Investigating the effect of Grammatical Competence Strategies in teaching writing skills

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Abstract

This study aims to implement grammatical competence strategies (inductive, inductive, and interactive) in developing students' writing in grammar and their attitudes towards English as a foreign language. To achieve the purpose of the study, the researchers applied the tools to target a sample of second intermediate-grade female students at Maysaloon Girls School in two groups, Experimental and control were used in this study. The experimental group was taught the inductive, deductive, and interactive strategies, and the control group studied the traditional way method. While at a time when new trends in language teaching encourage the use of interactive methods of stimulation and maintaining student interest, and the constant tendency to retain a teacher-centred approach to teaching English grammar is counterproductive. The most effective methods currently available are monotonous by heart. Learning needs no longer dominate the main part of the lesson. The interactive strategy is multi-skilled and learner-centred and designed to teach a specific grammatical concept will also be introduced. To answer the main research question of whether inductive, deductive, and interactive methods are so, the researchers used a more effective introductory method of teaching grammar instead of the traditional method, so grammatical competence plays a significant role in students’ language. When students have Grammatical Competence, they will be able to develop their writing comprehension.

Keywords: Grammatical competence strategies; girls school; foreign language.

1. Introduction

1.1 Statement of the Problems

Michael (1996:275-308) States that Language is a structured system of communication. The structure of language is its rules and free components are its vocabulary. Languages are the primary means of communication between humans, and can be ransmitted through speech (spoken language), sign or writing.

Teaching English grammar is a huge challenge for both the teacher and the students. For teaching English grammar, the teacher follows different strategies to meet the needs, levels, and abilities of students.

DOI: 10.33687/jhssr.001.01.00011

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the students, and these are different strategies that negatively or positively affect the achievement levels of the students, especially in grammar and English language learning in general.

Also, it will affect students’ attitudes towards learning English as a foreign language.

1.2 the aims of the study
The aims of the current study was to:
1- Explore the implementation of grammatical competence strategies for teaching writing to intermediate school students.
2- Whether there is any significant difference between students' achievement at the recognition level and that at the production level.
3- Whether there is any significant difference between the achievement of experimental groups in the pre and post-test.

1.3. Hypotheses of the study
The hypotheses of this study are:
1- There are statistically significant differences between the mean scores of the control group, who are taught according to the conventional method, and the mean scores of the experimental group, who are taught by using the "grammatical competence strategy" in the post-test.
2- There are significant differences between the mean scores of students' achievement at the recognition level and those at the production level.
3- There are statistically significant differences between the mean scores of the experimental group's achievements in the pre and post-test.

1.4. Value of the study:
The value of this study can be detailed as follows:
1. It provides a model to show the effectiveness of instructional grammatical competency strategies to improve the achievement of students of the second intermediate stage of English as a foreign language in developing their writing.
2. It will be beneficial for middle school teachers of EFL by knowing the role of grammar proficiency strategies in teaching writing development to their students.
3. It provides how to teach grammatical competence to EFL intermediate school students by using inductive, deductive, and interactive strategies.
4. It has practical value since it will be useful for EFL pupils and teachers; it will develop pupils' skills of writing comprehension.
1.5 **Limitations of the Study**

The present study is limited to second-year intermediate school female students who study *English for the Iraqi* Student's Book at Maysaloon intermediate School for Girls in the city Tikrit / Salah al-Din Governorate, during the academic year 2022-2023.

1- The method the researcher followed in teaching the special strategy in developing writing from the grammatical competence point of view is deductive, inductive and interactive.

2- The sample the researcher used is the second stage of the intermediate study.

1.6. **Definition of Basic Terms**

Below are the definitions of the basic terms employed in this study.

### 1.6.1 Implementation

According to David (2008:30), defines implementation is the process of identifying, integrating, monitoring, and continually improving professional learning that helps teachers enhance their practice and encourage and inspire students’ academic and non-academic growth.

**Operational definition:** The science of implementation is growing and becoming more complex. When teaching new learners, provide a clear definition of the science of implementation and describe its 'place' among related areas.

### 1.6.2 Grammatical competence:

According to Walt (1993:10), states Grammatical Competence is the mastery of the language code which involves knowledge of the lexicon, morphology, semantics and phonology.

Chomsky (1965:133) defines as theoretical and practical knowledge of limited number of grammatical rules, which allow generating an unlimited number of correct sentences.

**Operational definition:** Grammatical Competence is the ability to recognize and produce the distinctive grammatical structures of a language and to use them effectively in communication also grammatical competence is one linguistic component, like lexicon, syntax and pronunciation. It is defined as “the ability to understand and express meaning by producing and recognizing well-formed phrases and sentences.

### 1.6.3 Competence:

Pinada (2018:98) shows competence is a set of characteristics owned by someone to achieve the effectiveness of his job competence means the process of getting knowledge skills to do a certain job in great ways (Sinamo, 2010:92).

Walt (1993:10) holds that competence of this nature focuses directly on "the knowledge and skill required understanding and expressing."
The operational definition: Competence is a set of attributes required to perform a particular activity. In other words, they are a collection of skills that an individual needs to complete a task and it is the set of demonstrable characteristics and skills that enable and improve the efficiency or performance of a job.

1.6.4 Inductive approach:

Inductive Approach is evident in several types of qualitative data analyses especially grounded theory (Strauss & Corbin, 1990:65).

Operational definition: Inductive approach is a process where learners discover the grammar rules themselves by examining the examples also inductive approach is when a message withholds the major idea until accompanying details and explanations have been presented.

1.6.5 Deductive approach

According to Wilson, (2010:7) Shows the deductive approach is concerned with "Developing a hypothesis" based on existing theory and then designing a research strategy to test the hypothesis. According to (Gulati, 2009:42) clear Deductive approach means reasoning from the particular to the general. If a causal relationship or link seems to be implied by a particular theory or case example, it might be true in many cases.

Operational definition: Deductive approach is one that people typically associate with scientific investigation also deductive approach is explain from the general statement to specific statement and inductive approach are explained from the specific statement to general statement.

1.6.6 Interactive Approach:

An interactive approach to teaching and learning is considered to be a social process that takes place through interaction between teachers and students, and between the students themselves(Šimić Šašić, 2011:233-260).

As defined by Van Lier (1988:74) "holds that language learning occurs in and through participation in speech events, that talking to other, or making conversation is essential ".

Operational definition: Interactive Approach is a hands-on /real life approach to education founded upon building student engagement through guided social interaction also 'Interactive learning actively engages the students in wrestling with the material.

1.6.7 Writing Skill

Writing is one of the four skills: reading, writing, listening and speaking. Writing and speaking are productive skills (Spratt,2005:26).

Writing is more complicated than others skills in English language. Writing skill is not only talks about grammars and vocabularies but also of conceptual and judgment elements (Heaton, 1975:135).
**Operational definition**: Writing is the skill which enables the learner to plan and rethink the communication process. It therefore provides the learner with the opportunity to focus on both linguistic accuracy and content organization. Also writing skills include all the knowledge and abilities related to expressing ideas through the written word.

### 1.7 Plan of the study

The following steps will be used in this study in order to verify its hypotheses and achieve aim:

1. A sample of second-year students in Al Massillon intermediate school. It is divided into two groups, one is for the experimental group (EG) and the other is for the control group (CG) both of them are equal in age, English scores of the previous year, and pre-test scores. Teaching one group of students with (Deductive, Inductive and Interactive strategies) and is called the experimental group and the other group without (Deductive, Inductive, and Interactive strategies) and is called the control group for six weeks.

2. Both (EC) and (CG) will be subjected to pre-test and post-test to find out the role of the experiment on students' achievement.

3. Constructing and achievement test.

4. Estimating the validity, reliability, discrimination power, and difficulty level of the test.

5. Subjecting the two groups of students to the achievement test.

6. Analysis of the obtained results statistically.

### Section Two

**Theoretical Background and Related Previous Studies**

#### 2.1 Theoretical Background

#### 2.1.1 Definition of Grammatical Competence

According to Nasajy (2011:33), grammatical competence is speakers' knowledge of the forms and meanings found in grammar, and theoretical knowledge of how to use them. This type of knowledge is reflected in grammar. In other words, efficiency is in the head. Sentence-based tasks usually develop grammatical competence.

Similarly, Eisenmann (2012:95) states that an emphasis on grammatical competence not only has long been considered a necessary part of language education; but it is also to this day considered a sufficient condition for successful language learning. In formal grammar teaching, classroom contents are mainly organized based on the analysis of language forms, rather than the functions of language and real communication. Language is often broken down into parts and taught in isolation.
Brown (2004:218) says that only a half century ago, writing can be reinforcing in grammatical features of language. We know about the difficulty of learning to write well in any language. The learners have to understand well for increasing grammatical competence.

2.1.1.1 Types of Grammatical Competence

Kolln and Funk (2010: 6-7) divide grammatical competence into two types:

a. Structural grammar: is important to describing language by analyzing how words change in sound and spelling and how they are used in a sentence. Structural grammar is the analysis of how spoken and written language works by studying parts of speech, clauses, and phrases.

b. Transformational grammar: is trying to change the basic sentence into the variety of form and it goes a step further and accounts for the changes in phrase structures. Also, Transformational grammar is a theory of grammar that accounts for the constructions of a language by linguistic transformations and phrase structures. Also known as transformational generative grammar or T-G or TGG.

So, the differences between Structural grammar and transformation grammar that structural grammar is the analysis of how spoken and written language works by studying parts of speech, clauses, and phrases while transformational grammar goes a step further and accounts for the changes in phrase structures.

2.1.2 Teaching of Grammatical Competence

The teachers must give their students’ allocating time to concentrate on the difficulty in the material to teach both the form and the contexts relevant in the learning process (Dudly-Evans and John, 2012:75). They also have to teach for analyzing grammar to help the ability of the grammatical in the learning process, and grammar exists to help us for reaching what we mean, and without grammar, it is impossible to communicate in the beyond of basic level.

It is supplied to provide for involvement in language to process of teaching and learning, so the learners must provide their time for practice in mastering common grammatical pattern in their live because they can get the real experience to face English for increasing the skill in practicing grammatical competence in public speaking program and the other activities what they do (Nunan, 1995:54).

2.1.3 Purpose of Grammatical Competence

The purpose of grammatical competence is considering helping our analyses in the meaning. Grammatical competence is the ability to express the meaning by producing phrases and sentences. It is also having to be master for linguistic competence included by lexis and phonology as well as syntax and morphology (Fulcher and Davidson, 2007:47).

The students’ need more specific help for solving the weakness in grammatical competence where English is used by students as the medium for communication in the program, and they are expected
to do in writing, and it is the problem of students to make oral presentations inaccurate English. They can study with their comfortable in public speaking program although they have to wake up early to do the program (ibid).

2.1.4 Grammatical Competence Test

The teachers can use the test to evaluate the grammatical competence. There are many kinds of test. Such as multiple-choice test, grammatical error test, and grammatical transformation test like change the tenses in paragraph; change full form of verb to reduced forms; change statements to yes/no or wh-questions; change questions into statements; combine two sentences into one using a relative pronoun; change direct speech to indirect speech; and change from active to passive voice (Brown, 2004:226).

Grammatical competence test is designed to measure the students in syntax. Syntax involves with words in a sentence, word order, use of the negative, question forms, and connectives (ibid). Heaton (1990:34-49) says that there are some types of grammatical competence tests which are:

a. Multiple-choice items, the most common way for testing grammatical competence.

b. Error correction items, the students are given with an error, and they have to decide which of the words or phrases have errors.

c. Completion items, the students are asked to fill in the blanks in sentence.

d. Transformation items, the students are asked to produce the structure.

e. Items involving the changing of words, the students are given a sentence and a word, and they need to change the form of the word.

f. Broken sentence items, the students must write the sentence from words and phrases.

g. Pairing and matching items, the students have to write the correct response in the space (ibid).

2.1.5 Strategies of Grammatical Competence

2.1.5.1. Deductive approach

Widodo (2006:122-141) says that the deductive method is derived from the notion that deductive reasoning from general to specific. That means rules, principles, concepts or theories are presented first, and then their application is treated. In this method, learners study grammar rules before applying the rules in doing exercises. That means the learners work from the general to the particular (Fortune, 1992:160-171).

Krumholtz and Yabroff (1965:223-235) define deduction as giving the generalizations to the students, then they are asked to deduce specific applications; whereas, deductive method according to Schmidt (1990:129-158), has involved explicit awareness, which means learning with intention and awareness.
2.1.5.2 Inductive approach

Inductive approach comes from inductive reasoning, stating that a reasoning progression proceeds from particulars which are observations, measurements and data, to generalities which are rules, laws, concepts and theories (Widodo, 2006:112-141).

According to Nunan (2003:88), Inductive is presenting the learners with samples of language and, through a process of guided discovery, get the learners to find out the principle or rule for themselves. This method is most close with the Audio-lingual Approach in teaching languages (Gollin, 1998:88-89). This approach, according to Brinton, Celce-Murcia and Snow (2014: 54-56) was driven from the reform movement.

The audio-lingual approach appeared in the United States during World War II. Some features of this approach are:

a. Lessons begin with dialogues.

b. Grammatical structures are sequenced and rules are taught inductively.

c. Skills are sequenced.

d. A great effort is made to prevent learner errors.

e. Vocabulary is severely controlled and limited in the initial stages (Brinton, Celce-Murcia & Snow, 2014:54-56).

2.1.5.3 Concept of Interactive approach

Interactive teaching and learning strategies are used to engage students in the lesson without restrictions. Students use this strategy to enhance their personal abilities to work collaboratively in learning activities to appreciate their own abilities, strengths, and abilities and to develop a range of interpersonal skills such as intelligent communication, negotiation, teamwork, and an appreciation of diverse perspectives this strategy also provides an opportunity for students to explore their knowledge and attitudes so that they can use their suggested schemes to record information and participate where teachers will also be able to use the evidence they have collected from students' responses (Linda:1998:1718).

2.1.6 Concept of Writing

Brian (2005:151), explains written language in English language teaching. It is a written language that serves many purposes for individuals and society as a whole and is not limited to communicating information. He further explains that for an individual author, writing can have cognitive functions to clarify and support thought while at the level of society as a whole, written language serves the functions of record-keeping and storage of both information and literary works. According to Harmer (2017:37-38). Writing is the last stage in language learning after listening, speaking, and reading. In other words, writing can determine whether or not students have mastered all of the previous skills.
Harmer contends that writing is an essential component of the English curriculum. Writing is one of the productive skills for language use. So, English students should practice writing.

2.1. 6.7.1 The effect of grammatical competence in learning writes

Artunduaga (2013:11-35) explains that how to teach grammar effectively can be directly linked to the development of writing because —the receptive skills require less grammatical knowledge than the productive ones and, between the two productive skills, writing is more grammatically demanding than speaking.

In Colombia for example, authors such as Giraldo and Perry (2008:107-123) have recognized the importance of dealing with English as a second language (ESL), writing errors through appropriate techniques in order to avoid future and more complex difficulties in students at higher levels of instruction. As the purpose of this research study was to develop grammatical competence in the context of written production, a process and genre model was followed to incorporate the teaching and practice of writing while at the same time developing grammatical competence.

The above-mentioned model is a combination of two well-known approaches to teach writing, the process approach and the genre approach. (ibid)

Yan (2005:15-25) explains that the genre approach consists of three phases:

1) The target genre is modeled for the students.
2) A text is jointly constructed by the teacher and students.
3) A text is independently constructed by each student. This same author emphasizes the importance that —social situations— as well as —particular purposes— have in writing.

As a result of combining the two approaches to develop writing, we have that the process-genre approach consists of these steps.

a) Preparation
b) modeling and reinforcing,
c) Planning
d) joint constructing,
e) independent constructing and
f) revising (ibid).

As this model makes use of the processes of pre-writing, drafting, revising, and editing, it offers a great opportunity for developing grammatical competence as the students are exposed to
meaningful and relevant feedback every time they create a new draft, thus, grammar can be taught in context, in this case in the context of written production (Yan, 2005:25).

2.1.6.7.2 Aspects of English Learning Enhanced from Addressing Grammar in the Context of Writing.

According to Thornsbury (1999:55-56) explained that the teaching of grammar has for a long time been the most —controversial and least understood aspect of language teaching‖ and this study was not apart from this controversy.

Considering that the biggest failure when addressing grammar is that activities where mechanical and decontextualized drills are employed, one can say the use of writing activities offers the ideal context with which to develop grammatical competence; for this reason, dealing with grammar through writing activities is a mutually enriching experience. The fact that writing demands a great deal of grammar is the perfect excuse to explore, analyze, and reinforce most if not all the grammar topics a language user needs in order to be communicatively competent (ibid).

Training our learners to develop writing as a process provides them with a setting where attention to form and awareness on linguistic features are achieved while at the same time dealing with ideas and emotions being expressed in a written text (Thornbury, 1999:55-56).

Section Three

Procedures

3.0 An Introductory Note

This chapter discusses the procedures that this study has adopted for gathering the data needed. This provides a detailed description of each of the population and sample involved, the construction of the posttest, and the statistical methods used to analyze the data collected.

3.1 Experimental Design:

The experimental design is —the blueprint of the procedures that enable the researcher to check hypotheses by reaching valid conclusion about the partnership between independent and dependent variables —(Best and Khan,2006:177). The experimental design is a —traditional approach to conducting quantitative research or testing an idea (or practice or procedure) to determine whether it influences an outcome or dependent variable ( Creswell, 2012: 294).

The experimental design of the study is entitled “The pre - post tests , Equivalent- Group Design” which includes the following points:

a. Selecting two groups of students randomly and assigning them to experimental and control groups.
b. Make equalization between the students of the experimental group, on one hand, and those of the control group, on the other hand, in some variables.
c. Administering the independent variable only to the experimental group.
d. Teaching the control group the same instructional material taught to the experimental group, but according to the traditional way.
e. Post-testing the two involved groups of students.
f. Utilize statistical tools to analyze the collected data and obtain the final results.

3.2 Population and Sample:
Creswell (2012:142) sees that population is —a large group of individuals who have the same characteristics. In regards to these definitions, the population can be small or large and within this target population the researcher selects a sample for his investigation.
Creswell (2012:145) assumes that a sample is —a subgroup of the target population that the researcher plans to study for generalizing about the population. In an ideal situation, a sample of individuals is selected to be representative of the entire population.
The whole population of the present study includes seventy-five second-year students of Masalyoon intermediate School for girls in Tikret, during the academic year 2021-2022. The students are grouped into two sections: (A, and B). Sections (A) and (B) have been randomly selected to be the experimental and control groups whose total number is (75). Section (A) consists of (38) students while section (B) consists of (37) students (8). Students are excluded from section (A) and (7) students are excluded from section (B). Some of those students are employed for the pilot study. Thus, (30) students have been selected from section (A) as an experimental group and (30) students from section (B) as a control group. Therefore, the total number of the involved sample is (60) who represent
80.00 percent of its original population, as shown in the table (3).

3.3 Equivalence of the Two Groups
The equalization between the two groups requires controlling the following variables which may cause a variance in the students' achievement such as, their age, their general level in English vocabulary, and their parents' educational level (Good, Barr and Douglas, 1976:366).

3.3.1 Age of the Students
The students' age in months for the two groups are counted till the first of January 2022 to find out whether there is any difference between their ages, as shown in appendix (C). By applying the t-test formula for two independent groups,
It is found that there is no significant difference between the experimental group and the control group in their age since the means scores value of the experimental group is (171.16) and the standard deviation is (5.34) and that of the control group is (172.13) and the standard deviation is
(5.09). The Calculated t-value is (0.717) which is found to be lower than the tabulated value which is (2.00) at the degree of freedom (58) and the level of significance (0.05). This means that the students of the two groups are equal in their age, as shown in table (4).

Table (4) The Mean, Standard Deviation, T-Value of Students’ Age

<table>
<thead>
<tr>
<th>Groups</th>
<th>No. of students</th>
<th>Mean</th>
<th>SD.</th>
<th>T-Value</th>
<th>DF</th>
<th>Level of Significance</th>
</tr>
</thead>
<tbody>
<tr>
<td>CG.</td>
<td>30</td>
<td>172.13</td>
<td>5.09</td>
<td>Calculated</td>
<td>58</td>
<td>0.05</td>
</tr>
<tr>
<td>EG.</td>
<td>30</td>
<td>171.16</td>
<td>5.34</td>
<td>0.717</td>
<td>2.00</td>
<td></td>
</tr>
</tbody>
</table>

3.4 Students Previous Year Degrees in English

Students’ achievement in the final exam of English during the previous academic year (2020-2021) has been reviewed and compared, as shown in the appendix (5). The mean scores value of the experimental group is (70.26) while that of the control group is (73.13) with standard deviations, (11.58) and (13.59), respectively. The calculated t-value is found to be (0.879) which is less than the tabulated value (2.00), at the degree of freedom (58) and (0.05) level of significance. This result indicates that there is no significant difference between the two groups in their previous achievement, as shown in table (7).

Table (7) Mean scores, standard deviations, and t-value for the Student’s Previous Year's degrees in English

<table>
<thead>
<tr>
<th>Groups</th>
<th>No. of students</th>
<th>Mean</th>
<th>SD.</th>
<th>T-Value</th>
<th>DF</th>
<th>Level of Significance</th>
</tr>
</thead>
<tbody>
<tr>
<td>CG.</td>
<td>30</td>
<td>73.13</td>
<td>13.59</td>
<td>Calculate</td>
<td>58</td>
<td>0.05</td>
</tr>
<tr>
<td>EG.</td>
<td>30</td>
<td>70.26</td>
<td>11.58</td>
<td>0.879</td>
<td>2.00</td>
<td></td>
</tr>
</tbody>
</table>

3.4.1. Students' Scores in the Pre-Test

The pre-test has been conducted for equalization. Both of the experimental and control groups are submitted to the same pre-test. The mean pre-test scores for the experimental group are (37.00), while the mean pre-test scores for the control group are (38.76), with standard deviations of (15.06) and (13.22), respectively, for the two groups. At the degree of freedom (58) and the level of significance (0.05), the calculated t-value is determined to be (0.483), which is smaller than the tabulated value (2.00). As indicated in the table, this result implies that there is no statistically significant difference between the two groups in the pre-test as shown in Table (8) below.
3.5. Instruction Material and Students' Instruction

3.5.1 Lesson plan for Experimental Group

Date: Sunday, November 16, 2021  
Class: second intermediate  
Topic: Implementing Grammatical Competence Strategies for Teaching Writing to Intermediate school student  

Aim: to develop writing in grammatical competence strategies  

Warm-up  

Steps of presenting the lesson material: in the development of writing. This stage is vital to effectively starting the lesson. This stage includes some activities that lead to the development of writing from the grammatical point of view. In this case, I present the lesson to the students using the strategies required to present the lesson which are deductive, inductive and interactive strategies and each strategy has its own mechanism where I divide the board into three sections which are:

Deductive strategy part: The teacher presents the lesson by providing a sufficient explanation of a rule, for example, about the present tense, as well as presenting its examples and everything related to this time so that the student can adequately and adequately understand the subject.  
Inductive strategy: here the teacher writes the topic title, for example, the present tense, where the students explain the rule of the present tense with giving examples and solving exercises and everything related to the topic.  
Interactive strategy: Here this strategy is done through the mutual participation between the teacher and the students.  

So deductive strategy is essentially a top-down approach which moves from the more general to the more specific. In other words, we start with a

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Table (8) The T-Test Value of the Two Groups in the Pre-test

<table>
<thead>
<tr>
<th>Groups</th>
<th>No. of students</th>
<th>Mean</th>
<th>SD.</th>
<th>T-Value</th>
<th>DF</th>
<th>Level of Significance</th>
</tr>
</thead>
<tbody>
<tr>
<td>CG.</td>
<td>30</td>
<td>38.76</td>
<td>13.22</td>
<td>Calculate</td>
<td>Tabulated</td>
<td>58</td>
</tr>
<tr>
<td>EG.</td>
<td>30</td>
<td>37.00</td>
<td>15.06</td>
<td>0.483</td>
<td>2.00</td>
<td>58</td>
</tr>
</tbody>
</table>


general notion or theory, which we then narrow down to specific hypotheses, which are then tested. Inductive reasoning is more of a bottom-up approach, moving from the more specific to the more general, in which we make specific observations, detect patterns, formulate hypotheses and draw conclusions.

3.5.2. Lesson Plan for Control Group
Date: Sunday, November 16, 2021
Class: Second Intermediate
Topic: Implementing Grammatical Competence Strategies for Teaching Writing to Intermediate school student.
Aim: to develop writing in grammatical competence strategies.

**Warm-up**

In writing development, a warm-up is a vital stage to start the lesson effectively. This stage includes some activities to enable students to develop writing from a grammatical point of view where the teacher explains the lesson in the same style as the subject teacher explains the material but without using the strategies used in the experimental group.

Where the teacher relies on the traditional method of explaining grammatical competence, where the teacher follows the following steps in explaining the rule of the simple present tense, where the teacher follows the following steps:
1. Whether in the traditional way or in the way of using strategies, the teacher must link the lesson to the previous lesson so that information overlap does not occur to the student.
2. The teacher writes the rule on the board
3. Explain the rule in a simple way with an example.
4. The teacher asks the students to write the rule written on the board with an example.
5. Giving students homework from the exercises in the activity book.

**3.6. Construction of the posttest**

An achievement posttest is constructed in terms of the contents and behavioral objectives of the instructional material. The first question branch (A) and the third question branch (A, B) measure students’ achievement at the recognition level, while the first question branch (B) and second question branch (A, B) and (4, 5) questions measures students' achievement at the production level, as shown in appendix (F).
3.8.1 Content Validity

Content validity is another aspect of validity. Davies (1968: 32) claims that content validity signalizes the notion between test content and curriculum objectives. Content validity is based on the degree to which a test sufficiently and effectively quantifies the exact skills and behavior that it plans to assess (Mousavi, 2009: 26).

The content analysis of the test items is based on Bloom’s Taxonomy of cognitive domains to state the behavioral objectives. The cognitive domain begins with the lower level of cognition and finishes with the higher level of cognition which is evaluation.

3.8.2 Face Validity

A test is said to be valid if it measures what it claims to measure (Al-Hamish and Younis, 1975:24). Heaton (1988:159) states that face validity is "the extent to which the test measures what is supposed to measure and nothing else." Face validity refers to the degree to which a test looks right and tests the knowledge and abilities it claims to test (Mousavi, 2009: 37-48). Hence, validity is the degree to which the test is truly measuring what it was designed to measure.

To ensure the face validity of the test, it has been exposed to a jury of specialists in the field of linguistics, methods of teaching English and English literature, as shown in the appendix (H). All the notes and modifications stated by jurors have been considered.

3.9 Pilot Administration of the Test

A pilot study refers to a preliminary study conducted with a sample out of the experiment sample to acquaint the researcher with any obstructions that may face during the test (Good and Merkel, 1973:143). The pilot study aims to allow the researcher to obtain information about how the instrument works and to specify the estimated time required to answer all the test questions or items. It also aims to find out the discrimination power and difficulty level of the test as well as to determine the clarity of the test instructions.

Therefore, the test has been conducted on fifteen students randomly selected from the two involved sections, i.e. (A) and (B). Results indicate that the time needed to answer all the test items ranges between 50-60 minutes and there is no ambiguity in the instructions of the given test.

3.10 Reliability of the Posttest

The reliability of a test is a critical characteristic of a good test. It is said that a test is trustworthy if the degree of accuracy of the exam is stable and consistent each time it is administered under the same conditions to the same sample of pupils (Veram and Beard, 1981:860).

One of the necessary characteristics of a good test is reliability. Alderson (1995:294) states that "reliability is the extent to which test scores are consistent".
According to Ravitch (2007:70-78), reliability is defined as "a measure of consistency in testing." A person who took two distinct versions of the same test on two different days should have received equal results on both tests, for example. Alpha-Cronbach formula is used to measure the reliability of the posttest. The coefficient is found to be (0.88), which refers to the homogeneity of the test questions.

3.11. Item Analyses

3.11.1. Difficulty Level

The difficulty level is specified as the ratio of the students who replied correctly to each item (Rosas, 2000:3).

Item difficulty refers to the extent to which an item appears to be complicated or facilitated for a given number of tests. It just reflects the percentage of learners who respond correctly to the object. The most suitable test item will have item difficulty varying between 0.15 and 0.85 (Brown, 2010:71). It was found that the current test items' DL ranges from (0.31) to (0.73), as shown in Table (9).

3.11.2. Discrimination Power

Discrimination power means "calculating the degree to which a particular item's results correspond with the results of the entire test" (Alderson, 1995:80).

This means that an object is deemed to have weak power of discrimination if it is correctly scored by high-skilled students as well as low-skilled students.

Item discrimination refers to the degree to which an object makes a difference between good and poor testers. An object has good power of discrimination if it collects the right answers from the good students and the wrong answers from the bad students. It is worth noting that the high power of discrimination will be close to 1.0, and no power of discrimination will be nil at all (Brown, 2010: 71). The results obtained indicate that the test item DP ranges from (0.25) - (0.67). The table below shows the test items in DP and DL:

<table>
<thead>
<tr>
<th>Q 2/ B</th>
<th>1</th>
<th>10</th>
<th>6</th>
<th>0.33</th>
</tr>
</thead>
<tbody>
<tr>
<td>2</td>
<td>10</td>
<td>6</td>
<td>0.43</td>
<td>0.33</td>
</tr>
<tr>
<td>3</td>
<td>8</td>
<td>5</td>
<td>0.56</td>
<td>0.25</td>
</tr>
<tr>
<td>4</td>
<td>8</td>
<td>4</td>
<td>0.68</td>
<td>0.33</td>
</tr>
<tr>
<td>5</td>
<td>8</td>
<td>4</td>
<td>0.57</td>
<td>0.33</td>
</tr>
</tbody>
</table>

Table (11) Difficulty level and Discrimination power of posttest item
<p>| | | | | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>3</td>
<td>10</td>
<td>4</td>
<td>0.45</td>
<td>0.50</td>
</tr>
<tr>
<td>4</td>
<td>8</td>
<td>4</td>
<td>0.69</td>
<td>0.33</td>
</tr>
<tr>
<td>5</td>
<td>8</td>
<td>2</td>
<td>0.42</td>
<td>0.50</td>
</tr>
<tr>
<td>Q 3/ A</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1</td>
<td>10</td>
<td>6</td>
<td>0.46</td>
<td>0.33</td>
</tr>
<tr>
<td>2</td>
<td>10</td>
<td>4</td>
<td>0.48</td>
<td>0.50</td>
</tr>
<tr>
<td>3</td>
<td>8</td>
<td>2</td>
<td>0.45</td>
<td>0.50</td>
</tr>
<tr>
<td>4</td>
<td>8</td>
<td>2</td>
<td>0.66</td>
<td>0.50</td>
</tr>
<tr>
<td>5</td>
<td>8</td>
<td>2</td>
<td>0.40</td>
<td>0.50</td>
</tr>
<tr>
<td>Q 3/ B</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1</td>
<td>10</td>
<td>6</td>
<td>0.45</td>
<td>0.33</td>
</tr>
<tr>
<td>2</td>
<td>10</td>
<td>6</td>
<td>0.43</td>
<td>0.33</td>
</tr>
<tr>
<td>3</td>
<td>10</td>
<td>6</td>
<td>0.53</td>
<td>0.33</td>
</tr>
<tr>
<td>4</td>
<td>8</td>
<td>4</td>
<td>0.37</td>
<td>0.33</td>
</tr>
<tr>
<td>5</td>
<td>8</td>
<td>2</td>
<td>0.33</td>
<td>0.50</td>
</tr>
<tr>
<td>Q 4</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1</td>
<td>22</td>
<td>12</td>
<td>0.56</td>
<td>0.42</td>
</tr>
<tr>
<td>2</td>
<td>20</td>
<td>12</td>
<td>0.33</td>
<td>0.33</td>
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<tr>
<td>3</td>
<td>20</td>
<td>12</td>
<td>0.37</td>
<td>0.33</td>
</tr>
<tr>
<td>4</td>
<td>24</td>
<td>8</td>
<td>0.31</td>
<td>0.67</td>
</tr>
<tr>
<td>5</td>
<td>16</td>
<td>8</td>
<td>0.45</td>
<td>0.33</td>
</tr>
<tr>
<td>Q 5</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1</td>
<td>118</td>
<td>80</td>
<td>0.37</td>
<td>0.32</td>
</tr>
</tbody>
</table>
Chapter Four

Analysis of Data and Discussion of Results

4.0 An Introductory Note

This chapter is dedicated to the statistical analysis of the collective that and the discussion of the results to verify the following hypotheses:

1. There is a significant difference between students' achievement at the recognition level and that at the production level and for the benefit of the production level.

4.1 Analysis of Data

Table (12) Means, Standard Deviation, and t-Values of the Two Groups In the Achievement Test

<table>
<thead>
<tr>
<th>Groups</th>
<th>No. of students</th>
<th>Mean</th>
<th>SD.</th>
<th>T-Value</th>
<th>DF</th>
<th>Level of Significance</th>
</tr>
</thead>
<tbody>
<tr>
<td>EG.</td>
<td>30</td>
<td>73.73</td>
<td>15.29</td>
<td>Calculated</td>
<td>58</td>
<td>0.05</td>
</tr>
<tr>
<td>CG.</td>
<td>30</td>
<td>61.86</td>
<td>16.05</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

4.1.2 The Second Hypothesis

Comparison between Students' Achievement at the Recognition Level and that at the Production Level

The mean scores of the student's achievements at the recognition level and that at the production level of the experimental group in the posttest are calculated and compared to find out whether there is any significant difference between them. The obtained results show that students' mean scores at the production level are found to be (38.16) and that at the recognition level is (35.56). The t-test formula for two paired samples is used and results show that the calculated t-value is (4.240) and the tabulated t-value is (2.04) at the degree of freedom (29) and level of significance (0.05), as shown in table (13).

This means that there is a significant difference between students' achievement at the recognition level and that at the production level and for the benefit of the production level. Therefore, the second hypothesis is accepted, as shown in table (13).

Table (13) Students’ Mean Scores, Standard Deviation, and T-Value of the Experimental Group Performance at the Recognition and Production Levels
<table>
<thead>
<tr>
<th>Group</th>
<th>No. of students</th>
<th>Mean</th>
<th>SD.</th>
<th>T-Value</th>
<th>DF</th>
<th>Level of Significance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Production</td>
<td>30</td>
<td>38.16</td>
<td>8.08</td>
<td>Calculated</td>
<td>29</td>
<td>0.05</td>
</tr>
<tr>
<td>Recognition</td>
<td>30</td>
<td>35.56</td>
<td>7.56</td>
<td>4.240</td>
<td>2.04</td>
<td></td>
</tr>
</tbody>
</table>

### 4.2 Discussion of Results:

The results obtained from the current study show that the achievement of the experimental group that was taught using grammatical competence strategies is better than that of the control group that was taught traditionally. This means that grammatical competence strategies are more effective in teaching English grammar (which leads to the development of students' writing), from the traditional method. The following factors may have contributed to the development of students' writing as a result of using grammatical competence strategies:

1. That there is any significant difference between the mean scores of the experimental group and that of the control group.
2. There is a significant difference between students' achievement at the recognition level and that at the production level and for the benefit of the production level.
3. There are statistically significant differences between the students' performance in the experimental in the pre-test and their performance in the post-test in favor of the grammatical competence strategy.

### Chapter Five

**Conclusions, Recommendations and Suggestions for further studies**

Since all three hypotheses are accepted, grammatical competence is required in the teaching of writing in Iraqi schools. Teaching grammatical competence requires highly skilled or competent teachers. It also needs to teach students how to develop writing through grammatical competence strategies (inductive, inductive, interactive).

Thus, it is suggested that much attention on the part of the government, along with resources, be directed towards improving teaching standards in Iraq.

According to the obtained results of the current study, the following points have been concluded:

1. The students of the experimental group who were taught through grammatical competence strategies got to learn more grammatical competence than the students of the control group who follow the traditional method of studying grammar.
2. Using these strategies, students can learn to write correct grammatical sentences.
3. Enabling students to understand grammatical competence in a clear and easy way.
4. It also increased the students' motivation and participation in the class.
5. Using the deductive strategy helps students explain the topic and give examples without the teacher's help.
6. Using these strategies enabled students to understand and analyze grammatical errors and also enabled students to write correct grammatical sentences.
7. Using the interactive strategy enables students to communicate with the teacher in the classroom directly, and they can also communicate with each other in addition to communicating with the teacher.
8. Using these strategies also enables students to use correct grammatical sentences about communicating with others not only in the classroom.

5.2 Recommendations

Regarding the conclusions of the results obtained, the following recommendations are made:

1. EFL teachers in general, and middle schools in particular, must be well trained in the use of grammatical competence strategies to develop students' writing.
2. As a teacher, he should always learn to understand students and upgrade their teaching skills to create the best generation in the future.
3. Teachers should encourage students to exchange ideas with each other during the lesson, or interaction between teacher and students, and this is the interactive strategy that creates a good interactive atmosphere in the classroom.

5.3 Suggestions for Further Studies

For further work, the following studies are suggested to investigate:

1. Using interactive, deductive, and inductive strategies in teaching English grammar.
2. The effect of using these strategies in teaching English in general and in developing oral communication between the teacher and students and between the students themselves in particular.
3. The effect of using these strategies on developing students' writing in a correct grammatical manner.
4. Motivating teachers to use these strategies in teaching English grammar in schools.

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