Abstract

Samarinda City Department of Labor is the unit of government under the city administration. This office serves to facilitate job seekers find work. There are various programs of work in this department to improve the competence and competitiveness of regional communities. One of the routines in this department is to conduct community-based training and competency. Training is not done directly by the Department, the Department will select the Job Training Institute (Lembaga Pelatihan Kerja / LPK) to run a training project. There are several criteria used to select the LPK to be selected to provide training.

LPK number and the criteria used in the selection, making it difficult choosing LPK of few alternatives available. Criteria used in the selection of the LPK are completeness legality, ownership and credibility of the institution competent instructor.

Multiple Attribute Decision Making (MADM) can be used to select the best alternative from several alternatives assessed from various criteria used. TOPSIS is a method that can be used to solve this problem. The weight of each criterion was calculated by the method of F-AHP, AHP method development with a fuzzy logic considers the factors of uncertainty in the criteria used. The results show the system issued the F-AHP method can produce weight criteria to be used in the ranking process using the TOPSIS method. The results of the calculation of the weight stated completeness legality of the biggest weight 0.412, the competent instructors ownership criteria weight 0.325, the credibility of the institution weight 0.263. Within 2 times of testing accuracy, produced an average accuracy of 75%. TOPSIS ranking results with F-AHP weights were similar to the results of TOPSIS ranking by AHP weights. It can be concluded that the F-AHP is better suited to determine the priority criteria are quantitative, not qualitative. Because qualitatively, the order of F-AHP weights the same results with the results of AHP priority weights.

Keywords : Department of Labor, LPK, TOPSIS, F-AHP, MADM