VARIATIONS IN SOY BEAN INOCULATION.¹

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During the summer of 1913 a number of cooperative tests were conducted to determine the growing period of several varieties of soy beans in different parts of New Jersey. Observations made on the inoculation of different varieties on the farm of Dr. D. H. McAlpin, Morris Plains, N. J., brought out some interesting points that seem worthy of special mention.

The test at this place was conducted on a well-drained, medium-heavy clay loam soil. Oats and field peas had been grown the previous year upon a well-manured and fertilized corn stubble. This crop was harvested for hay and a cover crop of rye and hairy vetch planted. The cover crop was plowed under during the early part of May and the soy beans planted during the first week in June. One-acre plats were sown to each of the following varieties: Mikado, Peking, Haberlandt, Tarheel Black (Black Shanghai, S. P. I. No. 14952), Brown (Trenton, S. P. I. No. 24610), and Auburn. Each field was divided lengthwise into two parts, "nitrogerm" being used on one and "farmogerm" on the other. Two rows in the center of each plat received no treatment, thus separating the two kinds of inoculation. All varieties germinated well and made splendid growth.

In observations made June 25 the plants of all varieties bore root nodules except the Haberlandt, which seemed to lack them entirely.

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