



“The Use and Effect of Smartphones In Students’ Learning Activities: A Case Study Of Punjab Daanish Higher Secondary School Dera Ghazi Khan”

Muhammad Hashim¹ Gomal University, Dera Ismail Khan, KPK
Abdul Rehman² Gomal University, Dera Ismail Khan, KPK
Shahida Bibi³ Gomal University, Dera Ismail Khan, KPK

Received: 04-11-2022
Accepted: 20-12-2022
Published: 31-12-2022

KEY WORDS

**Smart phones,
Mobile learning,
Punjab Daanish
School Dera
Ghazi Khan.**

ABSTRACT

The current century is considered the century of modern era which changed the lives of the people. The modern era developed new ways and means for the people who are linked with this world. The smart phone is one of the greatest inventions of the world which revolutionized the lives also. The use of smart phone in education also played vital role in this field which enhanced the skills of learners as well as their abilities to find and explore new ways to meet the need of the hour. The aim of this study was to enhance the skills of learners by using smart phone in their learning to explore the material in new ways and means. The researcher used questionnaire to collect the data from respondents who were 118 in number and worked with the researcher in this process of filling the questionnaires. The purpose of this study was to use new technology in institutions and among learners to know the new innovation in their practical lives to gain the skills and abilities. The implications of this study were to note the important features of learning through the use of smart phone which learners accepted it by using different tactics to implement practically. The findings of this study proved that the use of smart phone played key role in the lives of learners who got advantage from this technology and improved their faculties to use in practical sense to find new ways and means in their relevant fields. The study also proved some negative effects of using smart phone on the basis of interruption of electricity, phone calls and non-availability of Wi-Fi during teaching learning process. The analysis of data was also completed with the help of SPSS. This study recommended that it will be helpful for learners to spike the use of smart phone in the learning process of students to enhance their skills and to find new resources in the field of education as well as their relevant subjects.

Introduction

Prensky (2001) contended 20 years before that “digital natives” who use smart phones in their lives and who are interested in smart phones is called “native speakers” who know about the language of computer with multiple use of different programs for learners to install different applications while use of its practical implication in their daily lives. The internet, video games and other entertainment applications also become useful for learners to practice their computational work with the use of these resources. (2001, p. 1-2). Obviously, period would be improved expended letting the usage of personal electronic devices through these so called digital natives for pedagogical determinations since they are so closely linked to learners' lives, in its place of so called, digital settlers ‘policing’ the usage of personal electronic devices about the institute day clock.

Smart phone is used in institutions for educational activities play key role in classes for learners to take part in academic. Phones are the part of the modern era which is expanding day by day even within the schools for smooth education for learners to enhance their learning and to get new ideas from the learning environment. These elements matter a lot in the lives of the people who use their skills to enhance the capacity regarding their learning. Every technology has advantages and disadvantages for the whole world. Students get benefit from this technology to use in their daily life as well as in their learning.

A learner uses the technology to use the skills to do the work according to the desired results. The learning activities become fruitful with the help of modern technology which has a key role in the advancement of learning among learners to excel in the field of learning. Smart phone has different features and different versions in the software which students use in their academic activities. The modern technology plays key role in learning of learners to use different software in learning. Learning is enhanced with the

use of modern technology which has an impact on the learning of learners through the skills of their capabilities. A capable person is judged by the skill and work in which he works. The smart phone can play an integral part in the lives of the learners to use it with modern trends and to use modern gadgets which is the need of the hour.

Collins and Halverson (2018) listed the subsequent belongings by way of possible barricades to institution and teachers and wish to assimilate 21st century skills into class rooms: (price and entrée, class room organization, what computers can't impart, tasks to teaching, expert and teaching, and valuation) (p. 37). Moreover, study has exposed that care is a main anxiety, by way of matters such as cyber bullying, sexting, duplicitous, and privacy have constant also protuberant places in daily news and media rumors, creating a culture of fear among teachers and managers and probable decelerating depressed or earth-shaking tactics for addition till there are real tactics in habitation to contract with such difficulties.

Objectives:

1. To explore the impact of smart phones during academic activities and their effects on learning.
2. To check the worth and validity of using smart phones while attending online lectures during academic activities for higher secondary class learners.

Research Questions:

1. Is there any significant relation existed in the interest of students in the use of smart phones and to enhance their learning activities?
2. Is there any significant relation existed to the impact of smart phones on changing the attitude of learners and enhances their educational activities?

Significance of Study:

This study is to explain the teaching tactics of higher secondary classes while using smartphones to create conducive learning environment. It provides the real response of learners about this type of technology which is beneficial for students to improve their skills with the advancement of technology. It contributes valuable information for the researchers to make valuable studies on technology. This study fills the gaps of previous researches towards smartphone usage and its importance in higher secondary schools.

LETRATURE REVIEW:

The 20th century is an age of knowledge and skill done which entire creation is creation development through period. It similarly succeeded in each arena of lifetime to encounter the wants of the period. Teaching is the support to mildew character of persons aimed at flattering decent people of the country. It may not be deprived of in the arena of teaching that technology founded education has an optimistic result on the students (Albirini, 2006).

There are dissimilar phases of Information Communication Technology (ICT) which has three main phases are addition, improvement, and completing. The 1st phase is used to device the correct belongings for the right usage to advance assistances of learner's accomplishment. The 2nd method of ICT highlights the subject which is presented. 3rd and last phase of Information Communication Technology (ICT) is used to help and provision learner's education. It improves the facility of learners to find substantial and connected evidence by the technology and they can too direct emails from their families and appearance for new foundations of material to achieve their mission within an assumed time (Herman's et.al, 2008).

The educator is similarly content to usage progressive technology in his approaches and technology to records wanted consequences. It is an informal foundation to find out substantial for his up to date information to improve the abilities of students. The conservative educator also gains this technology and develops a miracle to usage it

by you. It too variations the attentions of the educator and he impressions desire to he also assistances the learners to usage it in an advanced way. Every creation has its position but the use of specific technology is the foundation of novel habits for everybody to contest for the creation and develop it historical of worldwide community (Capan, 2012, Virkus, 2008;; Dudeney, 2010, Zhang, 2013).

The imaginable effect of mobile phones on advanced teaching and their influence on lifetime knowledge chances is indistinct also is a developing arena of education (Kukulka-Hulme, 2007). This is not astonishing so instructors have careful by means of mobile devices such as smart phones in learning assumed their reasonable, prevalent also applied meanings (Ismail, Bokhare, Azizan, & Azman, 2013; Pullen, Swabey, Abadooz, & Sing, 2015). The petition issue for education complete smart phones and chiefly over apps would be the affluence and suppleness obtainable through mobile education. It reduces fences characteristic in old-style actions that used to be accepted available in educational institutions (Valk, Rashid, & Elder, 2010). Though, Abdullah, Sedek, Mahat, and Zainal (2012) described so university scholars frequently usage their smart phones for individual communiqué rather than for education. A current research completed on college learners by Tossell, Kortum, Shepard, Rahmati, and Zhong (2015) initiate that smart phone usage was apparent by way of promising proceeding to education nonetheless future exposed learners observed smart phones as harmful to their instructive objectives in the expiration.

Method of Research:

The distinctive in the current research is to mending also refining the outcomes of students of Punjab Daanish School Dera Ghazi Khan taking place the use of smart phones for their learning activities. Therefore, the distinguishing this research is to repair, so the method of this research is survey study by questionnaire. The questionnaire is distributed to survey the usage of smart phones in educational activities. The learners approved this method with the cooperation of their resource persons to use it in a comprehensive way to meet the learner's needs to enhance the

capabilities in their learning to utilize it in a positive sense. Smart phone technology will play an integral part in the lives of learners to cope with the modern needs to make it the trend of modern day which will affect a major role in the lives of learners to do it in a comprehensive way. All the resources of smart phone proved valuable for learners to understand the basic concepts of their learning to understand in a better way and learn in a good way. This study will keep a great effect on the learning of learners to meet the challenges of the time to use it in a conceptual way for better understanding and to cope with the modern trends of the time to utilize it in a positive way. Another factor in the form of different versions of technology played key role in learning to implement the resources in a positive way. These resources proved valuable for learners to implement the use of technology in a good way to meet the standard of their learning. During the application of smart phone technology, the learners were given smart phone to laden with lecture resources and to usage it toward admittance the stage. Every stage played key role in the learning of learners according to the use of smart phone technology which played key role in the learning of learners to enhance the knowledge and different functions of technology in the form of new versions which created new ways of learning to implement in their daily usage and to make an important role for their practical work. It will be utilized in different ways to meet the need of the time for learners to use it in their relevant fields of profession as well as with their studies. Consequently, it is commanding to distinguish how they also usage a smart phone and its consequence on their educational activities.

Population:

The subject of study is the secondary and higher secondary level of Punjab Daanish School Dera Ghazi Khan. There were 392 students that involved of 9th, 10th, 11th, and 12th, class in academic year 2020/2021. The data of student's class wise is given as under:

Table 1: Study of population.

Number	Programs	Population
(i)	9 th class	109
(ii)	10 th class	96
(iii)	11 th class	102
(iv)	12 th class	85
Total		392

SAMPLE:

In this research, the scholar designated a sample size with orientation to the sampling relations planned by Alreck and Settle (by way of cited in Ankrah, 2014, p.124). "They discussed it with dissimilar population size; a sampling ratio of 30% is suitable for a population of less than 1,000; a sampling ratio of 20% is passable for a population amongst 1,000 and 10,000 and a sampling ratio of 10% is ample for a population larger than 10,000. Only minor portion of the whole population commonly delivers enough depiction of the group as a whole and it is accurate sufficient to improper choices on the outcomes by much self-confidence". The scholar, consequently, designated a sample size of 118 which is 30% of the 392 of learners from Punjab Daanish School Dera Ghazi Khan. This research assumed a convenient sampling method. The logic behindhand the selection of sampling techniques which is the detail that the Daanish school learners often remain busy, they have assignments on daily basis and for that stuff have incomplete time at their own to do. It might be so tough for the learners to concise portion of their full plan to answer questionnaires hereafter, simple random sampling which is recognized to have very observed impartiality in terms of statistics collection which was not promising for current research. Maximum of the learners most of the do not take their assigned work seriously; it is an easy way for researcher to use simple random sampling. It was a perfect for the scholar to assume convenient sampling where learners were accessible at the point of data gathering, which were included in the study. A questionnaire was developed for this research. The data collection was examined which was by means of the (Statistical Package for Social Science) SPSS. Descriptive and inferential statistics were used for

the current study. For relaxed clarification of data, pie chart, and tables were used to current data of results.

Research Tool:

The research questions refer to the usage of smart phones in learning to enhance education in Punjab Daanish School Dera Ghazi Khan. The data was gathered of year 2020-2021 of students of Daanish School Dera Ghazi Khan as primary source of data. The data of students about learning with help of smart phones was collected by questionnaire. Questionnaire was developed to answer the following questions.

1. Is there any significant relation existed in the interest of students in the use of smart phones and to enhance their learning activities?
2. Is there any significant relation existed to the impact of smart phones on changing the attitude of learners and enhances their educational activities?.

ANALYSIS OF DATA:

It is authenticated Table 4-1, 62 (52.25) % correspondent find It is easy to use smart phone for reading, 45 (38.1) % of correspondent were agree to this statement, 7 (5.9) % were neutral to given statement, 4 (3.3) % correspondent were disagree and 1 (0.8) % were strongly disagree. It is indicated from the above responses that smart phone usage is easy for reading purposes by students. Again according to statement "Computer skills not necessary for smart phone usage." were 29 (24.1) % strongly Agree, 58 (49.1) % were Agree, 20 (16.9) % were neutral, 5(4.2) % were disagree and 6 (5.08) % were strongly Disagree. It is indicated from above responses that majority of correspondent showed there is no need of special computer literacy while using smart phone. Again it is indicated from statement "Internet material can be retrieve using smart phone." 58 (49.1) % were strongly agree, 32 (27.1) % were Agree to the statement, 20 (16.9) % were neutral to this assentation, 7 (5.9) % were Disagree and 1 (0.8) were strongly disagree. It means it is very easy approach with the help of smart phone for study material. Again the statement "Smart phone interfaces

flexible and user friendly and easy to use it" 27 (22.8) % correspondent were strongly agree, 48 (40.6) % were Agree to statement, 24 (20.3) % showed neutral behaviour for statement, 14 (11.8) % were Disagree to given statement and 5 (4.2) % were strongly disagree to statement. It means mostly respondent were in fever of the given statement.

Table 3: Respondents are perceived ease of use of smart phones in educational activities

S. No.	Factors	Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree
1	Smart phone is the easiest way of reading.	62 (52.5) %	45 (38.1) %	7 (5.9) %	4 (3.3) %	1 (0.8) %
2	Computer skills not necessary for smart phone usage.	29 (24.1) %	58 (49.1) %	20 (16.9) %	5 (4.2) %	6 (5.08) %
3	Internet material can be retrieve using smart phone.	58 (49.1) %	32 (27.1) %	20 (16.9) %	7 (5.9) %	1 (0.8) %
4	Smart phone interfaces flexible and user friendly and easy to use it.	27 (22.8) %	48 (40.6) %	24 (20.3) %	14 (11.8) %	5 (4.2) %
5	Smart phone for educational activities do not come technical issue.	33 (27.9) %	27 (22.8) %	23 (15.5) %	26 (22) %	9 (7.6) %
6	Interaction with the smart phone for educational purposes is understandable and clear.	46 (38.9) %	37 (31.3) %	17 (11.4) %	4 (3.3) %	14 (11.8) %

Furthermore according to statement "Smart phone for educational activities do not come technical issue." 33 (27.9) % were strongly agree, 27 (22.8) % were agree to given statement, 23 (15.5) % were neutral, 26 (22) % were Disagree to statement and 9 (7.6) % were strongly disagree. It is indicated from results of this statement most of Correspondent were in favor of statement. And according to statement "Interaction with the smart phone for educational purposes is understandable and clear." 46 (38.9) % were strongly agree to statement, 37 (31.1) % were agree to statement, 17 (11.4) % showed neutral behaviour to this statement, 4 (3.3) % were disagree to statement and 14 (11.8) % of correspondent showed strongly disagree. It means

most of correspondents were in favor of the given statement. In summary, it is affirmed that the students of Daanish School found the use of Mobile phone and technology easy to understand the academic activities in a good way so that they might use it in a proper way in future. These findings proved valuable for learners to use their learning material in digital form. Through this, the students found suitable this source for learning activities and became a tendency among the students. These conclusions supported the work of Iqbal and Bhatti (2015) , through which it exposed that mainstream of defendants found this way easy to use smart phone which enhanced the use of mobile phone and technology. The findings proved valuable for generalization and in consistent form with the work of Ifeanyi and Chukwuere (2018) that mostly learners responded well about the use of smart-phone in their learning activities to get the better results. This type of awareness was also obvious in the work of Sarfoah (2017) where maximum of the defendants agreed to use smart-phone in their learning for easy and understandable method.

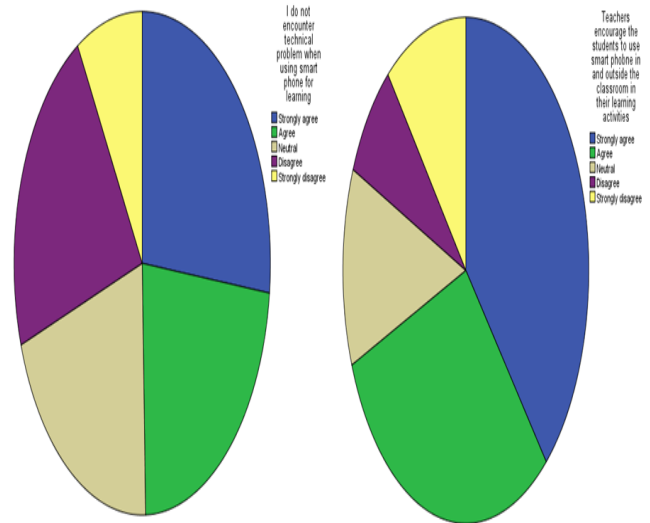
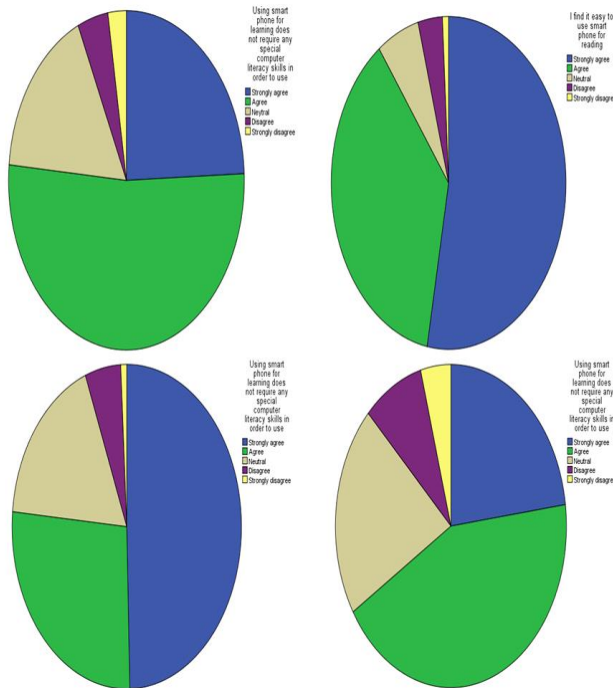


Figure 1: Respondents are perceived ease of use of smart phones in educational activities
APPARENT WORTH OF SMART PHONE IN STUDENT'S EDUCATIONAL ACTIVITIES:

Use fullness of smart-phone to perceive the behavioral intention of learners in academic activities to use evidence system of Davis (1989). Sarfoah (2017, p.) declared that in “the technological receipt to measure different factors which could impact on the adopted method. It developed a positive approach among students to enhance their learning potential in their academic activities. The role of smart-phone played an important role in the lives of the student with the modern trend and innovation of technology.



In Table below illustrates that “Test and quiz can be done easily with the help of smart phone.” 59 (50) % correspondent were strongly agreed, 46 (38) % were agreed to above statement, 8 (6.7) % were neutral to statement, 2 (1.6) % were disagreed, 3 (2.5) % were strongly disagreed. It means it is easy way to attempt tests anywhere and anytime with the help of smart phone. According to statement “For studies smart phone saved me for purchasing costly laptop”. 47 (39.8) % correspondent were strongly agreed, 43 (36.4) % were agreed to statement, 16 (13.5) % were neutral to given statement, 6 (5) % were disagreed to statement and 6 (5) % correspondent were strongly disagreed. It means smart phone saved heavily costs of laptops for studies. Further according to

statement “Smart phone helps me online quick access to information”. 75 (63.5) % correspondent were strongly agreed to statement, 32 (21.1) % were agreed to statement, 7 (5.9) % were neutral to statement and both disagreed and strongly disagreed were 2 (1.6) % each. Also according to statement “Smart phone enabled me gain extra skills outside and inside the class room”. 45 (38.1) % correspondent were agreed and strongly agreed to statement each, 16 (13.5) % showed neutral behaviour, 8 (6.7) % were disagreed and 4 (3.3) % were strongly disagreed to statement. It means smart phone is help full tool to gain extra skills inside and outside the class room. Also the statement “Smart phone helped me to take snapshot of material which I cannot memorize in later date”. Contain results 36 (30.5) % were strongly agreed to statement, 49 (41.5) % were agreed to given statement, 22 (18.6) % indicated neutral behaviour, 9 (7.6) % were disagreed and 2 (1.6) % were strongly disagreed. It means smart phone is use full device to take snapshot for further use.

Table 2: Respondents' apparent worth of smart phone in their educational activities

SR.No	Factors	Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree
1.	Test and quiz can be done easily With the help of smart phone.	59 (50) %	46 (38.0) %	8 (6.7) %	2 (1.6) %	3 (2.5) %
2.	For studies smart phone save me for purchasing costly laptop.	47 (39.8) %	43 (36.4) %	16 (13.5) %	6 (5) %	6 (5) %
3.	Smart phone helps me online quick access to information.	75 (63.5) %	32 (21.1) %	7 (5.9) %	2 (1.6) %	2 (1.6) %
4.	Smart phone enabled me gain extra skills outside and inside the classroom.	45 (38.1) %	45 (38.1) %	16 (13.5) %	8 (6.7) %	4 (3.3) %
5.	Smart phone helped me to take snapshot of material which I cannot memorize in later date.	36 (30.5) %	48 (41.5) %	22 (18.6) %	9 (7.6) %	2 (1.6) %
6.	It enables me to receive notifications by institute easily.	44 (37.2) %	37 (31.3) %	19 (16.1) %	7 (5.9) %	11 (9.3) %
7.	It enables me to learn by websites easily.	46 (38.9) %	38 (32.2) %	24 (20.3) %	8 (6.7) %	2 (1.6) %
8.	Smart phone enabled me gain extra skills outside and inside the classroom.	59 (50) %	21 (17.7) %	27 (22.8) %	8 (6.7) %	5 (4.2) %
9.	It helps me to schedule and activities as a remainder.	40 (33.8) %	42 (35.5) %	30 (25.4) %	2 (1.6) %	4 (3.3) %
10.	Access of my e-mail is easy with the help of smart phone.	64 (4.2) %	36 (30.5) %	12 (10.1) %	6 (5) %	2 (1.6) %
11.	I can store all my lectures with the help of smart phone.	57 (48.3) %	30 (25.4) %	22 (18.6) %	5 (4.2) %	4 (3.3) %
12.	Sharing of material with friends is easy with the help of smart phone.	67 (56.7) %	34 (28.8) %	10 (8.4) %	4 (3.3) %	3 (2.5) %
13.	I can take part in group discussion with the help of smart phone.	51 (43.2) %	34 (28.8) %	18 (15.2) %	12 (10.1) %	3 (2.5) %
14.	For class room activates I can use social media with the help of smart phone.	48 (41.5) %	37 (31.3) %	24 (20.3) %	2 (1.6) %	7 (5.9) %

Also according to statement “It enables me to receive notifications by institute easily”. 44 (37.2) %

correspondent were strongly agreed to given statement, 37 (31.3) % correspondent were agreed to statement, 19 (16.1) % showed neutral, 7 (5.9) % were disagreed to statement and 11 (9.3) % were strongly disagreed to given statement. So it is indicated smart phone enables students to receive notifications by institute easily at any time and any place. Furthermore according to statement “It enables me to learn by websites easily”. 46 (38.9) % were strongly agreed to statement, 38 (32.2) % were agreed to given statement, 24 (20.3) % were neutral, 8 (6.7) % were disagreed and 2 (1.6) % were strongly disagreed. It means smart phone is best source of gaining data from internet easily. Also it is indicated from statement “Smart phone enabled me gain extra skills outside and inside the class room”. 59 (50) % correspondent were strongly agree, 21 (17.7) % were agree to statement, 27 (22.8) % showed neutral behaviour, 8 (6.7) % were disagree to the statement and 5 (4.2) % were strongly agree. It is indicated from the results mostly correspondent were in fever of the statement. According to assertion “It helps me to schedule and activities as a remainder”. 40 (33.8) % correspondent were strongly agree, 42 (35.5) % were agree to statement, 30 (25.4) % were neutral, 2 (1.6) % were disagree to the statement, 4 (3.3) % were strongly disagree to the statement. In the light of above statement it is shown that mostly correspondent were in fever of statement. Furthermore according to statement “Access of my e-mail is easy with the help of smart phone.” 64 (54.4) % correspondent were strongly agree to statement, 36 (30.5) % were agree to given statement, 2 (1.6) % were strongly disagree, 6 (5.6) were disagree to statement and 12 (10.1) % were neutral. It means smart phone is good source of access to e- mail. In the statement “I can store all my lectures with the help of smart phone.” 57 (48.3) % were strongly agree, 30 (25.5) % were agree, 22 (18.6) % were neutral, 5 (4.2) % were disagree and 4 (3.3) % were strongly disagree. It means correspondent were in fever of statement. Also the statement “Sharing of material with friends is easy with the help of smart phone” showed 67 (56.7) % were strongly agree, 34 (28.8) % were agree to statement, 10 (8.4) % were neutral to statement and 4 (3.3) % and 3 (2.5) % were disagree and strongly disagree respectively. It is indicated from the responses many correspondents are in fever of the statement. It is indicated from

the statement “I can take part in group discussion with the help of smart phone”. 51 (43.2) % were strongly agree, 34 (28.8) % were agree to statement, 18 (15.2) % were neutral, 12 (10.1) % were disagree and 3 (2.5) % were strongly disagree. It means smart phone is the best source of on line discussion. Additionally according to statement “For class room activates I can use social media with the help of smart phone”. 48 (40.6) % correspondent were strongly agree, 37 (31.3) % correspondent were agree to statement, 24 (20.3) % showed neutral behaviour and 7 (5.9) % correspondent were strongly disagree. It means majority of correspondent are in fever of statement. The data of above table shows the result of respondents regarding the usage of smart phone in their education actions to enhance the knowledge of the learners and its use in the future to generalize the results for coming generation. Students perform their work regarding test and quiz to solve easily with the help of smartphone through which the students feel easy to do the assigned task in their activities. This study also has some findings with the study of Ifeanyi and Chukwuere (2018) where it is indicated that the learners of South Africa who used smartphone in learning during their academic work because students keep lectures in recorded form, sharing ideas and communicate with peers and also share views about the study of Tuncay, N. (2016), Corbeil and Valdes Corbeil (2007), Almansour and Alzougool (2017), Akaglo and Nimako-Kodu (2019). Smartphone is also helpful for learners in the form of learning activities and students become relaxed and save themselves from purchasing lap-top which are costly for learners. Smartphone helps learners in online access which is rapid and advance in technology to get desired information. This technology is also helpful for students to improvement additional skills in and external the class room to keep the students active and take more interest in gaining new ideas through the use of technology

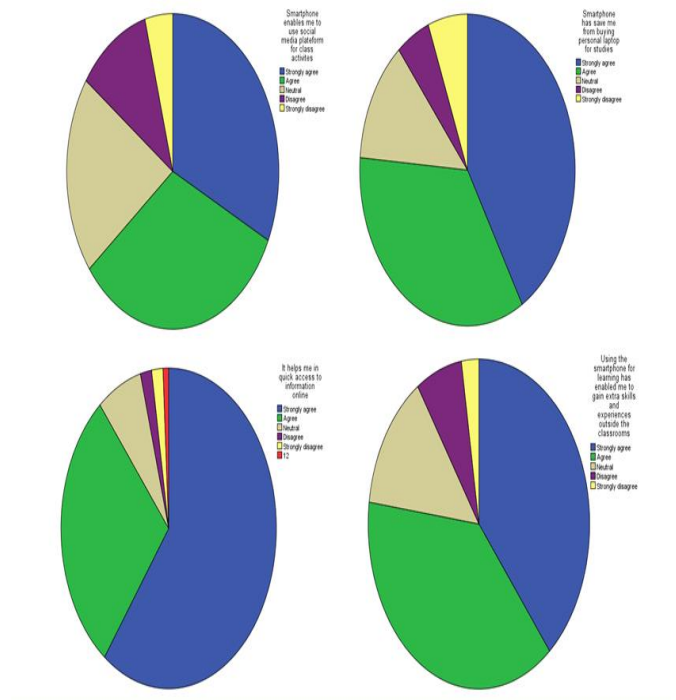


Figure 2: Respondents' apparent worth of smart phone in their educational

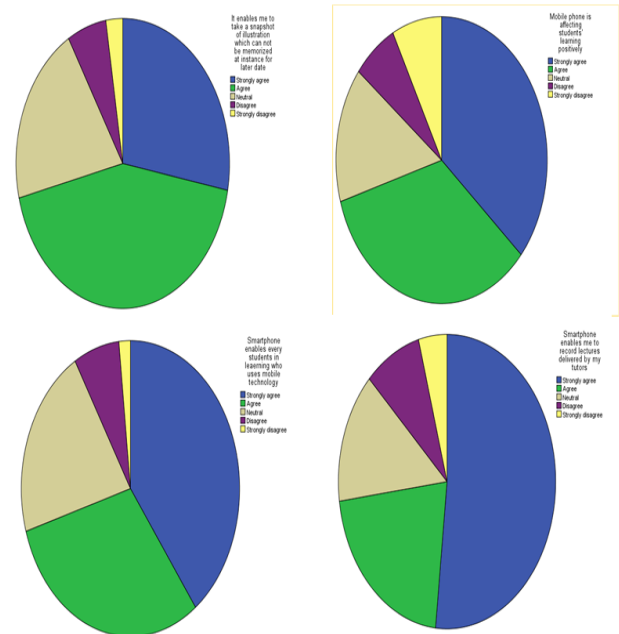


Figure 3: Respondents' apparent worth of smart phone in their educational activities

Conclusion and Recommendations:

The propagation of Internet and Communication Technology has pretentious nearly every feature of education and knowledge, particularly in primary teaching anywhere subjects are taught in mixed or full-fledged online teaching mode. Regarding the results of the study, it is exposed that learners of Punjab Daanish School Boys D.G. Khan are receiving it is informal to usage the smart phone in their educational activities which enhance their perceived practicality of using the smartphone in learning actions. The results can be credited to the detail that it is true that their delivery in digital mode, there is a tendency to use it in the form of technology; they are encouraged to learn while using smart phone to access which is a mutual place of study to deliver the content.

The students of Daanish School highly appreciated the technology which proved valuable to enhance their learning in the field of education. Education played an important role in the lives of learners to use it in a comprehensive way which elaborated by learners in detail. The use of technology is the essential element of learning of learners which is the new and productive source of learning.

The students considered it the most effective source of knowledge in the relevant field of education. The students found developed sources of knowledge to enhance their learning in expanding new concepts to implement in their practical fields. The use of smart phone had vital role in flourishing the knowledge in relevant fields of education and got updated knowledge with authentic sources to implement knowledge in the fields of education. Every student felt it most of the authentic knowledge from this technology to utilize it in the field of education which was in favor of learners to enhance their capacity through different skills in their relevant fields to excel in the field of education. The education getting by the use of smart phone played vital role in the development of learners to use their skills in their work to make it comprehensive and most authentic for achieving goals.



Figure 4: Respondents' apparent worth of smart phone in their educational activities

References:

- Prensky, M. (2001). Digital natives, digital immigrants part 2: Do they really think differently?. *On the horizon*.
- Collins, A., & Halverson, R. (2018). *Rethinking education in the age of technology: The digital revolution and schooling in America*. Teachers College Press.
- Kwon, M., Lee, J. Y., Won, W. Y., Park, J. W., Min, J. A., Hahn, C., ... & Kim, D. J. (2013). Development and validation of a smartphone addiction scale (SAS). *PLoS one*, 8(2), e56936.
- Tagoe, M. A., & Abakah, E. (2014). Determining Distance Education Students' Readiness for Mobile Learning at University of Ghana Using the Theory of Planned Behavior. *International Journal of Education and Development using Information and Communication Technology*, 10(1), 91-106.
- Riskat, M., & Oke, M. O. A. IMPACT OF MOBILE PHONE USAGE ON NCE STUDENTS EDUCATIONAL DEVELOPMENT IN SHEHU SHAGARI COLLEGE OF EDUCATION, SOKOTO.
- Ma'azer Al Fawareh, H., & Jusoh, S. (2017). The use and effects of smartphones in higher education. *Ijim*, 11, 103.
- Mabruroh, C., & Dihan, F. N. (2015, July). Smartphone: antara kebutuhan dan e-lifestyle. In *Seminar Nasional Informatika (SEMNASIF)* (Vol. 1, No. 5).
- Hardy, A., Hyslop, S., Booth, K., Robards, B., Aryal, J., Gretzel, U., & Eccleston, R. (2017). Tracking tourists' travel with smartphone-based GPS technology: a methodological discussion. *Information Technology & Tourism*, 17(3), 255-274.
- Albirini, A. (2006). Cultural perceptions: The missing element in the implementation of ICT in developing countries. *International Journal of Education and development using ICT*, 2(1), 49-65.
- Ghavifekr, S., Razak, A. Z. A., Ghani, M. F. A., Ran, N. Y., Meixi, Y., & Tengyue, Z. (2014). ICT integration in education: Incorporation for teaching & learning improvement. *Malaysian Online Journal of Educational Technology*, 2(2), 24-45.
- Blanchard, M., Metcalf, A., Degney, J., Herman, H., & Burns, J. (2008). Rethinking the digital divide: findings from a study of marginalised young people's information communication technology (ICT) use. *youth studies Australia*, 27(4), 35-42.
- Ghavifekr, S., Afshari, M., & Amla, S. (2012). Management strategies for E-Learning system as the core component of systemic change: A qualitative analysis. *Life Science Journal*, 9(3), 2190-2196.
- Chen, Y., Zhu, C., Yang, Z., Li, J., Jiao, Y., He, W., ... & Guo, Z. (2012). A new "turn-on" chemodosimeter for Hg 2+: ICT fluorophore formation via Hg 2+-induced carbaldehyde recovery from 1, 3-dithiane. *Chemical Communications*, 48(42), 5094-5096.
- Finger, G., & Trinidad, S. (2002). ICTs for learning: An overview of systemic initiatives in the Australian states and territories. *Australian Educational Computing*, 17(2), 3-14.
- Ghavifekr, S., & Rosdy, W. A. W. (2015). Teaching and learning with technology: Effectiveness of ICT integration in schools. *International journal of research in education and science*, 1(2), 175-191.
- Young, S. S. C. (2003). Integrating ICT into second language education in a vocational high school. *Journal of Computer Assisted Learning*, 19(4), 447-461.
- Suyunov, I. (2022). TEACHING AND LEARNING WITH TECHNOLOGY: EFFECTIVENESS OF ICT INTEGRATION IN SCHOOLS. *Science and innovation*, 1(B3), 733-737.
- Capan, S. A. (2012). Teacher attitudes towards computer use in EFL classrooms. *Frontiers of language and teaching*, 3(2), 248-254.
- Virkus, S. (2008). Use of Web 2.0 technologies in LIS education: experiences at Tallinn University, Estonia. *Program*, 42(3), 262-274.
- Dudeney, G., & Hockly, N. (2012). ICT in ELT: how did we get here and where are we going?. *ELT journal*, 66(4), 533-542.
- Zhang, P. (2013). The affective response model: A theoretical framework of affective

- concepts and their relationships in the ICT context. *MIS quarterly*, 247-274.
- Aker, J. C., Ghosh, I., & Burrell, J. (2016). The promise (and pitfalls) of ICT for agriculture initiatives. *Agricultural Economics*, 47(S1), 35-48.
- Lefebvre, J., Pointreau, Y., Rolland, F., Alfonsi, M., Baudoux, A., Sire, C., ... & Groupe Oncologie Radiotherapie Tete Et Cou (GORTEC). (2009). Sequential chemoradiotherapy (SCRT) for larynx preservation (LP): preliminary results of the randomized phase II TREMPIN study. *Journal of Clinical Oncology*, 27(15_suppl), 6010-6010.
- Buijink, A. W. G., Visser, B. J., & Marshall, L. (2013). Medical apps for smartphones: lack of evidence undermines quality and safety. *BMJ Evidence-Based Medicine*, 18(3), 90-92.
- Shiozawa, P., Duailibi, M. S., da Silva, M. E., & Cordeiro, Q. (2014). Trigeminal nerve stimulation (TNS) protocol for treating major depression: an open-label proof-of-concept trial. *Epilepsy & Behavior*, 39, 6-9.
- Kukulska-Hulme, A. (2007). Mobile usability in educational contexts: what have we learnt?. *The international review of research in open and distributed learning*, 8(2).
- Metruk, R. (2019). The call of the MALL: the use of smartphones in higher education. A literature review. *Dilemas Contemporáneos: Educación, Política y Valore*, 6(3).
- Pullen, D., Swabey, K., Abadooz, M., & Sing, T. K. R. (2015). Pre-service teachers' acceptance and use of mobile learning in Malaysia. *Australian Educational Computing*, 30(1), 1-14.
- Valk, J. H., Rashid, A. T., & Elder, L. (2010). Using mobile phones to improve educational outcomes: An analysis of evidence from Asia. *International Review of Research in Open and Distributed Learning*, 11(1), 117-140.
- Abdullah, Y., Sedek, M., Mahat, J., & Zainal, N. (2012). Individual characteristic in online gaming and mobile application use among students in higher education institution: A confirmatory factor analysis. In *Prosiding Seminar Institusi Pendidikan Tinggi* (Vol. 1, No. 1, pp. 345-360).
- Tossell, C. C., Kortum, P., Shepard, C., Rahmati, A., & Zhong, L. (2015). You can lead a horse to water but you cannot make him learn: Smartphone use in higher education. *British Journal of Educational Technology*, 46(4), 713-724.
- Murray, C. J., Lopez, A. D., Black, R., Ahuja, R., Ali, S. M., Baqui, A., ... & Tallo, V. (2011). Population Health Metrics Research Consortium gold standard verbal autopsy validation study: design, implementation, and development of analysis datasets. *Population health metrics*, 9(1), 1-15.
- Haruna, A. S., Abdullahi, A. A., Babayo, B., & Mohammed, M. B. INFLUENCE OF SMARTPHONES ON THE ACADEMIC PERFORMANCE OF STUDENT IN BAUCHI STATE HIGHER INSTITUTIONS OF LEARNING.
- Baader, F., Calvanese, D., McGuinness, D., Patel-Schneider, P., & Nardi, D. (Eds.). (2003). *The description logic handbook: Theory, implementation and applications*. Cambridge university press.
- Sogunro, O. A. (2002). Selecting a quantitative or qualitative research methodology: An experience. *Educational Research Quarterly*, 26(1), 3.
- Neuman, W. L., & Wiegand, B. (2000). *Criminal justice research methods: Qualitative and quantitative approaches*. Boston: Allyn and bacon.
- Kombo, K. D., & Tomp, D. L. A. (2006). Proposal and Thesis Writing Paulines Publications. *Africa ISBN*, 831493719.
- Miller, J. G. (2002). Bringing culture to basic psychological theory--beyond individualism and collectivism: comment on Oyserman et al.(2002).
- Christensen, K., Doblhammer, G., Rau, R., & Vaupel, J. W. (2009). Ageing populations: the challenges ahead. *The lancet*, 374(9696), 1196-1208.
- Van Griethuijsen, L. I., & Trimmer, B. A. (2014). Locomotion in caterpillars. *Biological Reviews*, 89(3), 656-670.

Rehman Abdul et al (2022); The Use and Effect of Smartphones in Students' Learning Activities: A Case Study Of Punjab Daanish Higher Secondary School Dera Ghazi Khan

- Iqbal, S., & Ahmed Bhatti, Z. (2015). An investigation of university student readiness towards m-learning using technology acceptance model. *International Review of Research in Open and Distributed Learning*, 16(4), 83-103.
- Ifeanyi, I. P., & Chukwuere, J. E. (2018). The Impact of Using Smartphones on the Academic Performance of Undergraduate Students. *Knowledge Management & E-Learning*, 10(3), 290-308.
- Sarfoah, E. U. N. I. C. E. (2017). *Smart phone use for learning: A study on university of Ghana Students* (Doctoral dissertation, University of Ghana).
- Davis, F. D. (1989). Perceived usefulness, perceived ease of use, and user acceptance of information technology. *MIS quarterly*, 319-340.
- Yadav, W. K. (2022). Dr. Gajanan S. Futane Dr. Ku. Suchita P. Hadole Dr. Samir Dey.
- Ifeanyi, I. P., & Chukwuere, J. E. (2018). The Impact of Using Smartphones on the Academic Performance of Undergraduate Students. *Knowledge Management & E-Learning*, 10(3), 290-308.
- Tuncay, N. (2016). Smartphones as Tools for Distance Education. *Online Submission*, 6(2), 20-30.
- Corbeil, J. R., & Valdes-Corbeil, M. E. (2007). Are you ready for mobile learning?. *Educause Quarterly*, 30(2), 51.
- Alzougool, B., & AlMansour, J. (2017, May). The use of smartphone for learning activities by university students in Kuwait. In *Proceedings of Teaching and Education Conferences* (No. 4907508). International Institute of Social and Economic Sciences.
- Darko-Adjei, N. (2019). The use and effect of smartphones in students' learning activities: Evidence from the University of Ghana, Legon.
- Bello, A. G., & Aliyu, M. Investigating relationship between using smartphones for learning and academic performance of secondary school students in Nigeria.
- Corbeil, J. R., & Valdes-Corbeil, M. E. (2007). Are you ready for mobile learning?. *Educause Quarterly*, 30(2), 51.
- Alzougool, B., & AlMansour, J. (2017, May). The use of smartphone for learning activities by university students in Kuwait. In *Proceedings of Teaching and Education Conferences* (No. 4907508). International Institute of Social and Economic Sciences.
- Darko-Adjei, N. (2019). The use and effect of smartphones in students' learning activities: Evidence from the University of Ghana, Legon.
- Ifeanyi, I. P., & Chukwuere, J. E. (2018). The Impact of Using Smartphones on the Academic Performance of Undergraduate Students. *Knowledge Management & E-Learning*, 10(3), 290-308.
- Lee, I., & Lee, K. (2015). The Internet of Things (IoT): Applications, investments, and challenges for enterprises. *Business horizons*, 58(4), 431-440.
- Gikas, J., & Grant, M. M. (2013). Mobile computing devices in higher education: Student perspectives on learning with cellphones, smartphones & social media. *The Internet and Higher Education*, 19, 18-26.
- Sarfoah, E. U. N. I. C. E. (2017). *Smart phone use for learning: A study on university of Ghana Students* (Doctoral dissertation, University of Ghana).
- Tuncay, G. S., Demetriou, S., & Gunter, C. A. (2016, October). Draco: A system for uniform and fine-grained access control for web code on android. In *Proceedings of the 2016 ACM SIGSAC Conference on Computer and Communications Security* (pp. 104-115).