



# “Effectiveness Of Self Instructional Module On Knowledge Regarding Ill Effects Of Internetaddiction Among Adolescents Of Selected Commerce College Of The City”

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**Abstract:** The internet is an important modern means of obtaining information and communicating with others which has converted the world into a global village, at the same time increasing internet use among adolescents is also likely to pose a major health concern that is internet addiction (IA). The revolution of the mass media, telecommunication and social networking with the emerging advancement in science and technology has made the great drastic change in access and browsing online information from the whole web using terminal at home etc. The emergency of internet has created on extraordinary change in expansion and proliferation of the internet has provided better opportunities for communication, information and social interaction. The aim of the study was to assess effectiveness of self instructional module on knowledge regarding ill effects of internet addiction among adolescents of selected commerce college of the city.

**Methods :** Pre-experimental one group pre-test post-test design was used to evaluate effectiveness of self instructional module on knowledge regarding ill effects of internet addiction among adolescents of selected commerce college of the city. The sample size is 80 adolescents of commerce college of the city . The sampling technique used in this study was non probability - convenient sampling technique. The self structured knowledge questionnaire was prepared and tested for reliability and validity. The data collection was carried out in three phases and the data was analyzed by using the descriptive and inferential statistics.

**Result :** The study result depicted that in pre test 63.75 % of the adolescents had poor level of knowledge score, 36.25 % had good level of knowledge score. In post test 43.75 % of the adolescents had poor level of knowledge score and 56.25 % of the adolescents had good level of knowledge score. the pre test the mean of the knowledge score obtained by the sample was 9.23 and in the post test it rises to 11.53. The knowledge score of the sample shows marked improvement after giving Self instructional module. From the above table, it is evident that the calculated ‘t’ value is greater than the table value of ‘t’ at 0.05 levels. This indicates that Self instructional module is effective in improving the knowledge of the adolescents of selected commerce college of the city regarding ill effects of internet addiction.

**Conclusion :** The present study concluded that the Self instructional module was effective in improving knowledge among adolescents and one way ANOVA shows hence it is significant association found in age and amount of time spent on internet in hours with knowledge of adolescents

**Keywords:** Knowledge, adolescents, ill effects, internet addiction, Self Instructional Module.

## INTRODUCTION

Internet addiction is defined as pathological pattern of internet use, which is also described as internet dependence, compulsive internet use, and problematic internet use. Mobile phones use electromagnetic radiation in the microwave range which may be believed harmful to health. The user cannot self-control the use of internet, resulting in significant impairment at home, work, health, or interpersonal relationship. They may find it difficult to stop using the internet due to anonymity, convenience and accessibility and may use it as a way to escape reality. The type of activity involved in internet addiction include online gaming, social networking and online gambling online shopping, virtual sex and information overload the term 'addiction' though traditionally used to described a physical dependence in a substance has been applied in the overuse of internet. Internet disorder is described as excessive computer use that interferes with daily life and impairs daily function.<sup>1</sup>

The internet has become an integral part of modern day life, and the global population using the internet has grown to almost 3.8 billion.<sup>1</sup> Over the past few years, the study of the correlation between excessive internet use and mental disorders has grown.<sup>2</sup>

Young first introduced the term internet addiction (IA) in a pioneering study and defined it as an impulse control disorder which does not involve an intoxicant. Thus, IA is a psychological dependence on the internet regardless of the type of activities pursued after logging in.<sup>3</sup> IA leads to an impairment of various life functions. 4, 5 Internet gaming disorder (IGD) is a consequence of IA, which is defined as uncontrolled internet gaming activity with negative impacts on the psychosocial functions.<sup>3</sup>

The growing number of researches on Internet addiction indicates that Internet addiction is a psychosocial disorder and its characteristics are as follows: tolerance, withdrawal symptoms, affective disorders, and problems in social relations. Internet usage creates psychological, social, school and/or work difficulties in a person's life.<sup>4</sup>

Eighteen percent of a study participants were considered to be pathological Internet users, whose excessive use of the Internet was causing academic, social, and interpersonal problems.<sup>5</sup>

Excessive Internet use may create a heightened level of psychological arousal, resulting in little sleep, failure to eat for long periods, and limited physical activity, possibly leading to the user experiencing physical and mental health problems such as depression, OCD, low family relationships and anxiety.<sup>2</sup>

Problematic Internet use may be associated with subjective distress, functional impairment and Axis I psychiatric disorders. Depression is the most frequently reported psychiatric symptom associated with Internet overuse.<sup>6</sup>

In addition, many studies have reported associations between Internet addiction and psychiatric symptoms, such as depression, anxiety, loneliness, self efficacy, etc among adolescents.<sup>15</sup> However, and high Internet addiction score was not significantly correlated with the depression score. It is necessary to identify the Internet usage pattern, examine the association between Internet addiction and psychiatric symptoms and explore the psychological features of Internet addiction.<sup>7</sup>

Healthy and unhealthy use of the internet had always been an argued topic. Many research findings had linked unhealthy and excessive use of internet to mental health disorders. The uncontrolled amount of time spent by people on social websites established the debate of internet addiction as a clinical disorder (Columbia Broadcasting System, 2008). According to an alarming AIIMS report, patients coming in with the complaint of "internet addiction" have almost doubled, over the past two years (NDTV 2018). The regular interaction of humans with internet is found to have adverse consequences on behaviors and emotions of human beings. Many scholars used different terms to define the overuse of internet such as internet addictive disorder, problematic internet use and compulsive internet use, pathological use of internet, virtual addiction and internet dependency. It was also termed as "electronic opium" in China. It has gone from a mode of daily usage to overuse and just like other hobbies, some of the users of internet start spending an extended amount of time on it, which can lead to addiction.<sup>8</sup>

Recently conducted study from Chandigarh, India, it was found that about 59% of respondents would get upset, when the Internet was not available, 54% felt the need to use Internet every day, 45% lost track of time after starting to surf, and 43% stayed online longer than originally intended.<sup>9</sup>

As the usage of Internet is not only essential but has become mandatory and demands increased usage of time, the students become unknowingly addicted, without realizing the adverse effects on their health.<sup>10</sup>

## **PROBLEM STATEMENT**

"A study to assess effectiveness of self instructional module on knowledge regarding ill effects of internet addiction among adolescents of selected commerce college of the city".

## **OBJECTIVES OF THE STUDY:**

The objectives of the study were -

1. To assess the knowledge regarding ill effects of internet addiction among adolescents.
2. To assess the effectiveness of self instructional module on knowledge regarding ill effects of internet addiction among adolescents.
3. To evaluate the association of study finding with selected demographic variable.

## MATERIALS & METHODS

Researcher methodology defines what the activity of research is, how to proceed, how to measure progress and what constitutes success.

**Research Design:** Pre Experimental, one group pre-test post-test Research Design

**Research Approach:** Quantitative Research Approach

**Sample:** Adolescents of the selected commerce college of the city.

**Sample Size:** The sample size is 80 adolescents of commerce college of the city

**Sampling Technique:** Non Probability Convenience sampling.

**Data collection tool:** Self structured knowledge questionnaires was used for data collection.

**Criteria for Sample selection:**

**a. Inclusion criteria:**

1. Adolescents whose age between 16 to 19 years
2. Both male and female adolescents.
3. Adolescents who are present at the time of data collection.
4. Adolescents who are willing to participate in the study.
5. Adolescents who are able to read, write, and understand English and Marathi.

**b. Exclusion criteria:**

1. Adolescents those belongs to science and art.
2. Adolescent those who have previous knowledge of ill effects of internet addiction.

The researcher approached the subjects, informed regarding the objectives of the study and obtained informed consent after assuring the subjects about the confidentiality of the data. Purpose and important of research study explain before collection of data. The knowledge was assessed by Self structured knowledge questionnaires. Descriptive and inferential statistics was used for data analysis. The collected data was organized and tabulated by using descriptive statistics, i.e. frequency, percentage, mean and SD. The inferential statistics i.e., paired t test was used to assess effectiveness of self instructional module on knowledge regarding ill effects of internet addiction among adolescents of selected commerce college of the city, and chi-square test was used to find the association between pre-test knowledge score with their selected demographic variables. The data was planned and presented in the form of tables and figures.

## RESULT

The data collected is entered in the master sheet for tabulation and statistical processing. In order to find out relationship, the data was tabulated, analyzed and interpreted using descriptive and inferential statistics.

**Table 1 : Description of the adolescents of selected commerce college of the city according to their demographic Variables**

n=80

Demographic variable	Frequency	Percentages
<b>Age in years</b>		
16-17 yrs	06	07.50
18-19 yrs	74	92.50
<b>Gender</b>		
Male	27	33.80
Female	53	66.20
Transgender	00	00
<b>Type of Family</b>		
Nuclear family	28	35.00
Joint family	47	58.80
Extended Family	01	01.20
Single Parent Family	04	05.00
<b>Residential status</b>		
Own House	49	61.30
Hostel	04	05.00
Rented House	27	33.70
Paying Guest	00	00
<b>Location</b>		
Urban	62	77.50
Rural	18	22.50
<b>Educational Status of parents</b>		
Literate	65	81.20
Illiterate	15	18.80
<b>Income of Family (Annual)</b>		
<4 lakh	69	86.30
5-6 lakh	07	08.70
7-8 lakh	03	03.80
Above 9 lakh	01	01.20
<b>Amount of time spent on internet in hours</b>		
2-4 hours	42	52.40
4-5 hours	24	30.00
5-6 hours	11	13.80

Above 6 hours	03	03.80
<b>Mode of Internet usage</b>		
Mobile	76	95.00
Computer	02	02.50
Laptop	02	02.50
Other	00	00
<b>Source of Internet usage</b>		
Wi-Fi	14	17.50
Internet café	00	00
Mobile internet data	66	82.50
Other	00	00

The above table 1 shows that the majority of the adolescent under study were between the age group of 18 - 19 years. Mostly 66.20 % of adolescents were female and 33.80 % of adolescents were male. Majority 35 % of adolescents were living in nuclear family and 58.80 % of adolescents were living in joint family. Majority 61.30 % of the adolescents were having their own house. Highest percentage 77.50 % of adolescents living in urban area. majority 81.20 % of the parents of adolescents were literate and 18.80 % of the parents of adolescents were illiterate. Majority 86.30 % of adolescents were having less than 4 lakh income annually. Mostly 52.40 % of adolescents were spent 2 – 4 hours on internet. Majority 95 % of adolescents were using mobile for internet use. 82.50 % of adolescents were use mobile internet data.

**Table 2 : Level of knowledge score of adolescence in pre and post test**  
n=80

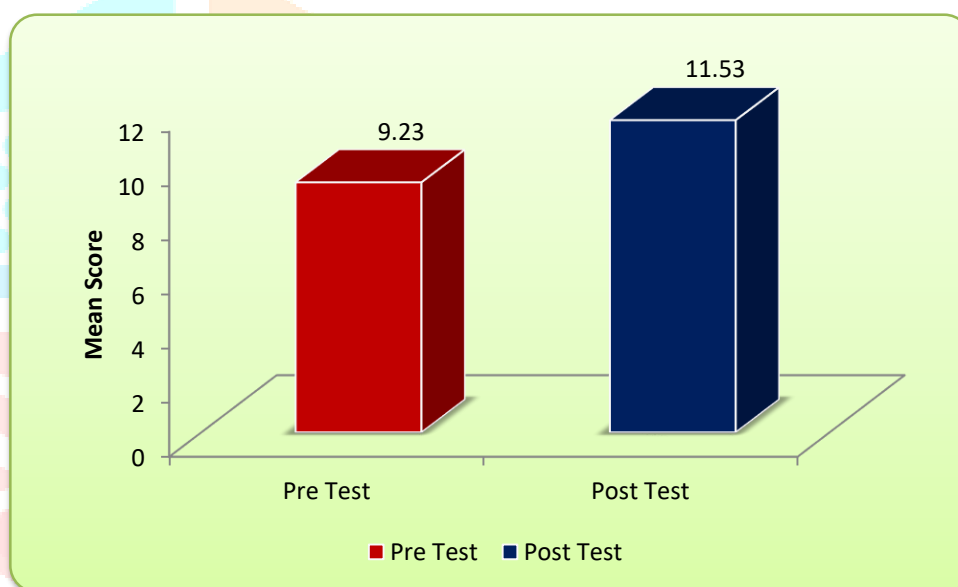
Level of Knowledge Score	Pre test		Post test		$\chi^2$ value	p-value
	f	%	f	%		
Poor	3	3.75	0	0	14.00	p < 0.002, Significant
Average	48	60	35	43.75		
Good	29	36.25	37	46.25		
Excellent	0	0	8	10		

The above table 2 depicts that In pre test 3.75 % of the adolescents had poor level of knowledge score, 60 % had average level of knowledge score and 36.25 % of adolescents were having good level of knowledge. In post test 46.25 % of the adolescents had good level of knowledge score and 10 % of the adolescents had excellent level of knowledge score. The difference between pre test and post test level of knowledge score is found to be statistically significant ( $\chi^2$ -value= 14.00). Hence  $H_0$  is rejected and  $H_1$  is accepted.

**Table 3 : Significance of knowledge score regarding Ill effects of internet addiction of adolescents of selected commerce college of the city before and after Self instructional module**

n=80						
Overall	Maximum score	Mean	Standard deviation	Mean percentage	t-value	p-value
Pre Test	14	9.23	2.39	46.15	5.75	0.000 S, $p < 0.05$
Post Test	18	11.53	3.18	57.65		

The above table 3 depicts that in the pre test the mean of the knowledge score obtained by the sample was 9.23 and in the post test it rise to 11.53. The knowledge score of the sample shows marked improvement after giving Self instructional module. From the above table, it is evident that the calculated 't' value is greater than the table value of 't' at 0.05 level. This indicates that Self instructional module is effective in improving the knowledge of the adolescents of selected commerce college of the city regarding Ill effects of internet addiction. Hence  $H_0$  is rejected and  $H_1$  is accepted.



## DISCUSSION

### Description of the adolescents of selected commerce college of the city according to their demographic Variables

In present study, Majority of the adolescent under study were between the age group of 18 - 19 years. Mostly 66.20 % of adolescents were female and 33.80 % of adolescents were male. Majority 35 % of adolescents were living in nuclear family and 58.80 % of adolescents were living in joint family. Majority 61.30 % of the adolescents were having their own house. Highest percentage 77.50 % of adolescents living in urban area. majority 81.20 % of the parents of adolescents were literate and 18.80 % of the parents of adolescents were illiterate. Majority 86.30 % of adolescents were having less than 4 lakh income annually. Mostly 52.40 % of adolescents were spent 2 – 4 hours on internet. Majority 95 % of adolescents were using mobile for internet use. 82.50 % of adolescents were use mobile internet data.

A similar study conducted by S. Karthika, Amanpreet Kaur, Annu Saini, Bawandeep Kaur, Bharti, Damini, Gunjan. To assess the knowledge & attitude internet usage among students. The study revealed that

59.66% of students often switch to excessive computer use & internet access. It also shows that 72% of females residing in hostel (48.55%) use internet in mobile (75%) with main purpose to update knowledge (43.33%) using mobile data (34.33%). About 58% of students had average knowledge regarding internet usage<sup>11</sup>

### **Assessment of knowledge score of adolescents of selected commerce college of the city regarding Ill effects of internet addiction**

In present study, in the pre test mean Knowledge score was 9.23 whereas in post test it was 11.53. It reveals that, there is marked improvement in knowledge of adolescent regarding Ill effects of internet addiction after giving self instructional Module.

A similar study conducted by S. Karthika, Amanpreet Kaur, Annu Saini, Bawandeep Kaur, Bharti, Damini, Gunjan. To assess the knowledge & attitude internet usage among students. A descriptive study was undertaken in different college covering 300 students from various department of engineering, arts, commerce & others in Ambala, Haryana. Using pencil technique every student had been given time of 15-20 mins. The study revealed that mean in terms of knowledge score is 9.52, median score in terms of knowledge score is 10 and standard deviation in terms of knowledge is 2.5.<sup>11</sup>

### **Evaluate the effectiveness of Self instructional module on Ill effects of internet addiction**

In present study, in the pre test the mean of the knowledge score obtained by the sample was 9.23 and in the post test it rise to 11.53. The knowledge score of the sample shows marked improvement after giving Self instructional module. From the table 13, it is evident that the calculated 't' value is greater than the table value of 't' at 0.05 level. This indicates that Self instructional module is effective in improving the knowledge of the adolescents of selected commerce college of the city regarding Ill effects of internet addiction. Hence  $H_0$  is rejected and  $H_1$  is accepted.

A similar study conducted by Joy, Jincy, Rappai, Mary and Anumol. to assess and evaluate the effectiveness of the Self Instruction Module(SIM) on level of knowledge regarding internet addiction among adolescents. They observed that the overall mean percentage in pre-test is 33% and in post-test is 61% in their knowledge scores as measured by improvement in mean percentage from pre test to post test ( $p < 0.05$ ).<sup>12</sup>

### **Level of knowledge score of subject's pre and post test**

In present study, In pre test 3.75 % of the adolescents had poor level of knowledge score, 60 % had average level of knowledge score and 36.25 % of adolescents were having good level of knowledge. In post test 46.25 % of the adolescents had good level of knowledge score and 10 % of the adolescents had excellent level of knowledge score. The difference between pre test and post test level of knowledge score is found to be statistically significant ( $\chi^2$ -value= 14.00). Hence  **$H_0$  is rejected and  $H_1$  is accepted.**

## Associate knowledge of adolescents of selected commerce college of the city with demographic variables

In present study, by applying one way ANOVA to post test knowledge score with selected demographic variable of adolescent of selected commerce college of the city, Result shows that, there was no significant difference found in post test knowledge with selected demographic variables except age and amount of time spent on internet in hours.

## CONCLUSION

The study was carried out to assess the effectiveness of self instructional module on knowledge regarding ill effects of internet addiction among adolescents. in the pre test the mean of the knowledge score obtained by the sample was 9.23 and in the post test it rise to 11.53. The knowledge score of the sample shows marked improvement after giving Self instructional module. This indicates that Self instructional module is effective in improving the knowledge of the adolescents of selected commerce college of the city regarding Ill effects of internet addiction..

## REFERENCES

1. Renu Bala, Anchal, Riya, Pooja Kumari, A descriptive study to assess the knowledge of nursing students regarding mobile and internet addiction in Himalayan school of nursing Kala-Amb district Sirmour, Himachal Pradesh International Journal of Advance Research in Community Health Nursing 2020; 2(1): 17-21 E-ISSN: 2664-1666.
2. Young KS: Caught in the Net: How to Recognize the Signs of Internet Addiction and a Winning Strategy for Recovery. New York, Wiley, 1998.
3. sKo CH, Yen JY, Chen CC, et al: Tridimensional personality of adolescents with internet addiction and substance use experience. Can J Psychiatry 2006; 51: 887–894. Available from- <https://doi.org/10.1177/070674370605101404>
4. Beard KW, Wolf EM. Modification in the proposed diagnostic criteria for Internet addiction. Cyberpsychol Behav 2001; 4(3): 377-83. Available from: <https://psycnet.apa.org/doi/10.1089/109493101300210286>
5. Niemz K, Griffiths M, Banyard P. Prevalence of pathological Internet use among university students and correlations with self-esteem, the General Health Questionnaire (GHQ), and disinhibition. Cyberpsychol Behav 005; 8(6): 562-70.
6. Shapira NA, Goldsmith TD, Keck PE, Jr. and Khosla UM, McElroy SL. Psychiatric features of individuals with problematic internet use. J Affect Disord 2000; 57(1-3): 267-72
7. Kim K, Ryu E, Chon MY, Yeun EJ, Choi SY, Seo JS, et al. Internet addiction in Korean adolescents and its relation to depression and suicidal ideation: a questionnaire survey. Int J Nurs Stud 2006; 43(2): 185-92.
8. Internet World Statistics. 2017. (Accessed June 2017) [www.internetworldstats.com](http://www.internetworldstats.com).
9. Ko CH: Internet gaming disorder. Curr Addict Rep 2014; 1: 177–185.

10. Ministry of Information and Communication Technology, Islamic Republic of Iran. Internet branch. 2009. [Online];[cited 2011 November 15]. URL:<http://www.ict.gov.ir>
11. S. Karthika, Amanpreet Kaur, Annu Saini, Bawandeep Kaur, Bharti, Damini, Gunjan. A descriptive study to assess the knowledge and attitude regarding internet usage and its addiction level among students studying in selected colleges of ambala, haryana. World Journal Of Pharmacy And Pharmaceutical Sciences. Volume 6, Issue 9, 477-503.
12. Joy, Jincy Rappai, Mary; Anumol,. Effectiveness of self instructional module (sim) on knowledge regarding the ill effects of internet addiction among adolescents. Indian Journal of Psychiatric Nursing 14(1):p 1-2, July 2017. | DOI: 10.4103/2231-1505.262412

