

***Growth Response of Corn Plants (*Zea mays L.*) through the Application of *Rhizobium spp.* and Chicken Manure***  
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**ABSTRACT**

*The growth of a plant is impacted by the nutrients' availability in an unbalanced soil. Rhizobium species have the ability to affect non-legumes' plant growth. The addition of organic matter in the form of chicken manure is essential to support the performance of Rhizobium spp. This study looked at how different plant root zones and amounts of chicken manure, including Rhizobium spp., affected the growth of maize plants. A totally randomized design (RAL) with two components and three replications was used to create this experiment. The first component is Rhizobium species, which can be found in the root zones of rice plants, corn plants, edamame plants, soybean plants, and peanut plants. The second aspect was the dose of chicken dung, which came in three sizes: 200 g, 250 g, and 300 g. Plant height, number of leaves, stem diameter, fresh weight of cobs without husks, root length, and root weight were all measured. The interaction study on the treatment of Rhizobium spp. and chicken manure on the plant height variable, namely the corn plant root zone, with a combined dose of 250 g/polybag, yielded 166 cm. The root zone of corn plants with a combined dose of 250 g/polybag, precisely 231 g, on the variable fresh weight of cobs without corn husks. In the root length variable, namely the root zone of peanut plants with a combined dose of 250 g/polybag with a yield of 73.33 cm. In the variable root weight of the rice plant root zone with a combined dose of 250 g/polybag with a yield of 143 g.*

*Keywords : Chicken manure, Corn, Rhizobium spp.*