Solent University

MSc Computer Engineering

Academic Year 2020-2021

MAA103 Research Method (Pilot Study)

Report on impact of technology on lifestyle management for mental health and Wellbeing

Abstract

Technological advancements in the recent years have allowed us to accomplish difficult things with ease which has made our lives so much more comfortable than before. To analyse the impact of technology on lifestyle managements and its effect on our mental health and wellbeing a pilot study has been conducted, it will allows us to find conclusive evidence for our research and as a preliminary study to be conducted to analyse the feasibility of the research it will also act as a base for the final research. As it has been observed that technology has completely changed the way the things were perceived in the past, the task that required a lot of energy and efforts can be accomplished without any delays and additional heavy cost. It has upgraded our lifestyle by using machines and tools to save time and energy which can be employed in several other ways. Apart from being beneficial for overall development of human kind technology also suffers from some limitation one of which is its impact on mental health and wellbeing. Through this pilot study we will be able to draw up facts and figures to provide evidence to the statement and also finds ways to solve such problem.

Research approach

For the purpose of this research we have collected substantial amount of data through online surveys. From the data collected, a sample of 500 people has been selected on which we will apply qualitative and quantitative research method to find some conclusive evidence to the statement. The whole purpose of the pilot study is to act as a feasibility analysis for the main study. It is common know fact that a research study requires a lot of resources at disposal such as time, money and efforts which will all go to waste if the research cannot produce effective result which is the reason why pilot study is conducted

to analyse the potential of the research work and to figure out if the research could actually produce effective results.

For the purpose of pilot study we were required to present a research question that will the topic of the research. Number of research point out that technology has been beneficial in different aspects of our lives, be it education, industry, agriculture, science and communication and many have also pointed out the negative impact of technology in our daily lives in the form of increased amount of lethargy, dependence on technology and the technical failures and security risk involved with the use of technology but there are very few reports that provide evidence to the fact that technological advancement is also impacting our mental health. Technology is making us so dependent that without it we feel helpless and unable to fend for ourselves at times and this increasing dependence is resulting in drained capacity of our brain to be able to access things and the ability to deal with changing environment and unfavourable circumstances. This inability to perceive and react to outside environment gives rise to anxiousness and agitation in human behaviour and to control such situations from happening it is important that we are aware of the consequences of addiction to technological advancement and able to limit our dependence on it which is the whole purpose of the study.

The survey has been conducted using one of the most used form technology of the recent times i.e. internet, the data was collected free of charge and it also provided variety to the information collected as all age groups were involved in the research.

Observations

With this pilot study we were able to make certain observation regarding the increasing dependence on technology for everyday activities leading to its impact on the mental health and well being. The first thing to be considered would be that the whole research has been completed with the help of technology from the point of collection of data to submitting the observation. It goes to show that technology has allowed u to be more comprehensive about the methods of research and made it more effective and comfortable. In the context of development technology will help us to reach new avenues.

The second observation was made as the data showed that every house hold has the degree of technology which is used on daily basis to get the work done. Such as washing machines, television, cleaners, water filter and most importantly mobile phones. The dependence of the new generation on technology has been on the rise with 70% of household activities being dependent on machinery and technology.

Second observation showed that the younger generation has showed increased amount of dependence on technology as compared to older generation. The tech savvy generation showed increased enthusiasm for technological advancement and the ability to get things done efficiently. The amount of time spent by them on gadgets as compared to time spent doing physical activities had too much difference. An average teen spend 40% of his time using technology in terms of gaming, internet and other forms of advancements.

With the increasing amount of ease provided through technology the dependence on technology is increasing at an alarming rate. With very thing being available online, the trends are changing to allow technology to take over our lives.

With the current situation of global pandemic c where everyone is forced to stay at home with no interaction with physical world it has changed how we spend our daily time. Where people used to stay outdoors and meet people face to face now the meetings are held using technological measures. Activities like shopping and business is being done through technical means.

If an overall conclusion is to be made, technological advancement has become important for our survival in the world but the increased involvement of technology has also led to sever consequences such as decreased amount of social interaction, lack of sleep, isolation, anxiety, obsessive compulsive disorder, ADHD, nervous breakdown etc.

Fast paced lifestyle

Technology has reduced the time frame of many activities and allowed us to achieve so many things in a limited time period. People now a day are addicted to being able to accomplish more and more, they are ambitious and dedicated to their dreams and careers. The emerging trend of social media has led to the addiction of presenting a perfect lifestyle to outsiders and making a display of achievements in front of the known and unknown people. you have to be aware of the latest fashions and trends but the trends are always changing and the only way to keep up with the change is to be able to match the pace of the revolving world, with this constantly evolving world our lives have become chaotic and the increased amount chaos lead to feeling of unrest. It is observed

that our lives have become too fast paced with the advent of technology; we are constantly on the move from one thing to another. We are so emerged in the speed of the life that we do not have time to calm our minds and enjoy life as it is. This behaviour has been widely observed in younger generations as per our research, more than 80% believed that they suffered under pressure of the fast paced life and admitted to the feeling demotivated at times. Every personality is different from the other and the major difference lies in how we perceive things. Some are goal oriented while others prefer a more laid back style of life and their inability to cope with the pace of the world makes them overwhelmed and creates pressure. As far as technology is concerned it has no doubt proved to be extremely useful for us but it has also created a pressure valve which is just waiting to explode. The era before technology was considered to be much simpler and calm. (RAINIE, JANNA ANDERSON AND LEE, 2018)

Pressure to achieve

With the fast paced world comes pressure to perform. As innovation makes it easy to get the work done in less time, it increases the pressure to achieve more. In the first set of period it can be observed that people feel useful when they are able to achieve more than what they are capable of but as the time progresses their ability of find satisfaction in the ability to achieve declines resulting in them becoming disinterested. The increasing pressure of work and over achievement is only bearable to a certain extent and after a point it would turn into dissatisfaction resulting is lower output. The research points out to the fact that the targets set by people are often unattainable as they are nothing but a projection of what an able person has achieved and as discussed before, the capabilities of each and every individual are different so they should not be compared with one

another. An individual much prefers a life in which he can give time to his hobbies rather than the one in which he overworks himself without being able to enjoy the true meaning of life. Technological advancement may allow us to be able to achieve great things but I cannot change the psychological ability of an individual to access things differently. (GARHAMMER, Manfred, 2002)

When technology meets development

With the help of technology various methods have been designed in which web based applications can be used for brain development. They use simulators and augmented reality softwares to create mock situation to test the ability of the brain to access things. Tools such as gaming, virtual reality, 3d animations and many other are available to be used to simulate brain and improve its ability to direct commands and orders, but the involvement of the younger generation into high-tech gaming world is problematic for their physical growth. (KÜHN, Simone, 2019)The research points out to the fact that people believe that gaming and other virtual simulation methods allows us to better understand the situation and its complexity but that does not indicate that spending a lot of time on such activities can be beneficial. Gaming activities are addictive in nature and kids and young children are drawn towards gaming but it can result in hindrance to their growth and affect their brain cells deeply causing inability to interact in social situation, hyper nature and increased agitation. Moreover the online interactions through gaming world are inappropriate as they can be vulgar and insensitive. The addiction to the gaming world can affect the brain development and sitting for longer than necessary can harm physical growth. It can cause major problems such as sleep deprivation, lack of ability to socialise, isolation and in severe cases it could lead to nervous breakdowns.

Excessive internet usage

With the advent of internet, connecting with the latest happening around the world became easier with latest news being available all over the world with just a click. The increased amount of connectivity with the world has increased the trend of sharing their life on social media platforms. The information can be shared with number of people; this transparency of lifestyle gives rise to cyber bullying and social defamation. The identity on social media platform can be disguised easily which makes it difficult to track down the culprit. The increased connectivity increases the vulnerability to online attacks and security threat to confidential information. In the study it was observed that internet was among the reasons for mental health problems among teenagers and young adults. The symptoms of distress could also be noticed among the higher age group with increased amount of addiction to always be connected and knowledgeable of their surroundings.

Internet is used to make multitude of information available on websites and media platforms. Engaging in website study helps in gaining addition perspective relating to different topics but is not necessary that the information of data available on internet is reviewed or is trust worthy. Many cases have been reported where the false information has led to serious situations. False rumour leads to dire consequences. (JAFFAR ABBAS, Jaffar Aman, Mohammad Nurunnabi and Shaher Bano, 2019)

It has been observed that the teenagers show much more interest in interaction through technological means as compared to real time conversation. The sensitivity of though at this age makes it difficult to open up about feelings and issues leading to lose of self esteem and confidence with the dear of judgement. With the concept of anonymity on internet it allows them to interact without being feared of judgement and retaliation.

Every 6 out of 10 young adult has admitted to have made friends with people who they trust more than their actual friends. With the evolution in lifestyle, meaning of social interaction has changed to a certain degree leaning more toward the favourability of online world.

Psychological disorders

The increased dependence of on technology has led to some serious psychological consequences such as lack of sleep or insomnia. In the study it was observed that people above the age of 30 are more likely to suffer from lack of sleep, whereas the age used to around 60 and above. The uneasiness and restlessness in nature of the younger generation because of the dependence on technology leads to sleeping disorders. In the survey it was observed that the sleep schedules of the recent generation have been on the down trend. With people used to going to sleep around 12 to 3 AM. The time which was spent relaxing the mind and concluding the day is now spent going through social media and internet surfing. The lack of sleep further leads to lack of concentration, physical weakness and also an effect on eyesight.

As the generation is more focused on popularity, fame and displaying their lives on social media, they are suffering from psychological disorders like anxiety and depression. People can be very rude and straightforward on social media without caring about the consequence of their words on the stranger. The anonymity of internet results in severe cases on social defamation, with the lack of ability to cope with unfavourable situation people become mentally disturbed. Everybody is so busy with their own flow of life and business that they forget to be considerate to other. The expectation set by the parents and the society on younger generation with the burden to perform while being compared

to the achievement of other people of their age creates pressure Younger generation feels that they have to handle everything on their own and with the fear of judgement they tend to keep things to themselves mostly and that leads to consequences such as suicidal thoughts and depressive attacks in the younger generation.

What is being done to prevent it?

The awareness among the youth regarding the perils of excessive use of internet has given rise to social campaigns and seminars which spread the message of limiting the dependence on technological devises and encouraging self sufficient nature.

There are many groups which advocate to the fact the increased amount of technology is damaging our environment by increasing their carbon footprint and also has effected out brain development through radiation of electronic devices. They are encouraging people to be less reliable on technology.

Parents are making efforts to limit the usage of mobile phones and other gadgets and monitoring their child's online activities. It allows them to filter out any information of website which may affect the young mind.

The schools are spreading awareness regarding the misuse of technology and consequences of cyber bullying etc. there are psychologist available on the school property to help children cope with the increasing amount of pressure.

The brands and companies which manufacture technology are making an initiative to follow social guidelines and code of conduct to monitor activities and limit usage of internet.

What difference does it make?

With increasing amount of awareness regarding the consequences of technology and its impact on mental health, various organisations have come forward to help people who suffer from psychological disorders. The perception of people regarding mental health is changing, which increases the chances of controlling such problem. People are more aware of the consequences of their action making our social environment safer. Government has also taken initiative to filter the information available on internet.

Conclusion

From the above pilot study it was observed that technology has become a very important part of our daily routine. There are many things in our life that are unattainable without technology. We travel through technology, we earn and spend money through technology and if one day it was to be taken away human kind may come to a full stop especially with current circumstances when technology is keeping us protected from the virus in this pandemic.

The few observations made from the study acknowledged the fact that as the times are progressing the younger generation shows more likeability towards innovation as compared to older generation, it also showed that younger generations are becoming more vulnerable to the psychological consequences of technology. The increasing connectivity between people via internet lead to some major mental issues such as isolation among children when they feel more comfortable spending time in front of television or mobile phones than participating in outdoor activities, it effects their brain

development and nervous system. Some other implications of technological advancement involve sleeping disorders, anxiety, social awkwardness, depression, suicidal thoughts, ADHD, compulsive disorder and agitation.

So as can be observed, dependence on technology is affecting the mental health and well being of the generation which is why an effort to eliminate or reduce the problem is necessary. It will start by limiting the usage of internet and social media along with increased participation in physical activities.

Bibliography

GARHAMMER, Manfred. 2002. *Pace of Life and Enjoyment of Life*. [online]. [Accessed 24 September 2020]. Available from World Wide Web: https://www.researchgate.net/publication/23545478 Pace of Life and Enjoyment of Life>

JAFFAR ABBAS, Jaffar Aman, Mohammad Nurunnabi and Shaher Bano. 2019. *The Impact of Social Media on Learning Behavior forSustainable Education: Evidence of Students from Selected Universities in Pakistan*. [online]. [Accessed 23 September 2020]. Available from World Wide Web: <file:///C:/Users/admin/Desktop/sustainability-11-01683.pdf>

KÜHN, Simone. 2019. Effects of computer gaming on cognition, brain structure, and function: a critical reflection on existing literature. [online]. [Accessed 24 September 2020]. Available from World Wide Web: https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6829166/>

RAINIE, JANNA ANDERSON AND LEE. 2018. *The negatives of digital life*. [online].

[Accessed 24 September 2020]. Available from World Wide Web:

https://www.pewresearch.org/internet/2018/07/03/the-negatives-of-digital-life/