

On the Effects of L2 on Iranian Bilinguals' L1 Writing Ability

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Abstract

While the effects of L₁ on L₂ have been extensively investigated, the effects of L₂ on L₁ have been largely ignored. The present study attempted to address this issue by investigating the effects of L₂ English on Iranian Bilinguals' L₁ writing ability. For this end, 61 participants, 30 bilinguals and 31 monolinguals, were assessed on an essay-writing test in their L₁. The gathered data were analyzed using independent samples t-test in which the t_{obs} (2.37) was higher than the critical value (2.00) at the significance level of 0.05. The bilinguals, as indicated by the results of the independent samples t-test, performed better than the monolinguals on their L₁ writing ability indicating the positive effects bilingualism, here English, could have even on L₁ writing ability, which provides more evidence for cross-linguistic influence.

Keywords: Bilingualism, cross-linguistic influence, monolingualism

1. Introduction

According to the concept of “dual language”, proposed as an alternative to “interlanguage” by Kecskes and Papp (2003) and Kecskes and Cuenca (2005), the two language channels the bilinguals have are in constant interaction and mutually affect one another through their common underlying conceptual system. Therefore, besides focusing on L₁→L₂ effects, research has to focus on L₂→L₁ effects, too (Kecskes, 2008).

Traditionally, however, the ESL/EFL profession was preoccupied with L₁→L₂ effects. The literature on second/foreign language acquisition is, in fact, replete with research studies on L₁→L₂ effects, all discussed as either positive or negative “transfer”. The research in this area led to the development of what came to be known as Contrastive Analysis Hypothesis (CAH). The strong version of the CAH, with its a priori orientation, was an attempt to predict difficulty long before the learning process started (Wardhaugh, 1970). The weak version, on the other hand, had a posteriori orientation and simply recognized the significance of interference across languages but never made any a priori predictions. The weak version of the CAH is what remains today as cross-linguistic influence (CLI) (Odlin, 2003; Kellerman, 1995; Kellerman & Sharwood-Smith 1986) which, according to Brown (2007, p. 252), recognizes “the significant role that prior experience plays in any learning act, and that the influence of the native language as prior experience must not be overlooked”. What the CLI suggests, as Brown further argues, is more a matter of influence than prediction. CLI, however, implies much more than the effect of one's first language on a second; the second language also influences the first (Pavlenko & Jarvis, 2002). Learning other languages, Brown argues, can affect one another in various forms, too. While the effects of one's first language on a second has been extensively investigated, very few research studies have addressed the effects learning a second language can have on the first.

1.1 Statement of the Problem

Research in the past has to a large extent focused on L₁ effects on L₂ acquisition ignoring the effects L₂ could have on bilinguals' L₁. We should note, in considering L₁→L₂ effects, the negative transfer is more dominant in terms of grammatical, lexical and/or phonological errors. This is while in examining L₂→L₁ effects generally positive influences are expected (Kecskes, 2008). L₂→L₁ effects are cognitive and pragmatic rather than syntactical and lexical; and it is only a potentiality rather than a necessity (Kecskes, 2008). In fact, not all kinds of L₂ learning bring about the development of multi-competence. To be able to bring about changes in the monolingual system, the language learning process must be intensive enough, rich in content, and have a high level of learner motivation (Kecskes, 2008).

While research in the past has extensively examined L₁→L₂ effects, the L₂→L₁ effects have been largely overlooked. The present study, then, was an attempt to investigate L₂→L₁ effects on Iranian bilinguals' writing ability. It specifically addressed the question below.

- Does knowledge of an additional language (s) influence the Iranian bilinguals' native language writing ability?

1.2 Significance of the Study

As argued by many researches in the field, cross-linguistic influence goes beyond L₁→L₂ effects and cares for L₂→L₁ effects, too. This is because learning a second/foreign language can undoubtedly influence one's first language abilities, too. Since most research in the past has focused on L₁→L₂ effects and very few research studies have addressed the L₂→L₁ effects, especially in the writing ability area in the Iranian EFL context, this present study is an attempt to add to the literature on cross-linguistic influence.

2. Literature Review

In a review of the research conducted on the impact of second language acquisition on both the students and the society in which they live, Lyseng, Butlin and Nedashkivska (2014) report five areas where second language education has brought considerable changes. These areas and the related studies, as cited by Lyseng, Butlin and Nedashkivska (2014) include

- a. intellectual development (Lambert, 1962; Carroll, 1962; Lambert, 1974; Kessler & Quinn, 1980; Ratté, 1968; Latham, 1998; Black, 1993)
- b. scholastic achievement (Collier, 1995; Cooper, 1987)
- c. effects of learning a second language on the students' first language (Genesse, 1987; Halsall, 1998; Albanese, 1987)
- d. citizenship (Genesse & Cloud, 1998; Curtain & Pesola, 1994)
- e. economic potential (Report of the National Commission on Excellence in Education, 1983, U. S.)

For many years, however, there was a concern that learning a second language may adversely impact the students' acquisition of knowledge and skills in their first language. This was, however, rejected by several studies all reported by Lyseng, Butlin and Nedashkivska (2014). Genesse (1987), for instance, proved immersion programs were helping students to achieve a higher degree of second language proficiency without detrimentally affecting English language skills or overall academic achievement. Halsall (1998) also found that students who learn a second language in kindergarten or grade one perform better than those who learn it at grade four, and much better than those who begin at grade seven. Albanese (1987) showed that second language programs enhance reading skills, English vocabulary, and communication skills. Based on the evidence provided, Lyseng, Butlin and Nedashkivska (2014) conclude that "learning a second language inhibits development of the first language is not only false, but research finds the very opposite to be true (p. 13)."

Marian and Spivey (2003) also believe that knowledge of a second language can affect the ability to manage information in the native language although second language acquisition is considered to be different from first language acquisition. Current bilingual models explicitly posit that the two languages interact, even during language-specific processing (Costa, Caramazza, & Sebastian-Galles, 2000; Dijkstra & van Heuven, 2002).

Cook (2005, p. 52) asserts that "the syntactic processing of people who know another language is no longer the same as monolingual, even if the differences are small and need complex techniques to establish." Cook further argues that there is no doubt the speakers' knowledge of their first language is affected by their knowledge of other languages in different aspects. She reports the following studies to provide support for the bidirectional effects of the different languages present in the minds of people who speak some other languages besides their own native language.

Syntax: Cook, Iarossi, Stellakis and Tokumaru (2003) found that the Japanese who speak English are more likely to prefer plural subjects in the Japanese sentences they use than the Japanese who don't know English.

The lexicon: Laufer (2003) showed that experienced Russian speakers of Hebrew use a less rich vocabulary in Russian than comparative newcomers.

Stylistic complexity: Kecskes and Papp (2000) investigated Hungarian children who had learnt English and found that they used stylistically more complex Hungarian.

Pragmatics: Pavlenko (2003) studied Russian learners of English and found that they began to rely on expressing their emotions as states rather than as process.

Phonology: Flege (1987) examined French users of English and found that they pronounced the /t/ sound in French with a longer Voice Onset Time (VOT) than monolingual French speakers.

Lord (2008) also investigated the effects of L2 acquisition on L1 use by looking at the L1 phonological productions of advanced L2 learners vis-à-vis the production of monolingual speakers of the same language. Lord's study provides tentative support for Flege's Merger Hypothesis (1987, 2005) that the merging of phonetic properties of phones that are similar in the L1 and L2 can potentially impact not only the acquired language but the native one as well. Based on Flege's Merger Hypothesis, Lord proposes that an English speaker with advanced proficiency in Spanish could not only pronounce Spanish with an English characteristics, but will also pronounce English words less "English-like" than a monolingual English speaker would. Lord's study provides tentative evidence for the proposal mentioned above, something which has already been shown for French-English bilinguals (Flege 1987).

Kaushanskaya, Yoo, and Marian (2011) tested English-Spanish and English-Mandarin bilingual adults on their vocabulary knowledge and reading fluency in English, their native language. They found that second language experiences influence native-language performance, and can either facilitate or reduce it depending on the properties of the second language writing system.

Standardized English Language Arts Tests have shown that students involved in second language programs have higher achievement scores (ERIC, 2001). This provides support for Cummins' "interdependence hypothesis" (1984) that states language skills such as those involved in reading comprehension are transferred from one language to another. This transfer can occur across subjects, too, including numeracy, thinking skills.

Bialystock (1997) found advantages for bilingualism in their reading, provided that children are exposed to stories and literacy in both languages. She showed, by the age of four, bilingual children progressed more than monolinguals in understanding the general properties of the symbolic function of written language. By the age of five, they were more advanced than monolinguals and bilinguals who have learnt only one writing system in understanding specific representation properties, even in English.

Kecskes and Tunde (2000) showed the long-term effect of intensive study of a second language on one's first language writing skills with Hungarian students learning a foreign language in a range of different types of programs. Students enrolled in immersion or intensive foreign language courses showed an increase in the syntactic complexity of their first language writing. Gaining proficiency in a second language correlated with their true formation of complex sentence structures in their first language.

3. Method

3.1 Participants

Sixty one Iranian M.A students studying English and Fishery at Islamic Azad University and Gonbad University in Golestan participated in this study. There were 30 people in the Experimental group and 31 in the control group. Iranian students start learning a second language after they are finished with their five-year elementary school. They study English for seven years in the guidance and high school and then at the university. Despite seven years of studying English at school and some general (3 credits) and ESP courses (2 credits) at the university, most of them are weak in English.

Since to be able to bring about changes in the monolingual system, the language learning process must be intensive enough, rich in content, and have a high level of learner motivation (Kecskes, 2008), and, as Cummins (1979) says, students should have attained a certain threshold level of proficiency in the first or second language before one can affect the other, the researchers decided to study M.A students of TEFL and non-TEFL students at Islamic Azad University and Gonbad University in Golestan.

Having studied English in their B.A and M.A programs, TEFL students are supposed to have a high level of both English and Farsi, and non-TEFL students are supposed to have a low level of English but a high level of Farsi as their native language. It's true that non-TEFL students have also studied English, but as discussed above, they are supposed to be too weak to transfer second language abilities to their first language writing ability.

To check the students' level of English, however, the researchers developed a 100-item test adapted from NTC's paper and pencil TOEFL. As expected, TEFL students scored an average of 78 with an SD of 2.5 and the non-TEFL students scored an average of 15 with an SD of 4. Extreme scores in each group were excluded for the sake of homogeneity.

3.2 Instruments and procedures

The participants were asked to write an essay in their native language on a topic assigned by the researcher (Should students be allowed to have cell phones in elementary and high schools?) in an effort to study the effects a second/foreign language can have on their native language writing ability. The essays, then, were rated by two independent raters to see if there was a significant difference between the writing abilities of those who have acquired and use L2 and those who have very limited knowledge of L2 and seldom use it in the Iranian EFL context.

3.3 Data Analysis

Using a holistic approach, the data obtained were rated by two independent readers using SAT essay grading scale (2005), and the scores gained by these two groups, i.e. TEFL and non-TEFL majors, were analyzed using independent-samples t-test to see if there was a significant difference between the performance of these two groups in their essay writing ability or not. Each essay was scored independently by two readers on a scale of 1 to 6, with 6 being the highest score. A correlation was run to make sure of interrater reliability which yielded a coefficient of 0.83.

4. Findings and discussions

As the table below shows, Iranian bilinguals performed better than their monolingual counterparts in their essay writing indicating the positive effects learning English can have on their L1 writing ability. As we can see below t_{obs} (2.37) is higher than the critical value (2.00) at the significance level of 0.05 and we are on the safe side to say that Iranian bilinguals' writing ability has been positively affected by their learning English.

Table 1. Independent samples t-test to compare the performance of bilinguals and monolinguals on their writing ability

		Levene's Test for Equality of Variances		t-test for Equality of Means					95% Confidence Interval of the Difference	
		F	Sig.	T	Df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	Lower	Upper
Subjects	Equal variances assumed	.451	.505	2.374	59	.021	1.017	.429	.160	1.875
	Equal variances not assumed			2.369	57.579	.021	1.017	.429	.157	1.877

This is in line with the findings of Kecskes and Tunde (2000) who showed the long-term effect of intensive study of a second language on one's first language writing skills with Hungarian students learning a foreign language in a range of different types of programs. Students enrolled in immersion or intensive foreign language courses showed an increase in the syntactic complexity of their first language writing. Gaining proficiency in a second language correlated with their true formation of complex sentence structures in their first language.

This is also in line with the findings of Bialystock (1997) who found advantages for bilingualism in their reading, provided that children are exposed to stories and literacy in both languages. She showed, by the age of four, bilingual children progressed more than monolinguals in understanding the general properties of the symbolic function of written language. By the age of five, they were more advanced than monolinguals and bilinguals who have learnt only one writing system in understanding specific representation properties, even in English.

This provides evidence for Cook's argument on multi-competence (2005) that there is no doubt the speakers' knowledge of their first language is affected by their knowledge of other languages in different aspects including the writing ability as shown above. When discussing the unique characteristics of L2 users, Cook (2005) asserts that L2 users' knowledge of their first language is in some respects different from that of a monolingual. This means that "the speakers' knowledge of their first language is undoubtedly influenced by the other languages they learn" (Cook, 2005, p. 52).

Kecskes (1998) also contended that people who speak more than one language have different knowledge of their native language than do monolingual speakers and this difference in native language competence can be justified only by the effects learning additional languages can have on the speakers' native language competence i.e. the two linguistic systems constantly interact and mutually affect one another.

According to Grosjean (1989), a bilingual is not two monolinguals in one body. This, as argued by Kecskes (1998), implies that people who know more than one language have different knowledge of their L1 than do monolingual people. Based on Cook's multi-competence, as discussed above, bilingualism is the compound state of mind with two grammars affecting one another in different ways whether in terms of syntax, lexicon, stylistic complexity, pragmatics, and phonology.

In the same vein, Kecskes (1998), implies that people who know more than one language have different knowledge of their L1 than do monolingual people. This is also in line with Brown's (2007) cross-linguistic influence, according to which learning a second and third language can affect on another in complex ways.

5. Conclusion

The present study was an attempt to investigate the concept of "dual language", proposed as an alternative to "interlanguage" by Kecskes and Papp (2003) and Kecskes and Cuenca (2005), according to which the two language channels the bilinguals have are in constant interaction and mutually affect one another through their common underlying conceptual system. Since most of the studies thus far focused on L1→L2 effects, this study was designed to focus on L2→L1 effects. The results of the study indicated a positive effect of L₂ English on L₁ writing ability as Iranian bilinguals performed better than Iranian monolinguals on an L₁ essay-writing test providing more evidence to the arguments proposed by Cook (2005), Grosjean (1989), Kecskes (1998), Kecskes and Papp (2003) and Kecskes and Cuenca (2005) among many others.

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