RESEARCH ARTICLE

IMPACT OF MOBILE PHONES ON PERSONALITY DEVELOPMENT OF SECONDARY SCHOOL STUDENTS

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Abstract

The invention of wireless communication is one of the greatest inventions of mankind. The mobile phones are the devices that use wireless communication. With the passage of time mobile phones were converted into smart phones providing a lot of features to the users and thus these devices gradually became the inseparable part of people’s lives. In every sector, people started using these devices for effective outcomes, especially in the education sector. Soon, it was observed that the impact of these devices on one’s life was very high. The impacts can be negative as well as positive. For the sake of validating the consequences of positive and negative impacts of mobile phones, the investigator has carried out the present study in a small region targeting especially the secondary school students of city region of Patna, Bihar. The aim of the study is to find out about the impact of mobile phones on personality development of secondary school students. The survey method was incorporated to collect the required data. Two types of questionnaires were prepared, one related to the impact of mobile phones and the other related to personality development. ANOVA, ‘t’-test and mean were the statistical techniques used for analysing the data. As a result of analysis, it is found that there is no significant relation between impact of mobile phone and personality development of secondary school students. However it is found that 67.29% of the boys and 58.06% of the girls in the sample have average mobile impact. 76.64% of the boys and 65.58 % of the girls have average level of personality development.

Introduction:

The present generation of the people all across the globe knows the undeniable fact of the present time i.e. Education and Technology are Complementary. Education paves the way to learn and improve technology. Technology provides access to unlimited content and thus facilitates education. The most handy among all the educational technologies is the smart phone or mobile devices.

Thomas Raymont(1906) says that “Education in the narrow sense does not include self-culture and the general influences of one’s surroundings, but only those special influences which are consciously and designedly brought to
bear upon the youngster by the adult persons of the community whether through the family, the church or the state.”

Broadly speaking He further states- “It is really life that educates us.”

Lodge has his own definition of Education- “Whatever broadens our horizon, deepens our insight, refines our reactions, and stimulates our thoughts and feelings educates us.”

Pestalozzi(1801) says that - “Education is natural, harmonious and progressive development of man’s innate powers.” This tells that education is not just learning some things from books or some skills, it is more vast and deep, it is getting access to the full potential of a person for the good of the society. Since the dawn of human civilization, as the society has developed, so did the education system. The development of education system means the development of the ways to impart knowledge, the tools of imparting knowledge, the set-up for imparting knowledge, etc. The latest reform in education took place with the introduction of The Internet. With the growing popularity and usage of the internet, people all round the globe grew smarter and more familiar to the contemporary newer technologies and gadgets. One such technology was the Mobile Phone technology.

All the above statements and definitions suggest that personality of a person depends on education. It is crystal clear that Education, Technology and Personality are interrelated. Let us now see what technology means and how it is affecting the lives of the masses at present.

Technology is etymologically taken from Greek ‘tekhnologia’ meaning ‘systematic treatment’ or from “tekhnē” meaning ‘art, craft’ and -logia. The 21st century is considered as the era of Technology. The use of Technology in today’s scenario is inevitable. The overall growth of a person or even a nation depends on effective use of technology. As far as the growth of a person is concerned, education plays the most important role. Thus, pertaining to the current scenario, education and technology are inseparable. Hence, one’s personality is shaped together by the outcomes of education and impact of technology.

It is quite evident that Mobiles or Cellphones are the most loved and used invention of all the invented technologies. Thus, it is obvious to study how mobile phones affect education and in turn personalities of different persons.

Significance of the Study
The present study is the need of the time as it tends to fill the gap present in the previous studies related to mobile technology and its impacts. The current study simply points out how the technology can make people slaves by engaging them in one or other usage like the mobile phones. Mobile phones have cluster of applications and most of the time people engage themselves in checking notifications from different application. Not only the children, the elders also land in the trap set by mobile devices by developing the habit of checking notifications time-to-time. Hence the investigator, by carrying out the concerned research, not only makes the parents beware of the negative sides of the mobile technology but also attracts the attention of the people towards taking responsibility to control the usage of newer technologies more wisely.

Statement of the Problem
Use of mobile phones enforces distraction in studies and decreases concentration level among secondary school students. They are being demotivated and divided from their path.

Therefore, the study is to find the degree of impact of use of mobile phones on personality development of secondary school students.

Operational Definition
Impact of mobile phones
The effect of use of mobile phones on personality development.

Personality Development
All round development of a person including physical, social, intellectual, value system and emotional development.

Three dimensions D1, D2, D3 has been considered in the present study regarding personality development.

D1: Extraversion- introversion
Extraversion tends to exhibit outgoing, talkative, energetic behavior, whereas introversion tends to exhibit more reserved and solitary behavior.

D2: High Self Concept- Low Self Concept
One's self-concept is a collection of beliefs about oneself. Generally, self-concept embodies the answer to "Who am I?"

D3: High adjustment- Low adjustment
Adjustment refers to the behavioral process of balancing conflicting needs, or needs challenged by obstacles in the environment.

Secondary school students
Students of Std. 9 and 10th (adolescents).

Objectives of the Study:
1. To find whether there is any significant difference between Class IX and Class X Secondary School Students in their impact of mobile Usage
2. To find whether there is any significant difference between Male and Female Secondary School Students in their impact of mobile Usage
3. To find whether there is any significant difference between 13-15 years old and 16-17 years old Secondary School Students in their impact of mobile Usage.
4. To find whether there is any significant difference between Secondary School Students in their impact of mobile Usage with respect to mother’s annual income.
5. To find whether there is any significant difference between government and private Secondary School Students in their impact of mobile Usage.

Tools Used
1. Self- Constructed and validated tool for finding impact of mobile phone usage.
2. Personality Inventory by Manju Aggarwal.

Method Used
Survey method was employed by the investigator for the present research.

Population for the Study
The population of the study constitutes the secondary students of class 9th and 10th of all the government and private schools of city region of Patna.

Sample
The sample for the present study constitutes a total of 200 students. 50 each from two government schools and 50 each from two private schools of Patna.

Statistical Techniques Used
1. Arithmetic Mean
2. Standard Deviation
3. Percentage Analysis
4. 't' test
5. ANOVA ('F' test)
6. Product- Moment Correlation

Delimitations
1. Delimited to city region of Patna only
2. Delimited to 200 samples
3. Delimited to Secondary Schools

Null Hypotheses
1. There is no significant difference between boys and girls of secondarieschools in the use of mobile phones.
2. There is no significant difference between private and government secondary schools students in the use of mobile phones.
3. There is no significant difference between Hindi medium and English medium secondary school students in the use of mobile phones.
4. There is no significant difference between Secondary School Students in their impact of mobile Usage with respect to mother’s annual income.
5. There is no significant difference between students of private secondary school and government secondary school students in their personality development.

Hypotheses Testing

Null Hypothesis - 1
There is no significant difference between boys and girls of secondary schools in the use of mobile phones.

Table 1: Significant difference between mean scores of impact of mobile usage with respect to Class

| Class      | N   | Mean  | StdDev  | 't'- value | 'p'- value | Level of Signi. |
|------------|-----|-------|---------|------------|------------|-----------------|
| Cognitive  |     |       |         |            |            |                 |
| Class IX   | 100 | 49.70 | 12.917  | .350       | >0.05      | NS              |
| Class X    | 100 | 49.14 | 9.475   |            |            |                 |
| Affective  |     |       |         |            |            |                 |
| Class IX   | 100 | 60.77 | 13.963  | 1.162      | >0.05      | NS              |
| Class X    | 100 | 58.56 | 12.905  |            |            |                 |
| Psychomotor|     |       |         |            |            |                 |
| Class IX   | 100 | 60.70 | 15.771  | .336       | >0.05      | NS              |
| Class X    | 100 | 59.98 | 14.475  |            |            |                 |
| Mobile Impact |   |       |         |            |            |                 |
| Class IX   | 100 | 171.17| 36.790  | .725       | >0.05      | NS              |
| Class X    | 100 | 167.68| 30.997  |            |            |                 |

It is inferred from the above table that the calculated value of ‘t’ is less than the table value of ‘t’ (1.96) at 5% level of significance for 198 df. Therefore, the null hypothesis is not rejected. Hence, there is no significant difference between Class IX and Class X Secondary School Students in their impact of mobile Usage.

Null Hypothesis - 2
There is no significant difference between private and government secondary schools students in the use of mobile phones.

Table 2: Significant difference between mean scores of impact of mobile usage with respect to Gender

| Gender      | N   | Mean  | StdDev  | 't'- value | 'p'- value | Level of Signi. |
|-------------|-----|-------|---------|------------|------------|-----------------|
| Cognitive   |     |       |         |            |            |                 |
| Male        | 107 | 48.51 | 11.157  | -1.217     | >0.05      | NS              |
| Female      | 93  | 50.46 | 11.439  |            |            |                 |
| Affective   |     |       |         |            |            |                 |
| Male        | 107 | 58.75 | 13.837  | -1.034     | >0.05      | NS              |
| Female      | 93  | 60.72 | 12.999  |            |            |                 |
| Psychomotor |     |       |         |            |            |                 |
| Male        | 107 | 58.92 | 15.922  | -1.434     | >0.05      | NS              |
| Female      | 93  | 61.98 | 14.009  |            |            |                 |
| Mobile Impact |   |       |         |            |            |                 |
| Male        | 107 | 166.18| 35.155  | -1.454     | >0.05      | NS              |
| Female      | 93  | 173.16| 32.352  |            |            |                 |

It is inferred from the above table that the calculated value of ‘t’ is less than the table value of ‘t’ (1.96) at 5% level of significance for 198 df. Therefore, the null hypothesis is not rejected. Hence, there is no significant difference between male and female Secondary School Students in their impact of mobile Usage.

Null Hypothesis - 3
There is no significant difference between Hindi medium and English medium secondary school students in the use of mobile phones.

Table 3: Significant difference between mean scores of impact of mobile usage with respect to Age

| Age     | N   | Mean  | StdDev  | 't'- value | 'p'- value | Level of Signi. |
|---------|-----|-------|---------|------------|------------|-----------------|
|         |     |       |         |            |            |                 |

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It is inferred from the above table that the calculated value of ‘t’ is less than the table value of ‘t’ (1.96) at 5% level of significance for 198 df. Therefore, the null hypothesis is not rejected. Hence, there is no significant difference between 13-15 years old and 16-17 years old Secondary School Students in their impact of mobile usage.

**Null Hypothesis - 4**

There is no significant difference between Secondary School Students in their impact of mobile usage with respect to mother’s annual income.

**Table 4:** Significant difference between mean scores of impact of mobile usage w.r.t. Mother’s Annual Income.

| Mother’s Income | N   | Mean  | StdDev | ‘t’- value | p’- value | Level of Significance |
|-----------------|-----|-------|--------|------------|-----------|----------------------|
| **Cognitive**   |     |       |        |            |           |                     |
| Rs. 1-5 Lakhs   | 194 | 49.32 | 11.103 | 0.714      | >0.05     | NS                   |
| Rs. 5-10 lakhs  | 6   | 52.67 | 17.694 |            |           |                      |
| **Affective**   |     |       |        |            |           |                     |
| Rs. 1-5 Lakhs   | 194 | 59.40 | 13.505 | 1.577      | >0.05     | NS                   |
| Rs. 5-10 lakhs  | 6   | 68.17 | 8.796  |            |           |                      |
| **Psychomotor** |     |       |        |            |           |                     |
| Rs. 1-5 Lakhs   | 194 | 59.85 | 15.057 | 2.645      | <0.01     | S                    |
| Rs. 5-10 lakhs  | 6   | 76.17 | 4.262  |            |           |                      |
| **Mobile Impact** |     |       |        |            |           |                     |
| Rs. 1-5 Lakhs   | 194 | 168.57| 33.929 | -2.034     | <0.05     | S                    |
| Rs. 5-10 lakhs  | 6   | 197.00| 23.866 |            |           |                      |

It is inferred from the above table that the calculated value of ‘t’ is less than the table value of ‘t’ (1.96) at 5% level of significance for 198 df in their cognitive and affective domain whereas the calculated value of ‘t’ is greater than the table value of ‘t’ at 5% level of significance for 198 df in psychomotor domain and mobile impact. Therefore, the null hypothesis is rejected. Hence, there is significant difference between secondary school students in their impact of mobile usage with respect to their mothers’ annual income in their impact of mobile usage with respect to mothers’ annual income in psychomotor domain. However there is significant difference between secondary school students in their impact of mobile usage with respect to their mothers’ annual income in their impact of mobile usage with respect to mothers’ annual income in their cognitive and affective domain.

**Null Hypothesis - 5**

There is no significant difference between students of private secondary school and government secondary school students in their personality development.

**Table 5:** Significant difference between mean scores of impact of mobile usage w.r.t. Type of School.

| Type of School | N   | Mean  | StdDev | ‘t’- value | p’- value | Level of Significance |
|---------------|-----|-------|--------|------------|-----------|----------------------|
| **Cognitive** |     |       |        |            |           |                     |
| Government    | 101 | 44.99 | 9.418  | 6.084      | < 0.01    | S                    |
| Private       | 99  | 53.94 | 11.316 |            |           |                      |
| **Affective** |     |       |        |            |           |                     |
| Government    | 101 | 53.99 | 13.680 | 6.645      | < 0.01    | S                    |
| Private       | 99  | 65.45 | 10.473 |            |           |                      |
| **Psychomotor** |     |       |        |            |           |                     |
| Government    | 101 | 51.60 | 14.127 | 10.168     | < 0.01    | S                    |
| Private       | 99  | 69.25 | 10.034 |            |           |                      |
| **Mobile Impact** |     |       |        |            |           |                     |
| Government    | 101 | 150.58| 31.231 | 9.549      | < 0.01    | S                    |
| Private       | 99  | 188.65| 24.693 |            |           |                      |
It is inferred from the above table that the calculated value of ‘t’ is greater than the table value of ‘t’ (1.96) at 5% level of significance for 198 df. Therefore, the null hypothesis is not accepted. Hence, there is significant difference between government and private Secondary School Students in their impact of mobile Usage.

Conclusion:-

After the research study, the investigator put forward the concluded idea that the percentage of students getting impacted by Mobile Phones is significant when compared to the sample with respect to gender, class, age and other bases. The study also tells that there is no significant relation between mobile impact and personality development. Even then it is essential to take precautionary measures to control this potential threat that, if unchecked, can be disastrous to the future generations.

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