The Relationship between Self-Efficacy and Anxiety, and Preparatory-Year Students' Achievement in EFL

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Abstract :
The major purpose of this study was to investigate the relationship between self-efficacy and FL anxiety with the achievement of prep-year students at IAU. A sample of 151 participants volunteered for this study representing about 19% of the total population of the preparatory year students at Imam Abdulrahman Bin Faisal University - IAU. Both boys and girls completed two surveys, FL Self-Efficacy and FL Anxiety; validity and reliability were established for both measures. The results of the study showed that FL anxiety positively correlated with students' achievement and it may be used for predicting students' achievement (it explained 9.4% of students' achievement). But, self-efficacy failed to predict achievement in this study. It predicted only 6.7% of students' achievement and no correlation between self-efficacy and achievement existed at the significance level of α = 0.05.
العلاقة بين الكفاية الذاتية والقلق من اللغة الأجنبية والتحصيل لدى طلبة السنة التحضيرية

خليل شحادة القطاونة

ملخص

تهدف هذه الدراسة إلى استقصاء العلاقة بين الكفاية الذاتية والقلق من اللغة الأجنبية والتحصيل لدى عينة من طلبة السنة التحضيرية في جامعة الإمام عبدالرحمن بن فيصل، بلغ عددها 151 مستجيباً من الطلبة الذكور والإناث، وشكلت ما نسبته 19% من مجتمع الدراسة في الجامعة. تم تطبيق مقاييس الكفاية الذاتية والقلق من اللغة الإنجليزية كلغة أجنبية على عينة الدراسة بعد التحقق من الخصائص السيكومترية لأدوات الدراسة. بينت النتائج أن هناك علاقة ارتباطية دالة إحصائياً عند مستوى الدلالة (α = 0.01) بين قلق الطلبة من اللغة الإنجليزية وتحصيلهم، ويمكن التنبؤ بتحصيل الطلبة من خلال قياس درجة القلق في اللغة الأجنبية، حيث فسر القلق في هذه الدراسة ما نسبته 9.4% من تحصيل الطلبة. وفي المقابل، بينت النتائج أنه لا يمكن التنبؤ بتحصيل الطلبة من خلال الكفاية الذاتية، حيث فسرت الكفاية الذاتية مانسبته 6.7% فقط من التحصيل، وكانت العلاقة بين الكفاية الذاتية والتحصيل غير دالة إحصائياً عند مستوى الدلالة 0.05.
Introduction
Foreign language (FL) has long posed challenges to learners. At the time that some learners can find it as an easy subject, others struggle with it for years without significant gains and ultimately they end with frustration. In addition to other challenging variables related to curriculum and methodology, context, teachers' preparation programs, FL assessment, the emotional side of learners like self-efficacy and foreign language anxiety, are said to have an immediate influence on learners (Brown, 2007). Self-efficacy and FL anxiety, the target of this study, are major factors in determining whether or not learning a foreign language will happen.

Self-Efficacy
In addition to what learners know about what they really can accomplish of their plans, they also know what they are or are not capable to achieve. Bandura (1995:229) defines self-efficacy as the belief in learners' capabilities to organize and carry out the plans required to manage potential program. In this sense, learners are two categories: ones who will view foreign language challenging problems or tasks positively and will be more likely to be successful. As a result of this view, they will recover more quickly from any difficulties or drawbacks faced along the way. On the other side, learners who possess a weak sense of self-efficacy - those who believe that the FL language tasks are beyond their capabilities and, therefore, they avoid engagement and develop an attitude against FL learning (Gould, 2012:76-91).
A sense of self-efficacy is developed from previous experience. Learners who have a history of not succeeding in FL learning in school, they will tend to develop little confidence in their abilities to succeed in their preparatory-year or college life. By implication, Bandura (1995:29-51) suggests four strategies for increasing self-efficacy: (a) "Mastery Experiences" incorporates turning negative attitude into one of a positive nature by establishing a sort of relationship with learners and success in FL learning. Social Modeling is the second strategy for raising learners' self-efficacy; it
includes exposing learners to situations where others complete FL learners successfully. Thirdly, "Social Persuasion" which simply means giving verbal encouragement for FL learners. The last strategy Bandura points to is "Emotional Arousal" which literally means that phobia from language or anxiety decreases self-efficacy and confidence in language abilities increases self-efficacy.

Saif (2014) explored the relationship between self-efficacy, motivation and academic performance of undergraduate students at Taiz University. A positive correlation was detected between self-efficacy and intrinsic and extrinsic motivation and between self-efficacy and academic performance. Students with high scores of motivation and self-efficacy ratings performed better than their peers with low scores of motivation and self-efficacy.

The purpose of a study by Coronado-Aliegro (2006) was to investigate the effect of a continuous self-assessment on the self-efficacy of undergraduate students studying Spanish as a foreign language. Findings of the study revealed that students’ self-efficacy was improved significantly more with continuous self-assessment. Additionally, a positive correlation was detected between self-assessment and foreign language self-efficacy scores.

Bembenutty (2006) examined whether the association between teachers’ self-efficacy beliefs and academic performance is mediated by their homework’s self-efficacy beliefs and use of self-regulatory learning strategies. The findings revealed that teachers’ self-efficacy beliefs have an indirect effect on their academic performance mediated by their sense of efficacy belief regarding their capability to initiate and complete their homework assignments and their use of self-regulatory learning strategies.

Literature has so many scales used for measuring FL self-efficacy, but none was merely possible for this study due to the particularity of Saudi students' language and culture. Therefore, it was inevitable to design a new scale in Arabic for this end. Based on measures made by Tschannen-Moran and Hoy (2001), and Durndell, Haag, and Laithwaite (2000), an Arabic FL Self-Efficacy Scale (ASES), with high validity and reliability, was compiled, Arabized and adapted; it
was focused on doing homework and self-regulation of learning. A sample item was: “I believe that I have the skills to complete homework for this class. The format for all items in the survey was a 5-point scale ranging from 1 = none through 5 a great deal.

**Foreign Language Anxiety**

Another factor in determining whether or not learning will happen is learners' phobia from FL. It may provoke a discomfort feeling with various levels of intensity; the highest level may be represented in that learners defer or drop required FL courses and the lowest level may be shown in skipping classes, or not doing homework, or avoiding active participation in classes. Horwitz (2001) asserts that 75% of FL learners experience a level of anxiety in their FL learning life.

According to MacIntyre and Gardner (1994:80), FL Anxiety can be seen as the "feeling of tension and apprehension specifically associated with second language contexts, including speaking, listening. This actually goes with what Horwitz et al. (1986:31) conceived as "a distinct complex of perceptions, beliefs, feeling, and behaviors related to classroom language learning arising from the uniqueness of the language learning process". Overall, there seems a consensus between researchers on the concept of FL anxiety; it is seen as unique to the conditions of FL learning.

Horwitz et al. (1986) divides FL anxiety into three aspects of fear (1) in communication, (2) from negative social evaluation, (c) and from assessment. As their respective labels indicate, the communication fear arises from students' inability to express their original thoughts and ideas, but the fear from negative social evaluation is associated with students' needs to sign positive social impression on others. The third kind of FL anxiety refers to the students' fears from academic evaluation.

Kaim (2013) conducted a study to investigate the levels of the learners' self-efficacy beliefs and perceptions towards listening comprehension and demographic variables. The finding indicated that there was insignificant positive relationship between listening
comprehension self-efficacy beliefs and the demographic variables, except for proficiency level of students.

An interesting study made by Al-Saraj (2014), explored the experiences of female college students learning English as a Foreign Language in Saudi Arabia. The multi-method approach – including questionnaires, classroom observation with field notes, and individual and group interviews – revealed that teacher-student interactions and teacher behavior are anxiety-provoking factors among all participants, as well as others factors like beginning versus more advanced levels of study.

Similar findings are found out by Akbari and Sadeghi (2013) who administered a foreign language classroom anxiety scale to a randomly sample of 191 Iranian bilingual Kurdish-Persian non-English-major undergraduate students at a technical college in Iran. The findings revealed that bilingual learners experienced a comparatively high level of FL anxiety in the forms of communication anxiety, fear of negative evaluation, test anxiety, and anxiety in the EFL classroom environment.

In conclusion, it appeared that Saudi learners' fear from FL learning is associated with instructors and classroom interaction as well as from speaking (Koch and Terrel, 1991) and testing (Akbari and Sadeghi, 2013).

**Preparatory-Year Program**

Founded out in 2008 (1429AH), the Preparatory-Year Program at the Imam Abdulrahman Bin Faisal University (IAU), formerly known as University of Dammam (UOD), aims to prepare freshmen (first-year) students for college life through the rigors of academia, and define well their interests to a broad range of academic disciplines (see operational definitions). To this end, students must successfully complete the required courses during two terms and a following summer course.

The English language courses are compulsory and aim to further advance the proficiency of students moving into university. At the IAU, the English courses are offered in 22 contact hours including
two e-learning hours per week for a full academic year. While the general English courses focus on student’s communicative proficiency, the ESP covers specific academic register inevitable for academic purposes. Additionally, assessment tools including tests, quizzes, class discussions, and assignments--both face-to-face and online, are customized, validated and run progressively.

There are times when students express their discomfort from learning in English, though they wish to learn English for pragmatic reasons such as getting jobs easily. An increasing number of preparatory students were referred to the academic counseling clinics, special units founded to help low-scoring students in the campus; many of them reported that they would have achieved better if there were no English language courses.

This means that preparatory-year students fear English as a foreign language for psychological reasons rather than academic ones. Therefore, self-efficacy and anxiety are studied here in order to see their effects on students' achievement while learning English.

**Purpose of the study**
The major purpose of this study is to investigate the relationship between self-efficacy and EFL anxiety with the achievement of prep-year students at IAU.

**Statement of the problem**
The fears and wrong beliefs students develop against EFL may adversely impact students' achievement in English courses. This study attempted to address the impact of two major affective factors on students' achievement and to check which factor explained more students' reluctance of learning English language in the preparatory-year program.

**Research questions**
The study addressed the following questions:
1. Does students' self-efficacy correlate with their achievement in EFL?
2. Does students' FL anxiety correlate with their achievement in EFL?
3. Which factor (self-efficacy or FL anxiety) can predict students' achievement in EFL over and above the other?

**Significance**

In spite of the importance of the affective domain in learning a foreign language, self-efficacy and anxiety factors are ignored in the development of curriculum and instruction for foreign language students. Therefore, preparatory-year educators may find research evidence for a curriculum policy change or modification compatible with students' beliefs and fear from learning EFL. The findings of this study may stimulate educational decision-makers in PYPs in Saudi government universities and community colleges to make use of and promote a variety of procedures based on research findings.

**Operational definitions**

The following concepts and terminologies should be read and interpreted as defined below.

*Preparatory-Year Program* – referred to as PYP is a one-year college program (two mandatory semesters and one optional summer semester) commencing in the first year of the university program which aims to help freshmen students transition smoothly from the high school system to the university system and prepares them academically and psychologically for their prospective college majors and future careers.

*Achievement* – refers to the average scores the preparatory-year students obtained on the final achievement test used in this study.

*Self-efficacy* – refers to the average points the preparatory-year students score on the measure the study employed for the self-efficacy.

*FL anxiety* – refers to the average scores that the preparatory-year students obtained on the FL anxiety measure used in this study.
Methodology
The present study adopts a typical survey model to gather data from participants' experiences with English language during their preparatory-year program; particular focus is given to the role of students' affective domain as represented in FL Self-Efficacy and FL Anxiety and whether each factor correlated with students' achievement in EFL.

Sample
A sample of 151 participants volunteered for this study representing about 19% of the total population of the preparatory year students at the IAU. Both boys and girls participated in the study completed the two surveys, FL Self-Efficacy and FL Anxiety electronically. The software used is called Questionpro.com, which is online survey software that gives users a facility to obtain the feedback they need to make better decisions on their business. It has facilities for creating, distributing, and analyzing surveys along with a platform for polling, tablet-based mobile research, and data visualization (https://www.questionpro.com/info/aboutUs.html).

Instrumentation
As stated earlier, the present study made use of two surveys, the FL Self-Efficacy Survey (FLASES) and the FL Anxiety Survey (FLAAS).

1. Based on surveys prepared by Tschannen-Moran and Hoy (2001), and Durndell, Haag, and Laithwaite (2000), an Arabic FL Self-Efficacy Scale (FLASES was compiled, translated into Arabic and applied; it included 20 items focusing on students' feeling while doing their FL homework and self-regulation. A sample item was: “I believe that I have the skills to complete homework for this class. The format for all items in the survey was a 5-point scale, ranging from 1 = never through 5 = always. The purpose of FLASES survey was to collect information on students' beliefs towards FL learning in the preparatory year program.
To establish validity for the FLASES, it was given to a number of college professors and educational experts for validation; each referee was asked to comment on the appropriateness, affiliation, and clarity of the 20 items of the scale. The survey was regulated to the reviewers' feedback and supported with an example for guiding the participants in how to complete the survey. Reliability (0.94) was established using Cronbach alpha. Then, the survey was published by QuestionPro.com and a link was sent by e-mail and SMS message to students for completion as per instructions.

2. The FL Anxiety scale was based on Horwitz and Cope (1986), FLCAS, a 33-item survey, designed to obtain student's feelings while learning a foreign language. The FLCAS was translated first into Arabic and reviewed in its Arabic form by a language editor and an experienced translator. The Arabic version, then, was regulated by reviewers' feedback and applied on a group of students outside the sample for more validity. Reliability (0.87) was achieved by Cronbach alpha. The respondents were requested to rate each statement using a five-point Likert scale ranging from "strongly agree" to "strongly disagree".

3. Achievement Test is a 60-item test prepared by a special committee for testing student's proficiency in English. It includes 35 multiple choice questions, and 25 yes/no questions. The general procedure in the final test preparation began with asking all teaching staff to provide the committee with draft questions covering the content. Often, the final version is returned to all teaching staff for proofreading and validation. After the process completed, four copies (A, B, C, and D) are prepared of the final test, duplicated, and given to the students on the day of the test. Later, the answer sheets are collected and inserted into a special marking machine for correction.

Data Analysis and findings
The present study investigated two main affective factors affecting PY students' achievement – students' beliefs about foreign language (self-efficacy) and students' anxiety of using EFL for academic purposes. Thus, students' scores on the measures of FL self-efficacy
and FL anxiety and on the achievement test were collected and tabulated and Pearson Coefficients were calculated as appropriate.

**Table 1 Correlation between FL Self efficacy and achievement for Preparatory-Year Students**

<table>
<thead>
<tr>
<th>Measure</th>
<th>Self-efficacy</th>
<th>Achievement</th>
</tr>
</thead>
<tbody>
<tr>
<td>Self-efficacy</td>
<td>Pearson correlation</td>
<td>0.264 **</td>
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<tr>
<td></td>
<td>sig. (2-tailed)</td>
<td>0.001 **</td>
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<td></td>
<td>N.</td>
<td>151</td>
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</tbody>
</table>

**Correlation is significant at the 0.01 level (2-tailed).**

Table 1 shows that Pearson correlation is 0.264 and is significant at α = 0.001 between self-efficacy and achievement for PY students. This means that Self-efficacy correlates with students' achievement.

**Table 2 shows correlation between FL phobia and achievement for Preparatory Year Students**

<table>
<thead>
<tr>
<th>Measure</th>
<th>Anxiety</th>
<th>Achievement</th>
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<tbody>
<tr>
<td>Anxiety</td>
<td>Pearson correlation</td>
<td>0.307 **</td>
</tr>
<tr>
<td></td>
<td>sig. (2-tailed)</td>
<td>0.001 **</td>
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</tbody>
</table>

**Correlation is significant at the 0.01 level (2-tailed).**

As indicated in Table 2, Pearson correlation is 0.307 and is significant at α = 0.01 between FL anxiety and achievement for PY students. This means that FL anxiety correlates with students' achievement. To check which factor can predict students' achievement more, stepwise analysis test was performed. Table 3 shows the findings.
Table 3. Stepwise Analysis Results for anxiety, self-efficacy and achievement

<table>
<thead>
<tr>
<th>Model</th>
<th>Coef.</th>
<th>Constant - Squared</th>
<th>F value</th>
<th>Sig.</th>
<th>Regression</th>
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<td>T value</td>
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<td>Sig.</td>
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<td></td>
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<td></td>
<td></td>
<td></td>
<td>Constant</td>
</tr>
<tr>
<td>Anxiety</td>
<td>0.307</td>
<td>0.094</td>
<td>15.47</td>
<td>0.00</td>
<td>4.41</td>
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<td>3.93</td>
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<td>0.00</td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td>15.32</td>
</tr>
<tr>
<td>Self-efficacy</td>
<td>0.26</td>
<td>0.067</td>
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<td></td>
<td></td>
<td>0.898</td>
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<td>0.37</td>
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</table>

As indicated in Table 3, Pearson coefficient for self-efficacy and achievement is not statistically significant. Coefficient is 0.26 and coefficient squared is 0.067. T-value is 0.898 which is statistically insignificant indicating that self-efficacy did not correlate with students' achievement; it predicted only 67% of students' achievement.

On the other hand, the achievement regression model is statistically significant at $\alpha=0.05$. Coefficient for achievement and FL anxiety is 0.307 and coefficient-squared was 0.094. F-value is 15.47. Regression coefficient 4.41 and T is 3.93 which is statistically significant at $\alpha=0.05$ with a coefficient regression 15.32. This means that student's achievement can be predicted by students' anxiety from learning English language.

**Discussion**

As indicated in Table 1-3, students' self-efficacy correlates with students' achievement. Pearson Coefficients is 0.264 at the level of $\alpha=0.01$. This means that Saudi PY students' achievement varies by students' beliefs on foreign language learning. Specifically, Saudi students – coming from high school with a belief that they were able to learn EFL or use EFL in learning other subject like communication skills, biology, mathematics … etc. in the PY program - they completed their homework in the PY program (English courses) successfully. It also, means that students who really believe in their capabilities, they consciously control on the speed, and time in which they complete their learning activities, proceed to complete tasks when facing difficulties and enjoy doing their homework or classroom
activities. On the other hand, this finding means that students who joined the PY program with previous negative experiences with the EFL in school, s/he may avoid doing his/her homework and classroom activities. This finding concurs with the study conducted by Coronado-Aliegro (2006) which found a positive correlation between students' self-efficacy and self-assessment. This finding also goes with the finding gained by a study made by Al-Saif (2014), which concluded that students who possess high levels of motivation and self-efficacy ratings do better than their peers with low levels of motivation and self-efficacy.

On the other hand, this finding is not compatible with the finding obtained by Bembenutty (2006) which detected no correlation between teachers' self-efficacy scores and academic performance. This is perhaps because of the difference of experience between the participants of that study (teachers) and ours (students); teachers' experiences, of course, exceed students, and, therefore, it is not easy that teachers change their attitudes with or against language learning.

Tables 2 and 3 showed that FL anxiety correlates with PY students' achievement and it explains about 94% of it. This means that Saudi PY students' achievement varies by their concerns and fears from English as a foreign language. Specifically, Saudi students – who have just come from high school – fear interaction with their teachers. Perhaps this is due to the fact that most teachers/professors are native speakers of English and that poses threat to students to start formal or informal conversation with them. Another reason for this result is the unfamiliarity of the PY students with each other's in their first year; often students joining college come from different parts of Saudi Arabia.

This result actually goes with a study conducted on Saudi female students by Al-Saraj (2014), who found that interaction with teachers and student-student interaction in English are major sources for students' anxiety. In the same context, the researcher found that it takes Saudi students two months into the semester to mingle. In my
classroom, Saudi male students do not tend to mingle until a mixed-learning group technique is introduced.

**Recommendations**

In view of the results obtained in this study and related studies, the following recommendations are offered. Firstly, teachers of English as a foreign language should be aware of the impact of the FL anxiety on their students' state of learning; student-teacher interaction has been presented as a source of anxiety to Arab students learning English. Secondly, teachers should pay attention to psychological factors that come into interplay with students' learning a foreign language; students' view of their inability to do their homework, for example, can be attributed to affective reasons rather than academic ones. Here comes the concept of self-efficacy.

All in all, feelings of inability and poor achievement of learning English as a foreign language are heavily influenced by psychological factors such as FL anxiety and self-efficacy.

However, the results of this study should be interpreted carefully. The study was conducted on a limited number of participants, 151 adult students. Additionally, results cannot be generalized beyond the scope of PYPs.

**References**


https://www.journals.elsevier.com/computers-in-human-behavior