



# Modeling the relationships between anxieties and performance in second/foreign language speaking assessment

Heng-Tsung Danny Huang

National Taiwan University, No. 1, Sec. 4, Roosevelt Road, Taipei 10617, Taiwan



## ARTICLE INFO

### Keywords:

Anxiety  
Second/foreign language speaking test  
Path analysis  
General English Proficiency Test

## ABSTRACT

Second/foreign language (L2) research exploring the role of anxiety in learning and test performance has been considered to take three different perspectives on the nature of anxiety, viz., trait, state, and situation-specific perspectives. This research examined the interactions among four different anxieties, i.e., trait anxiety, state anxiety, language anxiety, and test anxiety, under these three perspectives, their respective and collective impact on L2 speaking test performance, and the presence of gender effects on such an impact. The researcher administered two sets of a large-scale standardized English speaking test and four anxiety scales adopted or adapted from relevant research to 251 Taiwanese EFL learners. Capitalizing on the path-analytical technique, the researcher constructed and evaluated several path models resulting in three primary findings. First, trait anxiety and language anxiety constituted the direct sources of state anxiety, whereas test anxiety affected state anxiety mainly indirectly. Second, trait anxiety and language anxiety impacted the speaking test performance in a statistically significant manner. Third, the impact of anxiety on performance did not vary with respect to gender. These findings substantiated the theoretical frameworks of L2 use and speaking performance and highlighted the importance of developing anxiety-coping strategies applicable to the L2 testing context.

## 1. Introduction

Anxiety represents “a palpable but transitory emotional state or condition characterized by feelings of tension and apprehension and heightened autonomic nervous system activity” (Spielberger, 1972, p. 24). In the field of second/foreign language (L2) learning and testing, a remarkably extensive body of research has hitherto explored the role of this affective factor in contributing to the learning and performance variations on the part of the learners. Moreover, as MacIntyre and Gardner (1991a) delineated, the bulk of this research could be considered to take three different perspectives on the nature of anxiety, viz., trait, state, and situation-specific perspectives. However, to date, few research efforts have been invested in investigating how anxieties in these different perspectives would interact with one another and how they would independently and jointly influence L2 learning or test performance. In response to the paucity of relevant research, this study set out to explore the interactions among four different anxieties, i.e., trait anxiety, state anxiety, language anxiety, and test anxiety, under these three perspectives, their respective and collective impact on the performance on the speaking section of a large-scale standardized English proficiency test in Taiwan, namely, the General English Proficiency Test (GEPT), and the potential moderating role of gender for such an impact. Through conducting this academic project, the

researcher intended to achieve a manifold purpose: (1) to tease apart the effects of different anxiety reactions on L2 speaking test performance, (2) to bring to light the interaction patterns among these anxiety reactions, and (3) to obtain further validity evidence for the interpretations of GEPT scores.

## 2. Literature review

### 2.1. Anxiety in L2 research: perspectives and empirical efforts

Thus far, the plethora of anxiety studies conducted in the arenas of L2 learning and testing have taken three broad perspectives on the nature of anxiety, as revealed either explicitly in the research purposes they served or implicitly in the research instrument(s) they adopted: trait, state, and situation-specific perspectives. The trait perspective focuses primarily on trait anxiety which Spielberger (1972) defined as the “relatively stable individual differences in anxiety proneness” that predispose an individual to “perceive a wide range of stimulus situations as dangerous or threatening” and to react to such situations with state anxiety reactions (p. 39). As compared to those lower in trait anxiety, highly trait-anxious individuals would exhibit anxiety reactions with an increased intensity more frequently because of their tendency to interpret a host of situations as posing dangers and threats,

E-mail address: [dannyhuang123@ntu.edu.tw](mailto:dannyhuang123@ntu.edu.tw).

<https://doi.org/10.1016/j.lindif.2018.03.002>

Received 3 December 2016; Received in revised form 16 February 2018; Accepted 13 March 2018

1041-6080/ © 2018 Elsevier Inc. All rights reserved.

especially those involving interpersonal relationships or threatening their self-esteem (Spielberger, 1983).

The state perspective centers on state anxiety which denotes “a transitory emotional state or condition of the human organism that varies in intensity and fluctuates over time” and a condition characterized by tension, apprehension, and autonomic nervous reactions (Spielberger, 1972, p. 39). It represents the experience of anxiety itself and remains the same “whether it is caused by test taking, public speaking, meeting the fiancé’s parents, or trying to communicate in a second language” (MacIntyre, 1999, p. 28). Further, it has been posited that differences in trait anxiety might not necessarily reflect corresponding differences in state anxiety; this correspondence depends largely on the extent to which individuals interpret a specific situation as threatening or dangerous, an interpretation informed mostly by their past relevant experiences (Spielberger, 1983).

The situation-specific perspective emphasized and studied the presence and influence of situation-specific anxiety. This kind of anxiety reflects “the probability of becoming anxious in a particular type of situation,” situations such as taking tests (test anxiety), working on math problems (math anxiety), or learning or using an L2 (language anxiety) (MacIntyre & Gardner, 1994, p. 2). Since the research studies taking this perspective could more clearly delimit the situations being investigated for the respondents and more specifically require them to identify the sources of their anxiety reactions, MacIntyre and Gardner (1991a) believed that these studies led to “more meaningful and consistent results” (p. 92). Because this research project focused primarily on the performance in L2 testing contexts, the two most pertinent situation-specific anxieties thus include language anxiety and test anxiety.

In terms of language anxiety, Horwitz, Horwitz, and Cope (1986) named this construct foreign language anxiety and conceptualized it as “a distinct complex of self-perceptions, beliefs, feelings, and behaviors related to classroom language learning arising from the uniqueness of the language learning process” (p. 128). A few years later, Horwitz and Young (1991) further proposed that since both second and foreign language learners might experience this anxiety, the more encompassing label – language anxiety – might better capture the essence of this affective factor. Thus far, language anxiety has been demonstrated to constitute a specific type of anxiety rather than a general anxiety. For instance, Horwitz (1986) reported that language anxiety correlated only weakly with other types of anxieties, such as trait anxiety, communication apprehension, and fear of negative evaluation.

With respect to test anxiety, it reflects “a situation-specific personality trait” to respond with heightened anxiety to evaluative situations (Spielberger, Anton, & Bedell, 1976, p. 323) and has been demonstrated to feature multidimensionality (Zeidner, 1998). For instance, Alpert and Haber (1960) put forth a bidimensional theory that partitions it into two componential categories, namely, facilitating and debilitating anxieties. According to Alpert and Harper, facilitating anxiety will increase individuals’ general drive level and as such boost their performance, whereas debilitating anxiety will draw their attention to task-irrelevant behaviors and in turn lead to impaired performance. Subsequent researchers further proposed four components to define the domain of the debilitating test anxiety (Hodapp, 1995). Firstly, Liebert and Morris (1967) posited worry and emotionality as the two primary dimensions of test anxiety. Worry represents the “cognitive concerns about the consequences of failing, the ability of others relative to one’s own, etc.” while emotionality reflects “autonomic reactions which tend to occur under examination stress” (Liebert & Morris, 1967, p. 975). Another constituent of test anxiety pertains to cognitive interference, i.e., the interfering thoughts that intrude upon an individual’s attention to task-relevant variables (Sarason, 1984). Additionally, lack of confidence constitutes the fourth dimension of test anxiety that measures a person’s self-control and confidence in performance in the face of an evaluative stressor (Hodapp, Glanzmann, & Laux, 1995).

In the research literature that explored the role of anxiety in L2 test performance, the empirical studies taking these three perspectives have

all revealed an overall inverse relationship between anxiety and performance. Specifically, those operationalizing anxiety as trait anxiety have generally found it to negatively correlate with the performance on L2 assessment measures (e.g., MacIntyre & Gardner, 1991c; Swain & Burnaby, 1976; Tucker, Hamayan, & Genesee, 1976). Likewise, the anxiety research taking the state perspective has mostly identified a detrimental relationship between state anxiety and L2 test performance (e.g., Huang & Hung, 2013; Oya, Manalo, & Greenwood, 2004; Steinberg & Horwitz, 1986). In the same vein, in most of the L2 studies adopting the situation-specific perspective on anxiety, L2 test performance has exhibited a deleterious relationship with language anxiety (e.g., Hewitt & Stephenson, 2012; Phillips, 1992; Woodrow, 2006; Zhang, 2013) and test anxiety (e.g., Liu, 2007; Winke & Lim, 2014; Zhang, 2016; Zhang & Liu, 2013).

However, although myriad studies have shed light on the impact of anxieties on L2 test performance, only limited attention has been directed to the relationships among the anxieties in the three perspectives and their respective and collective effects on L2 performance and most, if not all, has focused exclusively on the context of L2 learning rather than that of L2 assessment. For instance, MacIntyre and Gardner (1989) recruited French learners to respond to different anxiety scales and discovered that trait anxiety, test anxiety, and state anxiety loaded on the same latent construct (i.e., general anxiety), which as such implied substantial correlations among these three anxiety variables. MacIntyre and Gardner (1991b) administered 23 scales to explore different forms of anxieties that French learners endured and found trait anxiety and test anxiety to load strongly on the construct of social evaluation anxiety, a finding that similarly alluded to a strong correlation between the two anxieties. Chiang (2010) examined student interpreters’ trait anxiety and language anxiety and revealed that the two anxiety factors shared a significantly direct relationship ( $r = 0.34$ ). Onem (2010) targeted Turkish EFL learners and evaluated the interrelationships among their trait anxiety, state anxiety, language anxiety, and test anxiety. The correlation analyses disclosed a statistically significant association for all of the pair-wise relationships among these four forms of anxiety reactions. Salehi and Marefat (2014) evaluated the relationship between language anxiety and test anxiety as well as their respective influences on L2 learning achievement, further confirming the positive relationship between language anxiety and test anxiety ( $r = 0.69$ ). Cakici (2016) investigated the relationship among language anxiety, test anxiety, and L2 learning achievement and found the two forms of anxiety reactions to correlate significantly and positively with each other ( $r = 0.61$ ). Nonetheless, a closer perusal of these studies shows that they all revolved around the L2 learning context and centered on the non-directional relationships among the chosen anxiety variables.

## 2.2. Anxiety as a source of construct-irrelevant variance

Validity constitutes the most salient consideration in test construction and evaluation and, according to Messick (1995), two sources of threat might lead to its attenuation: construct under-representation and construct-irrelevant variance (CIV). As he further made clear, the former comes to present itself when a test “fails to include important dimensions or facets of the construct,” while the latter involves “excess reliable variance associated with other distinct constructs... that affects responses in a manner irrelevant to the interpreted construct” (p. 742). As claimed by testing scholars (e.g., Haladyna & Downing, 2004), anxiety represents one source of CIV; namely, the presence of anxiety might compromise “the accuracy of test score interpretations, the legitimacy of decisions made on the basis on test scores, and the validity evidence for tests” (Downing, 2002, p. 236). The socio-cognitive framework for validating L2 speaking tests advanced by Weir (2005) also serves to complement this theoretical claim. That is, by including as one of its components test-taker characteristics that subsume anxiety as a key test-taker attribute, this framework has explicitly attached importance to attending to the role of anxiety for the research efforts

Download English Version:

<https://daneshyari.com/en/article/6844401>

Download Persian Version:

<https://daneshyari.com/article/6844401>

[Daneshyari.com](https://daneshyari.com)