The effect of Metacognitive strategies in reducing language anxiety among Persian-speaking children in Arabic-speaking skills

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Abstract

Language anxiety is a significant issue in learning foreign languages, and this research aims to assess the impact of metacognitive strategies for reducing language anxiety among Persian-speaking children in learning Arabic speaking skills. The study focuses on comprehending the effect of metacognitive strategies and substantiating their significance in enhancing Arabic language speaking skills for Iranian children. Researchers chose a field methodology to reach conclusive results. Two groups were evaluated – an experimental and a control group – using a quasi-experimental method to uncover the influence of metacognitive strategies on language anxiety among children aged 8 to 12. The research also discussed gender differences as a factor affecting language anxiety. The study used the Foreign Language Classroom Anxiety Scale to address these enquiries. The results illustrated a significant impact of metacognitive strategies in teaching Arabic language speaking skills compared to traditional methods. The study affirmed that the concept of metacognition and its strategies positively affect the level of language anxiety in Persian-speaking children. Moreover, there were no statistically significant differences between genders in lower language anxiety after using metacognitive strategies as a primary tool in learning the Arabic language.

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1. Introduction

Language anxiety is a major concern in language teaching, impacting the learning process, especially among young foreign language learners whose social and linguistic skills are still developing. This anxiety, not limited to English but also seen in Arabic, poses a global challenge (Kaffavi, 2005; Konko, 2010). Recent research has observed that anxiety has an unavoidable impact on reducing foreign language students' speaking skills; however, scholars also show it can be controlled through quality teaching methods (Akhgari, 2010; Ismaili & Mohammadi, 2022). This research aims to shed light on the function of language anxiety in 8- to 12-year-old Farsi-speaking girls and boys. In addition, it explores the effect of metacognitive strategies as strong learning tools in reducing it.

1.2. Research Questions
The study seeks to address two key questions in Arabic language education:
1. What is the effectiveness of metacognitive strategies in reducing language anxiety in the skill of speaking Arabic among Iranian children?
2. What is the difference in the level of language anxiety between the two genders of Iranian children when faced with speaking Arabic?

2. Literature Review
Language anxiety among children presents various symptoms, leading to the formation of negative self-concepts. This anxiety can inhibit their determination to learn and may even drive them to avoid language lessons altogether. Maeng (2007) noted that language anxiety has a notable impact on speaking skills, especially among elementary school children.
In response to language anxiety, metacognitive strategies offer effective solutions. Hosenfield (2003) describes these strategies as procedures that learners undertake to acquire knowledge about activities and mental processes. They go beyond conventional methods and offer various tools to support the development of speaking skills in language learning. Flavell (1997) emphasizes the importance of teaching metacognitive strategies to children, highlighting their ability to use these skills despite the challenges of developing the relationship between thoughts and feelings.
Implementing metacognitive strategies such as brainstorming, concept mapping, role-playing, cooperative learning, learning schedules, and self-questioning is essential to enhance awareness and learning outcomes. These strategies not only improve language skills, but also contribute to building confidence and self-assessment among children. By teaching and implementing these strategies effectively, educators can create a positive learning environment that fosters both language proficiency and mental well-being.

3. Methodology
In the past decade, various scientific and practical research studies have examined language anxiety in foreign language education. Many articles, such as the research by Hassan (2020) and Mokhtar (2020), have highlighted the reciprocal relationship between increased motivation, proficiency in speaking skills, and reduced levels of language anxiety. Researchers have observed the positive effects of reducing language anxiety on language learning performance, leading to the inclusion of various strategies to alleviate language anxiety among learners.
The current study, drawing inspiration from previous studies and focusing specifically on the age group of children, aims to investigate the relationship between the concept of metacognition and its strategies for addressing language anxiety during Arabic speaking. The research adopts a semi-experimental method to take a step forward in this field.
For this study, 30 Iranian Persian-speaking children aged 8 to 12 years old have been selected to examine metacognitive strategies in reducing language anxiety and improving Arabic speaking skills. They are divided into two groups: control and experimental.

The book "Al-Arabia Baina Yadai Oladena" was selected as the instructional material for both groups, while the Foreign Language Classroom Anxiety Scale (FLCAS) was used to measure the children's language anxiety. The experimental group utilized specific metacognitive strategies, while the control group followed traditional teaching methods. The study design included pre-tests and post-tests to measure the effectiveness of these strategies in enhancing language learning outcomes.

4. Results & Discussion

To normalize the data and align variances, Shapiro-Wilk, Levene's, and Welch's tests were employed. Subsequently, independent samples t-tests were conducted on the experimental and control groups, with a significance level of 0.05, using SPSS-24. The null hypothesis stated no difference between teaching methods using cognitive strategies and traditional methods in reducing anxiety in children and adolescents. To test this hypothesis, both groups were compared using an independent follow-up t-test on subscales and total anxiety scores. The results indicated significant differences between the post-tests of the two groups across all subscales and total anxiety score, with the metacognitive group scoring lower. Therefore, the null hypothesis was rejected, confirming the main research hypothesis that there is a difference in anxiety reduction between teaching methods using metacognitive strategies and traditional methods in language learning.

The second null hypothesis refers to the absence of gender differences in language anxiety and its reduction in girls and boys aged 8 to 12, suggesting that metacognitive teaching does not differentiate between reducing anxiety in girls and boys. To test this hypothesis, the two genders were compared on subscales and total anxiety scores using an independent follow-up t-test. The results showed no statistically significant differences between post-tests for different genders across all subscales and total anxiety levels; both genders were nearly at the same level. Thus, the null hypothesis was not rejected. In other words, there was no significant difference in anxiety reduction between girls and boys using metacognitive teaching methods.

Further analyses were conducted to enhance the understanding of the findings. Correlation analyses revealed significant negative correlations between metacognitive strategies and all aspects of language anxiety, indicating that higher use of these strategies was associated with lower anxiety levels. Additionally, a multiple regression analysis demonstrated that metacognitive strategies significantly predicted language anxiety scores, even after controlling for other variables. This suggests that incorporating metacognitive techniques into language teaching can be a valuable tool for reducing anxiety. Qualitative data from student feedback and observations provided further insights, with many students reporting increased confidence and reduced anxiety when using these strategies. This underscores their perceived benefit in language learning environments.

5. Conclusion

The results of the t-test indicate that there was a significant reduction in language anxiety ($p<0.001$) in the experimental group, which suggests a strong relationship between language anxiety and metacognitive strategies. The first hypothesis was accepted based on this result. The experimental group also showed significant differences in comprehension, exam anxiety, and fear of evaluation compared to the control group that were trained with traditional teaching methods. Reducing language anxiety can lead to better academic performance, enhanced motivation, and improved self-confidence among language learners. Metacognitive strategies were found to be effective in reducing anxiety, especially among both genders. "Awareness" emerged as a key factor in reducing anxiety, as students participated in self-questioning and active learning.

The study also explored the impact of metacognitive strategies on language anxiety in boys and girls, but did not yield any significant differences. In addition, the importance of cooperation in reducing linguistic disparities was highlighted. The study emphasizes the

need for further research on metacognitive strategies in Arabic language teaching. Reviewing the tools used to measure language anxiety is also important.

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