

## **Effect of Continuous Assessment Techniques on Students' Performance at Elementary level**

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### **Abstract**

Effectiveness of continuous assessment can be judged by making observation and collecting information periodically from specific tasks given to students during their learning process. Present research aimed to explore outcomes of continuous assessment that enhanced the academic achievement of elementary school students. A sample of sixty students was taken from eighth grade students studying at a public sector girls secondary school of Lahore for the experiment. These students were studying Social Studies as a compulsory subject. Post-test design of control and experimental groups was used. An achievement test was used to collect the information from respondents. Independent sample *t*-test was used as test of significance. It was concluded that continuous assessment had positive effects on students' achievement. It was recommended that teachers who are well versed in evaluation and assessment techniques should be encouraged and their expertise should be utilized for the purpose of enhancing students' performance at elementary level.

**Keywords:** Continuous Assessment, students' performance, elementary level

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## **Introduction**

Assessment of learning is not one time movement, it is a progressing process. It includes the procedure of checking on, reflecting and modifying the learning techniques in an arranged and cautious way. When assessment is carried out in classroom in an ongoing or continual way by the teacher it is called continuous assessment (Prouty & George, 2003). In this process, observations are made time to time to collect data to determine the level of students' knowledge, understanding and performance. It is done by giving particular tasks to students based on their previous achievement in classroom. Teacher observes the activities of students to decide about the level of their performance in class. It also helps them to find out what the learners have learnt. Continuous assessment is part and parcel of instructional process that has to be taken as a key tool in educational quality assurance endeavor (Abejehu, 2016).

Airasian (1991) reported that continuous assessment as an approach should present the complete number of sources and methods that teacher can apply to collect, interpret and synthesize information about students. The use of this information also helps teachers to understand their students, plan and monitor their teaching to create a feasible culture. Baker and Stites (1991) stated that continuous assessment should include a regular assessment of students' affective structures and motivation in which they will need to express their determination intensely, their work force readiness and their skills in team or group performance background.

## **Literature Review**

Nature of continuous assessment in the context of international perspectives concerning teacher assessments is organized under the following subtopics: continuous assessment and curriculum-based assessments: Watkins (2007) explains, in countries that have evidently designed national curriculum, continuing, influential assessment is typically based on aim and attached directly to the aims for the curriculum designed for all the students. National strategies for assessment may define what needs to be assessed and how it is to be assessed. Inside the countries using this method, main features is that developing and applying assessment is mostly the duty of conventional schools and class teachers. This is according to the purpose of such assessment for notifying decisions about next steps in an individual student's learning (Watkins, 2007).

Purpose of Continuous Assessment is that the teacher can continuously assess student's learning outcomes in all three domains- Cognitive, Affective, psychomotor, particularly with regard to knowledge and understanding, procedural knowledge (making comparisons and estimates performing calculations, applying formulas), problem solving and other higher order skills. Continuous assessment serves the purposes including providing information about the learners status and progress of each student. It helps teacher to know, plan redesign the teaching in accordance with the needs of the students. It provides diagnostic information on strengths and weaknesses of the students' learning. It also provides feedback to the teachers for modification of curriculum targets and text books. It facilitates teachers in grouping of students for learning through various activities, provides criteria of grading and promoting students and counseling to students and their parents. It decides teacher-training method for a program, faculty or staff (Gipps, 1990).

As a holistic approach continuous assessment in classroom where majority of the school going children are given an opportunity to appear in school, the skills of students in classroom is increased. Previous tests were used only to choose the best students to promote to next grade. But now many countries stress upon the success of each student or continuous assessment is considered a way to certify that all students must have an opportunity to succeed in school. In most of the classrooms the range of intelligence varies from slow to average and to fast learner. By means of continuous assessment, the tutor adopts his or her teaching methodology according to the needs of all learners so each of the students has chance to learn and succeed. By frequently observing the aptitudes of the learner that what they know and what they can do, the teacher can make sure the success of every student. Everyone is provided with an opportunity to succeed when it is applied properly (Prouty & George, 2003).

Continuous assessment is beneficial for teachers, learners, educators and parents as being Guidance –Oriented because it involves data collecting for a long period. It yields more correct data which stimulate teachers to modify their teaching methodology. This may play a dynamic role in identifying the remediation areas of student's weakness if correctly secured in what happening in classroom. Learners' performance is assessed properly. Continuous assessment is a tactic that detains the overall pupil's performance. Tutors and authority are responsible to analyze the student's achievement and correct the highlighted problems (Alausa, 2004). In continuous assessment teacher is kept in center for the assessment of all the students' activities arranged in the classroom. It inspires more teachers to take part in assessment and grading of their learners (Paris et al., 1991).

Through the integration of assessment activities into instructional practice, teachers become able to integrate assessment with their instructional practices. Teachers are likely to incorporate assessment learning framework largely and certainly provide evidence related to how assessment information is applied to inform and guide in the selection of teaching methodology for individual learner. In the view of Lewis, with the help of continuous assessment teacher must take help from assessment in their teaching, and teacher must discuss criteria for good learners' work with colleagues and parents. Lewis (1997) stated more that all students must have an opportunity to succeed in school.

### **Statement of the Problem**

This study focused on observing the effect of continuous assessment on academic performance of elementary school students in the subject of Social Studies.

### **Objectives of the study**

Following were the objectives of the study:

1. To find out effect of continuous assessment on academic achievement of elementary school students in Social Studies.
2. To explore the effect of continuous assessment on the retaining level of top scorer in Social Studies at elementary level.
3. To highlight the effect of continuous assessment on the retaining level of low scorer in Social Studies at elementary level.

### **Research Questions**

The following were the research questions undertaken in the study:

1. What is the effect of continuous assessment on academic achievement of elementary school students in Social Studies?
2. What is the effect of continuous assessment on the retaining level of top scorer in Social Studies at elementary level?
3. What is the effect of continuous assessment techniques on the retaining level of low scorer in Social Studies at elementary level?

## Method and Procedure

The experimental design, post-test only, was used for the study having six weeks of intervention. The students of grade eight were the population of the study. Sample consisted of 60 students of grade eight learning Social Studies as a compulsory subject. Sampling was done keeping in view the results of students in grade seven annual examinations which was conducted twenty days before the commencement of the experiment. One section out of eight was selected randomly. The rationale behind the selection of one full section was that researchers wanted to make a comparison between the achievements of experimental and control groups. If students were selected from all the sections that were taught by different tutors, then the effect of different teaching methodology would be a confusing variable. To avoid this confusion, both the experimental and control groups were selected from the one class taught by same teacher. The nominated section had seventy five students. The students of selected section were further divided into two groups, i.e. experimental group and control group. The groups were equated on the basis of grade seven scores of students in the subject of Social Studies. Two teachers of equal academic qualification (B.A., B.Ed) and considerably equal experience were selected and assigned to control and experimental groups randomly. Achievement test and questionnaire were used as instruments for collection of data after implementing intervention. Pilot testing was conducted before collection of data. A panel of four experienced Social Studies teachers validated the test prior to conducting the post-test. The data were analyzed with the help of SPSS.

## Data Analysis and Interpretation

Independent sample *t*-test was used to compare mean scores of experiment and of control group. The data analysis has been presented as follows:

**Table 1**

*Comparison of Experimental and Control Groups on Post-test Scores*

Groups	<i>N</i>	Mean	<i>SD</i>	<i>SE</i>	<i>t</i> -value	<i>p</i> -value
Experimental Group	30	59.6	10.81			
Control Group	30	46.1	12.03	2.953	4.572	0.000

$\alpha = 0.001$

Table 1 shows that the value of *t* (58) =4.572. *p*=0.000 is significant at  $\alpha = 0.001$ . This means that mean scores of experimental group (M=59.60, SD=10.807) are significantly different from mean scores of control group (M=46.10, SD=12.02).

**Table 2***Comparison of High Achievers of Experimental and Control Groups on Post-test Scores*

Groups	<i>N</i>	Mean	<i>SD</i>	<i>SE</i>	<i>t</i> -value	<i>p</i> -value
High achievers of Experimental Group	15	67	9.18	2.871	3.762	0.001
High achievers of control Group	15	56.2	6.25			

 $\alpha = 0.001$ 

Table 2 indicates that the value of  $t(28)=3.762$ .  $p=0.000$  is significant at  $\alpha=0.001$ . This means that mean score of high achievers of experimental group ( $M=67$ ),  $SD=9.18$ ) is different from mean score of high achievers of control group ( $M=56.2$ ,  $SD=6.25$ ).

**Table 3***Comparison of Low Achievers of Experimental and Control Groups on Post-test*

Groups	<i>N</i>	Mean	<i>SD</i>	<i>SE</i>	<i>t</i>	<i>P</i> -value
Low achievers of Experimental Group	15	51.73	6.974	2.46	6.395	0.000
Low achievers of control Group	15	36	6.492			

 $\alpha = 0.001$ 

Table 3 reveals that the value of  $t(28)=6.395$ .  $p=0.000$  is significant at  $\alpha=0.001$ . This means that mean score of low achievers of experimental group ( $M=51.73$ ),  $SD=6.97$ ) is different from mean score of low achievers of control group ( $M=36$ ,  $SD=6.49$ ).

## Findings

The analysis of the data revealed the following findings:

1. It is found that continuous assessment had significant effect on the achievement of experimental group.
2. It is inferred that continuous assessment had significant effect on the achievement of high achievers of experimental group.
3. It is also found that continuous assessment had significant effect on the achievement of low achievers of experimental group.

## Discussion

The experiment revealed that continuous assessment has positive effect on students' learning and achievement. Significantly better performance of experimental group in the subject of social studies shows that Continuous assessment does affect the students' achievement. This concept has also been discussed in a previous study done by Abejehu (2016) in which he discussed that continuous assessment affects the primary school students' performance. Another researcher Nxumalo (2007) supports the finding of this study as he has also emphasized on the importance of continuous assessment as means of informing educators and learners about the learner's progress which would ultimately benefit the learning process. Baker (2010) also discussed this method as an alternative assessment method which was initially used in education systems in 1991 and after continuous reforms, it evolved into continuous assessment.

The study further reveals that the high achievers and the low achievers of experimental group showed significantly better performance as compared to the high achievers and the low achievers of the control group. The difference between the means of the low achievers of both the groups is greater than the mean difference between the high achievers of both the groups. It means that the low achievers were benefitted more from this approach. This finding is also supported by a study conducted by Bayo (2005) who was of the view that continuous assessment has the potency to motivating and focusing learner's attention on the lesson. As a result, students with learning issues like lack of focus and motivation can be benefitted from this method. It highlights that if the teachers use continuous assessment in teachings, all the students have chance to learn and succeed. Almost similar conclusion has been drawn in number of researches. As cited by Inyang Abia (2004), continuous assessment plays the most significant role in students' effective performance. Continuous assessment motivates all learners for active participation in learning process. It also provides constructive and rapid feedback to all students. Significantly better performance of low achievers of experimental group on retention test is its evidence.

The responses of the students of experimental group revealed their liking of this approach. They opined that continuous assessment techniques promote better understanding of the content and it develops confidence and self evaluation attributes. This finding closely correlates with a study conducted by Frederickson (1992) in which he emphasized the importance of assessment as a means of developing self confidence of students. Students get insight into misconceptions and proceed at their

own speed. The difference between the means of the high achievers and low achievers of both the groups on retention test is greater than the difference between means on post-test. It indicates that both the high and the low achievers of the experimental group better understand the concept of social studies than the control group. This is the evidence that continuous assessment focuses on students understanding rather than memorization. The teacher of experimental group was of the view that continuous assessment help teachers to get better understanding of learning needs of the students. In this way they gain a deeper understanding of teaching and learning strategies. The findings of present study are same those of James and Folorunso (2012) who conducted a study in Nigeria and found a significant effect of treatment on students' achievement in mathematics.

### **Conclusions**

It was concluded that the treatment of continuous assessment had critical impact on academic performance of elementary school students. It was also concluded that the treatment of continuous assessment had significant impact on academic performance of high achievers at elementary level. It was concluded too that the treatment of continuous assessment had significant impact on academic performance of elementary school students even among the low achievers.

### **Recommendations**

In the light of findings and conclusions of the study, the following recommendations are made:

- The findings of the study reveal that continuous assessment techniques are very effective for teaching social studies. It is therefore recommended that teachers should be given training in using continuous assessments in teaching.
- This approach should be enhanced at all levels of education for teaching all subjects.
- Practical training in using continuous assessment should be provided to teachers. For this, appropriate guidance should be provided to all teachers at every institution.
- Teachers who are well versed in evaluation and assessment techniques should be encouraged and their expertise should be utilized for the said purpose.
- Workshops should be conducted to provide practical training in using continuous assessments.



- Government should promote continuous assessment program under federal and provincial levels and centers for developing assessment techniques in our existing educational environment should be developed at district level.
- In-service teachers should be given training in developing and using continuous assessments through refresher courses. It is the need of the day to develop a new culture for enhancing continuous assessment in teaching.
- Parents should be aware of different assessment techniques and help their children in this respect.
- Further researches should be conducted to investigate the effectiveness of continuous assessment in teaching different subjects at different levels of education.

## References

- Airasian, P. W. (1991). *Classroom assessment*. New York: McGraw-Hill.
- Alausa, Y. A. (2004). *Continuous assessment in our schools: advantages and problems*. Namibia: Kolin Foundation Arandis.
- Abejehu, S.B. (2016). The practice of continuous assessment in primary schools: The case of Chagni, Ethiopia. *Journal of Education and Practice*, 7(13).
- Baker, E. L. (2010). *What probably works in alternative assessment*. (CRESST Report 772). Los Angeles, CA: University of California, National Center for Research on Evaluation, Standards, and Student Testing (CRESST). Reprinted from paper originally presented at the Annual Meeting of the American Educational Research Association, Chicago, IL, April, 1991.
- Baker, E. L., & Stites, R. (1991). Trends in testing in the USA. *Politics of Education Association yearbook*. London: Taylor & Francis.
- Bayo, C.O (2005). *The basic of research methodology*. Lagos: Kotleb Publishers.
- Falayajo, W. (1986), Philosophy and theory of continuous assessment. Paper presented at a work shop for inspectors of Education in Odo State, Nigeria.
- Fraenkel, J. R., & Wallen, N. E. (1993). *How to design and evaluate research in education*. New York: McGraw-Hill.

- Frederickson, N. (1992). Curriculum-based assessment: broadening the base. In Cline, T. (ed.) *The assessment of special educational needs: International perspectives* (pp. 147-169). London: Routledge.
- Gay, L. R. (1962). *Educational Research*. Islamabad: National Book Foundation.
- Gipps, C. (1990). *Assessment- A teacher's guide to the teachers*. London: Hodder and Stoughton.
- Goldring E, & Berends M. (2009). *Leading with Data: Pathways to Improve Your School*. Thousand Oaks, CA: Corwin
- Inyan-Abia, M.E. (2004). *Social studies technologies, method and media*. Port Harcourt: Double Dimond Publications.
- Lewis, A. C. (1997). Changing assessment, changing curriculum. *Education Digest*. 12-17.
- Nitko, A. J. (2004). *Educational assessments of students*. Englewood Cliffs, NJ: Prentice Hall.
- Nxumalo, Z.F. (2007). The role of continuous assessment in primary school (M.Ed. Dissertation). Retrieved from <http://uzspace.uzulu.ac.za/bitstream/handle/10530/531/The+role+of+continuous+assessment+in+primary+school.+ZF+Nxumalo.pdf;jsessionid=E69D16CC76A40F23013F0F32A5F52F80?sequence=1>
- Paris, S. G., Wasik, B. A., & Turner, J. C. (1991). The development of strategic readers. In R. Barr, M. L. Kamil, P. B. Mosenthal & P. D. Pearson (eds.), *Handbook of Reading Research* (vol. 2). New York: Longman, 609-640.
- Prouty, J. D & George. E. S. (2003). *Continuous assessment: A practical guide for teachers*. American Institute for Research.
- Prouty, J. D & George. E. S. (2003). *Continuous assessment: A practical guide for teachers*. American Institute for Research.
- Watkins, A. (ed.) (2007). *Assessment in inclusive settings: key issues for policy and practice*. Odense, Denmark: European Agency for Development in Special Needs Education