EDUCATIONAL ACHIEVEMENT WITH RESPECT TO FACILITIES AND USAGE OF ICT: A STUDY OF SENIOR SECONDARY SCHOOLS

Mrs. Geeta Kundi

Asst. Prof., B.C.M. College of Education, Ludhiana

In old days life was very simple. At that time children could learn lot of things through direct experience. They had direct experience in spinning, weaving, and agriculture. The modern society is very complex one and the school can educate children for better life in society.

Information and communication technologies (ICTs)—which include radio and television, as well as newer digital technologies such as computers and the Internet—have been touted as potentially powerful enabling tools for educational change and reform. When used appropriately, different ICTs are said to help expand access to education, strengthen the relevance of education to the increasingly digital workplace, and raise educational quality by, among others, helping make teaching and learning into an engaging, active process connected to real life.

Significance of the Problem

Many decades after the introduction of ICT into classrooms there are still unanswered questions about the impact of technology in the long and short term on students' learning, and how it has affected simple and complex learning tasks. These are important for (a) forming government policies; (b) directing teacher education programes: (c) advancing national curricula; (d); designing or reforming classroom implementation and (e) analyzing costs and benefits. While a plethora of studies has been conducted on the effects of ICT in education, major policy and methodological problems have precluded an unambiguous answer to such questions as:--"Does the way in which ICT is implemented have a major/minor impact on students' knowledge and understanding?" and "Does the impact affect the surface or deep structure of students' thinking and acting?" To date we have had no large-scale longitudinal studies of ICT's impact in education. It is still not known as how ICT effect the educational attainment of students in social studies. So, this is the new field which demands attention of the investigators.

Statement of the problem

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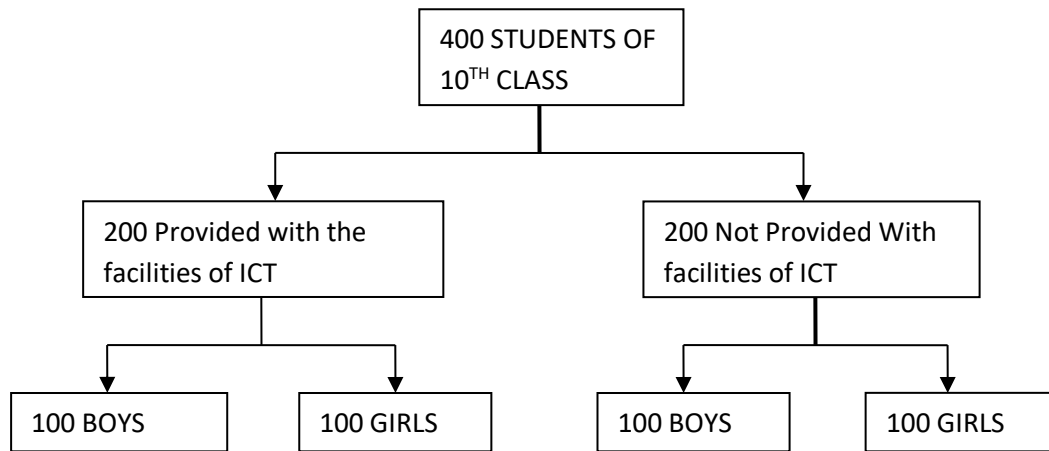
Objectives of the study

To compare the overall attainment of students studying in private schools (provided with the facilities of ICT) and private schools (not provided with the facilities of ICT) w.r.t. achievement in the social studies obtained on the self-constructed tests of achievement.

Hypothesis

There will be no significant difference in the overall attainment of students studying in private schools (provided with the facilities of ICT) and private schools (not provided with the facilities of ICT) w.r.t. achievement in the social studies obtained on the self-constructed tests of achievement.

Method and Procedure

The investigator of the study followed Ex-Post Facto method. The present study was conducted on the students of ten schools. There were two types of private schools in which five schools are provided with the facilities of ICT and other five are not provided with the facilities of ICT. The study was conducted on sample of 400 students of tenth standard students studying in private schools of sangrur district. These students were drawn randomly. Out of which 200 students were drawn from private schools (provided with the facilities of ICT) and 200 were drawn from private schools (not provided with the facilities of ICT). Effort were made to randomly draw 40 students from each school. The schematic layout of the design is given below:-

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                    ┌─────────────────────┐
                    │  400 STUDENTS OF    │
                    │  10TH CLASS         │
                    └─────────────────────┘
                ┌──────────────┴──────────────┐
                ▼                             ▼
      ┌─────────────────────┐      ┌─────────────────────┐
      │ 200 Provided with the│      │ 200 Not Provided With│
      │ facilities of ICT    │      │ facilities of ICT    │
      └─────────────────────┘      └─────────────────────┘
         ┌────────┴────────┐          ┌────────┴────────┐
         ▼                 ▼          ▼                 ▼
   ┌──────────┐   ┌──────────┐  ┌──────────┐   ┌──────────┐
   │ 100 BOYS │   │ 100 GIRLS│  │ 100 BOYS │   │ 100 GIRLS│
   └──────────┘   └──────────┘  └──────────┘   └──────────┘
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Sample

Sample was comprised of 400 students out of which 200 were boys and 200 were girls studying in the tenth class.

Validity of the Achievement Test

The validity of the achievement test was established through face validity and content validity based upon judgment of several subject expert and test specialists. This analysis is rational as well as judgmental. The help of subject expert and eminent educationists, with long standing experience. In the field of the education was sought far.

Reliability of the achievement test

The split-half method was used to find out the reliability. A common approach is to split a test into two reasonably equivalent halves. One common method of splitting a test has been to score the odd numbered item and even numbered items separately. Then the correlation between scores on the odd and even number items is calculated. Of-course, splitting a test in this way means that the scores on which the reliability is based are from half length test, to obtain an estimate of the reliability based on the full length test it is necessary to correct or step-up, the half test correlation to the full length correlation. This is done with the help of the Spearman-Brown prophecy formula.

Scoring

The scoring of Achievement test was done with the help of scoring key prepared by investigator itself. One mark was awarded to each correct answer and zero for wrong answer.

Statistical Techniques

The following statistical techniques are used to analyze the data.

    (1) Mean

    (2) Standard Deviation

    (3) t. test

Results

Comparison of overall attainment of students studying in private schools (provided with the facilities of ICT) and private schools (not provided with the facilities of ICT) w.r.t. achievement in the social studies obtained on the self-constructed tests of achievement.

The mean achievement scores in social studies of all the students studying in Private Schools (Provided With The Facilities Of ICT), 38.795 and all the students studying in Private schools (Not Provided With The Facilities Of ICT), 33.275, showed that students of Private Schools (Provided With The Facilities Of ICT) performed better than students of Private Schools (Not Provided With The Facilities Of ICT). Therefore, the null hypotheses was not accepted.

Delimitations

Every study is not complete from all aspects. It has some sort of limitations. In the present study   the investigator found the following limitation.

1 There was lack of standardized tools.

2 The sample size is small. It delimits the scope of study. Only sample of 400 students cannot represent all the 10th class students

3 The sample area was limited so investigator cannot find suitable sample which could be suitable for statistical technique.

4 The respondents hesitate to give correct information

5 The ICT and its uses causes phobia in the minds of teachers that ICT can replace the teachers. Therefore lots of teachers did not respond properly and did not co-operative with investigator.

Suggestions for future Research

        1   The study can also be conducted in the areas of Punjab.

        2   The present study was carried out with limited space size. The finding and conclusions need to be verified in big size of sample

        3   The study can also be conducted in the govt. and govt. aided schools.

4   The study may be carried out on some other class students also be taking some other subject like physics, zoology, mathematics, English etc.

Educational Implications

1. It is being observed from the present study that the educational achievement of students is good where the ICT facilities are being used so school should encourage the use of ICT in teaching learning process.

2. Various training programs should be organized in the schools to update the knowledge of the teachers regarding ICT usage.

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