



# The Bull Sheet

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## HERBICIDES FOR KNOTWEED

by

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Knot-weed is a widespread and troublesome weed on fairways, occasionally on tees, but rarely on greens. It appears on bare spots and is common on areas where the soil is compact and hard. Whenever grass winterkills in depressions, knot-weed takes over the following year. In the spring of 1948 creeping bent took a bad beating on many fairways in the Mid-West. Knot-weed was troublesome where the bent was badly winter-killed.

Knot-weed is an annual. Plants are produced each year from seed which is one of the first to germinate in the spring. The seedlings with reddish stems and two leaflets appear during March, even though the weather is unseasonably cold. By midsummer the plants become stemmy and bad for play. There is mature seed on the older parts and flowers at the growing tip.

One of the best times to kill this weed is in early spring when it is in the seedling two-leaf stage. Some use 2,4-D and get a good kill, although this herbicide is not too effective later in the year. It is unwise to use 2,4-D on newly seeded areas, or when seeding is contemplated after killing the knot-weed. The 2,4-D inhibits germination of grass or kills the young sprouts.

Sodium arsenite will kill knot-weed effectively in the two-leaf stage and not seriously discolor the grass. In fact, it can be used before grass starts its best growth. The rate need not exceed one to two ounces per one thousand square feet or 2-1/2 to 5 pounds per acre. The spray method is best. Leaves are too small to collect a killing dose with the dry method.

Some greenkeepers measure out two plots 20 x 50 feet each, and apply one and two ounces, respectively on them. They use a knap-sack sprayer and dissolve the sodium arsenite in about three gallons of water, which is ample to cover a thousand square feet. After the second or third day they select the rate which kills the knot-weed without seriously discoloring the grass. When the weather is warm, even less than one ounce per thousand square feet may kill the seedling knot-weed.

It is important to get sodium arsenite, and not sodium arsenate. They are distinctly different compounds, so far as weed killing is concerned. Some greenkeepers have learned the difference to their sorrow. They got sodium arsenate by mistake and wondered why the results were so disappointing.

Prepared for:

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