EFFECTIVENESS OF DIGITAL BOARD ASSISTED INSTRUCTIONS AND TRADITIONAL METHOD OF TEACHING ENGLISH ON ACADEMIC ACHIEVEMENT

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Abstract

This study was conducted to see the effectiveness of digital board assisted instructions and traditional method of teaching English on academic achievements. The research was carried out in a school in Jagraon City on a sample of 64 students. Effectiveness of Digital Board Assisted Instructions Method and Traditional Method of Teaching was assessed by Self Constructed Pre-Test and Post-Test Tool which was Questionnaire of English for the students. The Result of test revealed that Teaching through Digital Board Assisted Instructions Method is more effective than Traditional Method of Teaching.

Digital Board is a highly sophisticated interactive whiteboard utilizing electromagnetic technology. The Digital Board comes with Interactive learning software and a built-in gallery of images. User can easily write, draw and annotate over this digital whiteboard using multimedia pen. Its snapshot, spotlight, hide and reveal features help in producing creative PowerPoint presentations and teaching material. It has interactive soft key shortcut buttons, and is easy to use, even by new user. Digital Board have, over a relatively short period of time, assumed a prominent role in many classrooms in developed (and some developing) countries. Also Adoption of Interactive White Boards has been fastest in the other countries where National funding of around £50 million (Hall & Higgins, 2005) saw DB's installed in over 75% of classrooms (Lee, 2010; Future source, 2010). It is not, however, just the Digital Board that influences the teaching and learning experiences occurring in classrooms. Rather it is the resources that teachers choose to use on their board that will have the most significant impact on educational out comes. To date, limited research has examined the choices that teachers make regarding the digital resources they use with Digital Board. Interactive presentation tools are in demand for educators and others who want to involve their classes or audiences in learning alongside technology. A Digital Board is an interactive electronic whiteboard that gives educators an additional presentation device for the classroom. A Digital Board can interface with a computer, displaying images through a digital projector, and its users can control the software from either the computer or the board, where they can manipulate images or text. Students or audience members can participate by adding their annotations or pointing out material using a pen or highlighter.

Slay et al. (2007) reported on a case study that was carried out based on 3 government schools in South Africa and highlighted learners' and teachers' enthusiasm about the "big screen" and the multimedia that were being used. However the authors noted that many of the teachers and learners were not ICT literate as well as the cost of technology in South Africa was high. These elements hindered the learning process. British Summit held in (March 2008), which aimed to help Africa to achieve the Education for All (EFA) goals through digital empowerment. Mauritius is among the African countries where Interactive White Board (IWB) is being implemented. It targets to bring qualitative changes in the classroom and to bring fundamental change to the current teaching and learning process. Glickman (2010) conducted a non-equivalent control group design study and found that the Smart Board treatment group did significantly better than the control group on concept understanding. However, there were no significant differences between the treatment and control groups on a measure of achievement. Coyle et al. (2010) mentioned that IWBs offer multiple possibilities that require specific knowledge of how best to exploit their versatility in the classroom. They further mentioned that IWB does not have the potential for making on the quality of classroom interaction. Therefore they requested that training should also focus on developing teachers' interaction skills.

As the access to the information increases, the information load on the students is increasing gradually as well. The need to give more and new information to the students in a short period of time made new technologies a requirement to be used in education. Teachers are searching

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for new ways that they can teach more efficiently and get benefit from the educational technologies to make students learn more easily.

Objectives

1. To Construct the lesson plans of English (9th Class) to be taught through Digital Board Assisted Instructions.
2. To teach the students English with digital board assisted instructions
3 To find the Effectiveness of Digital Board Assisted Instructions.
4. To find difference in the scores of Achievement among Male and Female Students taught through Digital Board Assisted Instructions Method and Traditional Method of Teaching.
5. To find difference in the Pre-test and Post-test achievement scores taught through Traditional Method of Teaching.
6. To find difference in the Pre-test and Post-test achievement scores taught through Digital Board Assisted Instructions Method of Teaching.

METHOD

Sample:

The present study was an Experimental Study, which was conducted on 64 student of Ludhiana District.

Measures

Self-constructed pre-test and post-test was used.

Procedure

This was an experimental study. Two groups were selected from 9th class. One was experimental and another was control. By employing pre test two groups were matched. Experimental group was taught with DBAI and control group with traditional method. Post test was given to both groups. Collected data was analysed with descriptive analysis and inferential statistics (t-test).

Results and Discussion

Table 1:Pre-test Post-test scores of students taught through Traditional Method and DBAI Method of teaching.

N	Scores	Group	M	t-ratio
32	Pre-test	Traditional Method	8.97	0.22
32		DBAI Method	9.18	
32	Post-test	Traditional Method	10.21	3.63
32		DBAI Method	13.59	

Table 1 shows the Pre-test scores of students taught through Traditional Method and DBAI Method of teaching. Result reveals that t-ratio is 0.22 which is Non-significant at both the levels of significance i.e. 0.05 and 0.01. Hence there exists no significant difference in the mean scores of Pre-test taught through Traditional method and Digital Board Assisted Instructions Methods of Teaching. Hence groups are parallel.

Again, table shows the Post-test scores of students taught through Traditional Method and DBAI Method of teaching. Results revealed that the t-ratio value is 3.63 which is significant at both the levels of significance i.e. 0.05 and 0.01. So, students achieve more through DBAI than Traditional method. Hence DBAI method of teaching is better than Traditional method of teaching.

Table 2: Scores of Post-Test among Male and Female Students Taught through DBAI & Traditional Method

N	Method	Group	M	t-ratio
16	DBAI	Male	13.81	0.33
16		Female	13.37	
16	Traditional	Male	11.68	2.39
16	Method	female	8.75	

Firstly, table shows the Post-test scores of Male and Female students taught through Digital Board Assisted Instructions Method of Teaching. Result reveals that the t-ratio is 0.33 which is non-significant at both the levels of significance i.e. 0.05 and 0.01. Therefore, DBAI Method of teaching is equally effective for male and female students. Secondly, table shows Post-test scores of Male and Female students taught through Traditional Method of Teaching. Result reveals that the t-ratio is 2.39 which is significant at 0.05 and non-significant at 0.01 level of significance. Therefore, Traditional Method of teaching is equally effective for male students at 0.05 level but not at 0.01 level of significance.

Findings

Students achieve more through Digital Board Assisted Instructions than Traditional method of teaching at secondary school stage.

Traditional method of teaching is not as effective method of teaching as Digital Board Assisted Instructions.

DBAI Method of teaching is effective method for male as well as females students.

Achievement of male students is more through Traditional method of teaching than female students.

Implicatiopns

Students achieve more through Digital Board Assisted Instructions than Traditional method of teaching at secondary school stage. So, DBAI method of teaching should be introduced in public as well as government schools to improve the results, making teaching interesting and effective . Traditional method of teaching should be avoided.

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