

## Situating Smartphones and Social Media Usage in Learning Activities among University Students

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### Abstract

*Smartphones ownership amongst the general customer, professionals and even students has grown exponentially. The latent features of smartphones in education somehow support learning activities. This paper aims to situate the evolving communication technology in higher education context. Smartphones like table computers and other mobile devices are evolved pieces of technology that have the potential to support student learning in the classroom. University students can use smartphones to record a lecture, search for definitions, or send notes to absent students, as well as use the medium to collaborate with other students electronically to complete homework assignments (Cheung, 2009). Nevertheless, smartphones also enable the use of social media or social networks by university students that it has somehow become significant to their academic life. Students used social media for a variety of reasons which comprise of study and entertainment purposes as those sites provide a broad range of data which can be retrieved easily and fast (Raut & Patil, 2016). With the increase of social media use by students over past years, there are various impacts, both positive and negative specifically to the students and society in general can be examined.*

**Keywords:** Smartphones, Learning, Social Media, Education, Students

## ***Penggunaan Telefon Pintar dan Media Sosial dalam Aktiviti Pembelajaran dalam kalangan Pelajar Universiti***

### **Abstrak**

*Pemilikan dan penggunaan telefon pintar dalam kalangan pengguna umum, golongan profesional dan juga para pelajar universiti telah meningkat pada kadar yang pesat dan berterusan. Ciri-ciri dan spesifikasi khusus dalam telefon pintar telah melancarkan aktiviti pembelajaran dalam kalangan penuntut universiti. Tulisan ini akan memberi gambaran tentang aplikasi dan kesan teknologi komunikasi berdasarkan tinjauan susastera yang utama. Dapatan kajian oleh Cheung (2009) menunjukkan telefon pintar telah digunakan untuk merakam isi kuliah, mencari maklumat teras dan mengirim nota kepada rakan sepengajian yang tidak dapat menghadiri kuliah. Selain itu, telefon pintar telah menjadi platform bagi para pelajar menggunakan media sosial yang seterusnya memberi kesan yang signifikan dalam konteks pembelajaran dan prestasi akademik. Rumusan dari kajian oleh Raut & Patil (2016) menunjukkan variasi dalam kegunaan media sosial dalam kalangan pelajar, terutamanya untuk tujuan pembelajaran dan hiburan kerana data yang tersedia adalah mudah diakses dengan pantas. Kesimpulannya, peningkatan dalam penggunaan telefon pintar dan aktifnya kegiatan dalam media sosial telah memberi kesan positif dan negatif kepada para mahasiswa dan juga masyarakat secara umumnya.*

**Kata Kunci:** *Telefon pintar, Pembelajaran, Media sosial, Pendidikan, Mahasiswa, Pelajar Universiti*

## **Introduction**

Smartphones have taken an important place in every person life. People have adopted the use of this state-of-the-art communication technology as one of the most vital part in their everyday life. Smartphones is an evolution of mobile phones with basic communication features and having additional features to make it to operate like a computer with advanced computing technology and more connectivity. These characteristics have

facilitated a variety mobile services and applications and as a result nurture the usage routine of smartphone users.

Smartphones were released back then in year 2000 by Ericsson with their model R380. This is the first phone to have gone through an assimilation process of the combination between a regular mobile phone and a computer features to make it to become a smartphone (Alfaraweh & Jusoh, 2014). With a high demand in the market by users, smartphones have become a necessary device. Today, the usage of smartphones has replaced the use of desktop (computers) or laptops. Smartphones usually comes in a small size that fits perfectly in a pocket and can carried out computers activities such as information sharing, emailing purposes, chatting, opening and editing documents, online purchasing and banking. There are smartphones that comes with intricate applications such as a camera that can works as a scanner (2-in-1). Numerous applications are being provided by smartphones according to a variety range of usage circumstances that they have become a lifestyle.

With the impact of globalization, the development of social media has changed the way users experience the Internet. This is because; social media is constructed on the idea of interaction between people besides giving them the authority to share everything via the Internet, making the world to become borderless (Raut & Patil, 2016). In addition, social networking has a significant effect on our lives in assisting working adults in economy, political and education. By this means, social media is not only restricted to professionals or elders, but it is also widely embraced use in the education sector by the students (Raut & Patil, 2016). This paper will review and situating smartphones and social media usages in the higher education setting.

## **Locating Smartphones And Social Media Usage In Higher Education**

University students and the usage of smartphones have gradually risen over the years and it is reliable major source of information (Keller, 2011). These types of devices are popular among students as it provides variety of choices especially for learning purposes. Park and Lee (2012) in their

study found smartphones owned by almost every student at college level. Smartphones are the evolved pieces of technology that have the potential to support student learning in the classroom. Students are potentially use smartphones to record a lecture, search for definitions, or send notes to students. This allows collaboration with students through online to complete homework assignments (Cheung & Hew, 2009). On the other hand, Kim & Altmann (2013) found that students from Education and Engineering faculty have 80 applications on their smartphones where 16% of it are related to learning (education). In addition, social media also is exposed to educational purposes among students (Raut & Patil, 2016). Moreover, students usage of social media encompass numerous reasons which comprise of study and entertainment purposes as those sites provide a broad range of data which can be retrieved easily and fast (Raut & Patil, 2016).

In foremost, students use smart phones mostly for entertainment, but it is also use for learning and teaching purpose; however, there are indirect effects that smart phones give that would be valuable and advantageous. The changes from traditional or normal classroom required into a mobile-friendly classroom would be the usage of smart phones where both teachers and students are accessible to teaching material and learning at any time. The ability of smartphone to be used as a classroom learning tool since it provides greater value to both students and teachers (Cheung & Hew, 2009). Interestingly, Cochrane & Bateman's (2010) studies showed that a university in Australia has given the chances in developing the learning culture in higher learning institutions where it allows students to interact in reflective inquiry and problem solving via online. Solvberg & Rismark (2012) explored that university students in Norway utilized these mobile devices in their sociology courses by creating video lectures that could be access with tablets, smartphones and other mobile devices. Moreover, technology is used to accommodate students with learning pattern in strengthening their knowledge seeking which allows students to blend teaching and discussion with the teachers at the same time thorough online which can boost their academic performance (Raut & Patil, 2016).

Aoki and Downes (2004) on their research state that mobile phone

usage is a less studied area especially on social context in compare to the technical and policy part of mobile technologies. There is less research on mobile phones that tells about the cultural value and social purpose. Nowadays, the research on how people use mobile phone id a daily basis is becoming more in number and is available for others to study (McGuigan, 2005).

Various studies are focused on the usage on mobile phone rather than doing a research on how mobile phones could become a tool on student education in formal and informal setting. In addition, research that discussed the benefits and limitations of smartphone report very little empirical evidence to support their claims (Merchant, 2012).

### ***Smartphone Usage and Learning Environment***

Colleges now has realized the potential of using mobile gadgets in education. At present, they are many universities developed their online portal that allows students to access campus matters and other related information via their mobile phones. Ryerson University of Canada through their online library services since 2008 claimed that they have 25,000 student bases in their portal which has been created from the main library website. The mobile library website allowed student to look up library hours, workshops schedules, and basic library contact information. Given the state of the usage or smart phone among university students that is leaning towards mobile campus, it is logical to consider that smart phone has becoming an advantage towards the students (Wilson & McCarthy, 2010).

Solvberg & Rismark (2012) emphasized the usage of smart phone among university students in Norway enrolled for undergraduate sociology course observed that instructors' lectures using video over gadgets such as tablets, smart phones and other mobile devices. They also created three learning environments: i) The first learning atmosphere gives the chance for students to watch a live lecture over computers from another location. During lecture, students were given the chance to interact and ask question at real time lecture. However, most of them feeling uncomfortable since the sessions were camera recorded. With this setback, students alternatively can view from home without being

present in campus. ii) The second learning situation is students are given the choice to submit assignments and coursework to the instructor via the Internet in the campus area due to the flexibility of students and the access working schedules. iii) The third learning space has given the students the access lectures in off-campus mode. From the finding observation, students were happy that they could read and listen to the audio from the lectures in a car or public transport. Hence, that findings matched with multitasking in their daily lives without missing important class content (Solvberg & Rismark, 2012).

### ***Smartphone Application in Learning***

Using the old method of learning has no longer become the major part in learning. Learning is a way for the brain to accept new process and information to make it grow. Mobile gadgets are not being applied like the ones we use desktop or laptop computers. The learning aspect on a mobile gadget and smart phone it is totally different. The mobile phones are now common in the 21st Century as most mobile gadget is equipped with processors that could function like a personal computer (Grimus, 2008). It has been trivial for learners to use mobile devices for educational purposes. Mobile gadgets usage in informal learning has been wide ranging by enthusiast. It also has been referred on the vital part of the learning process from the point of informal context of students' everyday routine (Grimus, 2008). Mobile technology has open opportunities for teachers and students using wireless technology to access informational materials regardless location and time. The introduction of smart phones in learning promotes new alternative in teaching and class activities. Mobile learning has given the chance for the community to learn and supports online with countless opportunities (Grimus, 2008).

Research by Katz (2005) discovered that mobile phones were helpful for Internet access activities including connecting and tutoring students and lecturers. Cochrane & Bateman's (2010) observed how university students in Australia used smartphones to support the learning activity where students exposed to reflective inquiry and problem solving using social networking applications. It was reported that lecturers and students needed training to use smart phone application on mobile Web 2.0 to successfully support reflective discourse and inquiry over a technology.

Huang, Wu and Chen (2012) observed the use of smartphones in creating sales and marketing course among undergraduate and graduate university students in creating QR code for the students to access and submit their assignments over the smartphones.

### ***Social Media and Learning Activities***

Of late, it is common to our knowledge that university students and educators owned smartphones and used social media for education purpose. In addition, there are even applications and web tools to be use in educational framework. There are also certain faculty that uses a multiple range of software tools and free web applications in order to augment learning activities, communication and engagement to increase higher rates of social media usage especially in higher education classroom (Raut & Patil, 2016).

Furthermore, in compare to traditional learning method where it does not provide chances for learners to develop and maintain their own learning activities, social media platform of learning on the other hand makes learners to be able to have control on their own learning activities (Raut & Patil, 2016). The use of technology to accommodate students' different learning style is not a new issue. Social media applications is capable because they provide a variety of tools that learners could chose and assimilate it to best match their individual learning styles that as a result would boost their academic performance (Raut & Patil, 2016).

### ***Gender Differences in Smartphone Usage***

Study by Odell, Krogen, Schumaker & Delucchi (2000) proposed that male is much more proficient in using the internet rather than females. They also discovered that female colleges students were tending to access the Internet for academic activities while male college students were more interested on entertainment.

Findings also mentioned that male's college students are more positive, uses the internet for gaming purposes and has lower anxiety levels rather than females' college students. More recent studies correlated to gender differences on Internet use and computer tells that these differences appear to be disappearing as kids are showed in their younger age on

applications of information and communication technologies. Mobile devices, in particular smart phones equipped with certain features to motivate users to access the Internet application for the problem-solving purposes.

Youth nowadays spend most of their times looking at their smart phone, playing games and listening to music, but there are prominent gender various activities such as texting, gaming, photo sharing and so forth. Gender differences can be seen by demographic factors such as age, location and usage purposes. Boys are faster in terms of gadgets compare to females because boys are more active in free exploration and learning new applications rather than female. Girls are not good on technical skills, but they love their smart phones, it is only a matter of discovery with their gadgets and technology behind it to elevate their confidence in technology. Taking notes on updates and news on technology do not need all the technical skills. In pursuing and support of girl's technical knowledge, constant persuasion and exposure to smart phones can open girl's mind (Grimus, 2008). Interestingly Tulane & Beckert (2010) discovered the dissimilarity in mobile phone usage among males and females reported female texted more than men since it is a form of relaxation (Beaver, Knox & Zusman, 2010).

### ***Impact of Social Media on Students***

#### ***a. Advantages of using Social Media in Learning Activities***

Social media has improvised our world to become much better in so many aspects. For example, we can retrieve information and knowledge which would become impossible back in the days and it has assisted our lives by the quick and efficient process.

Social media has facilitated students especially regarding their works and skills. Students who spend much of their time working with new technologies would eventually develop more familiarity with computers and other electronic devices (Raut & Patil, 2016). This action somehow benefits them because they will develop special skills when they focus on technology in education and business and this will help them to survive in the career world. Therefore, students who excel and have additional skills would be highly to be seen by the industry's due to their good skills

in information technology. Nevertheless, Raut and Patil (2016) stated that some students who are keen on social media can influence the public with certain issues that can bring awareness and help solved the problems besides developing leadership skills among them. Apart from that, Raut and Patil (2016) suggested that students can learn different layouts and creative matters on social media. They can upload pictures or videos as a platform for sharing purposes. Being able to get feedbacks from friends and family via social media on their creative outlets helps students to refine and develop their artistic abilities and provide much needed confidence or assist them in determining the right career path they may want to pursue.

*b. Disadvantages of using Social Media in Learning Activities*

The most disadvantaged of social media would be the addiction on the constant urge to check on social media such as Facebook, Twitter, LinkedIn and other social media for updates (Raut & Patil, 2016). This habit could lead to a negative mindset among students that would affect concentration on studies, taking part in sport activities and face to face communication. According to Raut and Patil (2016), the awareness regarding the risk of social media is hard to achieve due to the lack of education among the society. Besides that, the ability to retain information has decreasing and the enthusiasm for students to spend more time researching and surfing for good information also decline due to the accessibility of information on social media (Raut & Patil, 2016). Raut and Patil (2016) believed that students who attempt to multi-task, such as checking their social media accounts while studying, show a downfall on their academic performance. This is because, the ability to focus on specific task is being reduce due to the distractions from various applications such as YouTube, Facebook or Twitter.

In addition, the more time a student spends on social media, the less time they would spend on socializing. This is due to the lack of body language, gestures and other nonverbal cues, such as voice tone and face expression making social networking sites are not a suitable replacement for face-to-face communication (Raut & Patil, 2016). For that reason, students who spend most of their time on social media have less ability in interpersonal communication and soft skills. The openness

of social media has made the students to ignore in filtering information that they post via social media. Consequently, when they apply for a job, employers usually will go through their applicant's profile including what is being posted online before deciding for job offering. This situation can affect their chances in getting the job (Raut & Patil, 2016).

## **Conclusion**

This paper has examined the smartphones usage in learning activities via social media among university students. In addition, the review has identified the impact of social media towards students' academic performance. Smartphones usage among university students is acceptable as it can bring advantages to their academic performance. Social media has impacted the students' life both positively and negatively. Social media has facilitated students especially regarding their works and even skills. Students who spend time on social media would find themselves to be mastering the technology in helping them to secure a job or career (Raut & Patil, 2016). They also suggested that students can learn various layouts and creative elements on social media, as well as they can upload pictures or videos as a platform for sharing purposes. Disadvantages could be seen from social media such as Facebook, Twitter, LinkedIn and other social media updates as a form of addiction that distracted them from studying, taking part in sports and socialize with other people (Raut & Patil, 2016). They also believe that students who attempt to multi-task, such as checking their social media accounts while studying, are dependable to a downfall on their academic performance.

From this review, it can be concluded that smartphones are useful in the educational field as it brings various benefits and advantages (technology advancements and social media) especially on the additional features in supporting students' engagement in learning. Park & Lee (2012) in their study found that smartphones is owned by almost every student in college level. This is because smartphones and other latest communication such as tablet computers and other mobile devices are evolved pieces of technology that potentially can support student learning in the classroom. Students may potentially use smartphones to record a lecture, search for definitions, or send notes to absent students, as well as use the

collaborate with other students electronically to complete homework assignments via online. (Cheung W. &, 2009). Apart from that, social media also is being used in the educational field by the students (Raut & Patil, 2016). Students' usage on social media encompasses numerous reasons ranging from study to entertainment purposes due to a broad range of data which can be retrieved easily and fast (Raut & Patil, 2016). In addition, social media has their own strength which can promote a variety of tools that learner can combine to blend in and suit their learning style and as a result would boost their academic performance (Raut & Patil, 2016).

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