

ABSTRACT

This study analyzes Indonesian household food demand patterns by accounting for income heterogeneity using the Quadratic Almost Ideal Demand System (QUAIDS). The analysis is based on data from the March 2023 SUSENAS, covering 314,802 households and seven food commodity groups, and is conducted across income quintiles using the Nonlinear Seemingly Unrelated Regression (NLSUR) method. The estimation results indicate that QUAIDS outperforms the AIDS model in capturing the nonlinear Engel curve relationship. Own price elasticities are predominantly negative, consistent with the law of demand, while income elasticities are larger in magnitude than price elasticities, suggesting that changes in household income generate stronger demand responses than price changes. Commodity classification varies across income levels, with staple foods, fish, meat, vegetables, and fruits behaving as luxury goods in the lowest income quintile, shifting to necessities in the middle income quintile, and reverting to luxury goods in the highest income quintile, reflecting a transition from quantity based to quality based consumption. In contrast, ready to eat foods consistently exhibit normal good characteristics across all income levels. Cross price elasticities reveal the presence of both substitution and complementary relationships among food commodity groups, with patterns varying across income quintiles.

Keywords: *Engel Curve, Household Consumption, Food Demand, QUAIDS, Elasticity, NLSUR*

JEL Classification: *D12, D11, Q11, C33*