

The Effectiveness of the Lecture Based Teaching Strategies and the Inclusive Teaching Strategies on High Achievers: A Comparative Study

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Abstract

This research paper is dedicated to the investigation of the effectiveness of inclusive teaching strategies and traditional lecture-based teaching strategies on the learning of pupils in general but the main focus was on the high achievers of Class XII. The study was conducted to compare both types of teaching strategies in an inclusive setting with the diversity students. Two equal groups of pupils were made according to pre-test scores of teacher-made test items. Both the groups were representative of inclusion. The researcher used the pre-test post-test equivalent group design in the present experimental research. The pre-test was conducted before starting the treatment to judge the difference. The experimental group was taught through inclusive teaching strategies while the control group was taught through traditional lecture-based teaching strategies. The period of the experiment was sixty days. When the treatment period was completed, a researcher-made post-test was conducted to know the level of achievement of students especially the high-achiever students. To determine the effectiveness of both types of teaching strategies on students' learning in an inclusive setting, the significance of the difference between the scores of the two groups was measured at 0.05 level. The t-test was applied to measure the difference of means of the two groups. Then based on the t-test results were analyzed. It was revealed from the results of the post-test that inclusive teaching strategies were more effective as compared to traditional teaching strategies to teach pupils at Higher Secondary level.

Keywords: Inclusive Teaching Strategies, Diversity, Students with Special Needs, High Achievers, Traditional Teaching Strategies.

Introduction

The process of education is an intelligent, optimistic, and reverential refinement of learning of all students as they are central to education so, appropriate opportunities may be provided to them to grow physically as well as mentally.

Every student possesses some natural latencies that must be developed and polished according to the ever-changing social order and demand of the time. Education is not a one-time process, it is an endless, infinite, life-long process that starts soon after birth and ends when life ends here in this world. A human being is subjected to changing conditions of life and has to make adjustments accordingly which may contribute to his mental and physical growth. In Pakistan, there are three levels of education, elementary, secondary, and higher education (after class12 to upward). The higher secondary education works the dual-task, first to deliver the mid-level working class for the development of the economy of the country; second to prepare pupils for higher education. (GOP, 1998). The main aim of education in general and of secondary education in specific is to make the individuals useful members or entities of the society by equipping them with a special and definite set of norms, values, faith, and ideals as well as knowledge and skills with the help of which they may transfer the attained knowledge to the next generation. To attain this aim it is essential to use the right type of strategies to teach students.

In Pakistan higher secondary level is a true picture of inclusion as there are no separate institutions for children suffering from any kind of disability (mild to severe) or for gifted ones. Individualized teaching has no consideration in this system. Mostly in colleges, the teachers use traditional (lecture-based) teaching strategies for teaching almost all the subjects. In lecture-based teaching strategies, the teacher is the center of all activities, and students are passive listeners and rote learning is a common practice. Because of this, many pupils stop taking interest in studies as that way of teaching does not suit their genius. They usually isolate themselves from the rest of the class. The researcher felt while teaching at the higher secondary level that few pupils are although physically

present in the classroom as the rest of the students even then they feel excluded. With time, they isolate themselves from the rest of the class which shows that they are not satisfied with the environment around them. It has many reasons but the main reason is a way of teaching as the teacher's style and his/her teaching strategies count a lot. The researcher thinks that teaching through traditional lecture-based teaching strategies may be not suitable. Those strategies which stimulate the thinking process of the students especially at the higher secondary level of education may be suitable for teaching different subjects, as this stage of education, as well as the age of students at this level, is very crucial in their life. Some effective teaching strategies would be applied to create interest, tolerance for each other, and patriotism among the students. The researcher chose Pakistan Studies to teach for a research study, as this subject aims at increasing the knowledge of students about their history, geography, culture, climate, foreign relations and policy, administrative structure, human and constitutional development as well as current issues and affairs. This subject may also serve the role of unifying and bonding force among the young students (Ali, 2010; GOP, 2010). Pakistan Studies is being taught as a compulsory subject from 9th grade to graduation level basically to promote the feeling of nationhood. (Malik & Zaheer, 2012). So keeping in view its importance and unifying force, it was decided to teach this subject. The researcher thinks that the major role is of the teacher. It is he, who helps all his pupils to resolve their problems. He may motivate them and prepare them for learning, build a pleasant atmosphere in the class, and most important is to ensure the inclusion of all the pupils in the teaching-learning process despite that which subject he is teaching. Examining the above-mentioned factual position, it was decided by the researcher to do a research study to observe the usefulness of teaching strategies whether traditional teaching strategies or inclusive teaching strategies were effective in teaching pupils at the higher secondary level. It was expected that the research results would be useful for all the teachers, who are teaching at different levels, about making the decisions in choosing the teaching strategies to teach their respective subjects.

Objectives

The objectives of the study were:

1. To measure the achievement level of high achievers being taught by using inclusive teaching strategies.
2. To analyze the performance of high achievers being taught by using traditional teaching strategies.

Hypotheses of the Study

The following were the null hypotheses of the study:

- H₀1:** There is no significant difference between the mean scores of high achievers of the control group on pre-test and post-test taught through lecture-based teaching strategies.
- H₀2:** There is no significant difference between the mean scores of high achievers of the experimental group on pre-test and post-test taught through inclusive teaching strategies.
- H₀3:** There is no significant difference between the mean scores of high achievers of the experimental group and the control group on the post-test.

Review of Related Literature

This research was conducted to observe that which teaching strategies stand more effective: traditional lecture-based teaching strategies or inclusive teaching strategies to teach effectively to the learners, especial focus on those who were above average or bright students or in other words high achievers of the class. According to Alessi and Trollip (2001), teaching strategies are means used by the teachers to teach and help the students to learn various subjects. Although lecture-based teaching strategies are the oldest teaching format but still famous in teaching (Hrepic, Zollman & Rebello, 2007). According to Vella (2006), these are the formal ways of presenting content. Lecture-based teaching strategies are usually one-way communication, in which students are passive listeners but the positive side of the lecture-based teaching strategies is that a teacher teaches the subject content according to the psyche of the students, in a logical way and considered as the best way to teach the adult students (Davis, 1993).

Lecture-based teaching strategies are used to provide information that is not easily accessible. These are also useful in providing an excessive quantity of knowledge in a very short time and to clear those concepts which are abstract (Kumari & Rao, 2004).

There is a large list of educationists who are not in the favour of lecture-based teaching strategies, like Bligh (2000), who mentioned several limitations of these strategies. He said that

lecture is only effective when spoken words can create a mental picture in the mind of the learners so only a few numbers of the students get the benefit, not all the students. On the other hand, there are advocates of inclusive who are in favor of inclusive teaching strategies like Hall (1982), Darlington (2003), Nussbaum (1997) who are in favor of inclusive teaching strategies that in one class students are having diverse characteristics and learning needs. According to Booth and Ainscow (2002), a school that is welcoming for all students covers the wide range of needs of students. This type of educational institutions has teachers who have patience and understanding for students and their learning needs. To use inclusive teaching strategies teachers are required to have a holistic approach to address all the learning needs of all the learners. Teachers need to accept and accommodate the learning requirements of all pupils.

In the view of Ainscow et al. (2006), for meeting various learning requirements of the students, it is required to restructure and re-plan educational policies. The syllabuses and teaching programs, teaching-cultures as well as teaching practices need to be refined and even to be reformed.

Shahzadi (2000), suggested some of the inclusive teaching strategies which work effectively for all students like handling the students with dignity and respect, try to solve their problems to enhance their learning, appreciate their strengths and achievements, where individualized teaching is required, provide that, accept different learning styles. Other inclusive teaching strategies are, teachers show high expectations from their students, support their success, encourage students' participation in learning activities, provide feedback as soon as possible.

In the opinion of Rayner (2007), to include the excluded students, to address the learning needs of the diverse students and for their well-being, inclusive teaching strategies proved to be useful. It was reported by Reid (2005), among inclusive teaching strategies specialized or personalized teaching proved to be useful for below-average and above-average students.

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Research Methodology

In the present study, a pre-test-post-test control group design was applied. As it was an experimental study so this design was applied to measure the difference between the academic achievement of high achievers of two groups (Experimental and Control).

Population

The population of the study included only females of 2nd year (intermediate). All those female students who were enrolled in all the Model Colleges of Islamabad (IMCGs) comprised the population. The total strength of the female students was 2050. There were a total of ten model colleges for girls in Islamabad which are administered by the Federal Directorate of Education Islamabad.

Sample for the Study

The sample was taken from IMCG, F-6/2, and Islamabad. The purposive sampling technique was applied to choose the sample. All students in two sections of class 2nd year pre-medical were included in the sample for a research study.

Conducting the Experiment

As mentioned earlier that two groups were taken. The researcher herself taught both the groups: the experimental and the control group. The experimental period consisted of two months. The same subject and same content were taught to both the groups. The inclusive teaching strategies were used

to teach experimental group, there were a large number of teaching strategies which were used while teaching but the common inclusive teaching strategies were: giving full attention to the problems of the pupil, show high expectations from them that they may get high scores, individualized teaching where required, peer teaching, ability grouping, seating arrangements, high light the strength of the pupils, ignore the weaknesses, motivate them, encourage students participation, use of technology, etc. Traditional lecture-based teaching strategies were used to teach the control group. A well-organized lecture with a proper beginning, middle, and end was delivered to the control group.

Data Collection Tool

The researcher collected data in the form of scores. Those scores were collected from pre-test and post-test which were administered to the control and experimental group. The purpose was to observe the difference in the achievement of the groups. Teacher-made tests were applied as achievement tests. Before conducting the experiment, a common test was developed. This test was also validated before administering it to the students. The pre-test scores were used to equate both the groups (the experimental and control). Among those students who got more than median marks were taken as high achievers who were 14 in number.

Data Analysis

After collection of data from the pre-test and post-test scores of both the groups. With the help of a statistical tool that was t-test was used to compare the difference of mean scores of the high achievers of the control and the experimental group. The significance of the difference was checked at the 0.05 level. It was checked by using a two-tailed test. SPSS was used for data analysis.

Table 1. The pre-test and post-test mean scores of high achievers of the control group

Control Group High achievers	N	M	SD	SE _D	t-value	
					Calculated value	Table value
Pre-test	14	23.0000	3.4194	0.9138	28.45	2.045
Post-test	14	29.5000	3.05715	0.8170		

p = 0.05

Above table No. 1 depicts the difference between the values of t. There has been a clear difference to be observed that the table value is 2.045 and calculated at 28.45.

Table 2. The pre-test and post-test mean scores of high achievers of the experimental group

Experimental Group High achievers	N	M	SD	SE _D	t-value	
					Calculated value	Table value
Pre-test	14	23.9286	1.81720	0.48567	54.158	2.045
Post-test	14	37.5000	1.91150	0.51087		

p = 0.05

The above table No. 2 depicts the difference between the values of t. There has been a clear difference to be observed that the table value is 2.045 and calculated 54.158.

Table 3. The post-test mean-scores of high achievers of the experimental group and control group

High achiever pre-test	N	M	SD	SE _D	t-value	
					Calculated value	Table value
Control group	14	29.5000	3.05715	0.81706	21.166	2.045
Exp. Group	14	37.5000	1.91150	0.51087		

p = 0.05

The above table No. 3 illustrates the difference between the values of t. There has been a clear difference to be observed that the table value is 2.045 and calculated 21.166.

Findings

The findings of the research study were:

1. The mean pre-test score was 23.0000 in the academic achievement of the high achievers of the control group. The mean score on the post-test was 29.5000 the difference between the means of pre-test and post-test was statistically significantly high. The calculated value of t was 28.450. That value was much higher than that of the table value of t which was 2.045. That value was calculated at a 0.05 level of significance. The values have shown clear difference so, H₀1 (null hypothesis) was rejected. The values were depicted in Table No.1

2. The mean pre-test score of the experimental group's academic achievement of its high achievers was 23.9286. The mean score of the experimental group was 37.5000 on the post-test. The difference between the means of pre-test and post-test was statistically significantly high. The calculated value of t was 54.158. It means that the calculated value was very much higher than that of the table value of t which was 2.045. That value was calculated at a 0.05 level of significance as also shown in Table No.2. There was a clear difference between pre-test and post-test mean scores so, H_02 (null hypothesis) was rejected.
3. Then we compared the mean score of the academic achievement of high achievers of both the groups, the experimental group and the control group at that it became clear that the mean value of the experimental group was 37.5000 on the post-test. The mean of the control group was 29.5000 on the post-test. It has shown that the calculated value of t was 21.166. It was much higher than the table value which was 2.045. The mean difference between the two groups was statistically significant. Hence, H_03 (null hypothesis) was rejected. (Table 3)

Discussion

As the purpose of inclusive teaching strategies is to include all the pupils in the learning process and teachers always try different strategies to teach effectively. There are several types of research, conducted by different educationists, on inclusive teaching strategies, few of them are mentioned in the forthcoming lines. Booth and Ainscow (2002) conducted several types of research on inclusive teaching strategies and proved their effectiveness. They were in favor of that educational institute which is welcoming for all the students and fulfills the learning needs of all the students. Obviously, for that inclusive teaching strategies are required to create a culture where the learning requirements of all the students may be considered. Shahzadi (2000), suggested several inclusive strategies to teach include all the students regardless of their differences of any kind. Reid (2005), suggested that personalized or specialized inclusive teaching strategies proved to be useful in the case of gifted or below-average students. The results of the research clearly illustrated that the pupils of the two groups were equivalent before conducting the research. First of all, the groups were equated then the experiment was conducted. It means both the groups were equal according to their mean pre-test scores. On other hand, scores of post-test have shown that students who were placed in the experimental group have shown better results as compared to the control group. This difference was obviously because of the selection and adoption of proper teaching strategies. When a comparison was made between the achievement levels of high achievers of both groups then it was depicted that the experimental group has shown better performance than the students of the control group. This indicated that inclusive teaching strategies were more effective than traditional teaching strategies.

Conclusions

Following were the conclusions, which were drawn on the bases of findings:

1. The pupils of the experimental group had shown an abundance of improvement in academic achievement. While observing the control group it was concluded that there was also improvement in their academic achievement but comparatively lesser than that of the experimental group.
2. When the pre-test and post-test scores of the high achievers of the control group were compared, it became clear that there was an improvement in the scores of the control group. Because of this finding, the conclusion was drawn that they had shown academic improvement on the post-test.
3. The academic achievement of the high achievers of the experimental group was considerably higher in the post-test as compared to the pre-test. The results have shown that the academic achievement of high achievers of the experimental group was better than that of high achievers of the control group.

Recommendations

Following recommendations are given by the researcher:

1. In the light of finding No. 1 and 3 it is recommended that the use of inclusive teaching strategies has evidenced that they put an encouragingly positive effect on the learning of pupils at the HSSC level of education. That's why it is recommended that lecturers should be given suitable training to use inclusive teaching strategies (ITS).
2. It is inferred from the finding No. 1, 2 and 3 that the inclusive teaching strategies want to be included in the theory and practice of teaching training so that the trainee teachers may get

awareness about these strategies as well as utilize these in their practical and professional life as effective teachers.

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