ABSTRACT

Shoes as a footwear product that is consumed by most generations of people. Shoes ar consumed by circles of society including children, youngman, men and women. Oftenly experience an increasing demand, especially when it reaches the time of a new tyear of schooling academy, since in Indonesia, the costumers are mostly students. That's why, CV. Garssel as one of the biggest shoes industry in Bandung, have been trying to increase its productions every years. One of the efforts, the Garssel, collaborates with home industies all over the country. Considering the differences of demand and the variations of Garssel capacity, it needs a precise calculation on determining the optimal numbers of production. Because the optimum numbers of production plans could be mean reducing the production costs and inventories. This research is hold and aimed for creating the fuzzy logic method in order to help the produsen generate its optimum productions with used four variables : demand, inventory, labor, and sum of ordering day.

The first, starting from collecting sample observation and interview data from plant employees, sales, warehouse, and production. The data are thus processed by using fuzzy clustering, fuzzification, interference fuzzy system, and deffuzification. Fuzzy clustering divides every variable input into certain groups, while fuzzification formulates the appropriate graphic curves to represent each variable. The inference system used in this research is the Mamdani Method, which is suitable for fuzzy implementation with the And function. The centroid method is the deffuzification process used to produce the epicenter of fuzzy rules.

From the processed data, we can obtained some epicenter. These epicenters are used to create fuzzy group function to convert non fuzzy values into fuzzy values for variable output. In spite of the final process is result from deffuzification there are difference of existing production and fuzzy production.afterfinal inventori minus maximum inventori CV. Garssel. The smaller value error differenc, the better using fuzzy logic method to fit in with data at month April-Mey 2006.

In conclusion, fuzzy logic were able to modeled a system to determine the number of production needed in a production operation at CV. Garssel. But to produce more accurate results, more samples are needed to represent real like conditions of a production system.

Keyword : Mamdani, Fuzzy Logic, Production, Shoes.