Research Article

Iranian EFL Teachers' Productive and Receptive Metalinguistic Knowledge as a Function of Their Academic Major

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ABSTRACT

The rise of attention in language pedagogy towards subject matter knowledge and its impact on teachers' professionalism accentuates the role of language teachers' metalinguistic knowledge in L2 teaching. The present study focused on identifying the status of Iranian EFL teachers' metalinguistic knowledge concerning their academic major. For this aim, a metalinguistic knowledge test entailing 2 modules of production and reception was administered to a total of 200 Iranian EFL teachers. To cross-validate the metalinguistic test results, a series of semi-structured interviews were conducted with 40 of the target EFL teachers to explore their perspectives about the academic major and metalinguistic knowledge development. Based on the MANOVA results, the academic major was found to be a predictor for the productive and receptive mode of metalinguistic knowledge attained by the teachers. The interview results boring out those of the metalinguistic knowledge test revealed more facts about the teachers' perspectives of different factors contributing to their metalinguistic knowledge development. The teachers complained about the deficiency that existed in their university curriculum which lacked enough courses referring to metalinguistic knowledge and provided some suggestions in this regard. The findings offer a number of pedagogical implications for language teachers and teacher educators and state some recommendations for further research directions.

Introduction

Increasing attention to teachers' professionalism worldwide puts an emphasis on teachers' subject-matter knowledge. In essence, to deal with complex and uncertain situations, professional teachers need to acquire an in-depth knowledge of the subject matter (Shulman, 2000). Likewise, in language pedagogy, the extent and the adequacy of L2 teachers' engagement with language content in their professional practice is a crucial variable in determining the quality and potential effectiveness of any L2 teachers' practice. In this regard, teachers' metalinguistic knowledge (MLK hereafter), that is the teachers' explicit knowledge of grammar in terms of morphology and syntax, plays a significant role in their ability to improve their learners' understanding of the language (McNamara, 1991) and in shaping their professional capacity

to plan for and respond to their learners' language needs (Myhill, Jones, & Watson, 2013).

Cumulative findings from more recent research on MLK (Andrews & Svalberg, 2017; Elder & Manwaring, 2004; Hu, 2002; Mutaf, 2019; Myhill, 2011; Myhill, Jones, & Watson, 2013) have suggested a great role for such knowledge in L2 classroom practices, mostly in foreign language contexts where the learning more heavily hinges on explicit learning of language rules through formal instruction (DeKeyser, 2003). Accordingly, the present study was inspired by the restricted metalinguistic knowledge of Iranian EFL teachers (Hayati, Vahdat & Khoram, 2017) from whom a significant number, mostly those recruited by language institutes, have graduated in different university majors rather than language studies or hold no university degrees at all. Thus, this study aimed at investigating Iranian EFL teachers' MLK in productive and receptive mode as a function of their academic major.

Literature Review

The concept of MLK has been touched upon from different perspectives in the English language teaching era started in the United Kingdom (the 1980s) with the language awareness movement (as reviewed in Andrews, 2007). The major focus of the language awareness movement was explicit knowledge about language and the role of such knowledge in language learning, language teaching, and language use. In the context of L2 teaching and teacher education, teacher language awareness is grounded in the assumption that an understanding of the language they teach and the ability to analyze it will contribute directly to their teaching effectiveness (Andrews, 2007).

In his study, Roehr (2008) defines MLK as a learner's explicit or declarative knowledge about the syntactic, morphological, lexical, pragmatic, and phonological features of the L2. She puts out that MLK includes explicit knowledge about categories as well as explicit knowledge about relations between categories (Ellis, 2004; Hu, 2002, 2011; Roehr, 2006). In the study by Myhill et al. (2013), on the other hand, the grammatical content knowledge was considered one part of the MLK and was defined as the "teachers'

explicit knowledge of grammar in terms of morphology and syntax" (p. 249).

Andrews puts emphasis on "the significance of the interrelationship between the declarative and procedural dimensions of teacher language awareness, i.e., between the knowledge base itself and how that knowledge is drawn upon and applied in the course of professional activity" (Andrews, 1999, p. 144). Declarative MLK, based on Andrews (2007), Ellis (2004), and Berry (2009) can be divided into two main components i.e., knowledge of grammatical rules, the ability to state rules formally and informally, and knowledge of grammatical terminology in their two different receptive and productive modes.

Shulman (2000) claims that teachers who lack MLK may skip some grammatical discussions in the classroom. Lack of enough and suitable metalanguage and understanding of the concepts associated with grammatical terms and lack of the ability to explain grammar rules make language teachers present learners with confusing messages about the language to be learned, especially in teaching grammar.

Studies on MLK and Factors Contributing to L2 Teachers' MLK Development

Studies concerned with the MLK of L2 teachers (Alderson & Horák, 2010; Andrews, 1995, 1999; Chandler, Robinson, & Noyes, 1988; Johnston & Goettsch, 2000; Purvis, McNeill, & Everatt, 2016) have demonstrated a number of factors that contribute to its development. The majority draw on perceptions of practicing L2 teachers to identify these factors. Some studies used a test to explore the potential influence of factors (Andrews, 1999, 2006).

Formal studies like the experience of learning a foreign language in institutes or studying language-related subjects at school or university have been shown to affect the development of MLK. In Johnston and Goettsch's study (2000) of four teachers, higher education was one of the factors found to correlate positively with grammatical knowledge. Likewise, Andrews (1999) used a test to assess the influence of formal study at university on teachers' MLK and confirmed that higher education could positively influence MLK. In the same line, in Andrews' study (2006), one of the participant teachers reported benefitting from

completion of master's degree in applied linguistics, stating that this had influenced her MLK positively. She narrated as follows:

The course also got me to become more sensitive to the language itself. In a way, this helps a lot. When I was teaching, I found myself doing more textual analysis with the students, and because I understood it more, it was easier for me to communicate the knowledge with the students. (p. 9)

However, the study by Chandler et al. (1988) which presented a postal questionnaire to practicing English teachers revealed that the majority of respondents acknowledged their own language learning experience at school as their main source of MLK. In addition to studies concerning the personal views of teachers, Andrews (1995) found the same result when he applied a test to elicit data in this regard. He tested respondents' understanding of grammatical terms, and their ability to apply them correctly. He indicated that those students whose subject of study in higher education was relevant to teaching English as a foreign language performed better than those whose university studies were in an area not relevant to teaching English.

Indeed, several researchers have sought to measure the MLK of student teachers after taking a grammar course designed to improve their MLK. Alderson and Horak (2010), for instance, reported on two tests aimed at testing the MLK of undergraduate English Language and Linguistics students, who were potential teachers. In the first study, 64 students at Reading University took a pre-course test at the beginning of the first term to determine who would go on to take a grammar course in the second term of the academic year 2009-2010. The results showed that instruction resulted in improved recognition of parts of speech and grammatical functions. Similarly, in the second study, the findings of a test at Lancaster University showed that the students' MLK increased after taking a course in grammar in their academic year.

Similarly, Purvis et al. (2016) examined the effects of teacher preparation coursework in building preservice teachers' MLK. This study examined the effects of 7 hours of language structure course work delivered to 121 preservice teachers over 7 weeks in their initial year of study, in New Zealand. Changes in the participants' phonological awareness, morphological awareness, and orthographic knowledge were tracked across the teaching period. The cohort demonstrated significant gains across all measures.

In addition, Ahangari and Abdi (2017) conducted a study to investigate whether there is a relationship between nonnative Iranian in-service and preservice teachers performing the metalinguistic and linguistic knowledge tests. The findings revealed that the two groups of teachers did not differ significantly with respect to their performance on the linguistic test. However, the in-service teachers outperformed their counterparts in the MLK test.

In literature, the studies conducted to examine teachers' MLK in the Iranian English teaching context were scarce and recent research in this regard has shown a much higher focus on such knowledge in L2 learning and use (e.g., Izadpanah & Nazarian, 2017; Modirkhamene, 2008; Seifoori, 2013) than on the teachers' MLK (e.g., Ahangari & Abdi, 2017).

Despite the dearth of studies concerned with the MLK of L2 teachers, few studies have focused on the factors that contribute to its development, an area that has hitherto received only peripheral attention in research on MLK. Among them, some drew on perceptions of practicing L2 teachers to identify these factors, and very few used a test to explore the potential influence of factors (Andrews, 1999, 2006), whereas focusing on one may miss out on the other. Moreover, even though the previous studies showed the advantages of learning grammar at school or university for EFL teachers, they failed to clarify how significant the improvement was or what level of MLK the teachers achieved. To fill these gaps in the literature, the present study tried to answer the following research questions:

1. Does EFL teachers' academic major lead to any differences in their productive and receptive MLK?
2. What are EFL teachers' perceptions of academic major as a possible factor impacting the development of their MLK?

Method
Participants

A total number of 200 Iranian EFL teachers (125 females, 75 males; aged 20 to 50 years) participated in the quantitative phase of the study (Table 1). Convenience sampling was used to select the participants from two common educational English teaching contexts in Iran, including high schools and language institutes. Currently, English language institutes are playing an increasingly important role in Iranian society (Borjian, 2010). The teachers recruited by the language institutes in Iran may have graduated in different university majors or have no university degrees at all. However, teachers must qualify to enable them to be specialist English teachers: Some teachers have a university degree in TEFL or linguistics, but the majority have entered the profession through the completion of a teaching training course provided by the target institutes or some international courses like the CELTA course (CELTA is a 4-week course [120 hours] which provides a very practical preservice qualification for aspiring English language teachers). On the other hand, the high school teachers recruited by the government usually hold a degree in language studies and may have passed different teacher training (in-service) courses.

Moreover, for the qualitative phase, 40 teachers from among the participants in the quantitative phase of the study were invited to take part in the interviews. The invitation for the interviews was based on purposive sampling, which, according to Babbie and Benaquisto (2008), is the selection of participants based on the researchers' judgment of "which ones will be the most useful" (p. 527). To ensure maximal variation sampling, the EFL teachers from different teaching contexts with different MLK test scores and different demographic features were selected.

Table 1
EFL Teachers' Profile

Demographics	Categories	MLK test	Interviews
Gender	Females	125	25
	Males	75	15
Institutions	Language institutes	100 (66 F/34 M)	20
	High schools	100 (59 F/41M)	20
Academic major	English	135	20
	Non-English	65	20

Finally, based on the objectives of the study, the EFL teachers who participated in the study were divided into two groups of educational majors: (a) English majored EFL teachers who were teachers educated in English majors as teaching, linguistics, literature, and so on, and (b) non-English majored EFL teachers who were educated in majors rather than English such as mathematics, engineering, social sciences, and so on. And, for ease of use, they were decided to be referred to as English group and non-English group in the study reports.

Materials and Instruments

Two different instruments were deployed in this study. The instrument for the quantitative phase of the study was an MLK test which was created, tested, and validated by Almarshedi (2017). The structure of the test consisted of two main sections: knowledge of grammar terms and knowledge of grammar rules. Each of these sections has two subdivisions of a productive and receptive facet of MLK. Sixty-one items were distributed to measure the MLK and the subsections. Examining the MLK test (Almarshedi, 2017) carefully, no significant modifications were required for the main structure of the test. Slight changes, also, were made in instruction wording and format. Generally, the MLK test consisted of the following test features which were adjusted to the objectives of this study with minor modifications: For the testing teachers, MLK via knowledge of grammar terms such as word classes (e.g., noun, adjective), grammatical roles (e.g., subject, object), types of sentences (e.g., complex sentence, minor sentence), clauses (e.g., noun clause, adjective clause), and phrases (e.g., noun

phrase, adjective phrase), and for testing the MLK via knowledge of grammar rules, the formation and use of the tenses (e.g., simple present, present continuous and simple past), superlative adjectives, definite article, relative pronoun, adjective clause, modals, subject-verb agreement, expression of quantity (many), question tags, verbs followed by an infinitive were used.

The MLK test was pilot-tested with 40 EFL teachers who enjoyed similar professional features to the participants of the study. Moreover, the internal consistency of the whole test along with the variables of the study was calculated using the *KR*-21 index. Based on the *KR*-21 index, the whole test had a relatively high level of reliability (r = .90). Moreover, the internal consistency of the two other variables of the study that is MLK production and reception turned out to be .85 and .89, respectively. Thus, the test was considered reliable.

Besides, for the qualitative phase of the study, semi-structured interviews were performed with 40 EFL teachers who participated in the quantitative phase of the study. Based on the research objectives, five questions were designed to guide the interview sessions. Furthermore, both MLK test and the interview questions were reviewed by two experts in the field of applied linguistics to guarantee the validity of the instruments.

Procedure

The data collected from the participants in two phases. The data for the quantitative phase were collected through an MLK test administered to the EFL teachers in the first week of May 2019. For this aim, the participants were invited to meet in the meeting room provided by the General Administration for Education in each province. They took the test under the researchers' supervision. On average, each test session took approximately 40 min (ranging from 30 to 40 min). The date and details for the next meeting for phase two of the study were arranged.

Phase two of the research was conducted in the third week of May 2019, two weeks after the test administration sessions (phase 1). In this phase of the study, 40 teachers (20 from each group of participants) were invited to participate in the interview. It was a purposive sampling as

the interviewees were chosen based on their MLK test results and their demographics of different genders, years of teaching experience, and majors attained from the demographic information sheet filled out during the first phase. The researchers met with each of them individually on site, at a mutually convenient time. Each of the meetings took up to 15 min. The interviews were mostly conducted in English. Persian was used to guide the discussion where needed.

Consequently, with the participants' permission, all of the interviews were audio-recorded. To protect the privacy of the participant teachers, while analyzing and reporting data, their confidentiality and anonymity were guaranteed by allocating the codes of ENG 1-20, and Non-ENG 1-20 for English majored teachers and non-English majored ones, respectively.

Before conducting any action regarding the participants in the present research, consent letters were signed by the people in charge of the high schools (Bureau of Education) and the institutes (the head of the language departments). Also, the participants were asked to fill in the informed consent forms before all sessions of test administrations and interviews.

Data Analysis

The statistical data analyses were performed using IBM SPSS Statistics 24. Concerning the first research question, a multivariate ANOVA (MANOVA) was run to compare English and non-English teachers' means of MLK production and reception. For the qualitative data analysis, the recorded interviews were transcribed and coded using thematic analysis (Dörnyei, 2007). After identifying the main patterns, recurrent words and phrases were coded and analyzed on a semantic level to form themes and subthemes. Next, the emerging themes were subjected to frequency analysis and were finally tabulated.

Results
The First Research Question

Multivariate analysis of variance (MANOVA) was run to compare the English and non-English teachers' means on the production and reception of their MLK in order to probe the first null hypothesis, that is, the EFL teachers'

educational academic major does not lead to any differences in their productive and receptive MLK. Before running the MANOVA, its assumptions were checked. In the first step, the normality assumption was checked to examine the skewness and kurtosis of the data and their ratios over the standard errors. Because the absolute values of the ratios were lower than 1.96, it could be concluded that the present study data met the normality assumption.

Then, the homogeneity of covariance matrices was examined employing Box's Test of Equality of Covariance Matrices. The nonsignificant results of the test in Table 2 ($M = .307$, $p > .001$) indicated that the correlation between MLK production and reception was roughly equal across the English and non-English groups; hence homogeneity of covariance matrices was met.

In addition, based on Levene's Test of Equality of Error Variances, as presented in Table 3, there were not any significant differences between the two groups' variances on MLK production ($F 1, 198 = .207$, $p > .05$) and the MLK reception ($F1, 198 = .080$, $p > .05$), as thus the assumption of the homogeneity of variances of groups were met, too.

Table 2
Box's Test of Equality of Covariance Matrices (Production and Reception by Major)

Box's M	.940
F	.307
df1	3
df2	70620.852
Sig.	.820

Table 3
Levene's Test of Equality of Error Variances (Production and Reception by Major)

		Levene Statistic	*df1*	*df2*	*Sig.*
MLK Production	Based on Mean	.215	1	198	.643
	Based on Median	.207	1	198	.650
	Based on Median and with adjusted *df*	.207	1	195.632	.650
	Based on trimmed mean	.207	1	198	.649
MLK Reception	Based on Mean	.047	1	198	.829
	Based on Median	.080	1	198	.777
	Based on Median and with adjusted *df*	.080	1	197.835	.777
	Based on trimmed mean	.053	1	198	.818

Table 4
Multivariate Tests (MLK Production and Reception by Major)

Effect		Value	*F*	Hypothesis df	Error df	*Sig.*	Partial Eta Squared
Intercept	Pillai's Trace	.874	681.399	2	197	.000	.874
	Wilks' Lambda	.126	681.399	2	197	.000	.874
	Hotelling's Trace	6.918	681.399	2	197	.000	.874
	Roy's Largest Root	6.918	681.399	2	197	.000	.874
Group	Pillai's Trace	.168	19.925	2	197	.000	.168
	Wilks' Lambda	.832	19.925	2	197	.000	.168
	Hotelling's Trace	.202	19.925	2	197	.000	.168
	Roy's Largest Root	.202	19.925	2	197	.000	.168

Finally, the multivariate analysis of variance was conducted. The main results of MANOVA as displayed in Table 4 ($F (2, 197) = 19.92$, $p < .05$, partial eta squared = .168 representing a large effect size) indicated that there were significant differences between the English and non-English teachers' means on MLK production and reception. Thus, the first null hypothesis as "there was not any significant difference between English and non-English EFL teachers regarding their performance in productive and receptive tasks of MLK was rejected.

Table 5 displays the descriptive statistics for the two groups on MLK production and reception. The results indicated that the English majored teachers had higher means than the non-English group on the production and reception of MLK.

Table 5
Descriptive Statistics (MLK Production and MLK Reception by Major)

	Academic major	Mean	*Std.* Error	95% Confidence Interval	
				Lower Bound	Upper Bound
MLK Production	English	15.454	.368	14.728	16.180
	Non-English	10.266	.736	8.815	11.718
MLK Reception	English	17.586	.380	16.836	18.336
	Non-English	13.346	.761	11.845	14.846

Moreover, the MANOVA tests of between-subjects effects performed on all dependent variables separately (Table 6) indicated that the two groups of EFL teachers (English/ non-English majors) differed significantly about dependent variables including production and reception of MLK. Based on the results displayed in Tables 5 and 6, it can be concluded that: Teachers majored in English (M = 15.45) had a significantly higher mean on production than teachers educated in non-English majors (M = 10.26), (F (1, 198) = 39.73, p < .05) partial eta squared = .167 representing a large effect size). Similarly, regarding MLK reception, it was evident that English group teachers (M = 17.58) had a significantly higher mean on MLK reception than non-English group (M = 13.34) (F (1, 198) = 24.83, p < .05, partial eta squared= .111 representing a moderate to large effect size).

Table 6
Tests of Between-Subjects Effects

Source	Dependent Variable	Type III Sum of Squares	*df*	Mean Square	*F*	*Sig.*	Partial Eta Squared
Academic major	Production	861.187	1	861.187	39.731	.000	.167
	Reception	575.385	1	575.385	24.839	.000	.111
Error	Production	4291.776	198	21.676			
	Reception	4586.603	198	23.165			
Total	Production	46719.481	200				
	Reception	61194.451	200				

The Second Research Question

The semi-structured interview sessions were primarily meant to explore the EFL teachers' perspectives of their MLK development concerning their academic major and to triangulate the quantitative data. Interview analysis, however, revealed more facts about the EFL teachers' perspectives of different factors contributing to their MLK development. So, the data gleaned from the interviews were subjected to thematic analysis wherein the four main themes emerged from the data. The first two is related to the quantitative results of the study, and the last two are derived from the participants' perspectives about different factors contributing to their MLK development. They are addressed in the course of the following sections.

Academic Major and the MLK Development

The study exploration on question 1 (i. e., Does the EFL teachers' major lead to any differences in their MLK?) showed that the English-majored teachers outperformed the non-English ones in both reception and production of MLK. In line with these results, the interviewees who majored in English agreed that studying in English majors helped them in acquiring MLK. Also, the non-English group of teachers strongly believed that "in order to gain MLK, EFL teachers need to be taught English grammar at university". However, the non- English majored teachers were more dependent on their after-graduation achievements than English majored ones when they were asked to talk about the sources that made them develop their MLK. One

account from a non-English majored teacher in this regard is as follows:

Really, I didn't know grammar until I taught it. I feel that our study at school or even at university did not benefit us in this area. I didn't get benefits until after teaching. I taught in schools and got experience; I learned the differences between the past, the present, and the future, every part of it, through teaching not through studying [at university]. (Non-ENG 16)

Academic Major and Receptive vs. Productive MLK

More analysis revealed that both groups of teachers reported the MLK production much struggling area than the recognition part. Also, they stated that they had more problems in doing productive tasks of MLK test in the study. One of the frequent themes that emerged from the English-majored teachers' interviews was that their educational background was more helpful in attaining the receptive MLK than the productive MLK. Many of the EFL teachers in the English group asserted that they could remember the grammar rules and terms from university courses but they had problems producing them.

The following interview excerpts typify EFL teachers' perceptions of receptive and productive MLK:

I can recognize terms and rules easily, but when it's time for producing them, I can't remember the right words. Maybe Mm.... I don't know some of them. (Non-ENG 7)

I learned many things from university classes about grammar. But regarding your question, I think university courses mostly helped me in receptive metalinguistic knowledge development than the productive MLK. (ENG 11)

MLK Development and Deficiency in University Courses

A majority of the teachers in the English group and some in the non-English group pertained their lack of MLK to the deficiencies in their university curriculum. They felt that there was a shortage of courses that would develop their knowledge and complained about the quantity and quality of input delivered in university courses. For example, one of the teachers (ENG 13) said: "I feel that I haven't received much. For grammar, I feel it was not enough". Moreover,

they felt that their studies were superficial, focusing only on the basics and lacking depth, as indicated by another teacher: "I have studied things which are not deep. It was superficial" (Non-ENG 4).

Surprisingly, some teachers who majored in TEFL believed that the knowledge they had was insufficient and that they suffer from weaknesses. They stated that university education was useless in improving their MLK. They felt embarrassed and complained about the educational systems of universities in Iran.

Some of the complaints about inefficient university curriculum stated by the EFL teachers are reported in the following interview extracts:

I am an English graduate, but I didn't get much from my university courses, some of my students know more grammatical rules or terms than I. (ENG 6)

Universities are not matched with students' needs. The courses and the teaching methods applied in the universities should change. In university, we never focused on any subject completely. To improve MLK, for example, we just read some pages of an old book, "communicate what you mean" and some pages of "study skills." As future teachers, they never taught us how to teach grammar. (ENG 18)

MLK Development from Teaching and Learning Experiences

The interviewees who were not satisfied with their university courses, mostly, believed that most of their MLK resulted from their experiences as language learners, self-study of grammatical books, or through the textbooks they had taught. Some of the EFL teachers' accounts concerning MLK development by other sources rather than academic education are as follows:

To be honest, I've learned a few from my university courses, I know what I know of rules and terms come from my learning experience as a language learner in the institute. (ENG 12)

In my opinion, not the universities, and not the CELTA course focused on MLK. I learned from books and what I have taught in my classes as a teacher. (Non-ENG 10)

Finally, even though the teachers in English groups voted in favor of studying in English related majors in developing their MLK, the

result in this section clearly conveyed that both groups of teachers, English and non-English majored, were not so trustful to the university functions and believed that their MLK improved after graduation via different sources mostly in their workplaces and through teaching experiences.

Discussion

The purpose of this study was to investigate the Iranian EFL teachers' productive and receptive MLK as a function of academic majors and to examine the possible differences in their perspectives in this regard. The results of the first research question revealed that the EFL teachers who majored in English (defined in this study as English literature, English teaching, or English translation) performed better in MLK tasks in comparison with the teachers in the non-English group (defined in this study as science, mathematics and engineering, and social sciences rather than English).

These findings are in line with those of Andrews (1999) and Johnston and Goettsch (2000) who found that the students whose subject of study in higher education was relevant to teaching English outperformed in MLK tasks comparing those whose university studies were in an area rather than English majors. Similarly, the findings match the studies which demonstrated that participants MLK increased after taking a course in grammar and that the instruction resulted in improved recognition of parts of speech and grammatical functions (Alderson & Horak, 2010, Purvis et al., 2016).

The results in the present study support the previous studies as those EFL teachers educated in English-related majors showed more MLK in production and reception than those in non-English majors. The findings added to the research repertoire in this area by examining Iranian EFL teachers' MLK in its two modes of production and reception using both an MLK test and exploring EFL teachers' perceptions.

The results of the semi-structured interviews supported those of the MLK test with some discrepancies. The EFL teachers educated in English claimed that studying in English major had affected their MLK development in production and reception and had increased their confidence in their MLK in teaching grammar.

The results are in line with the qualitative results of Andrews' (2006) in that one of the participant teachers, Maggie, reported benefitting from completion of a master's degree in applied linguistics. Exploring the non-English major teachers' viewpoint in this regard showed that they believed that studying in English could benefit them in their MLK development, even though they just had passed few ESP courses in English. Nevertheless, both groups of the teachers in the present study (English and non-English major) complained about the deficiency that existed in their university English curriculums. And they pertained their MLK development to their after-graduation period, mostly.

Finally, comparing English and non-English majored teachers, English majored teachers showed more satisfaction with their MLK. This might be expected that studying in English related majors would benefit EFL teachers in raising their language awareness and would have effects on acquiring more MLK. In their interview responses, the teachers did not deny this fact, but they were more satisfied with the impact of other sources like their language teaching and learning experience on MLK development than the outcomes of their university courses. This result raises questions about the role of universities and teacher preparation organizations in teachers' professional development generally and their MLK development inclusively.

Conclusion

Teachers' MLK is of significant importance, enabling them to function effectively and appropriately in their professional environment. Different researchers (Andrews & McNeill, 2005; McNamara, 1991) argue that teachers should aim to have a well-developed MLK in order to enhance learners' understanding of the language and to convey to their learners, accurate and appropriate information concerning language form, enabling them to develop explicit knowledge. Different factors contribute to teachers' MLK development. The present study examined the impact of studying in English majors comparing studying in majors rather than English on EFL teachers' MLK development in production and reception and found that teachers

studied in English majors have better **MLK** than their counterparts in the study.

The most salient finding of the study was that MLK recognition and production might be more difficult for groups of English teachers who come from a non-English academic background. Besides the **MLK** test results, it is evident from the interview of one such respondent that this might indeed be the case. The study supports the idea that guiding prospective English teachers passing through the specific route of English majors in their academic studies seems to have effects on providing better knowledge about language. This can be considered an unusual situation mostly in Iranian language institutes (that almost half of the teachers come from other majors than English) expecting that most specialist English teachers should be educated in English majors in universities especially from their earlier studies. Thus, the results accentuate the need for compensation for the possible shortage caused by the lack of academic university training in this regard. Accordingly, the findings from this study provide an argument for actions by teacher educators, policymakers, and curriculum developers to enrich teacher training curriculums to be more aligned with the EFL teachers' professional development programs especially those devised for the specific MLK needs. These actions should, in turn, have positive impacts on classroom practices in the long run.

Finally, research into the role of universities and teaching training centers in providing grammar courses including MLK and its effects on teachers' MLK in different settings seems to add a good deal of knowledge to the ELT research repertoire.

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