# Perception of Transition on Assessment and Learning at Postgraduate level

Nasrin Akhter\* Muhammad Naseer Ud Din<sup>†</sup> Abdul Majeed Khan<sup>‡</sup>

# Cite Us

Abstract This study explores the students and teachers' perceptions of transition in assessment from annual to semester system at university level. For collection of data two research tools i.e. questionnaire (students) and interview with teachers are used. The study finds that through assessment teachers get information about thinking of students and on which level they think. Assessment is helpful in making different educational policies. Assessment is effective to understand the working characteristics of students. If we assess curriculum, we modify it according to goals or standards. Assessment is a back bone of all education system. Mixed method was used to explore this research study. The responses from the questionnaire and interviews shows that the majority of the teachers and students agree annual examinations give better overall picture of learning progress.

Key Words:

Assessment, Semester System, Annual System

# Introduction

This research explains the teachers and students' preparation of transition in assessment from annual system to semester system at university level. The universities produce and prepare such learners or students which have great contribution in real life situation. They play important role in civilized societies. They do different jobs and improve their future career. These students are responsible for the development and establishment of a civilized society. These universities not only provide subject knowledge but also help them to understand social customs and conventions of society in which they live. They become model for their societies (Batool & Qureshi, 2007).

<sup>&</sup>lt;sup>‡</sup> Assistant Professor, Department of Education, Mianwali Campus, University of Sargodha, Punjab, Pakistan.



<sup>\*</sup> Assistant Professor, Department of Educational Research and Assessment, University of Okara, Punjab, Pakistan.

<sup>&</sup>lt;sup>†</sup> Associate Professor, Institute of Education & Research, Kohat University of Science & Technology, Kohat, KP, Pakistan. Email: <u>naseerkust@yahoo.com</u>

Rehmani (2008) also explores that our assessment system motivates those approaches that reward, recalling and memorization. A review on educational policies of Pakistan explains that from past 64 years different experiments have been done on the assessment system of Pakistan in the form of educational policies (Ahmed & Malik, 2012). But there could never be implemented by Government on these policies (Ahmed, 2012; Halai, 2010; Memon, 2010). This explains that there is a clear gap between planning of policies and their implementation.

The literature also explores that poor implementation modes, lack of public participation, political commitment, financial issues and absence of national point of view are the main reasons of failure of these policies implementations (Majeed, 2009). In Pakistan Governmental educational policies are also failed due to declaring political, economic and social fields which are facing different educational issues. Furthermore, any type of success which has attained and achieved by students have great concern with teachers' participation (USAID, 2006).

The literature indicates that in the universities of Punjab Province assessment is based on examination (Khan and Saeed, 2009). The majority of teachers emphasis on traditional method of teaching and they do not adopt new methods and styles of teaching. Therefore, the students depend on the memorization and recalling (Mohammad, 2006). Currently, the syllabus in the universities cannot fulfill the basic requirements of students and cover the objectives of study (Jamil, 2009; Khan and Saeed, 2009; Sarwar *et al.*, 2011). The assessment process of learning is useful and effective where students are part and parcel of learning process (Newman et al, 2004; Abelt el at, 2001; Khan, 2012).

The behavior of students in annual system is totally changed from the behavior of students in semester system. In semester system students and teachers both busy all time. Students are active learners. They do assign mental and project work. The methods of paper setting are totally different from that of annual examination system. The basic purpose of semester system is to make students efficient and good citizen in a society. In annual system, the teachers teach all subjects but in semester system, there are subject specialists and they teach their own subject. Teachers are available all the time in semester system. They guide students and teachers both are necessary in the semester system. Thus, the success of any system is based on the satisfaction of students which system of examination they like most and they feel satisfaction with their teachers and facilities available to them (Pathak & Rehman, 2013).

In annual examination system, students become lazy because of examination which exits at the end of the year. This system makes the mind of students mature and flexible. Students are passive learners and teachers are active learners. In semester system academic year is divided into two main periods. One period is extended to 14 - 16 weeks. In semester system students learn through activities,

quizzes and project works. Annual system is a traditional and rigid system of examination but semester system keeps students fresh and energetic to do work and learn more and more. This helps them in their future career. Teachers play a role of facilitator in semester system (Jadoon and jabeen, 2006).

There are number of situations on which success of semester system is based. These are regularity of teachers and students, facilities of laboratories, libraries, classrooms materials for doing different activities, reproductive and effective feedback from both sides of students and teachers, facility of computer labs, announcement of results, fair marking in examination and assigning grades to students (Jadoon, jabeen & Zeba, 2012). Kotler and Keller (2006) explained that if students are fully satisfied with a system of examination that system of examination will be fruitful and effective.

#### **Review of the Related Literature**

Assessment may be defined that it is a scheme to check the performance and abilities of students by their teachers. It is a mean to check the learning behavior of students upon curriculum selected by management and authority. The main and foremost purpose of assessment is to check the learning of students (Rehmani, 2003). Learning is not purposeful and fruitful without assessing the students. We assess students through different means i.e. written tests, oral quizzes, field work, project work, assignments, practical works, presentations and activities in semester system (Reid, 2012). It is a process of screening the students. It is a mean to diagnoses the problems and difficulties of students and provides them solution to their problems and difficulties. The word 'assess' is derived from Latin word 'aside' which means to sit with .It means that assessment is a process of doing something with and for students (Green, 1998).

In the recent years, a range of assessment methods have been introduced in higher education. Different new modes of assessment have encircled the conventional, traditional and habitual methods of examination i.e. multiple choice questions and subjective questions like essay, story (Bell et al., 1997). In higher education, different new methods of assessment i.e. peer assessment, portfolio, self-assessment and other methods were established. These new methods make the current assessment system. Multiple choice questions and subjective questions like essay and story and students' perceptions about new modes of assessment are important parts of this review of literature (Sadler, 1998).

In annual assessment system teachers face many problems to describe their observation and understanding to become teachers, their textbooks and prepare students for examination. Teachers also face problems to make their students energetic and understand their learning. Teachers do not improve their teaching and knowledge within limited time of working. The basic purpose of semester system is providing complete, constant and detailed knowledge to students according to their abilities to become active learners (Rehman, 2013). Moreover, the annual system is long education system.

Literature suggests that final examination is a type of summative assessment. Annual examination is also a product oriented examination and Project work is also kind of summative assessment (Fullan (2000). Difference in transition assessment depends upon tools, methods and qualities of students. Von Glasersfeld (1995) suggested that the transition assessment is an ongoing and continuous process which helps to demonstrate and explain students' abilities, planning, collecting, analyzing and evaluating information about their future career, employment interest, habits and needs required skills. These all methods and procedures should be appropriate for learning outcomes of students (Rojewski, 2002). Literature reflects that education is an ongoing process. Through which teachers or instructors understand conditions of their students in institutions and classrooms ((Yusuf & Hashim, 2012). Through assessment, the teachers offer accurate and good feedback to students.

In annual system learning is an ongoing and continuous process throughout the year. In this system students do not pay attention their studies in regularly basis (Halai, 2004). In this system when a student gets admission in a university, he/she forgets learning regularly and he learns their lessons near examination (Monsoon, 2002). Moreover, annual examination system helps students to develop and clear concepts of whole text book. In this system students get more time to learn and fully depend on subjects (Simmons, 2002).In annual examination system, the teachers have no proper methods to teach his/her subjects. Paper setters are external examiner of universities (Mohammad, 2004). The literature reflects that annual system offers maturation to students mentally and physically (Halai, 2004). In annual examination system syllabus is covered in one or two years (Kirmani, 2004).

The main merit of this system is that students' achievements and learning is not judged at the end of year. But their learning and performance will be assessed regularly. Students are allowed freedom for choosing a variety of course to enhance their performance and learning semester system decreases the working pressure on students and they do not face full length syllabus as in the annual system (Kotler and Keller 2006). The compare semester system comparatively to the annual system of assessment, semester system is favorable, understandable and comprehensive to system (Arif, 2003). Some students and teachers do not in favor of semester system of assessment because they like traditional system in annual system of assessment. Some students view that this system lacks variety of uniform standard. Students' anxiety increases when they do not learn their lessons within limited time.

The literature points out that the most accurate and best system of education is that which provides effective learning to their students (Aggarwal, 1997). The standard of success of a system is effective learning. Some points are cleared to students before transition from annual system of assessment to the semester system of assessment. (2005). Assessment of students is a circular process or procedure having four steps i.e. readiness, assessment, evaluation and reflection of students. There are many types of rubrics to assess the learning of students .Rubrics is also useful for teachers to check their knowledge and teaching practice. It depends upon teachers' comments and feedback. It is not based on marks and grades. It also helps students (Douglass and Barry, 2006). In the view of Wilson (2002), semester system is the style of learning and teaching in which teachers use different methodologies. Walker (2005) explained that semester system will enhance the teaching pressure on teachers and learning pressure on students

Furthermore, teachers use traditional system of assessment to measure students' performance and learning. They feel hesitation to introduce modern techniques of assessment in their education system (Christie & khushk, 2004). First of all, in the Universities of Pakistan; assessment is not used to measure the real competency or performance of students (Khallak, 2012). The system is used only to measure who can do best in examination what they have learnt or cram lesson and who cannot do he/she failed in examination. This kind of assessment has no broad scope (Khan, 2006).

Ahmed and Malik (2001:132) point out disadvantages of our assessment system. There are some reasons of downfall of our assessment system. It is found that there is a little relation between the working authorities and assessment of different subjects can be written. Furthermore, the results are not accurate and reliable because teachers use unfair means in examination. There is no reliable and fair marking (Akhter, 2013). Formative assessment that increases rote learning has no concern with deep understanding of knowledge. Students just get admission in universities for next grade (Shah & Saleem, 2010). They do not sit in classrooms for getting knowledge because they want to get admission into higher standard. Kamrani (2010) further describes that it is our assessment and condition that decreases the motivation of students

Moreover, Qureshi (2005) recommended that when teachers regularly assess the students' learning and performance, their levels of learning and achievement increase. Furthermore, literature informs that our examination system is not reliable and effective. Due to these reasons students' weakness and problems are not assessed easily (Jamil, 2004). Our paper setters do not set papers according to mental level of students and our students just depend on cramming and memorization of accurate material and it is not useful for both students and teachers (Khan, 2011). There is no concept of reliability and validity in these papers and does not assess the students' performance and achievements (Ali & Reid, 2012). Ahmed and Malik (2011) suggested that assessment through testing is not considered as main part of teachers' teaching as well as students' learning. Rehmani (2003) identifies that reliability and validity of assessment system are considered uncertain due to curriculum, inexperienced teachers and paper setters. Marking is not also true and reliable (Khan, 2006). In Pakistan, girls also take more interest in reading and writing than boys. Students are motivated and interested in those subjects which they like (Javed & Hussain, 2012). They perform better and get more scores than those subjects which they do not like. In those subjects they do not get good marks. Teachers who check the assign mental work regularly and offer feedback have highly intelligent mind students (Perveen & Saeed, 2014). Teachers use different audio visual aids to clear them lesson. The use of multimedia, laptop and tabs in different subjects make them active to participate in different classroom activities (Rodrigues, 2010).

## **Research Methodology**

This research depicts the research design and methodology which is used in my research. It aims to investigate the teachers and students' perception of transition from an annual system to semester system in higher education. This research study takes mixed method approach because of the nature of the problem and research questionnaire was the source of data collection. There are many mainstream to seek information from the teachers and students' perception of transition from annual system to semester system in Higher Education. Yet the last part of the questionnaire was related to qualitative approach of the participants.

## **Objective of the Study**

The main objectives of this research are:

- 1. To investigate students' perception of transition from an annual system to semester system.
- 2. To seek out challenges faced by the students in transition from annual system to semester system.

#### **Research Questions**

- 1. What are the students' perceptions of transition in assessment from annual system to semester system?
- 2. What are the challenges faced by the students in transition from annual system to semester system?

#### **Research Tools of the Study**

Questionnaire is considered as an important tool for educational research and is used at a large scale in the field of research. The questionnaire consists of a set of questions related to the prescribed research for data collection. It is constructed by keeping in view the specified rules. It is constructed for measurement. In this study, firstly, the questionnaires were used to gather higher education students' views about the students' perception of transition from annual system to semester system of assessment at a university level. The questionnaire used in this study consists of the following advantages.

The questionnaire used in this study was carefully constructed and was administered keeping in view the circumstances so that the respondents were able to answer the questions honestly. Moreover, the size sample was large enough as questionnaire was distributed among 1012 university students both male and female in a university to draw clear conclusions. In the study, the questionnaires were distributed at large scale i.e. N=1050. Therefore, due to these characteristics the reliability of the questionnaire is likely to be good (e.g. Reid, 2006). The cronbach alpha value of items is 0.76. This value of items is reliable and according to standard value. Moreover, the language used in questions was intentionally clear and checked by a couple of teachers in the same field. Those teachers were familiar to the language used and understand the terms of the questionnaires. Therefore, the content validity of the questionnaire was ensured in the study.

## Findings

While collecting the data regarding perception of university students about their learning in both of the annual and semester assessment systems, information about their demographics like gender, age, study level, study course etc. was also collected.

Factors	%
Gender	
Male	50
Female	50
Age	
20-24	87
25-28	8
More than 28	5
Level of Study	
Pre degree	62
Bachelor degree	54
Master degree	40
Course of Study	
Social science	24
Science	42
Others	34
The Time of Program	
Morning	72
Evening	28

**Table 1. Gender Based Demographics of Respondents** 

The data showed the demographics statistics of the respondents. From this Table, we can see that there are 50% males and 50 % females. The number of male students is higher than female students. The second information was collected with respect to the age of students. This table expresses that majority of students lie in the age group of 20-24. In the study, the bachelor students are higher in number than others. The fourth information from this table is, we can see, that the majority of students lie in group of Science.

#### Students' Preferences for Annual System of Assessment

As already discussed, data was collected from 1000 University students. In the first section of the questionnaire, students were asked to show their perception about 10 statements relevant to annual system of assessment. Five options were given for each statement i.e. Strongly Disagree, Disagree, Neutral, Agree and Strongly Agree. Percentage of students for each category is given in the Table 2.

Section I: Annual System	SD %	D %	N %	A %	SA %
Annual examinations give a better overall picture of learning progress	6	27	16	30	21
Employers prefer an annual examination system	5	19	30	32	13
An annual assessment system leads to better student study habits		34	19	26	11
There is less pressure on students in an annual assessment system		24	14	30	18
Annual assessment leads to better understanding of concepts	7	25	27	25	17
Annual assessment leads to passive learning		18	33	32	12
Annual examinations mainly assess recall skills		18	23	36	16
Students end up 'cramming' in an annual assessment system		19	27	29	18
Annual assessments leads to better educational outcomes	9	25	22	29	14
An annual assessment system reduces student anxiety	12	23	19	28	17

From the Table 2 we can see preferences of the students regarding annual system of assessment. In all of the 10 statements, some students have given neutral opinion. If we compare the percentage of students who have agreed and disagreed with the statements then the percentage of students who have agreed is slightly more than the percentage of students who have disagreed. For example in statement 1, 51% (30 + 21) of the students have agreed and 33% (6 + 27) have disagreed. Results for other individual statements can be seen from this Table. All the results are also presented in the graphical form in the Figure 3.

### Students' Preferences for Semester System of Assessment

In the second section of the questionnaire, the students' opinions were asked regarding the semester system of assessment. The results obtained from the questionnaire are presented in the Table 3.

Section II: Semester System	SD %	D %	N %	A %	SA %
I find the semester system gives me good feedback	2	5	10	48	36
I can show my abilities better with frequent assessments	1	5	12	53	29
I find the semester system of assessment give me too much work	3	10	19	37	31
All these assessment make me anxious	4	18	28	35	15
The semester system is much fairer	5	11	22	41	21
I like the greater variety in the way assessment is carried out	3	12	24	41	21
The semester system motivates me to work better		6	11	45	35
I prefer formal written examinations		11	22	40	24
I like the flexibility of having two semesters each year		7	13	43	35
Short tests and assessments allowed many different skills to be assessed	5	6	11	45	32

 Table 3. Students Preferences for Semester System of Assessment

Table 3 is providing the results about the students' opinions about the semester system of assessment. This Table is providing sufficient evidence that majority of the students have given their opinions in the favor of semester system of assessment. There is very small percentage of the students who are giving their opinions against the semester system. For example, in statement 1, there is only 7% (1 + 6) of the students who are against the statement, whereas 84% (36 + 48)

of the students are in the favor of this statement. Similarly, percentage of the students who are in favor or against the other statements can be seen from this Table.

#### Students' Opinions for Transition from Annual to Semester System

After taking the opinions of the students about annual and semester systems of assessment, their opinions were also obtained about their transition from annual to semester system. The results in this regard are given in the Table 4.

Table 4. Students	Opinion	about	Transition	from	Annual	to	Semester
Systems							

Section I: Annual System		D %	N %	A %	SA %
It took me time to adjust to the new system	2	11	13	41	34
The semester system places extra pressures on me all the time	7	20	16	37	20
The semester system suits my style of working better	3	8	19	44	26
I receive good feedback in the semester system		9	16	47	26
I obtain my assessment results more quickly in the semester system		6	13	46	30
A wider range of skills is assessed in the semester system		9	20	41	27
The semester system prepares me better for the workplace		11	18	41	29
Marking is less fair in an annual assessment system		16	28	27	23
The semester system places less emphasis on memorization and recall skills		16	27	32	21
I prefer one end-of-year assessment instead of several assessments	12	24	26	22	16

Table 4 is providing the results about the students' opinions regarding their transition from annual to semester system. This Table is providing the evidence that majority of the students have favored this transition. Although some students, in case of each statement, have given neutral opinion, however, majority is in favor

of transition from annual to semester system. Moreover, the data on best features of semester system was also collected from the students. The students were asked to select best 3 features out of 8 features given below in the Table 11. The most preferred features of the semester system are the first three features given in the Table. The numbers of preferences for all other features are also given in this Table in descending order.

Semester System		
A Semester System of Assessment	Yes	No
Allows a wider range of skills to be assessed	50	50
Offers regular feedback on my progress	53	47
Gives more opportunities to demonstrate my abilities	66	34
Reduces the dependence on memorization and recall	22	78
Gives less dependence on only one examination	25	75
Generates a wider range of teaching approaches	25	75
Helps me to work steadily throughout the year	28	72

# Table 5. This Section asks your Opinions about the Best Features of a Semester System

Table 4 shows students' opinion about best three features of semester system which are the most important for students. Some students give response moderately that a semester system of assessment allows a wider range of skills to be assessed because not only in semester system but annual system also provides students a wider range of skills. This system provides more opportunities to students to shine and polish their abilities. Students are asked to participate in different activities and demonstrate their abilities and give feedback on their activities. Teachers motivate the students to do different activities. Students have negative response about semester system reduces the dependence on memorization and recall. Because in semester system some terms and definitions are learned as it is.

Reduces the end of year pressures on me

34

66

In annual system teachers also generate different activities and methods to clear the concepts of their students and make the learning understandable to students. Majority of the students also have opposite views about semester system that this system does not help students to work steadily throughout the year because when a semester of six months is ended all syllabi of subjects are ended in the next semester new subjects are introduced and students take interest in those subjects.

Majority of the students are disagreed with the annual system of assessment. They do not like annual system mainly because they think that in annual system of assessment there is a lot of pressure on it. However, a significant difference has been found which are related to annual system of assessment. The alpha-value for each of these statements is very small and is less than the level of significance (i.e. 0.05). Therefore, it is concluded that there is significant differences of opinion between male students and female students for annual system of assessment. Female students show more disagreement to annual system than the male students.

Similarly, majority of the students are agreed or strongly agreed with the semester system. They like the semester system mainly because they think that semester system gives less emphasis on recall and memorization provides better evaluation than the annual system and obtain better results. Results of analysis show that there is a wide range of skills is assessed in semester system, project work, field work, presentation; viva voice and assignments are assessed. Results of questionnaire data shows that semester system prepares better for the workplace. Students get more opportunities for job. Results regarding transition from annual system to semester system show that marking is less fair in the semester assessment system. Also, the semester system places less emphasis on memorization and recall. Students learn through concepts and they do not recall material. Also, some students like annual system because they are assessed at the end of the year. While in the semester system, they are assessed many times.

#### Discussion

This research task was intended to explore the annual system of examination and semester system of examination and students' perception of transition from annual system to semester system. First of all, it is discussed that annual examination system gives a better overall picture of learning progress. Because in the annual examination system students' concepts are cleared and when they repeat the lecture many times their understanding level is developed so their learning progress is developed. The findings of analysis showed that this system provides excellent feedback because without feedback their learning has no work.

They have motivation to step forward more than from other students. When they find regular feedback their abilities show performance. In this system students busy all the time because they have much work to do. The study was proposed to explore the annual and semester system of assessment. Firstly, the research question explored about annual system of assessment. Secondly, the research question about the semester system of assessment. Thirdly, about the transition time annual to semester system. Majority of the students appreciates the annual system of assessment that they think that annual examinations give a better overall picture of learning progress. Annual system of assessment gives the habit of recall and rote memorization. Majority of students especially the female students give the opinion that annual system makes the student dull and passive learners is similar with (2006). The annual examination system does not fulfill the required learning abilities.

Majority of the students were of the opinions that annual system is the reasons for failure in criterions of the examination system in deciding the students' academic values. The findings is likewise with Khan (1996: 6) mainly because it only attracts the memorize part and not to fulfill the content and syllabi requirements. Majority of students raise the value of the semester system of assessment mainly because they think that semester system gives better learning and understandings. Students are more satisfied with the effectiveness of the semester system of assessment. They are fully satisfied with the semester system evaluation. Their learning increases in semester system. The findings are similar with Kotler and Keller (2006).

Majority of students appreciate the semester system of assessment. The majority of male and female students think that semester system gives good feedback, increases curricular space, & supports learning opportunities. The universities in semester system of examination provide all these facilities to the students is similar with Douglass and Barry (2006). The semester system of examination trained the students through a procedure of analysis and evaluation. Majority of students considered students and learning both evaluated on intellectual basis in semester system consistent with (Lawrence Milton, 2009). The findings tells that majority of students agreed that semester system is much furrier than the annual system.

It provides unbiased evaluation and results. It motivates their students to learn and explore not to cram. It enhances the abilities of students and makes them the effectual learners and presenters. This finding is similar to that of Sheik, Maher & Abbasi (2012). Thus, the semester system satisfied their students as well as their teachers. Majority of students strongly agreed with the transition shift from annual to semester system. They take time to adjust in the semester system. Because they think that semester system is better than the annual system. The majority of students perceived we are independent learners in semester system. It lacks dependence on recall and memorization, reduces the tension, and gives the quicker feedback. Semester system makes learning and evaluation much easier than the annual system.

The opinions articulates that semester system is not only examination system but it also the learning system. It creates the strong connection and interaction between the students and teachers (Jadoon et al., 2008). The finding is similar with that. Majority of students' opinions and findings tells them that the semester system is better than the annual system and the transition shift from annual to semester also effective for the learners. Findings indicate that the students face many problems in the beginning because they come from annual system. In annual system there is less pressure on students and they are assessed at the end of year. In annual system, students are passive learners. They just learn material and take examination. They work more and more because in semester system they are assessed through presentation, project work, field work and assignments. In semester system marking is not fair because teachers have relation with students and teachers provide favor to students. In this way, marking is not prevailed in semester system very badly. In annual system there is no concept of loose marking. In annual system, results are not declared in time but in semester system results are declared on time. In annual system students' concepts are cleared with the passage of time but in semester system students recall material.

## Conclusions

After discussing the results with the questionnaire and interview responses, the study concludes with the following points:

- Annual examination gives a better overall picture of learning process. Students can easily understand the concepts of any topic.
- Annual examination system leads towards passive learning because teacher teaches the material throughout the year. Students do not engage in learning. They are passive learners and they only cram the learning material.
- Annual examination provides better learning outcomes, teachers provide feedback to students.
- The results in semester system are much fair. These are presentation, project work, written activities and assignments.
- Students like flexibility of the system. Frequent assessment allows students to do more and more work.
- Students learning level increases with regular feedback in semester system.
- In this semester system, students are busy all the time because they have much work to do.
- Overall, they perceived that the semester system offer more opportunities that the annual system and majority considered that the semester system works better than the annual system.

# Recommendation

The study recommends that the semester system should promote a range of assessment activities so that students could be developed in a variety of ways. The students and teacher should be engaged in an induction week so that they will be

introduced to all the assessment methods practicing in the semester. In annual system, cramming factor is higher than semester system. Therefore, it is the need of the time to establish the semester system for the better and appropriate results.

#### References

- Ahmed, S. & Malik, S. (2011). Examination Scheme at Secondary School Level in Pakistan: Composite vs Split. *Canadian Social Science*, 7(1): 130-139.
- Ali, A.A. and Reid, N. (2012). Understanding Mathematics: Some Key Factors, European Journal of Educational Research, 1(3),(283-299).
- Agarwal & A.K. (2006). Beyond examination reforms. University news, Volume 44 No: (28), 10-16.s
- Ahmed, M. (2009). Comparative Perspectives on Initial Primary Teacher Education and Training in England and Pakistan. PhD Thesis: University of Hull, UK.
- Ahmed, M. (2012), Factors Affecting Initial Teacher Education in Pakistan: Historical Analysis of Policy Network. International Journal of Humanities and Social Science, (13) (2, 104-113).
- Aslam, H. D., Younis, A., Sheik, A. A., Maher, M., & Abbasi, Z. A. (2012), "Analyzing Factors Affecting Students' Satisfaction regarding Semester System in Universities of Pakistan.
- Batool, Z & Qureshi, R.H. (2007) quality assurance manual for higher education in Pakistan, Higher Education Commission, Pakistan.
- Black, P., & Wiliam, D. (1998). Inside the black box: Raising standards through classroom assessment, Phi Delta Kappan
- Brooks, J., & Brooks, M. (1999). In search of understanding: The case for constructivist classrooms. Alexandria, VA: Association for Supervision and Curriculum Development.
- Christie, T. & Khushk, A. (2004) Perceived consequences of syllabus innovation in the Pakistan Secondary School Certificate Examination. Paper presented at third ACEAB Conference. Nadi, Fiji.in Education and their Implications,2(2) Pp.(58-75).
- Grant, T.J. (1996). Pre-service teacher planning: A study of the journey from learning to teacher in mathematics and social studies. Paper presented at a conference, New York.

- Jamil, B.R. (2004). Teacher education in Pakistan: A (draft) Position Paper presented at the national Conference on teacher education held from December 20, 2004. Academy for Educational Development (AED).JBIC Today, November 2004, <u>http://www.jbic.go.jp/english</u> /base/publish/today/pdf/td\_2004nov.pdf, retrieved on May 30, 2008.
- Jamil, B.R. (2009) Curriculum Reforms in Pakistan. Paper presented at the seminar on School Curriculum Policies and Practices in South Asian Countries", NCERT Delhi, India.
- Jadoon, Z. I. & Jabeen, N. (2006).human resource management and quality assurance in Public sector universities of Pakistan: the case of Punjab University. Lahore: The University of Punjab.
- Jadoon, J.I., Jabeen, N., & Zeba, F. (2012), "Towards Effective Implementation of Semester System in Pakistan: Lessons from Punjab University, 2nd International Conference onAssessing Quality in Higher Education, 1st – 3rd December 2008, Lahore – Pakistan, 364-373. [Online] Available: http://www.icaqhe2010.org/ (November, 2012)
- Khattak, S.G. (2012). Assessment in schools in Pakistan. South Asian education Journal. (9)2
- Khan, S. H. & Saeed, M. (2009). Effectiveness of Pre-service Teacher Education Programme (B.Ed) in Pakistan: Perceptions of Graduates and their Supervisors' Bulletin Of Education and Research, (31, 83-98).
- KAMRANI, S. (2010) Future of Pakistan in respect of Education, Islamabad: Aziz Publishers.
- Khan, I. (2011) Reading Assessment Techniques among selected Secondary School Teachers in Pakistan.
- Khan, S. (2006) An evaluation of the exercises provided in the English compulsory textbook for class X, [MA dissertation] Faculty of English Linguistics, University of Karachi.
- Kotler, P., & Keller, K.L. (2006). Marketing Management, Published by Prentice Hall.

- Memon, G.R., G.R., Joubish, M.F., & Khurram, A.K., (2010). Education in Pakistan: The Key Issues, Problems and the New Challenges. *Middle-East Journal of Scientific Research*, 6 (6): 672-677, 2010.
- Malik et al. (2006). Comparative analysis of M.A. English result under annual and semester system: Quality Assurance in Pakistan.
- Mirza, M. (1999), 'Examination System and Teaching and Practice of Teachers at Secondary, Higher Secondary and O' Level'. Bulletin of Education and Research, 1. Lahore: Institute of Education and Research, University of the Punjab
- Mirza, M., Nosheen M., & Masood. (1999) Impact of Examination System on Teaching Styles of Teachers at Secondary and Higher Secondary Classes, Lahore: Institute of Education and Research, University of the Punjab.
- Majeed, A. (2009). Key aspects of New National Curricula. Retrieved at: www.nbf.org.pk/.../key%20Aspects%20 curricula 2006.pdf [Accessed on: 20 November, 2011].
- Munshi, D., Javed, M., & Hussain, I. (2011-2012). Examination In Semester System: What Is Observation of Faculty and Students? The S.U. Jour. of Ed, 41(2011-2012), .76-92.
- Ministry of Education (1998). National Education Policy, (1998-2010). Islamabad: Government of Pakistan
- Ministry of Education (2009a). National Education Policy. Islamabad: Government of Pakistan.
- Ministry of Education (2009b). National Professional Standards for Teachers in Pakistan. Policy and Planning Wing, Islamabad: Government of Pakistan. Assessment can be formative or summative (see the following URL: <u>http://www.provost.cmich.edu/assessment/toolkit/formativesummative.htm</u>. Northern Illinois University, Faculty Development and Instructional Design Center facdev@niu.edu, http://facdev.niu.edu, 815.753.0595
- Naqvi, R. (2002) 'Opting for O and A levels', Daily Dawn 27th December 2002. Karachi. <u>http://www.dawn.com/events/lifestyle2002/ls23.htm</u>.

- Newman, W. J., Abell, S. K., Hubbard, P. D., Mcdonald, J., Otaala, J. and Martini, M. (2004). Dilemmas of Teaching Inquiry in Elementary Science Methods Journal of Science Teacher Education, (15).
- Teaching Inquiry in Elementary Science Methods Journal of Science Teacher Education, 15.
- Ovando, M. N. (1994), 'Constructive Feedback: A Key to Successful Teaching and Learning', *International Journal of Educational Management*, (8)6, 19-22 Accessed online July(4, 2012).
- Perveen, U., & Saeed, D. (2014). A Comparative Study of Examination Practices in Annual and Semester System in Public Sector Universities of the Punjab Pakistan. International Journal of Academic Research in Progressive Education and Development, 03(01), (243-254).
- Pathak T., & Rahman M.A. (2013). Perception of students and teachers towards semester system: A study in some selected degree colleges of Nagaon Town of Nagaon district of Assam. *Journal of Education and Practice*, 4(1), 84–88.
- Rehmani, A. (2011) Teachers' Conceptions of Teaching: Case Studies of Professional Development Teachers from Pakistan. Thesis submitted in fulfillment of the requirement of the degree of Doctor of Philosophy, Department of Learning, Curriculum and Communication, Faculty of Culture and Pedagogy, Institute of Education University of London.
- Rodrigues, S. (2010). Exploring Talk: identifying register, coherence and cohesion, In: Rodrigues, S. (Ed.), Using analytical frameworks for classroom research, London: Routledge, (144-160).
- Rehmani, A. (2003) Impact of Public Examination System on Teaching and Learning in Pakistan, International Biannual Newslette, 8 (2), 3-7. Research in Science Education Classic and Contemporary Measurements, 3-44.
- Rojewski, J. (2002). Career assessment for adolescents with mild disabilities: Critical concern for transition planning. Career Development for Exceptional Individuals, 73-95.

- Simmons, H. (2002). School Self-evaluation in a Democracy, School-Based Evaluation in D. Nevo (ed.), School-based Evaluation: An International Perspective, JAI Press, Oxford, 17-34.
- Sarkees-Wircenski, M. & Scott, J.L. (1995). *Vocational special needs* (3<sup>rd</sup> *Edition*). Homewood, IL: American Technical.
- Sebatane, E.M. (1998) Assessment and classroom learning: a response to Black.
- Siddique, S. (2007). Rethinking Education in Pakistan: Perceptions, practices, and possibilities. Karachi-Lahore-Islamabad: Paramount Publishing Enterprise. In Assessment in the mathematics classroom (pp. 26-39). Reston: National Council of Teachers of mathematics.
- Shah, S. & Saleem, S. (2010) Factors Conducive for the Purposeful use of Libraries among University's Students In Pakistan, International Journal on New Trends in Education
- Shami, A. P (2005), Education in Pakistan: Policies and Policy Formulation. Ministry of Education Islamabad, Pakistan: National Book Foundation.
- Tribus, M. (1994).Total Quality Management in Education developing quality system in education.Edited by Geoffery D. Dohety. Routledge, London & New York.
- Traub, R. E. & MacRury, K. (1990) Multiple-choice vs. free response in the testing of scholastic achievement, in: K. Ingenkamp & R. S. Jager (Eds) Test und tends 8: jahrbuch der pädagogischendiagnostik (Weinheim und Base, Beltz Verlag), 128–159.
- UNESCO and USAID, (2006), Strategic Framework for Teacher Education and Professional Development, Islamabad: Pakistan.
- Van de Walle, J. A. (2001). *Elementary and middle school mathematics*. New York: Longman.

Von Glasersfeld, E. (1995). Radical constructivism. London: The Falmer Press.