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Introduction:

For decades the standard shade mix has been composed of perennial ryegrass or Kentucky bluegrass mixed with one or more fine fescues. Typically mixes are at least two thirds fine fescue. East of the Cascades, these mixes perform reasonably well but I have observed that neither the fine fescue nor the other components tend to persist in most shady sites in the Willamette Valley or in Coastal areas of Oregon. The same pattern seems to develop in western Washington as well. Shady lawns in these areas generally are dominated by bentgrasses, roughstalk bluegrass, and annual bluegrass.

The purpose of this trial is to explore several grass mixtures for performance under typical western Oregon deciduous shade conditions. All mixes were designed with a base of perennial ryegrass to facilitate rapid establishment. Initially, the trial was to be maintained as a golf course tee but was changed to a lawn trial for ease of maintenance because it could be mowed with a rotary mower which makes it easier to deal with tree debris that is constantly falling on the site.

Maintenance:

Mowing:

Plots are mowed 1-2 times per week at 1.5” with a rotary bagging or mulching mower depending on the amount of surface debris. Mowing directions are alternated to avoid wheel rutting or excessive traffic damage to the turf.

Irrigation:

Plots are irrigated on the dry side generally twice per week. The goal is to produce healthy turf but not provide too wet of an environment that might encourage moss or algae.

Fertilization:

Plots are fertilized with a complete NPK fertilizer generally two times per year; once in spring around leaf out time and again in fall after leaf drop and removal of leaves from the turf. Total N is targeted at 2-4 lbs N as needed to produce generally healthy turf.

Fungicides:

No fungicides are applied to this area regardless of disease activity.

Herbicides:

Broadleaf sprays are applied periodically as required to maintain generally weed free turf. So far one spray has been applied since establishment.

Insecticides:

No insecticides are applied to this area regardless of the amount of activity observed.

Observations:

These plots have not been rated for turf quality on a regular basis but have been observed regularly to establish a feel for how the various mixtures are performing. My interpretation of performance of mixtures and individual grasses are outlined below.

1. The standard mix of perennial ryegrass and Chewing's fescue has been the thinnest and weakest treatment on a year around basis.
2. Mixtures containing bentgrass perform well through the main growing period and often produce excellent turf during summer. The bentgrasses all tend to thin severely in late fall about the time leaf drop is complete. So far this hasn't been correlated with any specific disease activity. Colonial bentgrass is less prone to false crowning than velvet bentgrass at the 1.5" mowing height used in this trial.
3. In the early years mixtures containing roughstalk bluegrass were at their best in winter after leaf drop and during the period of generally wet winter weather. Roughstalk bluegrass performed poorly in summer often going off color whenever modest drought stress occurs. Over time the roughstalk bluegrass has largely been replaced by other species and in general has shown poor persistence. This is typical of most commercially available rough bluegrasses in my experience. Wild types seem to perform much better over time.
4. Year around the best turf quality is associated with the plots containing *Poa supina* and/or bentgrass. The general appearance of *Poa supina* is very much like annual bluegrass but without the strong flower period in spring. *Poa supina* is much coarser in texture than all other grasses in this trial.
5. All things considered, plots containing *Poa supina*, colonial bentgrass, and velvet bentgrass have produced acceptable shade turf for most of the year when mowed at 1.5".