

Original Article

Meta-Analysis of the Effectiveness of Developed Programs to Improve the Quality of Teacher-Student Relationship

Fateme Jafarpoor*
Mohammad Ali Mazaheri Tehrani**
Saeed Ghanbari***
Jalil Fathabadi****

Introduction

The quality of the teacher-student relationship is pivotal in influencing academic and non-academic student outcomes. Recognizing its significance, numerous programs have been designed and implemented globally to enhance this relationship. This meta-analysis aims to evaluate the effectiveness of these programs and identify critical moderators that influence their success.

Method

A meta-analytic approach was employed, adhering to the PRISMA guidelines to ensure a systematic and comprehensive review. Programs were selected based on stringent inclusion and exclusion criteria from national and international electronic databases. The screening process yielded 24 eligible studies, contributing 55 effect sizes. The data were analyzed using CMA3, and a random effects model was applied to determine the overall effect size.

Results

The overall effect size was 0.246, calculated using a random effects model. This moderate effect size indicates a meaningful, yet relatively limited, change in the quality of teacher-student relationships. The moderator

* Ph.D. Student, Faculty of Education & Psychology, Shahid Beheshti University, Tehran, Iran.

** Professor, Faculty of Education & Psychology, Shahid Beheshti University, Tehran, Iran.

Corresponding Author: M-Mazaheri@sbu.ac.ir

*** Assistant Professor, Faculty of Education & Psychology, Shahid Beheshti University, Thran, Iran.

**** Associate Professor, Faculty of Education & Psychology, Shahid Beheshti University, Thran, Iran.

analysis did not find significant effects of factors such as gender, the nature of the program (individual or group), or the study design (randomized controlled trial or quasi-experimental). However, programs implemented in elementary schools showed higher effectiveness compared to those in preschool settings. A notable finding was the scarcity of programs targeting middle and high school students, highlighting a gap in the literature.

Discussion

The findings showed that current theoretical frameworks like attachment theory may not fully address the diverse needs of students across different cultures and developmental stages, pointing to the need for further refinement. Notably, the analysis found that while elementary school programs are more effective, there is a significant lack of programs designed for middle and high school levels, highlighting a global challenge in addressing teacher-student relationships beyond early education. While other countries may lack programs for middle and high schools, Iran has a critical gap in implementing programs, even at the preschool and elementary levels. Moreover, the existing programs, primarily developed in Western contexts, can only be directly applied to Iranian schools with proper cultural adaptation. This underscores the importance of designing culturally relevant programs or modifying existing ones to align with Iran's unique cultural, social, and educational needs. Developing tailored programs could bridge this gap and improve educational outcomes across various developmental stages. The findings of this study are significant for researchers, policymakers, and teachers, offering insights to enhance teacher-student relationships and improve educational programs.

Keywords: Effectiveness of Program, Moderator Analysis, Teacher-Student Relationship, Meta-Analysis.

Author Contributions: In the present study, the second and third authors, as supervisors, have been responsible for the overall supervision and strategy of the research process and for compiling and finalizing the corrections of the article. In developing the research plan, the first author has been in charge of the process of gathering, analyzing and interpreting the findings and writing the text of the article, and in general, drawing conclusions from the findings and expanding and interpreting jointly and with the discussion and exchange of opinions of all colleagues and with the accompaniment of the fourth author, as Dissertation advisor professor, done.

Conflicts of interest: The authors declare there is no conflict of interest in this article.

Funding: This research was not sponsored by any institution, and all costs were borne by the authors.

Acknowledgments: The authors would like to express their gratitude to all those who have been critical in completing this research.
