

Impact of Bokashi Application on the Growth and Yield of *Sesamum indicum*

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Abstract : *The objective of this experiment was to study the effect of Bokashi application on the yield and pest and disease attack on Sesame. For this experiment two blocks of land were used each with 0.5 ha. They were similar in soil texture, soil colour, water holding capacity and topography. Initially both blocks were ploughed and harrowed. Bokashi was prepared using plant matter, cowdung, rice bran and EM solution. 500kg Bokashi was applied to one block of land and kept for 2 weeks. After 2 weeks, 15 kg of Sesame seeds were broadcast to each block. The growth and pest and disease attack was observed and the yield was measured on the dry weight basis. This experiment was carried out for four cultivation seasons. In each year Sesame was cultivated in yala (March - May) season and maize was cultivated in maha (Nov.- Jan.) season. The results showed that Bokashi increased yields by 5% in the first year. The yield gap increases with time. In the fourth year the yield increased by 11% when Bokashi was applied. Further, the caterpillar (*Antigastra tatalis*) attack was observed in both blocks. The attack was less severe in the Bokashi applied block. Bacterial wilt was observed in the block without Bokashi. Moreover the leaf colour was darker in the Bokashi applied block. Plants have shown a higher vigor when Bokashi was applied. The number of seeds in one pod was slightly higher in the Bokashi applied block. There are two major effects of Bokashi application on *Sesamum indicum*. By applying Bokashi the average yield of improves by 5 -11%. Further it improves the plant vigor and thereby reduces the pest and disease attacks.*
