

ABSTRACT

In today's digital era, data has become an important element in decision making and innovation in various fields, including in educational institutions. The Directorate of Information Technology Center (PuTI) Telkom University plays a crucial role in managing data to produce relevant information and support academic and operational activities of the university. This article explores the role and process of data management, particularly data migration, in the context of the Telkom University National Campus (TUNC) project. The TUNC project aims to expand Telkom University's reach through the establishment of branch campuses in various potential regions in Indonesia, one of which is Institut Teknologi Telkom Surabaya (ITTS). This report focuses on the data migration process from the ITTS database to the Telkom University central database at the database source to staging stage. This data migration process uses the ETL (Extract, Transform, Load) method with the Pentaho application. In addition, this report also discusses how to ensure data integrity and security during the migration process. The study involves configuring database connections, analyzing data structures, migrating data using Pentaho, and reporting migration results. Data security was ensured through the use of VPN and evaluation of the migration results. The report results show that an effective and efficient data migration process can improve synergy between campuses, minimize data redundancy, and utilize big data technology for more comprehensive data analysis. This report provides practical guidance in data management, especially in data migration, which can be implemented in similar projects in other educational institutions.

Keywords-Data Management, Data Migration, Telkom University, ETL, Pentaho, Data Security, TUNC, ITTS.