ABSTRACT

The agricultural sector is one of the important sectors capable of driving output and diversification of production in other economic sectors and contributing to many jobs for the community. An economy based on agriculture will produce strong and equitable economic growth and a strong economic structure. Chili is one of the potential agricultural commodities.

The purpose of this study is to analyze the factors that influence chili production and analyze the level of efficiency in the center of Ketundan Village, Pakis District, Magelang Regency. Respondents in this study amounted to 103 people. Data were analyzed using the stochastic-frontier production function approach and using Data Envelopment Analysis.

MLE estimation produces RTS values in the positive incerasing rate area. The results of the analysis show that the land area and number of seeds are significant, while labor, liquid insecticides, and solid insecticides do not significantly affect production. The results of the analysis also showed that the average efficiency value of chili farmers was 0.9. The R / C ratio of chili farming in Ketundan Village, Pakis District, Magelang Regency has a value of 1,736.

Keywords: Chili, Stochastic Frontier, Efficiency, Magelang.