



**Development of Activity Based Program on Creativity and
Testing Its Effectiveness**

By

Fatemeh Behdarvand

Research scholar, University of Mumbai, India

Abstract

This study was conducted an experimental to find out the effectiveness of the activity based program (ABP) on development of creativity on standard VII students in English medium school in pune city. To test hypothesis, a pre-test and post-test equivalent group design was used (50 students as control group and 50 students as experimental group). Baqer Mehdi, non -verbal (TCF) test was used for pre-test as well as post-test. The result indicated that, the program developed by the researcher had a significant effect on creative thinking of students. The mean in the post-test of experimental group was significantly higher than the mean in post-test of the control group. The program helped in improvement of the imagination and novelty of idea on students.

Keywords: Creativity, VII Standard Pupils, Activity Based Program (ABP)

1. Introduction

All of us possess creative abilities whether in lesser or greater amount. The creative process and its output are very much linked with creative thinking. One who can think creatively and

constructively is sure to lead and progress well on the path of creativity. Creativity can be defined as the ability to discover, create or produce a new idea or object including re-arrangement of what is already known to us. Of all the abilities that man has, which distinguish him from the rest of animal life, creativity is undoubtedly the most unique. About four or five decades back creativity was attributed to a divine source and was termed as spark of genius or revelation. But, today it is attributed to psychic functioning of human beings.(Reddy,M.S.& Rao, D.B, 2003,P.1)

High creative students show better social, personal, emotional and educational adjustment and ego strength than low-creative, possess high degree of self concept, more anxious, need-achievement, take risks, more assertive, control of impulse, have wide range of interests and realistically higher level of aspiration. Rathe A.R (1998), They have better reading habits, independent in judgment, exhibit greater autonomy, self sufficiency and self direction (Reddy,M.S,2005,P.26). Creative people will be a valuable resource in the rapid process of change, and especially of technological change, which has gripped our world in recent years. The systems which shape even day-to-day life are becoming so complex that the presence of highly able thinkers, capable of dealing comfortably both with modern technology & also with breathtakingly complex interactions between natural & manmade systems, is rapidly becoming a prerequisite for the maintenance of a way of life which is fit for human beings (McLeod, and Cropley, 1989,p.12). It is obviously impossible to prepare to day's school children to cope with all the demands they will encounter in lives (Torrance,1965,p.12).

In this view of the future, traditional responses to the demand for education that are essentially quantitative & knowledge based are no longer appropriate. It is not enough to supply each child early in life with a store of knowledge to be drawn on from then on. Each individual must be equipped to seize learning opportunities throughout life, both to broaden her or his knowledge, skills and attitudes, and to adapt to a changing, complex and inter-dependent world

(UNESCO,1996,p.65). There is a great need to identify ,develop & cherish our creative man power our educational and social system. Must provide opportunities and conditions required for the development of creative abilities in our youth, and prepare them for unknown world of tomorrow. . If we are to find solutions to our problems, the education system has a moral duty to creative ability/potential in our land for in it lies our greatest hope for the future.

Creative expression is essential for leading a happy life. Since the dawn of civilization, man has experienced the greatest pleasure and by adopting creative values in his life. In addition the future of our civilization depends upon the quality of the creative imagination of the next generation (Torrance,1962 b,p.33). According to Torrance in teaching all students should be provided with opportunities for creative expression, so that they are turned into contented, balanced and happy citizens. Torrance outline that creative thinking is indeed a powerful force, it has given as the alphabet, printing ,radio, television, computers, spacecraft, great art , architecture , music ,and literature. It has given us our great advances in scientific discovery and medicine. In view of importance of creativity in all walks of life, including educational settings, there is a need to explore the field scientifically and with greater rigor .

It looks strange that only within the past three or four decades that creativity has central concern for educational research , in spite of the fact creative thinking has been considered, since ages immemorial ,as the highest of mental functions . As mentioned earlier, this concern for research in creativity has been necessitated by the fast changing world, which itself a consequence of man's creative genius(Reddy,M.S.& Rao, D.B, 2003,P.3) .

2. Historical Studies on Creativity

Research on creativity started in 1911 in the form of tests of creative thinking. Inkblot tests of Binet were used to find out creative ability in children. In 1916, Chassel used a number of tests for

originally. In 1919, Carbett invented the factors of cleverness in the study of ratings of several personality traits. In 1927, Hargreaves found a difference in the fluency factor and originality factors. In 1906, Terman recognized creativity as a cognitive variable. During the period since 1930 to 1950 not much research was conducted in the field of creativity. In 1950, Guilford drew the attention of scholars to creativity in his presidential address to American Psychological Association. After this, research in the field of creativity advanced with speed. In 1950, Guilford tried to systematize the dimensions of creative thinking. In 1963, Thorndike experimented upon the relationship of creativity and intelligence. In 1946 Ward supported the contention of Thorndike that there is a positive correlation between intelligence and creativity. These studies led to the conclusion that creativity is not absolutely free from intelligence. After this many psychologists experimented upon different factors. In 1962 Torrance established the relationship of creativity and general intelligence. Among the experiments concerning the correlation of intelligence and creativity, were those of Cicirelli in 1964, Yamamoto in 1965 and Perry in 1969 (Sharma, Y.K., 2004, P.366-367).

3. Importance and significance of the creativity

Understanding of the creativity process is particularly important because it can assist and control the learning process and bring a process of change, development, evolution and imagination of subjective life and save the inventive minds that are stifled in opposition and hindrance. If this neglect is longer a sickening poverty which has already come in would persist. No education is complete without due consideration being given to the creative and aesthetic development of child. This can be best done by providing the child ample opportunities for self-expression. Education must develop the child's aesthetic creativity and productivity should grow simultaneously and more happily for a growing sense of self-worth and personal dignity.

The creative process helps children to express their thoughts emotions, fillings and drives, more freely and fully and enables them to move towards self-expression and self- fulfilment and contributors to the fullness of life. The creative urge that lies at the root of every mind, though the medium of such experiences can be best developed among our children. Creative experiences provide the child with the basic requirement for creative learning which involves experiments and exploration (Reddy,M.S.& Rao, D.B, 2003,P.193) . Creativity is the ability to see something in a new way, to see and solve problems and physical experiences that are new unique, or different. Creativity is a critical aspect of a person's life, starting from inside the womb onward through adulthood.

Creativity comes out whenever opportunities arise. It is evident in science exhibitions, science fairs, drawing, essay writing and etc. Hence, such opportunities that elevate the creative thinking should be inculcated in the minds of children from their school age. There for it is necessary to develop creativity/creative thinking among the pupils at primary school (Prasad,S.S.,& Rao,D.B,2009,p.1-2). So researcher was felt the need of experiment, encouragement for creativity through recognizing and improving it in school students. Scientific research in the late twentieth century revealed how the quality of interaction with unborn infants affects their later development of creative abilities. From birth to eighteen months, infants can be encouraged to engage in creativity by playing with a variety of safe household material, such as margarine tubs, empty boxes, and large empty spools. Parents and caregivers can encourage experimentation by showing excitement and interest in what babies do. Though parents and teachers have important role to play in fostering creativity in child and make the educational process more effective and creative, we forget that child's world is an active world. It has creative impulse within it. Very often we discourage rather than encourage this creative impulse within a child.

4. Objectives of the Research

- To find out the existing level of students in creative thinking.
- To develop an activity based programme on creativity for pupils of standard VII.
- To see the effectiveness of the programme in developing creativity among pupils of standard VII.

5. Research Method

Population: All students of VII Standard English medium schools were selected as population.

Sample: Purposive sampling was used in selecting the school for conducting the research. The researcher has selected English medium school in Pune city, to carry out the study. The school had six divisions in VII standard class. Each division had fifty students. Hence the total number of pupils in this class was 300. Out of six divisions' two divisions of standard VII of this school were selected by simple random sampling: one as the experimental group and the other as the control group. The number of students in each group was fifty. These groups were equated on the basis of pre-test score.

Tools for data collection: The Non-verbal (TCF) Baqer Mehdi test of creative thinking is intended to measure the individual's ability to deal with figural content in creative manner.

Statistical techniques: Results were statistically analyzed by, i) Mean, ii) standard deviation iii)'t' Value

6. Methodology of the study

The selected method was decided on the basis of the nature of the problem. An Experiment was conducted to find out the effectiveness of the "Activity-based program (ABP) on development of creativity of standard VII and Students from English medium schools in Pune city were selected for study". To test Hypothesis, "A pre-test and post-test equivalent group design" was used. Here, two groups are selected, one as the experimental group and the other as the control group. The pre-test

was administered before the application of the experimental and control treatment and post-test at the end of the treatment.

7. Analysis of data

Activity based program (ABP) was used for teaching the students of experimental group. The pre-rest and post-test was administered for evaluating the performance of the students of control and experimental groups. The scores secured by the students in the pre-test and post-test were treated statistically. ‘t’ value statistic is used for judging the level of significance. It has to be 2.33 to be regarded as significant at 0.01 levels.

Comparison of pre-test scores of the control & the experimental group, (table No.1)

(Table NO.1)

	Pre-test of Control	Pre-Test of Experimental
N	50	50
M	48	47
σ	7.62	8.25

$$|M_2 - M_1| = 1$$

‘t’ value = 0.09

Observation:

The obtained 't' value 0.09 is less than table 't' value 2.33. Therefore obtained 't' value 0.09 is not significant at 0.01 level.

Interpretation:

There is no remarkable difference in the scores of students in control group during the pre-test & post-test.

Comparison of pre-test & post-test scores of the experimental group, (table No.3)**(Table NO.3)**

	Pre-test (M2)	Post-Test (M1)
N	50	50
M	47	84
σ	8.25	9.34

$$|M_2 - M_1| = 37$$

$$\text{'t' value} = 2.96$$

Observation:

The obtained 't' value 2.96 is greater than 2.33 therefore it is significant at 0.01 level

Interpretation:

There is significant difference in the scores of students during the post-test of the experimental group. It shows that, the programme prepared by the researcher was an effective for developing creative thinking.

Comparison of post-test scores of the control & the experimental group, (Table No.4)

(Table NO.4)

	Post-test of Control	Post-Test of Experimental
N	50	50
M	49	84
σ	9.07	9.34

$$|M_2 - M_1| = 35$$

$$'t' \text{ value} = 2.67$$

Observations:

The obtained 't' value 2.67 is greater than 't' value 2.33. Therefore obtained 't' value 2.67 is significant at 0.01 level.

Interpretation:

There is significant difference in scores between experimental group and control group during post-test. The students from the experimental group have performed significantly better than the students from the control group.

Comparison of pre-test & post-test scores of the control and experimental groups (table No.5)

(Table NO.5)

Groups	Pre-test (M)	Post-test (M)	't' value
Experimental	47	84	2.67
Control	48	49	0.08

Scores in pre-test & post-test of the control and experimental groups, (table No.6)

(Table NO.6)

Scores	Control Group		Experimental Group	
	Pre-test	Post-test	Pre-test	Post-test
31-35	0	4	4	0
36-40	8	5	14	0
41-45	17	7	9	0
46-50	10	15	3	0
51-55	5	9	9	0
56-60	7	3	3	0
61-65	2	4	5	1
66-70	1	3	2	3
71-75	0	0	1	6
76-80	0	0	0	10
81-85	0	0	0	6
86-90	0	0	0	12

91-95	0	0	0	7
96-100	0	0	0	3
101-105	0	0	0	2

In the experimental group, a remarkable increase is seen in the post-test mean, when compared with its respective pre- test mean and pre-test/post-test means of the control group. Further, this increase is found to be significant through the 't' test analysis at 0.01 level.

Inferences:

It is seen that the 't' value is 2.67 which was higher than 2.33 , so the effectiveness of the programme is significant at 0.01 level. It means that there is significant difference in the developing of creativity between the experimental group and the control group after implementation the activity based programme on creativity. Hence, the stated Hypothesis is accepted and the stated Null Hypothesis is rejected.

8. Major Findings

- 1) The programe developed by the researcher had a significant effect on creative thinking of students.
- 2) The mean in the post-test of the expermental grp was significantly higher than the mean in the post-test of the control group.
- 3) The programe helped in improvement of the imagination and novelty of idea of students.
- 4) The students of experimental group have shown greater significant improvement.
- 5) The creativity increased as a result of treatment of activity based divergent thinking programe.

9. Conclusion

- 1) As a life skill, this study can be used as an input to personality development which consist skills of observation, thinking and problem solving.
- 2) It shows that activity based programe (ABP) can be useful for developing the creativity among the students.
- 3)This study prove that sufficient practices helps in developing the creativity.
- 4) The activity based programe (ABP) can be useful for the parents to conduct at home with their children for developing the creativity among them.
- 5) The research study also highlights the significance of the follow-up programe in any training.
- 6)The programe provides chance for students to learn, think and discover without threats of immediate evaluation.
- 7) The progeame prepared by the researcher was effective to developing creative thinking.
- 8) The effect of the programe was positive.
- 9) There is still a greater emphasis on the creative activity among the students, and evaluation adopted in schools.
- 10) Majority of students had positive attitude for activity based programe (ABP).

References

- Best john ,W& Kahn James.V.(2008). Research in Education. (10th Edition).New Delhi: Prentic Hall.
- Gupta ,P.K.(1985) .development and evaluation of creativity training programme for VI Grade children. Ph.D. Rdu. Meerut Univ.
- Prasad,S.S., & Rao,D.B. (2009). Creative Thinking of School Students .First published. New Delhi. P .1-2.
- Rao, D.B.,& Reddy , M.S.(2003). Creativity in College Students. New Delhi. p.193.
- Reddy ,M. Sarasani (2006). Creativity in Schools. New Delhi: Sarup &Sons, p.3.

Reddy, M.S.,& Rao.D.B.(2003). Creativity in College Students. New Delhi, Discovery Publishing House. P.1.

Reddy, M.Sarsani. (2005). Creativity in Education. New Delhi. Sarup&Sons. P.26.

Sharma, Y.k.(2004).Textbook Of Educational Psychology. p.366-367.

Torrance,E.P.,(1962),Guiding Creative Talent, Englewood Cliffs: N.J ., Prentice Hall,p.33.

