PLANTING STRIP TILL PEANUTS

Dewitt Gooden and David Morrison
Pee Dee Research and Education Center, 2200 Pocket Road, Florence, SC 29506
dgooden@clemson.edu

ABSTRACT

Strip till peanut production is increasing in the southeastern US due to a need to conserve soil moisture, reduce inputs, and to save time. History has shown that reduced tillage systems for peanuts can be as successful as conventional tillage systems. Some troublesome areas should be noted. Good stand establishment and good early season management is a must. Weed control is a little tougher with reduced tillage. Some insects tend to be less of a problem in reduced tillage while others may increase. There appears to be no major shift in diseases with Tomato Spotted Wilt Virus actually improving with reduced tillage. Harvest efficiency can be a problem depending on the level of residue.

Our strip till peanuts were planted around May 15. The variety was NCV11. We used paraquat PRE, pentemethalin PRE, and imazapir POST for weed control. We used aldicarb and rhizobium inoculants at planting in seed furrow.

For tillage, peanuts were strip tilled with a small power tiller and then planted into tilled area. Results of a four year study for strip till yielded 3070 lbs/A, while conventional yielded 3206 lbs/A in a non-rotated peanut plot. Yield were not significantly different. In the fourth year of the study, when plots were rotated; strip till produced 3823 lbs/A vs. 4167 lbs/A for conventional till. In these plots, the greatest problem encountered was common bermudagrass encroachment.