## ABSTRACT

Ulfa Dinata Damanik. NIM 4163312029 (2023). Analysis Of Student's Mathematical Communication Ability Through A Realistic Learning Approach Based On Gender At SMPN 3 Satu Atap Silangkitang

Mathematical communication ability is one of the basic abilities that is used as a standard in the process of learning mathematics according to the National Council of Teachers of Mathematics (NCTM). Communication is an important part of mathematics and mathematics education. It is understood that without good communication, it is very difficult to develop mathematics according to the learning objectives that have been set. Based on this background, this study aims to determine: (1). Knowing the differences in the mathematical communication abilities of students who are given the RME learning approach and those who are given the usual learning approach and which learning approach is better; and (2) Knowing the interaction between learning approaches and gender on students' mathematical communication skills. This type of research is a quantitative research with a quasi-experimental research design and a  $2 \times 2$ factorial design. Sampling was done by cluster random sampling and the selected class was class VIII-B as the control class and VIII-C as the experimental class. The test used is Two Ways Anova with the help of SPSS software. But before that, prerequisite tests were carried out, namely the normality test and homogeneity test. The results of the study show that: (1) there is a significant difference between the RME approach and the ordinary learning approach to the mathematical communication abilities of class VIII students of SMPN 3 Silangkitang for the 2021/2022 academic year; (2) There is no interaction between learning approaches and gender (male and female) on the mathematical communication abilities of Grade VIII students of SMPN 3 Silangkitang in the 2021/2022 Academic Year.

**Keywords:** Realistic Mathematical Approach, Ordinary Learning Approach, Mathematical Communication Skills, Gender

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