

Iranian Journal of Learning and Memory 2021, 4(14), 57-70

A Study of Motivation, Self-Efficacy Beliefs and Feelings as Psychological Factors Among Iranian Non-English PhD Students in EPT

Mahbubeh Rezaeian, Ph.D. Candidate Seyyed Hassan Seyyedrezaei*, Ph.D.

Zari Sadat Seyyedrezaei, Ph.D.

Department of English Language Teaching, Aliabad Katoul Branch, Islamic Azad University, Aliabad Katoul, Iran

Abstract

Affective considerations in language testing have occupied an outstanding place in education (Shohamy, 1982). Despite the importance of this issue, it appears that the test-takers' perceptions regarding motivation, self-efficacy beliefs and feelings in addition to their possible relationships have not been investigated in much detail. To narrow the gap, the primary aims of this paper were to explore Iranian non-English PhD students' perceptions about motivation, self-efficacy beliefs and feelings. This paper also sought to investigate the association between motivation and self-efficacy beliefs, motivation and feelings, as well as self-efficacy beliefs and feelings. To collect the data, a Persian researcher-made questionnaire entitled "psychological consequences questionnaire" constructed and validated by Rezaeian, Seyyedrezaei, Barani, and Seyyedrezaei, (2020) was utilized. To ensure reliability, a pilot study was conducted on 60 participants; subsequently, the questionnaire was distributed among 252 students throughout Iran by online administration. The results of descriptive statistics using SPSS displayed that participants were intrinsically motivated to be prepared for this English Proficiency Test (EPT). Furthermore, participants showed the low level of self-efficacy beliefs towards their achievement in the test with high level of motivation. The results also illustrated a high amount of stress, test anxiety, hopeless, nervousness, families' stress or tension, amotivation as well as university dropout rate among participants. Spearman results confirmed that there was a significant correlation between motivation and self-efficacy beliefs, motivation and feelings, in addition to self-efficacy beliefs and feelings. Finally, the results were discussed and implications of the study were presented.

Keywords: English Proficiency Test (EPT), Feelings, Motivation, Psychological Factors, Self-Efficacy Beliefs

Introduction

Several definitions of motivation have been proposed by different authors. As an example, Gardner (1985) describes L2 motivation as the degree to which a person works or endeavours to learn the language due to an inclination to do so and the pleasure or satisfaction achieved in this action. A further definition is given by Dörnyei (2005) who expresses motivation can provide the crucial movement to start 12 learning and subsequently the powerful force to maintain the lengthy and monotonous learning procedure. If it is acknowledged that L2 learning is chiefly a socialpsychological event, it is merely natural that socialpsychological variables should be given central attention (Au, 1988). Social psychology can be defined as an investigation of individuals in their communications with one another and with regards to the impacts of this interaction on the person's attitudes, thoughts, habits and emotion (Young, 2016). Meanwhile, for Dörnyei and Ushioda (2011), motivation is responsible for individuals' decisions, their willingness to continue, and their determination to pursue the activity.

One of the most recognized differences in motivation theories is that of intrinsic against extrinsic motivation which is supported by self-determination theory (Ryan & Deci, 2000a). SDT is viewed as an approach to human incentive and character that employ conventional empirical ways that emphasizes the significance of

* Corresponding Author Email: srezaei.sh@gmail.com individuals' evolved internal sources for personality growth and behavioural self-regulation (Ryan, Kuhl, & Deci, 1997). Intrinsic motivation refers to the willingness to accomplish an activity since it is attractive and enjoyable (Khajavy, Ghonsooly, Hosseini Fatemi & Choi, 2014). Interestingly, students with intrinsic motivation are more inclined to stay with complicated problems and try to gain knowledge from their mistakes (Dörnyei & Ushioda, 2011; Walker, Greene, & Mansell, 2006). While, extrinsic motivation is a type of motivation that persuades individuals to do activities to attain a goal or to receive an extrinsic reward (Dörnyei & Ushioda, 2011; Khajavy et al., 2014). In fact, extrinsic motivation has been extensively considered as a nonautonomous factor (Ryan & Deci, 2000a).

As suggested by Buyukkeles (2016), there is a dearth of research on the correlation between washback and language learning motivation to provide precious insight whether and how tests have influence on learners' behaviors towards learning English. One of the wellknown comparative washback study undertaken by Cheng (1998) showed that the new public examination in Hong Kong did not have serious washback on students' learning because students mentioned that there was no considerable change in their motivation towards learning English; moreover, they reported that their learning strategies remain fundamentally steady. A test may strengthen student's motivation mostly for extrinsic purposes if it has been planned to function as a lever or force to change students' behaviors towards learning (Buyukkeles, 2016).

The heyday of the influence of testing on motivation backs to Black and Wiliam's research in 1998. Based on their study, formative assessment can considerably increase standards of achievement while summative assessment not only hinder the practice of formative assessment but also has harmful and negative effects on motivation for learning. A study conducted by Kellaghant, Madausg, and Raczek in 1996 (as cited in Harlen & Deakin-Crick, 2003) revealed the interaction of diverse aspects of motivation with a variety of personal features; that is, what motivates and encourages some students might alienate other ones. They came to the conclusion that students who were motivated through external exams were more expected to have performance aims rather than learning goals and these students were shallow learners since they used a great deal of rote learning, with comparison to those with learning purposes.

Additionally, a study conducted by Deci and Ryan (1985) showed that summative assessment lessens intrinsic motivation and can lead to surface learning rather than deep learning. According to Madaus and Clarke's study (1999) on high-stakes testing, these tests

do not have a noticeably positive impact on learning as well as teaching in the classroom. Moreover, high-stakes tests cannot motivate the unmotivated students and may lead to increasing the rate of high school dropout. Several studies have been published on motivation such as Bravo, Intriago, Holguín, Garzon, and Arcia (2017); Chan (2016); Conttia (2007); Kelly (2014); Lamb (2009); Little, Ridley, and Ushioda (2003); Ushioda (2011); Ushioda and Dörnyei (2009) just to name a few. To date, it seems that there is a relatively small body of literature that is concerned with motivation in language testing.

As stated earlier, Shohamy (1982) believesd that affective considerations play vital roles both in language testing and language learning. Carroll (as cited in Shohamy, 1982) maintains that a positive testing experience can improve students' eagerness to continue and persist; whereas a test that enhances anxiety can restrict perseverance and hinder growth or progress. Tests are also acknowledged to influence not only the curriculum (what is being taught and learned), but also student's learning habits. Accordingly, it appears that measurement yardsticks are essential but not enough to assess the usefulness of tests and some important variables as motivation, attitudes and anxiety towards the testing experience should be studied (Shohamy, 1982). Ahmadjavaheri and Zeraatpishe (2020) also state that test performance can be affected via the differences in individual features such as gender, background knowledge, age, cultural background, cognitive characteristics, and test anxiety which make the test score interpretation invalid. Lastly, Mikami, Leung, and Yoshikawa (2018) stressed that psychological studies acknowledge the anxiety performance can interface in high-stakes tests. In fact, they believe that psychological factors like motivation, confidence, attitude, selfefficacy and self-esteem are considered as some indispensible parts of learning a second or foreign language and it is even possible that these affective factors are greater in second language testing circumstances.

Self-efficacy is defined as an individual's judgment of his or her capabilities in order to complete a particular task with his or her skills (Bandura, 1997). According to him, self-efficacy beliefs are derived from varied sources and physiological situation is one of them. Based on Stevens, Olivarez, Lan, and Tallent-Runnels (2004), extremely efficacious learners generally meet more challenges, are more determined, and more responsible whereas students who are lowly efficacious are more eager to avoid intricate tasks. Prior studies specify that self-efficacy is able to predict students' academic achievement (Shih & Alexander, 2000). Selfefficacy beliefs have an indirect effect on the English language test scores (Zimmerman & Kitsantas, 2005). Hence, increasing English language students' selfefficacy beliefs is essential to their language learning process (Wang, Schwab, Fenn, & Chang, 2013). Lastly, self-efficacy beliefs impact the choices students make and the amount of their effort to perform a task (Boekaerts & Cascallar, 2006) and it is considered as a motivational factor in learning so it seems roughly impossible to study various aspects of individuals' functions like learning, academic performance as well as motivation without considering the role of self-efficacy beliefs (Pajares & Urdan, 2006).

Nowadays, loads of higher education institutes over the world employ standardized English proficiency tests to evaluate learning outcomes, teaching effectiveness and achieve required educational changes (Hung & Huang, 2019). The fact that EPT as a standardized English proficiency test brings several psychological consequences for its participants cannot be over-looked by the researchers in Iran. EPT is an English proficiency test which is conducted through the Ministry of Science, Research, and Technology every month in a range of authorized centers in Iran. EPT is considered as an exit test which is obligatory for the PhD candidates of Islamic Azad universities to pass it in order to defend. Furthermore, EPT is considered as a high-stakes test because a sole test score is utilized as the chief factor in determining substantial educational decisions (Menken, 2017). More specifically, EPT consists of three diverse parts including vocabulary (25 questions in multiplechoice format), grammar (40 questions in multiplechoice and error correction formats) and reading comprehension (35 questions in multiple-choice and cloze test formats) in which test-takers are given 140 minutes to answer all of the questions.

With regard to the importance of above-mentioned issues, this study makes effort to give voice to Iranian Non-English PhD students as marginalized stakeholders in EPT by means of presenting their perceptions since it is essential to study how test-takers evaluate testing events, and how their experiences might be contributed to test validity (Cheng & DeLuca, 2011). Additionally, the possibility that motivation, self- efficacy beliefs and feelings may play significant roles in language testing has not given sufficient consideration at least in an Iranian context. The research is also expected to provide a profound understanding of some psychological concepts in high-stakes testing. To fill the gap, the current study is guided by the subsequent research questions:

- **1.** What are Iranian non-English PhD students' perceptions toward motivation as psychological consequence of EPT?
- **2.** What are Iranian non-English PhD students' perceptions toward self-efficacy beliefs as psychological consequences of EPT?
- **3.** What are Iranian non-English PhD students' perceptions toward feelings as psychological consequences of EPT?
- **4.** Is there any significant association between motivation and self-efficacy beliefs of Iranian non-English PhD students as psychological consequences of EPT?
- **5.** Is there any significant association between motivation and feelings of Iranian non-English PhD students as psychological consequences of EPT?
- 6. Is there any significant association between selfefficacy beliefs and feelings of Iranian non-English PhD students as psychological consequences of EPT?

Accordingly, the following hypotheses were formulated as follows:

H1: There is not any significant association between motivation and self-efficacy beliefs of Iranian non-English PhD students as psychological consequences of EPT.

H2: There is not any significant association between motivation and feelings of Iranian non-English PhD students as psychological consequences of EPT.

H3: There is not any significant association between self-efficacy beliefs and feelings of Iranian non-English PhD students as psychological consequences of EPT.

Method

Participants

A total number of 252 Iranian non-English PhD students from different Islamic Azad universities throughout Iran took part in this research based on convenience sampling. The demographic information is presented in the following table and figure.

Table 1.

Distribution of Participants By Gender

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Male	139	55.2	55.2	55.2
	Female	113	44.8	44.8	100.0
	Total	252	100.0	100.0	

Instruments

Psychological Consequences Questionnaire (PCQ). In order to address the research questions, an attitudinal researcher-made questionnaire entitled "psychological consequences questionnaire" constructed and validated (in Persian) by Rezaeian et al. (2020) at likert scale from 1-5 (strongly disagree to strongly agree) with four constructs including self-efficacy beliefs (questions 1-3), feelings (questions 4- 9), intrinsic motivation (questions 10- 13) as well as extrinsic motivation (questions 14- 15). The reliability of the scale was estimated as .89 through Cronbach's alpha with the sample study. The second part was designed to seek demographic information from participants such as their age and gender for possible further analyses (See appendix I).

Procedure

As mentioned above, initially, an attitudinal researchermade questionnaire entitled "psychological consequences questionnaire" developed and validated

Table 2.

Normality Tests

(in Persian) to achieve the purposes of the study through reviewing the related literature, analyzing experts' opinions, documents, interviews and conducting a number of statistical procedures including Exploratory Factor Analysis (EFA) and Confirmatory Factor Analysis (CFA). Piloting was carried out with 60 samples who were similar to the target participants to ensure the reliability. After that, 252 Iranian non-English PhD students from different Islamic Azad universities completed the final researcher-made questionnaire via online administration throughout Iran. To analyze the data and answer the descriptive as well as correlational research questions, SPSS, version 24 was used in the current study.

Findings

To conduct further statistical analyses, Kolmogorov-Smirnov (KS) Test and Shapiro-Wilk were used to ensure the normality of data. As shown in Table 2, since α values of both KS and Shapiro-Wilk tests are less than .05; therefore, the distribution of the data is not normal and nonparametric tests will be utilized for further analysis.

	Kolmogorov-Smirnov ^a			Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
PCQ	.041	252	.200	.975	252	.000

Note. PCQ = Psychological Consequences Questionnaire

Research Question One

What are Iranian non-English PhD students' perceptions toward motivation as psychological consequence of EPT? The results obtained from descriptive statistics of intrinsic and extrinsic motivation demonstrate that mean score of intrinsic motivation (13.94) is twice as much as the extrinsic motivation (6.60) which means that majority of participants agree and strongly agree that they are intrinsically motivated for preparing in the test.

Table 3.

Descriptive Statistics of Intrinsic and Extrinsic Motivation

	Ν	Minimum	Maximum	Mean	SD	Skewness		Kurtosis	
	Statistic	Statistic	Statistic	Statistic	Statistic	Statistic	Std. Error	Statistic	Std. Error
IM	252	4.00	20.00	13.9405	4.73442	134	.153	-1.222	.306
EM	252	2.00	10.00	6.6032	2.13519	017	.153	703	.306
Valid N	252								
(listwise)									

Note. IN= Intrinsic Motivation; EM= Extrinsic Motivation

Further Analyses of Research Question One

Table 4 displays that around 52 percent of participants

agree and strongly agree that preparing for EPT increases their interest in studying English.

Table 4.

Frequency Distribution Table of Intrinsic Motivation (Item One)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	9	3.6	3.6	3.6
	Disagree	71	28.2	28.2	31.7
	Neutral	38	15.1	15.1	46.8
	Agree	57	22.6	22.6	69.4
	Strongly Agree	77	30.6	30.6	100.0
	Total	252	100.0	100.0	

As illustrated in the following table, a total of 141 out of 252 agree and strongly agree that preparing for this test

makes the learning process enjoyable for them.

Table 5.

Frequency Distribution Table of Intrinsic Motivation (Item Two)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	11	4.4	4.4	4.4
	Disagree	59	23.4	23.4	27.8
	Neutral	41	16.3	16.3	44.0
	Agree	54	21.4	21.4	65.5
	Strongly Agree	87	34.5	34.5	100.0
	Total	252	100.0	100.0	

Based on the subsequent frequency distribution table, 49.6 percent of participants agree and strongly agree that

to be prepared for this test will make them aware of the value of learning English.

Table 6.

Frequency Distribution Table of Intrinsic Motivation (Item Three)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	16	6.3	6.3	6.3
	Disagree	77	30.6	30.6	36.9
	Neutral	34	13.5	13.5	50.4
	Agree	50	19.8	19.8	70.2
	Strongly Agree	75	29.8	29.8	100.0
	Total	252	100.0	100.0	

Table 7 shows that a total of 134 participants believe that preparing for EPT gives them inner satisfaction.

Table 7.

Frequency Distribution of Intrinsic Motivation (Item Four)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	11	4.4	4.4	4.4
	Disagree	68	27.0	27.0	31.3
	Neutral	39	15.5	15.5	46.8
	Agree	49	19.4	19.4	66.3
	Strongly Agree	85	33.7	33.7	100.0
	Total	252	100.0	100.0	

The analysis of extrinsic motivation item one also displays that 125 individuals agree and strongly agree

that they want to pass this exam to get a job promotion (Table 8).

Table 8.

Frequency Distribution Table of Extrinsic Motivation (Item One)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	32	12.7	12.7	12.7
	Disagree	50	19.8	19.8	32.5
	Neutral	45	17.9	17.9	50.4
	Agree	62	24.6	24.6	75.0
	Strongly Agree	63	25.0	25.0	100.0
	Total	252	100.0	100.0	

A total of 112 participants assume that making differentiation among test-takers based on the results of

EPT will increase their motivation to study (Table 9).

Table 9.

Frequency Distribution Table of Extrinsic Motivation (Item Two)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	20	7.9	7.9	7.9
	Disagree	53	21.0	21.0	29.0
	Neutral	67	26.6	26.6	55.6
	Agree	53	21.0	21.0	76.6
	Strongly Agree	59	23.4	23.4	100.0
	Total	252	100.0	100.0	

Research Question Two

What are Iranian non-English PhD students' perceptions toward self-efficacy beliefs as psychological

consequences of EPT? As illustrated in Table 10, descriptive statistics of self- efficacy beliefs clarify that a total of 151 participants believe that they do not have the ability to pass this test.

Table 10.

Frequency Distribution Table of Self- Efficacy Beliefs (Item One)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	46	18.3	18.3	18.3
	Disagree	105	41.7	41.7	59.9
	Neutral	30	11.9	11.9	71.8
	Agree	37	14.7	14.7	86.5
	Strongly Agree	34	13.5	13.5	100.0
	Total	252	100.0	100.0	

According to Table 11, 75.8 percent of participants disagree and strongly disagree that they cannot improve

their English with more effort.

Table 11.

Frequency Distribution Table of Self- Efficacy Beliefs (Item Two)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	55	21.8	21.8	21.8
	Disagree	136	54.0	54.0	75.8
	Neutral	22	8.7	8.7	84.5
	Agree	16	6.3	6.3	90.9
	Strongly Agree	23	9.1	9.1	100.0
	Total	252	100.0	100.0	

With regards to the next table, 117 participants out of 252 assert that learning English is not easy for them.

Table 12.

Frequency Distribution Table of Self- Efficacy Beliefs (Item Three)

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	28	11.1	11.1	11.1
	Disagree	89	35.3	35.3	46.4
	Neutral	33	13.1	13.1	59.5
	Agree	66	26.2	26.2	85.7
	Strongly Agree	36	14.3	14.3	100.0
	Total	252	100.0	100.0	

Research Question Three

What are Iranian non-English PhD students' perceptions toward feelings as psychological consequences of EPT? According to Table 13, item 5 (the difficulty of preparing for this test will destroy my motivation to study English in the future) hits the first place with the mean sore 2.33. Item 3 (the result of this test makes me nervous / aggressive), item 4 (this test has caused stress and tension in my family), item 6 (this test makes students think of dropping out), item two (the result of this test makes me feel hopeless) and item one (this test increases my stress and anxiety) have taken the second, third, fourth, fifth and sixth places with mean sores 2.19, 2.15, 2.05, 2.04 and 1.88 respectively.

Table 13.

Descriptive Statistics of Feelings' Items

	Item 1	Item2	Item3	Item4	Item5	Item6
N Valid	252	252	252	252	252	252
Missing	0	0	0	0	0	0
Mean	1.8849	2.0476	2.1984	2.1508	2.3373	2.0595
Median	2.0000	2.0000	2.0000	2.0000	2.0000	2.0000
Mode	1.00	1.00	1.00	1.00	1.00	1.00
Std. Deviation	1.13204	1.16289	1.22080	1.22762	1.24704	1.18776
Variance	1.282	1.352	1.490	1.507	1.555	1.411
Skewness	1.341	.933	.701	.907	.605	.905
Std. Error of Skewnes	s .153	.153	.153	.153	.153	.153
Kurtosis	.975	114	576	176	696	220
Std. Error of Kurtosis	.306	.306	.306	.306	.306	.306
Range	4.00	4.00	4.00	4.00	4.00	4.00
Minimum	1.00	1.00	1.00	1.00	1.00	1.00
Maximum	5.00	5.00	5.00	5.00	5.00	5.00

Research Question Four

Is there any significant association between motivation and self-efficacy beliefs of Iranian non-English PhD

students as psychological consequences of EPT? As Table 14 displays, motivation and self-efficacy beliefs are significantly and positively correlated to each other (r=.493, n=252, p=.000).

Table 14.

Correlations between Motivation and Self-Efficacy Beliefs

			SEB	Μ
Spearman's rho	SEB	Correlation Coefficient	1.000	.493**
		Sig. (2-tailed)		.000
		Ν	252	252
	Μ	Correlation Coefficient	.493**	1.000
		Sig. (2-tailed)	.000	
		Ν	252	252

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

Note. M= Motivation; SEB= Self-Efficacy Beliefs

Research Question Five

Is there any significant association between motivation and feelings of Iranian non-English PhD students as psychological consequences of EPT? Considering Table 15, motivation and feelings are negatively associated to each other (r=-.563, n=252, p=.000).

Table 15.

Correlations between Motivation and Feelings

			Motivation	Feelings
Spearman's rho	Motivation	Correlation Coefficient	1.000	563**
		Sig. (2-tailed)		.000
		Ν	252	252
	Feelings	Correlation Coefficient	563**	1.000
		Sig. (2-tailed)	.000	
		Ν	252	252

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

Research Question Six

Is there any significant association between self-efficacy beliefs and feelings of Iranian non-English PhD students

as psychological consequences of EPT? The subsequent table shows that there is significant and negative connection between self-efficacy beliefs and feelings.

Table 16.

Correlations between Self-Efficacy Beliefs and Feelings

			Self-Efficacy Beliefs	Feelings
Spearman's Rho	Self-Efficacy Beliefs	Correlation Coefficient	1.000	482**
		Sig. (2-tailed)		.000
		Ν	252	252
	Feelings	Correlation Coefficient	482**	1.000
		Sig. (2-tailed)	.000	
		Ν	252	252

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

Discussion

The primary aim of the present inquiry was to uncover Iranian non-English PhD students' perceptions toward motivation as psychological consequence of EPT. The results manifested that participants were intrinsically motivated to study for the test. As Salehpour and Roohani (2020) assert intrinsically motivated learners have sense of self-satisfaction and deep-rooted interest in learning. Ellis (1994) also affirms that the best and the ideal motivation is the intrinsic or integrative motivation since it is more well-organized and efficient. In fact, intrinsic motivation makes the learners to think that whether learning a particular issue is worth making effort or not. In other words, if the learners come to the conclusion that learning is worthless, they become frustrated and may give up learning (Mahadi & Jafari, 2012). The result was in contrary to Buyukkeles (2016); Deci and Ryan (1985) in addition to Pan and Newfields (2013) since based on their studies, a test reinforced students' extrinsic motivation, whereas, no evidence could confirm the washback on learners' intrinsic motivation.

The outcomes of the second research question specified that most of the participants had low selfefficacy and assumed that they were not able to pass the exam or could not improve their English with even more effort. This is of substantial significance for educators in that more efficacious students are able to engage in accomplishing a task; for that reason, they can achieve higher score with comparison to learners with low selfefficacy (Alay & Safaria, 2013; Pajares & Urdan, 2006) and greatly self-efficacious learners are highly motivated to perform well in their tasks and illustrate pleasant learning features such as making further effort (Woodrow, 2011). Additionally, taking thinking and feeling into account, a powerful sense of competence smoothes the cognitive processes along with performance in various settings; while, a low level of efficacy is linked with anxiety, depression, hopelessness, pessimism and helplessness (Alay & Safaria, 2013).

Considering the third research question, non-English PhD students perceive that the difficulty of preparing for this test will destroy their motivation to study English in the future which is related to amotivation introduced by Deci and Ryan (1985) as a third construct in SDT. Amotivation can be defined as a decline in starting and persisting in accomplishing goal-directed activities and the reluctance to perform the activities (Strauss & Cohen, 2017). In fact, people are amotivated when they are neither extrinsically nor intrinsically motivated to take an action. Amotivated individuals are less selfdetermined with comparison to others since they are not purposeful, expected to receive any reward or optimistic to the possibility of changing (Vallerand & Blssonnette, 1992).

The forth research question displayed that motivation and self-efficacy beliefs of Iranian non-English PhD students in EPT were significantly associated to each other in a positive way. Throughout the past two decades, self-efficacy had been as an extremely efficient predictor of learners' motivation (Zimmerman, 2000). Additionally, Zimmerman and Kitsantas (1999) declare that self-efficacy can be greatly related with students' intrinsic motivation in doing a task. As stated by Bandura (1997), powerful individual self-efficacy beliefs boost motivation and performance. While, low self-efficacy beliefs are known by some features such as weak commitment to achieve the goals and low aspiration.

Taking the next research question into consideration, the association between motivation and feelings is inversely significant. Several studies (Amiryousefi & Tavakoli, 2011; Khodadady & Khajavy 2013; Liu & Huang, 2011; Rücker, 2012; Toth, 2007) have been confirmed the negative relationship between these factors in language learning but the importance has been left in high-stakes testing. The feelings items of the researcher-made scale evaluate test anxiety, hopeless, nervousness, families' stress or tension, amotivation in addition to university dropout rate among participants. As asserted by Nandamuri and Ch (2011) a high amount of stress is viewed as a crucial trouble for numerous university students. Negative stress possibly will have negative effects on students' health as well as behavior (Rücker, 2012). Furthermore, massive amount of stress may have an influence on the students' ability to concentrate on a specific task (Cohens, Evans, Stokols, & Krantz, 1986) or result in some physical as well as psychological destruction (Nandamuri & Ch, 2011). If intrinsic and extrinsic motivation is negatively correlated with these psychological factors, thus, lack of motivation may possibly produce more test anxiety, hopeless, nervousness, families' stress or tension, amotivation besides university dropout rate as negative consequences (Rücker, 2012). As Tavakoli (2011) also notes language ability is not seen as the single item that can have effects on test-takers' performance in a language test but such as anxiety and motivation that have been brought to the testing situation by test-takers can influence their performance as well.

Finally, the results of the last research question confirmed the existence of remarkable but negative correlation between self-efficacy beliefs and feelings. Most studies have emphasized on the significant and negative connection between anxiety and language performance (Horwitz, 2001) and connection between anxiety and self-efficacy in language learning (Bandura, 1997; Schunk, 2007). Based on these studies, anxiety is able to produce lower level of self-efficacy because of thoughts of probable failures, but the issue of them in language testing at last regarding EPT as a high- stakes test has not fully investigated. As put by Schunk, Pintrich, and Meece (2008), one of the most important sides of this issue is that educational investigations confirm that self-efficacy is not stable but can be manipulated through other affective factors. Zheng also (2008) puts, it is crucial to understand anxiety as one of the prevalent psychological emotions to provide the essential support to worried and anxious students. Conclusion

Test anxiety is viewed as a series of physiological, phenomenological, and behavioral reactions that accompany concern about probable negative effects or failure on a test or other similar evaluative conditions (Pintrich & Schunk, 2002). Meanwhile, Shohamy (1982) stresses that the affective variables might powerfully impact test-takers' success and performance and can lead to erroneous assessment. Taking affective filters into account, traditional assessment can raise feelings of anxiety, which is powerful enough to considerably limit their performance (Kulm, 1994). Lazarus, Deese, and Osler (as cited in Shohamy, 1982) note that it is not unusual for pupils to shake, sweat, show discomfort, and some behavioral disorganization when they are informed that they will be tested. Test anxiety is viewed as a frequently well-known factor that can significantly affect test-takers' performance (Yang, 2017). Apart from anxiety as one of the items in feelings subscale, other items of the researcher-made scale assessed hopelessness, nervousness, families' stress or tension, amotivation in addition to university dropout rate among participants. It appears that high-efficacious participants are less hopeless, nervous, amotivated and less reluctant to dropout from university. To sum up, the washback effect of a language test on learning and teaching appears to be unquestionable; however, the washback effect does not need to be always negative and unfair. When tests are designed with awareness and understanding of some factors such as the learning contexts, students, and the contents, positive washback is more likely to appear (Xerri & Vella Briffa, 2018).

Although every precaution was taken to carefully prepare and conduct the research, the present study may suffer from some shortfalls. The size of sample under study might be a significant obstacle in generalizing the results beyond the specific population from which the sample will be drawn. In terms of methodology, the present research was limited in a number of ways. First, this study was based on voluntary participation of candidates. Thus, they might possibly share some common features not presented in those member of population not willing to take part in the study. This could question the generalizability of the findings of the study. Because of limited access to eligible participants, some demographic factors as gender, socioeconomic status, work experience and their effects were not controlled and investigated in the current study. Taking these factors into account, diverse results might have been observed between male and female non-English PhD students in Iran. The response rate of the questionnaires was one of the limitations that the researcher encountered in the research.

In brief, these findings have significant implications for the understanding of how psychological factors in high-stakes testing can be influential. The current data also highlight the importance of washback awareness among the language teachers, test developers and test administrators since their direct effects specify that these psychological factors greatly influence test-takers' methods of learning, persistence in learning, achievement and performance in learning as well as their motivational processes. Furthermore, test-takers with low motivation, low self-efficacy beliefs, and high level of stress are more likely to become irritated, frustrated in challenges, and may see these difficulties as their own threats to be evaded rather than to be learnt. Other implications of this study are the possibility that individuals especially policy makers, test developers, teachers, or learners may benefit from its practical knowledge and it possibly will lead to new policies about administering tests through enhancing their awareness of psychological consequences of EPT as a high-stakes test among main stakeholders. Furthermore, the current study may have a number of significant implications thinking about testing and assessment in a novel way through listening to students voices as marginalized agents in language testing.

To develop a full picture of psychological factors in high-stakes testing, additional studies on demographic variables such as gender, age and economic status will be required. Moreover, there are still many unanswered questions about the types, sources or origins of stressors among test-takers in this field. Supplementary studies will be needed to discover the other stakeholders' voices such as families, teachers or test developers in order to provide a complete picture of intended and unintended consequences of EPT. Lastly, additional research is essential to explore stakeholders' voices via using other sort of sampling to reduce the possible biases of convenience sampling.

Conflicts of Interest

No conflicts of interest declared.

References

- Ahmadjavaheri, Z., & Zeraatpishe, M. (2020). The impact of construct-irrelevant factors on the validity of reading comprehension tests. *International Journal of Language Testing*, 10(1).1-10.
- Alay, A., & Safaria, T. (2013). Effects of self-efficacy on students' academic performance. Journal of Educational, Health and Community Psychology, 2(1), 22-29.
- Amiryousefi, M., & Tavakoli, M. (2011). The relationship between test anxiety, motivation and MI and the TOEFL IBT reading, listening and writing scores. *Procedia Social and Behavioral Sciences*, 15, 210-214. doi:10.1016/j.sbspro.2011.03.075

- Au, S. Y. (1988). A critical appraisal of Gardner's socialpsychological theory of second-language (L2) Learning. *Language Learning*, 38(1), 75-99. doi:10.1111/j.1467-1770.1988.tb00402.x
- Bandura, A. (1997). *Self-efficacy: The exercise of control.* New York: W. H. Freeman and Company.
- Black, P., & Wiliam, D. (1998). Assessment and classroom learning. Assessment in Education: Principles, Policy & Practice, 5(1), 7-74. doi:10.1080/0969595980050102
- Boekaerts, M., & Cascallar, E. (2006). How far have we moved toward the integration of theory and practice in self-regulation? *Educational Psychology Review*, 18(3), 199-210.
- Bravo, J. C., Intriago, E. A., Holguin, J. V., Garzon, G. M., & Arcia, L. O. (2017). Motivation and autonomy in learning English as foreign language: A case study of Ecuadorian college students. *English Language Teaching*, 10(2), 100-113.doi:10.5539/elt.v10n2p100
- Buyukkeles, G. (2016). The washback effect of a high-stakes exit test on students' motivation in a Turkish preuniversity EFL preparatory school (Master's dissertation). University of Reading, UK, Reading.
- Chan, H. W. (2016). Popular culture, English out-of-class activities, and learner autonomy among highly proficient secondary students in Hong Kong. *Universal Journal of Educational Research*, 4(8), 1918-1923. doi:10.13189/ujer.2016.040823
- Cheng, L. (1998). Impact of a public English examination change on students' perceptions and attitudes toward their English learning. *Studies in Educational Evaluation*, 24(3), 279-301.
- Cheng, L., & Deluca, C. (2011). Voices from test-takers: Further evidence for language assessment validation and use. *Educational Assessment*, *16*(2), 104-122. doi:10.1080/10627197.2011.584042
- Cohens, S., Evans, G. W., Stokols, D., & Krantz, D. S. (1986). *Behavior, health and environmental stress*. New York: Plenum.
- Conttia, L. M. W. (2007). The influence of learner motivation on developing autonomous learning in an English-forspecific-purposes course (Master's thesis). University of Hong Kong, Hong Kong. Retrieved from https://s3.amazonaws.com/academia.edu
- Deci, E. L., & Ryan, R. M. (1985). *Intrinsic motivation and self-determination in human behavior*. New York, NY: Plenum Publishing Co.
- Dörnyei, Z. (2005). *The psychology of the language learner: Individual differences in second language acquisition*. Mahwah, NJ: Lawrence Erlbaum.
- Dörnyei, Z., & Ushioda, E. (2011). *Teaching and researching motivation*. Harlow: Pearson Education.
- Ellis, R. (1994). *The study of second language acquisition*. Oxford: Oxford University Press.
- Gardner, R.C. (1985). Social psychology and second language learning: The role of attitudes and motivation. London: Edward Arnold.

- Harlen, W., & Deakin-Crick, R. (2003). Testing and motivation for learning. Assessment in Education, 10(2), 169-208.
- Horwitz, E. K. (2001). Language anxiety and achievement. Annual Review of Applied Linguistics, 21, 112-126.
- Hung, S.A., Huang, H.D. (2019). Standardized proficiency tests in a campus-wide English curriculum: *a* washback study. Language Testing in Asia, 9(21), 1-17. doi:10.1186/s40468-019-0096-5
- elly, M. (2014). Fostering autonomy, generating motivation and shaping identities in the adolescent language classroom: An experimental research project (Doctorial thesis), Dublin City University, Dublin.
- Khajavy, G. H., Ghonsooly, B., HosseiniFatemi, A., & Choi, C. W. (2014). Willingness to communicate in English: A microsystem model in the Iranian EFL classroom context. *TESOL Quarterly*, 50(1), 154-180. doi:10.1002/tesq.204
- Khodadady, E., & Khajavy, G. (2013). Exploring the role of anxiety and motivation in foreign language achievement: A structural equation modeling approach. *Porta Linguarum*, 20, 269-286.
- Kulm, G. (1994). *Mathematics assessment: What works in the classroom*? San Francisco, CA: Jossey Bass Inc.
- Lamb, T. (2009). Controlling learning: Learners' voices and relationships between motivation and learner autonomy. In S. Toogood, R. Pemberton & A. Barfield (Eds.), *Maintaining control: Autonomy and language learning* (pp. 67-86). Hong Kong: Hong.
- Little, D., Ridley, J., & Ushioda, E. (Eds). (2003). Learner autonomy in the foreign language classroom: teacher, learner, curriculum and assessment. Dublin: Authentik, Kong University Press.
- Liu, M., & Huang, W. (2011). An exploration of foreign language anxiety and English learning motivation. *Education Research International*, 12, 1-8.
- Madaus, G., & Clarke, M. (1999). The adverse impact of high stakes testing on minority students: evidence from 100 years of test data. Paper presented at High Stakes K-12 Testing Conference, Harvard University.
- Mahadi, T. S. T., & Jafari, S. M. (2012). Motivation, its types and impacts on language learning. *International Journal of Business and Social Science*, 24(3), 230-235.
- Menken, K. (2017). High-stakes tests as de facto language education policies. In E. Shohamy, I.G. Or & S. May (Eds.), Language testing and assessment. Encyclopedia of language and education (pp. 385 397). Cham, Switzerland: Springer. doi: 10.1007/978-3-319-02261-1_35
- Mikami, H., Leung, C.Y., & Yoshikawa, L. (2018). The threshold of anxiety in low-stakes testing for foreign language reading. *Reading in a Foreign Language*, 30(1), 92-107.
- Nandamuri, P. P., & Ch, G. (2011). Sources of academic stress, a study on management students. *Journal of Management and Science*, 1, 31-42.

- Pajares, F., & Urdan, T. (2006). Self-efficacy beliefs of adolescents. Greenwich, CT: Information Age Publishing.
- Pan, Y. C., & Newfields, T. (2013). Student washback from tertiary standardized English proficiency exit requirements in Taiwan. *Journal of Teaching and Learning*, 9(1), 1-16. doi: 10.22329/jtl.v9i1.3540
- Pintrich, P. R., & Schunk, D. (2002). *Motivation in education: Theory, research and applications* (2nd ed.). Upper Saddle River: Merrill Prentice Hall.
- Rücker, J. C. (2012).*The relationship between motivation,* perceived stress and academic achievement in students (Bachelor's thesis) Enschede: University of Twente
- Rezaeian, M., Seyyedrezaei, S.H., Barani, G., Seyyedrezaei, Z. (2020). Construction and validation of educational, social and psychological consequences questionnaires of EPT as a high-stakes test. *International Journal of Language Testing*, 10(2), 33-70.
- Ryan, R. M., & Deci, E. L. (2000a). Intrinsic and extrinsic motivations: Classic definitions and new directions. *Contemporary Educational Psychology*, 25(1), 54-67.
- Ryan, R. M., Kuhl, J., & Deci, E. L. (1997). Nature and autonomy: Organizational view of social and neurobiological aspects of self-regulation in behavior and development. *Development and Psychopathology*, 9(4), 701–728. doi:10.1017/s0954579497001405
- Salehpour, G.H.R., & Roohani, A. (2020). Relationship between intrinsic/extrinsic motivation and 12 speaking skill among Iranian male and female EFL learners. *Journal of Teaching & Learning Language & Literature*, 13(1), 43-59. doi: 10.5565/rev/jtl3.803
- Schunk, D. H. (2007). *Learning theories: An educational perspective*. New York: New York Prentice Hall.
- Schunk, D. H., Pintrich, P., & Meece, J. (2008). Motivation in schools: Theory, research and applications. Pearson- Merrill Prentice-Hall, UpperSaddle River.
- Shih, S., & Alexander, J. M. (2000). Interacting effects of goal setting and self- or other referenced feedback on children's development of self-efficacy and cognitive skill within the Taiwanese classroom. *Journal of Educational Psychology*, 92(3), 536-543.
- Shohamy, E. (1982). Affective considerations in language testing. *The Modern Language Journal*, 66(1), 13-17. doi:10.2307/327810
- Stevens, T., Olivarez, A., Lan, W. Y., & Tallent-Runnels, M. K. (2004). Role of mathematics self-efficacy and motivation in mathematics performance across ethnicity. *The Journal of Educational Research*, 97(4), 208–221.
- Strauss, G. P., & Cohen, A. S. (2017). A transdiagnostic review of negative symptom phenomenology and etiology. *Schizophrenia Bulletin*, 43, 712–729. doi: 10.1093/schbu l/sbx06 6.

- Tavakoli, M. (2011). The role of motivation in ESP reading comprehension test performance. *Teaching English Language*, 9(3), 99-117.
- Tóth, Z. (2007). Predictors of foreign-language anxiety: Examining the relationship between anxiety and other individual learner variables. In J. Horváth & M. Nikolov (Eds.), *Empirical studies in English applied linguistics* (pp. 123-148). Pécs: Lingua Franca Csoport.
- Ushioda, E. (2011). Motivating learners to speak as themselves. In G. Murray, X. Gao & T. Lamb (Eds.), *Identity, motivation and autonomy in language learning. Second language acquisition* (pp.141-153). Bristol: Multilingual Matters.
- Ushioda, E., & Dörnyei, Z. (2009). Motivation, language identities and the L2 self: A theoretical overview. In Z. Dörnyei & E. Ushioda (Eds.), *Motivation*, *language identity and the L2. Second language acquisition* (pp. 1-8). Bristol: Multilingual Matters.
- Vallerand, R. J., & Bissonnette, R. (1992). Intrinsic, extrinsic, and amotivational styles as predictors of behavior: A prospective study. *Journal of Personality*, 60,599–620.
- Walker, C. O., Greene, B. A., & Mansell, R. A. (2006). Identification with academics, intrinsic/extrinsic motivation, and self-efficacy as predictors of cognitive engagement. *Learning and Individual Differences*, 16(1), 1-12. doi:10.1016/j.lindif.2005.06.004
- Wang, C., Schwab, G., Fenn, P., & Chang, M. (2013). Selfefficacy and self-regulated learning strategies for

English language learners: Comparison between Chinese and German college students. *Journal of Educational and Developmental Psychology*, 3(1), 173-191.doi: 10.5539/jedp.v3n1p173

- Woodrow, L. (2011). College English writing affect: Selfefficacy and anxiety. *System*, *39*(4), 510-522.doi: 10.1016/j.system.2011.10.017
- Xerri, D., & Vella Briffa, P. (Eds). (2018). Teacher involvement in high-stakes language testing. Springer International Publishing: Cham, Switzerland.
- Yang, Y. X. (2017). Test anxiety analysis of Chinese college students in computer-based spoken English test. *Educational Technology & Society*, 20 (2), 63-73.
- Young, K. (2016). Handbook of social psychology: International library of sociology. London: Routledge.
- Zheng, Y. (2008). Anxiety and second/foreign language learning revisited. *The Canadian Journal of New Scholars in Education*, 1(1), 1-12.
- Zimmerman, B. J. (2000). Self-efficacy: An essential motive to learn. *Contemporary Educational Psychology*, 25(1), 82-91. doi:10.1006/ceps.1999.1016
- Zimmerman, B. J., & Kitsantas, A. (2005). Homework practices and academic achievement: The mediating role of self-efficacy and perceived responsibility belief. *Contemporary Educational Psychology*, 30 (4), 397–417. doi: 10.1016/j.cedpsych.2005.05.003
- Zimmerman, B. J., & Kitsantas, A. (1999). Acquiring writing revision skill: Shifting from process to outcome selfregulatory goals. *Journal of Educational Psychology*, 91(2), 241-250. doi:10.1037/0022-0663.91.2.241

Appendix I: Psychological Consequences Questionnaire (English Version)

Dear Respondent,

We would like to ask you to help us by answering the following questions concerning EPT as a high-stakes test. This survey is conducted with the aim of looking into PhD non-English students' perceptions of the psychological consequences of EPT. This is not a test so there is no "right" or "wrong" answers and you don't even have to write your name on it. We are interested in your personal opinion. The information will be kept confidential and will be used just for research purposes. Please give your answers sincerely as only this will guarantee the success of the investigation. Thank you very much for your help and cooperation.

1. Strongly agree 2. Agree 3. Undecided 4. Disagree 5. Strongly disagree

Constructs	Strongly	Agree	Undecided	Disagree	Strongly
	agree				disagree
Self-Efficacy Beliefs					
1. I believe I have the ability to pass this test.					
2. I'm sure I can improve my English with more effort.					
3. I think learning English is very easy.					
Feelings	Strongly agree	Agree	Undecided	Disagree	Strongly disagree
4. This test increases my stress and anxiety.					
5. The result of this test makes me feel hopeless.					
6. The result of this test makes me nervous / aggressive.					
7. This test has caused stress and tension in my family.					
8. The difficulty of preparing for this test will dampen my					
motivation to study English in the future.					
9. This test makes students think about dropping out of university.					
Intrinsic Motivation	Strongly	Agree	Undecided	Disagree	Strongly
	agree				disagree
10. Preparing for the test increases my interest in learning English.					
11. Preparing for this test makes the learning process enjoyable for me.	,				
12. Preparing for this test makes me aware of the value of learning					
English.					
13. Preparing for this test gives me inner satisfaction.					
Extrinsic Motivation	Strongly agree	Agree	Undecided	Disagree	Strongly disagree
14. I want to pass this exam to get a job promotion.					
15. Making a distinction among the participants based on the result					
of this test will increase my motivation to study.					

Thanks for your cooperation

How to Site: Rezaeian, M., Seyyedrezaei, S., & Seyyedrezaei, Z. (2021). A study of motivation, self-efficacy beliefs and feelings as psychological factors among Iranian non-english PhD students in EPT. *Iranian Journal of Learning & Memory*, *4*(14), 57-70. Dor: 20.1001.1.26455455.2021.4.13.9.9

Iranian Journal of Learning & Memory is licensed under a Creative Commons Attribution-NonCommercial 4.0 International License.