A STUDY OF FACTOR DETERMINANTS OF MALAYSIA HIGH TECHNOLOGY EXPORT : ANALYSIS OF GRANGER CAUSALITY MODEL

SITI MUSLIHAH BINTI SAHRIR

2014673862

Submitted in Partial Fulfilment of the Requirement for the Bachelor of Business Administration with Honours (Economy)

FACULTY OF BUSINESS MANAGEMENT

UNIVERSITI TEKNOLOGI MARA

KOTA KINABALU, SABAH

JUNE 2017

ACKNOWLEDGEMENT

Assalammualaikum w.b.t,

First and foremost, I would like to express my gratitude towards Allah SWT the Almighty for shower His blessing from the beginning until I had completing my project paper in which need to fulfill the graduation requirement of Bachelor of Business Administration (Hons) Business Economy.

I would first like to thank to my lecturer and advisor, my deepest appreciation and warmest gratitude, Mdm. Herniza Roxanne Marcus for all the guidance and advise along this journey. She consistently allowed this paper to be my own work, but steered me in the right the direction whenever she thought I needed it. I would also like to acknowledge Sir Haji Wahi Ismail as the second panel of this thesis, and I am gratefully indebted to him for his very valuable comments on this thesis.Thank you for nurturing me with your patient and kindness. I would never have possessed the capacity to complete my project paper without all the direction, advices and support.

Finally, I must express my very profound gratitude to my parents and to my siblings, Mohd Ramdhan Ridhuan, Siti Maisarah, Siti Mastura, Siti Munirah and Siti Nurmashitah for supporting me spiritually throughout writing this thesis and my life in general.

I would love to thank to Muhammad Fitri Norhisham for providing me with unfailing support and continuous encouragement throughout my years of study and through the process of researching and writing this thesis and not to forget, special thanks to Nur Amira Farhani, Yusma Nadhirah, Andri Lestari and Putra Aizat for helping me directly and indirectly through out everything.

This accomplishment would not have been possible without them. Their kindness is much indeed appreciated. Thank you.

Thanks and Best Regards.

(SITI MUSLIHAH BINTI SAHRIR)

ABSTRACT

Owing to intense competition by global development, nations that aspire to excel and develop in all sectors need to develop the appropriate capabilities in order to stay competitive in marketplace, for instance high tech sector. Intense development in high tech sector activities provide nations with the platform for developing capability to achieve superior performance in the marketplace. However, in a developing economy such as Malaysia, the determinants of high technology export performance as endogenous variable is yet to be examined empirically. To obtain a deeper understanding, GDP per capita, Foreign Direct Investment and Patent are presented as exogenous variable. This study is conducted by using data from the year 1988 to 2015 by using Granger Causality and Johansen Cointegration method. The empirical results indicate that High-tech export have unidirectional causality with GDP per capita and FDI. Moreover the exporting performance of using external technology varies depending on the their sources (domestic and foreign). Results of this research also indicate there is long run equilibrium between variables of the factor determinants of Malaysia high tech export. Limitations of this study as well as implications of the findings are ultimately highlighted. This study thus aims to extend our understanding of the determinants of high tech export performance by examining the short run and long run relationship between variable and how does the variables cause to each other.

Keywords : High tech export, GDP per capita, Foreign Direct Investment, Patent application

LIST OF CONTENTS

		Page
TITLE PAGE		i
DECLARATION OF ORIGINAL WORK		ii
LETTER OF SUBMISSION		iii
ACKNOWLEDGEMENT		iv
ABSTRACT		v
LIST OF CONTENTS		vi
LIST OF TABLES		viii
LIST OF FIGURES		ix
CHAPTER 1	**INTRODUCTION**	
1.0	Background of Study	1
1.1	Malaysian Economy	7
1.2	Problem Statement	9
1.3	Research Objectives	10
1.4	Significant of research	11
1.5	Scope of limitation of study	12
1.6	Hypothesis Development	13
1.7	Organization of Thesis	14
CHAPTER 2	**LITERATURE REVIEW**	
2.0	Introduction	15
2.1	Relationship Between GDP and high tech export	16
2.2	Relationship Between FDI and high tech export	18
2.3	Relationship Between Patent application and high tech export	21
2.4	Summary of the Empirical Literatures	23
2.5	Conceptual Framework	26
2.6	Conclusion	26

CHAPTER 3 METHODOLOGY AND DATA

3.0 Introduction 27

3.1 Model Specification 28

3.2 Data and Variables Description 29

3.2.1 High Tech Export 29

3.2.2 Gross Domestic Product (GDP) per capita 30

3.2.3 Foreign Direct Investment Inflow 31

3.2.4 Patent Application 32

3.3 Methodology

3.3.1 Unit Root Test (ADF & PP) 33

3.3.2 The Johansen Cointegration Test 35

3.3.3 Granger Causality Test 36

3.4 Conclusion 37

CHAPTER 4 DATA ANALYSIS AND RESULTS

4.0 Introduction 38

4.1 Unit Root Test Results 39

4.2 Granger Causality Test 41

4.3 Johansen Co-integration 43

4.5 Conclusion 45

CHAPTER 5 CONCLUSION AND RECOMMENDATION

5.0 Introduction 46

5.1 Conclusion 46

5.2 Recommendation 50

5.3 Policy Implications 51

REFERENCES 52

APPENDICES x-xx