"ITALK" A COMMUNICATION APPLICATION FOR LOW FUNCTIONING AUTISM

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A dissertation submitted in partial fulfilment of the requirement for Bachelor of Science (Honours) degree in Business Information Systems

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Abstract

Autism spectrum disorder (ASD) is a complex neurological and brain developmental disorder that begins early in childhood and lasts throughout a person's life. It mainly affects how a person acts and interacts with others, communicates, and learns. It is called a spectrum disorder because persons with ASD can have a range of various symptoms. The causes of ASD are unknown.

The problem domain is how to address the basic communicating needs such as hunger, thirst, sleep, other emotions and needs for day to day activities of a Level 3 autistic individual with their parents, guardians and caretakers efficiently and effectively.

This study was aimed to provide a solution in communication between the two key stakeholders namely ASD patients and their parents/caregivers. This innovative method apart from the traditional methods that are currently used will help the ASD patients to communicate their essential needs to parents and caregivers through a common platform with the use of an Information system.

The various studies, best practices frameworks, models and services obtained from these findings were then used to formulate the solution and identify the requirements needed for creation of iTalk which assist the two stakeholder groups to communicate effectively. The application was highly rated by the evaluators of this project.

There aren't many IT solutions assisting the ASD community, therefore, there are many methods and techniques which are yet to be discovered. However, the high growth rate of ASD in Sri Lanka showcase the need for new and innovative solutions to support the new generation to be able to express their needs digitally. This technique may help to overcome this need both locally and globally.

Key Words - Autism, ASD, Communication, Technology, Information system

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