Registration of 'Maxcy' Soybean

'Maxcy' soybean [Glycine max (L.) Merr.] (Reg. no. CV-326, P1 568236) was developed by the South Carolina Agricultural Experiment Station and cooperatively released by the Georgia, North Carolina, and South Carolina Agricultural Experiment Stations in August 1992 because of its high seed yield and multiple nematode resistance.

Maxcy was derived from an F4 plant selection composited in the F2 from the cross 'D76-9665' x 'Johnston' made at Clemson, SC, in 1981 (2). Parentage of D76-9665 (7) is 'Forrest' x 'Centennial' (3,4). The F1 plants were grown at Isabela, Puerto Rico, during the winter of 1981 and the F2 to F4 generations were advanced by modified single-seed descent (pod-bulk method) in South Carolina and Puerto Rico during 1982 and 1983. Evaluation of agronomic traits, nematode resistance and seed yield were conducted in South Carolina from 1985 to 1987. Maxcy, previously identified as SC84-679, was evaluated in the Uniform Soybean Tests, Southern Region, Preliminary Group VIII in 1988 and in Uniform Group VIII from 1989 to 1991 (6).

Maxcy is a Maturity Group VIII cultivar that matures the same day as 'Kirby' (1) and 1 d later than 'Coker 6738' (5) and is generally adapted from 28 to 35° N lat. It has determinate growth habit, purple flowers, tawny pubescence, and tan pod walls at maturity. Mature plants of Maxcy average 5 cm shorter than Kirby. Maxcy is similar in lodging to Kirby. Seed size averages 13.8 g 100 seed""", 9% larger than Kirby. Seeds are yellow with black hila, which may vary in intensity from light to dark. Seed protein and oil average 40.4 and 208 g kg""", respectively. Maxcy has averaged 21 and 5% higher in seed yield than Kirby (6) and Coker 6738, respectively.

Maxcy is resistant to the soybean cyst nematode Race 3 (8) and is susceptible to soybean blight (caused by Phytophthora sojae M.J. Kaufmann & J.W. Gerdemann). It is susceptible to brown stem rot (caused by Phoma exigua (Penn.) J. E. Shipp & D. W. Opper) prevalent in the south-ern USA. Maxcy is susceptible to stem canker (caused by Cercospora soiina (Otto) M.L. Brown) prevalent in the south-ern USA. Maxcy is susceptible to soybean blight (caused by P. exigua). It is susceptible to the soybean cyst nematode Race 3 (8) and is susceptible to soybean blight (caused by P. exigua) prevalent in the south-ern USA.