

**THE EFFECT OF APPLYING LIQUID ORGANIC FERTILIZER FROM
LAMTORO LEAVES (*Leucaena leucocephala*) ON SUGAR CANE
SEEDLINGS (*Saccharum officinarum* L.) VMC VARIETY BUDSET**

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ABSTRACT

*This research aims to determine the effect of applying liquid organic fertilizer from Lamtoro leaves (*Leucaena Leucocephala*) on sugar cane seedlings. This research was carried out at the Jember State Polytechnic, East Java province and was carried out from September 2023 to December 2023. The research design used was a randomized block design (RAK) with 6 treatments P0 = 0%, P1 = 10% (100 ml liquid fertilizer + 900 ml water), P2 = 20% (200 ml liquid fertilizer + 800 ml water), P3 = 30% (300 ml liquid fertilizer + 700 ml water), P4 = 40% (400 ml liquid fertilizer + 600 ml water), P5 = 50% (500 ml liquid fertilizer + 500 ml water), which was repeated in 4 repetitions, so there were 24 treatment units and each treatment unit consisted of from 3 samples. ANOVA was used to reduce data variability. If the results obtained are actually greater than the F-table 5%, then it is tested further using the 5% Trend Test. The parameters observed in this research were number of leaves, stem diameter, plant height, number of tillers, wet weight and dry weight of roots. The results of this study showed that giving POC lamtoro leaves had no effect on the number of leaves, stem diameter, plant height, number of tillers, wet weight and dry weight of roots.*

Keywords: sugar cane seeds, liquid organic fertilizer, lamtoro