Implementing the Common Core State Standards Through Mathematical Problem Solving: High School

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Description:

Connect the Process of Problem Solving with the Content of the Common Core. Mathematics educators have long recognized the importance of helping students to develop problem-solving skills. More recently, they have searched for the best ways to provide their students with the knowledge encompassed in the Common Core State Standards (CCSS). This volume is one in a series from NCTM that equips classroom teachers with targeted, highly effective problems for achieving both goals at once.

The 44 problems and tasks for students in this book are organized into the major areas of the high school Common Core: algebra, functions, geometry, statistics and probability, and number and quantity. Examples of modeling, the other main CCSS area, are incorporated throughout. Every domain that is required of all mathematics students is represented.

For each task, teachers will find a rich, engaging problem or set of problems to use as a lesson starting point. An accompanying discussion ties these tasks to the specific Common Core domains and clusters they help to explore. Follow-up sections highlight the relevant CCSS Standards for Mathematical Practice that students will engage in as they work on these problems.

This book provides high school mathematics teachers with dozens of problems they can use as is, adapt for their classrooms, or be inspired by while creating related problems on other topics. For every mathematics educator, the books in this series will help to illuminate a crucial link between problem solving and the Common Core State Standards.