

Abstract

Argumentation Mining, aims to automatically identify structured data arguments from natural language or commonly called unstructured natural language text. This topic has recently become the center of attention because there are many potential applications, which include argumentative data detection. Besides that, it is also because of its potential in processing information coming from the web, and especially social media in innovative ways. The Graph-Based K-Nearest Neighbor (GKNN) method can be used to detect argumentative text. In this study, the system designed to identify the argument sentences against the datasets that have been provided. With datasets that have been through pre-processing, classification is done using the GKNN method and model validation test with the K-Fold Cross Validation method to then get the results in the form of F1-Score and Accuracy. From the study with a threshold value for NFP (Not Fit Percent) of 0.05, the average results were 80% for F1 and 67% for F1 values. Then with the value of $K = 7$ in the GKNN, the highest average accuracy value was 63%, and the average highest F1 value was 76%. The dataset used is the Stab Argmin dataset.

Keywords: GKNN, Argumentation Mining, Premise, Claim, Classification