11-14-2021

Social media adoption and employability performance of Universities

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Short paper (research in progress)

Theme: IS/ IT in the period of crisis: issues and value creation

Abstract

This paper is part of series of papers of ongoing research proposing social media advancement in value creation in higher education institutions with a focus on the employability of students as well as employability performance of the Higher Education Institutions. The main purpose of the study was to explore the state of art practices concerning social media adoption in higher education and employability performance of universities. The study used a traditional literature review approach to conduct the exploratory study, where the literal sources selected were representative of the elements under investigation. The study established that social media is a tool that has been used in Higher Education Institutions to build the employability attributes of students. The social media adoption practices were categorized under three themes, that is, student-instructor level, faculty level, and holistic level practices. It was further identified that social media cannot be utilized solely owing to its constraining features. The study provides an argument for the advancement of social media through integration with more advanced strategic tools. The implications of these findings as well as directions of future studies are also mentioned.

Keywords: Social media adoption, web 2.0 adoption, graduate employability, holistic web 2.0 adoption, university students employability

1.0   Introduction

Employability has been an area of increased debate in the role of higher education institutions to society, where outcomes over the recent past have been measured in terms of a graduate being able or unable to secure a job or self-employment after graduation (Tamrat, 2021). These outcomes have been measured globally note an ever-increasing skilled youthful population that remains unemployed, more so in the Asian and African context (Kumar, 2020; Africa Development Bank, 2020; Tamrat, 2021). Even though graduate employability outcomes are measured in terms of graduates' ability to attain jobs after graduation, this does not indicate that unemployed graduates are unemployable (Gedye & Beaumont, 2018; Cotronei-Baird,2019; Yawson & Yamoah, 2020). Rather, the productivity of individuals across their career lifetime or 'productive' phase of their life is noted to be the measurement of their employability (Yorke & Knight, 2006;).

University employability performance as a crisis is viewed multi-dimensionally and perceived to be situational in terms of regional contexts (Hope, 2012; Dutta & Islam, 2017). In the case of Asia and African contexts, a high youthful population has been noted on an increasing trend (ILO 2020). As of 2019, about 60% of the Africa population comprises youths aged below 25 years, just after Asia which comprises the largest number of youths globally (UN, 2019). This youthful population has been characterized to have an increased interest in university education in an environment where limited job opportunities for formal employment exists. As a result, an increased number of skilled youths are either discouraged or lacking formal jobs or careers (ILO, 2020).

University employability performance literature has attributed the low employability performance to various factors including high competition in the labour market, job dynamics, environmental dynamics, as well as mismatch between university education and labour market needs (Harrigan & Hubert, 2011; Wang, Dugan & Sojka, 2013). In labour market studies globally, employers cite the inability of students to exhibit their employability as the main reason for being unable to kick-start their careers (Dutta & Islam, 2017; Yorke & Knight, 2006). In the Sub-Saharan African setting, the situation is not any different where

low performance is aggravated by the increasing population of unemployed skilled graduates (McCowan, 2018; Tamrat, 2021).

The employability performance of universities identifies with the identification and development of employability attributes of students by universities, as they transit through various phases in their studies (Ngulube, 2020; Nudelman, 2020). While the universities are expected by their stakeholders, including the students and labour market to upskill students to be ready for the labour market, various studies have criticized these institutions for failing to match with the developments of their counterparts in their ecosystem (McCowan, 2018; Harrigan & Hubert, 2011). Industries and entrepreneurial ventures are forced to undergo innovative development on a day-to-day basis due to market problems and developments (Harrigan & Hubert, 2011). However, the Higher Education Institutions (HEIs) charged with the responsibility of equipping future workforce are yet to match with the pace of their industry counterparts (Hannon, 2013; Benson, Morgan & Filippaios, 2014). As a result, students graduating from these institutions find themselves 'not ready for work', thereby reflecting low employability performance.

Studies including Etzowitz (2013); Nogueira, Arruti, and Markuerkiaga (2018), and Hannon (2013) call for universities to act as enablers to mitigate the employability question. University as an enabler of student employability performance has been viewed as a point of value creation and co-creation by university stakeholders, where relevant employability attributes are sought and channeled to university academic programs (Harrigan & Hubert, 2011; Wang et al. 2013; Benson et al. 2014). Further, studies such as Pouratashi and Zamani (2018); Boden and Nedeva (2010); Nghia, Giang, and Quyen (2019) offer conflicting views concerning employability performance, hence it remains a contentious issue. On the one hand, it is viewed as a problem to be solved wholly by the universities (Pouratashi & Zamani, 2018; Nghia et al. 2019) and on the other hand, scholars have continuously argued that it is a problem that can only be solved through integration and collaboration between the universities and employers (Jing, Chang, Hussain & Chin, 2010; Boden & Nedeva, 2010). Other scholars have argued on the need for collaboration by the government, universities, and industries involved, a concept widely discussed in the Helix models of innovation (Leydesdorff &Etzkowitz,1998; Carayannis and Campbell, 2009; Carayannis and Campbell, 2010; Tamrat, 2021). While various practices can be employed in the integration and collaboration activities between the universities and their stakeholders, the focus of the study is on dialogues and interactions between the university and its stakeholders and the resultant value creation. Hence the focus is on social media adoption.

In the current study, the main argument is that the actors involved in employability value creation consist of universities, that is, both the management, students, and faculties involved; industries, comprising employers and other intermediaries and government agencies. The study further argues that the adoption of social media and its platforms to engage with these actors can result in significant interactions, information exchange, and value creation. This could further facilitate upskilling of students and holistic university employability performance. While some evidence exists of the positive effects of social media on student employability performance (for instance Benson et al.2014; Blaschke, 2014; Jing et al, 2010; Dragseth, 2020), literature focus on the university holistically, is limited. This study was intended to investigate the state of the adoption of social media on the employability performance of universities.

1.1   *Social media*

Social media has been widely defined as web 2.0 technology, which refers to online technologies that facilitate the creation and sharing of user-generated content (Wittwer, Reinhold & Alt, 2016; Sewlyn, 2011; Blaschke, 2014; Tess, 2013). Social media or web 2.0 technology comprises tools, platforms, and services, that are used among social online communities for the generation and sharing of social media content (Reinhold & Alt, 2011). Social media has been further classified into five areas including messaging social media, blogging and microblogging social media, collaborative social media, social networking sites, and media sharing (Sewlyn, 2011; Alt & Reinhold, 2020; Viana, et al. 2014). Based on past studies, these categories consist of varied features which are used by the social media providers to influence varied communities in their usage (Alt & Reinhold, 2012). While messaging is characterized by sending and receipt of short texts in networks such as the use of Twitter; media sharing involves sharing media files such as audio and video files with a social network, such as the use of YouTube. Blogging and microblogging social media are more collaborative, where content or media is built over time by social media community

members. Social networking sites are social media platforms that allow users to create a public/private profile and develop networks with other users. Even though these five categories have been continuously documented, the social media platforms continue to undergo innovation and the proprietary media fall into one or more of the categories previously identified. For instance, Twitter is not only used in messaging but can also share files.

1.2   *Usage and adoption of social media in organizations*

Adoption is defined as a process that entails learning and decision-making over time (Welkening, 1953). It is also identified as a process which an individual undergoes from initial awareness of innovation to the eventual decision to fully utilize the innovation (Rodgers, 2003). Even though mental decision processes may not manifest in organizations, the organizations go through a learning period and decision-making process which then facilitates the acceptance of innovation and finally its adoption in the organization.

Just as any other form of technology, social media has been adopted in organizations at varying levels (Mousari & Demirkan, 2013). The levels of adoption determine the extent of usage as well as effectiveness in supporting business functions (Mousari & Demirkan, 2013; Tess, 2013; Sewlyn, 2011). As noted in Mousari and Demirkan (2013), the levels of adoption of social media by organizations vary widely, however basic trends could be used to establish the level of adoption. In social media literature (for instance, Mousari & Demirkan, 2013; Alt & Reinhold, 2020), the levels of social media adoption may be categorized into four main levels. The first level consists of the creation of a basic Social Media profile, which is passive and may contain content intended to reinforce information already obtained by a customer or even confirm the availability of service through a proprietor. The second level of adoption includes the use of data, where information obtained may be used to facilitate a better understanding of customers or online patronage behaviour (also, Alt & Reinhold, 2012). The third level of adoption is associated with global networking, where social media is used interactively to share and generate knowledge with other stakeholders to the business. The fourth level of adoption discusses the inclusion of a professional in managing web 2.0 of the business, in terms of content and operation (also, El-Gohary & Eid, 2012). Based on these views, the study notes that web 2.0 adoption occurs in a continuum, just as other forms of technology, and therefore is important for an organization to consider their extent of needs and strategy in social media adoption.

Social Media platforms are the avenues through which an organization interacts with its clients. Once developed by a proprietor, the organisation needs to strategically examine the levels of relationship with customers (Longbottom, 2011). This is due to the different needs that influence the level of customer engagement. For instance, a customer may opt for private social media platforms when conducting transactions with a firm, while at the same time prefer a public social media platform when seeking information about a service provider (Longbottom, 2011). Several studies note that customers engaging in social media are not driven solely by the need to connect but rather by online reviews of reliability and quality in the delivery of service (Ling-han, Jia-Yin, Chao-Yang, 2013; Koski, Pajarinen & Rouvinen, 2019). Social media platform consideration is capable of facilitating customer engagement from the basic forms which include likes and sharing to a higher form of customer engagement such as product reviews, feedbacks, and complaints, which are essential for value co-creation (Dolan, Conduit, Fahy & Goodman, 2016). Hence the need to consider the adoption of social media platforms facilitating positive client engagement.

1.3   *Research objective*

From the above literature, it is worthwhile to note that social media plays a significant role in the exchange of information between organisations and their stakeholders. These exchanges are positively associated with performance, value creation, and co-creation (Bolat & O'Sullivan,2017; Bonilla, Perea, Del Olmo, & Corrons, 2020). Social media is among current technologies that have revolutionised effectiveness and efficiency even in HEIs, more so administrative functions including ticketing, scheduling of appointments, information dissemination through students portals and corporate emails as well as websites (Wilson, 2013). This study argues that the advancement of social media adoption and utilization can eventually result in increased employability performance by HEIs. Accordingly, critical questions that arise with these developments are, to what extent has social media been adopted by entrepreneurial universities for employability performance? and, which social media advancements can further result in the holistic

advancement of employability performance by HEIs? To answer these questions, the research objective of this paper is to investigate social media adoption by universities for employability performance.

The paper is organized as follows: after the introduction to the contextual and theoretical background of the study, the second section explores the theoretical basis for the study and the methodological explanation used to answer the research objective, the third section discusses the findings and conclusions whereas section 4.0 provides the summary, conclusion, and directions for future study.

2.0   Supporting theory

2. 1 Actor network theory

The anchoring theory underpinning the study was the actor network theory (ANT) used in information systems studies. As posited by Latour (1996), the social world operates in a dynamic context of relationships, and that there's no existence of social forces outside these relationships. The actor network theory concerns the establishment and utilization of network relationships to solve a problem (Tatnall & Gilding, 1999; Silvis & Alexander, 2012). The establishment of a network among actors follows a process from the point where actors are introduced to a network, to a point where they are collectively involved in the development of a solution to a problem (Tatnall & Gilding, 1999). In the composition of networks studies such as Burt (1992) argued for fewer commonalities among networks as it attributed to the richness of information. This notion does fall far from the composition of actors involved in the use of social media. Social media in itself is noted for the richness of information from networks that social media actors possess (Dragseth, 2020; Wali & Andy-Wali, 2018). The theory recognizes the complexity and uncertainties that surround networks, as well as the features of the network which may strongly affect the functionality and productivity of a network(Stanforth, 2007 as cited by Silvis & Alexander, 2012).

2.2 Methodology

The traditional literature review approach was used in the identification and selection of articles that were included in the study. Traditional review is cited to be ideal when the researchers intend to establish the state of art from relevant literature as well as trends and patterns in existing literature (Li & Wang, 2018). This was in line with the study since the objective of the researcher was to establish the extent of social media adoption by entrepreneurial universities for employability performance. Databases recognized for social sciences and peer-reviewed articles, that is, Elsevier, Taylor and Francis Group, and Springer were considered. However, a second phase involving backward and forward search included the search of additional articles on Google Scholar and ResearchGate.

Database	No. of articles considered
Elsevier	8
Springer	11
Google scholar	8
Research Gate	10
Taylor and Francis group	37
Total	**74**

Table 1: Count of articles

The search of articles was first defined by the period of study, where articles published between the years 2000 and 2020 were considered. The long period was useful considering the diffusion effects content-wise. Hence, this provided a better overview of the past studies conducted on social media adoption by universities concerning employability performance. The main keywords included HEIs, Universities, Social Media use, web 2.0 use, adoption of social media in HEIs. The exclusion /inclusion criteria were based on the content on the adoption of social media and how it is used in higher education for upskilling and overall student empowerment towards employability. The selection of literature entailed: (1) screening of the title of the study, such that only articles with aspects of social media adoption were considered. (2) Review of the abstracts to establish whether the content satisfied the research objective. (3)In-depth review was

further conducted on the articles that were considered during the review of the abstract. Based on these criteria, about 300 articles were first considered, however, 74 articles satisfied all the criteria set by the authors and were used to answer the research objectives. Generally, the set of literature considered consisted of contexts in different continents.
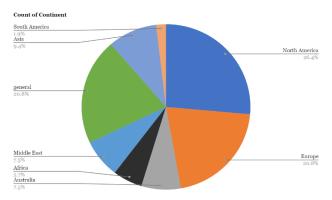

Figure 1: Count of the continent

Most of the studies meeting set criteria have been conducted in North America (26.4%) and Europe (20.8%), and general studies which were either literature reviews or conceptual papers with no particular country context. The least number of studies were obtained from South American context. Further, even though the study captures only 74 studies, figure 2 below shows that most articles were published between 2009 and 2020, indicating the continued debate in social media adoption in employability performance as well as the recency of the data considered in the current study to answer the search objectives.
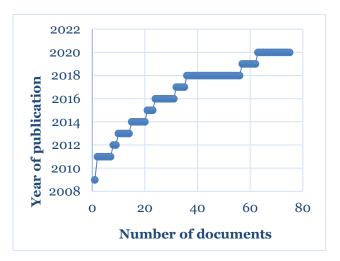

Figure 2: Distribution of reviewed documents

From the literature obtained for the study, social media literature on usage in higher education gradually increases from the year 2014. Initially, much literature is in experiments done in the European and American setup, where the proliferation of social media is high (e.g Selwyn, 2011; Blaschke,2014). However as the studies, progress towards 2017 more social media adoption research are in Asian (e.g Wong, Tan, Hew, Ooi & Leong, 2020) and Arabic countries (e.g Habes, Alghizzawi, Khalaf, Salloum & Ghani, 2018; Salloum, Maqbleh, Mhamdi, AlKurdi, 2018). Limited relevant literature in the African context also is documented in this period. This has been largely attributed to the rate of adoption of social media continent-wise, alongside the digital divide (Wali & Andy-Wali, 2018; Kolan & Dzandza, 2018).

3.0   Findings and discussion

The resulting discussion from the papers reviewed was conceptualised into two main themes by the author, which was used to initiate the discussion on social media holistic adoption in the university setting. The first conceptualisation is that students use social media unsupported by their HEIs, and use it constructively in addressing their employability needs (see Clark, Fine & Scheuer, 2017; Kolan & Dzanda, 2018; Mushtaq & Bengradha, 2018). The second conceptualisation dimension is that universities/faculties intentionally adopt social media to facilitate student employability performance (Moran, Seaman & Tintikane, 2011; Rahmi et al. 2018; Alqahtani & Issa, 2018). In this case, holistic adoption comprises adoption at full adoption at various levels of the organisation, comprising of student-instructor level; faculty level, and at the strategic level of the university. This is illustrated in table 2.

Themes	Practise levels	Description	Reference
(1)University initiated social media adoption	(a)Student-instructor level	The focus is on the technicality involved at the basic level where instructors initiated the use of social media in their interactions with students in HEIs.	Hill, Song and West (2009); Junco, Heiberger, and Loken (2011); Harrigan and Humbert (2011); Tess (2013); Gikas and Grant (2013); Blashke (2014); Fenwick (2016); Bharucha (2018); Dragseth (2020); Rahmi et al. (2018); Pedro et al. (2018); Salloum et al.(2018); Mushtaq and Benghrada (2018); Connolly, Willis, and Lloyd (2018); Lacka and Wong (2019); Xue and Daniel (2020); Condie, Ayodele, Chowdhury, Powe & Cooper (2018)
	(b)Faculty level	social media adoption by instructors as well as departments or sections within the university.	Junco et al.(2011) ; Moran et al. (2011);Cao et al.(2013); Seaman & Tinti-Kane(2013); Rodgers-Estable (2014) ;Fenwick (2016); Abdulraheem & Ahmed (2015); Elnasr et al. (2016); Mushtaq and Benghrada (2018);
	(c)Holistic level	Social media in HEIs need not only be adopted for communication purposes, but also as a strategic tool.	Rahmi et al. (2011) ;Wilson(2013); Tess (2013); Cao et al. (2013); Otto, Lee and Caballero (2013); Blaschke (2014); Elnasr, (2016); Peruta and Shields (2016); Samuel-Peretz et al. (2016) ; Giuchingila , Zeni, Gobbi, Bignotti & Bison (2018); Bonilla et al. (2019); Dragseth (2020)
(2)Students initiated social media adoption		Focus is on the usage of social media by students to enhance their learning capabilities or employable attributes	DeAndrea, Ellison, LaRose, Steinfield & Fiore 2012; Benson, Morgan & Filippaios (2012); Eke, Omekwu and Odoh (2014); Kaplan and Haenlin (2016); Clark, Fine and Scheuer (2017); Bolat and O'Sullivan (2017); Kolan and Dzandza (2018); Salloum et al.(2018); Kircarabun et al.(2018); Giunchiglia et al. (2018); Habes et al. (2018); Wong et al. (2020) ;
General-supporting literature			Greenberg (2010); Alt & Reinhold, 2012; Malthouse et al (2013); Chowdhury and Harrigan (2014); Wittwer et al. (2016); Alt(2018); Alt and Reinhold (2020);

Table 2: Contributions from literature
Source: Survey data (2021)

3.1   Social media adoption practises at the student-instructor level

Social media adoption practises at student-instructor was one of the dimensions conceptualised from the literature obtained. This dimension focused on the technicality involved at the basic level where instructors initiated the use of social media in their interactions with students in HEIs. The conceptualised themes comprised of student upskilling using social media, proprietary media use, social media platform use, and instructor assessment of social media upskilling as discussed below:

3.1.1   Social media use for student upskilling

Studies on student upskilling through social media adoption were on two main viewpoints where the upskilling was either student-initiated (Clark, Fine & Scheuer, 2017; Habes et al.2018; Mushtaq & Bengradha, 2018; Kolan & Dzandza, 2018), or instructor initiated (Blaschke, 2014; Dragseth, 2020; Rahmi et al. 2018; DeAndrea et al. 2012; Xue & Daniel, 2020). Both dimensions agreed with the positive outcomes of social media adoption in the learning environment where among other outcomes of upskilling included psychological, cognitive, and skill development and knowledge transfer (Lacka & Wong, 2019; Samuels-Peretz, Camiel, Teeley & Banerjee, 2017; Constantinides & Stagno, 2011; Bharucha, 2018).

However, studies such as Al Qahtani and Issa (2018) and Kolan and Dzandza (2018) noted negative effects of social media on students' performance, in the case of students initiated adoption. Even though the positive outcomes were noted (DeAndrea et al. 2012; Clark, Fine & Scheuer, 2017), the upskilling was focused on a limited population or at a micro-level. This then implies that such upskilling was not holistic to the entire student population. Because the feedback and complaints from students are entirely used by instructors to improve course content, and not shared with other departments which may benefit from students\ insights. Hence it may be concluded that social media plays a significant role in higher education, however, usage on individual programs or course units in isolation is a constraint towards a holistic strategic intent. Also in consideration of this, the current study sought to focus on the latter dimension, where the institutional initiated practises facilitating holistic adoption of social media in the university set up.

3.1.2   Use of proprietary social media

The main constant theme of this literature is on the use of popular social media tools including Facebook, Twitter and Wikis and Blogs in upskilling students (Kircarubun et al. 2018; Blaschke, 2014, Peruta & Shields, 2017; Condie et al, 2018; Samuels-Peretz et al. 2016; Junco et al. 2011). In these, social experiments were conducted, where facilitators actively engaged students in interactions with professional as well as social communities in the development of both social skills and networking skills. This was opined to facilitate the personal development of the students in terms of socialization and professionally in terms of networking with professional communities (Blaschke, 2014, Peruta & Shields, 2017; Condie et al, 2018; Peretz et al. 2016). Most of the studies were conducted to establish a positive relationship between social media use and upskilling the students' employability attributes (Gikas & Grant, 2013; Blaschke, 2014; Harrigan & Humbert, 2011). While most of these studies explicitly discussed the use of proprietary analytics to monitor students' activities and adjust course structure, this was based on a smaller scale, with scarce literature discussing analytics ability at a holistic, larger scale.

3.1.3   Social media platforms usage

In this theme, the studies reviewed argue for the need for multi-social media presence through a variety of platforms. Each platform is explained to have specific technological features, design, and ideologies and each platform invite different medium practises by learners and their instructors (Clark et al. 2017; Callan & Johnston, 2018; Xue & Daniel, 2020; Bonilla et al. 2019; Blaschke, 2014). Some platforms are used for blogging, others used to introduce learners to professional networks, while others are used for engagement between the teachers and the students, and others for collaboration between learners themselves in tasks assigned (Tess, 2013; Blaschke, 2014). From the literature, all the social media platforms were owned by

the social media providers, indicating the early stages of adoption of a Social Customer Relationship Management (Alt & Reinhold, 2012). Further, these experiments were conducted in universities where investment in internet structures was developed, hence students' behaviour was studied in a natural environment. It is important to note that in most of these studies students were assumed not to be aware of the said platforms and hence an initial training on the use of these platforms was considered essential and conducted at the start of the experiments (Blashke, 2014; Dragseth, 2020).

3.1.5 Instructor assessment of social media built attributes

Although the studies note a positive sign of the usage of varied social media platform practices on student improvement on knowledge attributes, much of the metrics were based on the instructor's decisions (Tess, 2013). None of the studies discussed the identification of the required needs from the industry/labor market perspective as a dimension of relevance in the employability upskilling of students. Students' abilities were assessed based on their ability to participate in the varied platforms as assigned by the instructors (Kolan & Dzandza, 2018; Clark et al. 2018; Blaschke, 2014; Bonilla et al. 2019). Further, few studies have followed up on the students after graduation to establish whether the digital skills taught have impacted them professionally. To conclude, the use of varied social media platforms is a positive strategic intent towards the improvement of student engagement. This calls for the development of dedicated platforms to understand student usage patterns; awareness of the attributes of varied social media platforms by the instructors or staff involved and the objective of use of such platforms. The usage of various platforms, though for different functions, may be used to achieve a specific goal (Sutherland, Davis & Terton, 2018).

3.2   *Social media adoption practices at the faculty level*

Faculty adoption was a dimension conceptualised from the literature reviewed. Faculty adoption studies focused on instructors as well as departments or sections within the university. In this theme, challenges associated with faculty members or situational environment are featured predominantly. These challenges faced by faculties were viewed as the main impediments to social media adoption (Mushtaq & Benragdha, 2018; Samuels-Peretz, Teeley & Banerjee, 2016). It was observed that as the HEIs ecosystem including industries and labor market evolved, customers including students similarly evolved to keep up with technological advancement and dynamism. However, this was not the case for the faculties in the HEIs.

The time taken by faculties to recognize and adapt to these emerging trends was partly cited as one of the main reasons for the slow adoption phenomenon currently facing HEIs (Elnasir, 2016; Cao, Ajjan & Hong, 2013). Other challenges cited included decisions surrounding choice and acquisition of proper infrastructure to support social media adoption (Callana & Johnston, 2020) ; risk factor in the alignment of social media to faculty (Fenwick, 2016); lack of institutional support by top management and a result the lecturers were forced to continued adoption of closed system view of learning (Abdulraheem & Ahmed, 2015); increased workload of using offline and online channels for teaching by the lecturers (Seaman et al. 2013; Moran et al. 2011) and lecturer preparedness, readiness and willingness to adapt to social media in teaching (Wilson, 2013; Moran et al. 2011; Cao, Ajjan & Hong, 2013).

In essence, social CRM studies focusing on strategy at this level, such as Malthouse et al (2013); Chowdhury and Harrigan (2014); Alt and Reinhold (2020) argue for the need for alignment of resources towards the overall objective. Only through the alignment of resources is the organization able to organize the resultant processes and eventually accomplish desired performance. Social media has been cited as a resource, and bottlenecks experienced at the departmental level reflect on the challenges faced in the alignment of social media to facilitate employability performance. Hence some of the alignment areas include incorporation of proper infrastructure, staff skill-building and training, as well as exposure to the value that the organization can create in the case of social media adoption and employability performance (Callana & Johnston, 2020).

3.3   *Social media adoption practises at the strategic level*

At this level studies including Wilson (2013); Otto et al. (2013); Bonilla et al. (2019) have outrightly indicated that social media in HEIs need not only be adopted for communication purposes, but also as a strategic tool. While the student community expects more interaction with social media than with peers (Wilson, 2013), the information quality in these media also determine the adoption of social media among

the existing students of HEIs (Otto et al. 2013), and future prospective students (Bonilla et al. 2018). Among other themes identified at this level were social media policies and digital culture.

3.3.1 Social media policies and guidelines

Under this theme, the guidelines set to control the use of social media determine student motivation. Most of the studies including Dragseth (2020); Kolan & Dzandza (2018); Giuchingila et al. (2018); Rahmi et al. (2011) and Elnasir, (2016) cited that the establishment of clear guidelines before commencement was an important factor to ensure social media strategy success. The guidelines provided a boundary on the use of social media during learning activities as well as ethical usage of these social media platforms in the HEI community(Tess, 2013; Sewlyn, 2011). This included issues such as the use of hashtags in comments on a social media platform, clear neutral communication with other online users, exploring recent trends in areas of interest before commenting in social networks as well as ensuring personal security to prevent cyberbullying. It was established from these studies that guidelines set may either increase or decrease motivation, of both the learner and the instructor (Blaschke, 2014; Tess, 2013). For example, too much assignment within classes; passive or active involvement of lecturers in the social media activities assigned; poor coordination of course content especially where instructors lacked course plan for the social media learning activities; improved learning in groups activities and the need for real-time evaluation of student progress (Cao et al. 2013).

Basic requirements in guidelines such as continuous training and retraining of the instructors were mentioned (Elnasir., 2016; Cao et al. 2013). However, whenever it is mentioned there is the absence of input of the industry employability needs and requirements. Hence, raising questions on the usability or transferability of skills gained via social media adoption, once the students complete school programmes. Further, it is noted that faculty who are exposed to social media both professionally and personally fail to utilise these skills in their instruction to students. Hence, the need for the university to establish linkage with industry and encourage industry output and professionalism in student engagement with social media.

Social media guidelines are important towards the support of strategic intent of social media adoption, considering that it provides a standardised method of organization-wide adoption to social media usage and practices. However, considerations are needed especially for the organization of staff who use the social media platforms in terms of training as well as their roles in the execution of these guidelines in their service delivery, towards addressing student employability needs.

3.3.2 Digital culture

A clear theme also derived from the reviewed literature is on digital culture. Based on the reviewed studies, inculcation of digital culture by higher education institutions is important if the students are going to be influenced both personally and professionally (Tess, 2013; Blaschke, 2014; Elnasir, 2016; Dragseth, et al. 201; Peretz et al.2016). Based on these studies, personal skills acquired by the students such as web search and socialising, commenting, and sharing of information can be built to further encourage the students to create a personalised learning environment and hence build on their professional skills such as building and maintaining social capital in professional set up (Tess, 2013; Blaschke, 2014). A holistic approach towards this initiative may include social media skill-building involving upskilling in research, interaction, collaboration, and reflection (Blaschke, 2014).

As further noted from the social media in HEI studies reviewed, the digital culture was initiated and maintained by the instructors, for student personal development, concerning a specific course (Dragseth, 2020; Blaschke, 2014; Rahmi, et al. 2018;). As a result, the lessons learnt are used to only improve certain courses, rather than inform strategic decisions and activities of other departments in the university. This creates an imbalance, especially where students are actively engaged digitally but partially. To conclude, digital culture as a practise to promote a personalised learning environment is a strategic intent that could facilitate lifelong learning and long-term employability of students as they exit universities (Dragseth, 2020). However, it becomes evident that to achieve personalised learning across entire programs of study, there is a need for the holistic adoption of social media practises.

4.0   Conclusion

4.1   Summary of findings

The current study involved an investigation on the state of the art literature on the adoption of social media in HEI on employability performance. These studies explicitly described the adoption of social media in the classroom setup as well as faculties/departments for employability. The adoption was characterized by separate adoption, short term outlook, minimal analysis, and narrow-focused strategic intent at an operational level as described:

- Separate/individual use of social media where social media was used as a learning tool in a class or course group. The complaints and feedback addressed were based on a specific session and used to adjust the course structure of a specific course. The insights gained from student feedback only benefited the particular course instructor, hence individual course improvisation on social media use.
- Short-term outlook: that is, the adoption practises were either experiments or short-term to understand the students' behaviour towards the introduction of social media at the operational level. Also, they were conducted to understand students' personal and professional development concerning social and networking skills. None of the studies were conducted focused holistically on university employability performance, which is the aim of the current study.
- Technicality: in most of the studies, the instructor conducted minimal analysis such as descriptive statistics to understand student usage behaviour. The data analysis was conducted in the social media platform through tools provided by the social media proprietor. To this end, none of the studies conceptualises holistic measurement/analysis of university employability performance.
- Strategic intent: in all of the studies conducted, the objective of social media use was stated, such that the strategy superseded the reason for using social media. These strategies were developed and implemented at the operational level in form of rules or guidelines in a social media interaction. Social media was used as a tool to facilitate and enhance the learning process of the students, and as a result, their resultant behaviour was documented for future improvements. However, the results were student-specific and hence need for further investigation towards holistic university employability performance.

To our best knowledge, the studies conducted on social media adoption in HEIs focus solely on the instructor-student relationship, and faculty adoption about employability. However, little is discussed on the progression of this adoption to a holistic level where information flow, policy, and technology utility is at all organizational levels. These issues identified and discussed in the third section, clearly show that social media cannot be adopted in isolation, considering its constraining features (Chowdhury & Harrigan, 2014; Alt& Reinhold, 2020). The current study, therefore, proposes the advancement of social media studies on employability from the current state where utility is at a departmental or operational level, to a focus towards holistic practices. In this case, holistic practises implying integration of the strategic level aspect and its resultant practises, which have been scarcely discussed.

4.2   Theoretical Implications

In the study, ANT is relevant in explaining the usage of social media by universities in various contexts, more so where both internal and external actors are actors for value co-creation. Positively, the theory recognizes the ability of the actors to develop a relationship that could facilitate the productivity of the networks. Secondly, the theory recognizes both the human and non-human factors within a network. Where non-human actors may include processes, tasks, or systems in place. However, areas not addressed in AnT, more so in the case of social media are interferences in actor networks as well as systemizing of value in the university structure. Interferences naturally co-exist with the co-production of actors, such as conflicts in roles and tasks and even system failures. Strong attributes underlying the actors' network, such as network stability and shared goals facilitate functionality and eventual value co-creation (Silvis & Alexander, 2012). Therefore the university management has to strategically examine actors and their networks if at all value creation and co-creation towards employability will be actualized in the university setting, as well the alignment of resources in the actor-network (Alt & Auth, 2010). For instance in cases where faculty rate of adoption to innovation is slow as well as where the university recruits relevant external actors for value

addition towards employability. Even though the theory proposes impartiality in the treatment of networks, there is a need for continued evaluation of actors and their valuable contribution towards improved employability performance.

4.3   *Directions for future work*

As noted from the findings in section 3, the studies reviewed failed to articulate social media practises that could be adopted by the university at a holistic level, to facilitate holistic engagement towards employability performance. Hence, a knowledge gap exists where no study addresses the measures or metrics that could be used by the university to holistically weigh their impact on employability performance. To address this conceptualised research gap, the researcher proposes both empirical and non-empirical investigation, on the integration of social media with a strategic management tool and the resultant holistic employability performance of universities.

As part of a future study, the authors intend to investigate the integration of social media with a strategic management tool, Customer Relationship Management (Social CRM). As noted in past Social CRM literature, Social CRM is defined as a philosophy or orientation or strategic management approach which combines *"technology platform, business rules, workflow, procedures and social media properties"* to enable an in-depth understanding of the customer to facilitate mutual value (Greenberg, 2010; Alt & Reinhold, 2012; Malthouse et al. 2013). As a result of this integration, Social CRM possesses a dynamic capability of use in a continuum, from operational (among stakeholders) to strategic levels of an organization (Chowdhury & Harrigan, 2014; Wittwer et al. 2016; Alt & Reinhold, 2020). It is expected that this advancement will facilitate the holistic employability performance of universities.

Acknowledgement

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