



**EXPLORING THE CYBERLOAFING  
PHENOMENON AMONG THE INFORMATION  
TECHNOLOGY STUDENTS AT SELECTED  
PUBLIC UNIVERSITIES IN JORDAN: A  
GROUNDED THEORY APPROACH**

by

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Like leadership, a thesis is a process that requires a very high price. Beyond the commitment of time, energy, intellect, and money, it requires the absolute necessity of faith. First, one must have faith in oneself. Second, one must have faith in others. Third, those that surround you and support you in numerous ways must remind you of the faith they have in you and the faith you have in yourself. There are almost too many faith-filled people who supported me in this process to name, but I will attempt to give some special thanks.

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## LIST OF ABBREVIATIONS

GT	Grounded theory
GPA	Grade Point Average
ICT	Information and Communications Technologies
IT	Information Technology
IUP	Internet Use Policy
NWRC	Non-Work-Related Computing
QDA	Qualitative Data Analysis
SMS	Short Message Service
PC	Personal Computer
US	United States
USA	United States of America

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## LIST OF SYMBOLS

N            Number of informants

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# **Meneroka Fenomena Lepak Siber Dalam Kalangan Pelajar Teknologi Maklumat di Universiti Awam Terpilih di Jordan: Pendekatan ‘Grounded Theory’**

## **ABSTRAK**

Pada hari ini, teknologi telah menjadi sebahagian penting dalam kehidupan. Ia digunakan dalam setiap aspek kehidupan kerana teknologi memudahkan kehidupan seharian. Teknologi mempunyai pelbagai manfaat terutamanya dalam pendidikan didalam penyampaian pengetahuan daripada guru kepada pelajar serta memudahkan komunikasi antara guru dengan pelajar. Walau bagaimanapun, teknologi juga membawa kepada pelbagai masalah baru yang tidak pernah wujud sebelum ini seperti lepak siber. Kajian ini memberi fokus terhadap faktor-faktor yang menyumbang ke arah aktiviti lepak siber dalam kalangan pelajar IT di universiti-universiti Jordan. Kajian ini juga bertujuan untuk meneroka strategi tenikal dan bukan teknikal untuk mengatasi serta akibat daripada gejala lepak siber. Kajian ini juga bertujuan untuk memahami latar belakang, konteks dan kelaziman, fenomena, dan strategi yang sesuai dengan menggunakan Metodologi Grounded Theory. Data telah dikumpulkan melalui kumpulan fokus dan temu bual secara individu dalam kalangan pelajar IT daripada empat universiti yang berbeza di Jordan. Data tersebut kemudiannya di analisis menggunakan NVivo12 untuk pembangunan teori. Pengkaji telah mengikuti pendekatan Straussian dan menggunakan empat peringkat pengumpulan data dan analisis dengan pengekodan terbuka, pengekodan paksi, dan dua peringkat pengekodan terpilih. Hasil kajian adalah berdasarkan laporan pemberi maklumat yang mempunyai pengalaman tentang lepak siber. Hasil kajian mencadangkan bahawa teknologi telah menjadi sebahagian daripada kehidupan pelajar universiti, sukar dibendung, dan ia boleh membantu pelajar mengelak daripada kebosanan serta memberi kesan negatif kepada pelajar dan universiti. Namun begitu, pemberi maklumat melaporkan banyak perkara lain berkaitan lepak siber seperti faktor baharu, polisi and kesan yang belum pernah dikaji sebelum ini didalam bidang lepak siber. Hasil kajian juga menunjukkan bahawa pelajar akhirnya memahami bahawa lepak siber adalah kompleks dan mampu menjejaskan akademik pelajar secara konsisten. Walau bagaimanapun, pelajar memainkan peranan penting untuk menolak gejala lepak siber dan pemberi maklumat turut mencadangkan beberapa strategi yang telah diambil oleh pelajar sendiri bagi mengawal perbuatan tersebut semasa kuliah berlangsung. Penggunaan teknologi yang meluas telah menyebabkan pelajar bergantung penuh terhadap teknologi dalam pelajaran mereka. Justeru, adalah sukar untuk membendung gejala lepak siber dari berlaku tetapi ia boleh dikurangkan bagi mengelak atau menghadkan bahaya lepak siber. Jordan bukanlah negara tunggal yang berhadapan dengan fenomena ini, malah ia semakin merebak di seluruh dunia. Oleh itu, kajian ini sangat signifikan dan relevan untuk diterokai secara komprehensif.

# **Exploring the Cyberloafing Phenomenon Among the Information Technology Students at Selected Public Universities in Jordan: A Grounded Theory Approach**

## **ABSTRACT**

Today, technology has become an important part of our life. It serves as a facilitating agent in all domains of life and makes our life easier. Technology has numerous benefits especially in the education where it uses to imparts knowledge from the teacher to the students also facilitates communication between teachers and students. However, technology also leads to the emergence of new problems such as cyberloafing. This research focuses on exploring the factors that contribute to cyberloafing activity among IT students in public Jordanian universities. This study also exploring technical strategies and non-technical strategies to coping cyberloafing and consequences of cyberloafing. This research seeks to understand antecedents, contexts and prevailing conditions, phenomenon, coping strategies, and consequences of cyberloafing by using the Grounded Theory Methodology. The data was collected through focus group and individual interviews were conducted among IT students from four different public universities in Jordan. The data was analysed using NVivo12 to arrive at the theory development. The researcher employed the Straussian approach and used four stages of data collection and analysis with open coding, axial coding, and two stages of selective coding. The results of the present study are based on the reports of informants who have experience with cyberloafing. The results of this study showed that technology has become a part of university students' lives where it helps students to get rid of boredom and leads to many negative impacts on the students and universities. In addition, the results of the current study have shown many new factors, policies, and consequences related to cyberloafing that have not been studied in the field of cyberloafing, where the study come out with paradigm model that cover antecedents, centre phenomenon, context and prevailing condition, coping strategies, and consequences of cyberloafing that contribute to body of knowledge and close the gaps of cyberloafing in education environments. The results also indicate that students realized that cyberloafing is a complex issue and it will jeopardize the students' academic outcome consistently. Nevertheless, the students play an important role to resist cyberloafing as the informants have suggested some strategies that have been taken by the students to control cyberloafing during lectures. The widespread use of technology has made students rely heavily on technology in their studies. Thus, it is difficult to prevent the issue completely but it can be reduced to avoid or limit the danger of cyberloafing. Jordan is not the only country facing this phenomenon but it is spreading all over the world. Therefore, this research is very significant and relevant to be explored comprehensively.

**Key words:** Cyberloafing, Miss use the Internet, Grounded Theory, cyberslacking, abuse Internet.

## CHAPTER 1 : INTRODUCTION

### 1.1 Overview

The Internet has become an important aspect of our life today and has changed people's lifestyles in various unexpected ways especially in the education environment (Scherer et al., 2019). From the educational viewpoint, the technology have been implemented in educational establishments in attempting to take advantage of the information and communication technologies (ICT) (Shute & Rahimi, 2017). Digital technologies such as tablets, laptops, and smartphones in the classroom are essential to working at hand (Nikolopoulou, 2020).

Accordingly, Information Technology (IT) classes are created in schools to enable students to use Internet, computers, and other technologies in the learning process to create opportunities for students to conduct performance-based learning activities (Yılmaz & Yurdugül, 2018). This includes the building of ICT laboratories at higher education establishments and schools under the Ministry of Education, as Internet and computer support courses were taught in these classrooms (Yılmaz, Yılmaz, Öztürk, Sezer & Karademir, 2015).

Through the networks where these labs are equipped, students can take advantage of online information resources in their learning processes. Today, the integration of technology in education not only imparts knowledge from the teacher to the students but also facilitates communication between teachers and students (Alharbi et al., 2019) and helps students to work in groups where they can share ideas with peers and work on

projects (Zhang, Pablos & Zhou, 2013). Furthermore, technology also improves the quality of education (Internetsociety.org, 2017) through its various benefits including helping students to learn languages as well as contributing to educational activities such as conducting academic research, browsing virtual Internet libraries, accessing online journals, and even obtaining academic degrees (Rayan et al., 2016; Umam, Rahayu & Kediri, 2019).

Despite the many educational benefits that technology has contributed to the teaching and learning process, technology also creates some challenges such as cyberbullying (Calmaestra et al., 2020), sexting (Ouytsel et al., 2020), malware (Ojha et al., 2020), and cyberloafing (Rana et al., 2019). This research focuses on cyberloafing phenomenon among students. It is often observed that learners tend to use Internet during class for unstructured content purposes especially in courses related to IT programs and the use the computer labs (Yilmaz et al., 2015).

Cyberloafing is a new term introduced by the emergence of cyber sciences and the World Wide Web (WWW) (Jandaghi, Alvani, Matin & Fakheri, 2015). The term was introduced for the first time by Kamins (1995) in New York Daily News in an article “Cyber-loafing: Does employee time online add up to net losses?”. Since then, this concept has become popular in scientific circles following the research by Lim (2002) from the National University of Singapore (Jandaghi, Alvani, Matin & Fakheri, 2015).

Cyberloafing is defined in the educational setting as the students’ behaviours or tendencies to use the Internet for a personal purpose unrelated to class during class time (Kalaycı, 2010). There are different types of cyberloafing activities such as surfing sites,

playing online or offline games, performing personal banking online, updating personal blogs/websites, sending or receiving email for personal purposes, online shopping, real-time updating, accessing online content, downloading and uploading files, and visiting adult sites (Coker, 2013; Hartijasti, 2016). These activities have a different impact on students.

Some researchers classify cyberloafing activities as having a minor impact and serious impact while other scholars classify cyberloafing as negative activities and positive activities (Hartijasti, 2016). In addition, Sheikh, Atashgah, and Adibzadegan (2015) classify cyberloafing activities as minor and major. Lim and Chen (2012) classify the activities of cyberloafing behaviours into two sections. The first behaviour is surfing non-work related sites such as playing online/offline games, performing personal banking online while the second behaviour is wasting organizational time using email for personal purpose reasons. This research attempts to discover all cyberloafing activities conducted by students especially involving Jordanian undergraduate's IT students. This study also aims to expose how universities control this phenomenon and what the students should do to reduce and control cyberloafing behaviour.

Researchers had employed many terms to describe cyberloafing behaviour such as cyberslacking (Whitty & Carr, 2006), personal web usage (Anandarajan & Simmers, 2004), cyberdeviance (Lee, 2017), cyberlouching (Urbaczewski & Jessup, 2002), Internet misuse (Alshuaibi, Shamsudin & Alshuaibi, 2015), abuse Internet, delinquency, problematic Internet use, and online loafing. This study uses the 'cyberloafing' term as it is a common term among the researchers.

The cyberloafing concept originates from studies that dealt with the environment of a workplace. Most previous cyberloafing studies have predominantly focused on the antecedents of cyberloafing in the work environment (Kim, Triana, Chung & Oh, 2015). The prediction and prevalence of cyberloafing in the workplace environment has been well documented in previous studies (Alshuaibi et al., 2015; Dursun, Donmez & Akbulut, 2018; Hernández, Levy & Ramim, 2016; Pindek, Krajcevska & Spector, 2018; Saidin, Iskandar & Dahlan, 2017; Ugrin, Pearson & Nickle, 2018).

There are only a few studies that investigated cyberloafing in the educational environment (Akbulut, Dursun, Dönmez & Şahin, 2016; Varol & Yıldırım, 2017). Where researchers have investigated cyberloafing within the educational environment involving high school students (Rana, Slade, Kitching & Dwivedi, 2019; Saritepeci, 2020) and university students (Carbonell, Chamorro, Oberst, Rodrigo & Prades, 2018; Flanigan & Kiewra, 2018). Previous studies found that cyberloafing is one of the major problems in today's education environment (Akbulut et al., 2016; Gökçearsan, Mumcu, Haşlaman & Çevik, 2016; Yılmaz et al., 2015). The results of previous studies indicate that cyberloafing behaviours have caused a significant decline in the performance of both employees at the workplace and students in the education environment (Kalaycı, 2010).

Although many studies have investigated the issue of cyberloafing within the work environment, it is worth to highlight the fact that cyberloafing is a rapidly growing problem in today's educational environment. This denotes the need for conduct relevant studies in the effort to determine the factors that lead students towards cyberloafing within the educational environment as well as suitable rectifications that can prevent cyberloafing in educational environment (Akbulut, Dönmez & Dursun, 2017; Dursun et

al., 2018; Yılmaz et al., 2015).

On the other hand, some researchers consider cyberloafing as beneficial for both employees at work and students in the education environment as it allows them to take a break from their work or study, reduces stress, promotes self-development, refreshes their mind before returning to work or class, and subsequently translates to positive results to their organizations (Baturay & Toker, 2015; Lim & Chen, 2012). Likewise, cyberloafing may lead students to enhance the learning environment, flexibility, creativity, and increase innovation (Derin & Gökçe, 2016).

Jordan is one of the developing countries in the Middle East region with a high number of educated human resources (Int@j, 2016). The country has recorded significant improvements in various fields including fast and high development in computerization, education, e-government, development of numerous knowledge centers in remote parts, and the creation of a legal environment that sustains these growths (Int@j, 2016). The ICT field is seen as an opportunity for Jordan to increase its competitive advantage over other countries in the Middle East region. As a result, Jordan has taken serious steps towards launching major ICT initiatives with the aim of developing the ICT sector (Int@j, 2016). Communication takes place in Jordan through many media outlets including Internet, mobile phone, television, and radio. Today, the use of Internet and phone has become widespread across the country where the number Internet users is recorded to be around 8,700,000 which is equivalent to 87.0% from the 9,990,000 population of Jordan (Slideshare, 2019).

Usually, most Jordan citizens use four devices to access the Internet which are

mobile phones, personal computers (PC), laptops, or tablets (Ghazal, 2015). Phone users account to 7.97 million subscriptions which are equivalent to 80% of the population of Jordan followed by 54% of Jordan population with Internet access on their phones (Slideshare, 2019), 33% of Jordanian households with desktops or laptops (JT, 2018), and 2% tablet users (Ghazal, 2015).

The use of Internet via phones, desktops, laptops, or tablets is common among IT undergraduate's students in Jordan where most students at Jordanian universities own and use technologies such as smart phones and computers (Jwaifell, 2018). In addition, all IT Colleges or IT departments at universities in Jordan provide technological facilities for their IT students (Hu.edu.jo, 2020; Ju.edu.jo, 2020; Zuj.edu.jo, 2020) to be utilised for learning purpose. However, a number of students have taken advantage of such technology for personal purposes that are unrelated to academic lessons and classes (Varol & Yıldırım, 2018; Yılmaz & Yurdugül, 2018). Despite the effort of blocking or monitoring the Internet usage by several universities, students are still able to access to Internet using their mobile phones (Carbonell et al., 2018; Flanigan & Kiewra, 2018), which is difficult to be controlled by the universities.

Today, the wide development of Internet access via mobile phones, laptops, and tablets continues to evolve and requires a focus on developing university policies and strategies of using Internet to reduce the adverse impacts on the outcome of universities and student performance. The issue of cyberloafing at the education environment in Jordan is still not widely researched (Jwaifell, 2018). Hence, this research aims to investigate the impact of cyberloafing towards college students and identify the questions and objectives among the students.