

ABSTRAK

R M FIRDAUS AMRI, NIM. 5181131008. “Pengembangan Media Pembelajaran Pada Mata Pelajaran Instalasi Tenaga Listrik Berbasis *Simurelay* Untuk Meningkatkan Hasil Belajar Siswa SMK Swasta Sinar Husni 2 TR Labuhan Deli”. Skripsi Jurusan Pendidikan Teknik Elektro, Program Studi Pendidikan Teknik Elektro, Fakultas Teknik, Universitas Negeri Medan 2025.

Penelitian ini bertujuan: (1) Mengetahui Kelayakan media Pembelajaran Pada Mata Pelajaran Instalasi Tenaga Listrik Berbasis *Simurelay* Untuk Meningkatkan Hasil Belajar Peserta didik SMK Swasta Sinar Husni 2 TR Labuhan deli. (2) Mengetahui efektivitas media Pembelajaran Pada Mata Pelajaran Instalasi Tenaga Listrik Berbasis *Simurelay* Untuk Meningkatkan Hasil Belajar Peserta didik SMK Swasta Sinar Husni 2 TR Labuhan deli. Penelitian dibuat dengan melibatkan siswa kelas XI teknik instalasi tenaga listrik SMK Swasta Sinar Husni 2 TR Labuhan deli tahun ajaran 2024/2025. Jenis penelitian ini adalah *Research and Development (R&D)* dengan model penelitian ADDIE. Model penelitian ADDIE meliputi 5 tahapan yaitu pertama *analysis* yang meliputi analisis kebutuhan produk, kedua *design* yaitu menyusun garis besar, materi tentang video pembelajaran berbasis *simurelay*, Ketiga *development* yaitu mengembangkan produk yang sudah didesain untuk dilakukan validasi agar mendapatkan masukan oleh ahli media dan ahli materi. Keempat *implementation* yaitu menerapkan produk untuk mendapatkan respon dari pengguna terhadap video pembelajaran yang telah dikembangkan. Kelima *evaluation* yaitu mengevaluasi media video pembelajaran berdasarkan beberapa masukan dari para ahli serta respon pengguna. Instrumen yang digunakan pada penelitian ini adalah angket validasi dan angket respon pengguna. Hasil Penelitian ini diketahui : (1) Penelitian pengembangan ini menghasilkan produk berupa Video pembelajaran. Kelayakan media ini didapatkan dari hasil validasi ahli media dengan kategori “**Sangat Layak**” dengan persentasi kelayakan 97.72%. (2) Efektivitas media pembelajaran berupa video pembelajaran berbasis aplikasi *simurelay* pada materi instalasi tenaga listrik dengan menggunakan uji N-Gain Diperoleh Hasil analisis nilai N-Gain pada kelas eksperimen yaitu 0.768 dan pada kelas control 0.469.

Kata Kunci: Video Pembelajaran, *Simurelay*, Instalasi Tenaga Listrik

ABSTRACT

R M FIRDAUS AMRI, NIM. 5181131008. "Development of Learning Media in Electrical Power Installation Subject Based on Simurelay to Improve Student Learning Outcomes of Private Vocational School Sinar Husni 2 TR Labuhan Deli". Thesis of Electrical Engineering Education Department, Electrical Engineering Education Study Program, Faculty of Engineering, State University of Medan 2025.

This study aims to: (1) Determine the feasibility of learning media in the subject of electrical power installation based on simurelay to improve the learning outcomes of Private Vocational School Sinar Husni 2 TR Labuhan Deli. (2) Determine the effectiveness of learning media in the subject of electrical power installation based on simurelay to improve the learning outcomes of students at SMK Swami Sinar Husni 2 TR Labuhan Deli. The study was conducted by involving class XI students of electrical power installation engineering at Private Vocational School Sinar Husni 2 TR Labuhan Deli in the 2024/2025 academic year. This type of research is Research and Development (R&D) with the ADDIE research model. The ADDIE research model includes 5 stages, namely the first analysis which includes product needs analysis, the second design is compiling an outline, material about simurelay-based learning videos, the third development is developing a product that has been designed to be validated in order to get input from media experts and material experts. The fourth implementation is implementing the product to get responses from users to the learning videos that have been developed. The fifth evaluation is evaluating learning video media based on several inputs from experts and user responses. The instruments used in this study were validation questionnaires and user response questionnaires. The results of this study are known: (1) This development research produces a product in the form of a learning video. The feasibility of this media is obtained from the results of media expert validation with the category "Very Feasible" with a feasibility percentage of 97.72%. (2) The effectiveness of learning media in the form of learning videos based on simurelay applications on electrical power installation materials using the N-Gain test. The results of the N-Gain value analysis in the experimental class are 0.768 and in the control class 0.469.

Keywords: Learning Video, Simurelay, Electrical Power Installation