

## ABSTRAK

**Nina Murni Indriati, NIM 4193111044 (2024). Pengembangan LKPD Berbasis Guided Discovery Learning Berbantuan Geogebra untuk Meningkatkan Kemampuan Pemecahan Masalah Kelas XI SMA Negeri 1 Batang Kuis.**

Penelitian ini dilakukan dengan tujuan mengembangkan LKPD berbasis *guided discovery learning* untuk meningkatkan kemampuan pemecahan masalah peserta didik berbantuan geogebra yang valid, praktis, dan efektif. Adapun penelitian ini menggunakan jenis penelitian *research and development (R&D)* beserta model pengembangan ADDIE (*Analysis, Design, Development, Implementation, Evaluation*). Subjek pada penelitian ini yakni peserta didik kelas XI-MIA 1 SMA Negeri 1 Batang Kuis sejumlah 35 orang.

Penelitian yang telah dilakukan menunjukkan hasil bahwa LKPD berkategori valid dilihat dari hasil validasi ahli terhadap LKPD mencapai persentase 79% kategori valid, RPP mencapai persentase 81% kategori valid, validasi pre test dan post test dengan persentase 88% dan 91% tergolong sangat valid. LKPD dinyatakan praktis didapatkan dari penilaian guru matematika dan peserta didik yang diamati melalui angket respons dengan persentase 90% dan 84% tergolong sangat praktis. Hasil tersebut menunjukkan respons positif guru dan peserta didik terhadap LKPD yang digunakan. Kefektifan LKPD diamati dari ketuntasan klasikal peserta didik melalui pre test dan post test peserta didik. Didapatkan 30 orang peserta didik yang tuntas dan memenuhi standar kulminasi klasikal dengan persentase 86% serta peningkatan kemampuan pemecahan masalah yang diukur berdasarkan kalkulasi N-Gain yang didapatkan yaitu dengan nilai 0,63 tergolong sedang. Sehingga LKPD dapat dipercaya efektif untuk lebih meningkatkan kemampuan pemecahan masalah peserta didik. Diperoleh suatu simpulan bahwasanya pengembangan LKPD berbasis *Guided Discovery Learning* berbantuan geogebra ini memenuhi semua parameter dalam hal peningkatan kemampuan pemecahan masalah peserta didik.

**Kata Kunci:** Pengembangan, *Discovery*, Masalah, Geogebra, N-Gain

## ABSTRACT

**Nina Murni Indriati, NIM 4193111044 (2024). Development of LKPD Based on Guided Discovery Learning Assisted by Geogebra to Improve Problem Solving Ability for Class XI SMA Negeri 1 Batang Kuis.**

This research was conducted with the aim of developing LKPD based on guided discovery learning to improve students' problem solving abilities with the help of valid, practical and effective geogebra. This research uses research and development (R&D) research along with the ADDIE (Analysis, Design, Development, Implementation, Evaluation) development model. The subjects in this research were 35 students in class XI-MIA 1 SMA Negeri 1 Batang Kuis.

The research that has been carried out shows the results that the LKPD is in the valid category, seen from the results of expert validation of the LKPD reaching a percentage of 79% in the valid category, the RPP reaching a percentage of 81% in the valid category, pre-test and post-test validation with a percentage of 88% and 91% which is classified as very valid. The LKPD was stated to be practical, obtained from the assessment of mathematics teachers and students observed through response questionnaires with percentages of 90% and 84% classified as very practical. These results show a positive response from teachers and students to the LKPD used. The effectiveness of the LKPD is observed from the students' classical completion through the students' pre-test and post-test. There were 30 students who completed and met the classical culmination standard with a percentage of 86% and an increase in problem solving abilities as measured based on the N-Gain calculation which was obtained with a value of 0.63 which is classified as moderate. So that LKPD can be trusted to be effective in further improving students' problem solving abilities. A conclusion was obtained that the development of LKPD based on Geogebra-assisted Guided Discovery Learning meets all parameters in terms of increasing students' problem-solving abilities.

**Keyword :** Development, Discovery, Problems, Geogebra, N-Gain