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A study to assess the knowledge regarding health risk associated with mobile phone usage among students in selected college at Tirunelveli District

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Abstract

A descriptive study to assess the level of knowledge regarding health risk associated with mobile phone usage among students in selected settings. The investigator framed the tool and the data collection was done for 1 week. Descriptive research design was used for this study. Non Probable convenient sampling technique was used for selecting the sample. The sample size was 50. The data was collected by a structured demographic sheet and self-structured questionnaire. The finding revealed that 20% students had adequate knowledge 80% students had moderately adequate knowledge, none of them had inadequate knowledge. The study revealed that there was no significant association between the level of knowledge and health risk associated with mobile phone usage among students in the selected demographic variable.

Keywords: Health risk, mobile phone, knowledge, students

Introduction

In 2014, 1.85 billion people using smartphones around the world, which is projected to 2.32 billion in 2017 and 2.87 billion in 2020. As of 2015, there were 7.4 billion subscriptions worldwide and the number is increasing every year. Mobile phones use electromagnetic radiation in the microwave range (450-3800 MHz). Mobile phone overuse (mobile-phone addiction or mobile phone dependency) is a dependence syndrome seen among certain mobile phone users. Some mobile phone users exhibit problematic behaviours related to substance use disorders.

A study focusing on health risk associated with mobile phone usage among college students reveals a range of negative impacts, including physical, mental, and academic consequences. These effects include sleep disturbances, fatigue, eye strain, headaches, and even mental health issues like anxiety and depression. Additionally, excessive phone use can lead to academic distractions, reduced attention span, and lower academic performance.

Proportion of participants with different ill effects includes pimples (18.4%), sleep disturbances (16%), loss of interest in studies (15.2%), fatigue (11.2%), headache (9.6%), restlessness (8.8%), and redness of eye (6.4%), irritability (6.4%), dizziness (4.8%), thumb pain (3.2%) and earache (1.6%)

A decline in male sperm quality has been observed over several decades among mobile users. A 2012 review concluded that “together, the results of these studies have shown that radio frequency electromagnetic radiation (RF-EMR) decreases sperm count and motility and increases oxidative stress.

The International Agency for Research on Cancer of the WHO said, in 2011, that radio frequency is a possible human carcinogen, based on heavy usage which increases the risk of developing glioma tumors. With the increased use of mobile phones among students, the present study was undertaken with the objective to assess health risk associated with mobile phones on usage among students.

Statement of the Problem

A study to assess the knowledge regarding health risk associated with mobile phone usage among students in selected college at Tirunelveli district.

Objectives

1. To assess the level of knowledge regarding health risk associated with mobile phone usage among students.
2. To find the association between the level of knowledge regarding health risk associated with mobile phone usage among student with their selected demographic variables

Methodology

Quantitative research approach was adopted for this study by using descriptive research design. Students were selected using Non probability convenient sampling technique. The samples were selected based on the criteria of sample selection. After getting informed consent from the participants then proceeded with data collection with a given period of time. The investigator collected the data by regarding demographic variable and structured questionnaire for health risk associated with mobile phone usage. Ethical principal, justice was maintained during and after the course of data collection.

Scoring Interpretation

Results and Discussion

With respect to age in years 48 (96%) belongs to 18-20 years and 2 (4%) were 21-22 years. In regards of gender out of 50 sample 24 samples (48%) were in female and 26 sample (52%) were in male. In relation to religion 20 (40%) were Hindu, 25 (50%) were Christian and 5(10%) were Muslim.

Table 1: Frequency and percentage distribution of level of knowledge regarding health risk associated with mobile phone usage among student.

Sl. No	Level of Knowledge	Frequency	Percentage
1	Adequate knowledge	10	20%
2	Moderately adequate knowledge	40	80%
3	Inadequate knowledge	0	0%

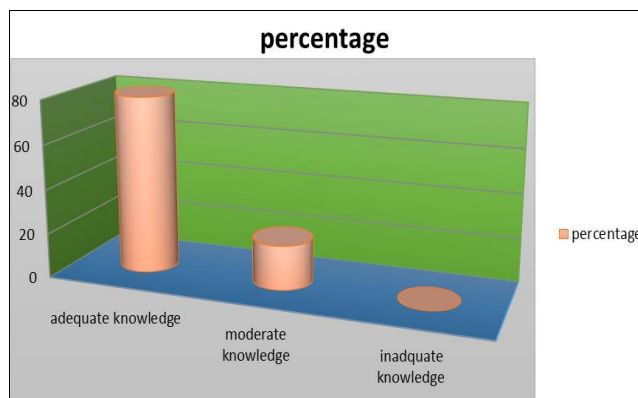


Fig 1: Shows the percentage distribution of level of knowledge regarding health risk associated with mobile phone usage among college Students.

Mobile phone usage was concerned about 25 (50%) study participants keep the mobile under the pillow or near the bed, 15 (30%) of them frequently (at least once or twice) check the mobile for any missed calls or messages at midnight (in between sleep), 10 (20%) of them were checking the mobile as soon they get up from the bed, Majority 27 (54%) have experienced health problems like headache, sleep disturbance, eye pain, irritability and (23) 46% of the students replied that they were addicted to

mobile phones. In relation to the previous knowledge regarding health risk associated with mobile phone usage 40 (80%) were had previous knowledge and 10(20%) students don't have any previous knowledge.

Description

In General concept the mean score is 7.5 with a mean percentage of 62.5% and a standard deviation of 1.347. In the aspect of Mobile phone and Health the mean score is 3.62 with a mean percentage of 51.71% and a standard deviation of 0.958. In Effects of Mobile phone, the mean score is 4.62 with a mean percentage of 66% and a standard deviation of 1.136. In the last aspect of health risk associated with mobile phone use the mean score is 4.88 with a mean percentage of 54.22% and a standard deviation

Association between the demographic variable and the level of knowledge

There is no association between the level of knowledge and demographic variables such as age in years, gender, previous knowledge regarding health risk associated with mobile phone usage, usage of mobile phone and health problems.

Conclusion

The investigator has analyzed the data collected has come to the conclusion that the knowledge of student who have average level they may require further knowledge by education. Students needs to be educated regarding the health problems owing to the over usage of mobile phones and large-scale studies are needed to assess the extent of the problem.

Conflict of Interest: There is no conflict of interest

Sources of fund: Self

Ethical Clearance

The proposed study was conducted after the approval of the ethical committee. Assurance was given to the study participants regarding the confidentiality of the data collection.

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