

breakage, elimination of branch stubs, pruning of shaded or weakened branches, removal of plant debris, and disinfection of tools and equipment will help reduce the likelihood of spread and infection.

Literature Cited

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ABSTRACTS

Haller, J.M. 1979. **Galls**. Am. Forests 85(12): 12-15, 51-53.

Galls are globular, semiglobular, cylindrical, or disklike swellings produced on leaf blades, leaf petioles, or twigs by the sting of parasitic wasps; by midges, aphids, or other insects; or by the infestation of bacteria or fungi. Although each gall is characteristic of the insect or bacterium or fungus that causes it, the gall itself is actually part of the plant. It is composed of plant tissues diverted from their normal development and forced to serve the ends of the parasite. The gall is alive only so long as the plant is alive. The great majority of shade-tree galls are caused by egg-laying insects, especially tiny wasps. Uninformed homeowners discovering galls for the first time often take them as symptomatic of a dangerous disease and may resort to drastic remedies. Felling and topping are, of course, useless, since the gall-producing insects may fly to any tree from any point of the compass. Spraying is similarly of very doubtful value.

Shurtleff, M.C. 1980. **Fungicides for ornamentals — selection and use**. Grounds Maintenance 15(1): 20-21, 24, 82-83, 86.

Fungicides are available to protect plant seeds, foliage, flowers, fruits and roots from infection, but no single fungicide is suitable against all types of disease-causing fungi. Because most fungicides in general use have protective-contact action, they must uniformly coat all susceptible plant parts before fungus invasion occurs. Systemic fungicides, however, are absorbed and translocated within the plant to control a disease. In general, fungicide sprays, dusts, dips and soil drenches will not check or eradicate disease that is well established or protect against diseases caused by bacteria, mycoplasmas, spiroplasmas, viruses, viroids, nematodes or parasitic plants. See the chart and tables for information on fungicide efficacy for various categories of diseases and lists of generic (common) names followed by their trade names.