



Please cite this paper as follows:

Khalili, A., Dobakhti, L., & Zohrabi, M. (2024). Scrutinizing the predicting factors in native and nonnative English instructors' teacher immunity. *Journal of Research in Applied Linguistics*, 15(1), 62-74. <https://doi.org/10.22055/RALS.2023.43835.3061>

## Research Paper

# Scrutinizing the Predicting Factors in Native and Nonnative English Instructors' Teacher Immunity

Abdolreza Khalili<sup>1</sup>, Leila Dobakhti<sup>2</sup>, & Mohammad Zohrabi<sup>3</sup>

<sup>1</sup>Department of English Language and Literature, Faculty of Literature and Humanities, Urmia University, Urmia, Iran; [abdolreza.khalili@gmail.com](mailto:abdolreza.khalili@gmail.com)

<sup>2</sup>Corresponding author, Faculty of Multimedia, Tabriz Islamic Art University, Tabriz, Iran; [l.dobakhti@gmail.com](mailto:l.dobakhti@gmail.com)

<sup>3</sup>Department of English Language, Faculty of Persian Literature and Foreign Languages, University of Tabriz, Tabriz, Iran; [mohammadzohrabi@gmail.com](mailto:mohammadzohrabi@gmail.com)

Received: 21/05/2023

Accepted: 18/09/2023

## Abstract

The present study sought to determine the factors of native and nonnative English teachers that predicted their teacher immunity. To this end, the researchers first selected 281 native and 274 nonnative English teachers in different private language institutes in Australia and Iran, respectively, as the participants. Secondly, they used 7 reliable and valid questionnaires to assess the participants' teacher immunity, age, experience, income, working hours, emotional intelligence, spiritual intelligence, perfectionism, professional development, reflective teaching, and job satisfaction. Finally, they used the standard multiple regression test to analyze the data. Results showed differences between the factors that predicted native and nonnative teachers' immunity. In addition, the teacher immunity of native teachers was found to be more productive than that of nonnative teachers in their relevant settings. Results can provide English teachers and teacher educators with guiding principles regarding teacher factors in second and foreign language contexts.

**Keywords:** Individual Teacher Factors; Native English Teachers; Nonnative English Teachers; Psychological Well-Being; Teacher Immunity.

## 1. Introduction

The psychological well-being of language teachers is one of the underlying factors for their teaching effectiveness in various academic contexts (Flett, et al., 2016; Hiver, 2015; Stoeber & Corr, 2015). Given the recent interest in the individual factors of language teachers, teacher immunity (TI; e.g., Hiver, 2017, Hiver & Dörnyei, 2017) has been introduced as a factor in second language acquisition (SLA) that is of paramount importance to the mental health of these teachers. This factor characterizes the mental shell created by teachers to protect themselves against numerous stressors in their respective academic environments (Hiver, 2018).

The above definition of TI emphasizes the fact that language teachers' factors can profoundly affect them (Edara, 2021; Farrel, 2019). Some of the relevant studies (e.g., Pelini, 2016) have looked at a number of factors related to teachers and teaching, such as income and working hours (WH), which are characteristic of teachers' academic environment. In addition, some studies (Postholm, 2012) have focused on specific variables such as teachers' age and experience, which depend on their social and professional lives. Also, other studies (e.g., De Vries et al., 2013; Meihami & Werbińska, 2022; Mirshojaee et al., 2019; Shahani, & Chalak, 2017) have investigated specific factors such as teachers' professional development (PD) and reflective teaching (RT), which depend on their professional behavior. Finally, some studies (e.g., Soodmand Afshar & Doosti, 2015, 2016; Tajik & Ranjbar, 2018; Zhaleh et al., 2018) have investigated the importance of language teachers' internal factors including their job satisfaction (JS) and burnout in their academic environment. However, the above studies were conducted without considering the language instructors' TI.



A close review of the literature on TI shows that SLA researchers have focused on certain aspects while ignoring other dimensions. First, a number of studies on TI have examined either its subcomponents (e.g., Hiver, 2015) or its types (e.g., Hiver & Dörnyei, 2017). Second, some of the relevant studies have endeavoured to examine TI in different academic settings (e.g., Rahmati et al., 2019). Third, most studies on TI have focused either on native teachers in second language contexts (e.g., Pelini, 2016) or on nonnative teachers in foreign language contexts (e.g., Haseli Songhori et al., 2018). Finally, very few studies (e.g., Dobakhti et al., 2022) have focused on the role of teachers' affective factors, including their personality traits, in their TI.

However, as far as the researchers are aware, the relevant research has not determined the extent to which teachers' various factors, including age, LE, income, WH, emotional intelligence (EI), spiritual intelligence (SI), perfectionism, PD, RT, and job satisfaction (JS) predict the native and nonnative language teachers' TI. Moreover, there is little information on the differences between the TI of the above groups of teachers. To address these issues, the following questions stand out:

1. What are the significant factors contributing to native English instructors' TI?
2. What are the significant factors contributing to nonnative English instructors' TI?
3. Is there a significant difference between the native and nonnative English instructors' TI?

## 2. Literature Review

### 2.1. Teacher Factors

Teacher factors include the numerous teacher variables that are likely to have a great impact on language teachers' teaching effectiveness (Hiver, 2015, 2016). A review of the relevant literature (e.g., Hiver & Dörnyei, 2017) highlights the fact that among the above factors, TI has received much attention in recent studies on teacher characteristics. The concept of immunity was adopted by Hiver (2015) as a metaphor from biological sciences and extended to language teaching to characterize the psychological shield of language teachers that protects them from stressful factors similar to the immune system of living beings. In his later work, Hiver (2017) identified seven subcomponents of TI, including classroom affectivity, coping, burnout, self-efficacy, resilience, attitudes towards teaching, and openness to change subcomponents based on his analyses of empirically collected data. In addition to these subcomponents, Hiver and Dörnyei (2017) classified TI into two basic categories, including productive and maladaptive categories. As they explained, productive TI, similar to an effective immune system, alleviates the psychological problems of language teachers. On the other hand, maladaptive TI is similar to an autoimmune disorder and has a negative impact on teachers' psychological well-being. They concluded that this teacher factor may be influenced by certain factors, including teachers' age, income, WH, and experience.

Kim and Roth (2011) found that the age of language teachers relates to the biological age of their bodies and may have certain effects on their cognitive abilities and emotions. Furthermore, according to them, WH includes the average number of hours teachers work per month in their respective settings. Moreover, they found that teachers' income is mostly equated with their monthly salary, along with their additional bonuses. Finally, they pointed out that teachers' experience depends on the number of years they have been teaching practical language lessons in the context of the classroom in different settings. They concluded that these factors may influence language teachers' internal factors, including their EI, SI, perfectionism, and JS.

Goleman (1995) stated that EI represents the category of intelligence that enables individuals to control their negative emotions and use their positive emotions to regulate their behavioral patterns in numerous situational contexts. As he explained, people with high EI are aware of their abilities and develop diverse social skills in their respective academic or professional environments. In addition, they are highly motivated and strive to regulate their behavior according to the demands of the situation. This type of intelligence is closely linked to the individual's SI (Golman, 1998).

Zohar (2010) stated that people's SI encompasses their ways of acting that arise from their innate values and their conception of their most important goals in different situational contexts. According to her, people with high SI can achieve higher awareness and are able to use critical thinking when performing tasks. She concluded that this intelligence category can influence individuals' perfectionism.

Stoeber and Corr (2015) defined perfectionism as people's innate desire to be superior to their peers or their tendency to express their superiority over them in various academic and professional settings. According to them, this individual factor causes people to strive for perfection and refine their performance based on their self-assessment and evaluation by peers and experts. They concluded that this affective factor has a profound influence on people's level of satisfaction with the diverse aspects of their jobs in their pertinent occupational settings.

Klassen and Chiu (2010) argued that the JS of language teachers characterizes their positive attitude resulting from their constructive view of the nature of their work and its different characteristics. According to them, this state of psychological job-related happiness can lead teachers to evaluate the usefulness of their techniques by reflecting on them and can lead to their PD in their workplace.

Farrell (2018) pointed out that language teachers' RT involves their careful evaluation of the usefulness of their teaching practices and the effectiveness of their teaching strategies in improving students' language learning. As he noted, this factor can promote language teachers' PD. Suchánková and Hrbáčková (2017) defined language teachers' PD as their tendency to change their current teaching approaches, techniques, and strategies in order to provide effective instruction to their language learners. They concluded that relevant research needs to specify the role of this teacher factor as well as the other teacher factors in the teachers' TI.

A review of recent studies on teachers' factors makes it clear that SLA researchers have focused on language teachers' TI as an important factor in their pedagogical effectiveness in different academic contexts. A number of early theoretical studies on TI have endeavored to demonstrate the conceptual validity and existence of the constituent parts of this construct. For example, Hiver (2015) introduced the construct of TI into the field of SLA and defined it as a measure of language teachers' psychological well-being. This study ensured the construct validity of TI. In his later work, Hiver (2017) took advantage of the retrodictive qualitative modeling approach to determine the constituents of the TI construct. The results of this study highlighted that TI comprises seven components, including classroom affectivity, coping, burnout, self-efficacy, resilience, attitude toward teaching, and openness to change. In addition, Hiver and Dörnyei (2017) investigated the nature of language teachers' TI by examining their psychological characteristics. Based on the results, the researchers classified TI into two main categories: productive and maladaptive TI. They concluded that productive TI improved teachers' psychological well-being, while maladaptive TI led to tension and anxiety in the language classroom.

The abovementioned research paved the way for later empirical studies. Some of these studies have attempted to determine the extent to which different academic settings influence language teachers' TI. For example, Pourbahram and Sadeghi (2020) investigated the difference between the TI of EFL teachers in public schools and in institutes. The results of this study show that teachers' TI is more productive in schools than in language institutes. In addition, a number of recent empirical studies have attempted to investigate the nature of nonnative EFL teachers' TI. For example, Maghsoudi (2021) investigated the TI of Iranian preservice EFL teachers. The results of this study showed that most of the participants had productive TI before entering the service. Finally, some studies have endeavored to determine the relationship between certain pedagogical approaches and language teachers' TI. For example, Aliakbari and Fadaeian (2023) investigated the relationship between EFL teachers' use of translanguaging and their TI. The results of this study showed that the participants' use of translanguaging was positively correlated with their productive TI.

Nevertheless, recent studies have not endeavored to examine the factors contributing to language teachers' TI (e.g., EI, SI, RT, and PD). Moreover, these studies have ignored the likely differences between native and nonnative teachers' TI. These problems highlight the need for further studies, including the present one, to address the above issues in foreign language contexts, including the EFL context in Iran.

### 3. Methodology

#### 3.1. Design

The present study used the predictive correlational design to determine significant factors in the TI of Australian and Iranian teachers. Mackey and Gass (2016) stated that this design is used to examine the extent to which predictor variables predict variance in a given criterion variable. Accordingly, in this study, the researchers examined the extent to which Native and nonnative teachers' age, experience, income, WH, EI, SI, perfectionism, PD, RT, and JS predicted variance in their TI.

### 3.2. Participants and Setting

In this study, the researchers used  $N > 50+8(m)$  formula (Pallant, 2007) to determine the appropriate sample size. In this formula,  $m$  refers to the number of predictor variables. Considering that the present study included 10 independent variables, the appropriate sample size had to be larger than 130. Accordingly, convenience sampling was utilized for choosing 281 (139 male & 142 female) native English teachers and 274 (135 male & 139 female) nonnative English teachers at language institutes. The native English teachers were selected from among English teachers at various language institutes in eleven cities in Australia, including Sydney, Melbourne, Canberra, Perth, Brisbane, Cairns, Hobart, Adelaide, Geelong, Toowoomba, and Alice Springs. These teachers had a B.A., M.A. or Ph.D. degrees in the field of ELT and were between 25 and 71 years old. In addition, their LE ranged from 3 to 48 years. The nonnative participants were selected from language teachers in fourteen cities in Iran, including Urmia, Tabriz, Tehran, Shiraz, Isfahan, Mashhad, Qazvin, Karaj, Ilam, Yazd, Kerman, Ahvaz, Kermanshah, Rasht, and Yasuj. Similar to the native participants, they had one of the abovementioned degrees in ELT. However, they were between 24 and 61 years old and had between 2 and 36 years of experience. Written informed consent was obtained from both groups of participants prior to the start of the study.

### 3.3. Instruments

#### 3.3.1. TI questionnaire

The TI questionnaire (Hiver, 2017) was used to investigate the TI of the Australian and Iranian English teachers. This questionnaire comprised 39 items on a 7-point Likert scale. These items examined the abovementioned seven subconstructs of TI. The corresponding analyses ensured the reliability and validity of this questionnaire (Hiver, 2017). In a pilot study with 24 native and 27 nonnative teachers, the reliability of the questionnaire was determined using Cronbach's alpha (CA). The corresponding analyses revealed that the reliability indices (RIs) of this instrument were .85 and .81 in the Australian and Iranian contexts, respectively. Therefore, this instrument could be used in this study. Google Forms was used to administer this questionnaire to the native and nonnative teachers in the above contexts.

#### 3.3.2. Demographic information questionnaire

Considering the main objective of the study, the researchers used a questionnaire with demographic information to collect the required information about the age, gender, experience (in years), income (in U.S. dollars), and average number of WH per month of the Australian and Iranian teachers. The teachers were asked to complete the questionnaire and return it to the researchers using Google Forms.

#### 3.3.3. EI questionnaire

In this study, Wong and Law's (2002) EI questionnaire was used to assess the EI of the native and nonnative English teachers. This questionnaire comprised 16 items on a 5-point Likert scale. Law et al. (2008) investigated the psychometric properties of this scale and reported that its reliability and validity indices were satisfactory. Nevertheless, the researchers investigated the reliability of this instrument using CA in the abovementioned pilot study. The results showed that the RIs of the scale were .85 and .81 for the Australian and Iranian participants, respectively. Google Forms was also used to distribute this questionnaire to the abovementioned groups of participants in the study.

#### 3.3.4. SI questionnaire

Based on the main objectives, King and Decicco's (2009) SI questionnaire was used to specify the SI of native and nonnative English teachers. This questionnaire comprised 24 items on a 5-point Likert scale. As King and Decicco (2009) emphasized, the psychometric properties of this instrument were satisfactory. Nevertheless, in the abovementioned pilot study, the researchers used the CA to specify the reliability of this questionnaire in the context of second and foreign language learning. Based on the results obtained, the RIs of this instrument among the Australian and Iranian participants were .86 and .89, respectively, and it represented a reliable SI scale. The Google Forms was also used to distribute this instrument to the above two groups of participants.

#### 3.3.5. Perfectionism questionnaire

Considering the above objectives, the researchers used Hewitt and Flett's (1990) perfectionism questionnaire to examine the perfectionism of native and nonnative teachers. This self-evaluation scale comprises 45 items on a 7-point

Likert scale. Hewitt and Flett (1990) found that the reliability and validity indices of this instrument were acceptable. Nevertheless, the CA was used in the abovementioned pilot study to determine its RIs in the Australian and Iranian contexts. According to the results, the RIs of this scale in the Australian and Iranian contexts were .79 and .82, respectively. The questionnaires for the native and nonnative EFL teachers were completed using Google Forms.

### **3.3.6. PD questionnaire**

Considering the main objectives, the PD questionnaire by De Vries et al. (2013) was used to investigate the PD of the Australian and Iranian teachers in their respective contexts. This questionnaire comprised 16 items on a 4-point Likert scale. The analyses by De Vries et al. (2013) ensured that the psychometric properties of this questionnaire were acceptable. Nevertheless, the CA was used in the abovementioned pilot study to investigate its reliability in the context of second and foreign language learning. According to the results, the RIs of this questionnaire in the Australian and Iranian contexts were .83 and .78, respectively, so it was used to investigate the teachers' PD. Google Forms was used to send this questionnaire to the Australian and Iranian groups of English teachers.

### **3.3.7. TR questionnaire**

Considering the underlying intentions of the study, the researchers used Akbari et al.'s (2010) TR questionnaire to examine the RT practices of the native and nonnative participants. This questionnaire comprised 29 items on a 5-point Likert scale. Akbari et al. (2010) found that the psychometric properties of the instrument were acceptable. Nonetheless, in this study, the researchers tried to ensure the reliability of this questionnaire in ESL and EFL contexts using CA. The results showed that the RIs in the Australian and Iranian contexts were .78 and .85, respectively. Therefore, the questionnaire was used in this study. Google Forms was used to send the questionnaire to Australian and Iranian teachers.

### **3.3.8. JS questionnaire**

In terms of the main objectives, Spector's (1985) JS questionnaire was used to investigate the JS of the Australian and Iranian English teachers. This self-report questionnaire comprised 36 items on a 5-point Likert scale. As Spector (1985) found, the psychometric properties of the instrument proved to be acceptable. However, in the pilot study mentioned above, the RI was used to investigate its reliability in the Australian and Iranian language contexts. The data analysis revealed that the RIs of this questionnaire were .89 and .88 in the Australian and Iranian contexts, respectively. Therefore, the researchers were able to use it in the present study. The Google Forms was used to distribute this questionnaire to both Australian and Iranian teachers.

## **3.4. Procedure**

In this study, the researchers, first, identified 52 renowned language institutes in 11 Australian cities, including Sydney, Melbourne, Canberra, Perth, Brisbane, Cairns, Hobart, Adelaide, Geelong, Toowoomba, and Alice Springs. Secondly, they examined the Websites of these institutes to specify their ELT teachers. The preliminary search provided the researchers with the contact information of 416 language teachers, including 188 male and 228 female teachers. Third, they used the e-mail addresses of these teachers to contact them and inform them of the main purpose and process of the study. Eighty-seven of these teachers did not respond to the researchers' e-mails. In addition, 48 of these teachers stated that they were unable to participate in the study for various reasons, such as their busy schedules. Thus, 281 native-speaking teachers, including 139 males and 142 females, participated in this study. Before starting the data collection, the researchers obtained informed consent from these teachers using Google Forms. Fourth, they used Google Forms to send the instruments to the teachers. More specifically, the researchers used these forms to send the demographic information questionnaire, the EI questionnaire, the SI questionnaire, the perfectionism questionnaire, the PD questionnaire, the RT questionnaire, and the JS questionnaire developed by the researchers to the native English teachers. The local teachers completed the above questionnaires and returned them to the researchers within approximately 45 days.

Fifth, the researchers identified 66 prestigious language institutes in fourteen cities in Iran, including Urmia, Tabriz, Tehran, Shiraz, Isfahan, Mashhad, Qazvin, Karaj, Ilam, Yazd, Kerman, Ahvaz, Kermanshah, Rasht, and Yasuj. Sixth, the researchers contacted the management of the concerned institutes, informed their managers about the main objectives, and asked for the contact details (e.g., phone numbers or Whatsapp/Telegram numbers) of the ELT teachers. At this point, the managers provided the researchers with the contact details of 528 teachers, including 304 male teachers and 224 female teachers. Seventh, they contacted all of these teachers and informed them of the main objectives of this

study. Ninety-one of the teachers did not respond to the researchers' phone calls or Whatsapp/Telegram messages/calls. Moreover, 163 of these teachers declined to participate in the present study for various reasons. Consequently, 274 nonnative EFL teachers, including 135 males and 139 females, participated in this study. Like the native EFL teachers, the nonnative EFL teachers also filled out a consent form before data collection began. Eighth, all of the above questionnaires were sent to the nonnative teachers using Google Forms. The nonnative teachers completed these questionnaires and returned them to the researchers within approximately 2 months. Finally, the researchers used SPSS (version 24) to carry out the data analysis of the present study. More specifically, they used the standard test of multiple regression to determine the factors contributing to the TI of native and nonnative teachers.

#### 4. Results

The first research question aimed to identify the most important factors for the TI of the native-speaker teachers. Considering the aim of this question and the design of the study, the researchers utilized the standard multiple regression test to determine the significant factors in native teachers' TI. However, it was necessary to check the underlying assumptions of this test before using it. The first assumption was the assumption of multicollinearity. Therefore, the researchers checked the variance inflation factor (VIF) and collinearity tolerance diagnostics of the predictor variables in the native teachers' TI. Table 1 contains the corresponding results:

Table 1. *Collinearity Diagnostics of the Predictor Factors in the Native English Instructors' TI*

Variable	Tolerance	VIF
Age	.433	2.31
Experience	.589	1.69
Income	.779	1.28
WH	.842	1.16
EI	.287	3.49
SI	.384	2.60
Perfectionism	.350	2.17
PD	.337	2.96
RT	.369	2.54
JS	.335	2.36

According to Table 1, the tolerance values of the predictor variables were greater than 0.1. In addition, all VIF values were less than 10. The multicollinearity assumption was therefore not violated. In addition, it was necessary to check the outlier assumption as well as the assumptions on normality, independence of residuals, homoscedasticity, and linearity. For this purpose, the researchers examined the Mahalanobis distance value to check the outlier assumption. They also examined the Cook's distance value to check the other assumptions. These values are shown in Table 2:

Table 2. *Residual Statistics of Predictor Factors in the Native English Instructors' Teacher Immunity*

Statistic	Minimum	Maximum
Mahalanobis Distance	2.00	25.57
Cook's Distance	.080	.583

Table 2 shows that the maximum value of Mahalanobis distance (i.e., 25.57) was less than 29.59, which is the critical value in the models with 10 independent variables (Pallant, 2007). In addition, the maximum value of Cook's distance (i.e., .583) was less than 1. These results emphasize the fact that none of the above assumptions was violated. Consequently, the researchers examined the model for this test. Table 3 shows the model:

Table 3. *Model of Predictor Variables in the Native English Instructors' TI*

Model	R	R Square	A R S	SEE
1	.912	.831	.812	24.659

Table 3 shows that the model explained 0.831 (i.e., *R*-squared) of the variance in the native English teachers' TI. In other words, it explained 83.1% (*R*-squared value multiplied by 100) of the variance in these teachers' TI in their respective language learning contexts. The results of the ANOVA were examined to investigate the statistical significance of this model. The results underlined the statistical significance of the model ( $p < 0.05$ ). Based on these results, the researchers reviewed the standardized coefficients to determine the extent to which each of the variables predicted the variance in native language teachers' TI. Table 4 shows these results:

Table 4. *Standardized Coefficients of the Model of Predictor Factors in the Native English Instructors' Teacher Immunity*

Factors	Standardized Coefficient (Beta)	Sig.
Age	.055	.403
Experience	.021	.711
Income	.034	.485
WH	-.017	.724
EI	.351	.000
SI	.185	.010
Perfectionism	.389	.009
PD	.189	.013
RT	.217	.192
JS	.546	.000

As shown in Table 4, EI, SI, perfectionism, PD, and JS were the significant factors in the TI of the native English teachers ( $p < .05$ ). In addition, the examination of beta values showed that JS (.546), perfectionism (.389), and EI (.351) were the first, second, and third factors, respectively, that contributed the most to the prediction of these teachers' TI.

The second question aimed to determine the most important factors for the TI of nonnative English teachers. Based on this objective and the design used, the researchers used the standard multiple regression test to perform the corresponding data analysis. However, they had to take into account the assumptions of this test. Therefore, they first checked the collinearity diagnosis. Table 5 shows the corresponding results:

Table 5. *Collinearity Diagnostics of Predictor Factors in the Nonnative English Instructors' Teacher Immunity*

Variable	Tolerance	VIF
Age	.476	2.09
Experience	.756	1.32
Income	.322	3.89
WH	.477	2.09
EI	.532	1.88
SI	.418	2.39
Perfectionism	.366	3.93
PD	.326	2.96
RT	.354	2.43
JS	.352	2.59

Table 5 shows that all tolerance values of the predictor variables were greater than 0.1. In addition, all the VIF values were less than 10, so multicollinearity had no effect on the results. Furthermore, there was a need to check the remaining assumptions. For this purpose, Mahalanobis distance and Cook distance were examined to check the remaining assumptions. Table 6 contains these values:

Table 6. *Residual Statistics of Predictor Factors in Nonnative English Instructors' TI*

Statistic	Minimum	Maximum
Mahalanobis Distance	2.201	23.083
Cook's Distance	.071	.232

Table 6 shows that the maximum value of Mahalanobis distance (i.e., 23.08) is less than 29.59, which is the critical value in the models with 10 independent variables (Pallant, 2007). Moreover, the maximum value of Cook's distance (i.e., .232) was less than 1. These results emphasize the fact that none of the relevant assumptions was violated. Consequently, the researchers examined the model of this test. Table 7 shows this mode:

Table 7. *Model Summary of the Predictor Variables in the Native English Instructors' Teacher Immunity*

Model	R	R Square	ARS	SEE
1	.982	.964	.960	14.902

As shown in Table 7, the model explained 0.964 of the variance in the TI of the English teachers whose native language is not English. In other words, it explained 96.4% of the variance in the TI of these teachers in their respective language learning contexts. The ANOVA results underlined the statistical significance of this model ( $p < 0.05$ ). Consequently, the researchers examined the standardized coefficients to investigate the extent to which each of the variables predicted the variance in the nonnative language instructors' TI. Table 8 contains the corresponding results:

Table 8. *Standardized Coefficients of Model of Predictor Factors in the Nonnative English Instructors' Teacher Immunity*

Factors	Standardized Coefficient (Beta)	Sig.
Age	-.002	.955
Experience	.050	.031
Income	.480	.001
WH	.045	.119
EI	.056	.042
SI	.026	.393
Perfectionism	.165	.037
PD	.222	.000
RT	.330	.000
JS	.131	.012

As shown in Table 8, experience, income, EI, perfectionism, PD, RT, and JS were the significant factors for nonnative teachers' TI ( $p < .05$ ). The examination of the beta values also showed that income (.480), RT (.330), and PD (.222) of these teachers were the first, second, and third factors, respectively, that contributed most strongly to predicting their TI.

Finally, the third question aimed to investigate the difference between the TI of the native and nonnative English teachers. The results of the Kolmogorov-Smirnov and Shapiro-Wilk tests showed that the TI data were normally distributed ( $p > .05$ ). Therefore, the researchers used a  $t$  test for independent samples to analyze the data. Table 9 shows the descriptive statistics for the TI of native and nonnative teachers:

Table 9. *Descriptive Statistics for Participants' TI*

Groups	N	M	SD	SEM
Native English Instructors	281	160.15	61.512	6.151
Nonnative English Instructors	274	138.82	63.745	6.375

A  $t$  test was used to determine the statistical significance mean difference in Table 9. Table 10 shows the relevant results:

Table 10. *The Independent Samples t Test of the Native and Nonnative English Instructors' TI*

Variable	Levene's Test (Sig.)	t Test
TI	.971	.017

According to Table 10, the Levene's test underlined the equality of variances ( $p > .05$ ). In addition, the  $t$  test showed that the difference between the TIs of native and nonnative English teachers was statistically significant ( $p < .05$ ). The above results are shown in Figure 1:



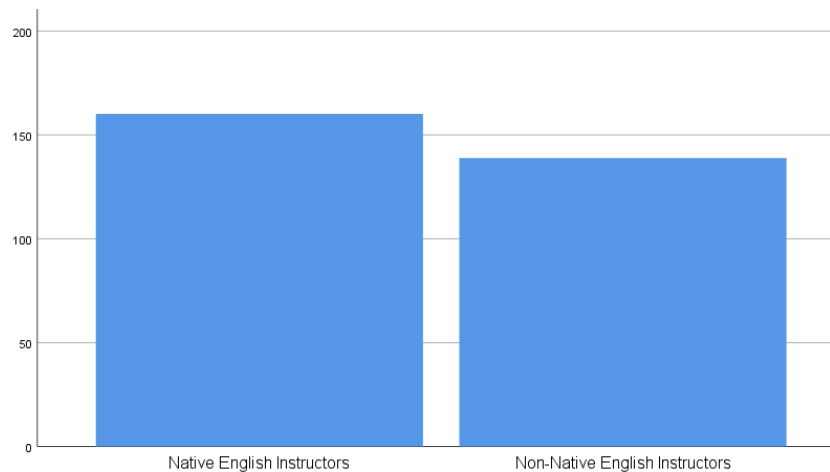


Figure 1. Native and Nonnative English Instructors' TI

## 5. Discussion

The first research question aimed to discern significant determinants influencing TI of native English teachers. Results indicate that EI, SI, perfectionism, PD, and JS significantly predicted TI among these teachers. Notably, JS, perfectionism, and EI emerged as the foremost contributors to predicting TI. These findings align with several prior studies, including those by Antiniene and Lekaviciene (2017), Guerra-Bustamante et al. (2019), and Edara (2021), which suggest that individual factors correlate with psychological well-being across diverse contexts.

EI is considered to empower individuals to discern primary behavioral factors and effectively manage negative emotions, fostering constructive and harmonious workplace relationships (Goleman, 1995). As Zohar (2010) noted, SI reflects actions aligned with innate values and overarching goals, emphasizing awareness of competencies and efficacy assessment. Moreover, perfectionism is posited to propel individuals to formulate specific goals, conduct critical self-assessments, and adapt goals based on situational demands, fostering resilience and a proactive approach to challenges (Stoeber et al., 2018). Mathew et al. (2017) further accentuated that PD entails continual self-monitoring, skill recognition, and improvement efforts, bolstering self-confidence and competence perception while mitigating negative emotions. In turn, JS cultivates a positive work attitude, engendering emotional well-being and job performance (Markovits et al., 2014). In synthesis, EI and SI significantly elucidated native English teachers' TI, fostering emotion regulation and constructive interpersonal dynamics. Additionally, perfectionism and PD proved pivotal, facilitating experiential learning and pedagogical efficacy. JS, in turn, emerged as a salient predictor, bolstering positive professional attitudes, psychological resilience and vocational satisfaction.

The second research question aimed to delineate determinants of TI among non-native English teachers. Results underscored the significance of experience, income, EI, perfectionism, PD, RT, and JS in predicting TI, with income, RT, and PD emerging as primary predictors. These findings corroborate prior studies by Ghadimifar and Dadkhah (2015), Taghvaininia and Mirzaei (2017), Abbasi et al. (2018), and Kayed and Kazemian Moghadam (2021), highlighting the multifaceted role of individual factors in psychological well-being. The instrumental role of experience has already been documented in facilitating critical thinking and pedagogical efficacy among language teachers (Pelini, 2016), highlighting their ability to adopt innovative strategies tailored to contextual needs. Conversely, Cirocki and Farrell (2017) underscored the adverse effects of financial insecurity on teachers' mental well-being, stressing the importance of financial stability in sustaining psychological equilibrium.

Additionally, Goleman (1998) asserted that high EI facilitates stress management through effective coping mechanisms, preserving inner equilibrium amidst adversity. Stoeber and Corr (2017) posited that healthy perfectionism fosters a positive outlook and resilience in pedagogical pursuits, promoting professional satisfaction. Similarly, the nexus between PD and adaptability has been noted (Suchánková & Hrbáčková, 2017), suggesting that openness to pedagogical evolution enhances teachers' capacity to navigate emotional challenges. Farrell (2018) further expounded on RT as a

catalyst for instructional efficacy, underlining its role in refining teaching methodologies based on learner feedback. Furthermore, Klassen and Chiu (2010) emphasized the role of JS in bolstering resilience and enjoyment in teaching endeavors, thereby fortifying psychological well-being. Collectively, these factors delineate a complex interplay shaping nonnative English teachers' TI, underscoring the multifaceted nature of psychological determinants in educational settings.

The third research question investigated disparities in TI between Australian and Iranian teachers, with results indicating higher TI among Australian counterparts. While scant research directly compares TI across these cohorts, the findings resonate with Hiver's (2017) assertion that TI is heavily influenced by contextual factors. Comparative analysis revealed differential predictive factors between native and nonnative English teachers, notably regarding income. While income insignificantly influenced native teachers' TI, it emerged as the foremost predictor among nonnative counterparts, highlighting divergent perspectives on financial stability. Hiver (2017) suggested that external factors, such as income and institutional recognition, may undermine TI, posing as stressors. Such factors, beyond educators' control, can engender psychological strain, impeding well-being. In essence, disparities in TI between native and nonnative English teachers stem from nonnatives' heightened reliance on external factors, particularly income, which serves as a stressor, impairing TI. Thus, understanding and addressing these contextual nuances are paramount in fostering teacher well-being and retention.

## 6. Conclusion

This study delved into the determinants of TI among both native and nonnative English instructors. Findings underscored that while internal factors, such as JS, significantly influenced TI among native instructors, external variables, notably income, emerged as the strongest predictors for nonnative instructors within their academic milieu. From these findings, several preliminary conclusions can be drawn: Firstly, a critical reevaluation of existing training courses for nonnative language teachers is imperative. These courses predominantly focus on practical aspects of language teaching, often neglecting the crucial dimension of teacher factors. There is a pressing need to integrate modules within these courses that raise awareness among teachers about the significance of individual factors for pedagogical effectiveness. Secondly, targeted training for teacher educators concerning teacher factors is warranted. Despite holding international teacher training certificates, many educators lack a comprehensive understanding of teacher factors' pivotal role in language teaching. Retraining initiatives for teacher educators could bridge this gap, enhancing teachers' awareness of the importance of these factors in their practice.

To translate these suggestions into actionable solutions, program developers may consider bifurcating teacher education into distinct phases: a teacher-factor phase and a language teaching phase. The former would entail theoretical discussions and insights into teacher factors, including TI, as foundational knowledge for effective language instruction. Subsequently, teacher trainers should equip educators with empirical strategies to integrate this knowledge into their teaching practice, fostering productive TI. Furthermore, sensitizing teachers to the adverse effects of over-reliance on external factors, such as income, is crucial. While acknowledging the significance of financial security, educators must be empowered with resilience-building strategies to navigate diverse teaching conditions and mitigate psychological distress. Lastly, fostering a supportive mentorship environment wherein teachers can share concerns and seek guidance is paramount. Providing avenues for constructive feedback and mentorship can bolster teachers' sense of connectedness and, consequently, enhance TI within their academic settings.

While this study contributes valuable insights, certain limitations warrant acknowledgment. The sampling focused on a specific context and lacked cross-cultural diversity, potentially influencing the findings. Future research should address these limitations, aiming to refine our understanding of TI and its subconstructs, thereby enriching assessment methodologies. Moreover, exploring differences in TI among language teachers with graduate degrees in language-related versus non-language-related fields warrants further investigation.

## Acknowledgments

The researchers express their gratitude to the instructors who took part in the present study.

### Information on Informed Consent or any Data Privacy Statements

Written informed consent was obtained from all of the participants before the onset of the study.

### Author Contributions

In the present study, all the authors collaborated with each other to collect and analyze the data and to write and revise the article.

### Conflict of Interest

The authors have no conflict of interest to declare.

### References

- Abbasi, M., Mirderikvand, F., Adavi, H., & Hojati, M. (2018). The relationship between personality traits (neuroticism and extraversion) and self-efficacy with aging depression. *Iranian Journal of Aging, 12*(4), 458-466. <https://doi.org/10.21859/sija.12.4.458>
- Akbari, R., Behzadpoor, F., & Dadvand, B. (2010). Development of English language teaching reflection inventory. *System, 38*, 211-227. <https://doi.org/10.1016/j.system.2010.03.003>
- Aliakbari, M., & Fadaeian, F. (2023). The relationship between translanguaging perceptions and language teacher immunity. *Journal of Modern Research in English Language Studies*. <https://doi.org/10.30479/jmrels.2023.18225.2163>
- Antiniene, D., & Lekaviciene, R. (2017). Psychological and physical well-being of Lithuanian youth: Relation to emotional intelligence. *Medicina, 53*(4), 277-284. <https://doi.org/10.1016/j.medic.2017.05.008>
- Cirocki, A., & Farrell, T. S. C. (2017). Reflective practice for professional development of TESOL practitioners. *The European Journal of Applied Linguistics and TEFL, 6*(2), 5-23.
- De Vries, S., Jansen, E. P. W. A., & Van De Grift, W. J. C. M. (2013). Profiling teachers' continuing professional development and the relation with their beliefs about learning and teaching. *Teaching and Teacher Education, 33*, 78-89. <https://doi.org/10.1016/j.tate.2013.02.006>
- Dobakhti, L., Zohrabi, M., & Masoudi, S. (2022). Scrutinizing the affective predictors of teacher immunity in foreign language classrooms. *Teaching English Language, 16*(1), 65-88. <https://doi.org/10.22132/TEL.2022.148550>
- Edara, I. R. (2021). Exploring the relation between emotional intelligence, subjective wellness, and psychological distress: A case study of university students in Taiwan. *Behavioral Sciences, 11*, 1-20. <https://doi.org/10.3390/bs11090124>
- Farrell, T. S. C. (2018). *Research on reflective practice in TESOL*. London: Routledge.
- Flett, G. L., Hewitt, P. L., Su, C., & Flett, K. D. (2016). Perfectionism in language learners: Review, conceptualization, and recommendations for teachers and school psychologists. *Canadian Journal of School Psychology, 31*(2), 75-101. <https://doi.org/10.1177/0829573516638462>
- Ghadimifar, M., & Dadkhah, A. (2015). Prediction of rehabilitation nurses' psychological well-being by personality traits and defense mechanisms. *Iranian Rehabilitation Journal, 13*(4), 40-48.
- Goleman, D. (1995). *Emotional intelligence*. BY: Bantam Books.
- Goleman, D. (1998). *Working with emotional intelligence*. NY: Bantam Books.
- Guerra-Bustamante, J., Leon-Del-Barco, B., Yuste-Tosina, R., Lopez-Ramos, V. M., & Mendo-Lazaro, S. (2019). Emotional intelligence and psychological well-being in adolescents. *International Journal of Environmental Research and Public Health, 16*, 1-12. <https://doi.org/10.3390/ijerph16101720>
- Haseli Songhori, M., Ghonsooly, B., & Afraz, Sh. (2018). Language teacher immunity among Iranian EFL teachers: A self-organization perspective. *Iranian Journal of English for Academic Purposes, 7*(1), 128-143. <https://doi.org/20.1001.1.24763187.2018.7.1.8.1>

- Hewitt, P. L., & Flett, G. L. (1990). Dimensions of perfectionism and depression: A multidimensional analysis. *Journal of Social Behavior and Personality*, 5, 423-438.
- Hiver, P. (2015). Once burned, twice shy: The dynamic development of system immunity in teachers. In Z. Dörnyei, P. MacIntyre, & A. Henry (Eds.), *Motivational dynamics in language learning* (pp. 214-237). Bristol: Multilingual Matters.
- Hiver, P. (2016). The triumph over experience: Hope and hardiness in novice L2 teachers. In P. MacIntyre, T. Gregersen, & S. Mercer (Eds.), *Positive psychology in SLA* (pp. 168-192). Bristol: Multilingual Matters.
- Hiver, P. (2017). Tracing the signature dynamics of language teacher immunity: A retrodictive qualitative modeling study. *The Modern Language Journal*, 101(4), 669-690. <https://doi.org/10.1111/modl.12433>
- Hiver, P. (2018). Teachstrong: The power of teacher resilience for L2 practitioners. In S. Mercer, & A. Kostoulas (Eds.), *Language teacher psychology* (pp. 231-246). Bristol: Multilingual Matters.
- Hiver, P., & Dörnyei, Z. (2017). Language teacher immunity: A double-edged sword. *Applied Linguistics*, 38(3), 405-423. <https://doi.org/10.1093/applin/amv034>
- Kayed, H., & Kazemian Moghadam, K. (2021). Causal relationship between personality traits and psychological well-being with quality of working life through perceived social support in nurses. *Journal of Fundamentals of Mental Health*, 23(6), 433-442.
- Kim, K., & Roth, G. L. (2011). Novice teachers and their acquisition of work-related information. *Current Issues in Education* 14, 1-22.
- King, D. B., & DeCicco, T. L. (2009). A viable model and self-report measure of spiritual intelligence. *The International Journal of Transpersonal Studies*, 28(1), 68-85. <http://dx.doi.org/10.24972/ijts.2009.28.1.68>
- Klassen, R. M., & Chiu, M. M. (2010). Effects on teachers' self-efficacy and job satisfaction: Teacher gender, years of experience, and job stress. *Journal of Educational Psychology*, 102, 741-756. <https://doi.org/10.1037/a0019237>
- Law, K. S., Wong, C. S., Huang, G. H., & Li, X. (2008). The effects of emotional intelligence on job performance and life satisfaction for the search and development scientists in China. *Asia Pacific Journal of Management*, 25, 51-69. <https://doi.org/10.1007/s10490-007-9062-3>
- Mackey, A., & Gass, S. (2016). *Second language research: Methodology and design* (2<sup>nd</sup> ed.). London: Routledge.
- Maghsoudi, M. (2021). Productive or maladaptive immunity? Which one is more dominant among Iranian EFL prospective teachers? *Applied Research on English Language*, 10(1), 51-80. <https://doi.org/10.22108/ARE.2020.124031.1595>
- Markovits, Y., Boer, D., & van Dick, R. (2014). Economic crisis and the employee: The effects of economic crisis on employee job satisfaction, commitment, and self-regulation. *European Management Journal*, 32(3), 413-422. <https://doi.org/10.1016/j.emj.2013.09.005>
- Mathew, P., Mathew, P., & Peechattu, J. (2017). Reflective practices: A means to teacher development. *Asia Pacific Journal of Contemporary Education and Communication Technology*, 3(1), 126-131.
- Meihami, H., & Werbińska, D. (2022). Role of action research in ESP teachers' professional identity development. *Journal of Research in Applied Linguistics*, 13(1), 31-43. <https://doi.org/10.22055/rals.2022.17423>
- Mirshojaee, S. B., Sahragard, R., Razmjoo, S. A., & Ahmadi, A. (2019). Iranian language teachers' passion for the profession: A qualitative study. *Journal of Research in Applied Linguistics*, 10(2), 44-69. <https://doi.org/10.22055/rals.2019.14717>
- Pallant, J. (2007). *SPSS survival manual: A step by step guide to data analysis using SPSS for windows* (3<sup>rd</sup> ed.). McGraw-Hill House.
- Pelini, E. S. (2016). Analyzing the sociopsychological construction of identity among pre-service teachers. *Journal of Education for Teaching*, 43(1), 1-10. <https://doi.org/10.1080/02607476.2017.1251095>

- Postholm, M. B. (2012). Teachers' professional development: A theoretical review. *Educational Research*, 54 (4), 405-429. <https://doi.org/10.1080/00131881.2012.734725>
- Pourbahram, R., & Sadeghi, K. (2020). English as a foreign language teachers' immunity and motivation: Public schools vs. private institutes. *Teaching English Language*, 14(2), 269-299. <https://doi.org/10.22132/TEL.2020.125905>
- Rahmati, T., Sadeghi, K., & Ghaderi, F. (2019). English as a foreign language teacher immunity: An integrated reflective practice. *Iranian Journal of Language Teaching Research*, 7(3), 91-107. <https://doi.org/10.30466/ijltr.2019.120738>
- Shahani, S., & Chalak, A. (2017). *Classroom discourse analysis as a tool for reflective practice: Focus on form approach*. Proceedings of the Fourth International Conference on Language, Discourse and Pragmatic, Ahvaz, Iran. <https://doi.org/10.22055/rals.2017.12872>
- Soodmand Afshar, H., & Doosti, M. (2015). An investigation into factors contributing to Iranian secondary school English teachers' job satisfaction and dissatisfaction. *Research Papers in Education*, 31(3), 274-298. <https://doi.org/10.1080/02671522.2015.1037335>
- Soodmand Afshar, H., & Doosti, M. (2016). Investigating the impact of job satisfaction/dissatisfaction on Iranian English teachers' job performance. *Iranian Journal of Language Teaching Research*, 4(1), 97-115.
- Spector P. E. (1985). Measurement of human service staff satisfaction: Development of the job satisfaction survey. *American Journal of Community Psychology*, 13, 693-713. <https://doi.org/10.1007/BF00929796>
- Stoeber, J., & Corr, P. J. (2015). Perfectionism, personality, and affective experiences: New insights from revised reinforcement sensitivity theory. *Personality and Individual Differences*, 86, 354-359. <https://doi.org/10.1016/j.paid.2015.06.045>
- Stoeber, J., & Corr, P. J. (2017). Perfectionism, personality, and future-directed thinking: Further insights from revised reinforcement sensitivity theory. *Personality and Individual Differences*, 105, 78-83. <https://doi.org/10.1016/j.paid.2016.09.041>
- Stoeber, J., Damian, L. E., & Madigan, D. J. (2018). Perfectionism: A motivational perspective. In J. Stoeber (Ed.), *The psychology of perfectionism: Theory, research, applications* (pp. 19-43). London: Routledge.
- Suchánková, E., & Hrbáčková, K. (2017). Mentoring in the professional development of primary and secondary school teachers. *Journal on Efficiency and Responsibility in Education and Science*, 10(1), 7-15. <https://doi.org/10.7160/eriesj.2017.100102>
- Taghvainia, A., & Mirzaei, A. (2017). Relationship between personality traits and psychological well-being with respect to the mediating role of forgiveness. *Armaghan-e-Danesh*, 22(4), 529-541.
- Tajik, L., & Ranjbar, K. (2018). Reflective teaching in ELT: Obstacles and coping strategies. *Journal of Research in Applied Linguistics*, 9(1), 148-169. <https://doi.org/10.22055/RALS.2018.13409>
- Wong, C. S., & Law, K. S. (2002). The effects of leader and follower emotional intelligence on performance and attitude: An exploratory study. *Leadership Quarterly*, 13, 243-274. [https://doi.org/10.1016/S1048-9843\(02\)00099-1](https://doi.org/10.1016/S1048-9843(02)00099-1)
- Zhaleh, K., Ghonsooly, B., & Pishghadam, R. (2018). Effects of conceptions of intelligence and ambiguity tolerance on teacher burnout: A case of Iranian EFL teachers. *Journal of Research in Applied Linguistics*, 9(2), 118-140. <https://doi.org/10.22055/rals.2018.13796>
- Zohar, D. (2010). Exploring spiritual capital: An interview with Danah Zohar. *Spirituality in Higher Education Newsletter*, 5(5), 1-8.



© 2024 by the authors. Licensee Shahid Chamran University of Ahvaz, Iran. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution-NonCommercial 4.0 International (CC BY-NC 4.0 license). (<http://creativecommons.org/licenses/by-nc/4.0/>).

