IMPLEMENTATION OF POPULATION DATA ENCRYPTION AND DECRIPTION USING STANDARD DATA ENCRYPTION METHOD
(Case study: Dukuhmulyo Village Head Office, Pati Regency)

RIESMI MARDELA

Informatics Study Program Faculty of Science and Technology
University of Technology Yogyakarta
Jl. Ringroad Utara Jombor Sleman Yogyakarta
E-mail:riesmimardela26@gmail.com

ABSTRACT

The population system is one of the systems of the state administration system that has an important role in a government. The system contains confidential data. Therefore, special security is needed that is useful for securing these data. This is very risky if there are people who are not responsible for accessing the data because the data can be misused for purposes that are not good for the data owner. In this study, the Data Encryption Standard (DES) cryptographic algorithm is used from many cryptographic algorithms for the encryption and description of population data. The results of the encryption using the Data Encryption Standard (DES) cryptographic algorithm are in the form of an output file in the form of a .txt file while the decryption result is a .pdf file or returns to the original file form. Based on the research conducted, it can be concluded that the encryption and decryption system can help to secure resident files where the data is stored in the database. With the system created, this system becomes one of the solutions in maintaining the security of population data which is considered very important so that it can be kept confidential from anyone.

Keywords: Security System, DES, Population Data