Registration of Tobacco Varieties

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THIS is the second report on the registration of tobacco varieties. The first report was published in Agronomy Journal 50:712, 1958. The flue-cured tobacco variety Vesta 5 was submitted by the Virginia Agricultural Experiment Station and had been approved for registration.

1Registered under a memorandum of understanding between Crops Research Division, ARS, USDA, and the American Society of Agronomy.

2Asst. Director, in charge of Tobacco Research, North Carolina State College of Agriculture, and member of the committee on Varietal Standardization and Registration charged with the registration of tobacco varieties. The writer wishes to acknowledge the assistance of J. L. LaPrade in preparing the descriptive articles on Vesta 5.

Registration of Sorghum Varieties, IX

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THE eighth report on the registration of sorghum varieties was published in November 1955. Three applications for the registration of new varieties have been approved since the eighth report; descriptions of those varieties are included in this report.

WILEY (Reg. No. 107)

Wiley is a late-maturing sorgo variety developed by Otton H. Coleman at the U. S. Sugar Plant Station at Meridian, Mississippi. Wiley was selected in 1955 from a cross of (Collier × MN 822) × MN 2046 made in 1948; selection was practiced in the segregating generations for disease resistance, sirup production, and sirup quality. Wiley was first distributed for production in 1957 by the Mississippi Agricultural Experiment Station and the U. S. Department of Agriculture.

Wiley is a very tall-growing variety, reaching heights of 12 to 16 feet in fertile soils with adequate moisture. The stalks are smaller than those of Sart and have a thin hard rind practically free of the whitish waxy bloom that occurs on the rind of most sorghum stalks; this gives the stalks of this variety a bright green color relative to the duller color of most sorghum varieties. Because of its greater height and thinner stalks, Wiley often lodges more than other varieties such as Sart and Tracy.

The panicle of Wiley is medium in length and is semi-compact. Glumes are about ½ to ¾ the length of the seed, but they tend to open wide and appear shorter. The glumes normally bleach due to elongation of the rachis internodes. The glumes are about ½ to ¾ the length of the seeds. Seeds are globose to obovate and are variable in size.

Wiley produces high yields of stripped stalks with a high sirup turnout. Average yields of 40% for 10 tests in Mississippi indicate Wiley produces stripped stalk yields 5% above Sart and 27% above Tracy; the stalks of Wiley had a sirup turnout 16% above those of Sart and 11% above those of Tracy; the sirup yield per acre averaged 16% above Sart and 43% above Tracy.

LAHOMA (Reg. No. 108)

Lahoma sweet sudangrass, a wide-leaved, late-maturing variety, was released by the Oklahoma Agricultural Experiment Station in 1945. It was selected at Stillwater, Oklahoma, in 1949 by W. C. Elder from the progeny of sudangrass breeding materials obtained from the Texas Agricultural Experiment Station in 1948. This variety originated from a cross of Leoti Sorg X Sudangrass made by J. R. Quinby and R. E. Karper of the Texas Station.

Lahoma sudangrass has sweet and juicy stems, large leaves with a distinctive yellow-green color, and is very uniform in growth habit. The variety is late maturing, and tillers and endures drought well. The original selection appeared to be resistant or tolerant to chinch bug attacks.

The late maturity of Lahoma results in the production of leafy palatable forage over a fairly long period and of high yields under favorable growing conditions. Lahoma is a good seed producer, and the seeds range in color from apricot to sienna.

BRAWLEY (Reg. No. 109)

Brawley is an early-maturing sorgo selected from a cross of White Collier × Rex selection by Charles Price. It was released and distributed by the California Agricultural Experiment Station and the U. S. Department of Agriculture in 1938.

Brawley is an early variety in Southern California, maturing in about 100 days. Stalks are medium in diameter and grow from 9 to 12 feet tall on fertile soil under favorable conditions. The stalks are juicy, but are not as high in juice content as some of the sirup varieties. The juice is high in sucrose and relatively low in reducing sugars; the sucrose content is high enough to make the variety a potential source of sugar. Brawley has lodged less in Southern California than any commercial variety previously available. It has not been evaluated for diseases, but there is little damage from diseases in the area for which it is recommended.

The panicle of Brawley is medium in size and is rather loose due to elongation of the rachis internodes. The glumes are about half the length of the seeds. Seeds are globose to obovate and are pinkish in color with reddish-brown spots.