ABSTRACT

Mayestika, Fidya. 2014. *Trip Generation at Misfalah Rasaindo Residential in Gorontalo City*. Skripsi. S1 of Civil Engineering, Department of Civil Engineering, Faculty of Engineering, Universitas Negeri Gorontalo. The principal supervisor was Yuliyanti Kadir, S.T., M.T and the co-supervisor Frice L. Desei, S.T., M.Sc.

The research aimed to get the trip generation model from Misfalah Rasaindo Residential to the place where people use vehicle.

The data were collected through two stages; they were primary data and secondary data. The primary data were collected directly from field by using home interview to the 100 families living in Misfalah Rasaindo Residential with types of house are 72, 54 and 45. The secondary data were obtained from developer party. The results of questionnaire were grouped into dependent and independent variable, and analyzed by applying SPSS-14 program by having stepwise method. The simple linearity regression and multiple linearity regression were used to model the trip generation from each house type at Misfalah Rasaindo Residential. The research result showed that the model of production quantities trip could be analyzed by applying simple and multiple regression. The result of data correlation analysis test of multiple regression method was quite influenced by the number of family's member (X_1) and the number of vehicle ownership (X_3) . It was obtained the model building type 54 as Log Y = 0.531 + 0.393 Log X₁ + $0.203 \text{ Log } X_3$. Building type 45 as $\text{Log } Y = 0.466 + 0.708 \text{ Log } X_1 - 0.139 \text{ Log } X_3$ by signifikan $\alpha = 0.000 < 0.05$. For especially building type 72 could be analyzed as one variable by applying simple regression analysis.

Keywords: Trip Generation Model, Residential Type.