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**ELECTRICAL SAFETY PRACTICES:
THE CASE STUDY OF A UTILITY COMPANY IN MALAYSIA**

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UUM
Universiti Utara Malaysia

**MASTER OF SCIENCE
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THE CASE STUDY OF A UTILITY COMPANY IN MALAYSIA**

By

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UUM
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**Thesis Submitted to
Othman Yeop Abdullah Graduate School of Business,
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in Fulfillment of the Requirement for Degree of Master of Science**



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ABSTACT

The purpose of this study is to examine the implementation of electrical safety practices of a utility company in Malaysia, secondly to examine the importance roles and responsibilities of management level and employees in ensuring electrical safety at the workplace and also to identify factors contributing to effectiveness of electrical safety practices employed by the utility company. This utility company is chosen due to the fact that the employees are frequently exposed to the electricity risk, threat and hazard in the workplace or worksite. Data were collected by three (3) methods includes through interview session, documents collected and data from reliable online and offline sources. These data then were analyzed and presented in details, tables and figures.

Three (3) themes in electrical safety practices were developed in this study. The first theme is management commitment and employees' involvement, second theme is occupational safety and health (OSH) facilities and programs and lastly the third theme, safe work procedures. These themes had put the utility company in an inspiring level as a well established electricity provider across the nation.

Keywords: electrical safety practices, occupational safety and health (OSH), utility company.

ABSTRAK

Kajian ini adalah bertujuan untuk menyelidik pelaksanaan amalan kerja selamat di sebuah syarikat utiliti di Malaysia, keduanya adalah untuk menyelidik kepentingan peranan dan tanggungjawab pihak pengurusan dan pekerja dalam menjamin keselamatan elektrik di tempat kerja dan seterusnya untuk mengenalpasti faktor-faktor yang menyumbang pada keberkesanan amalan kerja selamat elektrik. Syarikat utiliti ini dipilih sebagai kawasan kajian kerana anggota kerjanya sering terdedah kepada risiko, bahaya dan hazard elektrik di tempat kerja. Data dikumpulkan melalui sesi temuramah, dokumen-dokumen yang dikumpulkan dan data yang diperolehi dari sumber yang sahih sama ada secara luar atau dalam talian. Kesemua data ini dianalisis dan dipersembahkan dalam bentuk penerangan, jadual, carta serta gambarajah.

Terdapat tiga tema utama dalam amalan keselamatan elektrik yang dikenalpasti di dalam kajian ini. Tema pertama ialah komitmen pihak pengurusan dan penglibatan pekerja. Tema kedua ialah kemudahan keselamatan dan kesihatan pekerjaan dan program yang disediakan oleh syarikat utility tersebut. Manakala tema ketiga ialah prosedur kerja selamat. Ketiga-tiga tema ini meletakkan syarikat utility tersebut di tahap yang mengagumkan sebagai syarikat pembekal elektrik di seluruh negara.

Kata Kunci: amalan kerja selamat elektrik, keselamatan dan kesihatan pekerjaan, syarikat utiliti

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CHAPTER 1

INTRODUCTION

1.0 INTRODUCTION

Electric is defined as a form of energy while electricity is known as current which produced from the flows of negative charges of particles (electrons) current in which the flow of electrons created electrical charges whether static or dynamic (NIOSH, FYI NIOSH, 2011) and electric has been around for thousands years.

Electricity was initially recognized as hazard as early as 1870s since it can cause harm to people who are exposed to it. The very first risk known caused by electricity was fire because cases of fires has increased drastically when electricity were initially used for lighting and power and soon electrical shock and electrocution too were recognized causing from electricity hazard (National Safety Technology, 2009).

These hazardous exposures may exist through contact with an object as seemingly harmless as a broken light bulb to an energized overhead power-line. Electrical injuries signify a serious workplace health and safety issue because electricity presents at most

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