Chapter Three

Method

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In the preparation of the present thesis, an appropriate design had to be chosen and research instruments to be developed. The aim of this chapter is threefold: a) to report the procedures of developing the instruments of the research; b) to explain the research design used in the present thesis and the reasons for choosing this particular design; and c) to report the procedures the thesis followed.

Research Design

The present study is a qualitative and a quasi-experimental one. Data were obtained by the (1) critical reading test, (2) reflective inventories. Two groups were nominated .One of them is a control group and the other is an experimental one.

To assess the effect of the use of the proposed program on improving first secondary stage students' critical reading skills, an intervention was needed. In this intervention, the pretest /posttest was administered to both the control and experimental groups. It is a quasi-experimental design**.**

Participants

Participants of the present study were originally 55. Five of them were excluded from the control group and 2 other students from the experimental group. For the control group, two of the students were excluded because they did not complete the electronic test. The other three students were absent in the posttest. As for the experimental group, one student did not attend the pretest and the other one was absent in the posttest. Participants, thus, became (n=48). 27 for the control group and 21 for the experimental group. The participants were randomly chosen from the first secondary stage students.

Two classes were randomly choosen , one as a control group and the other was an experimental group.

Instruments

The following instruments were developed and used in this study:

A critical reading skills checklist

One initial step to achieve the aim of the study was to identify the critical reading skills that were required by first secondary stage students, see Appendix C .

- ### Sources of the nominated critical reading skills

The skills were determined by surveying literature. They were also tackled in chapter two ,see Appendix C.

- ### Aims of the critical reading skills checklist

The aim of this list was to identify the views of the TEFL specialists regarding the suitable critical reading skills needed for the first secondary stage students.

The Electronic Critical Reading Test
- ### Aims of the C R S test

In order to assess the effect of the proposed program, a critical reading skills test was needed. This critical reading skills test aimed at identifying students' mastery of the critical reading skills that the program was intended to develop. According to the research design adopted in this study, the pre/posttest for both the control group and the experimental group comparing post/posttest for both of the two groups and pre/posttest for the experimental group were utilized.

- ### Description of the test
The final version of the electronic critical reading skills test ,Appendix H was designed by the researcher herself except for the cover page as she could not do it because it was very difficult . It was made up of the following:
  - An electronic cover page for title,
  -   The second page, an introduction to students, and included the instructions of the test,

- A software material that consisted of 50 items, 5 of them were paper and pencil questions,
- A paper and pencil test that required students to analyze the data or they can be printed,
- The test provided the scores and the feedback of each question .

- **Test validity**

The Electronic Critical Reading Skills Test was submitted to a group of TEFL experts in order to verify its validity, see Appendix D. The version of the test that was submitted to the experts ,see Appendix G was on CD because of its electronic nature.

The test included:
- A cover page with the title of the test written on it,
- The second page was a letter to the experts including the aim of the test, and what the experts were required to do. As stated in the cover letter, the aims of this review were :
  a. To determine the suitability of each skill for the first secondary stage students,
  b. To determine the suitability of each question for measuring each skill
  c. To write any other comments or suggestions.

The pilot administration was carried out in order to determine time, ease and difficulty, and reliability.

All of the modifications were then modified according to the comments obtained.

- **Pilot Administration of the Critical Reading Test**

The critical reading skills test was piloted for the following purposes:
- To establish the reliability of the critical reading test,
- To determine the appropriate time for the students to answer, and
- To obtain comments on the difficulty of the vocabulary that the test included.

The test was piloted on a number of 26 first secondary stage students .They were not the same people to whom the program was taught.
- Using SPSS for calculating split-half reliability coefficient for the critical reading test, the value was (,778), so the value indicated that the test was reliable enough.
- Besides calculating the reliability coefficient for the test, the average time of the test was calculated to be 50 minutes.

- The numbers of distractors of each question were 4 in order to decrease the guessing factor.

§ **Table of Specifications for the Critical Reading Test**

Table (1): Table of Specifications

Aims/→ Lessons↓	The Main idea	Author's purposes	Constructing the meaning skill	Cause-effect	Comparing skill	Evaluating texts	Agree/disagreeing	Finding alternatives	Total
1		√	√						2
2	√						√	√	3
3					√	√			2
4				√			√	√	3
5		√	√						2
6				√			√	√	3
7					√				2
8	√					√			2
9		√	√						2
10					√	√			2
11			√	√					2
12	√		√	√					2
weight	11,11%	11,11%	18,50%	14,8%	11,11%	11,11%	11,11%	11,11%	27

The points for each skill were calculated according to the weight of each skill.

§ **Sources of the Texts of the Test**

All of the texts were extracted from either the Longman Electronic Test Bank or educational passages from the internet .Their citation was included in the references of the program .

In addition to the previously mentioned instrument, the researcher has designed a program based on blended learning to develop students' critical reading skills, see Appendix E.

The Blended Learning Program

- **Aims or objectives of the program**

The aim of the program was to develop the critical reading skills of the first secondary stage students.

- **Description of the program**

The program consists of 12 lessons. All of them were based on the syllabus.

The proposed program was based on a designed online site entitled: www.smart-wayy.com; (Loyalway) .It was utilized by the learners with face–to-face sessions. For a printed version, see Appendix E. The framework of the program is in Appendix E .

The program consisted of 12 lessons. The texts were extracted from the syllabus of the first secondary stage itself. An additional session was included as an introduction for the students.

Each lesson included two or three skills to be developed .The skills of each lesson were chosen according to the suitability of the lesson to clarify them.

- **Skills Developed through the Program**

The program aimed to develop the following skills:
- identifying the purpose of the author of writing a text,
- identifying the main idea of a text,
- identifying sub-ideas of a text,
- constructing the meaning of a given text,
- determining the cause-effect relationship,
- comparing things or characters,
- evaluating a text using some criteria (clarity, precision, relevance, significance, depth, consistency and fairness),
- agree/disagreeing with the author and
- finding alternatives.

- **Technologies Used in the Program**

The program included many technologies of blended learning as follows:

- **Electronic Dictionary (Google Translation Dictionary)**

The researcher did not want to set an English/Arabic dictionary but consulted a computer engineer who suggested that Google would be the only suitable dictionary to be incorporated "inside" any site.

- Interactive Whiteboard Activities

The electronic activities were designed by the researcher herself using an electronic program called "Quiz Creator."

- Softwares

They were presented in the program as PowerPoint presentations; the student can download them from the internet.
The proposed program also included an electronic pre/post critical reading skills test which was designed by the researcher herself.

- Portable Devices

a) MP3 Players
These were prepared by using MP3 players (Digital Audio Recorders) for recording the sessions as a reflective instrument for helping in the qualitative part of the study.

b) laptops.
It was used inside the classroom for the group of the students who did not have computers or internet connections in their homes or for those who faced any technological problems in their computers.

- Computer Mediated Communication (CMC)

- **email**

These were done by using e-mails and facebook with students to interact or to submit assignments. The teacher tried to use video conference using Skype but that did not work because: a) some technological problems hindered the communication, e.g. two of the students tried to contact the researcher by using Skype but failed, and b) only few (about three) students had cameras at their homes so most of the students preferred communicating by facebook. A closed group was designed by the students themselves in facebook named "live students". Open groups were also used .

The program had an e-mail for contacting or sending assignments.

- **MOO:**

The study involved using Multi-Object Orientation (MOO): a virtual environment which allows more than one person at a time to chat.

- **Forums**

The program included a forum which was used for discussing issues or sending assignments by the students. It was opened by double- clicking "the test " then writing the username which was (monaallam) and the password which was (147852) when logging onto the forum. There were 14 pages of the forum including 84 comments either by students or by the teacher.

- An Electronic Test

The proposed program included an electronic pre/ post critical reading test that was designed by the researcher, See Appendix H for the printed version or log onto the site to download .

- Videos

The porgram included many videos .They were taken from YouTube, including songs about the target skills, short stories of two lessons of the course (A short story about King Lear and a short story about Oliver Twist) and a video about bad behaviors in a class to say their opinion (Agree/disagreeing with the author and finding alternatives).

- Pictures

Lots of pictures were incorporated into the program including their resources .

- Virtual Learning Environments (VLEs)

The site used to put the program online was private. It is called (www.smart-wayy.com) – (loyalway).

- Blogs

The program has one blog .It includes the 12 nominated lessons .

- **The proposed program was taught by the researcher.**
- **Teaching methods included**
- Cooperative learning.

- Discussion.
- Brainstorming.
- Reflective teaching.

Some activities were taught in the classroom and others were online.

- **Duration**

The program was taught in the second term of 2013 .It took 18 hours, 9 hours in the classroom and 9 hours online.

- **Evaluation of the Proposed Program**

Two major methods of evaluation were employed in evaluating the program: a) formative evaluation, and b) summative evaluation. For the formative evaluation, the researcher made use of the following:
- Students' assignments,
- personal reflection inventories which consisted of 5 inventories of the reflective teaching,
- the feedback questionnaire inventory that was used every class ,
- five-minute paper which was used once after two lessons,
- formative teacher assessment survey which was used three times during the whole course, see Appendix I, and
- the teacher's Journal and MP3 for recording the classes**.** See Appendix J and Appendix K for seeing pictures of the teacher's journal.
- For the summative evaluation of the proposed program, the following instruments were developed and administered:
- An electronic critical reading skills test ,see Appendix H, and
- A final survey that was an inventory of reflective teaching.

Reflective instruments

The reflective instruments of this thesis consisted of:
- the teacher's journal,
- formative reflective assessment,
- five-minute papers ,and
- the final reflective survey.
These instruments were extracted from a university book.

In short, this chapter was devoted for explaining the research methods, research instruments and procedures the research followed.

The major aim was to verify the research hypotheses .The following will present the results of the research.