A Survey on Adoption of E-Learning on Social Media Platforms In Higher Education Space In India

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Abstract- The social media apps occupy a significant portion of all smartphones that are currently present in the society. This is of course very evident of the fact that social media platforms occupy a significant portion of your everyday life in modern times. The young adults in the country spends nearly 2-4 hours on average on various social media sites that includes Facebook, WhatsApp, Instagram, Twitter, LinkedIn, Pinterest, Snap Chat and the list goes on. The eye-catching elements in the social media is one of the major causes for young generation with short attention span being able to attach to social media for long duration. Currently however, the usage of social media to be used as a e-learning platform is quite a naïve idea for most educational institutes in India. Despite the rising popularity of the online courses for the people with limited time, the use of the social media has yet to make its place within the e-learning industry. This research paper focuses on the e effective ways that can help both students and instructors to make best use of the platforms.

Keywords- e-learning, Social media, Higher education, Adoption, TAM.

I. INTRODUCTION

Learning is an activity that aims at improving knowledge, skills and abilities. Since the emergence of a global movement that calls for a new model of learning for the twenty first century, it has been argued that formal education must be transformed in order to enable new forms of learning that are needed to tackle complex global challenges (Scott1, 2015). Currently, young people acquire knowledge and develop different kinds of skills such as: communication skills, leadership and management skills, intellectual understanding through interactions on social media platforms. The major reason behind this rapid technological development & engagement on social media, is massive emergence of the Internet in the last 20 years that have influenced almost every aspect of human society & specially faculties & students involved in the higher education institutes. (Nakamura, 2013). In recent decades, the use of information and communication technologies (ICT) for educational purposes has increased, and the spread of network technologies has caused e-learning

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practices to evolve significantly (Kahiigi et al., 2008). Elearning is part of the new dynamic that characterize educational systems at the start of the 21st century. Like society, the concept of e-learning is subject to constant change. (Albert Sangrà, 2012). Therefore, there is need of adoption of new technologies of e learning via social media platforms.

A. Higher Education Sector in India:

India holds an important place in the global education industry. It's amongst one of the largest network's Higher education institutions in the world. The main goal of the government is to raise its current gross enrolment ratio to 30 per cent by 2020 that will also boost the growth of the distance education in India. Currently, India would have world's largest tertiary-age population and second largest graduate talent pipeline globally by the end of 2020. The education sector in India is estimated at US\$ 91.7 billion in FY18 and is expected to reach US\$ 101.1 billion in FY19.Total number of colleges and universities in India reached 39,050 and 903, respectively in 2017-18. India had 36.64 million students enrolled in higher education in 2017-18. Gross Enrolment Ratio in higher education reached 25.8 per cent in 2017-18.

India has the third-largest higher educational system in the world. In 2016, there were 799 universities and 39,071 colleges spread across the country. These numbers are staggering.

The growth of higher education in India over a little more than half a century has been even more staggering. Between 1950 and 2014, the number of universities in India increased by 34 times. And, between 1950 and 2013, colleges increased by 74 times.

This quantitative eruption in higher education institutions has not been matched by the quality of the education they provide & the gap between quantity and quality is so large that it is one of the major obstacles in the way of

India being a world leader. (https://economictimes.indiatimes.com, 2018). Also, for eLearning, India has become the second largest

market after the US. The sector is expected to

reach US\$ 1.96 billion by 2021 with around 9.5 million users.

B. Recent developments in terms of Investments:

In total, Foreign Direct Investments (FDI) inflow into the education sector in India stood at US\$ 1.75 billion from April 2000 to June 2018, as per the data released by Department of Industrial Policy and Promotion (DIPP). Following are some major investments & developments in education and training sector in India in the recent past:

- Indian education sector witnessed 18 merger and acquisition deals worth US\$ 49 million in 2017.
- The Ministry of Human Resource Development, Government of India is also planning to raise around Rs 1 lakh crore (US\$ 15.52 billion) from private companies and high net worth individuals to finance improvement of education infrastructure in the country.
- India has signed a loan agreement with World Bank under 'Skills Acquisition and Knowledge Awareness for Livelihood Promotion' (SANKALP) Project to enhance institutional mechanisms for skills development.
- Singapore is going to open its first skill development centre in Assam, which will provide vocational training to youth in the region.

C. Understanding the TAM (Technology Acceptance Dimension):

User acceptance of technology is one of the important dimensions for this study. Significant research has been done to examine the factors that provide in-depth insights into the user acceptance of technology. Technology acceptance model (TAM) is an information systems theory developed with intention of making predictions about technology acceptance. It was first proposed by Fred D. Davis to provide a valid measurement scale for assessing user acceptance of technology. To measure user acceptance, TAM provides two variables:

a.) Perceived usefulness (PU):

which is as defined by Fred Davis as "the degree to which a person believes that using a particular system would enhance his or her job performance". b.) Perceived ease-of-use (PEOU):

The degree to which a person believes that using a system would be free from effort" (Davis 1989).

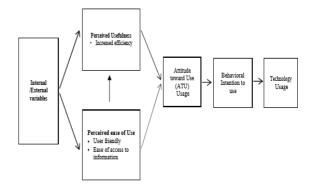


Fig.1 Technology Acceptance Model [Source: (David Gitumu Mugo1*, 2017)

Further, TAM has been uninterruptedly studied and expanded—the two major upgrades being the TAM 2 & UTAT. Also TAM3 has also been proposed in the context of e-commerce with an inclusion of the effects of trust and perceived risk on system use. (Venkatesh & Bala 2008).

D. Unified theory of acceptance and use of technology (UTAUT):

Venkatesh & other has purposed technology acceptance model called "User acceptance of information technology: Toward a unified view" (Venkatesh, 2003). It aims to explain user intentions to use an information technology & it's successive usage behaviour.

The authors formulated four determinants, four moderating variables, and two dependent variables for the development of UTAUT. These constructs help to explain worker acceptance of, and their behaviour towards, information technology. The four primary variables are performance expectancy, effort expectancy, social influence, and facilitating conditions. The four moderating determinants(variables) are gender, age, experience, and voluntariness of use. The two dependent variables are behavioural intention and usage behaviour. (Pope, 2014)

E. e-Learning:

As defined by Economics times, E-learning is a learning system based on formalized teaching but with the help of electronic resources. It can also be referred as a network enabled transfer of skills and knowledge and the delivery of education to a huge number of recipients at the same or different times. The management schools which use

E-learning technologies are more in demand as compared to those which still have the traditional approach towards learning. (https://economictimes.indiatimes.com/definition/e-learning, n.d.)

E-learning is used nowadays as alternative to face to face education. As a matter of fact, it's uses increases in a direct proportion with the increase of the number of students, which lead educators to strive to help the learners to get interactive content as it has been proven that it has a significant effect on the process of learning. The impact of blogs and wikis has also been investigated on learners' collaboration and reflection and it was reported that they both have a positive effect. (M. Samir Abou El-Seoud, 2014)

With introduction of cloud-based learning and AR/VR mobilebased learning is likely to revolutionize the e-learning market during the forecast period. The expected revenue of elearning market is of \$65.41 billion by 2023, during the forecast period,2018-2023. (E-learning Market - Global Outlook and Forecast 2018-2023, 2018)

F. Social Media:

Social media such as Facebook, Twitter, Google Plus, and Flickr, as well as open social practices such as blogging, are being used in learning for the purpose of convenient communication with other students and potentially with others outside the class such as students of the same topic and subject experts. (https://www2.le.ac.uk/offices/lli/developing-learning-andteaching/enhance/enhance-participation/social-media-inteaching-and-learning). Social media plays an important role in nowadays' society with advancement of mobile technology has increased the accessibility of social media in assisting daily tasks, socialization, and entertainment. (Ting, Ng, Ooi,

& Yap, 2018). Social media platforms are perceived as good avenues for idea sharing and information transfer, given its conducive environment for distribution through the 'Share' button. (Teach, 2017).

II. BENEFITS OF E-LEARNING THROUGH SOCIAL MEDIA PALTFORMS

The reasons and ways to use social networks in elearning education are multiple. Social media encompass a variety of tools, applications and platforms that can provide a wealth of resources and materials to support all courses (Janjic, Milicic, & Spariosu, 2012).Social media is widely used as a tool for personal and business, the thought that social media could be used for education has received recent attention due to the widely used of the platform. (Caren Casama Orlanda-Ventayen1, 2017). Following are some benefits of using social media platforms for E-Learning as

A. Social media allow:

- Conversations to continue after training and lecture sessions.
- Share your own content.
- Peer-to-peer interaction in groups so learners can continue to learn.
- Find individualized answers (by approaching instructors and fellow learners).

B. Helps in escalating learning more efficiently:

Can shorten formal learning, because the conversation continues. It's now available on demand as it's needed.

C. Social media can reach different audiences:

- New students & faculties that are recently enrolled in management institutes can connect with each other.
- Experts who got missed- now have a way to contribute and can become mentors and coaches.
- Social media communities can now create communities for external learners apart from internal students & faculties of management institutes.

D. Compendium of Social Media Tools for Educational purpose:

Social Media	Features List	SM Tools	
(SM) Platforms		Educational	
		Activities	
Blogs	Provide a list of	Community	
	relatively short	building	
	journal entries	simple	
	(posts) Post	conversations,	
	contents can contain	knowledge	
	rich media and can	sharing,	
	be formatted as	Mentoring,	
	reports, articles and	reflection, peer	
	new items. The	review.	
	blogger can choose	For Examples:	
	post categories for	Software like	
	providing	EDUBLOGS -	
	information	provides a way	
	structure. Each post	to centralize	
	can allow readers to	and manage	
	enter comments for	blogs within an	
	feedback,	institution by	

ISSN [ONLINE]: 2395-1052

	information	hosting them all		can talk freely about	and meta-data,
	enrichment and	on one domain.		any course issues or	and meta-data,
	discussion tied	on one domain.		concerns	
	tightly to the		Google	Includes word	For examples:
	original post		Collaboration		-
Podcast	÷ .	Vnowladaa	Tools	processing,	U
Poucast	r	Knowledge	1 0015	spreadsheets,	(word
	generically net cast is an episodic series	sharing,		presentations, team website creation,	processing, spreadsheets,
	-	resource		,	· ·
	of digital audio or video files which a	making and		videos,	forms and
		sharing, curriculum		conversation, email,	presentations); Google Sites
	user can download			IM and photo	U
	in order to listen to.	creation,		sharing, and more.	(team website
		recorded or live		Because these tools	creation);
		lectures		are available via a	Google Video
		Examples of		web browser,	(add comments,
		free Podcast		authorized users can	tags and
		tools for E-		easily share	ratings); Google
		learning Tools		knowledge, leave	Conversations
		available are :		feedback and	(for integrating
		Ardour ,		generate content	discussions) and
		Podometric ,			Google Wave
		Audacity,			(combines
		Huffduffer			email, Instant
					Messaging,
Social	Provide one or more	Collaborative			Wikis and
Bookmarks	collections of	research,			photo sharing),
	hyperlinks to useful	community	LinkedIn	Provides	
	resources with	building,		professional	
	useful descriptions	knowledge		network	
	attached to each	sharing, peer		It offers the	
	hyperlink. Tagging	review,		advantage of	
	allows a single	resource		quantifying users by	
	account to	making and		their resume and	
	accommodate	sharing,		accomplishments.	
	multiple collections	curriculum		*Instructors and	
	that tie directly to	creation		educators can	
Wahing	teaching subjects.	Ease T- E		engage with each	
Webinars	Initiate face-to-face collaborations	Face-To Face interactions		other with how-to tips, recent	
	through audio,	sessions		development news,	
	video, Power Point	505510115		opinions and more.	
	presentations,		Twitter	It connects learning	Discussion
	documents, drawing			communities or	Forums
	tools, screen			classrooms to a	i orunits
	sharing, and chat			specific event or	
Facebook	Easy to create an	knowledge		topic, to share	
I ACCOUR	open group to share	sharing, peer		updates, insights,	
	information, ideas,	review,		pictures and videos.	
	quizzes,			A form of	
	quizzes, questionnaires,	resource making and		microblogging,	
	pictures, videos and	sharing,		communicating	
	more, plus students	documentation		across individuals is	
	more, plus students	uocumentation		across mutviduals is	

www.ijsart.com

	as easy as creating a #hashtag.	
YouTube	It can be used by instructors to broadcast teasers or tutorials. Students can watch the videos at their own pace and make comments and	Uploading lecture sessions
	suggestions.	

Fig 2. Social media tools are ideal for an e-Learning platform [Source: https://www.ispringsolutions.com/blog/10-social-media-tools-ideal-for-e-learning/, 2018)]

III. LITERATURE REVIEW

A. Global popularity of Social media:

As per the Global Digital Report 2018, the number of internet users worldwide in 2018 is 4.021 billion, up 7 percent year-on-year. The number of social media users worldwide in 2018 is 3.196 billion, up 13 percent year-on-year and total number of mobile phone users in 2018 is 5.135 billion, up 4 percent year-on-year. (Chaffey, 2018). Facebook have the most daily active users compared to other social as there is 10.7% average post reach vs page like and 26.8% average paid post reach.

B. Social media in Management Institutes:

As per work of Liu, it was discovered that the most commonly used social media technologies in higher education were: blogs, podcasts, social networking, and virtual environments. (Liu, 2009)

Hovorka and Rees (2009) highlighted that introducing social media into courses may not only help make them more interesting and even fun, but at the same time teach students can learn valuable and pervasive workplace skills: communication, collaboration, community, convergence, and creativity.

Though limitations of adopting new methodologies to learn via social media platforms are also found in the research done by Swapna Kumar as in an open-ended responses students explained that they were not required to use new technologies, may not get extra credit for the amount of work posed by podcasts, videos, blogs or wikis, or were not familiar with the process of creation using these digital technologies. (Swapna Kumar, 2010)

C. Studies on E-learning:

As per Albert & Sangra, e-learning is considered as new dynamic that characterises educational systems at the start of the 21st century. In their study, research was conducted where experts participated from all over the world to agree on definition of E-learning. The entire research activities is divided into two parts: an extensive review of the literature on the concept of e-learning, drawing from peerreviewed journals, specialised web pages, and books & in second part , a Delphi survey was sent out to gather the opinions of recognised experts in the field of education and technology regarding the concept of e-learning with a view to reaching a final consensus. (Albert Sangrà, 2012)

According to M. Samir, Abou El-Seoud, majority of Egyptian universities undergo many educational obstacles that technology can help to overcome. They focused on relevance of open source tool, such as Moodle e-learning platform, has been implemented at many Egyptian universities. They also examined that how Moodle could be used as an aid to deliver e-content and to provide various possibilities for implementing asynchronous eLearning web-based modules. Researchers also shows that the use of interactive features of e-learning increases the motivation of the undergraduate students for the learning process. (M. Samir Abou El-Seoud, 2014)

D. Studies on e-Learning on Social Media in Education:

In this study the researchers, Ting, Ooi, & Yap examined the impact of social media -Facebook on the student's performance of academic performance of higher education institution which is based on - Cumulative Grade Point Average in Malaysia. This study is aims to determine the total time spent daily on activities performed on social media, and effect of gender on student's academic results. It was found that the total time spent on Facebook will not affect student's result, but the different types of activities performed on Facebook and student's gender will affect student's academic performance. The study concluded that though different gender has different usage pattern for social media for certain set of activities, but both uses social media in educational purpose which reflected a new trend in educational pursue among higher institution students. (Ting, Ng, Ooi, & Yap, 2018). As per the research done by Caren Casama, Orlanda-Ventayen1, Randy Joy Magno Ventayen, (Caren Casama Orlanda-Ventayen1, 2017) it was concluded that social media plays a crucial role in education. Although social media provide lot of distraction to the students, there is still useful use of social media in education. The study indicates that social media could help students and teachers maximize the use of social networking for e-learning.

Researchers discovered the use of social media in teaching by providing the profile of the teachers in Lingayen, Pangasinan, the role of social media in education in different educational deeds and its acceptability for the Role and usage of social media in education. The study done by Yimei Zhu & Rob Procter, explores intellectual use of social media by PhD students using a mix-method approach of qualitative interviews and a case study of #phdchat conversation. Various Social media tools, such as blogs, Twitter and Facebook, are used by PhD scholars to promote their professional profiles, publicize their work to a wider audience quickly, gain feedback and support from peers across the world. Difficulties and potential problems like the lack of standards and incentives, the risks of ideas being stolen, lack of knowledge of how to use and maintain using social media tool. It was found that respondents engaged in various strategies to maximize the impact of their scholarly communication practice. (Yimei Zhu*, 2015).

Luminița Giurgiu, Ghiță Bârsan, Dan Moșteanu in their study explained importance of eLearning through RSS(Really Simple Syndication feeds). As discussed in study, for personal development new information and understanding what's happening around us is important & best way to get it is through RSS feeds though still it's not so familiar technology. As web has become a sprawling network of different services, RSS is helping the web in connecting these services in an organized manner fashion - the new Web 2.0. In near future, RSS will be seen on every website and blog. to the internet This paper also showcased some RSS ideas and solutions for faculties and instructors, to get benefits of using RSS in education like RSS with social bookmarking can be used to create a set of resources accessible on any device connected, to conduct research and share that research with peers and trail book updates for example any faculty or instructor can create an account at http://del.icio.us/ or http://www.furl.net/ to store, sort and share the web sites that professor feels having valuable information for his/her colleagues and students. (Luminita Giurgiu, 2008). In the research study, Shauntel Hall examined how higher education institutions in the University System of Georgia are using social media. In his study, researcher also compared use among the various types of institutions (research, comprehensive, state college and state university). This study concluded that higher education institutions understand the importance of using social media however, but many are not taking advantage of tools & strategies that can help them. (Hall, 2014).

Waqas Tariq analysed the impact of social networks in terms of the future and carrier of students.

According to the study done, the social networking websites like https://www.linkedin.com, http://www.facebook.com/ and https://twitter.com/ are continuously distracting students from their studies, as major focus of student should be education but unfortunately today's student are emphasizing on such sites which can be a complete wastage of time. This paper purposes the negative side of Social media. usage for studies. (Waqas Tariq1, 2012)

As per Sahar Yassine (Sahar Yassine1, 2016), measuring effectiveness of Measuring the effectiveness of smart education depends on measuring the desired learning outcomes. This paper suggests major key features to be taken in consideration while developing learning analytics tool to measure and assess any course learning outcome. As well as it demonstrates the relationship between smart learning environments, learning outcomes and learning analytics.

E. TAM-Technology Acceptance Model:

Majharul Talukder, (study, 2012), investigated the determinants of the adoption of technological innovation by individual employees within an organizational context in Australia. According to the researcher for an organization to be successful in bringing innovation to the workplace, an understanding of potential adopters and the factors influencing their adoption decision is important. In this study, theory of reasoned action (TRA) and the technology acceptance model (TAM) as a basis of the theoretical framework was used. Survey questionnaires were used to collect data from an Australian organization. The findings indicate that perceived usefulness and managerial support are the two dominant variables in explaining adoption. The results show that individual adoption of innovation is also influenced by two social factors - peers and social network. The results also indicate that individual adoption of innovation is influenced by demographic factors. The research model provides a valuable alternative and comprehensive theoretical basis for improving our understanding of individual users' acceptance of innovation. The study contributes to knowledge and has practical implications for organizations concerned with adoption of technological innovation.

This study focused on the proliferation and utilization of handheld mobile technology among undergraduates for mobile learning cannot be underestimated. This study was geared towards investigating individual and technological factors affecting the perceived usefulness of mobile technology by undergraduates in university of Ilorin, Nigeria. The study was a descriptive research of the survey type. Samples were randomly drawn from all students in the 15 faculties. A total of 100 undergraduates were sampled. Two

research questions, and one hypothesis were answered and tested respectively. Mean was used to answer the research questions while Pearson Product Moment Correlation (PPMC) was used to test the relationship between the technological and individual factors. The findings from the study revealed that the technological and individual factors positively affected the perceived usefulness of mobile technology for learning among undergraduates. (Oyeronke Olufunmilola Ogulande, 2016)

IV. UTILITY

The importance of this study is to investigate the possible use of social media for the development of learning for Management faculty & students. The outcome of this research can be utilized by the management institutes to identify whether social media platforms will most effective in terms of learning & satisfaction outcomes, what are the challenges, faced by management institutes for adopting them for e-learning purpose. Thus, overall it would improve insight into the effectiveness of learning through Social media technologies in the teaching and learning process in higher education.

V. CONCLUSION

As social media has become inevitable part of society, with millennials spending on an average 11 hrs daily on these platforms, there is need for engage youngsters on social media for educational purposes as it will result in more engagement and participation. This innovative strategy of utilised social media platforms for learning will soon become popular amongst youngsters & will leave traditional teaching behind. At the same time there is need of third-party check on actions millennials are performing on social media as it may mislead from learning path due to lot of distracting activities available to social media nowadays. As per the data collected by researchers, due to availability of lot of multiple innovative learning techniques through on social media platforms, eLearning through social media is future of learning specially adopted by higher education space.

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