

ABSTRAC

DEWIYYATUL KHUSUSIYAH. B4110171 The Effect Of Giving The Tomato Paste(Solanum Lycopersicum Syn. Lycopersium Esculentum) To KGD Fasting In Patients With Type 2 DM At Local Clinic Karang Duren At Subdistrict Balung At District Jember. At Guidance By Agustina Endah W,S.Sos, M.Kes And Dahlia Indah Amareta,S.K.M,M Gizi

Diabetes mellitus is a chronic urban disease characterized by high blood sugar level and metabolisme disorders in General, the basic abnormality of this disease is the lack of work and the amount of the hormone insuline, which is produced in the pancreas. The disease diabetic mellitus when not controlled properly will cause a variety of complication. Insuline deficiency occurs due to the presence of free radicals which block the pancreatic work. Tomatoes contain licopen and fiber that can restore the pancreas normally work and tackling the short age of insuline in a manner to protect the pancreas from free radicals. Lycopen is tomatoes can issue more after going through the process of warming up before hand because it can shape the form of lycopen is not easily absorbed into a form that is easily absorbed. The purpose of this research is to know the effect of tomato paste to the decrease in fasting blood glucose levels in people with type 2 Diabetes Mellitus who consume and do not consume tomato paste. The respondents in this study amounted to 28 people are divided into two groups. Each respondent is given as much tomato paste 3,4 gr/kg of weight. The research was carried out during 15 days of administering the treatment. Research on the design of the research is "*Quasi Experimental Design*". The data

used for the analysis of differences in blood sugar levels fasting pretest and posttest using test *Wilcoxon and Paired T-test* and to test the difference decreased fasting blood sugar levels between groups using the test *Mann – whitney*. The result analysis of fasting blood sugar levels drop in the intervention group and the control group is a grouping of 138,36 mg/dl intervention and control group 71,86 mg/dl. Conclusion of this research is the awarding of tomato paste plus drug antidiabetic (Glibenclamide) in the intervention group there is a decrease in fasting blood sugar the levels up more than just taking the drug antidiabetic (glibenclamide) in the control group.

Keywords: Diabetes mellitus type 2, tomato paste, fibre, likopen and fasting blood sugar levels.