Technological Devices: Boon or Bane?

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ABSTRACT

The purpose of the study is to determine the relationship between the level of usage to technological devices and the academic performance of Grade II learners in selected Multigrade School in Hilongos South District, Hilongos, Leyte. The study used descriptive survey design since the researcher used checklist to determine the learner's level of usage to technological devices and survey it used open-ended question to determine how technological devices help the learners in learning. More so, both qualitative and quantitative data were being gathered for the further validation of the quantitative data of the study. The result shows that the level of usage of the learners is at Normal Level. The learners understudy is using technology devices at a tolerable level, that is, 3 – 4 hours in a day. The learners performed well in English with a Closely Approaching Mastery Level in their Quarterly Assessment. The level of usage of the learners to technological devices has a significant relationship with the English performance of the learners. The more exposed the students are to technological devices the more affected their performance in English are. Using to technological devices has a detrimental effect on English performance of the learners. Hence, the parent's guidance to their children is a must. It can be concluded that usage to technological devices can significantly affect performance. As resulted, using to technological devices has a detrimental effect on English performance. The use of television, cellphones, tablets and computers at a regular basis affects the academic performance of the learners. The more they are using technological devices, the more their academics are negatively affected. Hence, parents or guardian of the learners should be watchful to their children so that they can guide and discipline them in using technological devices to evade bane result from these devices.

Keywords: technology, academic performance, grade school, English

INTRODUCTION

Technology has always flourished for the gain of mankind. The major achievements of technology have left man spell-bound and every part of the world today is enjoying the comforts provided by technology. People are interlinked and live in a global village. Technological devices have greatly improved people's lives especially in education. Technological devices have been proven to be useful in education. Children can access the web and get the detailed knowledge about any topic. The educational games help them to perform well in academics. Almost all kids like to play video games and playing such games with their friends and relatives, they learn the competition skills that help them compete with others in the real world (Shyera 2018). Unfortunately, at times children become addicted to such games and devices.

Hosale (2013) in his study found out technological devices addiction can lead to social isolation which is characterized by a lack of contact with other people in the workplace, with friends and in social activities. Moreover, learners are less likely to interact with each other face to face. Additionally, learners become inseparable from their phones because they are so dependent on them and their academic performance will be ignored as they become busy with their gadgets. Technology has been found to have its negative impact on academic performance on most of children. There are many technological devices to which children are addicted. They waste their valuable time on these silly gadgets without worrying about the studies. This has resulted in poor academic performance and has become one of the biggest problems related to technology. Conversely, due to increasing technology, children have been found going away from their moral values. Internet is working as curse for children's character rather than useful for productive manner. Out of the nutshell, some children use it as source of adult content.

There are many possible effects on using technological devices (Kidslox, 2018). Technological devices have become a great tool for learning. One can google any information or attend the course online without leaving home. Yet, technological involvement does not always guarantee the quality of education. Children sometimes overuse technological deviceshttps://kidslox.com/blog/technology-overuse-social-media-addiction/ which affects the learning process in a negative way. Plagiarism and cheating have increased while analysis and critical thinking have declined. This puts the young generation's thinking abilities in jeopardy. Various studies claim that the more students use entertainment technologies like games or social media, the less they perform academically. Instead of reading and doing homework, modern kids indulge in entertainment. A similar situation goes for the Internet: using the Web to search information is linked to higher grades while online gaming or socializing is associated with lower exam results. The reason for it is the distraction caused by games, messages, and videos. Young people have a hard time focusing attention at the lessons and resisting impulsive behavior.

The aforementioned studies reveal that technology is neither all good nor bad in itself. It has a two-edged sword and have to see the relationship between the level of usage on technological devices and the academic performance of the learners and it depends only the way of the users to use it. They have to know how to use it for their benefit and should be responsible in their use of the technological devices. It should be properly used rather than rely on it totally. These problems inspired the researcher to conduct a study about technological devices. The researcher focused on the relationship between the level of usage to technological devices and the academic performance of the learners. With this assumption, the researcher would like to propose an awareness program for the parents on the effects of technological devices in the learners' performance.

Research Questions

The main purpose of the study was to determine the relationship between the level of usage to technological devices and the academic performance of Grade II learners in selected Multigrade School in Hilongos South District, Hilongos Leyte S.Y. 2019-2020.
Specifically, the study sought to answer the following questions:
1. What is the level of usage of the Grade II learners?

2. What is the level of academic performance in English of the Grade II learners in terms of MPS in quarterly assessment?
3. Is there a significant relationship between the level of usage to technological devices and the level of learner's academic performance?
4. How do technological devices help the learners in learning English?
5. Based on the findings of the study, what output/s can be proposed?

RESEARCH METHOD

Research Design
The study used descriptive survey design since the researcher used checklist to determine the learner's level of usage to technological devices and survey it used open-ended question to determine how technological devices help the learners in learning. More so, both qualitative and quantitative data were being gathered for the further validation of the quantitative data of the study.

Participants
There are 5 selected Multigrade Schools of Hilongos South District where the study was conducted namely: Bantigue Elementary School, Cantandog I Elementary School, Manaul Elementary School, San Isidro Elementary School and San Roque Elementary School. There were 40 learners as respondents. They were chosen purposively with the inclusion that these schools were located in different locations, one along the road, near the poblacion and others in far flung areas with the assumption that lesser access to internet would have better lesser effect on the learners' academic performance.

Data Analysis
It presents the data gathered from the elicited responses of the respondents and data retrieved from the data gathered were carefully tabulated, statistically treated and analyzed and has been used as bases for interpretation. Statistical procedure and formula were used to arrive at a reliable conclusion. The statistical tools used in the study are the following:
*   Average Weighted Mean (AWM) was used to determine the level of usage to technological devices of the learners.
*   Mean Percentage Score which was used to determine the level of academic performance in English of the learners on their third quarterly assessment.
*   Pearson's (r) was used to establish relationship between the learners' level of usage to technological devices and academic performance.
*   t-test was used to test the significance of the relationship between the level of usage to technological devices and the level of learner's academic performance in English.

FINDINGS AND DISCUSSION

Results
Level of Usage to Technological Devices. The level of usage of the learners to technological devices was determined using a 20 - item questionnaire. The questionnaires were written using Sinugbuanong Binisaya for the learners to understand. The researcher and teachers concerned then assisted the respondents in case inquiries arise from the learners. The students were asked to rate themselves using a four point Likert Scale based on the frequency of their usage of the devices for specific purpose.

Table 2. Average Weighted Mean of the Frequency of Learners' Usage   to Technological Devices.

Item No.	Indicators	Average Weighted Mean	Rank	Description
1	Mag-gahin og dako nga oras sa pagduwa o pagtan-aw gamit ang technological devices.	2.30	3.5	
2	Makiglalis og ipugos imong gustong buhaton sa maong duwa sa technological devices.	1.98	14	
3	Mobalibad sa imong mga higala sa pagduwa sa gawas kay gusto nimong magduwa o magtan-aw gamit ang technological devices.	1.93	15.5	
4	Kanunay dili mosunod sa mando sa pamilya kay dili ka gustong malangan sa imong pagduwa o pagtan-aw gamit ang technological devices.	2.33	2	
5	Mangilad nga wala nagduwa o nagtan-aw gamit ang technological devices.	2.03	12	
6	Wala nagtagad sa mga buluhaton sa eskuylahan sama sa assignment og project ug uban pa kay sige ka og gamit og technological devices.	2.00	13	
7	Maglagot ug magbagotbot kon limitahan sa ginikanan sa paggamit og technological devices.	2.18	5.5	
8	Dili magtagad sa isigkatawo ug pamilya kay nalingaw ka og sige og gamit sa technological devices.	1.88	18	
9	Makahuna-huna og magduwa o magtan-aw gamit ang technological devices kon walay gibuhat.	1.90	17	NU Normal User
10	Masulub-on kon dili makagamit o makatan-aw gamit ang technological devuces.	1.65	20	
11	Dugay matog o dili matog kay nagtan-aw paka og tv o nagduwa gamit ang technological devices.	2.08	9	
12	Wala nakay pakialam sa imong kaugalingon kay gusto pa motan-aw og salida o magduwa sa imong technological devcices.	2.30	3.5	
13	Magsuway og limit sa paggamit og technological devices pero dili nimo kayang buhaton.	1.80	19	
14	Ang imong pamilya og mga higala ning reklamo nga sige ka gamit sa technological devices.	2.18	5.5	
15	Padayon gihapon sa sobrang paggamit sa technological devices bisan dili maayo ang makuha niini.	1.93	15.5	
16	Magmalipayon ka kon magduwa ka gamit ang technological devices.	2.10	8	
17	Magduwa kauban ang mga higala gamit ang technological devices.	2.15	7	
18	Magsige og duwa bisan sobra na sa oras gamit ang technological devices.	2.43	1	
19	Mo-ikyas sa eskuylahan kay magduwa og mga online games.	2.05	10.5	
20	Molimod nga walay problema bisan og naa tungod sa sobrang paggamit sa technological devices.	2.05	10.5	
	Overall Weighted Mean	2.06		

Legend: n = 40

Rating Scale	Description
3.25 – 4.00	Very Frequent User (VFU)
2.50 – 3.24	Frequent User (FU)
1.75 – 2.49	Normal User (NU)
1.00 – 1.74	User (U)

As shown in Table 2, the learner's level of usage is at **normal level** as indicated by the overall average weighted mean. This means that they have normal usage to their technological devices and on how they use them for specific purposes. From the various indicators used, the eighteenth (18th) indicator had

the highest average weighted mean and followed by the fourth (4th) indicator. These indicated that the learners are in high level of usage to technological devices for playing games without definite number of hours or schedule and that these impede them from doing better things as most of them refuse to do chores for their respective families especially when they are on a game. This outcome implies that playing games are the popular choice of usage of technological devices among pupils and that this result to disobedience of these learners to their respective parents' command.

On the other hand, the indicators with the lowest average weighted was the tenth (10th) indicator and followed by the thirteenth (13th) indicator which had the next lowest average weighted mean. This outcome show that the respondents could not keep themselves from not using any device in a day. The use of technological devices is at its highest level to date and expected to continue to increase as technology becomes more accessible (Poushter, 2016). Moreover, this shows that today's generation of learners are at high level of usage to technological devices that they are used in a day-to-day basis.

The Learners' Level of Academic Performance in English. The academic performance on quarterly assessment of the Grade II learners of identified schools were determined using the standardized unified quarterly assessment for the third quarter of school year 2019- 2020. It was a 30-item multiple choice test. The papers were checked, scored and the mean percentage score were computed for each school.

Table 3. Mean Percentage Scores in English Quarterly Assessment of the Learners

School	Number of Cases	Mean Percentage Scores	Standard Deviation	Description
Manaul ES	8	82.92	8.986	M
Bantigue ES	8	81.25	10.974	M
Cantandog I ES	8	67.50	18.495	CAM
San Roque ES	7	73.33	21.943	CAM
San Isidro ES	9	76.25	22.070	CAM
Overall	40	75.50	17.824	CAM

Legend: n = 40

Rating	Description
80.00 – 100.00	Mastered (M)
60.00 – 79.99	Closely Approaching Mastery (CAM)
40.00 – 59.99	Moving Towards Mastery (MTM)
20.00 – 39.99	Average Mastery (AM)
0.00 – 19.99	Low Mastery (LM)

The table above shows the mean percentage scores (MPS) of the school included in the study. Overall, the result as projected in the table signifies that the learners are at ***Closely Approaching Mastery*** with scattered scores as shown in its high standard deviation value. The result could mean that if the learners are at high level of usage to technological devices their academic performance will be negatively affected as what is shown in table 3 that the learners belong to the Normal Users of the said devices and the overall MPS garnered was 75.50 which belongs to the passing percentage. According to an article established this year 2020 with the title "Negative Effects of Technology in Education" stated that students are not studying using the technological devices, they are interested in checking the posts and status updates of their near and dear ones and having games. This is how technology is becoming a huge distraction for the learners. In this case technological devices are bane to the academic performance of the learners.

The Relationship of the Learners' Level of Usage to Technological Devices and Level of English Performance. The following table presents the correlation of the learners' level of usage to technological devices and their English performance using the statistical tool Pearson Correlation Coefficient. The presentation considers the level of usage per school and the performance per school of the purposively chosen respondents of the study.

Table 4. Pearson r of the Learners' Level of Usage to Technological Devices and Level of English Performance

School	Pearson, r	Strength of Relationship	p - value	Decision
Manaul ES	-0.301	Weak Negative	0.469	Not Significant
Bantigue ES	-0.710	Strong Negative	0.048	Significant
Cantandog I ES	-0.795	Strong Negative	0.018	Significant
San Roque ES	-0.843	Strong Negative	0.017	Significant
San Isidro ES	-.0922	Very Strong Negative	0.000	Significant
Overall	-0.774	Strong Negative	0.000	Significant

n = 40

Table 4 shows the results of the analysis of the relationship of the variables being studied. It illustrates that there is a significant relationship between the learners' level of usage to technological devices and their level of academic performance in English.

Overall result showed that there is exist strong negative correlation which means the level of usage to technological devices is related to the level of learners' academic performance. Therefore, higher level of usage to technological devices can decrease academic performance of learners. This negates to the result of the study of Alzate (2018) which had established that the use of technological devices could not affect performance but can improve participation among learners. It can be inferred that other factors may have affected their performance as the result showed that Manaul Elementary School has no significant relationship. For the rest of the schools studied, using of technological devices can be used as a predictor of their performance. This result affirms the established result of the study of Lumarda (2015) indicating that exposure to technology can affect performance.

The Significance of Technological Devices. Despite of the bane result of technological devices in this study, it cannot be denied that there are also good things or boon of using technological devices. In fact, today's learners, technological devices have helped them in their schoolwork, they can have easy access to research their assignment and lessons, doing projects using the devices and many more.

This was gathered through an open-ended question to the learner's respondents. Most of the learners answered that *"Makatabang ang technological devices sa pag-answer sa among buluhaton sa balay kay magsearch man me kay lisod man anseran ang English."* There are some learners also answered that *"Makatigo me og basa kay naa may video sa youtube"*. Few of them answered that *"Makatabang kay naa may dictionary sa among cellphone"*. Some of the answers were already personal reasons of the learners like *"Makatabang ang technological devices kay malingaw me og tan-aw og mga videos"*.

Other response from the respondents were personal usage like "*Gamiton ang cellphone para makatawag sa ahong mga ginikanan", "Makalingaw ang cellphone kay daghan og duwa"* and *"Makavideo call sa mga tiya ug tiyo sa laing nasod"*.

There were 80% of the learners' respondent answered that technological devices could help them in learning English and 20% of the learners' respondent answered not because they are not using their devices for their school works.

Therefore, technological devices help learners in many ways to learn but the supervision of their teachers and guardians are very necessary so that they can use it properly and not abusively.

CONCLUSION AND RECOMMENDATION

From the outcome of the study, it can be concluded that usage to technological devices can significantly affect performance. As resulted, using to technological devices has a detrimental effect on English performance. The use of television, cellphones, tablets and computers at a regular basis affects the academic performance of the learners. The more they are using technological devices, the more their academics are negatively affected. Hence, parents or guardian of the learners should be watchful to their

children so that they can guide and discipline them in using technological devices to evade bane result from these devices.

Recommendations

As a consequence of the analysis of the gathered data, the following recommendations are suggested:

1. Parents may be informed of the result of this study through PTA assembly to foster among them awareness and their children of the boon result of using of technological devices among the learners.
2. The school may formulate and implement an awareness program for parents on the effects of technological devices on the academic performance of the learners.
3. Teachers may discuss the advantages and disadvantages of technological devices and implement firm rules in the class of properly using them.
4. For future researchers, they make conduct another study that shall tackle the difference of academic performance and the level of usage of the learners to technological devices from rural and urban areas

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