

EVALUATION OF MUSCADINE GRAPE CULTIVARS
FOR PRODUCTIVITY, FRUIT QUALITY,
AND WINTER HARDINESS IN ARKANSAS, 1987-1998



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IMPACT STATEMENT

Muscadine grapes are adapted to all areas of Arkansas except the more northern counties, where vines can be killed by low winter temperatures. Muscadines are grown for both home and commercial use. An array of cultivars have been developed by a number of public and private organizations. No breeding work is currently being conducted by the University of Arkansas, but cultivar evaluation at the Fruit Substation, Clarksville, yielded results for 1987 through 1998. The goal was to discover which cultivars or selections from both public and private institutions are best suited for the Arkansas climate. Data collected from the replicated trial at Clarksville included yield, average berry weight, percent soluble solids, other quality components, and observations on disease susceptibility and winter hardiness. 'Fry', 'Carlos', 'Coward', 'Jumbo', 'Sugargate', and 'Summit' are older cultivars (released prior to 1980) that performed adequately in the trial, and of those tested and released in the early to mid-1980s, 'Nesbitt', 'Sterling', and 'Doreen' provided positive results. Among the newer cultivars (released from 1986 to 1994), 'Darlene', 'Tara', 'Black Beauty', and 'Southern Home' show promise. Growers should consider choosing among these cultivars in future planting considerations.

KEY WORDS

Vitis rotundifolia, viticulture, variety testing, winter hardiness.

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