## DEVELOPMENT OF WEB AND MOBILE BASED LIBRARY INFORMATION SYSTEMS (CASE STUDY: SMA NEGERI 1 BANYUMAS)

## PRASETYO KRIDO UTOMO

Informatics Study Program, Faculty of Science and Technology
University of Technology Yogyakarta
Jl. Ringroad Utara Jombor Sleman Yogyakarta
Email: prasetyokutomo@gmail.com

## **ABSTRACT**

The library as a source of information stores various reading collections that can be utilized by all school members, both teachers and students. However, the large number of library members at SMAN 1 Banyumas makes the book transaction and return process slow because library staff have to work hard to manage and report book data because everything is done manually by recording them one by one in a ledger which will be re-datated in Microsoft Excel.

The method applied in developing this system is waterfall, where the work is carried out sequentially or linearly starting from analysis, design, coding to testing. The database uses MySQL, the web system development uses PHP and Javascript and CSS while the mobile development uses Kotlin and Node JS.

The aim of developing a web and mobile-based library information system is to make it easier to carry out the process of collecting data on members, officers, incoming books, damaged books, adding book inventory, returning transactions, reporting (book collection, borrowing, returning, book fines, damaged books) and straightening book history and member history, while the mobile version makes it easier to borrow books, access loan details, search for books and access book collections.

Keywords: Library, System, Web, Mobile.