

ABSTRACT

The growth of Indonesia's property sector has driven increasing demand for housing; however, online rental systems still face numerous challenges. Tenants often doubt the authenticity of property and owner information, feel unsafe when asked to make payments before site visits, and struggle to compare listings comprehensively. On the other hand, property owners deal with manual management using books or Excel, limited availability due to full-time jobs, and traditional marketing methods. This study designs and develops RuangHuni, a web-based information system application aimed at helping property owners manage rentals efficiently, securely, and with verified data, while also facilitating a safer and more transparent rental process for tenants. The system is developed using the Waterfall method, covering requirement analysis, system design, implementation, and maintenance. Data were collected through interviews and questionnaires, and used to design Use Case, Activity Diagram, Sequence Diagram, ERD, Class Diagram, and wireframes. The system was implemented using modern front-end and back-end technologies. As a result, RuangHuni provides 18 main features and successfully passed Black Box Testing, Usability Testing, System Usability Scale (SUS), and User Acceptance Testing (UAT), demonstrating high functionality and user satisfaction levels.

Keywords: *Information System, Property Rental, Property Management, Waterfall Method, RuangHuni*