Impact of Population Education on Student Teachers

Population education, students teacher, experimental group, control group, S.L.M., Pre & post test.

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ABSTRACT
Population growth can be checked if proper knowledge of population education is provided to student teachers, because they are playing not only a role of student but teacher also. They can also use this knowledge in their daily life as well as constructing better understanding in their students. The present study is primarily a quasi experiment: an attempt has been made to observe the impact of population education among student teachers. In the light of the objective of the study different aspects of population education as, family life, need and importance of population education, sex education, HIV, AIDS, family planning, small family etc. are the main factors or categories of the S.L.M.. This S.L.M. was given for study to the experimental group but it was not available for control group. The main concept worked behind the development of S.L.M. was that the S.L.M. will enhance knowledge of population education among B.Ed. and B.T.C. trainees. All norms and standardization processes were followed during the development of S.L.M.

Sample:
With the help of Random sampling method 200 sample have selected, out of which 100 belongs to B.Ed. trainees and 100 to B.T.C. trainees.

Self Learning Material (S.L.M.)
A self learning material was developed related to different aspects and dimensions of population education by the researcher. Family planning, need and importance of population education, sex education, adult education, family planning, HIV, AIDS, family norms, health education, social and physical environment, sex diseases etc. were the main factors or categories of the S.L.M.. This S.L.M. was given for study to the experimental group but it was not available for control group. The main concept worked behind the development of S.L.M. was that the S.L.M. will enhance knowledge of population education among B.Ed. and B.T.C. trainees. All norms and standardization processes were followed during the development of S.L.M.

Research design and Method:
The used research design is given below:

“Randomized two group pre and post test design”
In the range of above research design quasi-experimental research method were applied.

Tools:
A Hindi medium multiple choice type objective test were constructed and used in both processes pre and post test. This test includes 100 question and four answer options related to all aspect and points of S.L.M.. The validity was established and reliability coefficient was satisfactory.

Introduction:
The great concern over population growth and its effect on the quality of life gave rise to the idea of “Population Education”, which would mean, an educational programme with provides for a study of population situation in the family, the community, nation and the world with the purpose of developing in the students rational and responsible attitudes and behaviour towards that situation. (UNESCO, 1970)

In view of the concerted efforts at the national level to control the growth of population it is necessary to study how the different segments of the population understand the population phenomenon. The awareness among the students regarding the various population issues, becomes more important since they will be largely responsible for the future growth of population. Today due to advancement of medical sciences, the death rate has been checked whereas the birth rate un-checked. There are so many social, religious, cultural and climatic reasons for high birth rate, but its main reason is lack of population education (P.E.) among students among masses. Students of study are mentally mature than the students of lower classes, they can transmit their knowledge to their peers and their students, what they have learned from population education. On the overall we can say that along with different means of controlling population growth, it is required to provide sufficient knowledge of population education related issues to the student teachers.

Objectives of the study
1. To compare the population education awareness of B.Ed. trainees. (Pre test)
2. To compare the population education awareness of B.T.C. trainees (Pre-test)
3. To compare the impact population education awareness of B.Ed. trainees (Post test).
4. To compare the impact of population education awareness of B.T.C. trainees (Post-test).

Hypotheses:
The following hypotheses have been made on the basis of mentioned objectives:

1. There is no difference (during Pre-test) between experimental and control group of B.Ed. trainees.
2. There is no difference (during Pre-test) between experimental and control group of B.T.C. trainees.
3. There is no difference (during Post-test) between experimental and control group of B.Ed. trainees.
4. There is no difference (during Post-test) between experimental and control group of B.T.C. trainees.
Study Procedure:
Four groups were formed from sample. Each group contained 50 trainees. One experimental and one control group for each B.Ed. and B.T.C. trainees was formed. S.L.M. was provided for only for experimental groups. Pre-test and post-test of all four groups were taken and compared. Post-test were done after two months of pre-test and compare all four groups.

Result and Interpretation:
Collected data and responses were classified in given tables.

Table No. 1 Mean, S.D., t-value and result (Pre-test) of B.Ed. trainees.

| S. No. | Group            | Sample size(N) | Mean (M) | S.E. (σ_d) | Calculated t-value | df | Result |
|--------|------------------|----------------|----------|------------|--------------------|----|--------|
| 1.     | Experimental     | 50             | 19.84    | 11.2       | 0.016              | 98 | NS*    |
| 2.     | Control          | 50             | 19.65    |            |                    |    |        |

* Not significant at 0.05 level of significance

Table No. 2 Mean, S.D., t-value and result (Pre-test) of B.T.C. trainees.

| S. No. | Group            | Sample size(N) | Mean (M) | S.E. (σ_d) | Calculated t-value | df | Result |
|--------|------------------|----------------|----------|------------|--------------------|----|--------|
| 1.     | Experimental     | 50             | 21.90    | 9.5        | 0.073              | 98 | NS*    |
| 2.     | Control          | 50             | 22.60    |            |                    |    |        |

* Not significant at 0.05 level of significance

Table No. 3 Mean, S.D., t-value and result (Post-test) of B.Ed. trainees.

| S. No. | Group            | Sample size(N) | Mean (M) | S.D. | S.E. (σ_d) | Calculated t-value | df | Result |
|--------|------------------|----------------|----------|------|------------|--------------------|----|--------|
| 1.     | Experimental     | 50             | 41.0     | 7.20 | 1.80       | 10.55              | 98 | S*     |
| 2.     | Control          | 50             | 22.0     | 10.5  |            |                    |    |        |

* significant at 0.05 level of significance

Table No. 4 Mean, S.D., t-value and result (Post-test) of B.T.C. trainees.

| S. No | Group            | Sample size(N) | Mean (M) | S.D. | S.E. (σ_d) | Calculated t-value | df | Result |
|--------|------------------|----------------|----------|------|------------|--------------------|----|--------|
| 1.     | Experimental     | 50             | 44       | 8.91 | 1.86       | 10.75              | 98 | S*     |
| 2.     | Control          | 50             | 24       | 9.69 |            |                    |    |        |

* significant at 0.05 level of significance

Results of Post-test conducted on B.T.C. trainees shown in table No. 4 reveals that the mean scores of experimental group and control group was 44 and 22 respectively. The calculated t-value (10.75) was higher than the table value on df (98) and level of significance (0.05). Therefore the null hypotheses No. 4 “There is no difference (during Post-test) between experimental and control group of B.T.C. trainees” is rejected. So that it is clear that there is significant difference between mean scores of experimental and control group of B.T.C. trainees after post-test.

Inferences:
1. The knowledge related to population education in B.Ed. trainees was not found significantly different during pre-test.
2. All trainees of B.Ed. course were found having equal awareness about population education during pre-test.
3. Similarly the all B.T.C. trainees were also found having equal awareness about population education during pre-test.
4. There was a significant difference found between the mean score of experimental and control group of B.Ed. trainees after post-test.
5. A significant difference was also found between the mean scores of experimental and control group of B.T.C. trainees after post-test.
6. The higher achievement of the students of experimental groups of B.Ed. and B.T.C. trainees in comparison of their respective control groups might be the positive effect of S.L.M.

Suggestions:
- Population education should be started from primary level of education in its simplest form.
- A modules (S.L.M.) can prepared and implemented compulsory at the middle and secondary level.
- Teacher educators having sufficient knowledge can teach the entire students about the evil effects of population explosion.
- Government should make an integrated programme of population education and that should be implemented strictly in all educational institutions.
- The under age marriage should be strictly prevented.
- Families having only one child should be given importance in government sectors.
- The Audio-visual aids should be used more and more for advocacy of population education.

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