

ABSTRAK

Albila Novita, NIM 4183331025. Pengembangan Media Pembelajaran *I-Spring* Berbasis *Problem Based Learning* (PBL) Pada Materi Laju Reaksi.

Penelitian ini bertujuan untuk mengembangkan dan menilai kelayakan media pembelajaran *I-Spring* berbasis *Problem Based Learning* (PBL) pada materi Laju Reaksi sesuai standar BSNP. Selain itu, penelitian ini juga menganalisis penilaian guru kimia terhadap kelayakan media pembelajaran yang dikembangkan. Metode yang digunakan adalah *Research and Development* (R&D) dengan desain penelitian Borg and Gall. Sampel penelitian terdiri dari dosen kimia dan guru SMA di Medan, termasuk dua ahli yang bertindak sebagai validator (ahli materi dan ahli media), serta 10 guru kimia dari beberapa sekolah yang dipilih secara acak. Hasil penelitian menunjukkan bahwa media pembelajaran yang dikembangkan menggunakan *Microsoft PowerPoint* yang terintegrasi dengan *I-Spring Suite* dan dikonversi menjadi aplikasi Android untuk meningkatkan fleksibilitas belajar. Hasil validasi menunjukkan kelayakan materi sebesar 84,63% dan kelayakan media sebesar 87,85%, keduanya masuk dalam kategori valid dan sangat layak. Uji coba lapangan dengan 11 guru kimia memperoleh nilai rata-rata 88,61%, menunjukkan bahwa media ini layak digunakan dalam pembelajaran. Kesimpulannya, media pembelajaran *I-Spring* berbasis *Problem Based Learning* (PBL) pada materi Laju Reaksi telah memenuhi standar kelayakan dan dapat digunakan sebagai alat bantu pembelajaran yang inovatif dan interaktif.

Kata Kunci: *I-Spring*, *Problem Based Learning*, Laju Reaksi, Media Pembelajaran, Kelayakan

ABSTRACT

Albila Novita, NIM 4183331025. Development Of *I-Spring* Learning Media Based On *Problem-Based Learning (PBL)* In Reaction Rate Learning.

This study aims to develop and evaluate the feasibility of *I-Spring*-based *Problem Based Learning (PBL)* instructional media for the Reaction Rate topic according to BSNP standards. Additionally, it analyzes chemistry teachers' assessments of the feasibility of the developed learning media. The research method used is *Research and Development (R&D)* with a Borg and Gall research design. The study sample consists of chemistry lecturers and high school teachers in Medan, including two experts serving as validators (a material expert and a media expert), as well as 10 chemistry teachers randomly selected from several schools. The results indicate that the developed instructional media utilizes *Microsoft PowerPoint* integrated with *I-Spring Suite*, which is then converted into an Android application to enhance learning flexibility. The validation results show that the material feasibility scored 84.63%, and the media feasibility scored 87.85%, both categorized as valid and highly feasible. Field trials involving 11 chemistry teachers resulted in an average score of 88.61%, demonstrating that this media is suitable for use in the learning process. In conclusion, the *I-Spring-based PBL* instructional media on the Reaction Rate topic meets feasibility standards and can be used as an innovative and interactive learning tool.

Keywords: *I-Spring*, Problem Based Learning, Reaction Rate, Instructional Media, Feasibility