

## **Abstract**

**This research focuses on text information for applying two user interface design elements: imagery, control and affordances, because these elements correlate highly in the dataset used. This study uses the SRS object named "Porlan". In the Porlan user interface, there need to be more user needs that have been determined at the stage of information gathering using the requirement elicitation method. The main objective of this research activity is to develop software regarding the suitability of the user interface through the extraction of functional requirements and design elements obtained through text analysis. The results of the extraction through the text pre-processing will then be compared for suitability with the functional requirements. There are results of application development that carry out the conformity process between functional requirements and user interface design elements in text format. The input text data comes from the requirements elicitation artifacts, functional requirements, and user interfaces. The output of text data processing through this application will produce comparisons between texts. The results of the conformity value obtained for elicitation requirements with functional requirements is 0.89189, which is included in the Cohen Kappa index almost perfect agreement and the conformity value for functional requirements with user interface design elements is 0.74452, which is included in the Cohen Kappa index, substantial agreement. Based on the results of this software development, it is possible to observe examples of compatibility between artifacts in documents D4 and D6 which are included in the "Slight Agreement" category.**

**Keywords: Functional Requirement, Text Information, Design User Interface, Text Pre-Processing.**