LANDSCAPE LOG

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JULY JOB FOCUS

1. Shearing hedges and pines

2. Continued mowing, weeding, watering and sucking insect control

The maintenance schedule for July is dominated by shearing of hedges and pines while trying to keep up with mowing, irrigation, weeding, and sucking insects. This shearing type of pruning fits July well. To understand what we are trying to do in pruning, one must remember the main objectives and understand the plant's response. Generally speaking, pruning objectives for plants include:

- removal of dead and diseased wood
- enhance the natural habit
- formal shearing (shaping)
- height maintenance

This shearing can be broken down into two broad categories—1) pruning of coniferous trees and 2) shearing or pruning of shrubs.

Physiologically, plants are affected by a phenomenon called apical dominance, that is the terminal bud, or apical meristem, continues growing and remains dominant over all side branches by producing a plant hormone, or growth regulator. The further the terminal is away from the lateral buds, the less effect it will have and, therefore, the typical pyramidal shape of trees, meaning the further the limbs or side branches are away from the terminal, the longer the side branches will be and, conversely, as branches get closer to the terminal, the laterals become shorter. Once this terminal is removed, then all lateral buds will break and, therefore, extreme dense branching can occur but allowed to return to a natural habit again, the terminal growth will become dominant, thus suppressing side branches. If one cuts back to a bud, then the natural habit is accented. If one frequently shears off the terminal, no apical dominance will result and, therefore, dense shaped hedges or plants will be the result.

PRUNING PINES, CONIFERS

Pruning of pines and other conifers is time specific, that is they must be pruned in July. Further, the only things one can do in pruning is to reduce the amount of terminal growth or completely remove a branch. Conifers lack adventitious tissue, or lateral buds, capable of generating suckers. Thus, complete removal of the new growth will result in a dead branch. But when the new growth is in the "candle stage" prior to bud set, pines can be pruned and new buds will set. Pines form these buds once a year; therefore, pruning of the pines must be confined to current season's growth if the branch is to be retained. Shearing of the candle growth is a common technique used by Christmas tree growers or anyone trying to produce a thick dense pine. This shearing is nothing more than removing one-half of the candle during the period of elongation. The result is the formation of many buds. The following year these many buds continue growing with one becoming dominant, but the plant is considerably denser with extensive branching at the tip or terminal. If this practice is continued, then dwarfing of the tree is the result.

PRUNING OF EVERGREEN SHRUBS

There are two types of pruning for evergreen shrubs. They include accenting the natural habit of growth and formal shearing. When accenting the natural habit of growth, one always prunes back to a point just acropetal to a bud so that bud will eventually become dominant, but one has reduced the plant by the amount of growth removed, while causing additional branching. This is the most difficult type of pruning for junipers, yews, and any deciduous shrubs. It can be the most rewarding, resulting in plants that maintain their own natural habit, while being slightly dwarfed and dense.

Formal hedge shearing is usually accomplished again in July. The most important considerations in



formal shaping are: 1) deciding what shape is desired, 2) that this shearing be done at least once and, in the case of yews, twice each year, and 3) that the upper portion of the plants be narrower than the bottom. While shaping hedges, it is important to remember that leaves remain on the plants only when they receive sunlight; therefore, the lower branches should be longer than the upper branches. Often hedges Continued on page 20B



are pruned with the top broader than the base. This results in shading and complete loss of lower leaves. It is, thus, important to remember the effect of sunlight on plants and their ability to retain leaves. Hedges or formal shaped plants should be pruned just after the flush of growth. For some plants, such as junipers, that is once annually. Privets can require three to four shearings each growing season. Yews require pruning twice a year. The order of maintenance from least to most when considering shearing is: juniper-yew-privet.

With the hot weather of July comes two additional tasks: 1) providing added moisture for turf and 2) controlling of sucking insects.

Artificial irrigation is one of the most challenging tasks in maintenance of the landscape. One must clearly understand that it is easier to write about how to correctly irrigate than to actually do the job. Correct irrigation is dependent upon the desired effect, soil type, plant type, and economics (availability of water in your area). It has been generally stated that one should consider applying one-acre inch of water per week to keep a lawn actively growing throughout the summer months. In looking carefully at the objectives and as water becomes more limited, we are beginning to research the use of different grass types which require less water to remain actively growing throughout the summer. Some research will be directed at cool season grasses. The three schools of thought include: 1) grass types that will grow in the southwest; 2) breeding new bentgrass cultivars; and 3) breeding bluegrass that will be drought tolerant. The



fact remains that breeding custom-designed turfgrass cultivars for disease resistance and minimal water utilization with maximum growth during doughty months is paramount.

The soil has major impact on how one irrigates. For an ex-

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tremely light sandy soil, it would not be uncommon to irrigate frequently, that is every other day. But provide no more than one-third to one-half inch of water per application. If a clay loam soil, then one should probably irrigate once a week, providing an acre-inch of water to maintain actively growing turf.

Although insect control will depend on the type of insects that may affect your landscape and the part of the country you are in, certainly during the hot dry periods many trees and shrubs are infested by sucking insects, e.g. aphids and mites. In reference to aphids, one wants to control infested plants by the frequent irrigation where the foliage is thoroughly soaked, often resulting in washing off the insect and, therefore, should control the aphids. As populations increase, there are many chemical alternatives to control, but one should be sure that populations warrant it and that simple syringing is not enough. Mites are another insect where as the temperature increases, they more rapidly grow and their life cycles, therefore, have potential for population buildup when the temperatures reach approximately 80°F. As one sees a slight yellowing or bronzing of the foliage, then a close inspection is worthwhile. If population is significant, then either a miticide to provide long residual protection or an ovicide would be appropriate to control the rapidly growing populations.

July's maintenance log is a month dominated by trying to keep up and shearing of hedges and evergreen trees and shrubs.



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