 159.0 | - | - | - | - |
| Tyrrell | 147.5 | - | - | - | 37.4 | 27.8 | 3.0 | 79.3 | - | - | - |
| Union | 146.2 | - | - | - | 8.1 | 30.8 | 77.7 | 25.6 | 4.0 | - | - |
| Vance | 86.2 | - | - | - | 27.9 | 19.4 | 35.7 | 3.1 | - | - | - |
| Wake | 167.5 | - | - | - | 40.4 | 40.5 | 74.4 | 5.2 | 7.0 | - | - |
| Warren | 218.5 | - | - | - | 68.0 | 50.1 | 86.6 | 2.3 | 6.5 | - | 4.9 |
| Washington | 83.2 | - | - | - | 33.8 | 9.2 | 15.5 | 16.2 | 4.2 | - | 4.2 |
| Watauga | 128.7 | 0.8 | 6.4 | - | - | 3.2 | 103.6 | - | - | 14.7 | - |
| Wayne | 141.6 | - | - | - | 56.5 | 20.2 | 44.5 | 19.1 | 1.2 | - | - |
| Wilkes | 312.2 | 16.3 | - | - | 16.2 | 65.1 | 211.7 | - | 2.8 | - | - |
| Wilson | 111.6 | - | - | - | 41.6 | 29.8 | 33.3 | 5.9 | 1.0 | - | - |
| Yadkin | 81.9 | - | - | - | 15.7 | 5.6 | 57.0 | - | 3.6 | - | - |
| Yancey | 147.8 | 3.0 | - | - | - | - | 137.2 | - | - | 7.6 | - |
| Total | 17,684.4 | 242.2 | 15.7 | 237.7 | 4,467.2 | 3,034.7 | 7,333.9 | 2,009.7 | 166.7 | 115.6 | 61.2 |

Table 5—Area of timberland by county and stand-size class, North Carolina, 2002

| County | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Stand-size class |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Sawtimber | Poletimber | Saplingseedling | Nonstocked |
|  | Thousand acres |  |  |  |  |
| Alamance | 129.8 | 67.9 | 23.7 | 38.1 | - |
| Alexander | 87.7 | 38.2 | 30.1 | 18.2 | 1.2 |
| Alleghany | 68.1 | 30.3 | 17.0 | 20.8 | - |
| Anson | 257.6 | 76.0 | 53.4 | 123.1 | 5.2 |
| Ashe | 166.6 | 116.3 | 26.6 | 23.7 | - |
| Avery | 132.8 | 101.1 | 10.7 | 21.1 | - |
| Beaufort | 271.6 | 108.6 | 36.7 | 126.2 | - |
| Bertie | 304.9 | 135.7 | 56.3 | 103.3 | 9.6 |
| Bladen | 390.2 | 103.6 | 94.8 | 191.8 | - |
| Brunswick | 422.0 | 117.2 | 93.7 | 211.1 | - |
| Buncombe | 258.0 | 198.1 | 28.5 | 31.4 | - |
| Burke | 188.6 | 84.1 | 53.4 | 51.1 | - |
| Cabarrus | 86.6 | 47.9 | 32.5 | 6.3 | - |
| Caldwell | 226.8 | 110.6 | 57.1 | 59.0 | - |
| Camden | 56.3 | 17.2 | 16.5 | 22.6 | - |
| Carteret | 141.6 | 44.8 | 29.9 | 66.9 | - |
| Caswell | 181.8 | 101.5 | 45.7 | 34.6 | - |
| Catawba | 119.5 | 57.7 | 31.1 | 30.7 | - |
| Chatham | 284.4 | 88.2 | 43.4 | 152.9 | - |
| Cherokee | 239.4 | 116.5 | 75.0 | 48.0 | - |
| Chowan | 44.6 | 16.3 | 9.9 | 18.2 | 0.2 |
| Clay | 94.0 | 47.7 | 40.4 | 5.9 | - |
| Cleveland | 133.7 | 48.1 | 43.4 | 42.2 | - |
| Columbus | 393.4 | 126.8 | 70.3 | 187.5 | 8.8 |
| Craven | 275.1 | 111.9 | 27.2 | 136.0 | - |
| Cumberland | 197.7 | 90.7 | 18.5 | 88.5 | - |
| Currituck | 51.6 | 14.6 | 4.4 | 32.6 | - |
| Dare | 120.6 | 40.2 | 46.0 | 29.4 | 5.1 |
| Davidson | 196.4 | 96.2 | 40.8 | 59.4 | - |
| Davie | 70.4 | 32.1 | 29.9 | 8.4 | - |
| Duplin | 279.9 | 47.3 | 41.0 | 191.7 | - |
| Durham | 82.1 | 54.7 | 6.6 | 20.8 | - |
| Edgecombe | 173.6 | 53.2 | 32.1 | 88.2 | - |
| Forsyth | 88.0 | 50.3 | 25.7 | 12.0 | - |
| Franklin | 192.3 | 47.4 | 51.9 | 93.0 | - |
| Gaston | 95.2 | 56.3 | 16.9 | 22.0 | - |
| Gates | 133.9 | 61.9 | 40.5 | 27.2 | 4.4 |
| Graham | 154.5 | 104.0 | 32.3 | 18.2 | - |
| Granville | 188.2 | 67.7 | 45.7 | 74.8 | - |
| Greene | 65.8 | 11.3 | 18.8 | 35.7 | - |
| Guilford | 170.2 | 107.5 | 6.8 | 55.9 | - |
| Halifax | 252.5 | 58.4 | 71.2 | 122.1 | 0.8 |
| Harnett | 206.4 | 65.6 | 38.8 | 102.0 | - |
| Haywood | 194.8 | 144.4 | 29.6 | 20.9 | - |
| Henderson | 118.0 | 80.5 | 22.5 | 14.9 | - |
| Hertford | 136.4 | 46.1 | 30.5 | 49.5 | 10.3 |
| Hoke | 171.0 | 61.1 | 27.3 | 82.5 | - |
| Hyde | 230.6 | 50.4 | 45.5 | 133.4 | 1.3 |
| Iredell | 134.4 | 80.5 | 11.3 | 42.7 | - |
| Jackson | 239.5 | 159.3 | 77.5 | 2.7 | - |
| Johnston | 244.7 | 87.7 | 45.0 | 112.0 | - |
| Jones | 209.9 | 75.1 | 36.2 | 93.3 | 5.3 |

Table 5—Area of timberland by county and stand-size class, North Carolina, 2002 (continued)

| County | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Stand-size class |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Sawtimber | Poletimber | Saplingseedling | Nonstocked |
|  | Thousand acres |  |  |  |  |
| Lee | 107.6 | 33.7 | 32.6 | 41.3 | - |
| Lenoir | 101.7 | 25.1 | 30.8 | 45.8 | - |
| Lincoln | 76.4 | 42.9 | 11.4 | 22.1 | - |
| Macon | 245.3 | 194.8 | 17.7 | 32.8 | - |
| Madison | 227.7 | 136.2 | 33.2 | 58.3 | - |
| Martin | 177.2 | 85.3 | 25.0 | 66.9 | - |
| McDowell | 231.5 | 151.2 | 34.2 | 46.1 | - |
| Mecklenburg | 85.8 | 43.1 | 23.9 | 18.9 | - |
| Mitchell | 114.4 | 83.3 | 15.7 | 15.4 | - |
| Montgomery | 255.8 | 78.4 | 85.5 | 91.9 | - |
| Moore | 341.3 | 126.2 | 72.2 | 142.9 | - |
| Nash | 199.2 | 31.1 | 44.0 | 124.0 | - |
| New Hanover | 51.8 | 8.6 | 11.1 | 32.1 | - |
| Northampton | 188.0 | 63.6 | 37.3 | 87.1 | - |
| Onslow | 326.1 | 54.4 | 68.7 | 203.0 | - |
| Orange | 150.4 | 75.3 | 17.1 | 57.9 | - |
| Pamlico | 106.9 | 35.1 | 14.3 | 57.5 | - |
| Pasquotank | 41.0 | 21.4 | 5.4 | 14.2 | - |
| Pender | 420.7 | 72.7 | 97.8 | 250.2 | - |
| Perquimans | 67.7 | 31.4 | 16.3 | 20.0 | - |
| Person | 145.4 | 69.3 | 32.5 | 43.6 | - |
| Pitt | 181.9 | 66.1 | 43.4 | 72.4 | - |
| Polk | 98.7 | 68.4 | 9.6 | 20.6 | - |
| Randolph | 304.6 | 121.4 | 83.2 | 99.9 | - |
| Richmond | 233.6 | 75.8 | 38.7 | 119.1 | - |
| Robeson | 273.3 | 108.1 | 34.5 | 130.7 | - |
| Rockingham | 215.5 | 106.5 | 54.2 | 54.8 | - |
| Rowan | 125.3 | 87.4 | 5.1 | 32.8 | - |
| Rutherford | 235.1 | 100.2 | 61.2 | 73.8 | - |
| Sampson | 334.2 | 59.7 | 72.7 | 201.8 | - |
| Scotland | 137.0 | 39.3 | 7.7 | 90.0 | - |
| Stanly | 105.7 | 50.1 | 30.1 | 25.6 | - |
| Stokes | 181.1 | 93.2 | 53.6 | 34.3 | - |
| Surry | 182.8 | 113.6 | 37.0 | 32.2 | - |
| Swain | 87.9 | 44.0 | 30.6 | 13.2 | - |
| Transylvania | 199.3 | 148.1 | 43.5 | 7.6 | - |
| Tyrrell | 147.5 | 55.7 | 12.9 | 78.9 | - |
| Union | 146.2 | 83.3 | 35.9 | 27.0 | - |
| Vance | 86.2 | 31.9 | 15.6 | 38.7 | - |
| Wake | 167.5 | 94.7 | 42.8 | 30.0 | - |
| Warren | 218.5 | 51.3 | 48.7 | 113.6 | 4.9 |
| Washington | 83.2 | 29.3 | 16.1 | 33.6 | 4.2 |
| Watauga | 128.7 | 107.2 | 15.9 | 5.6 | - |
| Wayne | 141.6 | 42.8 | 15.6 | 83.2 | - |
| Wilkes | 312.2 | 173.4 | 76.9 | 61.9 | - |
| Wilson | 111.6 | 34.3 | 10.8 | 66.5 | - |
| Yadkin | 81.9 | 33.4 | 19.5 | 29.0 | - |
| Yancey | 147.8 | 111.4 | 21.1 | 15.4 | - |
| Total | 17,684.4 | 7,550.7 | 3,603.6 | 6,469.0 | 61.2 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 6—Area of timberland by county and site class, North Carolina, 2002

| County | $\begin{gathered} \hline \text { All } \\ \text { classes } \end{gathered}$ | Site class (cubic feet/acre/year) |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 20-49 | 50-84 | 85-119 | 120-164 | >165 |
|  | Thousand acres |  |  |  |  |  |
| Alamance | 129.8 | 23.5 | 52.2 | 41.8 | 5.5 | 6.8 |
| Alexander | 87.7 | 15.4 | 27.7 | 27.8 | 7.9 | 8.9 |
| Alleghany | 68.1 | 1.5 | 24.8 | 24.8 | 17.0 | - |
| Anson | 257.6 | 58.5 | 125.1 | 52.4 | 19.5 | 2.2 |
| Ashe | 166.6 | 35.6 | 61.2 | 36.8 | 28.3 | 4.7 |
| Avery | 132.8 | 13.3 | 62.4 | 37.9 | 19.2 | - |
| Beaufort | 271.6 | 21.9 | 86.4 | 105.5 | 46.3 | 11.4 |
| Bertie | 304.9 | 25.6 | 105.4 | 139.6 | 34.2 | - |
| Bladen | 390.2 | 80.0 | 155.0 | 111.0 | 38.9 | 5.2 |
| Brunswick | 422.0 | 124.3 | 145.0 | 124.2 | 28.6 | - |
| Buncombe | 258.0 | 34.0 | 117.7 | 54.4 | 43.3 | 8.6 |
| Burke | 188.6 | 12.1 | 55.6 | 70.9 | 46.1 | 3.9 |
| Cabarrus | 86.6 | 1.6 | 66.4 | 18.7 | - | - |
| Caldwell | 226.8 | 41.4 | 73.8 | 49.0 | 55.5 | 7.1 |
| Camden | 56.3 | 4.1 | 32.8 | 15.4 | 4.0 | - |
| Carteret | 141.6 | 61.4 | 33.1 | 35.5 | 11.6 | - |
| Caswell | 181.8 | 22.9 | 49.5 | 65.4 | 38.6 | 5.6 |
| Catawba | 119.5 | 5.2 | 58.6 | 47.2 | 3.4 | 5.1 |
| Chatham | 284.4 | 8.4 | 39.6 | 156.9 | 79.5 | - |
| Cherokee | 239.4 | 34.4 | 71.8 | 66.1 | 67.2 | - |
| Chowan | 44.6 | 5.7 | 1.0 | 27.4 | 10.5 | - |
| Clay | 94.0 | 30.5 | 14.3 | 37.5 | 11.7 | - |
| Cleveland | 133.7 | 15.7 | 37.1 | 46.0 | 26.5 | 8.5 |
| Columbus | 393.4 | 23.9 | 129.9 | 145.1 | 79.3 | 15.1 |
| Craven | 275.1 | 32.3 | 111.0 | 86.7 | 35.7 | 9.3 |
| Cumberland | 197.7 | 43.4 | 48.1 | 77.6 | 28.6 | - |
| Currituck | 51.6 | 12.1 | 22.0 | 13.2 | 4.4 | - |
| Dare | 120.6 | 74.6 | 34.6 | 6.3 | 5.1 | - |
| Davidson | 196.4 | 7.8 | 89.3 | 73.3 | 24.2 | 1.8 |
| Davie | 70.4 | 7.1 | 27.5 | 26.1 | 4.1 | 5.5 |
| Duplin | 279.9 | 22.1 | 117.6 | 120.9 | 19.3 | - |
| Durham | 82.1 | 3.1 | 10.6 | 57.1 | 6.0 | 5.3 |
| Edgecombe | 173.6 | 11.6 | 56.2 | 76.2 | 22.1 | 7.6 |
| Forsyth | 88.0 | 1.1 | 25.8 | 40.1 | 14.3 | 6.6 |
| Franklin | 192.3 | 5.7 | 54.5 | 107.6 | 12.9 | 11.5 |
| Gaston | 95.2 | 7.3 | 27.7 | 43.0 | 17.2 | - |
| Gates | 133.9 | 5.5 | 39.4 | 70.2 | 19.0 | - |
| Graham | 154.5 | 22.6 | 44.5 | 52.0 | 35.5 | - |
| Granville | 188.2 | 6.4 | 65.9 | 82.6 | 28.2 | 5.1 |
| Greene | 65.8 | 7.5 | 37.0 | 16.3 | 5.0 | - |
| Guilford | 170.2 | 9.7 | 66.4 | 59.0 | 25.5 | 9.7 |
| Halifax | 252.5 | 10.6 | 84.9 | 109.6 | 47.4 | - |
| Harnett | 206.4 | 17.0 | 104.1 | 57.0 | 20.4 | 8.0 |
| Haywood | 194.8 | 30.2 | 64.2 | 61.3 | 34.4 | 4.8 |
| Henderson | 118.0 | 20.8 | 55.9 | 28.3 | 10.5 | 2.5 |
| Hertford | 136.4 | 16.2 | 51.4 | 63.6 | 5.1 | - |
| Hoke | 171.0 | 28.5 | 101.0 | 34.1 | 7.4 | - |
| Hyde | 230.6 | 105.1 | 61.2 | 44.5 | 19.8 | - |
| Iredell | 134.4 | 23.2 | 39.1 | 65.6 | 6.4 | - |
| Jackson | 239.5 | 75.3 | 113.4 | 30.5 | 14.8 | 5.5 |
| Johnston | 244.7 | 23.1 | 74.4 | 79.2 | 55.3 | 12.7 |
| Jones | 209.9 | 24.8 | 66.0 | 66.3 | 51.6 | 1.2 |

Table 6-Area of timberland by county and site class, North Carolina, 2002 (continued)

| County | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Site class (cubic feet/acre/year) |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 20-49 | 50-84 | 85-119 | 120-164 | >165 |
|  | Thousand acres |  |  |  |  |  |
| Lee | 107.6 | 17.0 | 44.9 | 28.3 | 17.4 | - |
| Lenoir | 101.7 | 1.4 | 31.6 | 55.2 | 9.2 | 4.3 |
| Lincoln | 76.4 | 5.2 | 25.8 | 29.9 | 15.5 | - |
| Macon | 245.3 | 59.1 | 91.6 | 61.3 | 20.6 | 12.7 |
| Madison | 227.7 | 17.1 | 75.8 | 74.3 | 55.5 | 5.1 |
| Martin | 177.2 | 7.3 | 79.3 | 49.1 | 28.7 | 12.9 |
| McDowell | 231.5 | 56.9 | 94.1 | 40.8 | 33.1 | 6.6 |
| Mecklenburg | 85.8 | 13.8 | 43.3 | 24.0 | 3.5 | 1.3 |
| Mitchell | 114.4 | 20.6 | 30.7 | 39.1 | 24.0 | - |
| Montgomery | 255.8 | 34.5 | 104.1 | 108.5 | 8.8 | - |
| Moore | 341.3 | 48.8 | 190.2 | 73.5 | 27.5 | 1.3 |
| Nash | 199.2 | 10.0 | 100.6 | 78.9 | 9.7 | - |
| New Hanover | 51.8 | 16.2 | 22.7 | 6.8 | 1.3 | 4.8 |
| Northampton | 188.0 | 7.4 | 78.8 | 88.6 | 13.1 | 0.1 |
| Onslow | 326.1 | 77.6 | 141.8 | 95.3 | 11.4 | - |
| Orange | 150.4 | 5.1 | 53.1 | 54.2 | 36.1 | 1.7 |
| Pamlico | 106.9 | 27.9 | 32.5 | 40.8 | 1.2 | 4.4 |
| Pasquotank | 41.0 | 11.3 | - | 29.6 | - | - |
| Pender | 420.7 | 133.8 | 150.9 | 115.3 | 15.5 | 5.3 |
| Perquimans | 67.7 | 5.1 | 36.5 | 6.7 | 14.2 | 5.1 |
| Person | 145.4 | 16.8 | 81.7 | 46.7 | 0.2 | - |
| Pitt | 181.9 | 13.7 | 67.1 | 90.9 | 10.3 | - |
| Polk | 98.7 | 14.4 | 22.9 | 47.0 | 6.4 | 8.0 |
| Randolph | 304.6 | 75.0 | 167.7 | 39.4 | 19.2 | 3.3 |
| Richmond | 233.6 | 66.0 | 74.9 | 73.8 | 18.8 | - |
| Robeson | 273.3 | 13.7 | 115.6 | 105.7 | 27.1 | 11.2 |
| Rockingham | 215.5 | 18.1 | 73.6 | 65.0 | 25.6 | 33.2 |
| Rowan | 125.3 | 4.1 | 44.3 | 33.4 | 33.7 | 9.8 |
| Rutherford | 235.1 | 36.1 | 81.8 | 81.5 | 25.2 | 10.6 |
| Sampson | 334.2 | 68.0 | 192.0 | 62.0 | 12.1 | - |
| Scotland | 137.0 | 28.0 | 60.3 | 40.0 | 8.7 | - |
| Stanly | 105.7 | 26.7 | 35.7 | 34.6 | 4.8 | 4.0 |
| Stokes | 181.1 | 3.4 | 35.8 | 88.1 | 36.5 | 17.3 |
| Surry | 182.8 | 26.6 | 78.5 | 50.9 | 19.2 | 7.6 |
| Swain | 87.9 | 25.9 | 33.8 | 22.5 | 5.6 | - |
| Transylvania | 199.3 | 76.8 | 39.1 | 51.7 | 31.7 | - |
| Tyrrell | 147.5 | 53.2 | 47.2 | 36.0 | 11.2 | - |
| Union | 146.2 | 30.0 | 84.8 | 26.2 | 5.2 | - |
| Vance | 86.2 | 5.2 | 33.8 | 36.8 | 10.4 | - |
| Wake | 167.5 | 22.2 | 52.2 | 62.1 | 31.0 | - |
| Warren | 218.5 | - | 120.0 | 80.7 | 17.9 | - |
| Washington | 83.2 | 14.1 | 14.9 | 27.0 | 27.2 | - |
| Watauga | 128.7 | 41.2 | 49.6 | 18.6 | 19.3 | - |
| Wayne | 141.6 | 12.8 | 63.2 | 50.8 | 14.8 | - |
| Wilkes | 312.2 | 26.5 | 105.0 | 125.7 | 50.2 | 4.8 |
| Wilson | 111.6 | 6.6 | 24.9 | 57.1 | 16.4 | 6.6 |
| Yadkin | 81.9 | 11.5 | 32.6 | 34.5 | 3.3 | - |
| Yancey | 147.8 | 38.4 | 54.4 | 45.0 | 10.1 | - |
| Total | 17,684.4 | 2,706.8 | 6,635.3 | 5,819.1 | 2,151.3 | 372.0 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 7—Area of timberland by county and stocking class of growing-stock trees, North Carolina, 2002

| County | All classes | Stocking class (percent) |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | <16.7 | 16.7-59 | 60-99 | 100-130 | >130 |
|  | Thousand acres |  |  |  |  |  |
| Alamance | 129.8 | 0.2 | 4.5 | 44.8 | 57.5 | 22.7 |
| Alexander | 87.7 | 1.2 | 4.3 | 35.6 | 30.3 | 16.4 |
| Alleghany | 68.1 | - | 3.1 | 32.5 | 4.6 | 27.9 |
| Anson | 257.6 | 5.2 | 27.9 | 51.1 | 90.4 | 83.0 |
| Ashe | 166.6 | 8.9 | 16.6 | 74.0 | 64.1 | 3.0 |
| Avery | 132.8 | 1.5 | 16.6 | 57.8 | 41.8 | 15.2 |
| Beaufort | 271.6 | 8.8 | 31.3 | 43.8 | 121.2 | 66.4 |
| Bertie | 304.9 | 14.9 | 22.3 | 74.5 | 101.4 | 91.8 |
| Bladen | 390.2 | 14.0 | 39.8 | 75.0 | 146.2 | 115.2 |
| Brunswick | 422.0 | 6.8 | 46.6 | 93.7 | 166.2 | 108.8 |
| Buncombe | 258.0 | - | 33.4 | 66.7 | 116.7 | 41.1 |
| Burke | 188.6 | 7.5 | 15.0 | 80.3 | 57.5 | 28.3 |
| Cabarrus | 86.6 | - | 14.1 | 33.3 | 20.8 | 18.5 |
| Caldwell | 226.8 | 2.0 | 42.5 | 48.5 | 95.1 | 38.6 |
| Camden | 56.3 | - | 7.2 | 16.3 | 8.2 | 24.5 |
| Carteret | 141.6 | 2.6 | 1.4 | 51.8 | 56.0 | 29.8 |
| Caswell | 181.8 | 1.4 | 17.2 | 51.1 | 72.6 | 39.5 |
| Catawba | 119.5 | 8.0 | 18.1 | 24.3 | 52.1 | 17.1 |
| Chatham | 284.4 | 2.0 | 44.7 | 53.0 | 135.5 | 49.3 |
| Cherokee | 239.4 | - | 21.4 | 94.0 | 85.6 | 38.4 |
| Chowan | 44.6 | 0.2 | 1.3 | 23.8 | 14.6 | 4.8 |
| Clay | 94.0 | - | 21.4 | 54.6 | 14.3 | 3.7 |
| Cleveland | 133.7 | 5.4 | 22.6 | 43.8 | 38.8 | 23.1 |
| Columbus | 393.4 | 26.7 | 25.6 | 110.7 | 156.8 | 73.5 |
| Craven | 275.1 | 12.3 | 26.8 | 86.8 | 97.3 | 51.9 |
| Cumberland | 197.7 | 2.8 | 22.2 | 69.3 | 44.6 | 58.8 |
| Currituck | 51.6 | - | - | 12.1 | 20.5 | 19.0 |
| Dare | 120.6 | 11.5 | 13.3 | 38.2 | 44.1 | 13.5 |
| Davidson | 196.4 | 1.0 | 14.1 | 78.1 | 75.1 | 28.2 |
| Davie | 70.4 | - | 5.4 | 30.4 | 26.7 | 7.8 |
| Duplin | 279.9 | 5.7 | 31.7 | 75.5 | 130.6 | 36.4 |
| Durham | 82.1 | - | 15.1 | 24.3 | 29.3 | 13.4 |
| Edgecombe | 173.6 | 11.8 | 22.6 | 44.8 | 72.4 | 22.1 |
| Forsyth | 88.0 | 1.1 | 20.6 | 26.7 | 33.7 | 5.8 |
| Franklin | 192.3 | - | - | 24.4 | 97.3 | 70.5 |
| Gaston | 95.2 | - | 5.9 | 26.3 | 45.9 | 17.1 |
| Gates | 133.9 | 5.2 | 3.3 | 31.4 | 42.6 | 51.4 |
| Graham | 154.5 | 0.1 | 9.6 | 55.5 | 61.4 | 27.9 |
| Granville | 188.2 | 1.3 | 6.4 | 47.2 | 101.5 | 31.8 |
| Greene | 65.8 | 0.1 | 12.1 | - | 34.9 | 18.7 |
| Guilford | 170.2 | 2.6 | 3.5 | 35.2 | 70.6 | 58.3 |
| Halifax | 252.5 | 10.1 | 27.1 | 74.5 | 87.1 | 53.7 |
| Harnett | 206.4 | 10.0 | 20.1 | 65.9 | 61.6 | 48.9 |
| Haywood | 194.8 | 2.4 | 15.8 | 66.5 | 68.5 | 41.6 |
| Henderson | 118.0 | 1.8 | 10.8 | 39.6 | 56.6 | 9.3 |
| Hertford | 136.4 | 6.1 | 17.7 | 16.6 | 55.6 | 40.3 |
| Hoke | 171.0 | 1.8 | 32.3 | 64.9 | 35.1 | 36.8 |
| Hyde | 230.6 | 26.7 | 43.6 | 81.4 | 46.6 | 32.4 |
| Iredell | 134.4 | 1.4 | 9.8 | 72.7 | 36.1 | 14.4 |
| Jackson | 239.5 | 1.3 | 61.0 | 88.9 | 73.7 | 14.6 |
| Johnston | 244.7 | 4.9 | 36.9 | 77.5 | 66.8 | 58.6 |
| Jones | 209.9 | 9.2 | 13.1 | 31.9 | 64.5 | 91.1 |

Table 7—Area of timberland by county and stocking class of growing-stock trees, North Carolina, 2002 (continued)

| County | All <br> classes | Stocking class (percent) |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | <16.7 | 16.7-59 | 60-99 | 100-130 | >130 |
|  | Thousand acres |  |  |  |  |  |
| Lee | 107.6 | 1.8 | 8.0 | 35.9 | 39.6 | 22.4 |
| Lenoir | 101.7 | 0.6 | 9.6 | 36.0 | 34.9 | 20.6 |
| Lincoln | 76.4 | - | 5.2 | 26.4 | 34.5 | 10.3 |
| Macon | 245.3 | 2.2 | 20.6 | 108.0 | 92.3 | 22.1 |
| Madison | 227.7 | 15.7 | 46.2 | 84.0 | 59.8 | 22.0 |
| Martin | 177.2 | 2.1 | 20.7 | 27.8 | 80.4 | 46.1 |
| McDowell | 231.5 | 4.6 | 16.8 | 92.0 | 65.9 | 52.2 |
| Mecklenburg | 85.8 | - | 11.3 | 18.2 | 36.2 | 20.1 |
| Mitchell | 114.4 | - | 13.6 | 53.0 | 23.1 | 24.7 |
| Montgomery | 255.8 | 12.3 | 15.0 | 88.9 | 66.1 | 73.6 |
| Moore | 341.3 | 9.3 | 31.1 | 90.8 | 137.2 | 72.9 |
| Nash | 199.2 | 2.2 | 9.2 | 83.4 | 52.6 | 51.8 |
| New Hanover | 51.8 | 4.8 | 3.3 | 14.2 | 13.1 | 16.5 |
| Northampton | 188.0 | 10.1 | 21.8 | 17.8 | 84.9 | 53.4 |
| Onslow | 326.1 | 2.9 | 48.8 | 61.4 | 117.4 | 95.5 |
| Orange | 150.4 | 1.7 | 14.0 | 49.0 | 63.0 | 22.6 |
| Pamlico | 106.9 | 0.1 | 17.4 | 36.0 | 38.7 | 14.6 |
| Pasquotank | 41.0 | - | 5.3 | 13.6 | 10.6 | 11.5 |
| Pender | 420.7 | 11.4 | 18.5 | 70.0 | 158.6 | 162.2 |
| Perquimans | 67.7 | - | - | 10.1 | 32.9 | 24.7 |
| Person | 145.4 | 0.5 | 8.4 | 38.3 | 83.3 | 14.9 |
| Pitt | 181.9 | 6.3 | 20.9 | 42.0 | 77.8 | 35.0 |
| Polk | 98.7 | 2.8 | 20.8 | 48.1 | 21.9 | 5.0 |
| Randolph | 304.6 | 8.0 | 22.0 | 111.1 | 104.1 | 59.4 |
| Richmond | 233.6 | 6.4 | 30.1 | 54.9 | 90.1 | 52.0 |
| Robeson | 273.3 | 3.1 | 22.0 | 71.9 | 88.3 | 88.0 |
| Rockingham | 215.5 | 2.3 | 22.2 | 69.5 | 83.2 | 38.4 |
| Rowan | 125.3 | - | 6.2 | 40.5 | 64.9 | 13.7 |
| Rutherford | 235.1 | 3.8 | 18.6 | 95.2 | 82.1 | 35.5 |
| Sampson | 334.2 | 12.0 | 48.6 | 68.9 | 137.6 | 67.1 |
| Scotland | 137.0 | 16.7 | 8.7 | 52.7 | 38.6 | 20.3 |
| Stanly | 105.7 | 6.3 | 10.5 | 40.4 | 16.8 | 31.7 |
| Stokes | 181.1 | 1.4 | 40.3 | 63.1 | 48.9 | 27.5 |
| Surry | 182.8 | 1.7 | 15.9 | 71.8 | 71.1 | 22.2 |
| Swain | 87.9 | - | 22.8 | 34.0 | 18.3 | 12.7 |
| Transylvania | 199.3 | 0.7 | 27.0 | 94.4 | 51.4 | 25.8 |
| Tyrrell | 147.5 | 19.5 | 27.9 | 47.6 | 31.7 | 20.7 |
| Union | 146.2 | 1.6 | 21.1 | 78.5 | 40.2 | 4.8 |
| Vance | 86.2 | 1.3 | 8.3 | 28.9 | 29.5 | 18.1 |
| Wake | 167.5 | - | 22.6 | 40.5 | 62.3 | 42.2 |
| Warren | 218.5 | 11.4 | 15.1 | 47.9 | 84.0 | 60.1 |
| Washington | 83.2 | 8.7 | 4.2 | 19.0 | 19.6 | 31.6 |
| Watauga | 128.7 | 6.4 | 9.6 | 37.4 | 49.0 | 26.2 |
| Wayne | 141.6 | 10.6 | 24.0 | 45.0 | 44.1 | 17.9 |
| Wilkes | 312.2 | 6.3 | 38.4 | 119.9 | 111.0 | 36.7 |
| Wilson | 111.6 | 5.3 | 11.5 | 38.2 | 14.1 | 42.5 |
| Yadkin | 81.9 | 9.8 | 16.8 | 26.8 | 25.3 | 3.3 |
| Yancey | 147.8 | 10.3 | 23.8 | 77.6 | 18.2 | 18.0 |
| Total | 17,684.4 | 493.3 | 1,904.3 | 5,342.5 | 6,278.3 | 3,666.0 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 8-Area of timberland by forest-type group, stand origin, and ownership class, North Carolina, 2002

| Forest-type group and stand origin | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Ownership class |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | National forest | Other public | Forest industry | Nonindustrial private |
|  | Thousand acres |  |  |  |  |
| Softwood types |  |  |  |  |  |
| White-red-jack pine |  |  |  |  |  |
| Planted | 59.1 | 2.6 | 4.8 | - | 51.7 |
| Natural | 183.1 | 42.3 | - | - | 140.8 |
| Total | 242.2 | 44.9 | 4.8 | - | 192.5 |
| Spruce-fir |  |  |  |  |  |
| Planted | - | - | - | - | - |
| Natural | 15.7 | 9.2 | - | - | 6.4 |
| Total | 15.7 | 9.2 | - | - | 6.4 |
| Longleaf-slash pine |  |  |  |  |  |
| Planted | 81.8 | - | 23.5 | 9.3 | 49.0 |
| Natural | 155.9 | 2.5 | 87.4 | 2.9 | 63.1 |
| Total | 237.7 | 2.5 | 111.0 | 12.2 | 112.0 |
| Loblolly-shortleaf pine |  |  |  |  |  |
| Planted | 1,965.9 | 20.2 | 73.3 | 751.0 | 1,121.4 |
| Natural | 2,501.3 | 53.3 | 224.8 | 123.1 | 2,100.1 |
| Total | 4,467.2 | 73.4 | 298.2 | 874.1 | 3,221.5 |
| Total softwoods | 4,962.8 | 130.0 | 413.9 | 886.3 | 3,532.5 |
| Hardwood types |  |  |  |  |  |
| Oak-pine |  |  |  |  |  |
| Planted | 519.1 | 5.8 | 29.0 | 158.7 | 325.5 |
| Natural | 2,515.6 | 102.8 | 174.3 | 81.4 | 2,157.2 |
| Total | 3,034.7 | 108.6 | 203.4 | 240.1 | 2,482.6 |
| Oak-hickory | 7,333.9 | 812.3 | 299.6 | 136.0 | 6,086.0 |
| Oak-gum-cypress | 2,009.7 | 17.9 | 307.6 | 197.8 | 1,486.4 |
| Elm-ash-cottonwood | 166.7 | - | 17.3 | 12.8 | 136.5 |
| Maple-beech-birch | 115.6 | 36.5 | - | - | 79.0 |
| Total hardwoods | $\underline{12,660.5}$ | 975.4 | 827.8 | 586.6 | 10,270.7 |
| Nonstocked | 61.2 | - | 4.2 | 25.7 | 31.2 |
| All groups | 17,684.4 | 1,105.4 | 1,245.9 | 1,498.7 | 13,834.4 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 9—Area of timberland by forest-type group, detailed forest type, and ownership class, North Carolina, 2002

| Forest-type group and detailed forest type | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Ownership class |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | National forest | Other public | Forest industry | $\begin{gathered} \hline \text { Nonindustrial } \\ \text { private } \\ \hline \end{gathered}$ |
|  | Thousand acres |  |  |  |  |
| Softwood types |  |  |  |  |  |
| White-red-jack pine |  |  |  |  |  |
| White pine | 196.4 | 32.9 | 4.8 | - | 158.6 |
| White pine-hemlock | 30.7 | 9.5 | - | - | 21.1 |
| Hemlock | 15.2 | 2.4 | - | - | 12.8 |
| Total | 242.2 | 44.9 | 4.8 | - | 192.5 |
| Spruce-fir |  |  |  |  |  |
| Red spruce-balsam fir | 15.7 | 9.2 | - | - | 6.4 |
| Total | 15.7 | 9.2 | - | - | 6.4 |
| Longleaf-slash |  |  |  |  |  |
| Longleaf pine | 177.4 | 2.5 | 96.1 | - | 78.9 |
| Slash pine | 60.2 | - | 14.9 | 12.2 | 33.2 |
| Total | 237.7 | 2.5 | 111.0 | 12.2 | 112.0 |
| Loblolly-shortleaf |  |  |  |  |  |
| Loblolly pine | 3,484.6 | 38.3 | 158.1 | 831.8 | 2,456.3 |
| Shortleaf pine | 154.8 | 1.6 | 5.1 | 4.7 | 143.4 |
| Virginia pine | 479.0 | 4.6 | 15.4 | 6.7 | 452.4 |
| Eastern redcedar | 14.6 | - | 2.9 | - | 11.7 |
| Pond pine | 306.6 | 23.8 | 116.7 | 31.0 | 135.1 |
| Pitch pine | 21.2 | - | - | - | 21.2 |
| Table Mountain pine | 6.5 | 5.2 | - | - | 1.4 |
| Total | 4,467.2 | 73.4 | 298.2 | 874.1 | 3,221.5 |
| Total softwoods | 4,962.8 | 130.0 | 413.9 | 886.3 | 3,532.5 |

## Hardwood types

Oak-pine

| Cak-pine | 203.1 | 44.6 | 14.5 | - | 144.0 |
| :--- | ---: | ---: | ---: | ---: | ---: |
| White pine-n. red oak-white ash | 38.3 | - | 5.0 | - | 33.2 |
| Eastern redcedar-hardwood | 115.1 | 0.4 | 37.1 | - | 77.6 |
| Longleaf pine-scrub oak | 204.5 | 6.2 | 0.6 | - | 197.7 |
| Shortleaf pine-oak | 289.9 | 10.7 | - | 5.4 | 273.7 |
| Virginia pine-s. red oak | $1,832.3$ | 9.0 | 87.0 | 212.5 | $1,523.8$ |
| Loblolly pine-hardwood | 13.0 | - | - | 10.3 | 2.6 |
| Slash pine-hardwood | 338.6 | 37.5 | 59.2 | 11.8 | 230.0 |
| Other oak-pine | $3,034.7$ | 108.6 | 203.4 | 240.1 | $2,482.6$ |

Oak-hickory
Post oak-black oak
Chestnut oak

| 33.6 | - | - | - | 33.6 |
| ---: | ---: | ---: | ---: | ---: |
| 433.6 | 87.8 | 20.6 | 12.4 | 312.8 |
| 801.4 | 83.0 | 29.2 | 5.6 | 683.5 |
| 25.2 | - | - | - | 25.2 |
| 22.0 | 4.8 | - | 17.3 | $1,137.0$ |
| $1,342.0$ | 148.6 | 45.0 | 4.7 | 86.5 |
| 107.4 | - | 16.1 | 48.2 | $1,141.6$ |
| $1,251.9$ | 1.4 | 60.7 | 53.7 | $2,648.6$ |
| $3,316.9$ | 486.7 | 127.8 | 136.0 | $6,086.0$ |

Oak-gum-cypress
Swamp chestnut oak-cherrybark oak
Sweetgum-water oak-willow oak

| 14.0 | - | - | - | 14.0 |
| ---: | ---: | ---: | ---: | ---: |
| 493.2 | 4.1 | 28.7 | 24.3 | 436.1 |
| 175.6 | 2.4 | 9.0 | 27.4 | 136.8 |
| 1.1 | - | - | - | 1.1 |
| 15.2 | - | 11.6 | $-\overline{3}$ | 3.6 |
| 243.9 | 1.6 | 37.4 | 17.8 | 187.0 |
| $1,066.8$ | 9.8 | 220.8 | 128.3 | 707.9 |
| $2,009.7$ | 17.9 | 307.6 | 197.8 | $1,486.4$ |

Elm-ash-cottonwood
$\quad$ River birch-sycamore
Cottonwood
Willow
Sycamore-pecan-elm
Total
Maple-beech-birch Sugar maple-beech-yellow birch Total
Total hardwoods

## Nonstocked

## All groups

| 105.5 | - | 9.6 | 2.6 | 93.3 |
| ---: | ---: | ---: | ---: | ---: |
| 4.3 | - | - | 4.3 |  |
| 34.4 | - | 4.2 | 6.5 | 23.8 |
| 22.4 | - | 3.5 | 3.8 | 15.2 |
| 166.7 | - | 17.3 | 12.8 | 136.5 |

A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 10—Area of timberland by ownership and stocking class of growing-stock trees, North Carolina, 2002

| Ownership class | Allclasses | Stocking class (percent) |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $<16.7$ | 16.7-59 | 60-99 | 100-130 | >130 |
|  | Thousand acres |  |  |  |  |  |
| National forest | 1,105.4 | 16.4 | 123.3 | 411.2 | 386.6 | 168.0 |
| Other public | 1,245.9 | 49.7 | 151.3 | 342.0 | 438.8 | 264.2 |
| Forest industry | 1,498.7 | 47.0 | 101.1 | 387.4 | 578.9 | 384.3 |
| Nonindustrial private | 13,834.4 | 380.2 | 1,528.6 | 4,202.0 | 4,874.0 | 2,849.6 |
| All ownerships | 17,684.4 | 493.3 | 1,904.3 | 5,342.5 | 6,278.3 | 3,666.0 |

Numbers in rows and columns may not sum to totals due to rounding.

Table 11—Area of timberland by forest-type group, stand origin, and stand-size class, North Carolina, 2002

| Forest-type group and stand origin | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Stand-size class |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Sawtimber | Poletimber | Saplingseedling | Nonstocked |
|  | Thousand acres |  |  |  |  |
| Softwood types |  |  |  |  |  |
| White-red-jack pine |  |  |  |  |  |
| Planted | 59.1 | 30.9 | 9.5 | 18.8 | - |
| Natural | 183.1 | 133.9 | 23.3 | 25.9 | - |
| Total | 242.2 | 164.7 | 32.8 | 44.7 | - |
| Spruce-fir |  |  |  |  |  |
| Planted | - | - | - | - | - |
| Natural | 15.7 | 5.5 | 10.2 | - | - |
| Total | 15.7 | 5.5 | 10.2 | - | - |
| Longleaf-slash pine |  |  |  |  |  |
| Planted | 81.8 | 18.0 | 38.0 | 25.8 | - |
| Natural | 155.9 | 88.9 | 12.7 | 54.3 | - |
| Total | 237.7 | 106.9 | 50.7 | 80.1 | - |
| Loblolly-shortleaf pine |  |  |  |  |  |
| Planted | 1,965.9 | 522.6 | 703.0 | 740.4 | - |
| Natural | 2,501.3 | 1,067.0 | 535.8 | 898.6 | - |
| Total | 4,467.2 | 1,589.6 | 1,238.7 | 1,638.9 | - |
| Total softwoods | 4,962.8 | 1,866.6 | 1,332.4 | 1,763.7 | - |


| Hardwood types |  |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: |
| Oak-pine |  |  |  |  |  |
| $\quad$ Planted | 519.1 | 29.5 | 16.2 | 473.3 | - |
| Natural | $2,515.6$ | 895.4 | 425.6 | $1,194.6$ | - |
| Total | $3,034.7$ | 925.0 | 441.8 | $1,667.9$ | - |
| Oak-hickory | $7,333.9$ | $3,835.6$ | $1,373.6$ | $2,124.7$ | - |
| Oak-gum-cypress | $2,009.7$ | 766.8 | 372.1 | 870.8 | - |
| Elm-ash-cottonwood | 166.7 | 85.8 | 53.9 | 27.0 | - |
| Maple-beech-birch | 115.6 | 70.9 | 29.8 | 14.8 | - |
| Total hardwoods | $12,660.5$ | $5,684.0$ | $2,271.2$ | $4,705.3$ | - |
| Nonstocked | 61.2 | - | - | - | 61.2 |
| All groups | $17,684.4$ | $7,550.7$ | $3,603.6$ | $6,469.0$ | 61.2 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 12—Area of timberland by stand-age class and forest management type, all ownerships, North Carolina, 2002

|  |  | Forest management type |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Stand-age <br> class | All <br> types | Pine <br> plantation | Natural <br> pine | Oak- <br> pine | Upland <br> hardwood | Lowland <br> hardwood | Nonstocked |  |
| Years |  |  | Thousand acres |  |  |  |  |  |
| $0-10$ | $3,223.4$ | 506.8 | 441.4 | 753.4 | $1,086.1$ | 378.9 | 56.8 |  |
| $11-20$ | $2,606.1$ | 773.7 | 448.4 | 517.7 | 619.7 | 246.6 | - |  |
| $21-30$ | $1,856.4$ | 555.0 | 323.1 | 333.4 | 472.8 | 167.6 | 4.4 |  |
| $31-40$ | $1,759.5$ | 231.3 | 427.6 | 325.1 | 557.3 | 218.3 | - |  |
| $41-50$ | $1,787.1$ | 28.4 | 424.5 | 282.2 | 857.3 | 194.8 | - |  |
| $51-60$ | $1,940.2$ | 6.3 | 328.1 | 312.7 | $1,051.2$ | 241.9 | - |  |
| $61-70$ | $1,711.6$ | 5.2 | 257.9 | 233.9 | 992.6 | 222.0 | - |  |
| $71-80$ | $1,211.0$ | - | 124.3 | 151.4 | 737.9 | 197.4 | - |  |
| $81+$ | $1,589.0$ | - | 80.7 | 124.9 | $1,074.6$ | 308.8 | - |  |
|  | $17,684.4$ | $2,106.8$ | $2,855.9$ | $3,034.7$ | $7,449.5$ | $2,176.3$ | 61.2 |  |

[^3]Table 13-Area of timberland by stand-age class and forest management type, public ownerships, North Carolina, 2002

|  |  | Forest management type |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Stand-age <br> class | All <br> types | Pine <br> plantation | Natural <br> pine | Oak- <br> pine | Upland <br> hardwood | Lowland <br> hardwood | Nonstocked |  |
| Years |  |  | Thousand acres |  |  |  |  |  |
| $0-10$ | 132.6 | 13.0 | 12.9 | 25.5 | 47.0 | 29.9 | 4.2 |  |
| $11-20$ | 237.2 | 37.8 | 24.6 | 41.9 | 73.3 | 59.6 | - |  |
| $21-30$ | 147.6 | 36.2 | 31.2 | 38.5 | 25.4 | 16.3 | - |  |
| $31-40$ | 178.9 | 26.4 | 44.3 | 24.6 | 52.0 | 31.6 | - |  |
| $41-50$ | 218.2 | 11.1 | 87.1 | 31.6 | 74.4 | 14.0 | - |  |
| $51-60$ | 287.6 | - | 94.9 | 34.7 | 133.4 | 24.6 | - |  |
| $61-70$ | 361.5 | - | 60.2 | 56.7 | 207.6 | 37.0 | - |  |
| $71-80$ | 247.8 | - | 33.8 | 24.6 | 144.9 | 44.6 | - |  |
| $81+$ | 540.0 | - | 30.4 | 33.9 | 390.5 | 85.2 | - |  |
|  | $2,351.3$ | 124.4 | 419.5 | 312.0 | $1,148.4$ | 342.8 | 4.2 |  |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 14—Area of timberland by stand-age class and forest management type, forest industry ownerships, North Carolina, 2002

|  | Forest management type |  |  |  |  |  |  |  |
| :--- | :---: | ---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Stand-age <br> class | All <br> types | Pine <br> plantation | Natural <br> pine | Oak- <br> pine | Upland <br> hardwood | Lowland <br> hardwood | Nonstocked |  |
| Years |  |  | Thousand acres |  |  |  |  |  |
| $0-10$ | 456.9 | 179.5 | 23.3 | 114.1 | 65.6 | 48.8 | 25.7 |  |
| $11-20$ | 372.3 | 261.9 | 23.6 | 61.0 | 14.8 | 11.0 | - |  |
| $21-30$ | 295.0 | 235.2 | 24.6 | 21.5 | 3.4 | 10.3 | - |  |
| $31-40$ | 116.8 | 80.7 | 12.3 | 12.4 | - | 11.4 | - |  |
| $41-50$ | 56.1 | 3.0 | 16.6 | 9.5 | 9.4 | 17.6 | - |  |
| $51-60$ | 72.3 | - | 7.0 | 14.1 | 12.6 | 38.5 | - |  |
| $61-70$ | 22.7 | - | 10.0 | 1.8 | 5.0 | 5.9 | - |  |
| $71-80$ | 50.7 | - | 8.6 | 3.4 | 14.1 | 24.5 | - |  |
| $81+$ | 55.9 | - | - | 2.4 | 10.9 | 42.6 | - |  |
|  | $1,498.7$ | 760.3 | 126.0 | 240.1 | 136.0 | 210.6 | 25.7 |  |

[^4]Table 15—Area of timberland by stand-age class and forest management type, nonindustrial private ownerships, North Carolina, 2002

| Stand-age class | All types | Forest management type |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Pine plantation | Natural pine | Oak- <br> pine | Upland hardwood | Lowland hardwood | Nonstocked |
| Years | Thousand acres |  |  |  |  |  |  |
| 0-10 | 2,633.9 | 314.3 | 405.2 | 613.8 | 973.5 | 300.2 | 26.9 |
| 11-20 | 1,996.6 | 474.0 | 400.2 | 414.8 | 531.6 | 176.0 | - |
| 21-30 | 1,413.8 | 283.7 | 267.3 | 273.5 | 444.0 | 141.0 | 4.4 |
| 31-40 | 1,463.9 | 124.3 | 370.9 | 288.1 | 505.3 | 175.3 | - |
| 41-50 | 1,512.8 | 14.3 | 320.8 | 241.1 | 773.4 | 163.3 | - |
| 51-60 | 1,580.3 | 6.3 | 226.2 | 263.9 | 905.2 | 178.7 | - |
| 61-70 | 1,327.5 | 5.2 | 187.7 | 175.4 | 780.0 | 179.2 | - |
| 71-80 | 912.6 | - | 81.9 | 123.4 | 578.9 | 128.3 | - |
| 81+ | 993.1 | - | 50.3 | 88.6 | 673.2 | 181.0 | - |
| All classes | 13,834.4 | 1,222.0 | 2,310.5 | 2,482.6 | 6,165.1 | 1,623.0 | 31.2 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 16-Area of nonindustrial private timberland by ownership, forested tract-size class, and forest management type, North Carolina, 2002

|  |  | Forest management type |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Ownership and forested <br> tract-size class | All <br> types | Pine <br> plantation | Natural <br> pine | Oak- <br> pine | Upland <br> hardwood | Lowland <br> hardwood | Nonstocked |

Corporate
$\leq 10$
$11-50$
$51-100$
$101-200$
$201-500$
$\geq 501$
$\quad$ Total

| 95.7 | 3.6 | 7.3 | 8.5 | 68.3 | 8.0 | - |
| ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| 261.8 | 18.6 | 27.2 | 37.7 | 163.2 | 15.1 | - |
| 297.1 | 67.8 | 41.0 | 58.1 | 86.7 | 43.5 | - |
| 341.6 | 59.9 | 36.5 | 68.9 | 109.2 | 65.9 | 1.2 |
| 409.2 | 71.0 | 47.1 | 73.3 | 141.2 | 71.5 | 5.1 |
| 985.7 | 148.9 | 172.6 | 122.7 | 321.9 | 219.6 | - |
| $2,391.1$ | 369.8 | 331.6 | 369.2 | 890.6 | 423.6 | 6.3 |

All nonindustrial private

| $\leq 10$ | $1,434.4$ | 52.2 | 265.7 | 260.2 | 782.1 | 74.2 | - |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| $11-50$ | $3,688.7$ | 251.8 | 693.4 | 724.1 | $1,726.0$ | 288.4 | 4.9 |
| $51-100$ | $2,980.0$ | 268.4 | 435.5 | 563.5 | $1,350.0$ | 357.4 | 5.1 |
| $101-200$ | $2,407.8$ | 213.8 | 392.0 | 446.1 | $1,041.4$ | 303.8 | 10.8 |
| $201-500$ | $1,664.0$ | 213.0 | 230.5 | 250.5 | 683.3 | 276.9 | 9.7 |
| $\geq 501$ | $1,659.5$ | 222.8 | 293.3 | 238.2 | 582.1 | 322.3 | 0.8 |
| $\quad$ Total | $13,834.4$ | $1,222.0$ | $2,310.5$ | $2,482.6$ | $6,165.1$ | $1,623.0$ | 31.2 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 17—Number of live trees on timberland by species and diameter class, North Carolina, 2002

| Species | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Diameter class (inches at breast height) |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{gathered} \hline 1.0- \\ 2.9 \end{gathered}$ | $\begin{gathered} 3.0- \\ 4.9 \end{gathered}$ | $\begin{aligned} & \hline 5.0- \\ & 6.9 \end{aligned}$ | $\begin{gathered} \hline 7.0- \\ 8.9 \end{gathered}$ | $\begin{aligned} & 9.0- \\ & 10.9 \end{aligned}$ | $\begin{gathered} \hline 11.0- \\ 12.9 \end{gathered}$ | $\begin{gathered} \hline 13.0- \\ 14.9 \end{gathered}$ | $\begin{gathered} \hline 15.0- \\ 16.9 \end{gathered}$ | $\begin{gathered} \hline 17.0- \\ 18.9 \end{gathered}$ | $\begin{aligned} & \hline 19.0- \\ & 20.9 \end{aligned}$ | $\begin{gathered} \hline 21.0- \\ 28.9 \end{gathered}$ | $\begin{gathered} \hline 29.0 \text { and } \\ \text { larger } \\ \hline \end{gathered}$ |
|  | Thousand trees |  |  |  |  |  |  |  |  |  |  |  |  |
| Softwood |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Longleaf pine | 56,122 | 13,929 | 11,488 | 8,866 | 7,359 | 4,643 | 4,460 | 2,773 | 1,659 | 737 | 86 | 122 | - |
| Slash pine | 30,230 | 16,976 | 4,346 | 3,056 | 2,736 | 1,933 | 682 | 306 | 165 | 30 | - | - | - |
| Shortleaf pine | 99,069 | 30,907 | 14,654 | 13,675 | 13,932 | 11,749 | 7,585 | 4,471 | 1,198 | 698 | 101 | 99 | - |
| Loblolly pine | 1,935,135 | 852,703 | 410,709 | 270,028 | 186,612 | 100,778 | 53,241 | 30,377 | 15,927 | 7,411 | 3,928 | 3,259 | 162 |
| Pond pine | 144,603 | 49,792 | 40,994 | 20,434 | 14,577 | 9,123 | 5,484 | 2,506 | 954 | 394 | 113 | 232 | - |
| Virginia pine | 349,285 | 180,104 | 64,550 | 36,935 | 28,293 | 20,677 | 12,072 | 4,638 | 1,624 | 214 | 75 | 103 | - |
| Pitch pine | 12,472 | 1,230 | 3,324 | 1,613 | 1,837 | 1,342 | 1,438 | 873 | 415 | 254 | 73 | 73 | - |
| Table Mountain pine | 4,455 | 2,349 | 713 | 264 | 345 | 284 | 242 | 136 | 122 | - | - | - | - |
| Eastern white pine | 156,929 | 78,200 | 31,346 | 15,055 | 10,948 | 5,951 | 4,718 | 3,176 | 2,196 | 1,873 | 1,546 | 1,598 | 322 |
| Eastern hemlock | 77,485 | 38,436 | 17,939 | 9,226 | 4,574 | 1,925 | 2,051 | 1,191 | 920 | 341 | 306 | 389 | 187 |
| Spruce and fir | 16,455 | 9,375 | 2,696 | 1,468 | 1,394 | 585 | 379 | 247 | 67 | 132 | 23 | 89 | - |
| Baldcypress | 21,031 | 9,098 | 1,021 | 1,841 | 1,958 | 1,016 | 1,399 | 1,265 | 1,146 | 769 | 549 | 828 | 141 |
| Pondcypress | 10,483 | 2,817 | 2,230 | 1,201 | 1,155 | 895 | 616 | 601 | 298 | 148 | 145 | 291 | 86 |
| Atlantic white-cedar | 13,267 | 7,950 | 3,219 | 724 | 366 | 336 | 213 | 184 | 121 | 86 | - | 68 | - |
| Redcedars | 153,012 | 103,646 | 32,121 | 9,137 | 4,720 | 1,779 | 1,131 | 259 | 189 | 30 | - | - | - |
| Total softwoods | 3,080,033 | 1,397,512 | 641,350 | 393,523 | 280,806 | 163,016 | 95,711 | 53,003 | 27,001 | 13,117 | 6,945 | 7,151 | 898 |
| Hardwood |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Select white oaks | 303,064 | 145,990 | 54,128 | 28,015 | 20,998 | 16,273 | 10,856 | 8,531 | 7,586 | 4,392 | 2,543 | 3,414 | 338 |
| Select red oaks | 129,867 | 68,427 | 17,553 | 10,317 | 8,550 | 6,329 | 4,664 | 4,001 | 3,129 | 2,250 | 1,615 | 2,549 | 483 |
| Other white oaks | 212,849 | 78,842 | 39,744 | 23,748 | 20,112 | 16,702 | 11,188 | 8,129 | 5,043 | 3,307 | 2,644 | 2,883 | 507 |
| Other red oaks | 725,656 | 470,409 | 98,102 | 48,920 | 33,601 | 25,545 | 18,092 | 11,632 | 7,466 | 4,448 | 2,875 | 4,047 | 519 |
| Hickory | 253,503 | 149,287 | 37,854 | 22,157 | 15,238 | 10,384 | 7,462 | 5,026 | 2,883 | 1,917 | 543 | 722 | 30 |
| Yellow birch | 21,855 | 9,747 | 5,346 | 2,805 | 1,906 | 836 | 622 | 269 | 124 | 87 | 36 | 77 | - |
| Hard maple | 54,242 | 32,657 | 10,828 | 3,923 | 2,243 | 1,499 | 870 | 841 | 626 | 266 | 64 | 322 | 103 |
| Soft maple | 2,000,183 | 1,417,173 | 316,393 | 117,601 | 64,077 | 36,191 | 19,739 | 12,091 | 7,592 | 4,501 | 2,059 | 2,557 | 209 |
| Beech | 115,085 | 76,535 | 17,507 | 6,169 | 4,089 | 3,733 | 2,159 | 1,682 | 1,556 | 547 | 488 | 542 | 78 |
| Sweetgum | 1,549,924 | 1,113,789 | 248,050 | 80,411 | 44,167 | 24,782 | 14,699 | 10,945 | 6,036 | 3,320 | 1,743 | 1,820 | 162 |
| Tupelo and blackgum | 627,398 | 389,991 | 100,137 | 45,827 | 30,042 | 22,236 | 15,430 | 10,195 | 6,770 | 3,108 | 1,736 | 1,658 | 268 |
| Ash | 246,232 | 158,699 | 44,902 | 15,565 | 10,033 | 6,133 | 4,014 | 2,424 | 1,627 | 1,115 | 823 | 800 | 97 |
| Cottonwood | 6,806 | 5,056 | 563 | 270 | 264 | 245 | 56 | 111 | 106 | 83 | - | 52 | - |
| Basswood | 15,280 | 6,266 | 3,307 | 1,285 | 1,111 | 674 | 717 | 888 | 566 | 215 | 157 | 94 | - |
| Yellow-poplar | 707,948 | 422,736 | 97,043 | 50,472 | 38,733 | 27,753 | 20,089 | 17,210 | 11,240 | 8,427 | 6,167 | 7,319 | 759 |
| Bay and magnolia | 395,206 | 303,267 | 62,347 | 16,561 | 6,678 | 3,511 | 1,481 | 797 | 245 | 175 | 32 | 112 | - |
| Black cherry | 250,709 | 185,947 | 41,365 | 13,279 | 5,193 | 2,508 | 1,053 | 681 | 385 | 55 | 93 | 150 | - |
| Black walnut | 15,184 | 5,561 | 3,775 | 1,740 | 1,110 | 1,042 | 779 | 500 | 320 | 190 | 105 | 62 | - |
| Sycamore | 13,025 | 5,493 | 1,474 | 1,274 | 1,336 | 1,036 | 593 | 487 | 304 | 229 | 338 | 403 | 58 |
| Black locust | 64,957 | 31,042 | 14,928 | 5,879 | 4,389 | 3,113 | 2,562 | 1,300 | 899 | 340 | 187 | 285 | 33 |
| Elm | 139,732 | 91,756 | 23,661 | 11,495 | 5,868 | 2,877 | 1,883 | 880 | 637 | 320 | 117 | 173 | 65 |
| Other Eastern |  |  |  |  |  |  |  |  |  |  |  |  |  |
| hardwoods | 2,302,570 | 1,692,167 | 385,515 | 128,039 | 53,138 | 23,387 | 10,689 | 4,126 | 2,356 | 1,680 | 733 | 708 | 32 |
| Total hardwoods | 10,151,275 | 6,860,837 | 1,624,522 | 635,752 | 372,876 | 236,789 | 149,697 | 102,746 | 67,496 | 40,972 | 25,098 | 30,749 | 3,741 |
| All species | 13,231,309 | 8,258,349 | 2,265,872 | 1,029,275 | 653,682 | 399,805 | 245,408 | 155,749 | 94,497 | 54,089 | 32,043 | 37,900 | 4,639 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell.

Table 18-Number of growing-stock trees on timberland by species and diameter class, North Carolina, 2002

| Species | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Diameter class (inches at breast height) |  |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{aligned} & 1.0- \\ & 2.9 \end{aligned}$ | $\begin{aligned} & \hline 3.0- \\ & 4.9 \end{aligned}$ | $\begin{aligned} & \hline 5.0- \\ & 6.9 \end{aligned}$ | $\begin{aligned} & \hline 7.0- \\ & 8.9 \end{aligned}$ | $\begin{aligned} & 9.0- \\ & 10.9 \end{aligned}$ | $\begin{gathered} \hline 11.0- \\ 12.9 \end{gathered}$ | $\begin{gathered} \hline 13.0- \\ 14.9 \end{gathered}$ | $\begin{aligned} & 15.0- \\ & 16.9 \end{aligned}$ | $\begin{aligned} & 17.0- \\ & 18.9 \end{aligned}$ | $\begin{aligned} & \hline 19.0- \\ & 20.9 \end{aligned}$ | $\begin{aligned} & \hline 21.0- \\ & 28.9 \end{aligned}$ | $\begin{gathered} 29.0 \text { and } \\ \text { larger } \end{gathered}$ |
|  | Thousand trees |  |  |  |  |  |  |  |  |  |  |  |  |
| Softwood |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Longleaf pine | 53,476 | 12,805 | 10,401 | 8,660 | 7,245 | 4,587 | 4,432 | 2,773 | 1,628 | 737 | 86 | 122 | - |
| Slash pine | 28,676 | 16,356 | 3,618 | 2,939 | 2,677 | 1,903 | 682 | 306 | 165 | 30 | - | - | - |
| Shortleaf pine | 86,577 | 20,731 | 13,788 | 12,823 | 13,570 | 11,607 | 7,585 | 4,437 | 1,138 | 698 | 101 | 99 | - |
| Loblolly pine | 1,639,960 | 616,420 | 368,076 | 262,085 | 182,843 | 97,988 | 51,979 | 30,257 | 15,746 | 7,341 | 3,902 | 3,161 | 162 |
| Pond pine | 116,272 | 33,674 | 33,713 | 17,128 | 13,350 | 8,756 | 5,484 | 2,474 | 954 | 394 | 113 | 232 | - |
| Virginia pine | 260,492 | 111,222 | 51,556 | 33,152 | 27,013 | 19,804 | 11,485 | 4,432 | 1,468 | 214 | 75 | 71 | - |
| Pitch pine | 11,284 | 766 | 3,056 | 1,468 | 1,743 | 1,227 | 1,438 | 837 | 386 | 217 | 73 | 73 | - |
| Table Mountain pine | 2,133 | 445 | 445 | 264 | 226 | 284 | 211 | 136 | 122 | - | - | - | - |
| Eastern white pine | 128,743 | 57,666 | 25,957 | 14,056 | 10,384 | 5,715 | 4,587 | 3,140 | 2,096 | 1,825 | 1,469 | 1,526 | 322 |
| Eastern hemlock | 55,064 | 20,333 | 15,493 | 8,281 | 4,428 | 1,637 | 1,745 | 1,170 | 855 | 341 | 306 | 317 | 158 |
| Spruce and fir | 11,901 | 5,217 | 2,696 | 1,328 | 1,254 | 539 | 340 | 247 | 36 | 132 | 23 | 89 | - |
| Baldcypress | 18,556 | 7,462 | 658 | 1,758 | 1,834 | 897 | 1,399 | 1,265 | 1,146 | 738 | 549 | 739 | 111 |
| Pondcypress | 10,349 | 2,817 | 2,230 | 1,201 | 1,128 | 868 | 616 | 601 | 298 | 148 | 115 | 266 | 61 |
| Atlantic white-cedar | 11,598 | 6,538 | 3,219 | 575 | 307 | 311 | 213 | 184 | 97 | 86 | - | 68 | - |
| Redcedars | 97,127 | 59,226 | 24,291 | 7,283 | 3,860 | 1,285 | 825 | 172 | 155 | 30 | - | - | - |
| Total softwoods | $\underline{\text { 2,532,208 }}$ | 971,678 | 559,197 | 373,001 | 271,862 | 157,408 | 93,021 | 52,431 | 26,290 | 12,931 | 6,812 | 6,763 | 814 |
| Hardwood |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Select white oaks | 187,843 | 53,207 | 40,003 | 24,364 | 19,637 | 15,156 | 10,423 | 8,125 | 7,312 | 4,139 | 2,363 | 2,967 | 147 |
| Select red oaks | 67,985 | 17,638 | 11,083 | 8,662 | 7,755 | 5,673 | 4,077 | 3,776 | 2,864 | 2,085 | 1,499 | 2,419 | 454 |
| Other white oaks | 124,575 | 23,990 | 21,426 | 18,594 | 16,877 | 14,208 | 9,718 | 7,089 | 4,547 | 3,022 | 2,366 | 2,404 | 334 |
| Other red oaks | 393,850 | 193,161 | 64,041 | 40,501 | 29,037 | 23,063 | 15,878 | 10,629 | 6,904 | 3,987 | 2,737 | 3,515 | 397 |
| Hickory | 139,937 | 54,059 | 26,429 | 18,781 | 13,690 | 9,779 | 6,857 | 4,763 | 2,680 | 1,763 | 443 | 663 | 30 |
| Yellow birch | 10,766 | 2,833 | 3,111 | 1,983 | 1,408 | 631 | 493 | 164 | 95 | - | - | 48 | - |
| Hard maple | 18,514 | 5,026 | 5,060 | 2,958 | 1,775 | 1,252 | 603 | 739 | 478 | 266 | 64 | 293 | - |
| Soft maple | 703,323 | 361,079 | 156,105 | 77,801 | 45,693 | 27,751 | 13,633 | 9,118 | 5,900 | 3,133 | 1,438 | 1,562 | 110 |
| Beech | 35,287 | 11,658 | 8,368 | 4,211 | 3,116 | 2,677 | 1,547 | 1,447 | 1,062 | 404 | 296 | 423 | 78 |
| Sweetgum | 1,068,775 | 712,440 | 189,057 | 69,259 | 39,533 | 22,480 | 13,567 | 10,117 | 5,635 | 3,195 | 1,630 | 1,732 | 130 |
| Tupelo and blackgum | 299,817 | 122,664 | 61,601 | 35,919 | 25,600 | 19,405 | 13,650 | 9,278 | 6,177 | 2,663 | 1,572 | 1,174 | 114 |
| Ash | 91,623 | 35,910 | 22,401 | 10,556 | 7,816 | 5,224 | 3,449 | 2,185 | 1,502 | 1,079 | 728 | 741 | 32 |
| Cottonwood | 4,789 | 3,683 | - | 243 | 237 | 218 | 56 | 111 | 106 | 83 | - | 52 | - |
| Basswood | 7,942 | 1,249 | 1,698 | 1,040 | 953 | 591 | 610 | 826 | 530 | 215 | 157 | 73 | - |
| Yellow-poplar | 555,671 | 293,242 | 85,787 | 45,866 | 35,932 | 26,176 | 18,839 | 16,763 | 10,948 | 8,307 | 6,001 | 7,177 | 633 |
| Bay and magnolia | 192,598 | 128,519 | 41,138 | 12,354 | 5,261 | 2,901 | 1,273 | 680 | 213 | 147 | - | 112 | - |
| Black cherry | 73,687 | 44,422 | 16,275 | 6,934 | 2,863 | 1,611 | 602 | 392 | 349 | 19 | 93 | 127 | - |
| Black walnut | 4,603 | 776 | - | 998 | 677 | 742 | 572 | 436 | 194 | 148 | 31 | 29 | - |
| Sycamore | 8,717 | 2,316 | 1,110 | 1,097 | 1,184 | 931 | 558 | 453 | 203 | 199 | 304 | 304 | 58 |
| Black locust | 24,664 | 6,012 | 6,682 | 3,460 | 2,789 | 2,245 | 1,481 | 903 | 599 | 275 | 117 | 68 | 33 |
| Elm | 53,769 | 20,424 | 14,540 | 8,431 | 4,626 | 2,397 | 1,557 | 695 | 548 | 260 | 117 | 109 | 65 |
| Other Eastern hardwoods | 526,806 | 298,414 | 111,848 | 55,687 | 31,460 | 14,542 | 7,364 | 3,165 | 1,730 | 1,322 | 632 | 642 | - |
| Total hardwoods | $\underline{\text { 4,595,541 }}$ | 2,392,722 | 887,763 | 449,699 | 297,919 | 199,653 | 126,807 | 91,854 | 60,576 | 36,711 | 22,588 | 26,634 | 2,615 |
| All species | 7,127,749 | 3,364,400 | 1,446,960 | 822,700 | 569,781 | 357,061 | 219,828 | 144,285 | 86,866 | 49,642 | 29,400 | 33,397 | 3,429 |

[^5]A dash ( - ) indicates no sample for the cell.

Table 19—Volume of live trees on timberland by species and diameter class, North Carolina, 2002

| $\underline{\text { Species }}$ | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Diameter class (inches at breast height) |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{aligned} & \hline 5.0- \\ & 6.9 \end{aligned}$ | $\begin{gathered} 7.0- \\ 8.9 \end{gathered}$ | $\begin{aligned} & 9.0- \\ & 10.9 \end{aligned}$ | $\begin{gathered} 11.0- \\ 12.9 \end{gathered}$ | $\begin{gathered} 13.0- \\ 14.9 \end{gathered}$ | $\begin{gathered} 15.0- \\ 16.9 \end{gathered}$ | $\begin{aligned} & 17.0- \\ & 18.9 \end{aligned}$ | $\begin{aligned} & 19.0- \\ & 20.9 \end{aligned}$ | $\begin{aligned} & 21.0- \\ & 28.9 \end{aligned}$ | 29.0 and larger |
|  | Million cubic feet |  |  |  |  |  |  |  |  |  |  |
| Softwood |  |  |  |  |  |  |  |  |  |  |  |
| Longleaf pine | 409.2 | 22.3 | 46.9 | 58.4 | 82.6 | 79.2 | 63.8 | 36.4 | 6.3 | 13.5 | - |
| Slash pine | 74.0 | 6.7 | 16.4 | 21.5 | 12.5 | 8.7 | 6.5 | 1.7 | - | - | - |
| Shortleaf pine | 726.8 | 38.9 | 102.1 | 161.3 | 166.8 | 138.3 | 53.4 | 44.7 | 8.7 | 12.6 | - |
| Loblolly pine | 6,709.4 | 606.8 | 1,102.1 | 1,190.1 | 1,069.9 | 932.7 | 688.5 | 429.7 | 295.3 | 359.3 | 34.8 |
| Pond pine | 452.4 | 39.5 | 75.8 | 96.7 | 96.4 | 63.3 | 32.9 | 20.4 | 7.4 | 20.1 | - |
| Virginia pine | 1,110.5 | 124.4 | 217.0 | 282.2 | 254.1 | 141.0 | 66.0 | 11.6 | 5.4 | 8.9 | - |
| Pitch pine | 121.6 | 4.2 | 12.2 | 15.7 | 28.1 | 23.4 | 15.6 | 11.2 | 5.2 | 6.1 | - |
| Table Mountain pine | 20.5 | 1.2 | 2.1 | 4.1 | 4.9 | 3.5 | 4.7 | - | - | - | - |
| Eastern white pine | 879.1 | 41.2 | 66.2 | 68.1 | 90.5 | 86.3 | 83.1 | 98.8 | 106.7 | 179.5 | 58.8 |
| Eastern hemlock | 275.2 | 18.6 | 22.8 | 16.8 | 29.8 | 27.8 | 33.2 | 17.1 | 20.1 | 35.7 | 53.3 |
| Spruce and fir | 42.0 | 3.0 | 6.4 | 5.2 | 5.2 | 5.2 | 1.9 | 6.6 | 1.1 | 7.4 | - |
| Baldcypress | 312.7 | 6.2 | 13.9 | 12.6 | 28.9 | 36.4 | 44.6 | 40.1 | 36.2 | 71.4 | 22.3 |
| Pondcypress | 110.9 | 3.9 | 8.1 | 10.4 | 11.1 | 15.7 | 10.6 | 6.1 | 7.9 | 24.0 | 13.0 |
| Atlantic white-cedar | 27.7 | 2.3 | 2.6 | 3.7 | 3.5 | 4.5 | 3.0 | 3.5 | - | 4.4 | - |
| Redcedars | 91.3 | 22.6 | 23.8 | 16.9 | 16.3 | 5.5 | 5.1 | 1.0 | - | - | - |
| Total softwoods | 11,363.2 | 941.7 | 1,718.5 | 1,963.7 | 1,900.5 | 1,571.5 | 1,113.0 | 728.8 | 500.3 | 743.0 | 182.2 |
| Hardwood |  |  |  |  |  |  |  |  |  |  |  |
| Select white oaks | 1,907.6 | 74.9 | 131.9 | 193.5 | 207.2 | 240.2 | 295.3 | 223.1 | 163.7 | 313.6 | 64.3 |
| Select red oaks | 1,014.5 | 31.2 | 56.8 | 76.8 | 85.1 | 103.9 | 110.0 | 110.2 | 104.6 | 243.9 | 92.2 |
| Other white oaks | 1,522.1 | 60.7 | 120.1 | 178.1 | 188.1 | 196.1 | 170.8 | 143.4 | 144.1 | 243.7 | 76.9 |
| Other red oaks | 2,321.9 | 133.2 | 204.4 | 278.0 | 318.0 | 294.5 | 261.3 | 211.1 | 172.4 | 347.5 | 101.5 |
| Hickory | 867.5 | 54.4 | 92.9 | 123.0 | 141.4 | 142.2 | 107.9 | 97.4 | 34.6 | 69.4 | 4.4 |
| Yellow birch | 64.7 | 10.3 | 12.3 | 8.6 | 10.8 | 7.3 | 4.8 | 3.6 | 1.4 | 5.7 | - |
| Hard maple | 163.7 | 11.4 | 14.5 | 18.0 | 15.9 | 21.3 | 21.8 | 14.2 | 4.3 | 29.6 | 12.6 |
| Soft maple | 2,456.9 | 340.3 | 386.3 | 384.4 | 319.1 | 283.3 | 238.4 | 183.1 | 104.7 | 186.6 | 30.7 |
| Beech | 328.3 | 16.4 | 23.6 | 40.3 | 38.1 | 42.6 | 53.8 | 25.8 | 27.7 | 47.5 | 12.6 |
| Sweetgum | 2,138.2 | 184.0 | 272.4 | 301.9 | 295.6 | 324.6 | 245.4 | 184.6 | 119.9 | 177.9 | 31.9 |
| Tupelo and blackgum | 1,743.4 | 123.9 | 190.3 | 261.2 | 288.9 | 266.3 | 234.4 | 130.4 | 97.6 | 117.4 | 33.1 |
| Ash | 577.0 | 43.1 | 63.7 | 71.9 | 77.2 | 68.1 | 58.3 | 55.8 | 56.1 | 70.1 | 12.7 |
| Cottonwood | 23.3 | 0.8 | 1.9 | 3.0 | 0.9 | 3.2 | 3.6 | 4.8 | - | 5.1 | - |
| Basswood | 122.8 | 4.5 | 7.6 | 9.2 | 14.1 | 30.0 | 24.4 | 11.5 | 12.9 | 8.6 | - |
| Yellow-poplar | 4,119.8 | 147.1 | 266.9 | 358.8 | 427.9 | 541.9 | 490.1 | 484.7 | 451.1 | 797.3 | 153.8 |
| Bay and magnolia | 185.8 | 43.5 | 38.7 | 38.4 | 24.4 | 18.6 | 7.3 | 7.0 | 1.1 | 7.0 | - |
| Black cherry | 157.0 | 32.3 | 27.9 | 25.6 | 16.9 | 16.6 | 13.6 | 2.6 | 6.1 | 15.5 | - |
| Black walnut | 68.6 | 4.7 | 6.2 | 10.1 | 12.6 | 12.5 | 9.7 | 6.1 | 4.5 | 2.3 | - |
| Sycamore | 153.2 | 4.9 | 10.0 | 13.5 | 12.3 | 13.5 | 10.9 | 11.9 | 22.2 | 41.8 | 12.1 |
| Black locust | 198.8 | 14.1 | 23.6 | 30.9 | 36.4 | 27.5 | 26.0 | 13.0 | 8.1 | 14.8 | 4.5 |
| Elm | 215.8 | 29.2 | 34.0 | 29.8 | 32.3 | 22.9 | 21.6 | 14.7 | 7.2 | 14.9 | 9.2 |
| Other Eastern |  |  |  |  |  |  |  |  |  |  |  |
| hardwoods | 1,297.7 | 289.9 | 275.4 | 227.6 | 169.5 | 93.0 | 76.1 | 71.2 | 38.9 | 54.6 | 1.3 |
| Total hardwoods | 21,648.7 | 1,655.0 | 2,261.4 | 2,682.5 | 2,732.6 | 2,770.1 | 2,485.4 | 2,010.0 | 1,583.3 | 2,814.7 | 653.8 |
| All species | 33,011.9 | 2,596.7 | 3,979.9 | 4,646.2 | 4,633.1 | 4,341.6 | 3,598.4 | 2,738.7 | 2,083.6 | 3,557.7 | 836.1 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 20—Volume of growing-stock trees on timberland by species and diameter class, North Carolina, 2002

| $\underline{\text { Species }}$ | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Diameter class (inches at breast height) |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{aligned} & \hline 5.0- \\ & 6.9 \end{aligned}$ | $\begin{aligned} & \hline 7.0- \\ & 8.9 \end{aligned}$ | $\begin{aligned} & 9.0- \\ & 10.9 \end{aligned}$ | $\begin{aligned} & 11.0- \\ & 12.9 \end{aligned}$ | $\begin{aligned} & 13.0- \\ & 14.9 \end{aligned}$ | $\begin{aligned} & 15.0- \\ & 16.9 \end{aligned}$ | $\begin{gathered} 17.0- \\ 18.9 \end{gathered}$ | $\begin{aligned} & 19.0- \\ & 20.9 \end{aligned}$ | $\begin{aligned} & 21.0- \\ & 28.9 \end{aligned}$ | $\begin{gathered} \hline 29.0 \text { and } \\ \text { larger } \end{gathered}$ |
|  | Million cubic feet |  |  |  |  |  |  |  |  |  |  |
| Softwood |  |  |  |  |  |  |  |  |  |  |  |
| Longleaf pine | 406.8 | 22.0 | 46.4 | 57.9 | 82.3 | 79.2 | 63.0 | 36.4 | 6.3 | 13.5 | - |
| Slash pine | 73.2 | 6.5 | 16.0 | 21.2 | 12.5 | 8.7 | 6.5 | 1.7 | - | - | - |
| Shortleaf pine | 718.5 | 36.9 | 100.1 | 159.7 | 166.8 | 137.6 | 51.3 | 44.7 | 8.7 | 12.6 | - |
| Loblolly pine | 6,610.6 | 592.9 | 1,082.9 | 1,165.4 | 1,050.3 | 930.0 | 682.7 | 426.8 | 293.7 | 351.1 | 34.8 |
| Pond pine | 439.9 | 35.1 | 71.2 | 93.6 | 96.4 | 62.9 | 32.9 | 20.4 | 7.4 | 20.1 | - |
| Virginia pine | 1,058.9 | 115.6 | 209.5 | 272.0 | 243.6 | 135.0 | 60.0 | 11.6 | 5.4 | 6.2 | - |
| Pitch pine | 117.2 | 3.9 | 11.9 | 14.7 | 28.1 | 22.7 | 15.0 | 9.6 | 5.2 | 6.1 | - |
| Table Mountain pine | 19.3 | 1.2 | 1.5 | 4.1 | 4.4 | 3.5 | 4.7 | - | - | - | - |
| Eastern white pine | 854.3 | 39.0 | 63.1 | 66.1 | 88.3 | 85.2 | 80.3 | 97.0 | 101.6 | 174.8 | 58.8 |
| Eastern hemlock | 258.4 | 17.0 | 22.2 | 14.3 | 25.8 | 27.3 | 31.2 | 17.1 | 20.1 | 30.7 | 52.6 |
| Spruce and fir | 39.6 | 2.7 | 5.9 | 4.9 | 4.7 | 5.2 | 1.1 | 6.6 | 1.1 | 7.4 | - |
| Baldcypress | 301.5 | 6.0 | 13.3 | 11.5 | 28.9 | 36.4 | 44.6 | 39.7 | 36.2 | 67.7 | 17.2 |
| Pondcypress | 107.0 | 3.9 | 8.0 | 10.3 | 11.1 | 15.7 | 10.6 | 6.1 | 6.8 | 23.3 | 11.2 |
| Atlantic white-cedar | 26.3 | 1.9 | 2.2 | 3.5 | 3.5 | 4.5 | 2.6 | 3.5 | - | 4.4 | - |
| Redcedars | 72.6 | 18.3 | 19.8 | 12.7 | 12.7 | 3.9 | 4.2 | 1.0 | - | - | - |
| Total softwoods | $\underline{\underline{11,104.1}}$ | 903.2 | 1,674.0 | 1,911.8 | 1,859.3 | 1,557.8 | 1,090.9 | 722.1 | 492.4 | 717.9 | 174.7 |
| Hardwood |  |  |  |  |  |  |  |  |  |  |  |
| Select white oaks | 1,772.3 | 67.1 | 125.1 | 182.1 | 200.9 | 231.4 | 286.1 | 214.9 | 155.0 | 283.9 | 25.9 |
| Select red oaks | 959.9 | 27.1 | 52.6 | 70.7 | 76.7 | 99.4 | 103.2 | 103.1 | 99.8 | 237.6 | 89.7 |
| Other white oaks | 1,352.9 | 50.2 | 103.8 | 155.9 | 168.8 | 174.8 | 157.5 | 133.9 | 131.2 | 218.0 | 58.8 |
| Other red oaks | 2,121.9 | 114.6 | 182.1 | 256.5 | 286.0 | 276.3 | 247.3 | 193.6 | 165.8 | 316.5 | 83.2 |
| Hickory | 818.2 | 48.3 | 86.1 | 116.9 | 132.2 | 136.5 | 103.1 | 93.2 | 31.0 | 66.5 | 4.4 |
| Yellow birch | 45.8 | 7.7 | 9.5 | 7.1 | 8.7 | 4.7 | 3.7 | - | - | 4.4 | - |
| Hard maple | 127.3 | 9.3 | 11.8 | 15.2 | 11.6 | 18.7 | 16.7 | 14.2 | 4.3 | 25.4 | - |
| Soft maple | 1,866.1 | 238.8 | 290.3 | 311.5 | 236.4 | 224.8 | 195.5 | 140.9 | 80.1 | 129.2 | 18.6 |
| Beech | 258.3 | 11.8 | 18.7 | 30.0 | 28.8 | 37.6 | 39.5 | 20.5 | 19.1 | 39.8 | 12.6 |
| Sweetgum | 2,011.1 | 164.9 | 250.4 | 280.6 | 277.4 | 305.9 | 233.4 | 179.1 | 116.0 | 175.7 | 27.8 |
| Tupelo and blackgum | 1,571.3 | 102.4 | 167.0 | 235.9 | 263.8 | 248.2 | 223.3 | 120.4 | 91.8 | 97.5 | 21.0 |
| Ash | 515.6 | 31.6 | 52.6 | 64.4 | 69.2 | 64.1 | 55.4 | 54.6 | 51.7 | 67.4 | 4.6 |
| Cottonwood | 22.9 | 0.7 | 1.7 | 2.8 | 0.9 | 3.2 | 3.6 | 4.8 | - | 5.1 | - |
| Basswood | 115.6 | 3.9 | 6.6 | 8.2 | 12.9 | 28.9 | 22.8 | 11.5 | 12.9 | 7.8 | - |
| Yellow-poplar | 3,990.7 | 135.5 | 251.0 | 343.6 | 408.7 | 531.5 | 481.4 | 481.7 | 443.0 | 783.1 | 131.2 |
| Bay and magnolia | 157.0 | 34.2 | 31.7 | 32.9 | 21.3 | 16.7 | 6.6 | 6.7 | - | 7.0 | - |
| Black cherry | 106.7 | 18.2 | 16.7 | 17.5 | 10.3 | 11.1 | 12.4 | 1.4 | 6.1 | 13.1 | - |
| Black walnut | 51.7 | 3.0 | 4.0 | 7.5 | 9.7 | 11.3 | 6.6 | 5.7 | 1.9 | 2.1 | - |
| Sycamore | 135.2 | 4.3 | 8.9 | 12.0 | 11.8 | 12.9 | 7.7 | 10.3 | 20.2 | 34.9 | 12.1 |
| Black locust | 138.8 | 8.9 | 16.7 | 24.0 | 23.3 | 20.4 | 18.7 | 11.8 | 6.0 | 4.4 | 4.5 |
| Elm | 180.7 | 22.1 | 27.9 | 25.9 | 28.0 | 18.8 | 19.1 | 13.3 | 7.2 | 9.2 | 9.2 |
| Other Eastern hardwoods | 900.8 | 151.4 | 183.8 | 157.0 | 126.4 | 78.2 | 59.4 | 58.1 | 35.2 | 51.3 | - |
| Total hardwoods | 19,220.8 | 1,256.0 | 1,898.9 | 2,358.0 | 2,414.0 | 2,555.5 | 2,303.1 | 1,873.6 | 1,478.3 | 2,579.8 | 503.6 |
| All species | 30,324.9 | 2,159.3 | 3,572.9 | 4,269.8 | 4,273.3 | 4,113.3 | 3,393.9 | 2,595.7 | 1,970.7 | 3,297.6 | 678.3 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 21-Volume in the saw-log portion of sawtimber trees on timberland by species and diameter class, North Carolina, 2002

| $\underline{\text { Species }}$ | All classes | Diameter class (inches at breast height) |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{aligned} & 9.0- \\ & 10.9 \end{aligned}$ | $\begin{aligned} & 11.0- \\ & 12.9 \end{aligned}$ | $\begin{aligned} & 13.0- \\ & 14.9 \end{aligned}$ | $\begin{aligned} & 15.0- \\ & 16.9 \end{aligned}$ | $\begin{aligned} & 17.0- \\ & 18.9 \end{aligned}$ | $\begin{aligned} & 19.0- \\ & 20.9 \end{aligned}$ | $\begin{aligned} & 21.0- \\ & 28.9 \end{aligned}$ | $29.0 \text { and }$ <br> larger |
|  | Million cubic feet |  |  |  |  |  |  |  |  |
| Softwood |  |  |  |  |  |  |  |  |  |
| Longleaf pine | 315.1 | 48.2 | 75.1 | 75.4 | 61.1 | 35.7 | 6.2 | 13.3 | - |
| Slash pine | 44.6 | 16.9 | 11.4 | 8.3 | 6.4 | 1.6 | - | - | - |
| Shortleaf pine | 527.2 | 129.3 | 151.9 | 130.9 | 50.0 | 44.1 | 8.6 | 12.5 | - |
| Loblolly pine | 4,484.7 | 905.9 | 943.0 | 880.5 | 662.5 | 420.0 | 290.7 | 347.6 | 34.5 |
| Pond pine | 303.4 | 76.1 | 88.0 | 60.0 | 32.1 | 20.1 | 7.3 | 19.9 | - |
| Virginia pine | 642.3 | 218.7 | 218.2 | 125.8 | 57.1 | 11.1 | 5.3 | 6.0 | - |
| Pitch pine | 92.9 | 11.9 | 25.2 | 21.2 | 14.3 | 9.3 | 5.0 | 6.0 | - |
| Table Mountain pine | 15.6 | 3.5 | 4.1 | 3.4 | 4.6 | - | - | - | - |
| Eastern white pine | 705.5 | 52.6 | 78.7 | 79.2 | 76.2 | 93.0 | 98.1 | 170.2 | 57.5 |
| Eastern hemlock | 204.4 | 11.0 | 22.6 | 25.0 | 29.3 | 16.2 | 19.3 | 29.6 | 51.3 |
| Spruce and fir | 28.6 | 3.9 | 4.2 | 4.8 | 1.0 | 6.4 | 1.0 | 7.2 | - |
| Baldcypress | 259.6 | 8.1 | 24.4 | 32.8 | 41.2 | 37.3 | 34.3 | 64.8 | 16.6 |
| Pondcypress | 87.9 | 7.9 | 9.7 | 14.5 | 10.0 | 5.8 | 6.5 | 22.6 | 11.0 |
| Atlantic white-cedar | 20.6 | 2.7 | 3.2 | 4.3 | 2.6 | 3.4 | - | 4.4 | - |
| Redcedars | 30.2 | 10.2 | 11.4 | 3.6 | 4.0 | 0.9 | - | - | - |
| Total softwoods | 7,762.6 | 1,507.1 | 1,671.2 | 1,469.7 | 1,052.4 | 704.9 | 482.3 | 704.1 | 170.9 |
| Hardwood |  |  |  |  |  |  |  |  |  |
| Select white oaks | 1,219.0 | - | 143.9 | 190.5 | 251.0 | 195.3 | 143.7 | 269.5 | 25.1 |
| Select red oaks | 695.9 | - | 54.6 | 79.0 | 86.8 | 89.6 | 88.3 | 213.9 | 83.6 |
| Other white oaks | 903.9 | - | 121.9 | 143.7 | 137.3 | 120.3 | 120.3 | 204.3 | 56.1 |
| Other red oaks | 1,355.5 | - | 205.2 | 227.1 | 216.3 | 174.9 | 153.2 | 298.7 | 80.2 |
| Hickory | 478.0 | - | 96.1 | 112.7 | 90.0 | 83.9 | 28.6 | 62.5 | 4.2 |
| Yellow birch | 17.3 | - | 6.1 | 3.8 | 3.2 | - | - | 4.1 | - |
| Hard maple | 78.9 | - | 8.1 | 15.4 | 14.5 | 12.9 | 4.0 | 24.1 | - |
| Soft maple | 838.6 | - | 162.2 | 178.3 | 165.8 | 124.2 | 71.9 | 118.8 | 17.5 |
| Beech | 167.6 | - | 20.7 | 30.5 | 33.5 | 17.9 | 17.1 | 36.3 | 11.6 |
| Sweetgum | 1,128.3 | - | 194.8 | 252.5 | 207.4 | 165.9 | 110.0 | 170.3 | 27.5 |
| Tupelo and blackgum | 887.8 | - | 188.5 | 201.8 | 193.8 | 108.1 | 84.1 | 91.4 | 20.1 |
| Ash | 304.5 | - | 48.0 | 51.0 | 46.6 | 48.0 | 45.4 | 62.8 | 2.8 |
| Cottonwood | 15.5 | - | 0.7 | 2.5 | 3.1 | 4.4 | - | 4.8 | - |
| Basswood | 83.1 | - | 9.4 | 24.1 | 19.9 | 10.4 | 11.9 | 7.4 | - |
| Yellow-poplar | 2,907.7 | - | 286.7 | 438.8 | 427.2 | 445.1 | 419.3 | 760.9 | 129.9 |
| Bay and magnolia | 47.3 | - | 14.7 | 13.9 | 5.8 | 6.3 | - | 6.7 | - |
| Black cherry | 46.6 | - | 7.6 | 9.2 | 10.8 | 1.3 | 5.6 | 12.2 | - |
| Black walnut | 30.1 | - | 7.0 | 9.0 | 5.6 | 5.0 | 1.7 | 1.8 | - |
| Sycamore | 95.9 | - | 7.8 | 9.9 | 6.5 | 9.1 | 18.3 | 32.8 | 11.6 |
| Black locust | 71.6 | - | 16.6 | 16.1 | 15.6 | 10.2 | 5.2 | 3.9 | 4.0 |
| Elm | 86.0 | - | 19.7 | 15.0 | 16.3 | 11.7 | 6.4 | 8.4 | 8.6 |
| Other Eastern hardwoods | 321.4 | - | 83.8 | 59.8 | 49.5 | 49.8 | 31.9 | 46.5 | - |
| Total hardwoods | 11,780.6 | - | 1,703.9 | 2,084.6 | 2,006.7 | 1,694.1 | 1,366.8 | 2,441.8 | 482.6 |
| All species | 19,543.2 | 1,507.1 | 3,375.1 | 3,554.3 | 3,059.1 | 2,399.1 | 1,849.1 | 3,145.9 | 653.5 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 22-Volume of sawtimber on timberland by species and diameter class, North Carolina, 2002

| Species | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Diameter class (inches at breast height) |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{aligned} & \hline 9.0- \\ & 10.9 \end{aligned}$ | $\begin{aligned} & \hline 11.0- \\ & 12.9 \end{aligned}$ | $\begin{aligned} & \hline 13.0- \\ & 14.9 \\ & \hline \end{aligned}$ | $\begin{aligned} & \hline 15.0- \\ & 16.9 \\ & \hline \end{aligned}$ | $\begin{aligned} & \hline 17.0- \\ & 18.9 \end{aligned}$ | $\begin{aligned} & \hline 19.0- \\ & 20.9 \\ & \hline \end{aligned}$ | $\begin{aligned} & \hline 21.0- \\ & 28.9 \\ & \hline \end{aligned}$ | $\begin{gathered} 29.0 \mathrm{and} \\ \text { larger } \end{gathered}$ |
|  | Million board feet |  |  |  |  |  |  |  |  |
| Softwood |  |  |  |  |  |  |  |  |  |
| Longleaf pine | 1,774.6 | 237.4 | 394.4 | 426.3 | 363.8 | 222.0 | 39.8 | 90.9 | - |
| Slash pine | 229.0 | 78.4 | 57.5 | 45.4 | 37.5 | 10.2 | - | - | - |
| Shortleaf pine | 2,759.3 | 601.1 | 761.0 | 705.7 | 287.7 | 265.5 | 54.2 | 84.2 | - |
| Loblolly pine | 24,709.8 | 4,204.5 | 4,746.4 | 4,819.1 | 3,868.2 | 2,579.1 | 1,861.8 | 2,374.1 | 256.5 |
| Pond pine | 1,594.0 | 353.0 | 439.8 | 322.4 | 182.6 | 120.3 | 45.1 | 130.9 | - |
| Virginia pine | 3,090.3 | 987.0 | 1,037.2 | 634.9 | 303.5 | 61.8 | 30.3 | 35.6 | - |
| Pitch pine | 492.4 | 49.9 | 121.1 | 112.4 | 81.3 | 55.9 | 31.7 | 40.1 | - |
| Table Mountain pine | 81.1 | 15.9 | 20.7 | 18.3 | 26.3 | - | - | - | - |
| Eastern white pine | 4,150.6 | 238.9 | 389.1 | 421.7 | 432.1 | 551.3 | 603.6 | 1,117.5 | 396.4 |
| Eastern hemlock | 1,190.5 | 49.1 | 107.3 | 128.0 | 160.0 | 92.5 | 113.9 | 184.8 | 354.8 |
| Spruce and fir | 160.2 | 18.7 | 21.4 | 25.7 | 5.7 | 37.2 | 6.3 | 45.3 | - |
| Baldcypress | 1,416.0 | 34.3 | 110.3 | 160.8 | 214.1 | 204.4 | 195.5 | 388.3 | 108.3 |
| Pondcypress | 471.5 | 32.1 | 43.7 | 70.6 | 51.4 | 31.3 | 36.8 | 134.8 | 70.9 |
| Atlantic white-cedar | 115.1 | 12.9 | 15.9 | 23.4 | 14.6 | 20.4 | - | 27.8 | - |
| Redcedars | 160.9 | 51.2 | 60.2 | 20.1 | 23.9 | 5.6 | - | - | - |
| Total softwoods | 42,395.5 | 6,964.6 | 8,325.9 | 7,934.7 | 6,052.6 | 4,257.4 | 3,019.1 | 4,654.4 | 1,186.8 |

## Hardwood

| Select white oaks | $6,392.5$ | - | 686.5 | 924.4 | $1,268.5$ | $1,027.9$ | 781.3 | $1,548.2$ | 155.8 |
| :--- | ---: | :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| Select red oaks | $3,760.8$ | - | 257.0 | 380.2 | 435.6 | 468.0 | 477.2 | $1,216.2$ | 526.6 |
| Other white oaks | $4,642.2$ | - | 563.7 | 678.2 | 676.3 | 614.0 | 633.2 | $1,142.3$ | 334.5 |
| Other red oaks | $7,381.9$ | - | $1,021.6$ | $1,137.7$ | $1,125.6$ | 945.6 | 851.4 | $1,770.3$ | 529.7 |
| Hickory | $2,491.4$ | - | 458.7 | 556.8 | 465.2 | 452.1 | 161.0 | 371.2 | 26.4 |
| Yellow birch | 87.3 | - | 29.9 | 18.4 | 16.0 | - | - | 23.0 | - |
| Hard maple | 401.1 | - | 42.6 | 76.3 | 71.9 | 64.8 | 20.4 | 125.1 | - |
| Soft maple | $4,247.9$ | - | 775.2 | 856.1 | 824.1 | 641.3 | 382.2 | 664.2 | 104.7 |
| Beech | 778.7 | - | 105.3 | 142.6 | 153.3 | 81.3 | 77.4 | 165.1 | 53.8 |
| Sweetgum | $6,256.3$ | - | 992.3 | $1,308.6$ | $1,123.6$ | 941.1 | 647.5 | $1,054.6$ | 188.5 |
| Tupelo and blackgum | $4,407.7$ | - | 837.4 | 927.2 | 956.8 | 564.0 | 456.3 | 536.7 | 129.2 |
| Ash | $1,620.4$ | - | 227.3 | 251.6 | 238.6 | 257.0 | 259.1 | 359.8 | 27.0 |
| Cottonwood | 86.0 | - | 3.3 | 12.6 | 16.4 | 24.4 | - | 29.3 | - |
| Basswood | 416.1 | - | 44.2 | 115.9 | 98.7 | 52.9 | 63.3 | 41.0 | - |
| Yellow-poplar | $17,074.7$ | - | $1,478.3$ | $2,320.5$ | $2,368.4$ | $2,584.2$ | $2,529.7$ | $4,881.3$ | 912.2 |
| Bay and magnolia | 233.9 | - | 70.0 | 66.1 | 28.4 | 32.4 | - | 37.0 | - |
| Black cherry | 252.9 | - | 35.9 | 45.9 | 57.0 | 7.4 | 32.6 | 74.2 | - |
| Black walnut | 138.0 | - | 32.9 | 41.0 | 25.0 | 22.9 | 7.7 | 8.5 | - |
| Sycamore | 535.7 | - | 38.3 | 48.5 | 33.0 | 47.9 | 100.6 | 193.6 | 73.8 |
| Black locust | 333.3 | - | 82.4 | 74.9 | 70.7 | 45.8 | 23.5 | 17.5 | 18.5 |
| Elm | 443.2 | - | 95.8 | 73.4 | 82.4 | 60.9 | 34.3 | 45.9 | 50.6 |
| Other Eastern |  |  |  |  |  |  |  |  |  |
| $\quad$ hardwoods | $1,701.4$ | - | 436.9 | 308.3 | 250.8 | 266.5 | 169.9 | 269.1 | - |
| Total hardwoods | $63,683.4$ | - | $8,315.4$ | $10,365.5$ | $10,386.3$ | $9,202.4$ | $7,708.5$ | $14,573.9$ | $3,131.4$ |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 23-Volume of sawtimber on timberland by species, size class, and tree grade, North Carolina, 2002

| Species | All size classes |  |  |  |  |  | Trees $\geq 15.0$ inches d.b.h. |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | All <br> grades | Tree grade |  |  |  |  | All grades | Tree grade |  |  |  |  |
|  |  | 1 | 2 | 3 | 4 | 5 |  | 1 | 2 | 3 | 4 | 5 |
|  | Million board feet |  |  |  |  |  |  |  |  |  |  |  |
| Softwood |  |  |  |  |  |  |  |  |  |  |  |  |
| Longleaf pine | 1,774.6 | 352.6 | 355.4 | 1,045.8 | - | 20.9 | 716.5 | 160.3 | 170.8 | 370.0 | - | 15.3 |
| Slash pine | 229.0 | 5.5 | 25.8 | 197.7 | - | - | 47.7 | - | 10.7 | 37.0 | - | - |
| Shortleaf pine | 2,759.3 | 1,328.4 | 601.9 | 827.8 | - | 1.3 | 691.6 | 369.7 | 112.4 | 209.6 | - | - |
| Loblolly pine | 24,709.8 | 8,021.1 | 4,314.6 | 12,349.1 | - | 25.0 | 10,939.8 | 5,266.5 | 2,180.3 | 3,485.6 | - | 7.4 |
| Pond pine | 1,594.0 | 199.1 | 337.8 | 1,055.4 | - | 1.6 | 478.9 | 109.5 | 139.7 | 229.7 | - | - |
| Virginia pine | 3,090.3 | 214.1 | 296.9 | 2,560.1 | - | 19.3 | 431.2 | 66.5 | 61.5 | 303.1 | - | - |
| Pitch pine | 492.4 | 74.0 | 109.7 | 308.7 | - | - | 209.0 | 44.3 | 54.7 | 109.9 | - | - |
| Table Mountain pine | 81.1 | 7.7 | 10.8 | 61.1 | - | 1.5 | 26.3 | 5.0 | 8.1 | 13.2 | - | - |
| Eastern white pine | 4,150.6 | 1,406.9 | 1,527.5 | 969.1 | 242.1 | 5.0 | 3,100.9 | 1,292.3 | 1,145.6 | 522.4 | 140.5 | - |
| Eastern hemlock | 1,190.5 | 355.7 | 312.7 | 357.8 | 153.4 | 11.0 | 906.0 | 317.7 | 249.8 | 236.8 | 90.8 | 11.0 |
| Spruce and fir | 160.2 | 28.6 | 7.1 | 117.2 | 7.2 | - | 94.4 | 21.7 | - | 72.7 | - | - |
| Baldcypress | 1,416.0 | 810.7 | 330.7 | 253.6 | - | 21.1 | 1,110.6 | 713.7 | 239.7 | 136.1 | - | 21.1 |
| Pondcypress | 471.5 | 288.5 | 106.1 | 76.9 | - | - | 325.2 | 213.3 | 84.5 | 27.3 | - | - |
| Atlantic white-cedar | 115.1 | 21.0 | 51.2 | 42.9 | - | - | 62.9 | 9.7 | 39.9 | 13.3 | - | - |
| Redcedars | 160.9 | 3.0 | 18.2 | 139.8 | - | - | 29.4 | - | - | 29.4 | - | - |
| Total softwoods | 42,395.5 | 13,116.7 | 8,406.5 | 20,363.1 | 402.6 | 106.6 | 19,170.3 | 8,590.3 | 4,497.8 | 5,796.2 | 231.3 | 54.8 |
| Hardwood |  |  |  |  |  |  |  |  |  |  |  |  |
| Select white oaks | 6,392.5 | 1,656.2 | 1,767.6 | 2,052.6 | 646.0 | 270.1 | 4,781.7 | 1,656.2 | 1,477.5 | 1,079.1 | 313.9 | 254.9 |
| Select red oaks | 3,760.8 | 1,281.2 | 1,025.0 | 903.8 | 377.4 | 173.5 | 3,123.6 | 1,281.2 | 895.1 | 548.8 | 231.7 | 166.9 |
| Other white oaks | 4,642.2 | 1,106.6 | 1,335.8 | 1,330.7 | 677.1 | 192.1 | 3,400.3 | 1,106.6 | 1,065.5 | 613.9 | 482.6 | 131.7 |
| Other red oaks | 7,381.9 | 1,208.9 | 1,721.8 | 2,574.8 | 1,610.3 | 266.0 | 5,222.5 | 1,208.9 | 1,477.9 | 1,359.5 | 957.9 | 218.3 |
| Hickory | 2,491.4 | 334.0 | 666.6 | 920.3 | 485.6 | 85.0 | 1,475.9 | 334.0 | 460.7 | 403.1 | 209.0 | 69.1 |
| Yellow birch | 87.3 | - | - | 51.9 | 32.8 | 2.5 | 39.0 | - | - | 23.7 | 15.3 | - |
| Hard maple | 401.1 | 56.3 | 112.3 | 139.3 | 64.2 | 28.9 | 282.2 | 56.3 | 87.5 | 66.6 | 48.1 | 23.7 |
| Soft maple | 4,247.9 | 383.4 | 686.7 | 1,638.3 | 1,223.3 | 316.2 | 2,616.6 | 383.4 | 489.6 | 759.2 | 729.6 | 254.9 |
| Beech | 778.7 | 3.3 | 147.7 | 214.9 | 334.7 | 78.1 | 530.9 | 3.3 | 126.7 | 154.8 | 181.4 | 64.6 |
| Sweetgum | 6,256.3 | 1,606.3 | 1,805.1 | 2,103.7 | 462.4 | 278.9 | 3,955.3 | 1,606.3 | 1,169.3 | 736.9 | 241.4 | 201.4 |
| Tupelo and blackgum | 4,407.7 | 1,106.1 | 1,527.5 | 1,596.5 | 73.1 | 104.5 | 2,643.1 | 1,106.1 | 939.3 | 494.9 | 33.6 | 69.1 |
| Ash | 1,620.4 | 501.4 | 468.1 | 470.6 | 79.9 | 100.4 | 1,141.5 | 501.4 | 324.7 | 202.3 | 40.3 | 72.9 |
| Cottonwood | 86.0 | 34.9 | 24.3 | 26.8 | - | - | 70.1 | 34.9 | 18.0 | 17.2 | - | - |
| Basswood | 416.1 | 100.2 | 180.3 | 79.1 | 3.8 | 52.6 | 256.0 | 100.2 | 92.9 | 19.2 | - | 43.7 |
| Yellow-poplar | 17,074.7 | 6,149.0 | 4,550.6 | 3,740.8 | 2,063.2 | 571.1 | 13,275.9 | 6,149.0 | 3,357.7 | 1,984.3 | 1,321.5 | 463.5 |
| Bay and magnolia | 233.9 | - | 33.1 | 110.6 | 85.1 | 5.0 | 97.8 | - | 19.8 | 39.4 | 38.6 | - |
| Black cherry | 252.9 | 82.4 | 53.6 | 50.9 | 9.5 | 56.6 | 171.1 | 82.4 | 31.1 | 9.6 | - | 48.1 |
| Black walnut | 138.0 | 15.8 | 15.9 | 88.6 | 5.9 | 11.8 | 64.1 | 15.8 | 4.7 | 28.6 | 3.2 | 11.8 |
| Sycamore | 535.7 | 293.8 | 78.3 | 83.3 | 12.3 | 68.0 | 448.9 | 293.8 | 60.8 | 28.0 | 5.6 | 60.8 |
| Black locust | 333.3 | 31.1 | 48.8 | 132.9 | 81.3 | 39.2 | 176.0 | 31.1 | 20.7 | 53.8 | 39.9 | 30.6 |
| Elm | 443.2 | 56.8 | 89.4 | 197.8 | 94.8 | 4.4 | 274.0 | 56.8 | 78.2 | 76.2 | 58.4 | 4.4 |
| Other Eastern |  |  |  |  |  |  |  |  |  |  |  |  |
| hardwoods | 1,701.4 | 219.1 | 290.5 | 711.8 | 374.1 | 105.9 | 956.2 | 219.1 | 225.5 | 260.7 | 174.1 | 76.8 |
| Total hardwoods | 63,683.4 | 16,226.8 | 16,629.0 | 19,220.0 | 8,796.9 | 2,810.8 | 45,002.4 | 16,226.8 | 12,423.0 | 8,959.6 | 5,125.9 | $\underline{2,267.1}$ |
| All species | 106,078.9 | 29,343.5 | 25,035.4 | 39,583.0 | 9,199.5 | 2,917.4 | 64,172.7 | 24,817.1 | 16,920.8 | 14,755.8 | 5,357.2 | 2,321.8 |

[^6]A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 24—Volume of growing stock on timberland by county and species group, North Carolina, 2002

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | Other softwood | All hardwood | Soft hardwood | Hard hardwood |
|  | Million cubic feet |  |  |  |  |  |  |
| Alamance | 242.0 | 70.8 | 68.5 | 2.3 | 171.2 | 72.5 | 98.7 |
| Alexander | 153.5 | 38.1 | 37.9 | 0.2 | 115.4 | 55.4 | 60.0 |
| Alleghany | 116.2 | 42.6 | 42.6 | - | 73.6 | 20.3 | 53.3 |
| Anson | 372.2 | 186.8 | 182.7 | 4.0 | 185.4 | 106.5 | 79.0 |
| Ashe | 327.4 | 49.1 | 47.1 | 1.9 | 278.3 | 109.1 | 169.2 |
| Avery | 275.4 | 31.1 | 19.2 | 12.0 | 244.2 | 119.1 | 125.2 |
| Beaufort | 429.3 | 276.2 | 255.6 | 20.7 | 153.0 | 115.4 | 37.6 |
| Bertie | 566.7 | 236.7 | 194.0 | 42.7 | 330.0 | 266.5 | 63.4 |
| Bladen | 474.5 | 289.2 | 262.9 | 26.3 | 185.4 | 136.9 | 48.4 |
| Brunswick | 458.5 | 305.3 | 294.5 | 10.8 | 153.2 | 129.5 | 23.6 |
| Buncombe | 692.4 | 72.5 | 66.6 | 6.0 | 619.8 | 225.7 | 394.1 |
| Burke | 328.2 | 119.1 | 114.5 | 4.6 | 209.0 | 99.4 | 109.7 |
| Cabarrus | 184.8 | 49.3 | 45.1 | 4.2 | 135.5 | 75.9 | 59.7 |
| Caldwell | 438.4 | 162.3 | 146.5 | 15.8 | 276.1 | 133.2 | 142.9 |
| Camden | 116.5 | 27.3 | 15.7 | 11.7 | 89.2 | 79.4 | 9.8 |
| Carteret | 217.7 | 154.7 | 152.5 | 2.2 | 63.0 | 56.5 | 6.5 |
| Caswell | 366.1 | 101.5 | 99.3 | 2.1 | 264.7 | 136.4 | 128.3 |
| Catawba | 216.4 | 53.6 | 53.6 | - | 162.8 | 62.5 | 100.4 |
| Chatham | 439.2 | 210.0 | 206.5 | 3.5 | 229.2 | 153.7 | 75.5 |
| Cherokee | 520.7 | 147.3 | 140.7 | 6.6 | 373.4 | 137.8 | 235.7 |
| Chowan | 49.6 | 28.6 | 25.7 | 2.9 | 21.0 | 20.1 | 1.0 |
| Clay | 188.7 | 33.0 | 32.2 | 0.8 | 155.6 | 65.1 | 90.5 |
| Cleveland | 200.7 | 58.9 | 58.4 | 0.5 | 141.8 | 77.0 | 64.8 |
| Columbus | 565.1 | 264.7 | 240.9 | 23.8 | 300.4 | 226.1 | 74.3 |
| Craven | 432.0 | 266.1 | 258.9 | 7.2 | 165.9 | 126.9 | 39.0 |
| Cumberland | 329.4 | 198.4 | 189.9 | 8.5 | 131.0 | 87.1 | 43.9 |
| Currituck | 73.2 | 42.0 | 29.6 | 12.3 | 31.3 | 31.0 | 0.3 |
| Dare | 185.1 | 117.6 | 98.4 | 19.2 | 67.5 | 66.9 | 0.6 |
| Davidson | 387.8 | 139.3 | 133.2 | 6.1 | 248.5 | 155.4 | 93.1 |
| Davie | 161.5 | 24.7 | 23.2 | 1.5 | 136.8 | 77.0 | 59.8 |
| Duplin | 242.4 | 91.7 | 91.7 | - | 150.7 | 113.5 | 37.2 |
| Durham | 193.8 | 87.8 | 87.7 | 0.1 | 106.0 | 66.7 | 39.3 |
| Edgecombe | 218.8 | 68.6 | 65.8 | 2.8 | 150.2 | 77.6 | 72.5 |
| Forsyth | 203.0 | 46.8 | 45.7 | 1.1 | 156.2 | 81.6 | 74.6 |
| Franklin | 343.9 | 181.8 | 181.8 | - | 162.1 | 96.9 | 65.2 |
| Gaston | 230.3 | 75.4 | 74.6 | 0.8 | 155.0 | 102.1 | 52.8 |
| Gates | 364.6 | 150.8 | 121.2 | 29.5 | 213.8 | 181.1 | 32.7 |
| Graham | 427.5 | 101.6 | 41.6 | 60.0 | 325.9 | 119.6 | 206.3 |
| Granville | 293.8 | 168.3 | 165.5 | 2.8 | 125.6 | 83.0 | 42.5 |
| Greene | 66.4 | 28.8 | 27.4 | 1.4 | 37.6 | 25.7 | 11.9 |
| Guilford | 457.4 | 108.6 | 105.8 | 2.7 | 348.8 | 205.4 | 143.4 |
| Halifax | 359.1 | 153.1 | 152.4 | 0.7 | 206.0 | 166.4 | 39.7 |
| Harnett | 270.3 | 159.4 | 159.4 | - | 110.8 | 63.2 | 47.6 |
| Haywood | 534.0 | 78.1 | 57.6 | 20.5 | 455.9 | 189.6 | 266.3 |
| Henderson | 254.2 | 34.3 | 33.3 | 1.0 | 219.9 | 82.5 | 137.4 |
| Hertford | 224.8 | 94.7 | 77.1 | 17.6 | 130.1 | 107.7 | 22.3 |
| Hoke | 230.3 | 163.3 | 163.3 | - | 67.1 | 49.7 | 17.4 |
| Hyde | 243.9 | 152.1 | 143.5 | 8.6 | 91.7 | 90.6 | 1.1 |
| Iredell | 259.6 | 29.9 | 28.5 | 1.3 | 229.7 | 152.1 | 77.6 |
| Jackson | 558.5 | 100.8 | 50.9 | 49.9 | 457.7 | 160.0 | 297.7 |
| Johnston | 334.6 | 138.3 | 138.3 | - | 196.3 | 128.3 | 67.9 |
| Jones | 305.4 | 218.9 | 215.0 | 3.9 | 86.5 | 65.9 | 20.7 |

Table 24—Volume of growing stock on timberland by county and species group, North Carolina, 2002 (continued)

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | Other softwood | All hardwood | Soft hardwood | Hard hardwood |
|  | Million cubic feet |  |  |  |  |  |  |
| Lee | 195.5 | 87.1 | 85.7 | 1.4 | 108.4 | 62.2 | 46.1 |
| Lenoir | 136.1 | 58.1 | 52.3 | 5.9 | 78.0 | 50.8 | 27.2 |
| Lincoln | 164.3 | 36.9 | 36.7 | 0.3 | 127.3 | 63.8 | 63.5 |
| Macon | 580.5 | 60.8 | 46.5 | 14.3 | 519.7 | 233.8 | 285.9 |
| Madison | 505.0 | 66.6 | 44.9 | 21.6 | 438.4 | 245.6 | 192.8 |
| Martin | 366.9 | 130.5 | 108.8 | 21.7 | 236.4 | 199.1 | 37.3 |
| McDowell | 504.8 | 99.2 | 93.4 | 5.8 | 405.7 | 153.9 | 251.7 |
| Mecklenburg | 161.2 | 42.0 | 35.7 | 6.2 | 119.2 | 63.8 | 55.4 |
| Mitchell | 295.4 | 11.5 | 7.5 | 4.0 | 284.0 | 135.2 | 148.8 |
| Montgomery | 366.9 | 189.1 | 187.7 | 1.5 | 177.8 | 79.5 | 98.3 |
| Moore | 559.3 | 336.3 | 312.9 | 23.4 | 223.0 | 121.3 | 101.7 |
| Nash | 216.0 | 106.3 | 95.5 | 10.8 | 109.7 | 68.1 | 41.6 |
| New Hanover | 44.5 | 28.1 | 20.2 | 7.9 | 16.4 | 9.7 | 6.7 |
| Northampton | 295.2 | 151.3 | 147.5 | 3.8 | 143.9 | 105.4 | 38.5 |
| Onslow | 324.8 | 173.6 | 171.3 | 2.2 | 151.2 | 122.4 | 28.8 |
| Orange | 244.6 | 96.2 | 92.1 | 4.1 | 148.3 | 105.5 | 42.9 |
| Pamlico | 168.1 | 113.8 | 112.9 | 0.9 | 54.4 | 41.2 | 13.2 |
| Pasquotank | 65.7 | 16.8 | 13.6 | 3.1 | 48.9 | 40.7 | 8.2 |
| Pender | 466.7 | 266.6 | 226.8 | 39.8 | 200.1 | 165.3 | 34.8 |
| Perquimans | 189.8 | 78.4 | 62.5 | 15.9 | 111.5 | 101.4 | 10.1 |
| Person | 226.9 | 59.5 | 59.0 | 0.5 | 167.4 | 91.4 | 76.0 |
| Pitt | 308.6 | 120.0 | 112.6 | 7.4 | 188.6 | 157.1 | 31.4 |
| Polk | 182.3 | 50.7 | 46.6 | 4.0 | 131.6 | 43.0 | 88.6 |
| Randolph | 591.1 | 105.9 | 100.3 | 5.5 | 485.2 | 228.3 | 256.9 |
| Richmond | 300.6 | 189.5 | 189.1 | 0.4 | 111.1 | 75.8 | 35.2 |
| Robeson | 459.8 | 208.5 | 194.5 | 14.0 | 251.3 | 194.6 | 56.8 |
| Rockingham | 446.6 | 152.4 | 152.0 | 0.4 | 294.2 | 168.4 | 125.8 |
| Rowan | 322.4 | 101.0 | 91.2 | 9.8 | 221.4 | 128.0 | 93.4 |
| Rutherford | 395.4 | 136.6 | 135.5 | 1.2 | 258.8 | 132.1 | 126.7 |
| Sampson | 324.1 | 120.3 | 115.6 | 4.7 | 203.7 | 161.6 | 42.1 |
| Scotland | 133.1 | 94.7 | 94.7 | - | 38.3 | 28.2 | 10.2 |
| Stanly | 155.3 | 66.1 | 63.7 | 2.5 | 89.2 | 40.5 | 48.6 |
| Stokes | 369.5 | 98.1 | 98.1 | - | 271.4 | 154.5 | 116.9 |
| Surry | 381.3 | 107.3 | 106.7 | 0.6 | 274.0 | 119.0 | 155.1 |
| Swain | 168.8 | 18.5 | 16.5 | 2.0 | 150.4 | 77.9 | 72.5 |
| Transylvania | 509.3 | 106.7 | 90.8 | 15.9 | 402.5 | 177.7 | 224.8 |
| Tyrrell | 187.9 | 115.8 | 94.0 | 21.8 | 72.1 | 70.2 | 1.9 |
| Union | 217.0 | 33.4 | 32.1 | 1.3 | 183.5 | 88.7 | 94.8 |
| Vance | 165.3 | 72.7 | 72.6 | 0.1 | 92.6 | 56.4 | 36.2 |
| Wake | 326.1 | 129.5 | 129.4 | 0.1 | 196.6 | 119.5 | 77.1 |
| Warren | 244.5 | 124.2 | 123.9 | 0.3 | 120.3 | 89.2 | 31.1 |
| Washington | 130.9 | 84.7 | 84.4 | 0.3 | 46.2 | 37.8 | 8.3 |
| Watauga | 314.1 | 17.3 | 6.0 | 11.2 | 296.9 | 167.3 | 129.5 |
| Wayne | 166.5 | 88.8 | 88.8 | - | 77.7 | 48.8 | 28.9 |
| Wilkes | 628.0 | 156.2 | 141.3 | 14.9 | 471.8 | 247.8 | 224.0 |
| Wilson | 223.2 | 106.9 | 106.9 | - | 116.4 | 84.8 | 31.6 |
| Yadkin | 134.8 | 21.9 | 21.8 | 0.1 | 112.8 | 73.5 | 39.3 |
| Yancey | 334.9 | 37.9 | 11.3 | 26.6 | 296.9 | 125.8 | 171.1 |
| Total | 30,324.9 | 11,104.1 | 10,298.6 | 805.5 | 19,220.8 | 10,990.1 | 8,230.7 |

[^7]Table 25-Volume of live trees on timberland by county and species group, North Carolina, 2002

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | Other softwood | All hardwood | Soft hardwood | Hard hardwood |
|  | Million cubic feet |  |  |  |  |  |  |
| Alamance | 268.6 | 72.9 | 70.3 | 2.6 | 195.7 | 89.8 | 106.0 |
| Alexander | 165.7 | 39.2 | 39.0 | 0.3 | 126.4 | 60.2 | 66.3 |
| Alleghany | 136.9 | 45.5 | 45.5 | - | 91.4 | 30.2 | 61.2 |
| Anson | 388.7 | 188.2 | 183.3 | 4.9 | 200.5 | 115.8 | 84.7 |
| Ashe | 405.0 | 53.6 | 51.7 | 1.9 | 351.4 | 140.3 | 211.0 |
| Avery | 335.4 | 34.2 | 19.2 | 15.1 | 301.2 | 145.1 | 156.1 |
| Beaufort | 455.4 | 281.4 | 259.0 | 22.4 | 174.0 | 133.5 | 40.5 |
| Bertie | 605.9 | 239.6 | 197.0 | 42.7 | 366.2 | 292.8 | 73.4 |
| Bladen | 517.0 | 294.0 | 267.3 | 26.7 | 223.0 | 161.6 | 61.4 |
| Brunswick | 493.1 | 309.2 | 298.4 | 10.8 | 183.9 | 150.9 | 33.0 |
| Buncombe | 758.8 | 73.6 | 67.3 | 6.4 | 685.1 | 262.8 | 422.3 |
| Burke | 351.8 | 120.4 | 115.7 | 4.7 | 231.4 | 109.8 | 121.6 |
| Cabarrus | 197.0 | 51.2 | 45.6 | 5.6 | 145.8 | 83.5 | 62.3 |
| Caldwell | 470.9 | 163.8 | 147.6 | 16.3 | 307.1 | 143.3 | 163.8 |
| Camden | 133.5 | 27.7 | 15.8 | 11.9 | 105.8 | 94.0 | 11.8 |
| Carteret | 234.3 | 156.2 | 153.6 | 2.6 | 78.1 | 69.4 | 8.7 |
| Caswell | 394.1 | 103.2 | 100.6 | 2.6 | 290.9 | 154.8 | 136.1 |
| Catawba | 231.1 | 54.2 | 54.1 | 0.1 | 176.8 | 68.1 | 108.7 |
| Chatham | 476.2 | 214.4 | 209.3 | 5.0 | 261.8 | 167.4 | 94.4 |
| Cherokee | 565.1 | 152.7 | 145.5 | 7.2 | 412.4 | 148.5 | 263.9 |
| Chowan | 59.5 | 29.5 | 26.6 | 2.9 | 30.0 | 25.6 | 4.4 |
| Clay | 200.3 | 33.2 | 32.3 | 0.9 | 167.1 | 68.9 | 98.3 |
| Cleveland | 218.8 | 63.0 | 61.9 | 1.1 | 155.8 | 82.9 | 72.9 |
| Columbus | 647.7 | 283.3 | 252.5 | 30.8 | 364.4 | 279.7 | 84.7 |
| Craven | 464.4 | 269.4 | 259.9 | 9.4 | 195.0 | 149.8 | 45.1 |
| Cumberland | 348.3 | 199.6 | 191.1 | 8.5 | 148.7 | 97.1 | 51.6 |
| Currituck | 78.0 | 42.0 | 29.7 | 12.3 | 36.0 | 35.7 | 0.3 |
| Dare | 220.7 | 121.2 | 101.5 | 19.7 | 99.5 | 97.4 | 2.1 |
| Davidson | 439.7 | 144.8 | 138.1 | 6.7 | 294.9 | 181.9 | 113.0 |
| Davie | 172.2 | 25.3 | 23.8 | 1.5 | 146.9 | 83.5 | 63.4 |
| Duplin | 269.0 | 92.5 | 92.5 | - | 176.4 | 131.3 | 45.2 |
| Durham | 209.7 | 93.4 | 93.3 | 0.1 | 116.3 | 75.5 | 40.8 |
| Edgecombe | 250.7 | 74.6 | 70.6 | 4.0 | 176.1 | 99.5 | 76.5 |
| Forsyth | 229.2 | 48.5 | 47.0 | 1.5 | 180.7 | 93.5 | 87.1 |
| Franklin | 362.5 | 184.0 | 184.0 | - | 178.5 | 108.9 | 69.6 |
| Gaston | 246.0 | 75.6 | 74.6 | 1.0 | 170.4 | 112.0 | 58.4 |
| Gates | 370.4 | 151.3 | 121.7 | 29.6 | 219.1 | 185.4 | 33.7 |
| Graham | 447.9 | 103.3 | 41.7 | 61.6 | 344.5 | 126.1 | 218.5 |
| Granville | 320.9 | 171.2 | 168.3 | 3.0 | 149.7 | 96.7 | 53.0 |
| Greene | 70.2 | 29.0 | 27.5 | 1.5 | 41.2 | 27.9 | 13.3 |
| Guilford | 484.6 | 112.9 | 108.1 | 4.7 | 371.7 | 220.4 | 151.3 |
| Halifax | 405.5 | 158.0 | 157.4 | 0.7 | 247.5 | 194.5 | 53.0 |
| Harnett | 289.9 | 160.3 | 160.3 | - | 129.7 | 76.3 | 53.3 |
| Haywood | 590.5 | 82.0 | 59.8 | 22.3 | 508.5 | 209.1 | 299.3 |
| Henderson | 280.2 | 34.5 | 33.6 | 1.0 | 245.6 | 87.1 | 158.5 |
| Hertford | 237.7 | 94.9 | 77.3 | 17.6 | 142.9 | 118.8 | 24.1 |
| Hoke | 256.2 | 165.9 | 165.9 | - | 90.4 | 60.3 | 30.0 |
| Hyde | 257.7 | 157.2 | 148.6 | 8.6 | 100.5 | 99.2 | 1.3 |
| Iredell | 286.7 | 31.8 | 30.0 | 1.8 | 254.9 | 163.2 | 91.7 |
| Jackson | 657.2 | 101.9 | 51.3 | 50.6 | 555.2 | 183.3 | 372.0 |
| Johnston | 375.2 | 139.3 | 139.3 | - | 236.0 | 152.5 | 83.4 |
| Jones | 317.5 | 220.5 | 216.5 | 4.0 | 97.0 | 75.0 | 21.9 |

Table 25-Volume of live trees on timberland by county and species group, North Carolina, 2002 (continued)

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | Other softwood | All <br> hardwood | Soft hardwood | Hard hardwood |
|  | Million cubic feet |  |  |  |  |  |  |
| Lee | 208.2 | 89.3 | 87.8 | 1.6 | 118.9 | 69.6 | 49.3 |
| Lenoir | 149.7 | 59.3 | 53.5 | 5.9 | 90.4 | 59.8 | 30.5 |
| Lincoln | 169.8 | 40.3 | 40.0 | 0.3 | 129.5 | 64.8 | 64.8 |
| Macon | 634.7 | 61.7 | 46.9 | 14.8 | 573.0 | 245.8 | 327.2 |
| Madison | 570.7 | 82.7 | 55.7 | 27.0 | 488.0 | 263.9 | 224.2 |
| Martin | 390.3 | 132.2 | 110.0 | 22.1 | 258.1 | 212.8 | 45.3 |
| McDowell | 530.7 | 99.7 | 93.9 | 5.8 | 431.0 | 161.2 | 269.8 |
| Mecklenburg | 176.1 | 43.7 | 37.4 | 6.3 | 132.4 | 70.5 | 62.0 |
| Mitchell | 315.4 | 12.7 | 8.4 | 4.3 | 302.7 | 140.9 | 161.8 |
| Montgomery | 393.6 | 191.0 | 189.3 | 1.7 | 202.6 | 93.0 | 109.6 |
| Moore | 611.1 | 343.8 | 319.8 | 24.0 | 267.2 | 140.7 | 126.5 |
| Nash | 237.2 | 107.6 | 96.9 | 10.8 | 129.5 | 77.2 | 52.3 |
| New Hanover | 49.4 | 28.9 | 20.7 | 8.2 | 20.5 | 11.0 | 9.5 |
| Northampton | 318.4 | 154.3 | 150.5 | 3.8 | 164.2 | 120.8 | 43.4 |
| Onslow | 350.1 | 176.3 | 173.7 | 2.6 | 173.7 | 141.5 | 32.3 |
| Orange | 279.0 | 105.0 | 100.5 | 4.5 | 173.9 | 121.1 | 52.9 |
| Pamlico | 179.7 | 114.0 | 113.1 | 0.9 | 65.8 | 49.5 | 16.3 |
| Pasquotank | 71.2 | 18.4 | 15.2 | 3.1 | 52.8 | 43.0 | 9.8 |
| Pender | 480.4 | 268.0 | 228.2 | 39.9 | 212.4 | 176.1 | 36.3 |
| Perquimans | 195.3 | 79.1 | 63.2 | 15.9 | 116.2 | 106.1 | 10.1 |
| Person | 246.0 | 63.6 | 62.9 | 0.7 | 182.4 | 101.8 | 80.6 |
| Pitt | 333.7 | 121.5 | 113.8 | 7.7 | 212.2 | 173.5 | 38.8 |
| Polk | 204.8 | 51.3 | 47.3 | 4.0 | 153.5 | 52.3 | 101.2 |
| Randolph | 631.8 | 107.2 | 100.7 | 6.5 | 524.6 | 249.4 | 275.2 |
| Richmond | 328.2 | 196.4 | 195.4 | 1.0 | 131.8 | 88.6 | 43.2 |
| Robeson | 501.6 | 210.3 | 196.4 | 14.0 | 291.3 | 221.5 | 69.8 |
| Rockingham | 476.7 | 154.7 | 154.1 | 0.6 | 322.0 | 184.8 | 137.2 |
| Rowan | 329.9 | 101.8 | 91.3 | 10.5 | 228.1 | 131.6 | 96.5 |
| Rutherford | 421.2 | 138.7 | 137.5 | 1.3 | 282.5 | 143.5 | 139.0 |
| Sampson | 341.4 | 122.0 | 117.1 | 4.8 | 219.5 | 170.3 | 49.1 |
| Scotland | 147.9 | 96.5 | 96.5 | - | 51.4 | 31.7 | 19.7 |
| Stanly | 164.4 | 67.6 | 64.6 | 3.1 | 96.8 | 43.7 | 53.0 |
| Stokes | 399.8 | 103.7 | 103.7 | - | 296.1 | 167.9 | 128.2 |
| Surry | 409.5 | 109.3 | 108.7 | 0.6 | 300.2 | 128.7 | 171.6 |
| Swain | 174.8 | 18.9 | 17.0 | 2.0 | 155.9 | 79.3 | 76.6 |
| Transylvania | 555.5 | 107.1 | 91.0 | 16.1 | 448.4 | 189.6 | 258.8 |
| Tyrrell | 208.0 | 119.0 | 94.8 | 24.2 | 89.0 | 86.3 | 2.7 |
| Union | 243.9 | 35.1 | 32.4 | 2.7 | 208.8 | 107.0 | 101.8 |
| Vance | 173.3 | 73.2 | 73.1 | 0.1 | 100.1 | 61.7 | 38.3 |
| Wake | 345.1 | 132.8 | 132.6 | 0.1 | 212.3 | 130.3 | 82.0 |
| Warren | 264.3 | 126.3 | 126.0 | 0.3 | 138.1 | 103.1 | 34.9 |
| Washington | 143.9 | 85.8 | 85.5 | 0.3 | 58.1 | 48.6 | 9.6 |
| Watauga | 366.7 | 18.8 | 6.1 | 12.7 | 347.9 | 181.3 | 166.6 |
| Wayne | 192.6 | 89.4 | 89.4 | - | 103.2 | 66.3 | 36.9 |
| Wilkes | 685.1 | 159.5 | 143.1 | 16.4 | 525.6 | 264.0 | 261.6 |
| Wilson | 230.8 | 107.0 | 107.0 | - | 123.8 | 90.1 | 33.8 |
| Yadkin | 156.0 | 27.8 | 25.7 | 2.1 | 128.2 | 81.6 | 46.6 |
| Yancey | 374.7 | 40.7 | 13.0 | 27.7 | 334.0 | 137.7 | 196.2 |
| Total | 33,011.9 | 11,363.2 | 10,503.5 | 859.7 | 21,648.7 | 12,306.3 | 9,342.5 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 26-Volume of sawtimber on timberland by county and species group, North Carolina, 2002

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | Other softwood | All <br> hardwood | Soft hardwood | Hard hardwood |
|  | Million board feet |  |  |  |  |  |  |
| Alamance | 893.6 | 261.1 | 258.0 | 3.1 | 632.5 | 243.2 | 389.3 |
| Alexander | 479.6 | 130.8 | 129.9 | 0.8 | 348.9 | 181.7 | 167.2 |
| Alleghany | 357.3 | 138.2 | 138.2 | - | 219.1 | 40.7 | 178.4 |
| Anson | 1,237.4 | 649.3 | 634.6 | 14.7 | 588.2 | 323.0 | 265.1 |
| Ashe | 1,113.1 | 197.5 | 195.6 | 2.0 | 915.6 | 339.9 | 575.7 |
| Avery | 947.3 | 146.5 | 98.1 | 48.4 | 800.8 | 428.1 | 372.7 |
| Beaufort | 1,579.5 | 1,161.3 | 1,062.9 | 98.4 | 418.2 | 307.6 | 110.6 |
| Bertie | 1,912.2 | 859.9 | 650.9 | 209.0 | 1,052.3 | 856.9 | 195.4 |
| Bladen | 1,355.6 | 908.9 | 805.3 | 103.6 | 446.7 | 343.2 | 103.6 |
| Brunswick | 1,279.2 | 953.8 | 916.2 | 37.7 | 325.4 | 295.0 | 30.4 |
| Buncombe | 2,727.9 | 312.2 | 283.1 | 29.1 | 2,415.7 | 897.5 | 1,518.3 |
| Burke | 1,082.0 | 421.3 | 405.8 | 15.5 | 660.7 | 319.6 | 341.1 |
| Cabarrus | 595.3 | 156.2 | 144.7 | 11.5 | 439.1 | 263.1 | 176.0 |
| Caldwell | 1,486.2 | 675.9 | 617.9 | 58.1 | 810.3 | 364.3 | 446.0 |
| Camden | 362.3 | 103.3 | 53.3 | 50.0 | 259.0 | 219.9 | 39.1 |
| Carteret | 833.1 | 688.5 | 682.6 | 5.8 | 144.6 | 134.7 | 9.9 |
| Caswell | 1,230.2 | 298.7 | 297.5 | 1.2 | 931.5 | 470.8 | 460.6 |
| Catawba | 814.2 | 198.9 | 198.9 | - | 615.2 | 224.1 | 391.2 |
| Chatham | 1,424.4 | 669.8 | 663.0 | 6.9 | 754.6 | 502.0 | 252.6 |
| Cherokee | 1,812.5 | 660.4 | 640.6 | 19.8 | 1,152.1 | 470.5 | 681.5 |
| Chowan | 137.3 | 84.5 | 73.3 | 11.2 | 52.8 | 51.2 | 1.6 |
| Clay | 641.6 | 135.6 | 134.0 | 1.7 | 506.0 | 233.8 | 272.2 |
| Cleveland | 715.5 | 151.6 | 150.2 | 1.3 | 563.9 | 344.9 | 219.0 |
| Columbus | 1,914.7 | 1,041.1 | 944.5 | 96.6 | 873.6 | 652.3 | 221.3 |
| Craven | 1,658.2 | 1,149.4 | 1,120.2 | 29.2 | 508.8 | 369.5 | 139.3 |
| Cumberland | 1,153.5 | 845.6 | 813.1 | 32.5 | 307.9 | 222.8 | 85.1 |
| Currituck | 279.7 | 228.0 | 162.4 | 65.5 | 51.7 | 51.7 | - |
| Dare | 640.0 | 505.6 | 420.5 | 85.1 | 134.4 | 134.4 | - |
| Davidson | 1,317.0 | 380.2 | 371.5 | 8.7 | 936.8 | 598.6 | 338.2 |
| Davie | 528.6 | 79.3 | 74.5 | 4.9 | 449.2 | 232.2 | 217.0 |
| Duplin | 840.3 | 338.7 | 338.7 | - | 501.6 | 396.3 | 105.3 |
| Durham | 788.6 | 396.9 | 396.9 | - | 391.7 | 266.2 | 125.5 |
| Edgecombe | 739.4 | 206.4 | 196.5 | 9.9 | 533.0 | 235.0 | 298.0 |
| Forsyth | 756.0 | 146.2 | 145.3 | 0.8 | 609.9 | 304.1 | 305.7 |
| Franklin | 1,164.2 | 567.0 | 567.0 | - | 597.2 | 358.0 | 239.2 |
| Gaston | 869.5 | 301.3 | 301.3 | - | 568.2 | 381.5 | 186.6 |
| Gates | 1,253.6 | 575.1 | 425.1 | 150.1 | 678.5 | 563.8 | 114.7 |
| Graham | 1,621.9 | 563.4 | 223.8 | 339.6 | 1,058.5 | 355.0 | 703.5 |
| Granville | 1,005.0 | 631.8 | 630.5 | 1.3 | 373.2 | 250.4 | 122.7 |
| Greene | 171.7 | 79.6 | 73.0 | 6.6 | 92.1 | 72.8 | 19.3 |
| Guilford | 1,723.6 | 345.3 | 341.9 | 3.4 | 1,378.2 | 797.6 | 580.6 |
| Halifax | 1,153.4 | 500.2 | 497.9 | 2.4 | 653.2 | 542.8 | 110.4 |
| Harnett | 927.0 | 594.9 | 594.9 | - | 332.1 | 202.4 | 129.7 |
| Haywood | 2,035.7 | 344.3 | 270.2 | 74.1 | 1,691.4 | 763.6 | 927.8 |
| Henderson | 925.8 | 146.1 | 142.3 | 3.8 | 779.7 | 308.1 | 471.6 |
| Hertford | 709.6 | 351.0 | 265.1 | 85.9 | 358.6 | 310.5 | 48.2 |
| Hoke | 951.6 | 768.1 | 768.1 | - | 183.5 | 157.2 | 26.3 |
| Hyde | 801.2 | 555.1 | 508.3 | 46.8 | 246.1 | 246.1 | - |
| Iredell | 940.8 | 110.2 | 108.6 | 1.6 | 830.6 | 569.9 | 260.7 |
| Jackson | 1,980.7 | 538.2 | 267.8 | 270.4 | 1,442.4 | 512.2 | 930.2 |
| Johnston | 1,145.8 | 544.9 | 544.9 | - | 601.0 | 408.8 | 192.2 |
| Jones | 993.7 | 748.1 | 734.7 | 13.4 | 245.6 | 181.5 | 64.1 |

Table 26-Volume of sawtimber on timberland by county and species group, North Carolina, 2002 (continued)

| County | $\begin{gathered} \text { All } \\ \text { species } \end{gathered}$ | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | $\begin{gathered} \text { Other } \\ \text { softwood } \end{gathered}$ | All hardwood | Soft hardwood | $\begin{gathered} \text { Hard } \\ \text { hardwood } \end{gathered}$ |
|  | Million board feet |  |  |  |  |  |  |
| Lee | 658.8 | 355.1 | 349.5 | 5.6 | 303.8 | 163.0 | 140.8 |
| Lenoir | 463.5 | 233.7 | 201.5 | 32.3 | 229.7 | 126.9 | 102.8 |
| Lincoln | 656.1 | 130.9 | 130.9 | - | 525.2 | 287.7 | 237.5 |
| Macon | 2,216.2 | 295.7 | 236.0 | 59.7 | 1,920.5 | 997.0 | 923.5 |
| Madison | 2,083.7 | 330.5 | 234.2 | 96.3 | 1,753.2 | 1,086.8 | 666.4 |
| Martin | 1,277.9 | 514.8 | 413.7 | 101.1 | 763.1 | 631.1 | 131.9 |
| McDowell | 1,811.2 | 377.8 | 360.7 | 17.1 | 1,433.5 | 574.1 | 859.4 |
| Mecklenburg | 516.2 | 145.6 | 132.9 | 12.7 | 370.7 | 201.3 | 169.3 |
| Mitchell | 1,155.0 | 40.4 | 23.9 | 16.5 | 1,114.5 | 607.3 | 507.2 |
| Montgomery | 1,106.7 | 586.3 | 581.7 | 4.6 | 520.4 | 219.1 | 301.3 |
| Moore | 2,021.0 | 1,393.9 | 1,262.7 | 131.2 | 627.0 | 365.5 | 261.6 |
| Nash | 699.5 | 416.8 | 366.8 | 49.9 | 282.7 | 145.4 | 137.3 |
| New Hanover | 145.6 | 117.0 | 73.5 | 43.5 | 28.6 | 13.0 | 15.6 |
| Northampton | 890.8 | 505.5 | 486.2 | 19.3 | 385.3 | 254.9 | 130.5 |
| Onslow | 1,064.8 | 584.7 | 576.5 | 8.2 | 480.1 | 387.2 | 92.9 |
| Orange | 966.5 | 441.2 | 430.7 | 10.5 | 525.3 | 385.1 | 140.2 |
| Pamlico | 634.8 | 488.0 | 484.4 | 3.5 | 146.9 | 104.3 | 42.6 |
| Pasquotank | 219.6 | 75.8 | 60.3 | 15.5 | 143.8 | 107.1 | 36.7 |
| Pender | 1,454.1 | 932.0 | 741.6 | 190.4 | 522.1 | 414.5 | 107.6 |
| Perquimans | 598.5 | 331.8 | 267.8 | 64.0 | 266.7 | 240.5 | 26.2 |
| Person | 707.3 | 216.8 | 216.8 | - | 490.5 | 250.7 | 239.8 |
| Pitt | 1,238.5 | 468.1 | 433.6 | 34.5 | 770.4 | 665.5 | 104.9 |
| Polk | 681.8 | 201.4 | 186.0 | 15.4 | 480.4 | 152.5 | 327.9 |
| Randolph | 2,044.8 | 369.8 | 356.4 | 13.5 | 1,674.9 | 714.7 | 960.2 |
| Richmond | 1,078.3 | 738.2 | 737.1 | 1.2 | 340.1 | 230.5 | 109.6 |
| Robeson | 1,654.4 | 902.5 | 838.8 | 63.7 | 751.9 | 577.0 | 174.9 |
| Rockingham | 1,385.4 | 460.5 | 460.5 | - | 924.9 | 526.4 | 398.5 |
| Rowan | 1,277.4 | 414.8 | 381.6 | 33.2 | 862.6 | 510.8 | 351.8 |
| Rutherford | 1,222.8 | 389.0 | 387.7 | 1.4 | 833.8 | 484.6 | 349.2 |
| Sampson | 1,044.5 | 350.5 | 330.5 | 20.0 | 694.0 | 593.9 | 100.1 |
| Scotland | 558.4 | 443.1 | 443.1 | - | 115.3 | 98.5 | 16.8 |
| Stanly | 496.3 | 189.3 | 181.2 | 8.1 | 307.0 | 132.4 | 174.6 |
| Stokes | 1,088.5 | 237.5 | 237.5 | - | 851.0 | 478.6 | 372.4 |
| Surry | 1,279.0 | 390.3 | 387.7 | 2.6 | 888.7 | 368.6 | 520.1 |
| Swain | 563.0 | 63.5 | 58.6 | 4.9 | 499.5 | 321.9 | 177.6 |
| Transylvania | 2,001.1 | 549.0 | 463.5 | 85.4 | 1,452.2 | 657.3 | 794.9 |
| Tyrrell | 663.0 | 522.0 | 432.3 | 89.7 | 141.1 | 137.1 | 4.0 |
| Union | 701.1 | 116.0 | 113.5 | 2.5 | 585.1 | 249.3 | 335.9 |
| Vance | 603.5 | 286.5 | 286.5 | - | 317.0 | 171.5 | 145.6 |
| Wake | 1,256.3 | 618.3 | 618.3 | - | 638.0 | 400.2 | 237.8 |
| Warren | 746.6 | 413.3 | 413.3 | - | 333.3 | 269.6 | 63.7 |
| Washington | 484.5 | 363.4 | 363.4 | - | 121.0 | 89.1 | 32.0 |
| Watauga | 1,027.8 | 53.4 | 23.8 | 29.5 | 974.4 | 603.7 | 370.7 |
| Wayne | 693.9 | 416.3 | 416.3 | - | 277.6 | 180.6 | 97.0 |
| Wilkes | 2,090.3 | 649.5 | 595.3 | 54.2 | 1,440.8 | 775.0 | 665.8 |
| Wilson | 1,042.0 | 494.2 | 494.2 | - | 547.9 | 407.0 | 140.8 |
| Yadkin | 543.3 | 63.2 | 63.2 | - | 480.2 | 332.1 | 148.0 |
| Yancey | 1,256.7 | 171.5 | 60.9 | 110.6 | 1,085.2 | 466.8 | 618.4 |
| Total | 106,078.9 | 42,395.5 | 38,881.2 | 3,514.3 | 63,683.4 | 36,458.5 | 27,225.0 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 27—Volume of timber on timberland by class of timber and species group, North Carolina, 2002

| Class of timber | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | $\begin{gathered} \text { Other } \\ \text { softwood } \end{gathered}$ | All hardwood | Soft hardwood | Hard hardwood |
|  | Million cubic feet |  |  |  |  |  |  |
| Sawtimber trees |  |  |  |  |  |  |  |
| Saw-log portion | 19,543.2 | 7,762.6 | 7,131.4 | 631.2 | 11,780.6 | 6,607.5 | 5,173.1 |
| Upper-stem portion ${ }^{a}$ | 2,691.5 | 764.2 | 711.4 | 52.8 | 1,927.3 | 1,069.3 | 858.0 |
| Total | 22,234.6 | 8,526.8 | 7,842.8 | 684.0 | 13,707.8 | 7,676.7 | 6,031.1 |
| Poletimber trees | 8,090.2 | 2,577.2 | 2,455.8 | 121.5 | 5,513.0 | 3,313.3 | 2,199.7 |
| All growing-stock trees | 30,324.9 | 11,104.1 | 10,298.6 | 805.5 | 19,220.8 | 10,990.1 | 8,230.7 |
| Rough trees |  |  |  |  |  |  |  |
| Sawtimber size | 1,360.3 | 168.7 | 131.0 | 37.6 | 1,191.6 | 613.1 | 578.5 |
| Poletimber size | 1,151.1 | 82.8 | 70.1 | 12.8 | 1,068.3 | 604.6 | 463.7 |
| Total | 2,511.4 | 251.5 | 201.1 | 50.4 | 2,259.9 | 1,217.7 | 1,042.2 |
| Rotten trees |  |  |  |  |  |  |  |
| Sawtimber size | 157.9 | 7.5 | 3.7 | 3.8 | 150.4 | 87.7 | 62.7 |
| Poletimber size | 17.7 | 0.1 | 0.1 | 0.0 | 17.6 | 10.8 | 6.8 |
| Total | 175.6 | 7.6 | 3.8 | 3.8 | 168.0 | 98.5 | 69.5 |
| Salvable dead trees |  |  |  |  |  |  |  |
| Sawtimber size | 126.7 | 70.1 | 66.7 | 3.5 | 56.5 | 21.7 | 34.8 |
| Poletimber size | 40.1 | 24.0 | 22.8 | 1.2 | 16.1 | 4.7 | 11.3 |
| Total | 166.7 | 94.1 | 89.5 | 4.6 | 72.6 | 26.4 | 46.2 |
| All classes | 33,178.6 | 11,457.3 | 10,593.0 | 864.3 | 21,721.3 | 12,332.7 | 9,388.6 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.
${ }^{a}$ Includes cull sections in the saw-log portion.

Table 28-Volume of live and growing-stock trees on timberland by ownership class and species group, North Carolina, 2002

| Ownership class | $\begin{gathered} \text { All } \\ \text { species } \end{gathered}$ | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | Other softwood | All <br> hardwood | Soft hardwood | Hard hardwood |
|  | Live trees (million cubic feet) |  |  |  |  |  |  |
| National forest | 2,786.7 | 567.3 | 412.7 | 154.7 | 2,219.4 | 820.4 | 1,398.9 |
| Other public | 2,360.9 | 1,018.5 | 904.9 | 113.6 | 1,342.4 | 953.4 | 389.0 |
| Forest industry | 2,115.1 | 1,451.1 | 1,428.9 | 22.1 | 664.0 | 522.3 | 141.7 |
| Nonindustrial private | 25,749.3 | 8,326.3 | 7,757.0 | 569.3 | 17,423.0 | 10,010.2 | 7,412.8 |
| All classes | 33,011.9 | 11,363.2 | 10,503.5 | 859.7 | 21,648.7 | 12,306.3 | 9,342.5 |
|  | Growing-stock trees (million cubic feet) |  |  |  |  |  |  |
| National forest | 2,569.5 | 555.9 | 407.5 | 148.3 | 2,013.6 | 765.8 | 1,247.9 |
| Other public | 2,188.4 | 1,000.5 | 888.2 | 112.2 | 1,188.0 | 842.3 | 345.7 |
| Forest industry | 1,994.2 | 1,422.2 | 1,400.3 | 21.8 | 572.0 | 450.5 | 121.6 |
| Nonindustrial private | 23,572.7 | 8,125.5 | 7,602.5 | 523.0 | 15,447.2 | 8,931.5 | 6,515.6 |
| All classes | 30,324.9 | 11,104.1 | 10,298.6 | 805.5 | 19,220.8 | 10,990.1 | 8,230.7 |

Numbers in rows and columns may not sum to totals due to rounding.

Table 29-Volume of sawtimber on timberland by ownership class, species group, and size class, North Carolina, 2002

| Ownership class | $\begin{gathered} \text { All } \\ \text { species } \end{gathered}$ | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{gathered} \hline \text { All } \\ \text { softwood } \end{gathered}$ | Yellow pine | Other softwood | All hardwood | Soft hardwood | Hard hardwood |
| All size classes (million board feet) |  |  |  |  |  |  |  |
| National forest | 9,737.9 | 2,560.2 | 1,852.9 | 707.3 | 7,177.7 | 2,741.9 | 4,435.7 |
| Other public | 8,237.8 | 4,396.6 | 3,845.8 | 550.8 | 3,841.2 | 2,648.3 | 1,192.9 |
| Forest industry | 6,389.1 | 4,632.2 | 4,546.0 | 86.2 | 1,756.9 | 1,370.3 | 386.6 |
| Nonindustrial private | 81,714.2 | 30,806.5 | 28,636.6 | 2,169.9 | 50,907.7 | 29,697.9 | 21,209.8 |
| All classes | 106,078.9 | 42,395.5 | 38,881.2 | 3,514.3 | 63,683.4 | 36,458.5 | 27,225.0 |
| Trees $\geq 15.0$ inches d.b.h. (million board feet) |  |  |  |  |  |  |  |
| National forest | 7,171.0 | 1,668.3 | 1,102.5 | 565.8 | 5,502.7 | 2,080.8 | 3,422.0 |
| Other public | 5,016.5 | 2,327.4 | 1,853.1 | 474.3 | 2,689.1 | 1,834.3 | 854.8 |
| Forest industry | 2,550.4 | 1,318.0 | 1,269.4 | 48.6 | 1,232.4 | 959.5 | 272.8 |
| Nonindustrial private | 49,434.8 | 13,856.6 | 12,416.8 | 1,439.8 | 35,578.3 | 20,686.7 | 14,891.6 |
| All classes | 64,172.7 | 19,170.3 | 16,641.8 | 2,528.5 | 45,002.4 | 25,561.3 | 19,441.1 |

[^8]Table 30-Volume of growing stock on timberland by forest-type group, stand origin, and species group, North Carolina, 2002

| Forest-type group and stand origin | $\begin{gathered} \text { All } \\ \text { species } \end{gathered}$ | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All <br> softwood | Yellow pine | Other softwood | All <br> hardwood | Soft hardwood | Hard hardwood |
|  | Million cubic feet |  |  |  |  |  |  |
| Softwood types |  |  |  |  |  |  |  |
| White-red-jack pine |  |  |  |  |  |  |  |
| Planted | 134.7 | 129.1 | 128.0 | 1.1 | 5.6 | 3.2 | 2.4 |
| Natural | 561.0 | 394.9 | 345.2 | 49.7 | 166.0 | 67.8 | 98.2 |
| Total | 695.7 | 524.0 | 473.2 | 50.8 | 171.6 | 71.1 | 100.6 |
| Spruce-fir |  |  |  |  |  |  |  |
| Planted | - | - | - | - | - | - | - |
| Natural | 35.5 | 32.3 | - | 32.3 | 3.2 | 0.5 | 2.7 |
| Total | 35.5 | 32.3 | - | 32.3 | 3.2 | 0.5 | 2.7 |
| Longleaf-slash pine |  |  |  |  |  |  |  |
| Planted | 89.6 | 88.5 | 88.5 | - | 1.1 | 0.9 | 0.2 |
| Natural | 270.8 | 262.5 | 262.5 | - | 8.3 | 2.8 | 5.4 |
| Total | 360.4 | 351.0 | 351.0 | - | 9.4 | 3.8 | 5.6 |
| Loblolly-shortleaf pine |  |  |  |  |  |  |  |
| Planted | 2,855.4 | 2,695.7 | 2,695.4 | 0.3 | 159.7 | 117.8 | 41.9 |
| Natural | 4,536.1 | 3,739.5 | 3,714.4 | 25.1 | 796.6 | 520.3 | 276.2 |
| Total | 7,391.5 | 6,435.2 | 6,409.8 | 25.4 | 956.3 | 638.1 | 318.2 |
| Total softwoods | 8,483.0 | 7,342.5 | 7,234.1 | 108.5 | 1,140.5 | 713.5 | 427.0 |

Hardwood types

| Oak-pine |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Planted | 225.0 | 170.4 | 167.0 | 3.4 | 54.6 | 36.6 | 18.0 |
| Natural | 3,584.1 | 1,858.6 | 1,816.2 | 42.4 | 1,725.5 | 906.0 | 819.5 |
| Total | 3,809.1 | 2,029.0 | 1,983.2 | 45.8 | 1,780.1 | 942.6 | 837.5 |
| Oak-hickory | 13,926.6 | 1,102.6 | 870.3 | 232.3 | 12,824.1 | 6,405.7 | 6,418.3 |
| Oak-gum-cypress | 3,547.5 | 616.6 | 209.8 | 406.8 | 2,931.0 | 2,584.8 | 346.2 |
| Elm-ash-cottonwood | 350.8 | 3.7 | 0.3 | 3.4 | 347.2 | 306.5 | 40.7 |
| Maple-beech-birch | 206.8 | 8.8 | - | 8.8 | 198.0 | 37.0 | 161.0 |
| Total hardwoods | 21,840.9 | 3,760.6 | 3,063.6 | 697.0 | 18,080.3 | 10,276.6 | 7,803.7 |
| Nonstocked | 0.9 | 0.9 | 0.9 | - | - | - | - |
| All groups | 30,324.9 | 11,104.1 | 10,298.6 | 805.5 | 19,220.8 | 10,990.1 | 8,230.7 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 31—Average basal area of live trees per acre on timberland by ownership class, species group, and d.b.h., North Carolina, 2002

| Ownership class and species group | All tree sizes | D.b.h. (inches) |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 1.0-4.9 | 5.0-10.9 | 11.0-14.9 | $\geq 15.0$ |
|  | Square feet/acre |  |  |  |  |
| National forest |  |  |  |  |  |
| Softwood | 25.6 | 2.2 | 8.7 | 6.5 | 8.2 |
| Hardwood | 95.8 | 13.6 | 29.0 | 18.1 | 35.2 |
| Total | 121.5 | 15.8 | 37.7 | 24.6 | 43.4 |
| Other public |  |  |  |  |  |
| Softwood | 38.5 | 3.6 | 14.5 | 10.0 | 10.5 |
| Hardwood | 59.4 | 12.3 | 19.5 | 10.7 | 16.9 |
| Total | 97.9 | 15.8 | 34.0 | 20.7 | 27.4 |
| Forest industry |  |  |  |  |  |
| Softwood | 49.6 | 5.2 | 27.8 | 11.6 | 5.0 |
| Hardwood | 32.4 | 10.4 | 9.6 | 5.1 | 7.4 |
| Total | 82.0 | 15.6 | 37.4 | 16.7 | 12.3 |
| Nonindustrial private |  |  |  |  |  |
| Softwood | 32.9 | 4.6 | 14.4 | 7.8 | 6.0 |
| Hardwood | 70.7 | 14.3 | 23.0 | 13.6 | 19.8 |
| Total | 103.6 | 19.0 | 37.4 | 21.4 | 25.8 |
| All classes |  |  |  |  |  |
| Softwood | 34.0 | 4.4 | 15.1 | 8.2 | 6.4 |
| Hardwood | 68.8 | 13.8 | 22.1 | 13.1 | 19.8 |
| Total | 102.8 | 18.2 | 37.2 | 21.2 | 26.2 |

[^9]Table 32—Average net annual growth of growing stock on timberland by county and species group, North Carolina, 1990-2001

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{gathered} \hline \text { All } \\ \text { softwood } \end{gathered}$ | Yellow pine | $\begin{gathered} \text { Other } \\ \text { softwood } \end{gathered}$ | All <br> hardwood | Soft hardwood | Hard hardwood |
| Million cubic feet |  |  |  |  |  |  |  |
| Alamance | 8.2 | 3.1 | 3.1 | - | 5.1 | 2.4 | 2.7 |
| Alexander | 2.6 | -2.4 | -2.4 | - | 5.1 | 3.1 | 1.9 |
| Alleghany | 4.2 | 2.0 | 2.0 | - | 2.2 | 1.1 | 1.1 |
| Anson | 16.1 | 10.5 | 10.4 | 0.1 | 5.6 | 3.0 | 2.6 |
| Ashe | 10.6 | 0.3 | 0.3 | - | 10.3 | 4.9 | 5.4 |
| Avery | 4.9 | 0.6 | 0.3 | 0.4 | 4.2 | 3.3 | 0.9 |
| Beaufort | 38.1 | 28.6 | 28.6 | 0.0 | 9.5 | 7.1 | 2.4 |
| Bertie | 31.2 | 21.3 | 20.6 | 0.8 | 9.9 | 6.6 | 3.2 |
| Bladen | 32.4 | 26.0 | 25.5 | 0.5 | 6.4 | 4.4 | 2.1 |
| Brunswick | 23.5 | 20.2 | 21.0 | -0.9 | 3.3 | 2.3 | 1.0 |
| Buncombe | 9.8 | 1.7 | 1.1 | 0.5 | 8.2 | 4.0 | 4.2 |
| Burke | 15.3 | 7.1 | 6.9 | 0.3 | 8.2 | 4.8 | 3.4 |
| Cabarrus | 5.3 | 1.8 | 1.6 | 0.2 | 3.5 | 1.9 | 1.6 |
| Caldwell | 15.1 | 5.9 | 5.4 | 0.5 | 9.2 | 5.1 | 4.1 |
| Camden | 2.9 | 0.9 | 0.7 | 0.2 | 1.9 | 1.5 | 0.4 |
| Carteret | 5.9 | 3.6 | 3.6 | - | 2.2 | 2.1 | 0.2 |
| Caswell | 11.5 | 1.7 | 1.7 | 0.0 | 9.8 | 5.8 | 4.0 |
| Catawba | 10.2 | 3.7 | 3.7 | - | 6.5 | 3.3 | 3.1 |
| Chatham | 24.0 | 15.9 | 15.5 | 0.4 | 8.0 | 6.0 | 2.0 |
| Cherokee | 13.9 | 5.3 | 4.7 | 0.6 | 8.6 | 3.9 | 4.6 |
| Chowan | 3.2 | 2.9 | 2.9 | 0.0 | 0.3 | 0.3 | 0.0 |
| Clay | 4.5 | 1.3 | 1.3 | 0.0 | 3.2 | 1.3 | 1.9 |
| Cleveland | 6.0 | 1.5 | 1.5 | -0.0 | 4.6 | 2.3 | 2.3 |
| Columbus | 31.6 | 22.9 | 22.5 | 0.4 | 8.7 | 6.1 | 2.5 |
| Craven | 17.4 | 12.4 | 12.4 | 0.1 | 4.9 | 3.6 | 1.4 |
| Cumberland | 14.5 | 9.7 | 9.8 | -0.0 | 4.8 | 2.6 | 2.2 |
| Currituck | 2.3 | 1.4 | 1.1 | 0.3 | 0.9 | 0.8 | 0.2 |
| Dare | 4.0 | 2.0 | 1.9 | 0.1 | 2.0 | 1.9 | 0.1 |
| Davidson | 13.3 | 4.9 | 4.5 | 0.4 | 8.4 | 5.2 | 3.2 |
| Davie | 6.0 | 1.4 | 1.4 | 0.1 | 4.6 | 2.3 | 2.2 |
| Duplin | 5.7 | 3.4 | 3.3 | 0.1 | 2.3 | 3.2 | -0.9 |
| Durham | 8.0 | 3.8 | 3.8 | 0.0 | 4.2 | 2.7 | 1.5 |
| Edgecombe | 8.5 | 3.9 | 3.8 | 0.1 | 4.6 | 2.3 | 2.2 |
| Forsyth | 5.5 | -0.7 | -0.7 | -0.0 | 6.3 | 4.1 | 2.2 |
| Franklin | 19.0 | 14.4 | 14.5 | -0.1 | 4.7 | 2.0 | 2.6 |
| Gaston | 5.4 | 1.6 | 1.6 | 0.0 | 3.9 | 2.1 | 1.8 |
| Gates | 14.3 | 8.2 | 8.0 | 0.3 | 6.0 | 4.7 | 1.3 |
| Graham | 8.3 | 0.5 | -0.7 | 1.2 | 7.9 | 4.6 | 3.2 |
| Granville | 22.0 | 9.9 | 9.8 | 0.0 | 12.1 | 9.6 | 2.5 |
| Greene | 4.5 | 2.8 | 2.7 | 0.1 | 1.7 | 0.9 | 0.8 |
| Guilford | 11.9 | 1.3 | 1.1 | 0.2 | 10.5 | 7.9 | 2.6 |
| Halifax | 26.0 | 16.1 | 15.9 | 0.2 | 10.0 | 7.0 | 3.0 |
| Harnett | 16.5 | 13.8 | 13.8 | - | 2.8 | 1.1 | 1.7 |
| Haywood | 10.8 | 2.2 | 1.4 | 0.8 | 8.7 | 4.6 | 4.0 |
| Henderson | 3.5 | -0.4 | -0.5 | 0.1 | 3.9 | 2.6 | 1.3 |
| Hertford | 18.5 | 10.6 | 10.4 | 0.2 | 7.9 | 5.8 | 2.1 |
| Hoke | 8.5 | 6.6 | 6.6 | - | 1.9 | 1.4 | 0.5 |
| Hyde | 15.0 | 11.4 | 11.2 | 0.2 | 3.7 | 3.6 | 0.1 |
| Iredell | 11.6 | -0.1 | -0.2 | 0.1 | 11.8 | 7.2 | 4.6 |
| Jackson | 14.0 | 1.7 | 0.8 | 0.9 | 12.3 | 6.5 | 5.8 |
| Johnston | 15.6 | 9.3 | 9.3 | 0.1 | 6.3 | 4.6 | 1.6 |
| Jones | 21.6 | 20.4 | 20.5 | -0.1 | 1.2 | 1.0 | 0.2 |

Table 32-Average net annual growth of growing stock on timberland by county and species group, North Carolina, 1990-2001 (continued)

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | Other softwood | All hardwood | Soft hardwood | Hard hardwood |
|  | Million cubic feet |  |  |  |  |  |  |
| Lee | 10.1 | 5.1 | 5.2 | -0.1 | 5.0 | 3.3 | 1.7 |
| Lenoir | 5.4 | 3.6 | 3.3 | 0.3 | 1.7 | 0.8 | 0.9 |
| Lincoln | 8.9 | 3.0 | 3.0 | 0.0 | 5.9 | 2.4 | 3.5 |
| Macon | 8.2 | -1.2 | -1.6 | 0.3 | 9.4 | 6.6 | 2.8 |
| Madison | 6.4 | -1.3 | -2.0 | 0.8 | 7.7 | 6.0 | 1.7 |
| Martin | 17.9 | 11.7 | 11.0 | 0.7 | 6.2 | 4.5 | 1.6 |
| McDowell | 8.3 | 2.3 | 2.3 | 0.1 | 5.9 | 2.8 | 3.2 |
| Mecklenburg | 4.8 | 1.2 | 0.6 | 0.6 | 3.7 | 2.7 | 0.9 |
| Mitchell | 7.3 | 0.0 | -0.4 | 0.5 | 7.2 | 4.1 | 3.1 |
| Montgomery | 12.0 | 6.8 | 6.7 | 0.1 | 5.2 | 2.4 | 2.8 |
| Moore | 24.2 | 17.1 | 16.6 | 0.5 | 7.1 | 3.1 | 4.0 |
| Nash | 10.7 | 7.5 | 7.4 | 0.1 | 3.3 | 3.1 | 0.2 |
| New Hanover | 0.8 | 0.8 | 0.7 | 0.1 | -0.0 | -0.1 | 0.0 |
| Northampton | 25.3 | 18.7 | 18.6 | 0.0 | 6.6 | 4.1 | 2.6 |
| Onslow | 9.3 | 9.2 | 9.1 | 0.0 | 0.1 | 1.2 | -1.1 |
| Orange | 11.6 | 4.0 | 4.0 | 0.0 | 7.6 | 5.2 | 2.4 |
| Pamlico | 8.1 | 3.5 | 3.4 | 0.1 | 4.6 | 3.9 | 0.7 |
| Pasquotank | 2.0 | 0.9 | 0.9 | - | 1.0 | 1.1 | -0.1 |
| Pender | 32.0 | 26.4 | 25.7 | 0.7 | 5.6 | 5.2 | 0.3 |
| Perquimans | 10.1 | 4.7 | 4.3 | 0.4 | 5.4 | 3.5 | 1.9 |
| Person | 11.7 | 4.7 | 4.6 | 0.1 | 7.1 | 3.9 | 3.2 |
| Pitt | 14.8 | 8.0 | 8.0 | 0.0 | 6.8 | 5.1 | 1.7 |
| Polk | 5.4 | 2.3 | 2.3 | - | 3.1 | 1.4 | 1.7 |
| Randolph | 13.6 | 2.1 | 2.0 | 0.1 | 11.5 | 5.8 | 5.7 |
| Richmond | 20.3 | 15.1 | 15.1 | - | 5.3 | 3.5 | 1.8 |
| Robeson | 16.6 | 12.7 | 12.6 | 0.1 | 3.9 | 2.5 | 1.4 |
| Rockingham | 16.9 | 6.9 | 6.9 | - | 10.1 | 6.3 | 3.8 |
| Rowan | 13.7 | 1.5 | 1.2 | 0.3 | 12.2 | 7.1 | 5.1 |
| Rutherford | 8.5 | 2.0 | 2.0 | - | 6.5 | 2.9 | 3.5 |
| Sampson | 17.4 | 12.5 | 12.2 | 0.2 | 4.9 | 4.0 | 0.9 |
| Scotland | 8.4 | 7.1 | 7.1 | - | 1.3 | 0.9 | 0.4 |
| Stanly | 5.4 | 3.6 | 3.5 | 0.0 | 1.8 | 0.8 | 1.0 |
| Stokes | 15.4 | 3.2 | 3.2 | - | 12.2 | 8.2 | 4.0 |
| Surry | 10.9 | 1.0 | 1.0 | 0.0 | 9.9 | 5.2 | 4.7 |
| Swain | 3.4 | 0.4 | -0.2 | 0.6 | 3.1 | 2.0 | 1.0 |
| Transylvania | 9.4 | 2.4 | 2.0 | 0.4 | 7.1 | 3.7 | 3.3 |
| Tyrrell | 7.9 | 5.6 | 5.5 | 0.1 | 2.3 | 2.0 | 0.3 |
| Union | 4.8 | -0.4 | -0.3 | -0.0 | 5.1 | 1.9 | 3.2 |
| Vance | 7.2 | 4.4 | 4.4 | - | 2.8 | 2.2 | 0.6 |
| Wake | 10.0 | 5.8 | 5.8 | - | 4.3 | 2.5 | 1.8 |
| Warren | 14.8 | 7.0 | 6.9 | 0.0 | 7.8 | 5.4 | 2.4 |
| Washington | 9.1 | 5.8 | 5.8 | - | 3.3 | 3.0 | 0.4 |
| Watauga | 7.1 | 0.9 | 0.3 | 0.6 | 6.3 | 4.4 | 1.8 |
| Wayne | 5.2 | 3.1 | 3.1 | - | 2.1 | 1.0 | 1.1 |
| Wilkes | 17.1 | 4.1 | 3.8 | 0.3 | 13.0 | 8.4 | 4.6 |
| Wilson | 6.4 | 4.7 | 4.7 | - | 1.7 | 1.1 | 0.6 |
| Yadkin | 5.9 | 1.9 | 1.8 | 0.2 | 4.0 | 2.5 | 1.6 |
| Yancey | 6.8 | -0.5 | -1.0 | 0.5 | 7.3 | 4.1 | 3.1 |
| Total | 1,180.9 | 610.8 | 592.9 | 18.0 | 570.0 | 360.5 | 209.5 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 33-Average net annual growth of live trees on timberland by county and species group, North Carolina, 1990-2001

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{gathered} \hline \text { All } \\ \text { softwood } \end{gathered}$ | Yellow pine | Other softwood | All hardwood | Soft hardwood | Hard hardwood |
| Million cubic feet |  |  |  |  |  |  |  |
| Alamance | 8.9 | 3.1 | 3.1 | - | 5.8 | 2.8 | 3.0 |
| Alexander | 3.3 | -2.3 | -2.3 | - | 5.6 | 3.1 | 2.5 |
| Alleghany | 5.0 | 2.0 | 2.0 | - | 2.9 | 1.7 | 1.3 |
| Anson | 16.4 | 10.5 | 10.4 | 0.1 | 5.9 | 3.2 | 2.7 |
| Ashe | 12.6 | 0.3 | 0.3 | - | 12.3 | 6.3 | 6.0 |
| Avery | 5.0 | 0.7 | 0.3 | 0.4 | 4.4 | 3.2 | 1.2 |
| Beaufort | 39.0 | 28.8 | 28.8 | 0.0 | 10.2 | 7.5 | 2.7 |
| Bertie | 30.9 | 21.3 | 20.6 | 0.8 | 9.5 | 6.3 | 3.2 |
| Bladen | 34.3 | 26.7 | 26.2 | 0.5 | 7.7 | 5.5 | 2.2 |
| Brunswick | 24.0 | 20.8 | 21.7 | -0.9 | 3.2 | 2.3 | 0.9 |
| Buncombe | 9.4 | 1.7 | 1.2 | 0.5 | 7.6 | 4.2 | 3.4 |
| Burke | 16.0 | 7.2 | 6.9 | 0.3 | 8.8 | 5.1 | 3.7 |
| Cabarrus | 5.8 | 1.9 | 1.6 | 0.3 | 3.9 | 2.3 | 1.7 |
| Caldwell | 16.1 | 6.3 | 5.8 | 0.5 | 9.8 | 5.1 | 4.7 |
| Camden | 3.2 | 0.9 | 0.7 | 0.2 | 2.2 | 1.7 | 0.5 |
| Carteret | 6.2 | 3.6 | 3.8 | -0.2 | 2.6 | 2.3 | 0.2 |
| Caswell | 12.0 | 1.6 | 1.6 | 0.0 | 10.4 | 6.4 | 3.9 |
| Catawba | 11.8 | 4.6 | 4.6 | 0.0 | 7.2 | 3.9 | 3.3 |
| Chatham | 25.5 | 16.1 | 15.7 | 0.4 | 9.5 | 7.2 | 2.2 |
| Cherokee | 13.8 | 5.6 | 5.0 | 0.6 | 8.2 | 3.9 | 4.2 |
| Chowan | 3.0 | 2.9 | 2.9 | 0.0 | 0.1 | 0.2 | -0.1 |
| Clay | 4.2 | 1.3 | 1.3 | 0.0 | 2.9 | 1.2 | 1.7 |
| Cleveland | 6.6 | 1.7 | 1.8 | -0.0 | 4.9 | 2.3 | 2.6 |
| Columbus | 33.3 | 23.7 | 23.2 | 0.5 | 9.5 | 7.0 | 2.6 |
| Craven | 17.1 | 12.3 | 12.4 | -0.1 | 4.8 | 3.9 | 0.8 |
| Cumberland | 15.3 | 10.5 | 10.7 | -0.1 | 4.7 | 2.3 | 2.5 |
| Currituck | 2.2 | 1.4 | 1.1 | 0.3 | 0.9 | 0.7 | 0.2 |
| Dare | 4.3 | 2.1 | 2.0 | 0.1 | 2.2 | 2.1 | 0.1 |
| Davidson | 14.6 | 5.0 | 4.5 | 0.4 | 9.6 | 6.2 | 3.5 |
| Davie | 6.4 | 1.5 | 1.4 | 0.1 | 4.9 | 2.5 | 2.4 |
| Duplin | 5.7 | 3.4 | 3.3 | 0.1 | 2.3 | 3.4 | -1.2 |
| Durham | 7.9 | 4.0 | 4.0 | 0.0 | 3.9 | 2.5 | 1.4 |
| Edgecombe | 8.9 | 4.9 | 4.8 | 0.1 | 4.0 | 2.2 | 1.8 |
| Forsyth | 6.2 | -0.7 | -0.7 | -0.0 | 6.9 | 4.2 | 2.7 |
| Franklin | 19.4 | 14.5 | 14.5 | -0.1 | 4.9 | 2.4 | 2.5 |
| Gaston | 5.9 | 1.5 | 1.5 | 0.0 | 4.4 | 2.5 | 1.9 |
| Gates | 14.5 | 8.5 | 8.2 | 0.3 | 6.0 | 4.6 | 1.4 |
| Graham | 7.9 | 0.5 | -0.7 | 1.2 | 7.4 | 4.5 | 2.9 |
| Granville | 22.7 | 10.0 | 10.0 | 0.1 | 12.7 | 9.9 | 2.8 |
| Greene | 5.0 | 2.9 | 2.7 | 0.1 | 2.1 | 1.1 | 1.0 |
| Guilford | 12.2 | 1.4 | 1.2 | 0.2 | 10.8 | 7.9 | 3.0 |
| Halifax | 28.4 | 16.2 | 16.0 | 0.2 | 12.2 | 8.5 | 3.7 |
| Harnett | 18.1 | 14.3 | 14.3 | - | 3.8 | 1.6 | 2.2 |
| Haywood | 10.5 | 2.3 | 1.5 | 0.8 | 8.2 | 4.6 | 3.6 |
| Henderson | 3.2 | -0.4 | -0.5 | 0.1 | 3.6 | 2.5 | 1.1 |
| Hertford | 18.7 | 10.7 | 10.5 | 0.2 | 8.1 | 5.8 | 2.3 |
| Hoke | 8.9 | 6.8 | 6.8 | - | 2.1 | 1.6 | 0.5 |
| Hyde | 15.1 | 11.5 | 11.3 | 0.2 | 3.6 | 3.5 | 0.1 |
| Iredell | 12.7 | -0.1 | -0.2 | 0.1 | 12.8 | 7.8 | 5.1 |
| Jackson | 14.6 | 1.7 | 0.8 | 0.9 | 12.9 | 7.4 | 5.5 |
| Johnston | 16.4 | 9.4 | 9.3 | 0.1 | 7.0 | 4.7 | 2.3 |
| Jones | 21.3 | 20.5 | 20.7 | -0.1 | 0.8 | 0.7 | 0.1 |

Table 33-Average net annual growth of live trees on timberland by county and species group, North Carolina, 1990-2001 (continued)

| County |  | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | All species | $\begin{gathered} \hline \text { All } \\ \text { softwood } \end{gathered}$ | Yellow pine | Other softwood | All <br> hardwood | Soft hardwood | Hard hardwood |
|  | Million cubic feet |  |  |  |  |  |  |
| Lee | 10.7 | 5.2 | 5.3 | -0.1 | 5.6 | 3.7 | 1.9 |
| Lenoir | 5.3 | 3.6 | 3.3 | 0.3 | 1.7 | 0.9 | 0.7 |
| Lincoln | 9.0 | 3.0 | 3.0 | 0.0 | 5.9 | 2.3 | 3.7 |
| Macon | 7.9 | -1.2 | -1.6 | 0.3 | 9.1 | 6.6 | 2.5 |
| Madison | 6.8 | -1.2 | -2.0 | 0.9 | 8.0 | 6.4 | 1.5 |
| Martin | 18.2 | 11.7 | 11.0 | 0.7 | 6.5 | 4.7 | 1.7 |
| McDowell | 8.6 | 2.5 | 2.3 | 0.2 | 6.1 | 2.8 | 3.3 |
| Mecklenburg | 4.9 | 1.2 | 0.7 | 0.5 | 3.6 | 2.9 | 0.8 |
| Mitchell | 7.3 | 0.0 | -0.4 | 0.5 | 7.2 | 4.1 | 3.2 |
| Montgomery | 13.0 | 6.9 | 6.9 | 0.1 | 6.1 | 2.7 | 3.4 |
| Moore | 26.4 | 18.4 | 17.8 | 0.6 | 8.0 | 3.2 | 4.7 |
| Nash | 10.9 | 7.4 | 7.3 | 0.1 | 3.5 | 3.1 | 0.4 |
| New Hanover | 1.0 | 0.8 | 0.7 | 0.1 | 0.2 | -0.0 | 0.2 |
| Northampton | 25.4 | 18.8 | 18.8 | 0.0 | 6.6 | 4.0 | 2.6 |
| Onslow | 8.9 | 9.1 | 9.1 | -0.0 | -0.2 | 0.5 | -0.7 |
| Orange | 13.2 | 4.2 | 4.1 | 0.0 | 9.0 | 6.4 | 2.6 |
| Pamlico | 8.4 | 3.5 | 3.4 | 0.1 | 4.9 | 4.1 | 0.8 |
| Pasquotank | 1.7 | 1.0 | 1.0 | - | 0.8 | 0.8 | -0.1 |
| Pender | 31.1 | 26.4 | 25.9 | 0.5 | 4.8 | 4.8 | -0.0 |
| Perquimans | 10.1 | 4.7 | 4.3 | 0.4 | 5.4 | 3.6 | 1.8 |
| Person | 11.8 | 4.7 | 4.6 | 0.1 | 7.1 | 3.9 | 3.2 |
| Pitt | 15.9 | 8.0 | 8.0 | 0.0 | 7.9 | 6.1 | 1.7 |
| Polk | 5.5 | 2.3 | 2.3 | - | 3.2 | 1.5 | 1.7 |
| Randolph | 14.8 | 1.9 | 1.8 | 0.1 | 12.9 | 7.2 | 5.8 |
| Richmond | 21.3 | 15.3 | 15.3 | - | 5.9 | 3.4 | 2.5 |
| Robeson | 17.0 | 12.6 | 12.6 | 0.1 | 4.4 | 2.6 | 1.7 |
| Rockingham | 17.6 | 6.9 | 6.9 | - | 10.7 | 6.6 | 4.2 |
| Rowan | 13.4 | 1.5 | 1.2 | 0.3 | 11.8 | 6.8 | 5.0 |
| Rutherford | 8.7 | 2.0 | 2.0 | - | 6.6 | 2.8 | 3.8 |
| Sampson | 17.3 | 12.7 | 12.4 | 0.2 | 4.6 | 3.9 | 0.7 |
| Scotland | 8.9 | 7.2 | 7.2 | 0.0 | 1.7 | 1.3 | 0.4 |
| Stanly | 5.8 | 3.6 | 3.5 | 0.0 | 2.3 | 1.2 | 1.1 |
| Stokes | 16.8 | 3.4 | 3.4 | - | 13.4 | 8.9 | 4.5 |
| Surry | 11.8 | 1.0 | 1.0 | 0.0 | 10.8 | 5.5 | 5.3 |
| Swain | 3.4 | 0.5 | -0.1 | 0.6 | 2.9 | 1.9 | 1.0 |
| Transylvania | 9.4 | 2.4 | 2.0 | 0.4 | 7.0 | 3.7 | 3.3 |
| Tyrrell | 7.7 | 5.6 | 5.5 | 0.1 | 2.1 | 1.8 | 0.3 |
| Union | 5.4 | -0.3 | -0.3 | 0.1 | 5.7 | 2.2 | 3.5 |
| Vance | 7.6 | 4.4 | 4.4 | - | 3.2 | 2.3 | 0.9 |
| Wake | 10.3 | 5.8 | 5.8 | - | 4.4 | 2.6 | 1.8 |
| Warren | 15.0 | 7.0 | 6.9 | 0.0 | 8.1 | 5.3 | 2.8 |
| Washington | 9.4 | 5.8 | 5.8 | - | 3.6 | 3.2 | 0.5 |
| Watauga | 7.6 | 0.9 | 0.4 | 0.6 | 6.7 | 4.5 | 2.2 |
| Wayne | 5.4 | 3.1 | 3.1 | - | 2.3 | 1.1 | 1.2 |
| Wilkes | 17.3 | 4.2 | 3.9 | 0.3 | 13.2 | 8.3 | 4.9 |
| Wilson | 6.2 | 4.7 | 4.7 | - | 1.5 | 1.1 | 0.4 |
| Yadkin | 8.1 | 2.8 | 1.9 | 0.9 | 5.3 | 3.0 | 2.3 |
| Yancey | 7.2 | -0.4 | -1.0 | 0.6 | 7.6 | 4.2 | 3.4 |
| Total | 1,225.4 | 623.5 | 604.6 | 18.9 | 601.9 | 380.4 | 221.5 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 34—Average net annual growth of sawtimber on timberland by county and species group, North Carolina, 1990-2001

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | $\begin{gathered} \text { Other } \\ \text { softwood } \end{gathered}$ | All hardwood | Soft hardwood | $\begin{gathered} \text { Hard } \\ \text { hardwood } \end{gathered}$ |
|  | Million board feet |  |  |  |  |  |  |
| Alamance | 26.2 | 8.3 | 8.3 | - | 17.9 | 8.7 | 9.3 |
| Alexander | 15.0 | -2.2 | -2.2 | - | 17.2 | 10.2 | 7.0 |
| Alleghany | 21.8 | 10.9 | 10.9 | - | 10.9 | 5.8 | 5.2 |
| Anson | 69.2 | 52.5 | 52.5 | - | 16.7 | 8.2 | 8.5 |
| Ashe | 42.4 | 1.2 | 1.2 | - | 41.1 | 21.1 | 20.0 |
| Avery | 25.6 | 3.8 | 2.1 | 1.7 | 21.8 | 15.5 | 6.4 |
| Beaufort | 183.5 | 153.8 | 153.7 | 0.2 | 29.6 | 19.4 | 10.2 |
| Bertie | 127.8 | 81.2 | 76.8 | 4.4 | 46.6 | 30.7 | 16.0 |
| Bladen | 119.2 | 105.2 | 103.4 | 1.8 | 14.0 | 9.5 | 4.5 |
| Brunswick | 95.2 | 87.6 | 87.6 | -0.1 | 7.6 | 5.0 | 2.7 |
| Buncombe | 52.2 | 8.8 | 5.5 | 3.3 | 43.5 | 20.4 | 23.1 |
| Burke | 62.5 | 34.0 | 32.9 | 1.1 | 28.5 | 14.8 | 13.7 |
| Cabarrus | 22.6 | 9.5 | 8.7 | 0.9 | 13.0 | 6.0 | 7.0 |
| Caldwell | 58.1 | 22.5 | 20.0 | 2.5 | 35.6 | 15.5 | 20.2 |
| Camden | 9.5 | 4.8 | 3.3 | 1.5 | 4.7 | 2.7 | 2.0 |
| Carteret | 28.0 | 21.6 | 21.6 | - | 6.4 | 5.5 | 0.9 |
| Caswell | 57.9 | 11.6 | 11.5 | 0.1 | 46.2 | 26.4 | 19.8 |
| Catawba | 27.0 | 8.6 | 8.6 | - | 18.4 | 9.2 | 9.3 |
| Chatham | 86.4 | 63.8 | 62.8 | 1.0 | 22.6 | 16.2 | 6.4 |
| Cherokee | 57.8 | 28.7 | 27.0 | 1.7 | 29.1 | 12.6 | 16.5 |
| Chowan | 13.1 | 12.9 | 12.7 | 0.2 | 0.2 | 0.3 | -0.0 |
| Clay | 20.8 | 8.6 | 8.4 | 0.2 | 12.2 | 6.6 | 5.6 |
| Cleveland | 27.7 | 5.6 | 5.4 | 0.2 | 22.1 | 12.4 | 9.7 |
| Columbus | 131.8 | 95.0 | 92.7 | 2.2 | 36.9 | 25.2 | 11.6 |
| Craven | 80.4 | 59.4 | 58.7 | 0.6 | 21.0 | 14.2 | 6.8 |
| Cumberland | 69.2 | 50.1 | 49.5 | 0.6 | 19.1 | 10.1 | 9.1 |
| Currituck | 11.0 | 7.1 | 5.9 | 1.2 | 4.0 | 3.9 | 0.1 |
| Dare | 17.3 | 11.7 | 10.9 | 0.8 | 5.6 | 4.9 | 0.7 |
| Davidson | 51.5 | 17.0 | 17.0 | - | 34.5 | 22.2 | 12.2 |
| Davie | 27.4 | 7.0 | 6.8 | 0.2 | 20.3 | 13.0 | 7.4 |
| Duplin | 16.3 | 6.8 | 6.2 | 0.6 | 9.5 | 11.7 | -2.2 |
| Durham | 40.3 | 20.3 | 20.2 | 0.1 | 20.0 | 12.4 | 7.6 |
| Edgecombe | 36.5 | 13.4 | 12.7 | 0.7 | 23.1 | 11.6 | 11.5 |
| Forsyth | 39.0 | 7.2 | 7.2 | - | 31.8 | 20.7 | 11.0 |
| Franklin | 61.5 | 44.9 | 44.9 | - | 16.5 | 5.9 | 10.6 |
| Gaston | 26.2 | 9.4 | 9.4 | - | 16.8 | 11.6 | 5.2 |
| Gates | 52.3 | 27.2 | 25.1 | 2.1 | 25.1 | 21.0 | 4.2 |
| Graham | 42.8 | 3.6 | -2.9 | 6.5 | 39.1 | 21.9 | 17.2 |
| Granville | 69.6 | 38.5 | 38.5 | - | 31.1 | 22.9 | 8.2 |
| Greene | 17.2 | 12.5 | 11.8 | 0.7 | 4.7 | 3.1 | 1.6 |
| Guilford | 56.4 | 6.4 | 6.4 | - | 50.0 | 39.3 | 10.7 |
| Halifax | 98.0 | 55.3 | 54.3 | 1.0 | 42.7 | 30.7 | 12.0 |
| Harnett | 53.7 | 46.8 | 46.8 | - | 6.9 | 2.1 | 4.8 |
| Haywood | 55.0 | 13.5 | 9.4 | 4.0 | 41.5 | 25.1 | 16.4 |
| Henderson | 19.2 | 2.5 | 2.1 | 0.5 | 16.6 | 11.9 | 4.7 |
| Hertford | 66.3 | 39.3 | 38.4 | 0.9 | 27.0 | 18.2 | 8.8 |
| Hoke | 41.8 | 33.8 | 33.8 | - | 8.0 | 7.9 | 0.0 |
| Hyde | 71.0 | 58.0 | 57.0 | 1.0 | 13.0 | 13.0 | - |
| Iredell | 36.6 | -1.3 | -1.3 | - | 37.9 | 23.7 | 14.2 |
| Jackson | 66.5 | 10.9 | 5.6 | 5.3 | 55.6 | 25.3 | 30.2 |
| Johnston | 63.2 | 35.9 | 35.5 | 0.4 | 27.3 | 17.7 | 9.5 |
| Jones | 84.2 | 80.7 | 80.7 | -0.0 | 3.5 | 2.8 | 0.7 |

Table 34—Average net annual growth of sawtimber on timberland by county and species group, North Carolina, 1990-2001 (continued)

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow <br> pine | $\begin{gathered} \text { Other } \\ \text { softwood } \end{gathered}$ | All <br> hardwood | Soft hardwood | $\begin{gathered} \text { Hard } \\ \text { hardwood } \end{gathered}$ |
|  | Million board feet |  |  |  |  |  |  |
| Lee | 37.8 | 23.9 | 23.9 | - | 13.9 | 9.4 | 4.4 |
| Lenoir | 13.6 | 13.6 | 11.7 | 1.9 | 0.1 | -1.0 | 1.1 |
| Lincoln | 38.4 | 13.5 | 13.5 | - | 24.8 | 12.7 | 12.1 |
| Macon | 47.9 | -4.4 | -6.1 | 1.7 | 52.3 | 36.5 | 15.8 |
| Madison | 44.4 | 2.8 | -0.4 | 3.2 | 41.6 | 31.8 | 9.8 |
| Martin | 81.5 | 53.5 | 49.1 | 4.4 | 28.0 | 20.0 | 8.0 |
| McDowell | 43.3 | 11.6 | 11.6 | -0.0 | 31.7 | 12.3 | 19.4 |
| Mecklenburg | 19.2 | 3.3 | 0.8 | 2.5 | 15.9 | 12.1 | 3.8 |
| Mitchell | 37.4 | 1.8 | 0.0 | 1.8 | 35.6 | 21.4 | 14.2 |
| Montgomery | 51.0 | 29.6 | 29.6 | - | 21.4 | 9.6 | 11.8 |
| Moore | 100.5 | 75.0 | 72.6 | 2.4 | 25.5 | 10.6 | 14.9 |
| Nash | 36.7 | 29.0 | 28.4 | 0.6 | 7.7 | 6.4 | 1.3 |
| New Hanover | 3.1 | 2.3 | 1.7 | 0.7 | 0.7 | 0.8 | -0.0 |
| Northampton | 96.6 | 73.2 | 72.9 | 0.2 | 23.5 | 12.2 | 11.2 |
| Onslow | 28.8 | 27.9 | 28.0 | -0.1 | 0.9 | 4.7 | -3.8 |
| Orange | 53.6 | 24.4 | 24.4 | - | 29.2 | 21.2 | 8.1 |
| Pamlico | 40.1 | 19.9 | 19.1 | 0.8 | 20.2 | 17.1 | 3.1 |
| Pasquotank | 10.3 | 5.1 | 5.1 | - | 5.2 | 5.1 | 0.0 |
| Pender | 87.0 | 73.0 | 69.3 | 3.7 | 14.0 | 12.7 | 1.3 |
| Perquimans | 35.5 | 20.8 | 19.2 | 1.7 | 14.7 | 8.4 | 6.3 |
| Person | 42.5 | 23.2 | 22.9 | 0.2 | 19.3 | 10.5 | 8.8 |
| Pitt | 62.2 | 33.8 | 33.5 | 0.3 | 28.3 | 22.7 | 5.6 |
| Polk | 17.5 | 6.2 | 6.2 | - | 11.3 | 5.6 | 5.6 |
| Randolph | 52.9 | 6.1 | 5.4 | 0.7 | 46.8 | 20.2 | 26.6 |
| Richmond | 64.9 | 57.8 | 57.8 | - | 7.1 | 4.8 | 2.2 |
| Robeson | 66.2 | 52.3 | 51.3 | 0.9 | 14.0 | 9.7 | 4.3 |
| Rockingham | 72.0 | 34.7 | 34.7 | - | 37.3 | 22.0 | 15.3 |
| Rowan | 69.2 | 11.5 | 10.8 | 0.7 | 57.7 | 30.2 | 27.5 |
| Rutherford | 24.2 | -2.9 | -2.9 | - | 27.2 | 16.3 | 10.8 |
| Sampson | 65.8 | 45.9 | 44.4 | 1.4 | 20.0 | 17.5 | 2.5 |
| Scotland | 42.1 | 37.1 | 37.1 | - | 5.0 | 3.8 | 1.3 |
| Stanly | 10.7 | 4.5 | 4.2 | 0.3 | 6.2 | 1.3 | 4.9 |
| Stokes | 57.5 | 9.8 | 9.8 | - | 47.8 | 30.2 | 17.6 |
| Surry | 63.2 | 6.9 | 6.8 | 0.1 | 56.3 | 27.1 | 29.2 |
| Swain | 18.9 | 3.5 | 2.6 | 0.9 | 15.4 | 11.9 | 3.5 |
| Transylvania | 43.9 | 13.0 | 13.3 | -0.3 | 30.8 | 17.4 | 13.4 |
| Tyrrell | 35.8 | 27.5 | 27.0 | 0.5 | 8.4 | 5.7 | 2.6 |
| Union | 22.0 | 0.0 | 0.0 | - | 22.0 | 4.6 | 17.4 |
| Vance | 29.5 | 17.1 | 17.1 | - | 12.5 | 10.2 | 2.2 |
| Wake | 50.9 | 23.7 | 23.7 | - | 27.2 | 15.6 | 11.6 |
| Warren | 57.7 | 27.5 | 27.5 | - | 30.2 | 20.8 | 9.3 |
| Washington | 39.7 | 30.6 | 30.6 | - | 9.1 | 7.4 | 1.6 |
| Watauga | 33.2 | 4.2 | 1.9 | 2.4 | 29.0 | 21.9 | 7.1 |
| Wayne | 21.5 | 17.2 | 17.2 | - | 4.3 | 1.3 | 3.0 |
| Wilkes | 99.7 | 37.6 | 34.6 | 3.0 | 62.1 | 47.0 | 15.1 |
| Wilson | 25.8 | 15.9 | 15.9 | - | 9.9 | 7.9 | 2.0 |
| Yadkin | 33.0 | 9.2 | 9.2 | - | 23.8 | 15.6 | 8.2 |
| Yancey | 32.7 | 2.1 | -1.6 | 3.7 | 30.6 | 20.6 | 10.0 |
| Total | 4,913.7 | 2,612.4 | 2,522.0 | 90.4 | 2,301.3 | 1,430.7 | 870.6 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash ( - ) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 35-Average annual removals of growing stock on timberland by county and species group, North Carolina, 1990-2001

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{gathered} \hline \text { All } \\ \text { softwood } \end{gathered}$ | Yellow pine | Other softwood | All hardwood | Soft hardwood | $\begin{gathered} \text { Hard } \\ \text { hardwood } \end{gathered}$ |
|  | Million cubic feet |  |  |  |  |  |  |
| Alamance | 4.1 | 0.2 | 0.2 | - | 4.0 | 2.6 | 1.4 |
| Alexander | 2.7 | 1.2 | 1.2 | - | 1.5 | 0.6 | 0.9 |
| Alleghany | 3.9 | 2.0 | 2.0 | - | 2.0 | 1.3 | 0.7 |
| Anson | 28.6 | 22.8 | 22.7 | 0.2 | 5.8 | 2.2 | 3.6 |
| Ashe | 7.6 | 0.7 | 0.7 | - | 6.9 | 2.9 | 4.1 |
| Avery | - | - | - | - | - | - | - |
| Beaufort | 52.4 | 34.3 | 34.3 | - | 18.1 | 12.5 | 5.6 |
| Bertie | 26.9 | 15.8 | 15.4 | 0.4 | 11.1 | 7.9 | 3.2 |
| Bladen | 24.2 | 18.0 | 17.8 | 0.2 | 6.2 | 4.9 | 1.3 |
| Brunswick | 27.1 | 22.2 | 20.3 | 1.9 | 4.9 | 2.9 | 2.0 |
| Buncombe | 5.6 | 0.3 | 0.3 | - | 5.4 | 2.3 | 3.1 |
| Burke | 13.3 | 8.2 | 8.2 | - | 5.2 | 2.4 | 2.8 |
| Cabarrus | 7.1 | 5.6 | 5.6 | - | 1.5 | 0.6 | 0.9 |
| Caldwell | 6.4 | 1.8 | 1.8 | - | 4.6 | 1.6 | 3.0 |
| Camden | 6.1 | 3.3 | 3.2 | 0.1 | 2.9 | 2.9 | - |
| Carteret | 3.2 | 2.9 | 2.9 | - | 0.3 | 0.3 | - |
| Caswell | 7.4 | 2.5 | 2.3 | 0.2 | 4.9 | 3.5 | 1.4 |
| Catawba | 7.6 | 4.0 | 4.0 | - | 3.6 | 1.6 | 2.0 |
| Chatham | 24.6 | 11.8 | 11.5 | 0.3 | 12.9 | 7.6 | 5.2 |
| Cherokee | 6.6 | 5.6 | 5.6 | - | 0.9 | - | 0.9 |
| Chowan | 10.8 | 6.5 | 6.2 | 0.3 | 4.3 | 3.3 | 1.0 |
| Clay | 1.0 | 0.5 | 0.5 | - | 0.5 | 0.2 | 0.2 |
| Cleveland | 4.0 | 2.4 | 2.4 | - | 1.6 | 0.2 | 1.4 |
| Columbus | 41.0 | 32.4 | 32.0 | 0.3 | 8.7 | 5.1 | 3.6 |
| Craven | 23.1 | 18.8 | 18.8 | - | 4.4 | 3.3 | 1.1 |
| Cumberland | 6.8 | 2.6 | 2.6 | - | 4.1 | 3.7 | 0.4 |
| Currituck | 8.3 | 4.6 | 4.6 | - | 3.6 | 2.8 | 0.9 |
| Dare | 1.0 | 0.8 | 0.8 | - | 0.1 | - | 0.1 |
| Davidson | 2.0 | 0.8 | 0.8 | - | 1.3 | 0.8 | 0.4 |
| Davie | 2.5 | 2.0 | 1.7 | 0.3 | 0.5 | 0.2 | 0.4 |
| Duplin | 28.1 | 12.8 | 12.1 | 0.7 | 15.3 | 10.2 | 5.1 |
| Durham | 13.6 | 10.1 | 10.0 | 0.1 | 3.4 | 1.5 | 2.0 |
| Edgecombe | 14.5 | 5.7 | 5.0 | 0.7 | 8.7 | 5.3 | 3.4 |
| Forsyth | 2.8 | 2.0 | 2.0 | - | 0.8 | 0.8 | - |
| Franklin | 17.5 | 12.0 | 12.0 | - | 5.5 | 1.8 | 3.7 |
| Gaston | 8.1 | 5.0 | 4.9 | 0.1 | 3.2 | 2.2 | 0.9 |
| Gates | 11.2 | 8.0 | 7.9 | 0.1 | 3.2 | 2.7 | 0.5 |
| Graham | 0.8 | - | - | - | 0.8 | 0.1 | 0.7 |
| Granville | 20.8 | 11.0 | 10.9 | 0.1 | 9.9 | 5.2 | 4.7 |
| Greene | 8.0 | 4.8 | 3.8 | 1.0 | 3.2 | 1.3 | 2.0 |
| Guilford | 8.1 | 2.9 | 2.9 | - | 5.1 | 4.7 | 0.5 |
| Halifax | 34.0 | 21.1 | 20.9 | 0.1 | 12.9 | 7.9 | 5.0 |
| Harnett | 27.1 | 17.1 | 17.1 | - | 10.0 | 5.2 | 4.8 |
| Haywood | 5.0 | 1.5 | 1.4 | 0.1 | 3.5 | 2.2 | 1.3 |
| Henderson | 2.1 | 0.7 | 0.5 | 0.2 | 1.4 | 0.2 | 1.1 |
| Hertford | 14.3 | 10.3 | 10.3 | - | 4.0 | 1.1 | 2.8 |
| Hoke | 3.2 | 1.8 | 1.8 | - | 1.4 | 0.9 | 0.5 |
| Hyde | 24.7 | 18.6 | 18.1 | 0.5 | 6.1 | 6.1 | - |
| Iredell | 6.4 | 0.4 | 0.4 | - | 6.1 | 2.4 | 3.7 |
| Jackson | 1.8 | - | - | - | 1.8 | 0.5 | 1.3 |
| Johnston | 29.5 | 11.0 | 10.8 | 0.2 | 18.5 | 10.3 | 8.2 |
| Jones | 19.1 | 15.8 | 15.8 | - | 3.4 | 1.9 | 1.5 |

Table 35-Average annual removals of growing stock on timberland by county and species group, North Carolina, 1990-2001 (continued)

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | Other softwood | $\begin{gathered} \hline \text { All } \\ \text { hardwood } \end{gathered}$ | $\begin{gathered} \text { Soft } \\ \text { hardwood } \end{gathered}$ | Hard hardwood |
|  | Million cubic feet |  |  |  |  |  |  |
| Lee | 4.4 | 1.7 | 1.6 | 0.1 | 2.7 | 0.9 | 1.8 |
| Lenoir | 3.5 | 2.2 | 2.2 | - | 1.2 | 0.9 | 0.3 |
| Lincoln | 5.1 | 2.8 | 2.7 | 0.1 | 2.3 | 0.7 | 1.6 |
| Macon | 1.6 | 0.1 | 0.1 | - | 1.5 | 0.1 | 1.4 |
| Madison | 5.0 | 2.3 | 2.1 | 0.1 | 2.7 | 2.7 | - |
| Martin | 13.1 | 8.7 | 8.7 | - | 4.4 | 3.2 | 1.2 |
| McDowell | 7.3 | 3.5 | 3.4 | 0.1 | 3.8 | 1.1 | 2.7 |
| Mecklenburg | 14.1 | 5.3 | 5.2 | 0.1 | 8.8 | 6.9 | 1.9 |
| Mitchell | 4.4 | 0.1 | 0.1 | - | 4.2 | 2.5 | 1.7 |
| Montgomery | 10.9 | 5.5 | 5.5 | - | 5.3 | 2.6 | 2.7 |
| Moore | 19.9 | 14.7 | 14.5 | 0.3 | 5.2 | 2.8 | 2.4 |
| Nash | 28.0 | 15.6 | 15.0 | 0.6 | 12.5 | 9.5 | 3.0 |
| New Hanover | 1.1 | 0.5 | 0.5 | - | 0.6 | 0.2 | 0.4 |
| Northampton | 26.0 | 16.9 | 16.9 | - | 9.0 | 2.7 | 6.3 |
| Onslow | 21.3 | 18.0 | 18.0 | - | 3.3 | 1.3 | 1.9 |
| Orange | 17.9 | 8.3 | 8.3 | - | 9.5 | 7.0 | 2.5 |
| Pamlico | 14.1 | 5.4 | 5.4 | - | 8.7 | 7.0 | 1.7 |
| Pasquotank | 2.4 | 1.7 | 1.7 | - | 0.7 | 0.4 | 0.3 |
| Pender | 31.0 | 27.9 | 27.9 | - | 3.1 | 1.8 | 1.3 |
| Perquimans | 1.7 | 1.0 | 1.0 | - | 0.7 | 0.2 | 0.5 |
| Person | 14.3 | 8.6 | 8.0 | 0.6 | 5.7 | 3.3 | 2.4 |
| Pitt | 14.2 | 8.7 | 8.6 | 0.1 | 5.5 | 4.3 | 1.1 |
| Polk | 8.9 | 8.2 | 8.2 | - | 0.6 | - | 0.6 |
| Randolph | 6.0 | 1.6 | 1.6 | - | 4.4 | 1.3 | 3.1 |
| Richmond | 20.8 | 16.3 | 16.3 | - | 4.5 | 2.3 | 2.2 |
| Robeson | 18.5 | 13.0 | 13.0 | - | 5.5 | 3.8 | 1.7 |
| Rockingham | 14.8 | 12.5 | 12.5 | - | 2.3 | 0.4 | 1.9 |
| Rowan | 6.4 | 2.6 | 2.6 | - | 3.8 | 2.7 | 1.1 |
| Rutherford | 9.4 | 4.6 | 4.6 | - | 4.8 | 2.6 | 2.2 |
| Sampson | 19.2 | 14.0 | 14.0 | - | 5.2 | 2.5 | 2.7 |
| Scotland | 7.7 | 4.1 | 4.1 | - | 3.6 | 2.9 | 0.7 |
| Stanly | 4.6 | 3.4 | 3.4 | - | 1.2 | 0.1 | 1.1 |
| Stokes | 9.9 | 4.7 | 4.7 | - | 5.2 | 2.3 | 2.9 |
| Surry | 6.6 | 3.4 | 3.4 | - | 3.2 | 1.1 | 2.1 |
| Swain | 0.4 | 0.1 | 0.1 | - | 0.3 | - | 0.3 |
| Transylvania | - | - | - | - | - | - | - |
| Tyrrell | 9.4 | 8.1 | 8.1 | - | 1.3 | 1.3 | - |
| Union | 3.2 | 1.0 | 1.0 | - | 2.2 | 0.4 | 1.8 |
| Vance | 8.6 | 4.9 | 4.9 | - | 3.7 | 2.3 | 1.4 |
| Wake | 25.6 | 14.0 | 14.0 | - | 11.6 | 8.6 | 3.0 |
| Warren | 23.6 | 10.7 | 10.7 | - | 12.9 | 7.8 | 5.1 |
| Washington | 9.6 | 6.0 | 6.0 | - | 3.7 | 3.5 | 0.1 |
| Watauga | 1.6 | - | - | - | 1.6 | 1.0 | 0.6 |
| Wayne | 13.3 | 9.1 | 9.1 | - | 4.3 | 1.7 | 2.5 |
| Wilkes | 18.5 | 10.2 | 10.2 | - | 8.3 | 4.7 | 3.6 |
| Wilson | 9.4 | 6.1 | 6.1 | - | 3.3 | 1.0 | 2.2 |
| Yadkin | 5.1 | 1.0 | 1.0 | - | 4.1 | 0.6 | 3.5 |
| Yancey | 2.8 | 0.3 | 0.3 | - | 2.5 | 0.8 | 1.7 |
| Total | 1,191.4 | 726.2 | 716.3 | 9.9 | 465.2 | 272.8 | 192.4 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 36-Average annual removals of live trees on timberland by county and species group,
North Carolina, 1990-2001

| County |  | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | All species | $\begin{gathered} \hline \text { All } \\ \text { softwood } \\ \hline \end{gathered}$ | Yellow pine | Other softwood | All hardwood | Soft hardwood | Hard hardwood |
|  | Million cubic feet |  |  |  |  |  |  |
| Alamance | 4.3 | 0.2 | 0.2 | - | 4.2 | 2.6 | 1.6 |
| Alexander | 2.9 | 1.2 | 1.2 | - | 1.6 | 0.6 | 1.1 |
| Alleghany | 4.1 | 2.0 | 2.0 | - | 2.2 | 1.5 | 0.7 |
| Anson | 29.2 | 22.8 | 22.7 | 0.2 | 6.4 | 2.3 | 4.1 |
| Ashe | 7.9 | 0.7 | 0.7 | - | 7.2 | 2.9 | 4.3 |
| Avery | - | - | - | - | - | - | - |
| Beaufort | 53.1 | 34.4 | 34.4 | - | 18.7 | 12.8 | 5.9 |
| Bertie | 27.9 | 15.8 | 15.4 | 0.4 | 12.0 | 8.6 | 3.5 |
| Bladen | 24.5 | 18.0 | 17.8 | 0.2 | 6.5 | 4.9 | 1.6 |
| Brunswick | 28.6 | 22.4 | 20.5 | 1.9 | 6.2 | 4.1 | 2.2 |
| Buncombe | 6.6 | 0.3 | 0.3 | - | 6.4 | 2.4 | 3.9 |
| Burke | 13.5 | 8.2 | 8.2 | - | 5.4 | 2.4 | 3.0 |
| Cabarrus | 7.3 | 5.6 | 5.6 | - | 1.7 | 0.7 | 1.0 |
| Caldwell | 7.0 | 1.8 | 1.8 | - | 5.3 | 1.6 | 3.7 |
| Camden | 6.2 | 3.3 | 3.2 | 0.1 | 2.9 | 2.9 | 0.1 |
| Carteret | 3.2 | 2.9 | 2.9 | - | 0.3 | 0.3 | - |
| Caswell | 7.7 | 2.5 | 2.3 | 0.2 | 5.2 | 3.8 | 1.4 |
| Catawba | 8.2 | 4.2 | 4.2 | - | 4.0 | 1.9 | 2.1 |
| Chatham | 25.7 | 11.9 | 11.6 | 0.3 | 13.8 | 8.2 | 5.7 |
| Cherokee | 6.9 | 5.8 | 5.8 | - | 1.1 | - | 1.1 |
| Chowan | 11.0 | 6.5 | 6.2 | 0.3 | 4.6 | 3.4 | 1.2 |
| Clay | 1.0 | 0.5 | 0.5 | - | 0.5 | 0.2 | 0.2 |
| Cleveland | 4.2 | 2.4 | 2.4 | - | 1.8 | 0.3 | 1.5 |
| Columbus | 41.6 | 32.5 | 32.2 | 0.3 | 9.0 | 5.2 | 3.9 |
| Craven | 23.5 | 18.8 | 18.8 | - | 4.8 | 3.7 | 1.1 |
| Cumberland | 7.0 | 2.6 | 2.6 | - | 4.4 | 3.8 | 0.6 |
| Currituck | 8.3 | 4.6 | 4.6 | - | 3.7 | 2.8 | 0.9 |
| Dare | 1.0 | 0.8 | 0.8 | - | 0.2 | - | 0.2 |
| Davidson | 2.1 | 0.8 | 0.8 | - | 1.3 | 0.8 | 0.5 |
| Davie | 2.6 | 2.0 | 1.7 | 0.3 | 0.6 | 0.2 | 0.5 |
| Duplin | 28.7 | 12.8 | 12.1 | 0.7 | 15.9 | 10.5 | 5.4 |
| Durham | 14.1 | 10.1 | 10.0 | 0.1 | 3.9 | 1.6 | 2.3 |
| Edgecombe | 14.9 | 5.7 | 5.0 | 0.7 | 9.2 | 5.5 | 3.6 |
| Forsyth | 2.9 | 2.0 | 2.0 | - | 0.9 | 0.8 | 0.1 |
| Franklin | 17.6 | 12.0 | 12.0 | - | 5.7 | 1.8 | 3.8 |
| Gaston | 8.3 | 5.1 | 5.0 | 0.1 | 3.2 | 2.3 | 1.0 |
| Gates | 11.5 | 8.0 | 7.9 | 0.1 | 3.5 | 2.9 | 0.6 |
| Graham | 0.8 | - | - | - | 0.8 | 0.1 | 0.7 |
| Granville | 21.2 | 11.1 | 11.0 | 0.1 | 10.1 | 5.4 | 4.8 |
| Greene | 9.4 | 5.0 | 3.8 | 1.2 | 4.4 | 1.7 | 2.7 |
| Guilford | 8.1 | 2.9 | 2.9 | - | 5.2 | 4.7 | 0.5 |
| Halifax | 34.4 | 21.1 | 20.9 | 0.1 | 13.3 | 8.2 | 5.2 |
| Harnett | 27.8 | 17.6 | 17.6 | - | 10.3 | 5.3 | 5.0 |
| Haywood | 5.8 | 1.5 | 1.4 | 0.1 | 4.3 | 2.5 | 1.9 |
| Henderson | 2.2 | 0.7 | 0.5 | 0.2 | 1.5 | 0.3 | 1.2 |
| Hertford | 14.9 | 10.5 | 10.5 | - | 4.4 | 1.4 | 3.0 |
| Hoke | 3.2 | 1.8 | 1.8 | - | 1.4 | 0.9 | 0.5 |
| Hyde | 24.9 | 18.6 | 18.1 | 0.5 | 6.4 | 6.4 | - |
| Iredell | 6.6 | 0.4 | 0.4 | - | 6.2 | 2.5 | 3.7 |
| Jackson | 2.0 | - | - | - | 2.0 | 0.7 | 1.3 |
| Johnston | 30.4 | 11.0 | 10.8 | 0.2 | 19.4 | 10.8 | 8.7 |
| Jones | 19.7 | 15.8 | 15.8 | - | 3.9 | 2.0 | 1.8 |

Table 36-Average annual removals of live trees on timberland by county and species group, North Carolina, 1990-2001 (continued)

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | $\begin{gathered} \text { Other } \\ \text { softwood } \end{gathered}$ | All hardwood | $\begin{gathered} \text { Soft } \\ \text { hardwood } \end{gathered}$ | $\begin{gathered} \text { Hard } \\ \text { hardwood } \end{gathered}$ |
| Million cubic feet |  |  |  |  |  |  |  |
| Lee | 4.6 | 1.7 | 1.6 | 0.1 | 2.9 | 1.1 | 1.8 |
| Lenoir | 3.7 | 2.2 | 2.2 | - | 1.4 | 1.1 | 0.3 |
| Lincoln | 5.1 | 2.8 | 2.7 | 0.1 | 2.3 | 0.7 | 1.6 |
| Macon | 1.7 | 0.1 | 0.1 | - | 1.6 | 0.1 | 1.5 |
| Madison | 5.0 | 2.3 | 2.1 | 0.1 | 2.7 | 2.7 | - |
| Martin | 13.5 | 8.7 | 8.7 | - | 4.8 | 3.2 | 1.5 |
| McDowell | 7.5 | 3.5 | 3.4 | 0.1 | 4.0 | 1.2 | 2.7 |
| Mecklenburg | 14.9 | 5.3 | 5.2 | 0.1 | 9.7 | 7.7 | 2.0 |
| Mitchell | 4.4 | 0.1 | 0.1 | - | 4.3 | 2.6 | 1.7 |
| Montgomery | 11.5 | 5.5 | 5.5 | - | 6.0 | 3.1 | 2.9 |
| Moore | 20.5 | 14.7 | 14.5 | 0.3 | 5.7 | 3.2 | 2.5 |
| Nash | 28.3 | 15.6 | 15.0 | 0.6 | 12.8 | 9.8 | 3.0 |
| New Hanover | 1.2 | 0.5 | 0.5 | - | 0.7 | 0.2 | 0.6 |
| Northampton | 26.6 | 17.1 | 17.1 | - | 9.5 | 3.0 | 6.5 |
| Onslow | 21.6 | 18.0 | 18.0 | - | 3.6 | 1.3 | 2.2 |
| Orange | 18.0 | 8.3 | 8.3 | - | 9.7 | 7.1 | 2.6 |
| Pamlico | 14.4 | 5.4 | 5.4 | - | 9.0 | 7.3 | 1.7 |
| Pasquotank | 2.5 | 1.7 | 1.7 | - | 0.7 | 0.4 | 0.3 |
| Pender | 31.2 | 27.9 | 27.9 | - | 3.3 | 1.9 | 1.4 |
| Perquimans | 2.1 | 1.0 | 1.0 | - | 1.1 | 0.2 | 0.9 |
| Person | 14.6 | 8.6 | 8.0 | 0.6 | 6.0 | 3.5 | 2.5 |
| Pitt | 14.8 | 8.7 | 8.6 | 0.1 | 6.1 | 4.9 | 1.2 |
| Polk | 8.9 | 8.2 | 8.2 | - | 0.6 | - | 0.6 |
| Randolph | 6.2 | 1.6 | 1.6 | - | 4.5 | 1.3 | 3.2 |
| Richmond | 21.2 | 16.3 | 16.3 | - | 4.9 | 2.3 | 2.6 |
| Robeson | 19.1 | 13.1 | 13.1 | - | 6.1 | 3.9 | 2.1 |
| Rockingham | 15.2 | 12.5 | 12.5 | - | 2.7 | 0.5 | 2.2 |
| Rowan | 6.8 | 2.6 | 2.6 | - | 4.2 | 2.7 | 1.4 |
| Rutherford | 9.4 | 4.6 | 4.6 | - | 4.8 | 2.6 | 2.2 |
| Sampson | 20.0 | 14.1 | 14.1 | - | 5.9 | 2.8 | 3.1 |
| Scotland | 8.3 | 4.1 | 4.1 | - | 4.2 | 3.2 | 1.0 |
| Stanly | 5.1 | 3.4 | 3.4 | - | 1.7 | 0.3 | 1.3 |
| Stokes | 10.0 | 4.7 | 4.7 | - | 5.3 | 2.3 | 3.1 |
| Surry | 6.9 | 3.4 | 3.4 | - | 3.4 | 1.3 | 2.2 |
| Swain | 0.5 | 0.2 | 0.2 | - | 0.3 | - | 0.3 |
| Transylvania | - | - | - | - | - | - | - |
| Tyrrell | 9.4 | 8.1 | 8.1 | - | 1.3 | 1.3 | - |
| Union | 3.7 | 1.0 | 1.0 | - | 2.6 | 0.6 | 2.1 |
| Vance | 8.9 | 4.9 | 4.9 | - | 4.0 | 2.4 | 1.5 |
| Wake | 27.2 | 14.0 | 14.0 | - | 13.2 | 9.3 | 3.9 |
| Warren | 24.1 | 10.7 | 10.7 | - | 13.4 | 7.9 | 5.6 |
| Washington | 10.1 | 6.0 | 6.0 | - | 4.1 | 3.8 | 0.3 |
| Watauga | 1.6 | - | - | - | 1.6 | 1.0 | 0.6 |
| Wayne | 13.5 | 9.1 | 9.1 | - | 4.4 | 1.7 | 2.7 |
| Wilkes | 18.9 | 10.2 | 10.2 | - | 8.7 | 4.9 | 3.8 |
| Wilson | 9.6 | 6.1 | 6.1 | - | 3.5 | 1.1 | 2.4 |
| Yadkin | 5.4 | 1.0 | 1.0 | - | 4.5 | 0.6 | 3.8 |
| Yancey | 2.8 | 0.3 | 0.3 | - | 2.5 | 0.8 | 1.7 |
| Total | 1,227.0 | 728.6 | 718.5 | 10.1 | 498.4 | 288.0 | 210.4 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 37-Average annual removals of sawtimber on timberland by county and species group, North Carolina, 1990-2001

| County |  | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | All species | $\begin{gathered} \hline \text { All } \\ \text { softwood } \end{gathered}$ | Yellow pine | Other softwood | All <br> hardwood | Soft hardwood | $\begin{gathered} \text { Hard } \\ \text { hardwood } \end{gathered}$ |
|  | Million board feet |  |  |  |  |  |  |
| Alamance | 16.2 | 0.6 | 0.6 | - | 15.6 | 9.6 | 6.0 |
| Alexander | 9.3 | 4.1 | 4.1 | - | 5.2 | 1.8 | 3.4 |
| Alleghany | 17.0 | 7.4 | 7.4 | - | 9.6 | 6.1 | 3.5 |
| Anson | 97.5 | 89.3 | 89.3 | - | 8.2 | 2.3 | 5.8 |
| Ashe | 30.2 | 4.2 | 4.2 | - | 26.0 | 9.4 | 16.6 |
| Avery | - | - | - | - | - | - | - |
| Beaufort | 181.1 | 130.6 | 130.6 | - | 50.6 | 30.8 | 19.8 |
| Bertie | 88.3 | 52.5 | 50.3 | 2.3 | 35.8 | 23.2 | 12.6 |
| Bladen | 74.3 | 64.5 | 63.6 | 0.9 | 9.7 | 7.7 | 2.1 |
| Brunswick | 76.4 | 64.7 | 55.6 | 9.1 | 11.7 | 7.1 | 4.6 |
| Buncombe | 25.7 | 1.2 | 1.2 | - | 24.5 | 12.6 | 11.9 |
| Burke | 52.8 | 39.5 | 39.5 | - | 13.3 | 4.7 | 8.5 |
| Cabarrus | 24.6 | 20.6 | 20.6 | - | 4.0 | 1.4 | 2.5 |
| Caldwell | 23.4 | 7.0 | 7.0 | - | 16.3 | 4.9 | 11.4 |
| Camden | 22.1 | 19.3 | 18.9 | 0.4 | 2.8 | 2.8 | - |
| Carteret | 13.6 | 13.6 | 13.6 | - | - | - | - |
| Caswell | 22.5 | 8.4 | 8.1 | 0.3 | 14.0 | 10.4 | 3.7 |
| Catawba | 18.7 | 7.2 | 7.2 | - | 11.4 | 5.9 | 5.6 |
| Chatham | 86.6 | 44.0 | 43.4 | 0.6 | 42.6 | 26.6 | 16.0 |
| Cherokee | 26.7 | 21.9 | 21.9 | - | 4.8 | - | 4.8 |
| Chowan | 48.2 | 30.7 | 29.3 | 1.3 | 17.6 | 12.8 | 4.8 |
| Clay | 3.8 | 2.4 | 2.4 | - | 1.4 | 0.8 | 0.6 |
| Cleveland | 13.4 | 8.4 | 8.4 | - | 5.0 | 1.0 | 4.1 |
| Columbus | 137.0 | 109.0 | 107.4 | 1.6 | 28.0 | 16.6 | 11.4 |
| Craven | 70.4 | 60.3 | 60.3 | - | 10.2 | 5.5 | 4.7 |
| Cumberland | 26.8 | 12.9 | 12.9 | - | 14.0 | 13.5 | 0.5 |
| Currituck | 34.8 | 24.8 | 24.8 | - | 10.1 | 8.7 | 1.3 |
| Dare | 4.0 | 3.3 | 3.3 | - | 0.8 | - | 0.8 |
| Davidson | 4.0 | 0.4 | 0.4 | - | 3.7 | 2.7 | 0.9 |
| Davie | 10.0 | 7.1 | 6.3 | 0.8 | 2.9 | 1.1 | 1.8 |
| Duplin | 109.0 | 55.0 | 51.3 | 3.7 | 53.9 | 34.0 | 19.9 |
| Durham | 46.9 | 35.0 | 34.4 | 0.6 | 11.9 | 3.2 | 8.7 |
| Edgecombe | 48.7 | 19.7 | 15.9 | 3.8 | 29.0 | 16.1 | 12.9 |
| Forsyth | 11.7 | 9.2 | 9.2 | - | 2.4 | 2.4 | - |
| Franklin | 54.3 | 39.4 | 39.4 | - | 14.9 | 5.5 | 9.5 |
| Gaston | 30.6 | 18.8 | 18.8 | - | 11.8 | 7.7 | 4.0 |
| Gates | 26.3 | 20.3 | 19.9 | 0.4 | 6.0 | 6.0 | - |
| Graham | 3.2 | - | - | - | 3.2 | - | 3.2 |
| Granville | 73.1 | 44.4 | 44.4 | - | 28.8 | 15.6 | 13.1 |
| Greene | 29.8 | 20.7 | 14.6 | 6.1 | 9.1 | 3.4 | 5.7 |
| Guilford | 37.4 | 13.4 | 13.4 | - | 23.9 | 22.5 | 1.4 |
| Halifax | 124.2 | 82.5 | 81.7 | 0.8 | 41.7 | 25.6 | 16.1 |
| Harnett | 107.3 | 72.3 | 72.3 | - | 35.0 | 20.4 | 14.5 |
| Haywood | 20.7 | 5.7 | 5.4 | 0.3 | 15.0 | 10.0 | 5.0 |
| Henderson | 7.7 | 3.5 | 2.3 | 1.2 | 4.3 | 0.8 | 3.5 |
| Hertford | 49.6 | 37.2 | 37.2 | - | 12.4 | 2.0 | 10.4 |
| Hoke | 13.9 | 8.5 | 8.5 | - | 5.4 | 3.7 | 1.7 |
| Hyde | 96.7 | 81.5 | 79.3 | 2.2 | 15.1 | 15.1 | - |
| Iredell | 15.0 | 1.6 | 1.6 | - | 13.3 | 5.7 | 7.7 |
| Jackson | 6.8 | - | - | - | 6.8 | 2.1 | 4.7 |
| Johnston | 129.9 | 52.5 | 51.5 | 1.0 | 77.4 | 43.2 | 34.3 |
| Jones | 51.8 | 40.9 | 40.9 | - | 10.9 | 5.1 | 5.8 |

Table 37-Average annual removals of sawtimber on timberland by county and species group, North Carolina, 1990-2001 (continued)

| County | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | $\begin{gathered} \text { Other } \\ \text { softwood } \end{gathered}$ | All <br> hardwood | Soft hardwood | $\begin{gathered} \text { Hard } \\ \text { hardwood } \end{gathered}$ |
|  | Million board feet |  |  |  |  |  |  |
| Lee | 14.8 | 6.5 | 6.5 | - | 8.3 | 3.0 | 5.2 |
| Lenoir | 13.7 | 10.7 | 10.7 | - | 3.0 | 1.4 | 1.7 |
| Lincoln | 16.7 | 9.3 | 9.3 | - | 7.4 | 2.0 | 5.4 |
| Macon | 5.1 | 0.2 | 0.2 | - | 4.9 | 0.7 | 4.3 |
| Madison | 25.7 | 11.8 | 11.8 | - | 13.9 | 13.9 | - |
| Martin | 45.5 | 33.1 | 33.1 | - | 12.3 | 8.5 | 3.9 |
| McDowell | 24.1 | 9.2 | 9.2 | - | 14.9 | 3.0 | 11.9 |
| Mecklenburg | 40.0 | 11.7 | 11.7 | - | 28.3 | 22.6 | 5.7 |
| Mitchell | 19.1 | 0.9 | 0.9 | - | 18.2 | 11.7 | 6.5 |
| Montgomery | 37.9 | 24.6 | 24.6 | - | 13.3 | 4.9 | 8.4 |
| Moore | 66.4 | 58.4 | 57.6 | 0.9 | 8.0 | 4.1 | 3.9 |
| Nash | 123.6 | 73.2 | 70.1 | 3.1 | 50.4 | 37.7 | 12.6 |
| New Hanover | 3.9 | 2.2 | 2.2 | - | 1.7 | 0.8 | 1.0 |
| Northampton | 89.5 | 61.5 | 61.5 | - | 28.1 | 8.1 | 19.9 |
| Onslow | 91.1 | 79.6 | 79.6 | - | 11.5 | 4.6 | 6.9 |
| Orange | 80.3 | 43.2 | 43.2 | - | 37.1 | 27.8 | 9.3 |
| Pamlico | 62.8 | 26.2 | 26.2 | - | 36.6 | 30.1 | 6.5 |
| Pasquotank | 14.3 | 11.3 | 11.3 | - | 3.0 | 2.0 | 1.0 |
| Pender | 95.2 | 88.8 | 88.8 | - | 6.5 | 1.9 | 4.6 |
| Perquimans | 4.1 | 2.2 | 2.2 | - | 1.9 | - | 1.9 |
| Person | 43.7 | 29.4 | 27.3 | 2.1 | 14.3 | 6.5 | 7.8 |
| Pitt | 54.7 | 39.6 | 39.0 | 0.6 | 15.1 | 11.1 | 4.1 |
| Polk | 15.7 | 15.7 | 15.7 | - | - | - | - |
| Randolph | 18.9 | 6.1 | 6.1 | - | 12.8 | 1.7 | 11.1 |
| Richmond | 68.3 | 58.6 | 58.6 | - | 9.7 | 5.0 | 4.7 |
| Robeson | 67.6 | 58.8 | 58.8 | - | 8.8 | 6.5 | 2.3 |
| Rockingham | 34.7 | 28.4 | 28.4 | - | 6.3 | 0.5 | 5.8 |
| Rowan | 26.1 | 12.9 | 12.9 | - | 13.2 | 10.9 | 2.3 |
| Rutherford | 23.6 | 10.5 | 10.5 | - | 13.1 | 7.2 | 6.0 |
| Sampson | 74.2 | 56.7 | 56.7 | - | 17.5 | 9.6 | 7.9 |
| Scotland | 25.8 | 15.2 | 15.2 | - | 10.6 | 8.4 | 2.2 |
| Stanly | 8.2 | 5.1 | 5.1 | - | 3.1 | - | 3.1 |
| Stokes | 31.8 | 13.6 | 13.6 | - | 18.2 | 9.2 | 9.1 |
| Surry | 25.9 | 13.5 | 13.5 | - | 12.3 | 4.2 | 8.1 |
| Swain | 1.9 | 0.5 | 0.5 | - | 1.4 | - | 1.4 |
| Transylvania | - | - | - | - | - | - | - |
| Tyrrell | 31.7 | 28.8 | 28.8 | - | 2.9 | 2.9 | - |
| Union | 7.1 | 1.9 | 1.9 | - | 5.2 | 0.7 | 4.5 |
| Vance | 31.0 | 16.7 | 16.7 | - | 14.3 | 11.1 | 3.2 |
| Wake | 97.7 | 54.7 | 54.7 | - | 43.0 | 35.8 | 7.2 |
| Warren | 81.5 | 42.0 | 42.0 | - | 39.5 | 23.3 | 16.2 |
| Washington | 37.5 | 26.0 | 26.0 | - | 11.6 | 10.8 | 0.7 |
| Watauga | 5.7 | - | - | - | 5.7 | 3.1 | 2.5 |
| Wayne | 60.9 | 47.4 | 47.4 | - | 13.5 | 6.1 | 7.4 |
| Wilkes | 69.6 | 38.4 | 38.4 | - | 31.1 | 17.7 | 13.4 |
| Wilson | 25.6 | 19.8 | 19.8 | - | 5.8 | 1.7 | 4.1 |
| Yadkin | 19.2 | 3.1 | 3.1 | - | 16.1 | 2.3 | 13.8 |
| Yancey | 9.7 | 1.7 | 1.7 | - | 7.9 | 3.2 | 4.8 |
| Total | 4,225.9 | 2,731.5 | 2,687.6 | 44.0 | 1,494.4 | 868.5 | 625.8 |

[^10]Table 38-Average net annual growth and average annual removals of live trees, growing stock, and sawtimber on timberland by species, North Carolina, 1990-2001

| $\underline{\text { Species }}$ | Live trees |  | Growing stock |  | Sawtimber |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Net annual growth | Annual removals | Net annual growth | Annual removals | Net annual growth | Annual removals |
|  | Million cubic feet |  |  |  | Million board feet |  |
| Softwood |  |  |  |  |  |  |
| Longleaf pine | 15.8 | 11.4 | 15.9 | 11.4 | 73.5 | 52.3 |
| Slash pine | 14.2 | 28.5 | 14.2 | 28.4 | 56.8 | 59.3 |
| Shortleaf pine | 8.6 | 50.6 | 8.6 | 50.3 | 60.4 | 179.9 |
| Loblolly pine | 508.0 | 524.3 | 500.0 | 522.9 | 2,007.6 | 2,052.8 |
| Pond pine | 9.8 | 24.0 | 9.1 | 23.8 | 50.4 | 86.3 |
| Virginia pine | 21.5 | 58.3 | 19.2 | 57.8 | 109.5 | 149.7 |
| Pitch pine | -4.9 | 1.0 | -5.0 | 1.0 | -11.4 | 4.2 |
| Table Mountain pine | 0.3 | 0.7 | 0.4 | 0.7 | 0.3 | 2.8 |
| Eastern white pine | 31.1 | 20.0 | 30.3 | 20.0 | 174.8 | 100.1 |
| Eastern hemlock | 9.4 | 0.5 | 8.9 | 0.5 | 41.7 | 1.5 |
| Spruce and fir | 0.4 | - | 0.5 | - | 1.7 | - |
| Baldcypress | 4.8 | 5.4 | 5.0 | 5.2 | 29.7 | 29.4 |
| Pondcypress | 1.0 | 1.5 | 1.3 | 1.5 | 6.7 | 7.3 |
| Atlantic white-cedar | -0.5 | 0.5 | -0.5 | 0.5 | 3.1 | 0.4 |
| Redcedars | 3.8 | 2.3 | 2.8 | 2.3 | 7.4 | 5.3 |
| Total softwoods | 623.5 | 728.6 | 610.8 | 726.2 | 2,612.4 | 2,731.5 |
| Hardwood |  |  |  |  |  |  |
| Select white oaks | 55.6 | 58.0 | 54.5 | 57.1 | 245.7 | 197.8 |
| Select red oaks | 25.1 | 14.9 | 25.7 | 14.8 | 120.4 | 55.0 |
| Other white oaks | 29.5 | 16.7 | 29.1 | 16.1 | 124.7 | 50.1 |
| Other red oaks | 58.3 | 77.7 | 56.4 | 74.4 | 259.5 | 242.9 |
| Hickory | 17.0 | 18.2 | 16.3 | 17.2 | 50.8 | 42.7 |
| Yellow birch | 0.5 | 0.8 | 0.7 | 0.5 | 3.9 | 1.6 |
| Hard maple | 5.4 | 0.7 | 4.8 | 0.7 | 15.1 | 2.6 |
| Soft maple | 73.5 | 52.8 | 64.0 | 47.4 | 164.1 | 98.6 |
| Beech | 8.3 | 4.6 | 7.0 | 4.6 | 27.2 | 13.4 |
| Sweetgum | 63.7 | 83.9 | 60.5 | 80.8 | 193.3 | 214.5 |
| Tupelo and blackgum | 22.7 | 22.6 | 24.8 | 20.5 | 92.6 | 54.8 |
| Ash | 13.0 | 7.8 | 11.8 | 6.9 | 55.1 | 17.5 |
| Cottonwood | 0.2 | 0.4 | 0.2 | 0.4 | 2.4 | 2.3 |
| Basswood | 2.7 | 1.4 | 2.6 | 1.3 | 13.1 | 5.4 |
| Yellow-poplar | 179.9 | 104.9 | 174.0 | 104.1 | 850.9 | 451.4 |
| Bay and magnolia | 6.6 | 3.2 | 6.3 | 2.8 | 15.9 | 1.1 |
| Black cherry | 5.7 | 2.4 | 4.1 | 1.6 | 13.3 | 2.8 |
| Black walnut | 0.8 | 0.5 | 0.9 | 0.5 | 4.4 | 1.2 |
| Sycamore | 4.1 | 1.7 | 4.2 | 1.5 | 14.7 | 4.3 |
| Black locust | -1.8 | 3.5 | -1.2 | 3.0 | -1.3 | 8.3 |
| Elm | 3.9 | 4.6 | 3.1 | 3.8 | 2.0 | 9.1 |
| Other Eastern |  |  |  |  |  |  |
| hardwoods | 27.2 | 17.2 | 20.2 | 5.3 | 33.8 | 16.9 |
| Total hardwoods | 601.9 | 498.4 | 570.0 | 465.2 | 2,301.3 | 1,494.4 |
| All species | 1,225.4 | 1,227.0 | 1,180.9 | 1,191.4 | 4,913.7 | 4,225.9 |

[^11]A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 39—Average annual removals of growing stock on timberland by species and diameter class, North Carolina, 1990-2001

|  | Diameter class (inches at breast height) |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Species | All classes | $\begin{gathered} \hline 5.0- \\ 6.9 \end{gathered}$ | $\begin{gathered} \hline 7.0- \\ 8.9 \end{gathered}$ | $\begin{aligned} & \hline 9.0- \\ & 10.9 \end{aligned}$ | $\begin{gathered} 11.0- \\ 12.9 \end{gathered}$ | $\begin{gathered} 13.0- \\ 14.9 \end{gathered}$ | $\begin{gathered} 15.0- \\ 16.9 \end{gathered}$ | $\begin{gathered} 17.0- \\ 18.9 \end{gathered}$ | $\begin{gathered} 19.0- \\ 20.9 \end{gathered}$ | $\begin{gathered} \hline 21.0- \\ 28.9 \end{gathered}$ | 29.0 and larger |


| Million cubic feet |  |  |  |  |  |  |  |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| Softwood |  |  |  |  |  |  |  |  |  |  |  |
| $\quad$ Longleaf pine | 11.4 | 0.2 | 0.9 | 2.4 | 1.8 | 3.2 | 1.8 | 0.7 | 0.3 | - | - |
| Slash pine | 28.4 | 3.3 | 10.2 | 11.0 | 3.1 | 0.7 | 0.2 | - | - | - | - |
| Shortleaf pine | 50.3 | 2.6 | 8.9 | 12.5 | 12.5 | 6.2 | 4.6 | 2.1 | 0.3 | 0.4 | - |
| Loblolly pine | 522.9 | 30.6 | 82.8 | 94.6 | 89.2 | 76.3 | 59.7 | 39.2 | 22.7 | 27.4 | 0.6 |
| Pond pine | 23.8 | 2.2 | 3.3 | 5.3 | 6.4 | 3.1 | 2.0 | 0.8 | 0.6 | 0.2 | - |
| Virginia pine | 57.8 | 8.1 | 13.1 | 17.5 | 11.4 | 4.9 | 2.2 | 0.5 | 0.1 | - | - |
| Pitch pine | 1.0 | - | - | 0.4 | 0.2 | 0.2 | - | 0.2 | - | - | - |
| Table Mountain pine | 0.7 | - | 0.1 | - | 0.2 | 0.1 | 0.2 | - | - | - | - |
| Eastern white pine | 20.0 | 0.6 | 1.1 | 1.3 | 1.7 | 3.3 | 2.7 | 1.9 | 1.8 | 5.4 | 0.2 |
| Eastern hemlock | 0.5 | - | 0.2 | - | - | 0.1 | 0.1 | 0.1 | - | - | - |
| Baldcypress | 5.2 | - | - | 0.1 | - | - | 0.7 | 0.4 | 0.5 | 1.8 | 1.7 |
| Pondcypress | 1.5 | - | - | - | 0.2 | 0.2 | 0.3 | - | 0.8 | - | - |
| Atlantic white-cedar | 0.5 | 0.1 | 0.3 | - | 0.1 | - | - | - | - | - | - |
| Redcedars | 2.3 | 0.4 | 0.7 | 0.6 | 0.3 | 0.3 | - | - | - | - | - |
| $\quad$ Total softwoods | 726.2 | 48.1 | 121.6 | 145.8 | 127.1 | 98.5 | 74.5 | 45.8 | 27.1 | 35.2 | 2.4 |


| Hardwood |  |  |  |  |  |  |  |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: | ---: |
| Select white oaks | 57.1 | 3.0 | 3.2 | 6.5 | 9.1 | 9.9 | 7.7 | 5.3 | 4.9 | 6.6 | 0.8 |
| Select red oaks | 14.8 | 0.6 | 1.4 | 1.0 | 1.3 | 2.0 | 2.0 | 1.1 | 1.2 | 3.4 | 0.8 |
| Other white oaks | 16.1 | 2.0 | 1.0 | 1.6 | 2.4 | 2.6 | 2.5 | 1.8 | 0.3 | 1.4 | 0.4 |
| Other red oaks | 74.4 | 6.1 | 6.4 | 10.4 | 8.5 | 12.4 | 7.6 | 5.9 | 5.1 | 10.4 | 1.5 |
| Hickory | 17.2 | 2.2 | 2.5 | 2.4 | 2.7 | 2.7 | 2.3 | 1.1 | 0.9 | 0.4 | - |
| Yellow birch | 0.5 | 0.1 | - | - | - | 0.4 | - | - | - | - | - |
| Hard maple | 0.7 | - | 0.2 | - | - | - | - | 0.3 | - | 0.3 | - |
| Soft maple | 47.4 | 8.2 | 7.8 | 7.5 | 6.9 | 4.5 | 3.8 | 3.5 | 1.9 | 3.1 | 0.3 |
| Beech | 4.6 | 0.2 | 0.3 | 0.6 | 0.7 | 0.3 | 1.0 | 0.9 | - | 0.6 | - |
| Sweetgum | 80.8 | 8.9 | 11.2 | 14.8 | 12.4 | 9.8 | 7.6 | 5.8 | 4.5 | 5.1 | 0.6 |
| Tupelo and blackgum | 20.5 | 1.4 | 2.6 | 3.6 | 3.5 | 3.0 | 1.9 | 2.0 | 0.7 | 1.4 | 0.4 |
| Ash | 6.9 | 0.7 | 0.7 | 1.3 | 1.6 | 0.4 | 0.4 | 1.0 | 0.6 | 0.3 | - |
| Cottonwood | 0.4 | - | - | - | - | - | 0.2 | - | 0.1 | 0.2 | - |
| Basswood | 1.3 | - | - | - | 0.3 | 0.3 | 0.1 | 0.2 | 0.4 | - | - |
| Yellow-poplar | 104.1 | 2.7 | 5.8 | 7.8 | 12.6 | 15.0 | 16.1 | 14.4 | 7.5 | 18.9 | 3.3 |
| Bay and magnolia | 2.8 | 1.4 | 0.7 | 0.3 | 0.2 | 0.1 | - | - | - | - | - |
| Black cherry | 1.6 | 0.0 | 0.4 | 0.5 | 0.3 | - | - | - | 0.1 | 0.3 | - |
| Black walnut | 0.5 | 0.1 | - | - | - | - | 0.1 | 0.2 | - | - | - |
| Sycamore | 1.5 | 0.2 | - | 0.3 | 0.2 | - | 0.4 | 0.1 | - | 0.2 | - |
| Black locust | 3.0 | 0.4 | 0.1 | 0.3 | 0.7 | 0.6 | 0.3 | 0.3 | 0.1 | 0.2 | - |
| Elm | 3.8 | 0.6 | 0.7 | 0.4 | 0.7 | 0.4 | 0.3 | 0.1 | 0.4 | 0.3 | - |
| Other Eastern |  |  |  |  |  |  |  |  |  |  | - |
| hardwoods | 5.3 | 0.3 | 0.7 | 0.4 | 0.4 | 1.1 | 1.4 | 0.1 | 0.5 | 0.4 | - |
| Total hardwoods | 465.2 | 39.4 | 45.7 | 59.7 | 64.4 | 65.5 | 55.4 | 44.2 | 29.3 | 53.4 | 8.2 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 40—Average annual mortality of live trees, growing stock, and sawtimber on timberland by species, North Carolina, 1990-2001

| Species | Live trees | Growing stock | Sawtimber |
| :--- | :---: | :---: | ---: |
|  | Million cubic feet |  |  |
| Softwood |  |  | Million board feet |
| Longleaf pine | 1.4 | 1.2 |  |
| Slash pine | 1.3 | 1.2 | 5.6 |
| Shortleaf pine | 20.9 | 20.3 | 4.1 |
| Loblolly pine | 82.4 | 82.2 | 68.4 |
| Pond pine | 11.9 | 11.6 | 239.2 |
| Virginia pine | 45.2 | 44.6 | 41.9 |
| Pitch pine | 9.9 | 9.8 | 109.3 |
| Table Mountain pine | 1.0 | 0.9 | 34.6 |
| Eastern white pine | 9.5 | 9.4 | 2.4 |
| Eastern hemlock | 1.8 | 1.5 | 40.3 |
| Spruce and fir | 0.3 | 0.2 | 6.0 |
| Baldcypress | 1.5 | 0.9 | 0.8 |
| Pondcypress | 1.0 | 0.7 | 5.2 |
| Atlantic white-cedar | 1.9 | 1.8 | 2.3 |
| Redcedars | 0.9 | 0.8 | 3.8 |
| Total softwoods | 190.9 | 187.3 | 0.7 |


| Hardwood |  |  |  |
| :---: | :---: | :---: | :---: |
| Select white oaks | 18.8 | 16.9 | 62.5 |
| Select red oaks | 10.9 | 9.2 | 34.1 |
| Other white oaks | 10.9 | 7.6 | 28.4 |
| Other red oaks | 43.1 | 38.6 | 139.3 |
| Hickory | 11.4 | 10.0 | 37.2 |
| Yellow birch | 1.2 | 0.7 | 1.4 |
| Hard maple | 1.0 | 0.8 | 1.2 |
| Soft maple | 25.7 | 15.9 | 38.7 |
| Beech | 2.8 | 2.3 | 7.9 |
| Sweetgum | 23.4 | 20.9 | 72.4 |
| Tupelo and blackgum | 13.6 | 7.6 | 23.0 |
| Ash | 7.7 | 5.9 | 13.7 |
| Cottonwood | 1.1 | 1.1 | 2.3 |
| Basswood | 0.7 | 0.6 | 1.4 |
| Yellow-poplar | 22.1 | 20.8 | 77.0 |
| Bay and magnolia | 2.2 | 1.0 | 0.4 |
| Black cherry | 3.4 | 2.2 | 3.1 |
| Black walnut | 1.0 | 0.7 | 1.1 |
| Sycamore | 1.4 | 1.1 | 3.4 |
| Black locust | 8.6 | 6.0 | 16.0 |
| Elm | 4.2 | 3.7 | 12.9 |
| Other Eastern |  |  |  |
| hardwoods | 19.8 | 6.7 | 18.6 |
| Total hardwoods | 234.9 | 180.5 | 596.0 |
| All species | 425.8 | 367.8 | 1,160.6 |

Numbers in rows and columns may not sum to totals due to rounding.

Table 41—Average net annual growth and average annual removals of growing stock on timberland by ownership class and species group, North Carolina, 1990-2001

| Ownership class | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{gathered} \hline \text { All } \\ \text { softwood } \end{gathered}$ | Yellow pine | Other softwood <br> softwood | All <br> hardwood | Soft hardwood | Hard hardwood |
|  | Average net annual growth (million cubic feet) |  |  |  |  |  |  |
| National forest | 59.1 | 15.9 | 11.5 | 4.4 | 43.2 | 22.5 | 20.7 |
| Other public | 57.5 | 34.0 | 32.3 | 1.6 | 23.6 | 17.4 | 6.2 |
| Forest industry | 176.6 | 155.8 | 156.6 | -0.8 | 20.8 | 16.3 | 4.4 |
| Nonindustrial private | 887.7 | 405.1 | 392.4 | 12.7 | 482.6 | 304.3 | 178.2 |
| All classes | 1,180.9 | 610.8 | 592.9 | 18.0 | 570.0 | 360.5 | 209.5 |
|  | Average annual removals (million cubic feet) |  |  |  |  |  |  |
| National forest | 11.0 | 4.6 | 4.5 | 0.1 | 6.3 | 1.8 | 4.5 |
| Other public | 23.6 | 20.2 | 20.2 | - | 3.4 | 1.4 | 2.0 |
| Forest industry | 186.8 | 157.4 | 155.4 | 2.0 | 29.4 | 20.1 | 9.3 |
| Nonindustrial private | 970.0 | 543.9 | 536.2 | 7.8 | 426.1 | 249.4 | 176.6 |
| All classes | 1,191.4 | 726.2 | 716.3 | 9.9 | 465.2 | 272.8 | 192.4 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 42-Average net annual growth and average annual removals of live trees on timberland by ownership class and species group, North Carolina, 1990-2001

| Ownership class | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{gathered} \hline \text { All } \\ \text { softwood } \end{gathered}$ | Yellow pine | Other softwood | All <br> hardwood | Soft hardwood | Hard hardwood |
|  | Average net annual growth (million cubic feet) |  |  |  |  |  |  |
| National forest | 56.4 | 15.5 | 11.6 | 3.9 | 40.9 | 22.2 | 18.7 |
| Other public | 57.3 | 34.3 | 32.7 | 1.6 | 23.0 | 17.0 | 6.0 |
| Forest industry | 181.4 | 158.7 | 159.4 | -0.8 | 22.7 | 18.1 | 4.6 |
| Nonindustrial private | 930.3 | 415.0 | 400.8 | 14.2 | 515.2 | 323.0 | 192.2 |
| All classes | 1,225.4 | 623.5 | 604.6 | 18.9 | 601.9 | 380.4 | 221.5 |
|  | Average annual removals (million cubic feet) |  |  |  |  |  |  |
| National forest | 11.2 | 4.6 | 4.5 | 0.1 | 6.6 | 1.8 | 4.8 |
| Other public | 23.9 | 20.2 | 20.2 | - | 3.8 | 1.7 | 2.1 |
| Forest industry | 189.7 | 158.0 | 156.0 | 2.0 | 31.7 | 21.7 | 10.0 |
| Nonindustrial private | 1,002.2 | 545.8 | 537.8 | 8.0 | 456.4 | 262.9 | 193.5 |
| All classes | 1,227.0 | 728.6 | 718.5 | 10.1 | 498.4 | 288.0 | 210.4 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 43-Average net annual growth and average annual removals of sawtimber on timberland by ownership class and species group, North Carolina, 1990-2001

| Ownership class | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All softwood | Yellow pine | $\begin{gathered} \text { Other } \\ \text { softwood } \end{gathered}$ | All hardwood | Soft hardwood | Hard hardwood |
|  | Average net annual growth (million board feet) |  |  |  |  |  |  |
| National forest | 282.6 | 84.5 | 66.4 | 18.1 | 198.1 | 106.2 | 91.9 |
| Other public | 261.6 | 162.0 | 153.8 | 8.2 | 99.6 | 69.4 | 30.3 |
| Forest industry | 669.2 | 608.8 | 608.3 | 0.4 | 60.5 | 44.4 | 16.1 |
| Nonindustrial private | 3,700.2 | 1,757.1 | 1,693.5 | 63.6 | 1,943.1 | 1,210.7 | 732.4 |
| All classes | 4,913.7 | 2,612.4 | 2,522.0 | 90.4 | 2,301.3 | 1,430.7 | 870.6 |
|  | Average annual removals (million board feet) |  |  |  |  |  |  |
| National forest | 42.1 | 17.4 | 17.4 | - | 24.7 | 6.2 | 18.5 |
| Other public | 77.6 | 69.1 | 69.1 | - | 8.5 | 3.6 | 4.9 |
| Forest industry | 546.4 | 472.9 | 463.8 | 9.1 | 73.6 | 44.1 | 29.4 |
| Nonindustrial private | 3,559.8 | 2,172.2 | 2,137.3 | 34.9 | 1,387.6 | 814.7 | 572.9 |
| All classes | 4,225.9 | 2,731.5 | 2,687.6 | 44.0 | 1,494.4 | 868.5 | 625.8 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

Table 44—Average net annual growth of growing stock on timberland by forest-type group, stand origin, and species group, North Carolina, 1990-2001

| Forest-type group and stand origin ${ }^{a}$ | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | $\begin{gathered} \hline \text { All } \\ \text { softwood } \end{gathered}$ | Yellow pine | Other softwood | All <br> hardwood | Soft hardwood | $\begin{gathered} \text { Hard } \\ \text { hardwood } \end{gathered}$ |
|  | Million cubic feet |  |  |  |  |  |  |
| Softwood types |  |  |  |  |  |  |  |
| White-red-jack pine |  |  |  |  |  |  |  |
| Planted | 2.4 | 2.4 | 2.4 | - | 0.1 | 0.0 | 0.0 |
| Natural | 14.0 | 10.2 | 9.5 | 0.8 | 3.8 | 2.4 | 1.5 |
| Total | 16.5 | 12.6 | 11.8 | 0.8 | 3.9 | 2.4 | 1.5 |
| Spruce-fir |  |  |  |  |  |  |  |
| Planted | - | - | - | - | - | - | - |
| Natural | 0.6 | 0.6 | 0.0 | 0.6 | 0.0 | 0.0 | -0.0 |
| Total | 0.6 | 0.6 | 0.0 | 0.6 | 0.0 | 0.0 | -0.0 |
| Longleaf-slash pine |  |  |  |  |  |  |  |
| Planted | 18.6 | 18.2 | 18.2 | - | 0.4 | 0.2 | 0.2 |
| Natural | 9.5 | 9.1 | 9.1 | - | 0.4 | 0.0 | 0.4 |
| Total | 28.1 | 27.3 | 27.3 | - | 0.8 | 0.3 | 0.5 |
| Loblolly-shortleaf pine |  |  |  |  |  |  |  |
| Planted | 274.3 | 263.2 | 263.2 | - | 11.1 | 9.4 | 1.7 |
| Natural | 243.2 | 188.3 | 186.9 | 1.3 | 54.9 | 38.4 | 16.6 |
| Total | 517.5 | 451.4 | 450.1 | 1.3 | 66.1 | 47.8 | 18.3 |
| Total softwoods | 562.7 | 491.9 | 489.3 | 2.7 | 70.8 | 50.5 | 20.4 |

## Hardwood types

Oak-pine
Planted
Natural
Total
Oak-hickory
Oak-gum-cypress
Elm-ash-cottonwood
Maple-beech-birch
Total hardwoods

## Nonstocked

|  | All groups | $1,180.9$ | 610.8 | 592.9 | 18.0 | 570.0 | 360.5 |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.
${ }^{a}$ Classifications at the beginning of the remeasurement period.

Table 45-Average annual removals of growing stock on timberland by forest-type group, stand origin, and species group, North Carolina, 1990-2001

| Forest-type group and stand origin ${ }^{a}$ | All species | Softwoods |  |  | Hardwoods |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | All <br> softwood | Yellow pine | Other softwood | All <br> hardwood | Soft hardwood | Hard hardwood |
|  | Million cubic feet |  |  |  |  |  |  |
| Softwood types |  |  |  |  |  |  |  |
| White-red-jack pine |  |  |  |  |  |  |  |
| Planted | 1.5 | 1.5 | 1.5 | - | - | - | - |
| Natural | 12.1 | 10.7 | 10.6 | 0.1 | 1.4 | 0.4 | 0.9 |
| Total | 13.6 | 12.2 | 12.1 | 0.1 | 1.4 | 0.4 | 0.9 |
| Spruce-fir |  |  |  |  |  |  |  |
| Planted | - | - | - | - | - | - | - |
| Natural | 2.6 | 1.8 | 1.8 | - | 0.8 | 0.8 | - |
| Total | 2.6 | 1.8 | 1.8 | - | 0.8 | 0.8 | - |
| Longleaf-slash pine |  |  |  |  |  |  |  |
| Planted | 29.9 | 29.1 | 29.1 | - | 0.8 | 0.6 | 0.2 |
| Natural | 9.2 | 9.2 | 9.2 | - | - | - | - |
| Total | 39.2 | 38.3 | 38.3 | - | 0.8 | 0.6 | 0.2 |
| Loblolly-shortleaf pine |  |  |  |  |  |  |  |
| Planted | 197.2 | 190.3 | 190.3 | - | 6.9 | 4.4 | 2.5 |
| Natural | 421.9 | 361.0 | 359.4 | 1.7 | 60.9 | 42.4 | 18.5 |
| Total | 619.1 | 551.4 | 549.7 | 1.7 | 67.8 | 46.8 | 21.0 |
| Total softwoods | 674.4 | 603.7 | 602.0 | 1.8 | 70.7 | 48.6 | 22.1 |
| Hardwood types |  |  |  |  |  |  |  |
| Oak-pine |  |  |  |  |  |  |  |
| Planted | 2.3 | 1.7 | 1.7 | - | 0.6 | 0.6 | - |
| Natural | 152.4 | 79.4 | 78.6 | 0.8 | 73.0 | 41.8 | 31.2 |
| Total | 154.7 | 81.1 | 80.3 | 0.8 | 73.6 | 42.4 | 31.2 |
| Oak-hickory | 270.8 | 28.2 | 27.0 | 1.2 | 242.6 | 130.1 | 112.5 |
| Oak-gum-cypress | 83.3 | 13.2 | 7.0 | 6.1 | 70.1 | 46.2 | 23.9 |
| Elm-ash-cottonwood | 4.3 | - | - | - | 4.3 | 3.8 | 0.6 |
| Maple-beech-birch | 3.8 | - | - | - | 3.8 | 1.7 | 2.1 |
| Total hardwoods | 517.0 | 122.5 | 114.3 | 8.1 | 394.5 | 224.2 | 170.3 |
| Nonstocked | - | - | - | - | - | - | - |
| All groups | 1,191.4 | 726.2 | 716.3 | 9.9 | 465.2 | 272.8 | 192.4 |

Numbers in rows and columns may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.
${ }^{a}$ Classifications at the beginning of the remeasurement period.

Table 46-Fresh weight of live trees on timberland by ownership class, species group, and tree component, North Carolina, 2002

| Ownership class and species group | All components | Component |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Growing-stock trees |  |  | Cull trees |  |  |
|  |  | All live saplings | Total | Boles | Stumps, tops, and limbs | Total | Boles | Stumps, tops, and limbs |
|  | Thousand tons |  |  |  |  |  |  |  |
| National forest |  |  |  |  |  |  |  |  |
| Softwood | 24,460.8 | 951.4 | 22,915.9 | 19,666.2 | 3,249.7 | 593.5 | 429.5 | 164.0 |
| Hardwood | 120,936.3 | 8,629.0 | 101,358.3 | 83,080.1 | 18,278.3 | 10,949.0 | 8,463.9 | 2,485.1 |
| Total | 145,397.1 | 9,580.4 | 124,274.2 | 102,746.3 | 21,528.0 | 11,542.5 | 8,893.4 | 2,649.1 |
| Other public |  |  |  |  |  |  |  |  |
| Softwood | 45,974.6 | 1,645.6 | 43,504.0 | 37,277.9 | 6,226.1 | 825.1 | 679.4 | 145.7 |
| Hardwood | 72,278.0 | 8,624.6 | 55,915.7 | 45,803.8 | 10,111.9 | 7,737.8 | 5,937.1 | 1,800.7 |
| Total | 118,252.6 | 10,270.1 | 99,419.6 | 83,081.7 | 16,338.0 | 8,562.9 | 6,616.5 | 1,946.4 |
| Forest industry |  |  |  |  |  |  |  |  |
| Softwood | 65,895.3 | 2,692.7 | 61,901.8 | 52,294.4 | 9,607.4 | 1,300.9 | 1,075.8 | 225.1 |
| Hardwood | 39,235.5 | 7,930.5 | 26,786.6 | 21,609.7 | 5,176.9 | 4,518.4 | 3,467.9 | 1,050.5 |
| Total | 105,130.7 | 10,623.2 | 88,688.4 | 73,904.1 | 14,784.3 | 5,819.2 | 4,543.6 | 1,275.6 |
| Nonindustrial private |  |  |  |  |  |  |  |  |
| Softwood | 383,127.2 | 25,681.2 | 348,196.1 | 295,868.9 | 52,327.3 | 9,249.9 | 7,508.4 | 1,741.5 |
| Hardwood | 956,678.6 | 111,324.1 | 744,503.5 | 611,857.3 | 132,646.2 | 100,851.0 | 78,083.7 | 22,767.3 |
| Total | 1,339,805.8 | 137,005.3 | 1,092,699.7 | 907,726.2 | 184,973.5 | 110,100.8 | 85,592.1 | 24,508.8 |
| All ownerships |  |  |  |  |  |  |  |  |
| Softwood | 519,457.7 | 30,970.8 | 476,517.7 | 405,107.3 | 71,410.4 | 11,969.3 | 9,693.0 | 2,276.3 |
| Hardwood | 1,189,128.4 | 136,508.2 | 928,564.1 | 762,350.8 | 166,213.3 | 124,056.1 | 95,952.6 | 28,103.6 |
| Total | 1,708,586.1 | 167,478.9 | 1,405,081.8 | 1,167,458.2 | 237,623.7 | 136,025.4 | 105,645.6 | 30,379.8 |

[^12]Table 47—Area of timberland treated or disturbed annually and retained in timberland by treatment or disturbance and ownership class, North Carolina, 1990 to 2002

| Treatment or disturbance | $\begin{gathered} \text { All } \\ \text { classes } \end{gathered}$ | Ownership class |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  |  | Public | Forest industry | Nonindustrial private |
|  | Thousand acres |  |  |  |
| Final harvest | 246.4 | 6.6 | 40.3 | 199.5 |
| Partial harvest ${ }^{a}$ | 71.4 | 2.3 | 4.3 | 64.8 |
| Seed tree/shelterwood | 7.4 | 0.6 | 0.4 | 6.3 |
| Commercial thinning | 51.3 | 3.8 | 26.7 | 20.8 |
| Other stand improvement | 14.8 | 1.9 | 3.0 | 9.9 |
| Site preparation | 78.0 | 3.4 | 29.6 | 45.0 |
| Artificial regeneration ${ }^{\text {b }}$ | 100.5 | 4.6 | 32.9 | 63.0 |
| Natural regeneration ${ }^{\text {b }}$ | 213.5 | 8.7 | 10.8 | 193.9 |
| Other treatment | 52.6 | 4.7 | 4.7 | 43.2 |
| Natural disturbance |  |  |  |  |
| Disease | 8.4 | 1.0 | 2.5 | 5.0 |
| Insects | 25.8 | 7.7 | 1.6 | 16.5 |
| Fire | 42.7 | 13.8 | 9.4 | 19.5 |
| Weather | 122.2 | 16.2 | 11.8 | 94.2 |
| Animals | 9.4 | 0.7 | 0.6 | 8.1 |
| Other disturbances |  |  |  |  |
| Grazing | 10.5 | - | - | 10.5 |
| Other human-caused disturbance | 33.8 | 1.3 | 1.9 | 30.6 |

Since some acres experience more than one treatment or disturbance, there are no column totals. Numbers in rows may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.
${ }^{a}$ Includes high-grading and some selective cutting.
${ }^{b}$ Includes establishment of trees for timber production on forest and nonforest land.

Table 48-Area of timberland treated or disturbed annually and retained in timberland by treatment or disturbance and forest management type, North Carolina, 1990 to 2002

| Treatment or disturbance | $\begin{gathered} \text { All } \\ \text { types } \end{gathered}$ | Forest management type ${ }^{a}$ |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Pine plantation | Natural pine | Oakpine | Upland hardwood | Lowland hardwood | Nonstocked |
|  | Thousand acres |  |  |  |  |  |  |
| Final harvest | 246.4 | 36.5 | 88.8 | 38.0 | 61.1 | 21.6 | 0.4 |
| Partial harvest ${ }^{\text {b }}$ | 71.4 | 4.3 | 20.0 | 11.6 | 29.1 | 6.5 | - |
| Seed tree/shelterwood | 7.4 | 1.5 | 3.5 | 0.8 | 1.0 | 0.6 | - |
| Commercial thinning | 51.3 | 40.2 | 7.4 | 2.7 | 0.7 | 0.3 | - |
| Other stand improvement | 14.8 | 5.9 | 4.4 | 3.0 | 1.0 | 0.5 | - |
| Site preparation | 78.0 | 22.1 | 22.3 | 13.3 | 12.5 | 5.8 | 2.0 |
| Other treatment | 52.6 | 5.0 | 11.8 | 5.6 | 18.9 | 11.3 | - |
| Natural disturbance |  |  |  |  |  |  |  |
| Disease | 8.4 | 3.2 | 2.3 | 0.3 | 1.9 | 0.7 | - |
| Insects | 25.8 | 1.5 | 14.5 | 6.0 | 3.8 | - | - |
| Fire | 42.7 | 12.3 | 12.8 | 7.2 | 7.6 | 2.2 | 0.6 |
| Weather | 122.2 | 8.6 | 20.5 | 14.9 | 33.1 | 44.0 | 1.1 |
| Animals | 9.4 | 0.2 | 0.4 | 0.1 | 2.3 | 6.0 | 0.4 |
| Other disturbances |  |  |  |  |  |  |  |
| Grazing | 10.5 | - | 0.4 | 1.2 | 8.3 | 0.5 | - |
| Other human-caused disturbance | 33.8 | 2.3 | 10.0 | 4.2 | 14.1 | 3.1 | - |

Since some acres experience more than one treatment or disturbance, there are no column totals. Numbers in rows may not sum to totals due to rounding.
A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.
${ }^{a}$ Classification before treatment or disturbance.
${ }^{b}$ Includes high-grading and some selective cutting.

Table 49—Area of timberland regenerated annually by type of regeneration and forest management type, North Carolina, 1990 to 2002

|  |  | Forest management type ${ }^{a}$ |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Type of regeneration | All types | Pine plantation | Natural pine | Oakpine | Upland hardwood | Lowland hardwood | Nonstocked |
|  | Thousand acres |  |  |  |  |  |  |
| Artificial regeneration following harvest | 67.9 | 36.9 | - | 22.8 | 6.1 | 2.1 | - |
| Natural regeneration following harvest | 137.0 | - | 27.8 | 30.2 | 56.9 | 21.5 | 0.5 |
| Other artificial regeneration on forest land | 18.8 | 14.7 | - | 3.2 | 1.0 | - | - |
| Other natural regeneration on forest land | 31.4 | 0.4 | 6.2 | 6.7 | 13.1 | 5.1 | - |
| Artificial regeneration on former nonforest land | 14.9 | 11.2 | - | 2.6 | 1.1 | - | - |
| Natural reversion of former nonforest land | 43.7 | - | 13.5 | 11.1 | 17.6 | 1.5 | - |
| Total | 313.7 | 63.1 | 47.5 | 76.6 | 95.7 | 30.2 | 0.5 |

[^13]The Forest Service, U.S. Department of Agriculture, is dedicated to the principle of multiple use management of the Nation's forest resources for sustained yields of wood, water, forage, wildlife, and recreation. Through forestry research, cooperation with the States and private forest owners, and management of the National Forests and National Grasslands, it strives-as directed by Congress-to provide increasingly greater service to a growing Nation.

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Brown, Mark J. 2004. Forest statistics for North Carolina, 2002.
Resour. Bull. SRS-88. Asheville, NC: U.S. Department of Agriculture, Forest Service, Southern Research Station. 78 p.

This report summarizes a 2002 inventory of the forest resources of a 100-county area of North Carolina. Major findings are highlighted in text and graphics; detailed data are presented in 49 tables.

Keywords: Forest ownership, timberland, timber growth, timber removals, timber volume.

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[^0]:    ${ }^{a}$ All tables in this report are available in Microsoft $®$ Excel workbook files. Upon request, these files will be supplied on $3 \frac{1}{2}$-inch diskettes.
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[^1]:    Numbers in rows and columns may not sum to totals due to rounding.
    A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.
    ${ }^{a}$ From the U.S. Bureau of the Census, 1990.
    ${ }^{b}$ Includes 157.8 thousand acres of water according to Forest Inventory and Analysis standards of area classification, but defined by the Bureau of Census as land.

[^2]:    Numbers in rows and columns may not sum to totals due to rounding.
    A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

[^3]:    Numbers in rows and columns may not sum to totals due to rounding.
    A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

[^4]:    Numbers in rows and columns may not sum to totals due to rounding.
    A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

[^5]:    Numbers in rows and columns may not sum to totals due to rounding.

[^6]:    Numbers in rows and columns may not sum to totals due to rounding.

[^7]:    Numbers in rows and columns may not sum to totals due to rounding.
    A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

[^8]:    Numbers in rows and columns may not sum to totals due to rounding.

[^9]:    Numbers in rows and columns may not sum to totals due to rounding.

[^10]:    Numbers in rows and columns may not sum to totals due to rounding.
    A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.

[^11]:    Numbers in rows and columns may not sum to totals due to rounding.

[^12]:    Numbers in rows and columns may not sum to totals due to rounding.

[^13]:    Numbers in rows and columns may not sum to totals due to rounding.
    A dash (-) indicates no sample for the cell; 0.0 indicates a value of $>0.0$ but $<0.05$ for the cell.
    ${ }^{a}$ Classification after regeneration.

