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**Verbal Helper Application for Autism  
using Natural Language Processing**

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**Proposal submitted in fulfillment of the  
requirements for Bachelor of Computer Science  
(Hons.) Faculty of Computer and Mathematical  
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## **SUPERVISOR’S APPROVAL**

### **VERBAL HELPER APPLICATION FOR AUTISM USING NATURAL LANGUAGE PROCESSING**

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This report was fully prepared under the supervision of the project supervisor, Anis Amilah Binti Shari. It was submitted to the Faculty of Computer and Mathematical Sciences and was accepted in partial fulfilment of the requirements for the degree of Bachelor of Computer Science (Hons).

Approved by

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Project Supervisor

JANUARY 3, 2020

## **DECLARATION**

I certify that this report and the research to which it refers is the product of my own work and that any idea or quotation from the work of other people, published or otherwise are fully acknowledged in accordance with the standard referring practices of the discipline.

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## **ABSTRACT**

Autism can make communicating and associating with others difficult for a child. Autistic child tends to live in their own world which they do not socialize with others. Therefore, they are experiencing verbal issues. Autism is a neuro-developmental conditions which makes them behave repetitive tasks. A Recurrent Neural Network (RNN) was used in this project to predict next possible word until it becomes a sentence. Furthermore, N-gram also used for grammar checking for a simple sentence. The prediction words are displayed based on the frequency of the word chosen. This application results a valid sentence generated or chosen by autistic child to ease them communicating with others. Moreover, it helps caretaker or parents to teach them on how to express verbally after this. Thus, this application might be used for autistic children to help them express verbally.

## **TABLE OF CONTENTS**

<b>CONTENTS</b>	<b>PAGE</b>
<b>SUPERVISOR’S APPROVAL</b>	ii
<b>DECLARATION</b>	iii
<b>ACKNOWLEDGEMENT</b>	iv
<b>ABSTRACT</b>	v
<b>TABLE OF CONTENTS</b>	vi
<b>LIST OF FIGURES</b>	ix
<b>LIST OF TABLES</b>	x
<b>LIST OF ABBREVIATIONS</b>	xi
 <b>CHAPTER 1: INTRODUCTION</b>	 1
1.1    Background of study	1
1.2    Problem Statement	3
1.3    Project aim	4
1.4    Project objectives	4
1.5    Project scopes	4
1.6    Project significance	4
1.7    Conclusion	5
 <b>CHAPTER 2: LITERATURE REVIEW</b>	 6
2.2    Autism Spectrum Disorder (ASD)	6
2.2.1    Symptoms of Autism Spectrum Disorder	7