ABSTRACT

Gingivitis is a condition where the gums become inflamed due to a bacterial infection, causing swollen gums. Gingivitis if treated too late will trigger more dangerous dental disease. The lack of knowledge about gingivitis and limited time for consultation with experts so that people pay less attention to dental and oral health which can indicate gingivitis. The purpose of this study was to determine accuracy in identifying gingivitis using the naive bayes method, which can help the public to find out information about gingivitis, so a system called the Expert System was built. Expert System is knowledge from experts that is entered into a computer or system that can be used for consultation. The data used in this study were 24 symptom data and 5 types of disease data sourced from interviews with an expert. The experts used in this study were dentists at the Rahmatan Lil Alamin Clinic. The data is obtained from the results of the medical records of patients who perform examinations with dentists. The data processed in this study is knowledge about the symptoms and types of gingivitis in the teeth and solutions obtained from an expert. The results of the Expert System accuracy based on 25 patient consultation data tested were 96%, where 24 data were valid or matched between expert diagnoses and the system and 1 data was invalid or did not match between expert diagnoses and system diagnoses. This system helps the community in identifying gingivitis disease based on the symptoms they feel and provides solutions in the form of the type of gingivitis suffered by the community, so that the community can identify it faster.

Keywords: Expert System, Identification, Gingivitis, Dental, Naive Bayes.