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**THE MODERATING EFFECT OF ENVIRONMENTAL
REGULATION AND POLICY ON THE RELATIONSHIP
BETWEEN TOTAL QUALITY MANAGEMENT (TQM)
AND ORGANIZATIONAL PERFORMANCE IN THE
MALAYSIAN FOOD AND BEVERAGE COMPANIES**

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UUM
Universiti Utara Malaysia

**MASTER OF SCIENCE
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MALAYSIAN FOOD AND BEVERAGE COMPANIES**

By

AKANMU MUSLIM DIEKOLA



UUM
Universiti Utara Malaysia

**Thesis Submitted to
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Kolej Perniagaan
(College of Business)
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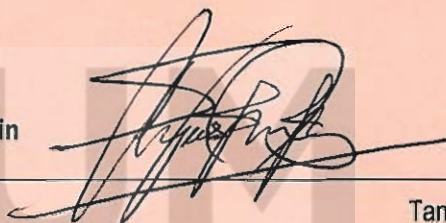
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ABSTRACT

There have been inconsistent findings in the literature concerning the relationships between TQM and organizational performance. Hence this research has prompted further investigation on the effect of other variables that may better explain the nature of these links. In the related literatures, many theories have suggested that the compatibility between strategies, resources, and capabilities are the keys for organizational success. The main purpose of this study is to investigate the moderating effects of environmental regulation and policy (ERP) on the relationship between total quality management (TQM) and organizational performance (OP). Quality assurance (QA) and continuous process improvement (CPI) as TQM elements considered in this study were moderated with their respective relationships with organizational performance. Therefore, to achieve this purpose, this study has integrated different theories such as the contingency and the institutional theories in order to provide the effect of QA and CPI on successful strategy implementation. Questionnaires were distributed to 250 Malaysian food and beverages companies. 71 questionnaires were returned and used in the analysis using the PLS-SEM. Studies revealed that TQM can be divided into the management or soft aspects (management concepts and principles) of TQM and the technical or hard aspects (management tools and techniques) of TQM. This study is exclusively based on the soft elements of TQM. The results of this study revealed that QA and CPI have always been significant predictors of organizational performance by following the regulations and policy related to environment. More importantly, the results have also confirmed the moderating effect of environmental regulation and policy on the relationships between TQM and organizational performance. This study also supported the premises of the contingency theory and the institutional theory by reaffirming the importance of the supportive ERP for any successful strategy implementation in enhancing organizational performance through the implementation of innovative practices. However, this result cannot be generalized as data were collected through a cross-sectional approach. Future research can extend it to longitudinal research.

Keywords: total quality management, quality assurance, continuous process improvement, organizational performance, environmental regulation and policy.

ABSTRAK

Terdapat penemuan yang tidak konsisten dalam literatur mengenai hubungan antara TQM dan prestasi organisasi. Oleh itu kajian ini telah mendorong penyelidikan lanjut mengenai kesan pemboleh ubah lain yang boleh menjelaskan sifat pautan ini dengan lebih baik. Dalam literatur yang berkaitan, banyak teori mencadangkan bahawa keserasian antara strategi, sumber, dan keupayaan adalah kunci bagi kejayaan organisasi. Tujuan utama kajian ini adalah untuk mengkaji kesan pengantara peraturan alam sekitar dan dasar (ERP) mengenai hubungan antara pengurusan kualiti menyeluruh (TQM) dan prestasi organisasi (OP). Jaminan kualiti (QA) dan peningkatan proses yang berterusan (CPI) sebagai elemen TQM yang dipertimbangkan dalam kajian ini menjadi pengantara dalam hubungan masing-masing dengan prestasi organisasi. Oleh itu, untuk mencapai tujuan ini, kajian telah menyepadukan teori yang berbeza iaitu teori kontingensi dan teori institusi untuk mendapatkan kesan QA dan CPI dalam pelaksanaan strategi yang berjaya. Borang soal selidik telah diedarkan kepada 250 buah syarikat makanan dan minuman di Malaysia. 71 soal selidik telah dikembalikan dan digunakan dalam analisis menggunakan PLS-SEM. Kajian mendedahkan bahawa TQM boleh dibahagikan kepada aspek pengurusan atau insaniah (konsep pengurusan dan prinsip) TQM dan aspek teknikal atau tekal (alat pengurusan dan teknik) TQM. Kajian ini adalah berdasarkan unsur-unsur insaniah TQM semata-mata. Dapatan kajian ini menunjukkan bahawa QA dan CPI sentiasa menjadi peramal yang signifikan bagi prestasi organisasi dengan mematuhi peraturan-peraturan dan dasar yang berkaitan dengan alam sekitar. Lebih penting lagi, dapatan kajian juga telah mengesahkan kesan pengantara peraturan dan dasar alam sekitar ke atas hubungan antara TQM dan prestasi organisasi. Kajian ini juga menyokong premis teori kontingensi dan teori institusi dengan menegaskan kepentingan ERP sokongan terhadap mana-mana pelaksanaan strategi yang berjaya dalam meningkatkan prestasi organisasi melalui pelaksanaan amalan inovatif. Walau bagaimanapun, dapatan ini tidak dapat diitlak memandangkan data hanya dikumpulkan melalui pendekatan keratan rentas. Kajian masa hadapan boleh dilanjutkan kepada kajian longitud.

Kata kunci: pengurusan kualiti menyeluruh, jaminan kualiti, peningkatan proses yang berterusan, prestasi organisasi, peraturan dan dasar alam sekitar.

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LIST OF ABBREVIATION

AFP	Aggressive Financing Policy
AFTA	Asean Free Trade Agreement
ASEAN	Association of South East Asian Nations
CEO	Central Executive Officer
CEP	Corporate Environmental Performance
CFP	Corporate Financial Performance
CI	Continuous Improvement
CIIPM	Continuous Improvement of International Project Management
CLD	Causal Loop Diagram
CSR	Corporate Social Responsibility
DEA	Data Envelopment Analysis
EFQM	European Foundation Quality Management
ERP	Environmental Regulation and Policy
EUI	Energy Use Intensity

EVA	Economic Value Added
GLS	Generalized Least Squares
IFAC	International Federations of Accountants
ISO	International Standard Organization
KBS	Knowledge Based System
KM	Knowledge Management
LPS	Lean Production System
MCS	Management Control Systems
NAM	Norm Activation Model
OCF	Organizational Culture Profile
OEE	Overall Equipment Effectiveness
OP	Organizational Performance
PLS	Partial Least Squares
PM	Performance Measurement
QMEA	Quality Management Excellence Award

ROA	Return on Asset
ROE	Return on Equity
ROI	Return on Investment
SAP	Structural Adjustment Plan
SCM	Supply Chain Management
SCS	Sustainability Control Systems
SEM	Structural Control Modelling
SME	Small and Medium Enterprises
SPI	Sustainability Performance Indicator
SSCM	Sustainable Supply Chain Management
TPM	Total Productivity Management
TQEM	Total Quality Environmental Management
TQM	Total Quality Management
TSR	Total Shareholder Return
WWF	World Wide Fund

CHAPTER ONE

INTRODUCTION

1.1 Research Background

Malaysia is known as one of the well informed countries on policies of agriculture due to inextricable connection between technological dash and critical research that are funded by the different sectors with enough budgetary allocation (Adebawale, 2013). According to research conducted by Ahmad (2009) on marketing practices in Malaysian Agro-based industry, it is posited that agro-based products have shorter life span due to the nature of the products and require good marketing practices to increase the sales.

Malaysia with its wealth of natural resources is one of the fastest growing economies in the ASEAN region and the country has 41% of world supplies of natural rubber, 39% of hardwoods, 37% of palm oil and 32% of tin. In 1971, the government developed a New Economic Policy (NEP) which, it was hoped, would bring about a sound and wide base for economic growth. According to Hempel (2009), on the global challenge on environmental governance, many international actors including the International Union for Conservation of Nature (IUCN), World Wide Fund (WWF) have been playing critical role in promoting environmental sustainability issues; even though the study finds some constraints and potentialities towards the sustainability context.

According to the report from Federation of Malaysian Manufacturers in joint collaboration with Malaysia External Trade Development Corporation directory (FMM-MATRADE Industry Directory, Food & Beverage, 2005/06, p. A13) on food and

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