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## RENEWABLE ENERGY: LEARNING BY MODELING

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### ABSTRACT

Modeling is one of the preferred methods to make learning permanent in science education. The aim of this research is to determine the students' perceptions about renewable energy by using modeling method. This research was conducted on students who took Environmental Chemistry course in Kocaeli Vocational School in 2018-2019 academic year. Qualitative method was adopted in the research. Data were collected by pre-interview and final interview with experimental and control groups. 10 students participated in the study. In the study; The experimental and control groups were asked questions about renewable energy. Then, only theoretically the experimental group and the experimental group were told about the renewable energy by modeling. The data obtained in the qualitative research were subjected to content and significance analysis. In the research, the effect of teaching the use of materials and renewable energy concept on learning was examined and students' perceptions about renewable energy concept were determined.

**Keywords:** Renewable energy, modeling, qualitative research