

**THE EFFECT OF CULTURE MEDIA ON CALLUS INDUCTION OF
ROBUSTA COFFEE (*Coffea canephora* L.)**

CLONE BP 308

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Coffee plant is one of the most widely cultivated types of large plantation crops in Indonesia, and it is also plays an important role in the economic sector in Indonesia. Robusta Coffee has a bitter taste, also has a high caffeine that is 1,5%-33% or two times stronger than Arabica. It is estimated that the area of Coffee Plantation in 2022 is 1.262.590 Ha., of which the 98% belongs to smallholder plantations. Most of the plantations use coffee planting materials from beans, of which that beans came from sweeping beans that affect the production of coffee beans. One of the good alternatives to overcome this problem requires vegetative propagation through tissue culture techniques. The purpose of this research is to determine the influence of cultural media modification on the induction of robusta coffee callus (*Coffea Canephora* L). Clone BP308 which was held in July - October 2021 at Laboratory of Tissue Culture Jember State Polytechnic. The experimental design used for this research was a Complete Randomized Design (CRD) Non-Factorial that consisted of 4 treatments. Every treatments consisted 6 tests. Every test consisted of 1 unit bottle that fill with 1 explants. The treatment consisted of P1 = MS 0 Full, P2 = ½ MS Modification of Vitamin B5 + 2 ppm 2,4 D + 1 ppm Kinetin, P3 = IKP 1 ppm 2,4 D + 1 ppm 2-iP, P4 = IKE 1 ppm 2,4 D + 4 ppm BAP. The results of this research that has been carried out show that the treatment of media modifications has an unreal different influence on the day the callus appears, browning and the structure of Robusta Coffee callus clon BP 308, as well as having significantly different research results on the wet weight of callus.

Keywords : Media, Robusta Coffee, Tissue Culture