MOTIVATIONAL AND CULTURAL CORRELATES OF SECOND LANGUAGE ACQUISITION
AN INVESTIGATION OF INTERNATIONAL STUDENTS IN THE UNIVERSITIES OF THE PEOPLE’S REPUBLIC OF CHINA

Baohua Yu, The University of Hong Kong
Baohua Yu obtained her PhD in the Faculty of Education at the University of Hong Kong. Her major fields of research are applied linguistics, cross-cultural psychology and second language acquisition.
Correspondence to Baohua Yu: lucyybh2@graduate.hku.hk

David A. Watkins, The University of Hong Kong
David Watkins is a professor in the Faculty of Education at the University of Hong Kong. His major interests of research are cross-cultural investigations of student learning, motivation and competition, conceptions of teaching and self-concept. He is the co-editor of five books and the author of over 220 articles in internationally recognised education and psychology journals and 35 book chapters.
Correspondence to David A. Watkins: hrfewda@hku.hk

The present study investigates the relationships among motivational factors, cultural correlates and second language proficiency. The participants, from both Western and Asian backgrounds, were learning Chinese at university level in the People’s Republic of China. 115 students (35 Western students and 80 Asian students) ranging from beginning to advanced levels of proficiency were surveyed.

The results of the study indicated that the degree of integrativeness into Chinese culture and motivation was significantly and positively related to Chinese language proficiency, while language anxiety was significantly and negatively correlated to such proficiency. However instrumental orientation was found to have no statistically significant relationship with such proficiency. Multiple regression analysis indicated that integrativeness and gender were major variables predicting Chinese language proficiency. Significant differences between Western and Asian student groups were found in terms of motivational variables and Chinese language proficiency. Compared with the Asian student group, the Western student group tended to perform better in spoken Chinese proficiency as evaluated by their teachers and seemed to have higher levels of motivation and integrativeness but lower levels of instrumental orientation and language anxiety. Recommendations are made to enhance motivation and second language acquisition.
INTRODUCTION

The Chinese language is increasingly recognised globally as an important language because of its deep cultural value and great commercial potential, and the number of international students coming to China is increasing tremendously with a double digit annual increase.¹ According to statistics provided by the Ministry of Education of the People’s Republic of China, the number of overseas students increased from 44,711 in 1999 to 195,503 in 2007.

Motivation in second language acquisition has been widely studied in Western culture (see Gardner & MacIntyre, 1993; Lambert, 1955; Sanz, 2000) for nearly 50 years, whereas such literature is largely absent in non-Western cultures. In China, research into motivation in second language acquisition was first studied in the early 21st century, and mainly focused on Chinese university students learning English in China. This study is an initial attempt to investigate international students’ Chinese language acquisition from the perspective of motivation.

LITERATURE REVIEW

Educators, teachers and parents in both Western and non-Western countries have long considered that motivation is a key to successful academic performance. In particular, Dörnyei (2001) and Oxford & Ehrman (1992) have proposed that learners’ attitudes and motivation are important for increased competence and second language proficiency.

Motivation has been widely investigated in the context of second language acquisition in Canada, based on the theoretical foundation laid by Gardner & Lambert (1959). Researchers have addressed a variety of issues from the nature of motives (or orientations) (Clément & Kruidenier, 1983), to a complex of effort, desire, and affect in learning a language (Gardner, 1985), and to expectancy, attributions, valence, and goal setting (Dörnyei, 1998; Tremblay & Gardner, 1995) in second language acquisition.

In the Western psychological literature, motivational theories have been studied for over 60 years (see Pintrich, 2003, for a recent review of the area), but much of the research conducted in non-Western cultures has shown that Western theorising in this area might not be appropriate for non-Western cultures (Ho, 1986; Salili, 1996; Yang & Yu, 1988; Yu, 1996). The current research attempts to study the motivation for second language acquisition of international students coming to learn Chinese at universities in the People’s Republic of China (PRC).
After reviewing relevant research on individual differences in second language acquisition, Clément & Gardner (2001) proposed three groups of salient individual difference variables: cognitive variables such as language aptitude (Cenoz & Valencia, 1994; Krashen, 1988; Segalowitz, 1997; Skehan, 1998) and language learning strategies (Green & Oxford, 1995; Oxford, 1993; Takeuchi, 1993); personality variables such as field dependence / independence (Hansen-Strain, 1992), linguistic self-confidence (Noels, Pon, & Clément, 1996) and language anxiety (Horwitz & Young, 1991); and affective variables such as attitudes and motivation (Cenoz & Valencia, 1994; Gardner, 1985; Gardner & MacIntyre, 1993; Lambert, 1955; Sanz, 2000). According to Gardner (1985), these affective variables can be grouped into three subclasses: integrativeness, attitudes toward the learning situation, and motivation. Other important individual differences that have been identified in the research include general factors such as gender (Coleman, 1996; Green & Oxford, 1995). Although research results on gender differences vary, gender differences have been found in subjects’ performance in various language-related cognitive tasks (Janowsky, Chavez, Zamboli & Orwoll, 1998). In a more recent study, Andreou et al. (2005) found that female students performed better than male students in syntax and semantics in second language learning. It has been widely accepted that females are more verbally fluent than males due to their superiority over males with respect to hemispheric specialisation for language functions (Andreou et al., 2005).

Oxford (1984) suggested that motivation was one of the most important affective factors because it helped determine the extent of involvement in learning. Dörnyei (1998) agreed, proposing that learners without sufficient motivation would not succeed in the long process of learning a second language even if their language aptitude and intelligence levels were high.

The Socio-Educational Model of second language acquisition (Gardner, 2000) posits that integrativeness has a direct effect on motivation, which in turn has a direct effect on language achievement. In studying the relationship between attitude/motivation and achievement in second language acquisition, Gardner & Lambert (1959) identified two motivational orientations: integrative orientation and instrumental orientation. The former refers to the desire to learn a second language in order to have contact and identify with members of the second language community, while the latter refers to an individual learning a second language in order to achieve practical goals such as academic goals or job advancement. Gardner & Lambert (1959; 1972) proposed in their early studies that the integrative orientation would be a better predictor of proficiency
than instrumental orientation because with the former, the second language learner’s ultimate goal is not only to attain language competence but also to achieve “psychological integration” with the target culture. However, Gardner & MacIntyre (1991) claimed in their later studies that instrumental orientation also facilitated second language learning, and integrative orientation might not necessarily be more salient than instrumental orientation. Learners who are integratively motivated, however, are probably more successful at an advanced language level than those who are not, mainly due to the fact that psychological integration may sustain one’s interest and desire to learn the language longer (Dörnyei, 1990; Gardner, 1985). However, other studies simply failed to find any relationship between the two types of orientations and second language proficiency (Lee, 1998; Yashima, 2000).

Another important affective psychological construct proposed in the model by Gardner, Tremblay & Masgoret (1997) is language anxiety, which they found to be a negative determinant of success in second language acquisition (MacIntyre & Gardner, 1991). Earlier, Alpert & Haber (1960) had argued that learning and performance could be affected by both facilitative and debilitative anxiety, and they had proposed that when anxiety was helpful for performance, it be called “facilitative”, and when it hinders performance it be known as “debilitative”. The latest research has produced a series of conflicting results, but these have been attributed to the use of different foreign language anxiety measures and a lack of attention in specifying what kind of language anxiety was being measured (Horwitz, 2001). However, Gardner and his colleagues have consistently found language anxiety and language learning to be negatively correlated, and that anxiety could be considered relatively debilitative (e.g. MacIntyre & Gardner, 1991). In addition, Gardner & MacIntyre (1993) found that language anxiety and motivation had a reciprocally causal relationship. The present study adopts Gardner’s definition of language anxiety, which reflects the individual’s apprehension when using a second language in classroom or non-classroom contexts.

LANGUAGE DISTANCE AND CULTURAL DISTANCE FOR CHINESE LANGUAGE ACQUISITION

Compared to widely taught second languages like English, French and Spanish, Chinese has been regarded as a Less Commonly Taught Language (LCTL) in the United States (Wen, 1997), and learning such a language can produce strong negative affective reactions from the students which may hinder their learning motivation (Samimy & Tabuse, 1992). This may explain to some degree why Chinese courses are said to have low student retention rates at universities in the United States. In addition, the demanding nature of
learning Chinese, with students having to face new challenges like mastering the four tones, calligraphy and grammar, may reduce students’ motivation to learn the language.

The students in the present study were divided into two groups, Western and Asian, on the basis of how distant or similar their mother tongues and the educational philosophy of their culture were to the Chinese language and educational philosophy in China. The relative degree of differences between the target language and mother tongue is referred to as language distance, and this may affect the degree of success of language learning (Elder & Davies, 1998). For example, comparing the amount of time that Spanish students spent studying English with the time spent by Arab students, Odlin (1989) proposed that language similarity conferred an advantage to the Spanish over the Arab students in English vocabulary acquisition. He also suggested that language distance might determine how much time students would need to spend in order to achieve high proficiency in a second language. Moreover, Rutherford (1983) studied adult ESL students at the University of Southern California, and concluded that the effect of language distance was more demonstrable in communicative tasks, a finding that was supported by Ringbom (1987).

Based on Anttila's genetic classification of languages (1972), the two language groups in this study involve one from the Indo-European language family and one from the Sino-Tibetan language family. We call these two language groups the “Western” student group and the “Asian” student group. The “Western” student group comprised language learners from English-speaking countries, such as Australia, America, England and learners from Western European countries. The languages in all those countries, together with English, belong to the Indo-European language family, and thus share a number of grammatical (for example, inflection for number and tense, and subject-predicate sentence structure), phonological and lexical features. The “Asian” student group was composed of students from East Asian countries such as Korea and Japan, whose languages belong to the Altaic language family and have a number of similar linguistic features to Chinese, which belongs to the Sino-Tibetan family. For example, the writing systems of Korea and Japan are partly based on Chinese characters, although they both have their own writing systems.

Another factor which may affect language learning is the culture of the language classroom. Many Western teachers, for example, try to involve students in class activities which encourage pupil talk and interaction (Jin & Cortazzi, 1998). However, large class sizes in China and in most East Asian countries are seen as a constraint on this teaching method. Also, beliefs in authority, teacher-centred classroom teaching and passive learning, which are three major characteristics of classrooms in Asian countries (Watkins & Biggs, 1996), may hinder effective language learning in these countries.
From a cross-cultural perspective, it can be argued that Western students may find it more difficult to learn Chinese than East Asian students, no matter how advanced their language aptitude is, or how well they have acquired other foreign languages. This is because of the natural distance learners feel between native and target cultures, and this may have a negative effect on their language learning (Svanes, 1987). In other words, cultural distance is also an important factor in the course of second language acquisition. This is particularly the case when members of a cultural minority group feel it necessary to cling to their own culture and limit their interest in the target language culture or their contact with native speakers of the target language, because it may be viewed as a threat to the individual’s ethnic identity. Svanes’ (1987) study indicated that variables such as identity and social-cultural distance are important in motivational studies in second language contexts. In Svanes’ (1987) experimental study with European, American, Middle Eastern, African, and Asian students who were studying Norwegian in Norway, a weak positive correlation was found between integrative motivation and the level of language proficiency, and a negative correlation was found between instrumental motivation and grades. The results indicated that the motivation variables alone explained very little of the variance in language proficiency. Meanwhile, Svanes (1987) found that Europeans ranked the best, while Asians ranked the poorest, in Norwegian proficiency, and he also claimed that the best predictor of variance in groups of students with differing language and cultural backgrounds was cultural distance. The review of Oyserman, Coon & Kemmelmeier (2002) also highlights similarities between cultural characteristics of East Asian countries compared to those of Western countries.

**METHOD**

Based on the previous work of the first author (Yu, 2005), this study was conducted to achieve a three-fold purpose: to explore the relationships among motivational variables, cultural and background variables, and Chinese language proficiency; to test the motivation differences in terms of background variables and to compare differences between the Western and Asian students in Chinese language proficiency; and to explore potential variables which could predict Chinese language proficiency.

**PARTICIPANTS**

The participants of this study were international students from two universities in Nanjing, Jiangsu province in the PRC. Of the 127 international students sampled, 118 completed and returned the survey questionnaires, and the 91% response rate was very acceptable.
Responses from three students not fitting into either the Western or Asian student groupings were discarded from the sample.

The Western student group included 35 students from English-speaking or European countries, and the Asian student group included 80 students, mainly from East Asian countries. It should be noted that the Asian student group comprised about 70% of the whole sample. That percentage is consistent with the statistics released by the Ministry of Education of the People’s Republic of China in the same year: Asian international students account for 76% of the international student body in 2005.

Since the data was collected in the second academic semester, the students sampled had been studying Chinese for at least six months. The sample was composed of 37 students in year one of their studies, 24 students in year two, 25 students in year three, and 29 students in year four. The majority of the participants were female (72.2%), from Asian countries (69.6%), and aged between 20 and 30 (69.6%). Four students did not indicate their ages. Just under half had been in China less than one year (43.5%), with only a few (7%) for more than four years. In terms of the differences between the students’ own cultural backgrounds and Chinese culture, a small number ranked “similar” or “very similar” (18%), and a relatively larger number responded “different” or “very different” (42%).

INSTRUMENTS

The survey questionnaire had two major sections. The first part sought background information such as age and gender, and country of origin. Respondents were also asked how long they had been in China, and how long they had been studying Chinese before and after they came to China to study the language. Participants were also asked to rank cultural distance (how similar or different they thought their own cultural backgrounds were to Chinese culture) on a 5-point Likert scale from 1 (very different) to 5 (very similar).

The second part of the questionnaire was mostly based on the Attitudes/Motivation Test Battery (AMTB) (Gardner, Tremblay & Masgoret, 1997) designed for university students. There are seventy-four items in this questionnaire to be answered on a 5-point Likert scale from 1 (strongly disagree) to 5 (strongly agree). The AMTB included four scales (motivation, integrativeness, instrumental orientation and language anxiety), which were modified so as to be applicable to individuals who were currently studying Chinese in China.
The Chinese language proficiency of the student was obtained from their teachers. Since the objective examination scores of students were confidential in the universities where the data were collected, the researchers had to distribute language evaluation sheets to the teachers for each of the students involved in the study. All the teachers were Chinese language experts who held either a bachelor’s degree, a master’s degree or a doctorate in Chinese language teaching. A 30-minute training exercise in marking was given to the teachers. The students’ teachers were asked to evaluate their students’ current Chinese language proficiency in terms of listening, speaking, reading, writing and overall proficiency on a four-point Likert scale from 1 (poor) to 4 (excellent), based on the students’ objective examination scores. In order to be consistent with the marking system in China, specific marks were assigned to the above four-point scale: 1 = poor (below 60), 2 = moderate (between 60 and 75 or equal to 60 or 75), 3 = good (between 75 and 85 or equal to 85), 4 = excellent (above 85).

Due to the variation in the students’ language proficiency in Chinese, the English version of the questionnaire was attached with the Chinese version so that students would be able to understand the questionnaire. The validity of the scales used in this study was tested by expert-judge validity. The whole questionnaire was reviewed and checked by two specialists in the field of psychology and two experts in the field of language. Culturally inappropriate wording and ambiguous statements were modified before use. Moreover, two experienced Chinese teachers of English back-translated the items to ensure equivalence of the Chinese and English versions.

**PROCEDURE**

The questionnaires were distributed to the students by their Chinese course teachers during regular classes. Students were asked to give their immediate reactions to the questions, and to be as truthful as possible. Confidentiality was assured by using the students’ university enrolment numbers. For the purposes of this study, three sets of hypotheses were posited and corresponding statistical analyses were undertaken to test them.

**HYPOTHESES SET 1**

Motivation, integrativeness, and instrumental orientation will all have significantly positive relationships with Chinese language proficiency, while language anxiety will be significantly and negatively correlated with Chinese language proficiency. Motivation will have a stronger relationship with Chinese language proficiency than integrativeness.
Cultural distance will be significantly and positively correlated to Chinese language proficiency.

**Method:** The Pearson Product-Moment and Spearman’s rank order correlations were used to assess the relationships between motivational and background variables and Chinese language proficiency.

**HYPOTHESES SET 2**

Students at different stages of their Chinese course will display different levels of motivation, integrativeness, instrumental orientation and language anxiety. The Asian student groups’ Chinese language proficiency will be rated more highly by their teachers than that of the Western student group.

**Method:** Multivariate analysis of variance (MANOVA) was conducted to test the differences of motivational variables and Chinese language proficiency.

**HYPOTHESES SET 3**

The motivational factors (motivation, integrativeness, instrumental orientation and language anxiety) will have a bearing on Chinese language proficiency. Cultural factors will also contribute to Chinese language proficiency.

**Method:** A simultaneous multiple regression analysis was conducted to identify significant predictors for second language proficiency. All significantly related variables including motivational variables, cultural variables and background variables will be included in the predictors (independent variables).

**RESULTS**

**RELIABILITY**

Alpha coefficients above 0.70 are regarded as sufficient and above 0.50 as acceptable for exploratory research for research purposes at group level (Nunnally, 1978). The alpha coefficients of the great majority of the survey scales were very adequate for this student sample (see Table 1).

The Cronbach’s alpha coefficient of instrumental orientation was 0.53, which appeared rather low but acceptable in an exploratory study such as this. It should be noted that there are only four items in this subscale.
Table 1 Internal reliability of the scales, and means and standard deviations of the variables

<table>
<thead>
<tr>
<th></th>
<th>Cronbach’s Alpha</th>
<th>Mean</th>
<th>Std. Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Motivation</td>
<td>0.88</td>
<td>3.76</td>
<td>.48</td>
</tr>
<tr>
<td>Integrativeness</td>
<td>0.83</td>
<td>3.91</td>
<td>.49</td>
</tr>
<tr>
<td>Instrumental orientation</td>
<td>0.53</td>
<td>3.64</td>
<td>.65</td>
</tr>
<tr>
<td>Language anxiety</td>
<td>0.76</td>
<td>2.79</td>
<td>.47</td>
</tr>
<tr>
<td>Chinese language proficiency</td>
<td>0.88</td>
<td>2.76</td>
<td>.81</td>
</tr>
</tbody>
</table>

Table 1 Internal reliability of the scales, and means and standard deviations of the variables

**HYPOTHESES SET 1**

**CORRELATIONS AMONG MOTIVATIONAL VARIABLES AND CHINESE LANGUAGE PROFICIENCY**

Pearson product-moment correlations were undertaken and the results were shown as follows:

Table 2 Correlation matrix of motivational scales and Chinese language proficiency

<table>
<thead>
<tr>
<th></th>
<th>Motivation</th>
<th>Integrativeness</th>
<th>Instrumental orientation</th>
<th>Language anxiety</th>
</tr>
</thead>
<tbody>
<tr>
<td>Motivation</td>
<td>1.00</td>
<td>.65**</td>
<td>.02</td>
<td>-.26**</td>
</tr>
<tr>
<td>Integrativeness</td>
<td>.65**</td>
<td>1.00</td>
<td>-.02</td>
<td>.42**</td>
</tr>
<tr>
<td>Instrumental orientation</td>
<td>.02</td>
<td>-.02</td>
<td>1.00</td>
<td>.15</td>
</tr>
<tr>
<td>Language anxiety</td>
<td>-.26**</td>
<td>.42**</td>
<td>.15</td>
<td>1.00</td>
</tr>
<tr>
<td>Chinese language proficiency</td>
<td>.30**</td>
<td>.32**</td>
<td>.10</td>
<td>-.27**</td>
</tr>
</tbody>
</table>

Table 2 Correlation matrix of motivational scales and Chinese language proficiency

Note: * p<0.05 ** p<0.01 (1-tailed)

In accordance with our expectations, Chinese language proficiency was found to be significantly and positively correlated with motivation (r=.30, p<0.01) and integrativeness (r=.32, p<0.01) but negatively significantly correlated with language anxiety (r= -.27, p<0.01). Inconsistent with our expectation, motivation was found to have a lower correlation with Chinese language proficiency than integrativeness, and instrumental orientation had no statistically significant relationship with Chinese language proficiency.

**BACKGROUND VARIABLES AND CHINESE LANGUAGE PROFICIENCY**

Correlations between seven background variables and Chinese language proficiency were analysed by the Pearson product-moment and Spearman’s rank order correlations. The results are summarised as follows.
Among the background variables, only gender was found to be positively correlated with Chinese language proficiency ($r = .20, p<0.05$), which is in accordance with our hypothesis. Further analysis by ANOVA indicated that the female students showed statistically better overall Chinese language proficiency than the male students ($p<0.05$), but cultural distance seemed to have no significant relationship with Chinese language proficiency.

Hypothesis 1 was therefore partially supported.

**HYPOTHESES SET 2**

**DIFFERENCES IN MOTIVATIONAL VARIABLES AND CHINESE LANGUAGE PROFICIENCY**

MANOVA was performed to test whether there were differences in the four motivational variables (motivation, integrativeness, instrumental orientation and language anxiety) in terms of the background variables. The main findings are summarised below:

(1) Significant differences between male and female students were found in instrumental orientation ($p<0.01$), and male students (Mean=3.92) reported a higher degree of instrumental orientation than female students (Mean=3.53).

(2) In terms of differences in student groups, the Western student group showed significant differences from the Asian student group in motivation ($p<0.01$), integrativeness ($p<0.001$), instrumental orientation ($p<0.05$) and language anxiety ($p<0.001$). A comparison of the means of those variables showed that the Western student group scored higher on motivation and integrativeness than the Asian student group, but lower on instrumental orientation and language anxiety (see Table 3):

<table>
<thead>
<tr>
<th></th>
<th>Asian group</th>
<th>Western group</th>
<th>Significance level</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>M</td>
<td>SD</td>
<td>M</td>
</tr>
<tr>
<td>Motivation</td>
<td>3.67</td>
<td>.46</td>
<td>3.96</td>
</tr>
<tr>
<td>Integrativeness</td>
<td>3.74</td>
<td>.41</td>
<td>4.28</td>
</tr>
<tr>
<td>Instrumental orientation</td>
<td>3.72</td>
<td>.53</td>
<td>3.44</td>
</tr>
<tr>
<td>Language anxiety</td>
<td>2.90</td>
<td>.38</td>
<td>2.54</td>
</tr>
</tbody>
</table>

*Table 3* The motivational differences between the Western and the Asian student groups

(3) In terms of cultural distance, differences were found in language anxiety ($p<0.05$). There was a general trend that the closer the sampled students perceived their cultures
were to Chinese culture, the more language anxiety they had. However, five students who perceived their cultures as “very similar” to the Chinese culture reported little language anxiety, at a level close to that of those students who perceived their culture as “very different” (see Table 4):

<table>
<thead>
<tr>
<th>Variable</th>
<th>very different</th>
<th>different</th>
<th>hard to distinguish</th>
<th>similar</th>
<th>very similar</th>
<th>Sig. level</th>
</tr>
</thead>
<tbody>
<tr>
<td>Language anxiety</td>
<td>2.48 .53</td>
<td>2.74 .50</td>
<td>2.89 .42</td>
<td>2.95 .35</td>
<td>2.56 .39</td>
<td>P&lt;0.05</td>
</tr>
</tbody>
</table>

Table 4 Differences in language anxiety by perceived cultural distances

(4) In terms of years in China, differences were found in integrativeness (p<0.01) and language anxiety (p<0.05). Integrativeness (see Figure 1) started high in year 1 (Mean=4.05), but reached the lowest value in year 2 (Mean=3.69), and then increased continuously from year 3 (Mean=3.72) to year 4 (Mean=3.91) reaching a peak in year 4 plus (Mean=4.08). Language anxiety of the student sample (see Figure 2) was rather high in year 1 (Mean=2.71), continued to rise through year 2 (Mean=2.92), reached a peak in year 3 (Mean=3.02), but decreased sharply through year 4 (Mean=2.70), and reached the lowest value in year 4 plus (Mean=2.46).
In terms of years of studying Chinese, differences were found in language anxiety (p<0.05). Language anxiety in the student sample (see Figure 3) was rather high in year 1 (Mean=2.83), reached a peak in year 2 (Mean=2.98), but decreased steadily through year 3 (Mean=2.79) and year 4 (Mean=2.59), and then increased a little in year 4 plus (Mean=2.64).
MANOVA was conducted to discover the differences between the Western and the Asian student groups from the perspectives of their current spoken, listening, reading, writing and overall Chinese proficiency as assessed by their teachers. Surprisingly, significant differences were found in spoken Chinese proficiency. The Western student group were reported a much better spoken Chinese proficiency than the Asian student group (p<0.05) (see Table 5).

<table>
<thead>
<tr>
<th></th>
<th>Asian Group</th>
<th></th>
<th>Western Group</th>
<th></th>
<th>Significance level</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>M</td>
<td>SD</td>
<td>M</td>
<td>SD</td>
<td></td>
</tr>
<tr>
<td>Spoken Chinese proficiency</td>
<td>2.69</td>
<td>.89</td>
<td>3.08</td>
<td>.65</td>
<td>P&lt; 0.05</td>
</tr>
</tbody>
</table>

Table 5 Cultural group differences in Chinese language proficiency

Hypothesis 2 was therefore mostly confirmed.

**HYPOTHESES SET 3**

**MULTIPLE REGRESSION ANALYSIS**

A simultaneous multiple regression analysis was conducted to determine how well the different factors could predict Chinese language proficiency. All significantly correlated variables found in the above analysis were entered in the model. Thus, in stepwise multiple regression, the independent variables were motivation, integrativeness, language anxiety and gender, and the dependent variable was Chinese language proficiency (see Table 6):

<table>
<thead>
<tr>
<th>Predictors</th>
<th>Raw B</th>
<th>β</th>
<th>Significance level</th>
</tr>
</thead>
<tbody>
<tr>
<td>Integrativeness</td>
<td>.57</td>
<td>.33</td>
<td>.01</td>
</tr>
<tr>
<td>Gender</td>
<td>.37</td>
<td>.21</td>
<td>.05</td>
</tr>
</tbody>
</table>

Table 6 Results of multiple regression analyses
Note: Dependent Variable: Chinese language proficiency * p<0.05 ** p<0.01

As shown in above table, two variables of the sample together explained 14.8% of the variance in Chinese language proficiency (R²(6,973) =.148, p< .000). Integrativeness and gender contributed to the prediction of Chinese language proficiency (β=.33, p<0.01 and β=.21, p<0.05). Cultural correlates seemed not to be an important predictor of Chinese language proficiency.

Hypothesis set 3, therefore, was partially confirmed.
DISCUSSION

MOTIVATIONAL VARIABLES AND SECOND LANGUAGE ACQUISITION

Motivation was found to be significantly and positively correlated with Chinese language proficiency, which is in line with Oxford (1984) and Dörnyei (1998). In addition, in line with Gardner’s (2000) Socio-Educational Model, this study found that integrativeness had a significant positive correlation with Chinese language proficiency.

Moreover, integrativeness was found to have a significant positive and moderate correlation with Chinese language proficiency ($r = 0.32$), with a slightly higher size of correlation than motivation ($r = 0.30$). This finding may suggest that integrativeness may be directly responsible for Chinese language proficiency. Such a finding partly supports Gardner’s (2000) model, which proposes that integrativeness affects language achievement through motivation.

Furthermore, the relationship between language anxiety and Chinese language proficiency was found to be statistically significant and negative in this study, which is consistent with previous research (e.g. MacIntyre & Gardner, 1991).

However, no significant correlation was found between integrative orientation and Chinese language proficiency. This is not consistent with the findings of either Gardner & Lambert (1959; 1972) or Gardner & MacIntyre (1991), who claimed that both integrative and instrumental orientations facilitated second language acquisition. A possible interpretation for these seemingly inconsistent findings is that learning Chinese, known as a Less Commonly Taught Language (Wen, 1997), requires strong commitment and effort. According to Samimy & Tabuse (1992), students may become less motivated while studying Chinese because of negative affective reactions during the learning process. The students sampled may not have anticipated the difficulties that they would have to overcome, or may not have been psychologically prepared for the high demands of the Chinese language courses.

The Asian students were supposed to have an advantage over the Western students in learning Chinese, given that their first languages were linguistically closer to Chinese than were those of the Western students, and thus were considered likely to achieve a higher level of proficiency in Chinese. Surprisingly, however, the results showed that the Western students achieved greater proficiency in spoken Chinese than the Asian students. Moreover, the Western students tended to have more integrativeness and motivation, but less instrumental orientation and language anxiety than the Asian students.

Motivational differences between the two groups of students may to some extent have been partly responsible for the differences in their Chinese language proficiency.
Instrumental orientation may facilitate language learning in the early stages because students with a clear aim in mind are highly instrumentally motivated, while the role of integrativeness will become dominant in a long run because it helps students sustain their motivation and interest in learning the language. The Western students in the study were willing to integrate into social and academic life, which in turn enhanced their Chinese language proficiency. Consequently, this positive outcome led to more integrativeness on the part of the students, which facilitated their language learning even more. In other words, it seems that integrativeness accounts for language proficiency more than does instrumental orientation in motivating students in the process of their second language acquisition. The above findings are consistent with previous findings by Dörnyei (1990), who proposed that learners who are integratively motivated might sustain their interest and desire in learning the language longer than those who are instrumentally motivated.

Furthermore, cultural distances between East and West stood out as factors associated with different levels of language proficiency. In the examination of cultural distances between the Asian and the Western student groups, the dimension of individualism / collectivism is a useful starting point, as it differentiates countries like the USA and Australia (scoring high on individualism) from most Asian countries (scoring high on collectivism) (Hofstede & Vunderink, 1994). Svanes (1987) claimed that learners’ perceptions of distance between native and target cultures seemed to have an impact on their language attainment: the greater the cultural distance, the poorer the language proficiency, and thus the more the language anxiety. The results of this study (see Table 4) suggested a general trend that the greater the distance that students reported between the culture of their countries and Chinese culture, the less language anxiety they seemed to have. However, there were exceptions: those students who chose “very similar” on the scale of cultural distance had very little language anxiety, quite similar in fact to those students who chose “very different”. It should be noted that there were only five students in the sample who chose “very similar”, too few to warrant any conclusion.

Our findings seemed to be opposite to Svanes’ (1987), who found that the greater the cultural distance, the greater the language anxiety, and thus the poorer the language proficiency. One possible reason may be that interpersonal relationships are one of the major stressors for overseas students (Jou & Fukada, 1996). Face-saving strategies (Ting-Toomey, 2005) may be another reason. When the differences in the language anxiety of the Western student group and the Asian student group were examined, it was found that the Asian student group tended to have a much higher level of language anxiety than the Western student group (see Table 3). It could be that the Western student group had been more open and more willing to communicate orally with the host community,
so that they were able to establish better interpersonal relationships, and to involve themselves in daily conversation and activities, which in turn enhanced their oral Chinese. The Asian student group, in contrast, might observe the tradition of saving face, and reluctant to speak the foreign language in front of their teachers and classmates until they were fully confident of their ability to pronounce the words or produce sentences correctly.

Differences in the variables of years in China, and years of studying Chinese, indicated that there was a general increase in integrativeness over time, but there also appeared to be an abrupt decrease in the intermediate stage: the student sample demonstrated the least integrativeness in year 2. Similarly, there was a general decrease in language anxiety as students progressed to higher levels, but it rose abruptly to a peak in year 2 and year 3 (the intermediate years of the course). It may be that when students reach the intermediate stage of a language program, they encounter “language shock”, which causes them to experience more language anxiety and less integrativeness, especially when they are acquiring a Less Commonly Taught Language such as Chinese (Samimy & Tabuse, 1992).

However, the current study was cross-sectional in nature, and a longitudinal study, with a larger sample size, is necessary before more definitive conclusions can be made about the stages of studying Chinese.

**PREDICTORS OF SECOND LANGUAGE PROFICIENCY**

Integrativeness and gender turned out to be the best predictors of second language proficiency. The female students were reported to have better overall Chinese language proficiency than the male students, which confirmed the findings of Andreou et al. (2005). However, our results did not agree with Svanes' findings (1987), which indicated that among groups of students with different languages and cultures, cultural distance seemed to the best predictor, while motivational variables explained very little of the variable of language proficiency. We propose that motivational variables cooperate with cultural correlates in the process of second language acquisition for foreign students with different ethnicity in the context of China, with the former playing a relatively more important role in acquiring a second language.
IMPLICATIONS

PRACTICAL TEACHING IMPLICATIONS
Motivational variables play important roles in second language acquisition. Integrativeness, for example, encourages or stimulates students to sustain their interest in, and desire to learn, the language which is the most essential and important factor for a student when beginning to learn a second language. Teachers should therefore help students to become integratively motivated in both in-classroom and outside-classroom activities.

At the same time, being praised for how well they are doing, or being able to see some achievement, will help build up students’ confidence and make them more interested in learning the language. Chinese universities may introduce orientation programs at the beginning for new students. Also, since the intermediate stage of being in China and studying Chinese was found to be a very critical transition period for students in this study, it is suggested that universities should set up counselling programs, frequent induction programs and even arrange for some experienced teachers to help students to be both psychologically prepared.

The Western student group in this study outperformed the Asian student group in spoken Chinese, and this might have been partly due to the face-saving strategies of the Asian students, perhaps closely related with language anxiety, which prevented them from practising Chinese every day. Teachers of Chinese should be made aware of this characteristic of Asian students, so that they can employ strategies to encourage Asian students to be more adventurous in practising the language.

LIMITATIONS
There are a number of limitations to this research that need to be addressed when reading the findings and discussion.

First, the research study mainly focused on international students from different ethnic backgrounds. The survey questionnaire is in both English and Chinese, but participants from Asian countries like Korea or Japan may not be good at English. It is crucial for the research to make sure Asian students have no problems in understanding the questionnaire even if they are free to choose the English version or the Chinese version or both. However, it was impossible to test the English competence of Asian students. There are several ways to resolve this problem: First, ask students whether they can understand the questionnaire or not. Second, give some instructions while they are responding to the survey. Third, make interpreters available, whose telephone numbers can be given to those respondents who have difficulty in understanding the survey.
Second, there is a limitation of naturalistic design. In common with much educational research, a completely random sample was not obtainable because the researcher had to have the cooperation of principals, teachers and students in order to gain access to the schools of the students who were surveyed. The approach utilised in this paper can only test the consequences of the assumed causal relationships among the studied variables.

ENDNOTES

1 Correspondence regarding this article should be sent to Baohua Yu at the Faculty of Education, The University of Hong Kong, Pokfulam Road, Hong Kong. E-mail: lucybh2@graduate.hku.hk.

ACKNOWLEDGEMENTS

This study was made possible by a grant from Sik Sik Yuen Education Research Fund. The article is based on a section of a PhD thesis by the first author submitted to the University of Hong Kong under the supervision of the second author and Professor Amy B. M. Tsui, whom the authors would like to thank for her insightful and constructive suggestions.

REFERENCES


17.19  MOTIVATIONAL AND CULTURAL CORRELATES OF SECOND LANGUAGE ACQUISITION ARTICLES


