ABSTRACT

The evaluation of learning outcomes in college education is an important component in learning situation. If learning is defined as any change in knowledge, skill, or value of system, these changes can only be assessed through evaluation. Evaluation of learning outcomes can be done by converting data into information and information into knowledge. From the available raw data can be converted into information which can then be used as teaching material in the evaluation process undertaken. The data that has been converted into information, then can be converted into knowledge.

This research was conducted by using the SECI model externalization stage. In this study, the process of converting data into information and information into knowledge is done by collecting tacit data and explicit data. Explicit data is converted into information and data is converted into tacit knowledge.

Based on research results obtained, information of the number of students who otherwise did not pass the first calculus course in the period 2005-2010 are 258 students, calculus II are 392 students and vector matrix are 126 students. Students who repeated Calculus I courses in the period of 2005-2010 for 2 times there were 112 students, there were 95 students for three times, there were five students for four times. For calculus II, there were 238 students repeated two times and 16 students repeated three times. For subjects vector matrix, there were 267 students who repeat two times, there were 99 students for three times, there were 18 students four times and there was one student for five times. Conversion of information into knowledge showed that students still feel less satisfied with the teaching process that have been made at this time.

Based on the analysis and results of processing the data, some conclusions are obtained that the data were converted into information and information converted to knowledge can be used as material for the institutional self-evaluation, and then the conversion can be externalized in form of the document. Further research can proceed by making the information system data conversion information and knowledge.

Keywords: Learning Process Evaluation, data conversion, information and knowledge, SECI model.