

A Study of Lateral Thinking of Secondary School Students

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Abstract:

Lateral thinking is a creative problem-solving approach that encourages looking at problems from different, non-traditional angles. It was developed by Edward de Bono and is especially helpful for students to enhance their critical thinking and creativity. In this study, the main objective of researcher was to investigate lateral thinking of secondary school students selected from Dahegam taluka. The researcher used descriptive survey method for this study. The researcher randomly selected 300 secondary school students. The students were provided Lateral Thinking Test. The researcher analyzed the data obtained on the basis of Lateral Thinking Test using appropriate statistical techniques. The research revealed that the students of urban area have more lateral thinking than the students of rural area. It was also revealed that the boys have more lateral thinking than the girls.

Keywords: Lateral thinking, Secondary school, Students, Dahegam

1. Introduction

Lateral thinking is a type of thinking that involves looking at problems from different angles and coming up with creative solutions. It is often contrasted with vertical thinking, a more linear and logical approach to problem solving. Lateral thinking is a creative problem-solving approach that encourages looking at problems from different, non-traditional angles. It was developed by Edward de Bono and is especially helpful for students to enhance their critical thinking and creativity. To develop the habit of not settling for the first solution that comes to mind but exploring different approaches. Lateral thinking is a creative approach to problem solving that involves looking at problems from different perspectives and coming up with innovative solutions. It is also known as horizontal thinking.

2. Objectives

Objectives of present study are given as below:

- 1.To study lateral thinking of secondary school students.
- 2.To study lateral thinking of secondary school students in the context of area of school.
- 3.To study lateral thinking of secondary school students in the context of gender.

3. Variables

Variables of the present study are given as below:

1.Indent variables	U	
1) Area of School		2) Gender
-Urban, -Rural		-Boys, -Girls
2.Dependent Variable		

Scores of Lateral Thinking Test

4. Hypotheses

- Ho₁ There is no significant difference between mean scores of Lateral Thinking Test obtained by students of urban and rural area.
- Ho₂ There is no significant difference between mean scores of Lateral Thinking Test obtained by boys and girls.

5. Limitations

There are two limitations of present study as given below:

- 1. Present study was conducted on secondary school students of Dahegam Taluka.
- 2. The researcher used self-constructed Lateral Thinking Test.

6. Research Method

The researcher used descriptive survey method for this study in which a randomly selected sample from defined population were given Lateral Thinking Test and obtained assigned scores of tests.

7. Research Tool

The researcher constructed a Lateral Thinking Test in which there were 30 multiple choice questions. Each question has four responses. Out of these responses only one response was correct, rest of the responses were incorrect. Thus, the test was having total 30 marks. Each question of this test was checking lateral thinking of students.

8. Sample of the Study

The researcher randomly selected 300 secondary school students selected from Dahegam taluka. **Table 1: Sample of the Study**

		sample of the Stud	y
Area/Gender	Urban	Rural	Total
Boys	75	75	150
Girls	75	75	150
Total	150	150	300

The researcher selected 75 boys and 75 girls from urban area of Dahegam taluka. Another 75 boys and 75 girls were selected from rural area of Dahegam taluka. Overall, 150 students were selected from urban area and 150 girls from rural area of Dahegam taluka.

9. Procedure of Data Collection

The researcher created google form of Lateral Thinking Test. The link of this google form was sent to secondary school teachers of different schools in WhatsApp groups. Teachers were shared this link in to their school's WhatsApp groups. Thus, data was directly collected in excel sheet created by google form. These data were classified and arranged in tabulated forms and analyzed the data using statistical formulas. The objectives of this study were to check effect of independent variables on scores of Lateral Thinking Tests obtained by secondary school students.

10. Data Analysis

The researcher used t-test to analyze the data.

Ho₁There is no significant difference between mean scores of Lateral Thinking Test obtained by students of urban and rural area.

 Table 2: Result of t-test conducted between mean scores of Lateral Thinking Test obtained by students of urban and rural area

Area	Ν	Μ	SD	SED	t-value	Significance
Urban	150	15.48	4.16	0.51	4.70	0.01
Rural	150	13.10	4.62			
df	0.05	0.01				
298	1.97	2.59				

Table 2.0 shows the result of t-test between mean scores of Lateral Thinking Test obtained by students of urban and rural area. The calculated t-value was found 4.70. While for df=298, table t-values are 1.97 at 0.05 level and 2.59 at 0.01 level. Calculated t-value is more than table t-values at both levels. Thus, hypothesis is rejected and there is a significant difference between mean scores of Lateral Thinking Test obtained by the students of urban and rural area. Moreover, mean score of students of

urban area is more than mean score of students of rural area. This revealed that the students of urban area have more lateral thinking than the students of rural area.

Ho₂There is no significant difference between mean scores of Lateral Thinking Test obtained by boys and girls.

boys and girls					U	
Gender	Ν	Μ	SD	SED	t-value	Significance
Boys	150	15.75	4.62	0.51	5.75	0.01
Girls	150	12.83	4.15			
df	0.05	0.01				
298	1.97	2.59				

 Table 3: Result of t-test conducted between mean scores of Lateral Thinking Test obtained by

Table 3.0 shows the result of t-test between mean scores of Lateral Thinking Test obtained by boys and girls. The calculated t-value was found 5.75. While for df=298, table t-values are 1.97 at 0.05 level and 2.59 at 0.01 level. Calculated t-value is more than table t-values at both levels. Thus, hypothesis is rejected and there is a significant difference between mean scores of Lateral Thinking Test obtained by boys and girls. Moreover, mean score of boys is more than mean score girls. This revealed that the boys have more lateral thinking than the girls.

11. Major Findings

Major findings obtained by data analysis are as mentioned below:

- 1. The students of urban area have more lateral thinking than the students of rural area.
- 2. The boys have more lateral thinking than the girls.

12. Conclusion

In this study, the main objective of researcher was to investigate lateral thinking of secondary school students selected from Dahegam taluka. The researcher randomly selected 300 secondary school students. The students were provided Lateral Thinking Test. The researcher analyzed the data obtained on the basis of Lateral Thinking Test using appropriate statistical techniques. The research revealed that the students of urban area have more lateral thinking than the students of rural area. It was also revealed that the boys have more lateral thinking than the girls.

References

1.Aboukinane, C. (2007), A qualitative study of creative thinking using experiential learning in an agricultural and life sciences course (Unpublished doctoral dissertation), A&M University, Texas.

2.Anastasi, A., & Urbina, S. (2016), Psychological Testing (7th ed.), Noida: Pearson Education India. 3.Apter, M. J. (1973). Computer in Psychology, John Wiley & Sons, UK.

4.Best, J.W. & J.V., Kahn, (1989). Research in Education, New Delhi: Prentice-Hall of India Pvt. Ltd.

5.Goode, W. J. and Paul, H. (1952), Method in Social Research, New York: Mc Graw Hill book co.

6.Kerlinger, F. N. Foundation of Behaviours Research, (2nd Edition), New Delhi: Surjeet Publication.

7.Markle, S. (1985). A Guide to Instruction and Evaluation, Illinois: Stipes Publishing.

8.Patel, R. S (2018), Research in Education, Ahmedabad: Jay Publication.

- 9.Sharma, K. (2012), Thinking and learning styles of prospective teachers in relation to their selfefficacy, emotional intelligence, achievement-motivation and attitude towards teaching (Unpublished doctoral dissertation), Himachal Pradesh University, Shimla.
- 10. Shukla, S. S. (2011). Principles and Techniques of Teaching and Learning, Agra Agrawal Publication.
- 11. Siddhu, K.S. (1985). Methodology of Research in Education, New Delhi: Sterling Publishing Pvt. Ltd.