

ABSTRACT

Gayo Arabica coffee is a strategic commodity cultivated through organic and inorganic systems, raising questions about which system is more economically superior for farmers. This study aims to analyze the comparison of productivity and profits between organic and inorganic Gayo Arabica coffee farming in Pegasing District, Central Aceh Regency. This study employs a survey method with a quantitative approach. The research sample consists of 31 organic farmers and 33 inorganic farmers selected through simple random sampling with specific criteria. Primary data collected via questionnaires were analyzed using cost-benefit analysis and the Independent Sample T-Test to compare the performance of both systems over one major harvest cycle. The results of the study indicate that the inorganic system is significantly superior in short-term economic performance. The average productivity of inorganic farming (553 kg/Ha) is much higher than that of the organic system (338 kg/Ha). Although organic coffee has a premium selling price (Rp 42.000/kg) compared to inorganic (Rp 38.000/kg), the total revenue of the inorganic system remains higher (Rp 21.014.000/ha) than the organic system (Rp 14.196.000/ha). As a result, the profit from inorganic farming (Rp 13.214.636/ha) is significantly higher than that from organic farming (Rp 9.969.054/ha), with a difference of Rp 3.245.582 per hectare per production. It is concluded that the higher financial profit is the main incentive driving farmers in Pegasing Subdistrict to continue using the inorganic system. This choice is a rational economic decision to maximize short-term income, despite the risk of long-term environmental degradation that could threaten the sustainability of farming in the future.

Keywords: *Coffee Farming, Gayo Arabica Coffee, Organic System, Inorganic System, Profit Analysis.*