

private citizen. Generally the trees planted under this program are bare root, although recently we had a case where large B&B stock was purchased by private individuals. This program is designed for residential streets where the trees will be primarily for the benefit of the local residents. The program multiplies the efforts of Division personnel and will make Charlotte a more beautiful city sooner than would otherwise be possible.

Next, we need to examine some of the tree problems in Charlotte and what the Landscaping Division is doing about them. Many of the willow oaks in Charlotte look great when just the tops of the trees are viewed. The bases tell a different story. Here we find conks of *Polyporus* sp. These indicate extensive root rot underground. Excavation of some of these root systems show that papery tissue is holding up 2-4 foot diameter trees. Some have already fallen on houses and cars during recent storms. Injury some time during the life of the tree allowed the decay fungus to enter the tree roots. We are attempting to remove these trees as fast as we find them.

Decay is not limited to the root systems. Basal rot may gain entrance into trees which have been injured by sidewalk, curb, or other types of construction, as well as those hit by cars. Apparently, rot in the Charlotte area proceeds faster than growth, which in itself is pretty rapid. We, therefore, have initiated a program of actively identifying and treating affected trees where possible. This program will save Charlotte's trees for a longer period than if nothing is done to slow down the decay.

Another decay and an aesthetic problem results from willow oaks and other large tree species growing under or too close to utility lines.

Decay is extensive in these "roundovers" and "side trims." We are working with the local utility companies to remove these eyesores and potentially hazardous trees. The utility companies are removing the branches near the wires and landscaping personnel are completing the removal. Landscaping then replaces them with species, varieties or cultivars compatible with the site.

The recently started, systematic pruning program should catch minor street tree problems before they become major. We do have crews handling complaints and crises, but hopefully these types of situations will lessen as the management program takes hold.

The basis of our management program is an accurate and up-to-date street tree census. Currently we are three-quarters through with the field work on the census and are progressing on the computer analysis of the data collected. Not only are we obtaining information on existing trees as to their species, size, and condition but we are also determining where we have locations to plant new trees and the limiting site factors, if any. Field information is being digitally entered on optical scanning forms for direct reading on to computer tape. The information gathered will not only be used to formulate a scientific management plan for Charlotte's street trees; along with ordered priorities and cost analyses of the operations involved, but will also allow the formulation of a master street tree program to make Charlotte, tree wise, one of the most beautiful cities in the United States.

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ABSTRACT

Long, M.E. **Chippers**. Grounds Maintenance 11(11): 32, 34.

Machines available for converting wood and brush into chips range all the way from huge, truck-mounted units powered by 300-horsepower engines, and capable of gobbling logs up to 5 ft. in diameter, to small 5-horsepower units that can be pushed on their wheels to the job site. In selecting from all the available machines the one which will best meet your needs, there are many factors to keep in mind. As with any mechanical device, your chipper unit is ultimately going to need repair parts and service.