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RESEARCH ARTICLE

Assess the Effectiveness of Structured Teaching Programme on Knowledge Regarding Nomo Phobia (Mobile Phone Addiction) and its Prevention Among Adolescent Students

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Abstract: Nomophobia, defined as the fear or anxiety of being without a mobile phone or unable to use it, has emerged as a significant behavioral addiction among adolescents in the era of digital communication. Excessive and chronic mobile phone use has been associated with psychological dependence, reduced academic performance, sleep disturbances, and impaired social functioning. Considering the increasing vulnerability of adolescents to mobile phone addiction, the present study was undertaken to assess the effectiveness of a Structured Teaching Programme (STP) on knowledge regarding Nomophobia and its prevention among adolescent students in selected colleges of Vadodara city. A pre-experimental one-group pre-test post-test design was adopted. Using purposive sampling techniques, 50 adolescent students were selected. Data were collected using a structured knowledge questionnaire to assess baseline understanding of Nomophobia. Following the pre-test, the Structured Teaching Programme—covering the concept, signs and symptoms, risk factors, consequences, and preventive strategies—was administered. A post-test was conducted after seven days to evaluate the gain in knowledge. Data analysis was performed using descriptive and inferential statistics. The findings revealed a significant improvement in the knowledge scores of adolescent students after the intervention. The mean percentage of pre-test knowledge (38.2%) increased markedly to 85.55% in the post-test. The calculated paired t value of 30.25 was substantially higher than the table value ($p < 0.05$, $df = 49$), indicating a statistically significant difference between pre- and post-test knowledge scores. Furthermore, no significant association was observed between post-test knowledge and selected demographic variables. The study concludes that the Structured Teaching Programme was highly effective in improving the knowledge of adolescents regarding Nomophobia and its prevention. Educational interventions of this kind can play an important role in promoting awareness, supporting healthy technology use, and reducing the risk of mobile phone addiction among young populations.

Keywords: Nomophobia, Structured Teaching Programme, Effectiveness, Knowledge, Adolescents, Mobile Phone Addiction.

INTRODUCTION

Mobile phones have become an essential part of modern human life. They have many attributes which makes them very attractive to both young and old. There has been an increasing trend of use of mobile phones among students. Data has now started emerging with respect to the negative physical and psychological consequences of excessive use of mobile phones. New research has shown excessive use of mobile phones leading to development of symptoms suggestive of dependence syndrome.

Nomophobia, a form of behavioral addiction towards mobile phones and manifested as symptoms of psychological as well as physical dependency considering the ill effects of chronic use mobile phones, studies usually focused on those somatic effects and thus the psychological dependency rarely been in the study of interest. The present study aimed at examining the pattern of mobile usage among under graduate students and to check whether there exists any difference among them.

It is difficult to say mobile phone use as problematic as like addictions to alcohol, drugs or gambling. Almost every people have a mobile phone and use it regularly, but there are people who can't take their dinner without texting or furiously typing on a personal digital assistant during a meeting. This type of users become anxious when they are separated from the phone, they can't enjoy whatever they are doing without their mobile phones and they often check their phones for voice mails and text messages.

Nomophobia is a term describing a growing fear in today's world -the fear of being without a mobile device, or beyond mobile phone contact. Among today's high school and college students, it's on the rise. There is growing percentage of text or tweet instead of actually talking to each other's.

Teenagers who excessively use their cell phone are more prone to disrupted sleep, restlessness, stress and fatigue. 58% of Asians, which includes Indians, have comprised to use mobile phones when traveling by air. According to the survey they have also found that Indians are the "most social" with 69% most likely to use their phones in cinema halls/ movie theaters, 21% use it in a place of worship, and 79% while attending a wedding ceremony. 25% of users across the markets surveyed have said they

used mobile phones in the meetings, 80% of Asians use a mobile phone while eating. With so many utility applications being made available on mobile phones, be it to surf the internet or to pay bills, this dependency on mobile phones is escalating at a greater pace.

Mobile Phone Dependence has been found to be an emerging public health problem. There is need to recognize and identify early the growing trends and negative consequences of inappropriate mobile phone use in young users so as to generate awareness, and plan educational and treatment interventions, if need be, so as t prevent a major public health concern. In the light of above mentioned facts the investigator felt that there is lack of knowledge regarding mobile phone dependence among public health. This motivates the investigator to develop a structured teaching Programme for college students with the purpose of helping them to acquire and update the knowledge and attitude to be competent in assessing Nomo phobia.

After an extensive review of literature, the student researcher realized the effect of Nomo phobia in the society. Previous clinical and personal experiences and suggestions provided by the experts convinced the investigator and felt the necessity of enhancing the knowledge regarding Nomo phobia (mobile phone addiction). Hence the student investigator planned to develop a structured teaching Programme on knowledge regarding Nomo phobia (mobile phone addiction) among adolescent students of selected Colleges at Vadodara.

OBJECTIVES OF THE STUDY

- To assess the existing knowledge regarding Nomophobia and its prevention among adolescent.
- To evaluate the effectiveness of structured teaching programme on knowledge regarding Nomophobia and its prevention among adolescent students.
- To find the association between post test knowledge score of the adolescent students and their selected demographic variables.

MATERIAL AND METHODS

This study aimed to determine how Structured Teaching Programme on Nomophobia was an effective method for enhancing the knowledge among adolescent students. A descriptive evaluative research method was used for the study. The study used a pre-experimental; one group Pre-test, one group Post-test design, ideal for comparing changes in knowledge in the same group before and after receiving the teaching programme.

A sample of 50 adolescent students was chosen through a purposive non-probability sampling method. Participants were included based on criteria such as students those who are present at the time of data collection and who are studying in 1st year of Parul Institute of Nursing College.
The research tool was a self-structured questionnaire developed after reviewing relevant literature and consulting subject experts. It was divided into two parts: Section A- Socio- Demographic Data (Age, Gender, Religion, Place of residence, Type of family, Nature of stay, Family income per month, Educational status of Father and Mother, and Previous information about Nomo phobia) while Section B Self Structure Knowledge Questionnaires (40 items). Before the main study, a pilot study was conducted on a small, similar group to evaluate the clarity, reliability, and appropriateness of the tool and the data collection process.

The collected data were analysed using both descriptive and inferential statistics. Frequencies, percentages, mean values, and standard deviations were used to summarize participant characteristics and knowledge levels. The paired t-test was used to assess the statistical difference between pre-test and post-test scores, while chi-square analysis helped explore relationships between knowledge scores and selected demographic factors.

RESULTS

Frequency and percentage distribution of respondents by personal characteristics

In the present study the frequency and percentage distribution of demographic variables of participants revealed that 56% of the respondents are in the age group of 16 years, 44% are in the age group of 17 years. 38% of the respondents are males, 62% of the respondents are females. Majority of the respondents are 46% of the respondents are Hindus, remaining 32% of respondents are Muslims and 22% of the respondents are Christians. 62% of the respondents are from rural and 38% of respondents are from urban. Most of the respondents are 48% in joint family, 52% of the respondents are in nuclear family. Majority of the respondents are 80% were stayed in home; remaining 20% of the respondents are stayed in hostel. 10% of the respondents were having 5000/-, 34%% of the respondents were having monthly income 5001-10000/-, 38% of the respondents were having monthly income 10001- 15000/-, 18% of the respondents were having above 15000/-. 20% of the respondent's father had no formal education 24% of the respondents father studied up to primary education 22% of the respondent's father studied up to secondary education, 22% of the respondents of father studied up to PUC and finally 12% of the respondents of father studied up to Degree & above. 18% of the respondents mother were no formal education, 26% of the respondents mother studied up to primary education, 20% of the respondents mother studied up to secondary education 22% of the respondents mother studied up to PUC & 14% of the respondents were studied up to Degree & above. 20% of the respondents were having previous knowledge about Nomophobia from friends and relatives, 62% of the

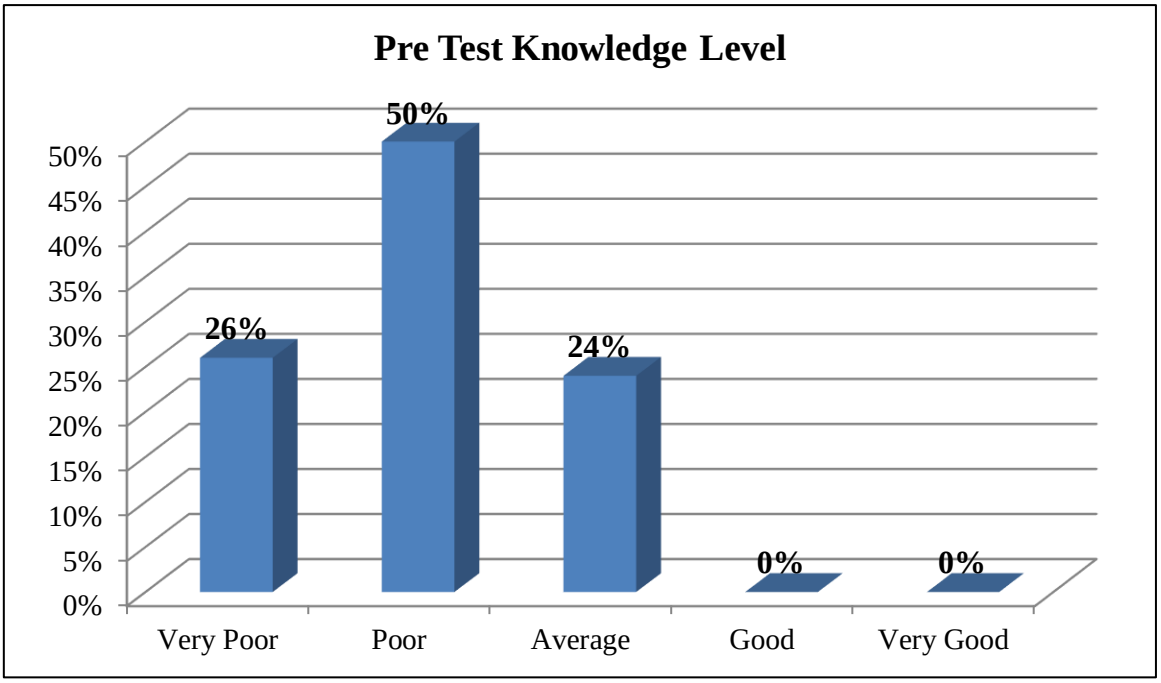
respondents were having previous knowledge about Nomophobia from Mass media, and 18% of the respondents were having previous knowledge about Nomophobia from self reading.

Sl. No.	Characteristics	Category	Respondents	
			Number	Percentage (%)
1	Age	16 years	28	56
		17 years	22	44
2	Gender	Male	19	38
		Female	31	62
3	Religion	Hindu	23	46
		Muslim	16	32
		Christian	11	22
		Others	-	-
4	Place of Residence	Rural	31	62
		Urban	19	38
5	Type of Family	Joint Family	24	48
		Nuclear Family	26	52
		Extended Family	-	-
6	Nature of Stay	Home	40	80
		Hostel	10	20
		P.G	-	-
7	Family Monthly Income	Below 5000/-	05	10
		5001-10000/-	17	34
		10001-15000/-	19	38
		Above 15000/-	09	18
8	Educational Status of the Father	No formal education	10	20
		Primary Education	12	24
		Secondary Education	11	22
		PUC	11	22
		Degree & Above	06	12
9	Educational status of the Mother	No formal Education	09	18
		Primary Education	13	26
		Secondary Education	10	20
		PUC	11	22%
		Degree & Above	07	14%
10	Previous knowledge regarding Nomophobia	Friends & Relatives	10	20%
		Mass Media	31	62%
		Self reading	09	18%
		Others	-	-

Existing knowledge regarding Nomophobia and its prevention among adolescents

The present study was conducted on knowledge regarding Nomophobia among adolescents. In pre-test the mean knowledge score was 50% possess poor knowledge, 26% possess very poor knowledge 24% possess average knowledge with the mean percentage of 38.2%. This showed that adolescent students had poor knowledge regarding Nomophobia with the mean knowledge score 38.2%.

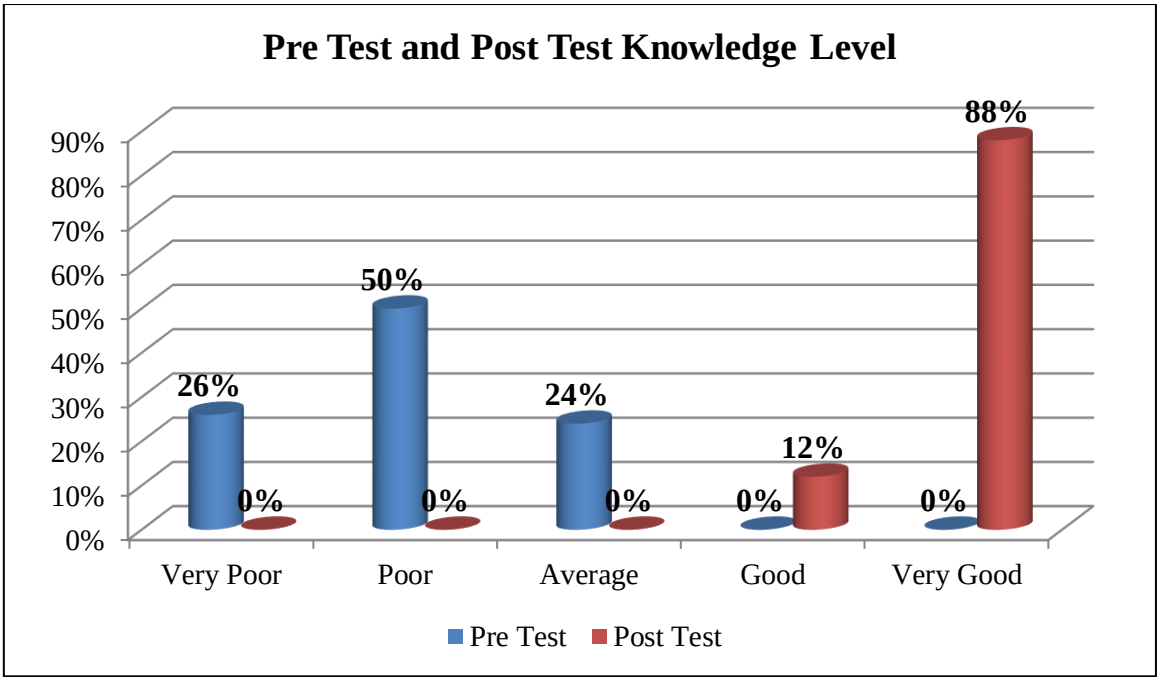
Knowledge Level	Category	Respondents	
		Number	Percentage
Very poor	0-20%	13	26%
Poor	20-40%	25	50%
Average	40-60%	12	24%
Good	60-80%	-	-
Very good	80-100%	-	-
Total		**50**	**100%**



To assess the effectiveness of Sructured Teaching Programme regarding Nomophobia and its prevention

In the present study pre-test knowledge score is 38.2% and post –test knowledge score 85.55%. The comparison between pre-test and post-test knowledge scores showed that the pre-test knowledge level is 24% of respondents had average knowledge regarding nomophobia, 50% had poor knowledge and 26% had very poor knowledge; whereas post-test knowledge level 12% of the respondents had good knowledge and 88% had very good knowledge about Nomophobia. This indicates that structured teaching programme has enhanced the knowledge of adolescents regarding Nomophobia.

Knowledge Level	**Category**	**Classification of Respondents**				**χ^2 Value**
		Pre Test		**Post Test**		
		Number	**Percentage**	**Number**	**Percentage**	
Very poor	0-20%	13	26%	-	-	**50***
Poor	20-40%	25	50%	-	-	
Average	40-60%	12	24%	-	-	
Good	60-80%	-	-	06	12%	
Very good	80-100%	-	-	44	88%	
Total				**50**	**100%**	



Association between selected demographic variables and post test knowledge level on Nomophobia and its prevention

SL. NO.	Demographic Variables	Category	Sample	Respondents Knowledge Level				Chi Square Value (χ^2)	P Value
				Good		Very Good			
				N	%	N	%		
1	Age	16 years	28	15	30	13	26	0.324	P>0.05
		17 years	22	10	20	12	24	NS	Df-1
2	Gender	Male	19	07	14	12	24	2.122	P>0.05
		Female	31	18	36	13	26	NS	Df-1
3	Religion	Hindu	23	11	22	12	24	0.080	P>0.05
		Muslim	16	07	14	09	18		
		Christian	11	07	14	04	08	NS	Df-2
		Others	00	00	00	00	00		
4	Place of Residence	Rural	31	15	30	16	32	0.084	P>0.05
		Urban	19	10	20	09	18	NS	Df-1
5	Type of Family	Joint Family	26	12	24	12	24	0.341	P>0.05
		Nuclear Family	24	13	26	13	26		
		Extended Family	00	00	00	00	00	NS	Df-1
6	Nature of Stay	Home	40	21	42	19	38	0.5	P>0.05
		Hostel	10	04	16	06	12		
		P.G	00	00	00	00	00	NS	Df-1
7	Family Monthly Income	Below 5000/-	05	03	06	02	04	7.53	P>0.05
		5001-10000/-	17	07	14	10	20		
		10001-15000/-	19	07	14	12	24	NS	Df-3
		Above 15000/-	09	08	16	01	02		
8	Educational	No formal	10	04	08	06	12		

	Status of the Father	education							
		Primary Education	12	07	14	05	10	0.68 NS	P>0.05 Df-4
		Secondary Education	11	06	12	05	10		
		PUC	11	05	10	06	12		
		Degree & Above	06	03	06	03	06		
9	Educational status of the Mother	No formal Education	09	04	08	05	10	1 NS	P>0.05 Df-4
		Primary Education	13	08	16	05	10		
		Secondary Education	10	05	10	05	10		
		PUC	11	05	10	06	12		
		Degree & Above	07	03	06	04	08		
10	Previous knowledge regarding Nomophobia	Friends & Relatives	10	04	08	06	12	2.75 NS	P<0.05 Df-2
		Mass Media	31	08	16	13	26		
		Self reading	09	03	06	06	12		
		Others	00	00	00	00	00		

The present study found that the calculated χ^2 values for Age , Gender, Religion, Place of residence, Type of family, Nature of stay, Family income, Educational status of father, Educational status of mother are not significantly associated with post-test knowledge level of adolescents. Therefore it was concluded that there is no significant association between post test knowledge level and demographic variables of the respondents Nomophobia and its prevention.

DISCUSSION

The major findings of the present study compared with the other studies in accordance with the objectives of the study and hypothesis. It was concluded that structured teaching programme was effective in producing a significant difference between mean pre-test and post test knowledge scores of adolescents regarding Nomophobia and its prevention.

CONCLUSION

The focus of the study was to determine the "Effectiveness of structured teaching programme on knowledge regarding Nomophobia among college students in a selected college at Vadodara". A pre experimental one group pre-test post -test design was used in the study. The data was collected from 50 samples through purposive sampling technique.

Conclusions drawn from the study were as follows:
College students were willingly participated in the study. The college students had some knowledge regarding nomophobia.

The study was based on the **Stufflebeam, CIPP model**. It provides a comprehensive systematic framework for effectiveness of structured teaching programme on knowledge regarding nomophobia.

Further, the conclusions drawn on the basis of the findings of the study include:

1. The knowledge of the adolescent was not adequate before the introduction of structured teaching programme.
2. After the introduction of the structured teaching programme, the post test findings showed the significant increase in the knowledge of adolescents on nomophobia.
3. Structured teaching programme is proved to be one of the effective teaching strategies.
4. Structured teaching programme can be kept for future reference when comparing with SIM.
5. Structured teaching programme will be beneficial for adolescent students to understand their problems related to nomophobia and its prevention.

DECLARATION

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Conflict of Interests
Authors have decided that no conflict of interest exists.

Author Contribution

Ethical Permission, data collection and data analysis were done by corresponding author. Supervision, guidance and validation were done by secondary Author.

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Consent and Ethical Approval

Approval No: PUIECHR/PIMSR/00/081734/8007 Formal ethical approval was received from the institutional ethical committee; informed consent was obtained from participants and assured of anonymity.

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