What are the preferred K placement options for conservation-till soybeans? (A09-vyn162551-Oral)

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Abstract:

Recommendations for critical soil K concentrations for soybean have changed little despite the rapid adoption of conservation tillage. Soil testing for K was somewhat depth insensitive in conventional tillage, but now there is increasing evidence that certain soil K levels must be maintained at the 10 to 20cm depth to ensure that K availability is not limiting in conservation tillage systems. Soybean yield and seed K responses to K fertilizer rates and placement in no-till systems are affected not only by overall soil-test K, but also by K stratification, row width, and precipitation. Potential benefits of banding versus broadcast application will be reviewed. Critical soil K concentrations at the 10 to 20cm depth for soybean in conservation tillage will be proposed.

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