Classroom Assessment, Literacy and Practices of Teacher Educators in Pakistan

Farooq Nawaz Khan
Assistant Professor, Center for Education & Staff Training, University of Swat, KP, Pakistan.

Sajjad Hussain
Lecturer, Center for Education & Staff Training, University of Swat, KP, Pakistan. Email: sajjadhussain@uswat.edu.pk

Maryam Imad
Lecturer, Center for Education & Staff Training, University of Swat, KP, Pakistan.

Abstract

Literacy practices focus classroom assessment skills and knowledge. This study investigated the correlation of classroom assessment literacy and practices of teacher educators in Pakistan. Teacher educators of Punjab and Khyber Pakhtunkhwa, Teacher education institutions were investigated through Assessment Literacy Test (ALT), Classroom Assessment Practices Questionnaire (CAPQ) following quantitative correlational research design. The results reflected moderate level assessment literacy of teacher educators in Pakistan and found them practice traditional assessment practices. Furthermore, majority of teacher educators were found to have less knowledge and skills in designing and selecting appropriate assessment tools and that most of the classroom assessment practices were limited to paper-pencil tests. Teacher training with mutual consultation of Learning and Innovation Division (LID) of Higher Education Commission (HEC), the establishment of National Assessment Wing under the Umbrella of National Curriculum Wing and support from ICT supported devices/software, online resources were recommended.

Key Words
Assessment Literacy, Assessment Practices, Teacher Education, Reforms

Introduction

Classroom assessment literacy is the basic requirement for collecting data about the success of learners along with the efficient employment of the assessment procedure and the use of assessment results for the improvement of learners’ achievement. Quality classroom assessment is comprised of designing the assessment to encounter the exact requirements of data users, building the assessment on solid targets, correctly defining learners’ accomplishment and producing assessment results that excellently transfer to users. It also includes students’ participation in self-assessment, goal-setting, monitoring, reflection, and mutual sharing of learning among students (Chappuis & Stiggins, 2012).

Popham (2011) considered assessment literacy as the understanding of assessment data of students, making correct inferences on the basis of collected data and making sound educational decisions on it. Newfields (2006) further elaborated that assessment literacy is not the same for all the stakeholders of assessment that is the assessment literacy of a college student is the understanding of assessment concepts, its purposes and the basic interpretation of assessment scores.

For a school teacher, it is the understanding of assessment methods and procedures necessary for classroom assessment practices through which he/she could assess students’ academic performances. However, for a professional assessment expert along with all the abilities mentioned above for the assessment of college student and school teacher he/she must be aware of assessment principles, tools construction process and its technicalities. Likewise, it is also imperative for him/her that he/she can use assessment results for all sorts of educational decisions.

Furthermore, it is not as simple as it looks as it is one of the most complicated processes which includes; quantification, responses of students, changes in learning styles and transformation and reflection. It is useful for disseminating information regarding decisions made for the improvement of learning. Likewise, it is helpful in the process of identifying students’ performance, motivation of students, clarifying and verifying students’ achievement and monitoring the effectiveness of the teacher’s teaching (Ohlsen, 2007). Classroom assessment aims to generate knowledge and enhance abilities of teachers for good decisions based on assessment. If classroom
assessment practices are conducted properly, the students will be helped in the refinement of their understanding, such as; self-assessment, peer assessment, developing assessment tools, classroom discussions and problem-solving activities. These activities motivate student to better understand contents of the subject. The assessment examines the abilities of students and is thus a yardstick in order to test the abilities of those persons who undergo the learning process during classroom in an academic year.

Assessment is important as it influences learners’ approach towards learning and teachers’ approach towards teaching and classroom assessment practices. Studies in assessment reflected that paradigm shift has occurred in assessment and that it has been changed from an assessment of learning to assessment for learning (Mussawy, 2009). The latest assessment approaches are endeavoring to develop a link between what students are supposed to learn for future responsibilities and what they actually are learning (Gulikers, Theo, Paul & LiesBeth, 2006). Teachers do in most cases follow classroom tests, students’ observations, assign marks on students’ assignments, engage them in self-assessment through reflective activities, group the students and follow peer assessment techniques; all the practices are strongly based on assessment knowledge and skills of a teacher. Therefore, the knowledge of classroom assessment is imperative for teachers if they want the understanding of their students’ performances, factors affecting students’ performances and other related factors to students’ assessment and learning (Stiggins, 2001).

Assessment take place at different intervals with different purposes, sometimes teacher want to measure the effectiveness of the instruction, sometimes he/she want to measure the performances of students against certain targets and that’s why he/she follow different types of assessment with suitable tools and methods. Formative assessment is one of those approaches which aim to enhance the effectiveness of learning and discourages cramming and promotes conceptual understanding. It compels a student to work hard (Koloi-Keaikitse, 2012). If teachers know their students well, they will see the clear picture of the students’ achievements. Therefore, due concentration is needed in the employment of assessment practices as these are related to the lives of students and vice versa (Stiggins, 2001). Similarly, teachers are responsible for making classroom assessment practices, regarding the course contents (Reynolds Livingston & Willson, 2009).

Based on the above discussion, this qualitative correlational study was designed where efforts were made to measure the correlation between classroom assessment literacy and classroom assessment practices of teacher educators in Pakistan.

Objectives of the Study
The objectives for this study were to;
1. Investigate classroom assessment literacy level of teacher educators
2. Find out classroom assessment practices of teacher educators
3. To measure if there is any relationship between teacher educators’ classroom assessment literacy and their classroom assessment practices

Research Questions
Based on the study objectives following research questions were formulated;
1. What is the classroom assessment literacy level of teacher educators?
2. What are the most frequently used classroom assessment practice of teacher educators?
3. Is there is any relationship between teacher educators’ classroom assessment literacy and their classroom assessment practices?

Study Beneficiaries
The study may be beneficial for teacher educators, prospective teachers, Directorate of Curriculum and Teacher Education, Directorate of Staff Development, teacher education departments and Colleges and all those directly related to teacher education in particular and education in general.

Literature Review
Stiggins (1991) as cited in Beziat and Coleman (2015) familiarized the notion of assessment literacy. Stiggins (1995) also elucidates, that assessment literates are those who understand the dissimilarity between logical and illogical aspects of assessment. These people are not informed about the techniques, tactics, and approaches by the more or less covert and all the time discouraging methodological domain of assessment. Teachers, who have the knowledge and skills of assessment, comprehend how to quantify the process of learning. Webbs’ (2002) was of the view that assessment is the part of the learning process. He defines assessment literacy as the understanding of
the ways of appraising of learners’ knowledge and practices, the explanation of results from these assessment procedures and the application of interpretation for the knowledge construction of learners and for the development of the effectiveness of the program. He expounds that those linked with education required assessment understanding because it is important to gauge students’ results through standardized testing and the multiplicity of assessment procedures existing.

Assessment is the foundation of an effective learning process. Teacher starts and ends learning process through assessment. Through previous knowledge questions and discussion teachers motivates students, during the instruction formative assessment not only remain the learners active but also make the learning process effective and assessment at the ends determine that what has been learnt (Black & William, 2009). Furthermore, it was concluded that through assessment students come to know about their strengths and weakness, as teachers inform them through feedback, which enhance the self-confidence and positively contribute into skills development of students. Additionally, they viewed that teaching and assessment are inter-related and when it work in this fashion it yields perfect results. Therefore, the proper care and regular follow up ensures the effectiveness of learning, teaching and assessment. Similarly, further researches were recommended that may work on how student could be involved in classroom assessment.

Teachers follow different assessment practices. Some of the teachers’ like MCQ test, while others support modern forms of assessment like portfolios and research essays. It is argued that the old forms of evaluation are very effective in testing the knowledge of the students. Knowledge, conceptual understanding and practical application of the knowledge are measured by such types of tests which are called traditional forms of assessment and these are very important for students to get success in their studies (MacMillan, 2008). So far as the learning of the students is concerned, alternate methods of assessment were introduced in the last decade in the light of the findings and results of the empirical studies for the better assessment of the students. These alternative techniques create activeness, dynamism, reflective attitude and self-regulation among the students. A lot of changes occur in the behavior of the teachers due to these alternative methods of assessment which further influence learners in the long run (Elango, Jutti &Lee, 2005).

With the passage of time teachers were directed to change their focus and adopt alternative methods of assessment. The assessment aims to make judgment about the quality of educational program or student attainments. This is attempted when it is time to evaluate students’ achievements and competencies. A learning outcome is not that simple that a student can do. But it seeks answer to different questions, such as: how effective target has been obtained? How perfect the performances were? Is there any further space of learning/mastery in the subject/concept? These questions are always of high value which demands more rigorous practice and critical judgment. In short, assessment is making valuable inferences to clarify the complexities and resolve the problems. It is therefore important when decision is made for assessment to select the appropriate tools on the basis of requirements that what type of data is required? How much information would be enough? Aim to determine the correct value of the assessed. That’s why information gathering is one of the important elements of assessment (Mussawy, 2009).

Siegel, Wissehr, and Halverson (2008) argued that there is a difference in theory and practice of assessment. This difference lies between traditional and alternative assessment practices. The assessment methods and procedures remained constant for a long time. Although some educational reformers found out faults in assessment practices in the earlier days these were believed to be insignificant. Through the changes occurred during the last two decades, traditional system and techniques of assessment have come under heavy criticism and its weaknesses have been exposed. Trotter (2006) believes that this was due to the development of assessment patterns and as these increasingly rely on assessment results for different academic decisions. These developments were also supported by different assessment and measurement techniques came into practice throughout the world. Mainly the changes in assessment were introduced in summative form of assessment as the experts’ intent to use it for learning too not limiting it to assessing students’ performances only. Different stakeholders like students, teachers, head of the institutions and parents found summative assessment as incomplete and unbeneficial for students’ learning. The summative assessment has been called a number of bad names; some dub it as “a necessary evil,” some label it an “ incubus”, “ the enemy of true education”, a blood-sucker”, “ a glorification of memory”, and a “begetter of rivalry and strife”. In fact, no element in the system of education occupies at present more public attention than assessment.

Research Methodology

The study in hand was based on quantitative correlational research design. Survey was conducted to investigate the research problem. Data were collected through (CALT) and (CAPQ) from the respondents of the study. The researchers personally visited the respondents for data to ensure the accuracy of data.
Population of the Study

The population was comprised of all (410) teacher educators of Regional Institute of Teacher Education (RITE) of Khyber Pakhtunkhwa and Government College of Elementary Teachers (GCETs) of Punjab (DSD, 2015). This population was selected as the job descriptions, recruitment criteria and teaching programs of faculty of these colleges are similar in nature.

Sample Group and Sampling Technique

Following probability proportionate sampling techniques a sample group of two hundred and five teacher educators were selected for the study. One hundred and forty-five teacher educators were selected from two hundred and ninety of GCETs and sixty teacher educators were selected from one hundred and nineteen of RITE. A total sample group of the study was comprised of two hundred and five (205) respondents.

Data Collection Tools

Two data collection tools were adopted for the study, one CALT and second CAPQ. CALT was designed on the basis of classroom assessment literacy standards developed by American Federation of Teachers (AFT) and National Council of Measurement Education (NCME) in 1990, the total No of items was 63, while CAPQ was comprised of 31 items. Both the instruments were pilot tested on thirty-one respondents from three institutions and these institutions were not part of the sample group. Furthermore, the reliability coefficient of CALT was .69 and the reliability coefficient of CAPQ was .84.

Furthermore, the study was delimitated to only two provinces Khyber Pakhtunkhwa and Punjab of Pakistan and to only those teacher educators who were teaching to the students of Associate Degree of Education (ADE) and B. Ed Honors.

Data Analysis Tools

The collected data were analyzed with the help of SPSS following basic descriptive and inferential statistics. The demographic variables were analyzed through frequencies and percentage. Mean and standards Deviation were used to analyze the collected data in more depth and details teacher educators’ assessment literacy level and major classroom assessment practices and Pearson correlation was applied to measure the correlation between the variables.

Results and Discussions

The results along with tabulated presentation are discussed on the next page

Table 1. Gender and Qualification wise Information of Respondents

| Gender | Frequency | %age | Qualification | Frequency | %age |
|--------|-----------|------|---------------|-----------|------|
| Male   | 130       | 63.41% | Master        | 164       | 80%  |
| Female | 75        | 36.58% | M. Phil       | 35        | 17.07% |
| Total  | 205       | 100%  | Total         | 205       | 100% |

The table explains the gender-wise and academic qualification-wise description of the respondents which shows that there were 63.4% male and 36.6% female teacher educators. Furthermore, 80% of respondents are having Master, 17% M. Phil and only 2.4% Ph.D. qualification in the selected sample group of the study.

Table 2. Teaching Experience and In-Service Training on Assessment

| Experience      | Frequency | %age | Training       | Frequency | %age |
|-----------------|-----------|------|----------------|-----------|------|
| 1 to 10 Years   | 65        | 31.7% | Not at All     | 164       | 80%  |
| 11 to 20 Years  | 63        | 30.73%| 1 to 4 weeks   | 26        | 12.68%|
| 21 and above    | 77        | 37.56%| Above 4 weeks  | 15        | 7.31% |
| Total           | 205       | 100%  | Total          | 205       | 100% |
of the respondents comprises experienced professionals. Furthermore, 164 respondents out of 205 had no assessment training in professional life which is alarming from assessment perspectives.

### Table 3. Teacher Educators’ Assessment Literacy Level on Assessment Standards

| S. No | Assessment Standard                                      | Minimum | Maximum | Mean Scores | Standard Deviation |
|-------|---------------------------------------------------------|---------|---------|-------------|--------------------|
| 1     | Assessment purposes                                     | 1.00    | 7.00    | 4.3107      | .83966             |
| 2     | Clear Learning Outcomes                                 | 3.00    | 12.00   | 8.5366      | 2.07574            |
| 3     | Designing of assessment                                 | 2.00    | 13.00   | 4.8634      | 1.22909            |
| 4     | Assessment of Learning outcomes                         | .00     | 4.00    | 2.4049      | 1.16188            |
| 5     | Assessment Approaches MCQs, observations, and questioning| 2.00    | 8.00    | 5.4927      | 1.33071            |
| 6     | Communicating results of assessment                     | 2.00    | 8.00    | 6.0585      | 1.28204            |
| 7     | Grading, feedback and scores                            | 2.00    | 8.00    | 4.4780      | 1.29318            |

The table reflects the assessment literacy level of teacher educators. The mean scores on the basis of minimum and maximum scores reflects that teacher educators have a moderate literacy in assessment. On second standard of assessment (Mean score 8.5366, Std 2.075) majority of the respondents have above-average understanding. Similarly on 5th and 6th standards (Mean score 5.4927, Std 1.33071 and Mean score 6.0585 Std, 1.28318 respectively) the respondents performed well as compared to other standards of assessment. However on standard 3 (Mean score 4.8634, Std 1.22909) reflects that educators lacking knowledge and skills in designing assessment and selecting appropriate assessment tools for measuring students’ performances.

Davidheiser (2013) support the result as he in his doctoral study concluded that on classroom assessment literacy teachers’ knowledge and skills are not significant. Similarly, Popham (2011) in his article Overlooked Assessment literacy; Teachers’ Confession, confesses that in his initial teaching career due to lack of assessment knowledge he badly wasted students’ precious learning time.

### Table 4. Classroom Assessment Practices of Teacher Educators

| S. No | Assessment Practices                         | Mean Score | Std Deviation |
|-------|---------------------------------------------|------------|--------------|
| 1     | Traditional paper pencil tests              | 3.8912     | .7831        |
| 2     | Performance based assessments               | 2.4214     | 1.295        |
| 3     | Alternative assessment practices            | 2.337      | 1.8823       |
| 4     | Summative assessment practices              | 4.1781     | 1.8306       |
| 5     | Formative assessment practices              | 3.4812     | .9823        |

The table shows the classroom assessment practice of teacher educators in Pakistan. Majority of the respondents agreed that they follow traditional paper-pencil tests at classroom (Mean 3.8912, Std .7831). Similarly, summative assessment practices (Mean 4.1781, Std .1.8306) were the preferred assessment approach of teacher educators in assessing prospective teachers’ classroom performances. On the contrary, majority of the respondents were not sure that they were following alternative assessment and performance-based assessment practices as shown by the (Mean score 2.337, Std 1.8823 and Mean score 2.4214, 1.295). Likewise, on formative assessment practices (Mean score 3.4813, Std .9823) majority of the respondents were not sure that they were following it are not.

These results were supported by the findings of Mussawy (2009) and Siegel, Wissehr and Halverson (2008) who were of the opinion that the majority of teachers follow traditional paper pencil tests. They were also of the opinion that teachers follow traditional paper pencil tests as these are easy in designing and marking. Furthermore, formative assessment required more time, efforts and variations in instructional approach of teachers for which majority of developing countries teachers are not prepared (McMillan, 2008). Furthermore, the results of Beziat and Coleman (2015) revealed that majority of teachers don’t have assessment skills in designing performance based assessment which prohibits them from following performance-based authentic assessment.

### Table 5. Correlation between Classroom Assessment Literacy and Practices

| Independent variable | Practices                      | r    | Sign |
|----------------------|--------------------------------|------|------|
| Traditional paper pencil tests | .337 | .037 |
| Performance based assessments | .171 | .189 |
The above table illustrates the correlation of classroom assessment literacy and practices of teacher educators in teacher education. The r values (.337 and .365) showed that there are statistically significant relationships between classroom assessment literacy traditional and summative assessment practices. The correlation of classroom assessment literacy with alternative assessment practices, performance based assessment and formative assessment practices were not significant.

The study of Levy-Vered and Nasser-Abu Alhija (2015) revealed that assessment literacy of teachers and their classroom assessment practices have strong relationship as practices are always based on the knowledge skills of teachers. No teacher can practice till the time he/she has the knowledge of the practice.

**Recommendations**

Based on the results and discussions of the study following recommendation were made:

1. A teacher may be provided pieces of training on assessment skills particularly on assessment designing with the consultation of Learning and Innovation Division (LID) of HEC, and professors of teacher education departments.
2. Alternative assessment practices are recommended for teacher educators to practice in teacher education as prospective teachers need all types of knowledge and skill of assessment which properly prepare them for their future challenging roles.
3. There is dire need of National Assessment Wing to promote assessment knowledge, skills, and culture in teacher and in general education which may be established within National Curriculum Wing as curriculum and assessment are closely interconnected.
4. Online resources and use of ICTs software and devices such as Mobile phones, IPads, electronic portfolios are recommended in classroom assessment practices for teacher educators.
5. A series of workshops and refresher courses are also recommended for teacher educators to enhance their professional competence in general and in assessment in particular. Teacher education institutions may specify ahead in the financial budget and financial assistance may also be taken from federal and provincial ministries of education.
6. Future researchers are recommended to investigate the role of Learning Analytics in classroom assessment practices. Furthermore, they are recommended that E-assessment and its challenges and opportunities may be studied.
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