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A Century of Leadership in Mathematics and Its Teaching

Examining the Classroom Experience

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TEACHERS COLLEGE | COLUMBIA UNIVERSITY

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PREFACE

For this issue of the *Journal of Mathematics Education at Teachers College*, we have included four articles that examine various aspects of the classroom experience. From the experiences of preservice teachers to the roots of mathematics anxiety, this issue explores both practical and theoretical issues surrounding mathematics education.

In their article, Garcia-Olp, Van Ooyik, and Kitchen studied prospective elementary school teachers; they worked with these preservice teachers to examine the deficit perspectives on achievement and behavior held by their mentoring teachers. While many teachers held deficit perspectives, some were found to avoid these labels. Overall, the authors illustrate the importance of the labels many attach to their students without an appreciation for the repercussions on student's mathematical identity.

Galarza investigates the results of an initial testing of his game, *Groups*, designed to allow both novice and experienced mathematics students the opportunity to engage with concepts from group theory. Galarza examines the reactions both sets of students had to the game to investigate its potential uses at the high school and college levels. Galarza presents opportunities for group theory content to be presented in a new and engaging way.

It is commonly accepted that many students suffer from mathematics related anxiety. In her article, Quan-Lorey dives deeper into this issue by considering how certain mathematics experiences at any age have led to mathematics anxiety in college students. Quan-Lorey investigated common causes of mathematics anxiety and why these experiences have led students to become anxious. The implications of her study suggest the importance of an awareness of mathematics anxiety from elementary to college level mathematics educators.

In their article, Pratt and Eddy investigate area models involving concrete manipulatives frequently used in classrooms. They explore existing models and propose a new way to use algebra tiles to help improve students' understanding of multiplication involving the *Algeblocks* quadrant mat. The combination takes the best of both manipulatives and allows for an even better model for integer and binomial multiplication.

Together, these practice-oriented and theoretical articles touch on aspects present from early elementary through collegiate mathematics and provide opportunities to help students grow from a pedagogical standpoint and develop healthy mathematical identities.

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Guest Editors