Sunn Hemp

A tropical legume,sunn hemp (Crotalaria juncea L.) can produce more than 5,000 lb. dry matter/A and 120 lb. N/A in just nine to 12 weeks. It can fill a narrow niche between harvest of a summer crop and planting of a fall cash or cover crop and is especially fitted to vegetable production. Sunn hemp sown by September 1 following a corn crop in Alabama, for example, can produce an average of 115 lb. N/A by December 1.

Sunn hemp is not winter hardy and a hard freeze easily kills it. Sow sunn hemp a minimum of nine weeks before the average date of the first fall freeze. Seed at 40 to 50 lb./A, with a cow peatype inoculant.

Sunn hemp seed is expensive, about $2.25/lb., so the cost may be prohibitive for large scale plantings. Seed can be produced only in tropical areas, such as Hawaii, and currently is imported only by specialty seed companies.

A New Alternative for South Florida Producers

A study by the NRCS Plant Materials Center (PMC) in Brooksville, Florida, concluded that sunn hemp seed can be a viable alternative cash crop for southern Florida growers. Sunn hemp is an annual legume that suppresses some types of nematodes and can produce over 5,000 pounds of biomass and 100 pounds of nitrogen per acre within a few months. Because of its potential use in alternative pest management systems and as a sustainable biological source of nitrogen, sunn hemp is a promising cover crop for rotation with vegetables throughout the Southeastern U.S.

Unfortunately, its use has been limited by the high seed cost—most is shipped from Hawaii as seed production requires a tropical climate. Two years ago, the NRCS PMC in Brooksville initiated a study to determine which zones in Florida could most economically produce sunn hemp seed. Seed was distributed to 15 growers throughout Florida and although many locations lost their crop to frost, sunn hemp stands in coastal counties below the 27th parallel consistently produced up to 370 pounds of seed per acre. Growers in more southern areas, such as Homestead, obtained even higher yields. Your contact is Clarence Maura, Manager, NRCS Brookville Plant Materials Center, at 3527969600 or clarence.maura@fl.usda.gov.

A management caution: Many *Crotalaria* species contain alkaloids that are poisonous to livestock. However, the sunn hemp variety TROPIC SUN, developed jointly by the University of Hawaii and USDANRCS, has a very low level of alkaloid and is suitable for use as a forage.
Research suggests that sunn hemp is resistant and/or suppressive to rootknot (*Meloidogyne* spp.) and reniform (*Rotylenchulus reniformis*) nematodes. — D.Wayne Reeves (see p. 192)

Additional Information:

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