## Abstrack

*This study designed and implemented a WhatsApp chatbot-based Employee Information Service for the Regional Civil Service and Human Resource Development Agency (BKPSDM) of Boalemo Regency. BKPSDM previously encountered challenges in delivering employee information services, including reliance on service officers, limited operating hours, and increasing demand for accessible information. The system was developed using the Waterfall methodology, encompassing requirements analysis, design, implementation, testing, and maintenance. The chatbot utilized a rule-based approach and was integrated with the WhatsApp API. Results indicated that the chatbot provided real-time automated responses to employee-related inquiries, including leave, promotion, periodic salary increases, transfers, and retirement. Black Box Testing confirmed that all system functions operated as intended and fulfilled the specified requirements. The implementation of the chatbot enhanced information accessibility, reduced the workload of service officers, and advanced the digitalization of public services at BKPSDM Boalemo Regency.*



***Keywords:*** *WhatsApp, Chatbot, Rule-Based, Employee Information Service, Waterfall.*



## Abstrak

Penelitian ini bertujuan merancang dan mengimplementasikan Layanan Informasi Kepegawaian berbasis *Chatbot* Whatsapp di BKPSDM Kabupaten Boalemo. Beberapa kendala dalam pelayanan informasi kepegawaian, diantaranya ketergantungan pada petugas layanan, keterbatasan jam operasional, dan meningkatnya kebutuhan akses informasi. Pengembangan sistem menggunakan metode Waterfall yang meliputi analisis kebutuhan, perancangan, implementasi, pengujian, dan pemeliharaan. Chatbot dikembangkan dengan teknik *rule-based* dan diintegrasikan dengan WhatsApp API. Hasil penelitian menunjukkan bahwa chatbot mampu memberikan respons otomatis secara *real-time* terhadap informasi kepegawaian, seperti cuti, kenaikan pangkat, kenaikan gaji berkala, mutasi, dan pensiun. Pengujian *Black Box Testing* menunjukkan seluruh fungsi sistem berjalan dengan baik dan sesuai kebutuhan. Hasil penelitian menunjukkan bahwa implementasi chatbot ini meningkatkan aksesibilitas informasi, mengurangi beban kerja petugas, serta mendukung digitalisasi pelayanan publik di BKPSDM Kabupaten Boalemo.



**Kata Kunci:** Chatbot, WhatsApp, *Rule-Based*, Layanan,Informasi, Kepegawaian, Waterfall.