

ABSTRACT

LAAK (Layanan Administrasi Akademik & Kemahasiswaan) Faculty of Informatics Telkom University is currently facing problems in handling student services that are manual and partial. The process of recording, tracking, and handling problems is not optimal due to the absence of an integrated system. This has an impact on the flow and time of work that is less efficient. The research input is in the form of LAAK stakeholder needs, while the output is a validated helpdesk system MVP product. The helpdesk system is important for students and organizations for communication media and facilitating efficient interactions. The gap that occurs is the absence of an integrated system that can overcome communication obstacles and non-optimal manual recording. This research uses the Lean Startup method with the Build-Measure-Learn cycle to design and validate the MVP of the helpdesk system. Development was carried out through three iterations (MVP v0, v1, v2) based on stakeholder feedback through interview techniques. The MVP system was developed using React.js, Vite.js, and TailwindCSS for frontend and Firebase for backend. MVP validation was carried out using BPMN diagrams (As-Is and To-Be) and categorization of MVP features with the MoSCoW method. The research results in a helpdesk system MVP with the main features, namely Must-have, including login, admin panel, ticket management, student dashboard, create reports, notifications, and logout. Stakeholders validated that the system can improve the efficiency of handling complaints and provide transparency for students.

Keywords: MVP, Lean Startup, Helpdesk, LAAK, MoSCoW, BPMN