The Study Regarding Instructional Technology Use: Perspective Of Graduate-Level Students

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Abstract
The main objective of this research was to determine the use of instruction technology and the perspective of graduate-level students in south Punjab. The study population comprised all graduate-level students in the universities of Dera Ghazi Khan. The Researcher conducted the survey to collect the data and personally accessed the participants. Data was analyzed by using SPSS version 20.0. For data analysis mean, percentage and t-test were used. After analysis, research found that instructional technology improves the teaching and learning process. It was also discovered that Internet access was supplied in teacher training institutes. The teachers noted that even though using instructional technology is expensive, it improves the quality of education. It was concluded that the usage of instructional technology stimulates pupil engagement in academics.

Key Words: Instructional Technology, Instructional Strategies, Graduate Level Students.

Introduction
Instructional technology is mainly focused on the problem-solving method technique. To make our teaching valuable for a long period, we can use instructional technology strategies and A.V. aids. Instructional technology is a very complicated system that incorporates manpower, electronic equipment, and
technology, all of which contribute to a desirable educational environment. In order to investigate problems and develop, finish, review, and manage solutions for those problems drawn from the teaching and learning process, instructional technology is a problematic technique that includes people, frameworks, thoughts, contraptions, and relationships. The learning objectives, the use of A.V. aids and their unique features, the standards for approving the medium and materials, the authorities of the focus points, and their assessment are all included.

The efforts of tertiary education to improve academic learning have changed as a result of the following developments: 2017; Manasijevic et al., 2016; Halil, 2015; and they will continue to be applicable in the future. According to Hussain (2012), the web and front-line preparation have increased examinee learning and maintained virtual co-assignments for exchanging evaluation disclosures.

According to Rashid (2010), the idea of beneficial advancement involves the creation, use, and assessment of frameworks, approaches, and aids within the framework of education. As far as we are aware, instructional technology encompasses more than simply computer and projector considerations; it also refers to a method of education that fosters analytical thinking in our pupils. With this assistance, professionals can enhance their teaching methods and adhere to global standards. Rashid (2004) contends that instructional technology is a complicated topic because the use of computers is seen as a trustworthy instrument that creates a progressive foundation for education.

Stewart (2010) asserts that positions for educational progress are rising. Groupware software frequently includes functionality like online and offline conferencing, email, collaborative time management, and collaborative document editing and management. These gadgets have a typical recording capability that keeps a record of the events in writing. This document is crucial for later use and has the potential to be a substantial addition to the learning archive.

According to Seattler (2010), instructive progress is a systematic method for organizing, carrying out, and analysing the specific method of learning and illustrating the extent to which explicit goals are dependent on appearance. Around the world, developing and poor countries rely on academic achievement to make HR in general vital for good development. According to Bart (2010), every Norwegian school and institution is linked through an electronic structure.
Academic growth enables the existence of human resources. Kobayashi (2007) explored possible regulation of instructional improvement in this area, including Pedagogical advancement is a concept that does not always prescribe the utilization of machines and other setups, but it is a decent way to supervise and instruct learning by utilizing ideas and techniques developed in the governance of essential sciences, humanistic frameworks, the classroom, and spoken languages. It combines the advancement, implementation, and evaluation of framework techniques with the use of various media to aid in the presentation of the learning process.

Various techniques of thinking for educational development are clarified, with educational advancement divided into three methodologies. In this approach, information is shared with the understudies in a practical way using electronic contraptions. Instructors give directions to understudies based on the learning safeguarded as an introduction, and as a consequence, the understudies make themselves through this data. Some examining material has been suggested in the course of studies, but no advancement is recommended to get acquainted with the speedy movement toward teachers. Regardless, a goal of raising and stirring up the model of spectacular preparation in a nearby location has been maintained.

Academic advancement emphasizes the use of methods and equipment for the advancement of important topics. In this approach, the character of headings can be grown by providing teachers and educators with reading foundations that are designed to be utilized in academic technique, comparable to educational frameworks for improved rule application. In Pakistan, various studies on the effective use of hardware in informational advancement from various foci have been coordinated.

The evaluation was conducted in order to determine how well the nation's educational system has produced qualified instructors. In various educational institutions, such as Common Educational Program Agencies, Reading Material Sheets, Directorates of Staff Advancement, Training Expansion Focuses, Commonplace Instruction Divisions, Service of Instruction, etc., it would be important for informational foundations and relationships, such as schools of planning, preparation associations, and examiners.

This evaluation would inspire ideas for solutions to problems posed by the holding pattern of instructional technique. The assessment is important for many public and
private workplaces engaged in strategy development and program administration for educational advancement, particularly staff development.

This evaluation offered a starting point for resolving problems posed by the hold-up instructional method. The assessment is important to the situation, the researcher looked into how IT is used in higher education institutions at the graduation level.

**Objectives of Study**

For many workplaces, both public and private, engaged in strategy development and program administration for educational advancement, particularly staff development. In order to better understand

The current study consisted of the following objectives;

1. To measure the stakeholders' awareness about using instructional technology at the graduation level in south Punjab.
2. To determine the availability of hardware and its use at graduation-level institutions in south Punjab.

**Research Questions**

The following was the research question of the study:

i. Students are aware of the use of instructional technology in class.
ii. Hardware used for instructional technology is available and used at graduation level.

**Delimitation of the study**

The current study was delimited to:

1. Graduation level institutions in south Punjab.
2. The study was delimited to U.E Lahore campus Dera Ghazi khan.

**Review of Related Literature**

The preference for preparation has increased with the use of various academic frameworks and types of setup, including A.V. capabilities, sound and TV programs, small-scale computers, and so forth, inside the delivery of guidelines, particularly in teacher planning foundations. According to Tune (2010), facts demonstrate true-to-reality lifestyles and their motivations for holders and helpers. The idea is to make oneself and others better by traveling and getting to know others. Wallace (2009)
evaluated the movement of statistics using this tool, which he calls guiding.

Rashid (2010) identified these traits as those of effective sports that require little training. In addition, he maintains that these physical games are referred to as rules that refer to the employment of records, even though educational improvement implies a system of frameworks or tools employed to carry out a certain depicted arrangement of dream knowledge.

Nesnov (2009) asserts that the word "techno" has evolved to signify durability, craftsmanship, or a preference for conveying an analysis of something or a subset of the facts of a request. Juan (2008) noted that the word progression connotes the uniqueness of arriving at conclusions, the methods and tactics used to achieve anything, the analysis of something, or the specific information in a request. The word "advancement" implies the use of a correct and reliable device or technology that has undergone thorough examination and is being used legally. Supporting this notion of development, the relationship between economic cooperation and development maintains that development encourages the application of technology and craftsmanship. By stating that using and understanding tools, techniques, and works of art is what advancement is, Stary (2007) has succinctly summarized the broad range of development.

Buchanan (2009) defines improvement as a machine or method for association. This concept encompasses a wide range of development, including hardware (apparatus kinds) and programming (principle) features that aid in developing comprehension or manipulation.

Rashid (2010) came to the conclusion that the idea of enlightened growth integrates the improvement and evaluation of frameworks, methods, and tools used in the field of education while bearing in mind all prospective points of view and the concept's peculiarities.

The term "instructional improvement" refers to educational development that encompasses areas inside the educational field such as (1) maintaining learning objectives, (2) selecting learning material, (3) ensuring that indicating learning strategies are used, (4) selecting media that includes special media materials, and many others, (5) preparing teachers for the use of instructional associations, and (6) evaluating and appraising students.

D (2002) explained instructive development as the process of becoming ready that is activated by the employment
of laws and technological exposures concurrent with development. Sharmma serves as an example of how instructional enhancement, a subset of educational development, integrates three primary areas: machines, headings, and learning. Those pieces are connected to media that aid in information or coaching transmission.

A learning device is primarily based on the arrangement and achievement of unique objectives and goals. This is typically concerned with educators and understudies, and instructing is intended to recognize and employ the material given to help make the associated sound noticeable. Machine inspection processes require us to see, dissect, and contrast the instructive machine that best achieves the objectives and goals. As with Cox, D.M.T. (2009), the gadget examination strategy is to see that they provide answers to the challenges confronting the instruction framework in logical behavior. Cox (2009) says that using assessment methods and devices in instructional exercise applications is necessary for better scholastic control.

Material and Methods
The study regarding instructional technology use and the perspective of graduate-level. Students were examined using a descriptive testing approach. The population of the current study was the students enrolled in session 2019-23 in U.E Lahore campus Dera Ghazi khan. This study calculated the various viewpoints and opinions of the chosen sample and quantified the data in tabular form that had been gathered by questionnaire in order to draw a study regarding the use of instructional technology at the graduate level in south Punjab, including awareness of the stakeholders regarding the use of instructional technology, the attitude of administrators and academic staff, the availability of hardware, and other factors. The theory was put to the test, and the cause-and-effect relationship was examined and explained using deductive reasoning.

<table>
<thead>
<tr>
<th>S. N.</th>
<th>University</th>
<th>M</th>
<th>F</th>
<th>T</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>U.E</td>
<td>396</td>
<td>206</td>
<td>602</td>
</tr>
</tbody>
</table>

Population table of U.E Lahore Campus Dera ghazi khan.

Fall 2019-2023 Admissions.
In this current research study, the researcher selected the sample as it was convenient to him. The total number of students was 602 in fall 2019 admissions and with the help of the research advisory table researcher selected 234 students. In this research convenient sampling technique. 234 students conveniently and randomly selected from the University.

Sample table of U.E Lahore Campus Dera ghazi khan.

<table>
<thead>
<tr>
<th>S. N.</th>
<th>University</th>
<th>M</th>
<th>F</th>
<th>T</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>U.E</td>
<td>117</td>
<td>117</td>
<td>234</td>
</tr>
</tbody>
</table>

A 5-point Likert scale questionnaire was established. A questionnaire was developed to elicit responses from pupils. The tool was created with the goal of the current study in mind. The tool was validated using an updated, modified version of questionnaires that were distributed to selected students and teachers for pilot testing. The questionnaire consisted of fifteen statements.

S1. Students understand how to employ instructional technology in the learning process.
S2. The use of instructional technology in education improves teaching.
S3. Technology Use in educational institutions in Dera Ghazi Khan is expensive and out of the students’ reach.
S4. The use of instructional technology can pique the students’ interest.
S5. The use of instructional technology draws students’ attention to learning.
S6. Charts are used in institutions to teach the learning process.
S7. Models are used for teaching learning process in education.
S8. Teacher used display charts for teaching.
S9. Teachers used slide projectors for teaching learning process in university.
S10. Television or Lcd is used by teachers in teaching learning process.
S11. Teachers use computers for teaching or presentations.
S12. Internet facility is available in institute.
S13. Students effectively get education through charts, models and projectors.
S14. Instructional technology plays an important role in effective learning.
S15. Is there any need for teacher training in instructional technology?

Data Analysis
Through survey method data was collected from the sample of the study, researcher personally visited the sample of study. After collection of data from questionnaire, data was analyzed through different statistical tests. Mean and t-test were used.

Table No 1. Result of 15 statements given below.

<table>
<thead>
<tr>
<th>Sr No.</th>
<th>Statement</th>
<th>SA %</th>
<th>A %</th>
<th>U %</th>
<th>D %</th>
<th>SD %</th>
<th>Mean Score</th>
<th>T-Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>S1</td>
<td>41.98</td>
<td>39.29</td>
<td>1.73</td>
<td>5.81</td>
<td>11.19</td>
<td>3.78</td>
<td>2.31</td>
</tr>
<tr>
<td>2.</td>
<td>S2</td>
<td>40.85</td>
<td>35.30</td>
<td>1.91</td>
<td>11.54</td>
<td>10.41</td>
<td>3.64</td>
<td>2.15</td>
</tr>
<tr>
<td>3.</td>
<td>S3</td>
<td>32.43</td>
<td>32.43</td>
<td>5.41</td>
<td>16.22</td>
<td>13.51</td>
<td>3.49</td>
<td>2.23</td>
</tr>
<tr>
<td>4.</td>
<td>S4</td>
<td>38.27</td>
<td>34.80</td>
<td>2.08</td>
<td>15.56</td>
<td>9.29</td>
<td>3.14</td>
<td>2.39</td>
</tr>
<tr>
<td>5.</td>
<td>S5</td>
<td>38.09</td>
<td>41.78</td>
<td>3.90</td>
<td>9.25</td>
<td>6.98</td>
<td>3.61</td>
<td>2.34</td>
</tr>
<tr>
<td>6.</td>
<td>S6</td>
<td>27.84</td>
<td>23.68</td>
<td>3.73</td>
<td>22.98</td>
<td>21.77</td>
<td>3.06</td>
<td>0.18</td>
</tr>
<tr>
<td>7.</td>
<td>S7</td>
<td>23.76</td>
<td>25.15</td>
<td>3.04</td>
<td>23.85</td>
<td>24.20</td>
<td>3.01</td>
<td>0.08</td>
</tr>
<tr>
<td>8.</td>
<td>S8</td>
<td>20.12</td>
<td>22.98</td>
<td>1.91</td>
<td>26.63</td>
<td>28.36</td>
<td>2.84</td>
<td>-0.15</td>
</tr>
<tr>
<td>9.</td>
<td>S9</td>
<td>12.58</td>
<td>37.81</td>
<td>4.34</td>
<td>21.94</td>
<td>23.33</td>
<td>3.19</td>
<td>0.55</td>
</tr>
<tr>
<td>10.</td>
<td>S10</td>
<td>8.76</td>
<td>16.48</td>
<td>19.08</td>
<td>32.35</td>
<td>23.33</td>
<td>2.64</td>
<td>-0.78</td>
</tr>
<tr>
<td>11.</td>
<td>S11</td>
<td>40.33</td>
<td>37.99</td>
<td>1.82</td>
<td>9.45</td>
<td>10.41</td>
<td>3.87</td>
<td>2.18</td>
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<tr>
<td>12.</td>
<td>S12</td>
<td>29.11</td>
<td>21.44</td>
<td>4.09</td>
<td>23.56</td>
<td>21.8</td>
<td>2.56</td>
<td>0.78</td>
</tr>
<tr>
<td>13.</td>
<td>S13</td>
<td>32.44</td>
<td>37.38</td>
<td>2.17</td>
<td>7.11</td>
<td>20.90</td>
<td>3.67</td>
<td>1.76</td>
</tr>
<tr>
<td>14.</td>
<td>S14</td>
<td>38.09</td>
<td>32.00</td>
<td>2.08</td>
<td>13.79</td>
<td>14.04</td>
<td>3.39</td>
<td>2.18</td>
</tr>
<tr>
<td>15.</td>
<td>S15</td>
<td>31.74</td>
<td>32.35</td>
<td>2.60</td>
<td>14.40</td>
<td>18.91</td>
<td>3.49</td>
<td>1.89</td>
</tr>
</tbody>
</table>

Results
S1. Student is aware of how to use educational technology in the classroom.
Statement 1 shows that maximum 81.27% of students agree that they have knowledge about instructional technology. T-value 2.31 is bigger than the crucial value of 1.645. As a result, the assertion is considered valid.

S2. Instructional technology in education enhances the quality of teaching.
Statement 2 shows that maximum 76.15% of students agree that instructional technology enhances the quality of learning. T-value 2.15 is bigger than the crucial value of 1.645. As a result, the assertion is considered valid.

S3. The use of technology in educational institutions in Dera Ghazi Khan is expensive and away from the reach of students.
Statement 3 shows that maximum 64.86% of students agree that the use of instructional technology is expensive. T-value 2.23 is bigger than the crucial value of 1.645. As a result, the assertion is considered valid.

S4. Use of instructional technology can obtain the interest of students.

Statement 4 shows that maximum 73.07% of students agree that instructional technology obtains the interest of students as it can provide different ways of learning t-value 2.39 is bigger than the crucial value of 1.645. As a result, the assertion is considered valid.

S5. Use of instructional technology draws pupils’ attention to education.

Statement 5 shows that maximum 79.87% of students agree that instructional technology builds and catches their interest in learning. T-value 2.34 is bigger than the crucial value of 1.645. As a result, the assertion is considered valid.

S6. Charts are used for teaching the learning process in institutions.

Statement 6 shows that 51.52% of students agree that the charts are available in the institute for quality learning. T-value 0.18 is less than the crucial value of 1.645. As a result, the assertion is rejected.

S7. Models are used for teaching the learning process in education.

Statement 7 shows that 48.91% of students agree that the models are available in the institute for quality learning. T-value 0.08 is less than the crucial value of 1.645. As a result, the assertion is rejected.

S8. The teacher used display charts for teaching.

Statement 8 shows that 43.1% of students agree that the display charts are available in the institute for quality learning. T-value -0.15 is less than the crucial value 1.645. As a result, the assertion is rejected.

S9. Teachers used slide projectors for teaching learning process in the university.

Statement 9 shows that 50.39% of students agree that the projectors are available in the institute for quality learning. And teacher used it for teaching T-value 0.55 is less than the crucial value of 1.645. As a result, the assertion is rejected.

S10. Television or Lcd is used by teachers in teaching learning process.

Statement 10 shows that 25.24% of students agree that the TV is available in the institute for quality learning. T-value -0.78 is
less than the crucial value of 1.645. As a result, the assertion is rejected.

S11. Teachers use computers for teaching or presentation.
Statement 11 shows that 78.32% of students agree that computer labs are available in the institute and teachers use the labs for the quality learning process. T-value 2.18 is bigger than the crucial value of 1.645. As a result, the assertion is considered valid.

S12. Internet facility is available in the institute.
Statement 12 shows that 50.55% of students agree that the internet is available in the institute and teachers use it for the quality teaching-learning process. T-value 0.78 is less than the crucial value of 1.645. As a result, the assertion is rejected.

S13. Students effectively get education through charts, models and projectors.
Statement 13 shows that 69.82% of students agree that the charts, models and projector are compulsory in the institute for quality learning. T-value 1.76 is bigger than the crucial value of 1.645. As a result, the assertion is considered valid.

S14. Instructional technology plays an important role in effective learning.
Statement 14 shows that 70.09% of students agree that instructional technology plays an important role in the modern age. T-value 2.18 is bigger than the crucial value of 1.645. As a result, the assertion is considered valid.

S15. Is there any need for teacher training for instructional technology?
Statement 15 shows that 64.09% of students agree that the university should start instructional technology training program for teacher training. T-value 1.89 is bigger than the crucial value of 1.645. As a result, the assertion is considered valid.

Table No: 2  Master table of research study

<table>
<thead>
<tr>
<th>SR #</th>
<th>RESEARCH QUESTIONS</th>
<th>RESULTS</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>The usage of instructional technology in class is known to the students.</td>
<td>Accepted</td>
</tr>
<tr>
<td>2.</td>
<td>Hardware used for instructional technology is available and used at graduation level.</td>
<td>Rejected</td>
</tr>
</tbody>
</table>

**Conclusion and Discussion**
Many studies suggest that using instructional technology throughout the teaching-learning process is beneficial.
According to the conclusions of this research study, pupils are familiar with the use of instructional technology, but there is no facility for them. The administration of the university cannot provide charts, moving charts, the internet, computers, or projectors that can enhance their learning. Many studies show that the use of I.T in classroom are more effective and provide a better result. 81% of students agree that they know about instructional technology and want instructional technology to be used in the classroom for the teaching process. They responded that instructional technology enhances the teaching-learning process. On the other hand, they agreed that it may be costly that’s why their implementation is very expensive. Most students agreed that instructional technology obtain the interest of students. Student says that charts, TV, models projectors are not used for teaching. No facility is provided for internet use. Sometimes teachers used projectors for lectures. The computer lab is only provided to computer education students. Teachers use computers for teaching sometimes.

In this modern age use of instructional technology is compulsory for teaching. Universities and colleges must provide full access to A.V. aids to teach students for better teaching. Universities should provide this hardware. Most of the students agreed that teacher training sessions should also ensure that the lecturer knows about the use of this hardware. Teachers must know about instructional technology.

**Conclusion**
Following are the conclusions of the study.

1. The usage of instructional technology in class is known to the students.
2. Teachers need training about A.V aids or instructional technology.
3. With the use of instructional technology we can easily enhance the teaching-learning process.
4. Internet facility is not provided.
5. Due to Financial problems administration is not able to provide hardware or A.V aids.
6. Computer labs are available in the university.

**Recommendations**
The following recommendations are made;

1. A teacher training program for instructional technology is compulsory.
2. Training should be given for the use of instructional technology.
3. Funds should be made accessible to buy new or improved instructional technology hardware.

References