

ABSTRAK

**Putri Ratih Indah Pertiwi Br. Hutagalung, NIM 5203151030 (2025).
Pengembangan Sistem Informasi Praktik Kerja Lapangan (PKL) Berbasis
Website di SMK PAB 2 Helvetia.**

Penelitian ini bertujuan untuk merancang dan mengimplementasikan Sistem Informasi Praktik Kerja Lapangan (PKL) berbasis *web* di SMK PAB 2 Helvetia. Sistem ini dirancang untuk mempermudah pengelolaan data PKL dan mendukung proses pemantauan, pelaporan, dan penilaian secara efisien. Metode penelitian yang digunakan adalah *Research and Development* (R&D) model Borg and Gall yang telah dimodifikasi oleh Puslitjaknov, dengan lima tahapan: analisis produk, pengembangan produk awal, validasi ahli dan revisi, uji coba skala kecil, serta uji coba skala besar. Pengembangan sistem dilakukan menggunakan model *Rapid Application Development* (RAD) yang meliputi tiga fase: perencanaan kebutuhan, *workshop* desain RAD, dan implementasi. Pengujian kualitas sistem dilakukan berdasarkan standar ISO/IEC 25010 dengan tujuh karakteristik utama, yaitu *functional suitability*, *performance efficiency*, *compatibility*, *usability*, *reliability*, *security*, dan *portability*. Hasil pengujian menunjukkan bahwa: (1) *functional suitability* dinilai “layak” dengan metode *blackbox testing*; (2) *performance efficiency* mendapatkan Grade A pada GTMetrix dan kriteria “Good” pada *Google PageSpeed Insights*; (3) *compatibility* berjalan tanpa *error* pada berbagai *browser*; (4) *usability* mendapat skor 91% (kategori “Sangat Baik”) dari 30 responden; (5) *reliability* mencapai 98,46% (kategori “Sangat Baik”); (6) *security* dinyatakan aman tanpa konten berbahaya; dan (7) *portability* berjalan tanpa *error* pada berbagai perangkat. Uji akseptabilitas sistem menggunakan instrumen *USE Questionnaire* menghasilkan nilai 89,5% (kategori “Sangat Baik”). Berdasarkan hasil pengujian tersebut, sistem informasi PKL berbasis *web* di SMK PAB 2 Helvetia dinyatakan layak digunakan dan sangat membantu pengelolaan data PKL secara efektif dan efisien.

Kata Kunci: Sistem Informasi, Praktik Kerja Lapangan, *Website*, ISO/IEC 25010.

ABSTRACT

***Putri Ratih Indah Pertiwi Br. Hutagalung, NIM 5203151030 (2025).
Development of a Website-Based Field Work Practices (PKL) Information System
at SMK PAB 2 Helvetia.***

This research aims to design and implement a web-based Field Work Practice (PKL) Information System at SMK PAB 2 Helvetia. This system is designed to facilitate the management of PKL data and support the monitoring, reporting, and assessment processes efficiently. The research method used is the Research and Development (R&D) model of Borg and Gall which has been modified by Puslitjaknov, with five stages: product analysis, initial product development, expert validation and revision, small-scale trials, and large-scale trials. System development was conducted using the Rapid Application Development (RAD) model which includes three phases: requirements planning, RAD design workshop, and implementation. System quality testing was conducted based on the ISO/IEC 25010 standard with seven main characteristics, namely functional suitability, performance efficiency, compatibility, usability, reliability, security, and portability. The test results showed that: (1) functional suitability was rated “feasible” with the blackbox testing method; (2) performance efficiency received Grade A on GTMetrix and “Good” criteria on Google PageSpeed Insights; (3) compatibility runs without errors on various browsers; (4) usability scored 91% (category “Very Good”) from 30 respondents; (5) reliability reached 98.46% (category “Very Good”); (6) security was declared safe without malicious content; and (7) portability runs without errors on various devices. The system acceptability test using the USE Questionnaire instrument resulted in a score of 89.5% (the “Very Good” category). Based on the test results, the web-based PKL information system at SMK PAB 2 Helvetia is declared feasible to use and greatly helps manage PKL data effectively and efficiently.

Keywords: Information System, Internship, Website, ISO/IEC 25010.