

ABSTRACT

ADHD (Attention-Deficit/Hyperactive Disorder) is one of the behavioural disorders experienced by children. This disorder causes a person to have difficulty concentrating and behave excessively. Referring to the Diagnostic and Statistical Manual of Mental Disorders (DSM-5), there are 3 types of ADHD: inattentive, hyperactive impulsivity, and combination. The symptoms of ADHD appear before 12 years of age and last at least 6 months. The role of parents is crucial to find out the presence of ADHD in children, because 83.5% of children have a history of undiagnosed ADHD. ADHD disorders need to be known and appropriate handling as soon as possible with experts in the field to minimize the appearance of more fatal effects in the future.

This final project research has the answer to these problems. This study discusses the design of a Behavioral Disorders Test Application to Identify ADHD in Children. The test results are one type of ADHD experienced by children (Inattentive, Hyperactive-Impulsivity Combined). Conclusions from the ADHD test were obtained from finding the similarity of the new case to the previous case and calculating the confidence value.

The Behavior Disorder Test Application to Identify ADHD in Children has implemented the Case-Based Reasoning (CBR) and Certainty Factor methods. It has been validated by a pediatrician, Dr D. Sharad Gedam (M.D), Associate Professor of Pediatrics. Based on the test results, this application can identify ADHD in children based on the symptoms experienced with an accuracy value of 100% and has an alpha or functionality test value of 100% , it can be concluded that the application is running well according to its function.

Keywords: ADHD, Behavioral Disorder, Test, Case-Based Reasoning, Certainty Factor.