Basamid Uses In Turfgrass Management and Ornamental/Tree Nursery Sites

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Basamid[®], a granular soil fumigant, offers an alternative to gas injected methyl bromide for disease and weed seed control in turfgrass and nursery soil beds. Basamid is effective for the control of most weeds and specific soil diseases to provide turfgrass and ornamental seedlings a clean seedbed for healthy, vigorous start. Research trials in approximately 15 states since the 1990's has demonstrated Basamid used from 200 to 550 lb of product per acre has allowed for replanting within 10-14 days following application to existing sod or ornamental seedbed. Turf renovation in cool season turfgrass has shown Basamid applied at 350 lb. per acre will eliminate up to 90% of Poa annua from the seedbed. Use of Basamid on over 100 golf courses or athletic fields have demonstrated increased stand vigor due to lack of competition with soil borne pests and the addition of enhanced nitrogen from the Basamid granular to gas conversion in the soil profile. The objective in 2003 research trials in three southeastern states, North Carolina, South Carolina and Florida, was to examine low rates of Basamid to established bermudagrass sod with topical and shallow, subsurface-injected applications for control of turf damaging nematodes. First year's data has been inconclusive when monitoring nematode counts 4, 8 and 16-weeks after application. Late June or a summer timing of applications to sod will be compared to spring 2004 applications at all three sites where reductions in sting, lance and ring nematode populations and turf vigor parameters will be examined. In warm season turfgrass renovation, Basamid incorporated at 550 lb per acre at 8-11 inches was compared to a split application of Basamid at 450 lb per acre incorporated + 100 lb surface applied alone and in combination with two glyphosate applications as compared to glyphosate applications alone. The number of days to seeding, percent contamination of bermudagrass (or other warm season grasses) back in desirable turf stand, speed to cover and overall turfgrass stand vigor were examined. Trials will be evaluated 2003, 2004 and 2005 for long-term benefits of Basamid application vs. herbicide program alone response. Literature search of Basamid in ornamental seedbeds research in 1990's reveals dazomet (the active ingredient in Basamid) has provided increased shoot height, root length and reduced incidence of first year stunting in nursery bed tree seedlings. Work has been initiated to reexamine the effectiveness of Basamid used in tree and ornamental seedling production as compared to methyl bromide + chloropicrin programs.