



1st ed. 2018, XI, 308 p. 77 illus., 15 illus. in color.

Printed book

Softcover

22,99 € | £19.99 | \$29.99

^[1]24,60 € (D) | 25,29 € (A) | CHF

27,50

eBook

18,18 € | £15.99 | \$19.99

^[2]18,18 € (D) | 18,18 € (A) | CHF

22,00

Available from your library or

springer.com/shop

MyCopy ^[3]

Printed eBook for just

€ | \$ 24.99

springer.com/mycopy

Daniel Grieser

Exploring Mathematics

Problem-Solving and Proof

Series: Springer Undergraduate Mathematics Series

- Provides general and maths-specific problem-solving strategies
- Contains many motivating examples and exercises
- Engages the reader to explore mathematics and solve fun problems
- Introduces fundamental ideas useful in all areas of mathematics

Have you ever faced a mathematical problem and had no idea how to approach it? Or perhaps you had an idea but got stuck halfway through? This book guides you in developing your creativity, as it takes you on a voyage of discovery into mathematics. Readers will not only learn strategies for solving problems and logical reasoning, but they will also learn about the importance of proofs and various proof techniques. Other topics covered include recursion, mathematical induction, graphs, counting, elementary number theory, and the pigeonhole, extremal and invariance principles. Designed to help students make the transition from secondary school to university level, this book provides readers with a refreshing look at mathematics and deep insights into universal principles that are valuable far beyond the scope of this book. Aimed especially at undergraduate and secondary school students as well as teachers, this book will appeal to anyone interested in mathematics. Only basic secondary school mathematics is required, including an understanding of numbers and elementary geometry, but no calculus. Including numerous exercises, with hints provided, this textbook is suitable for self-study and use alongside lecture courses.

Order online at springer.com / or for the Americas call (toll free) 1-800-SPRINGER / or email us at: customerservice@springernature.com. / For outside the Americas call +49 (0) 6221-345-4301 / or email us at: customerservice@springernature.com.

The first € price and the £ and \$ price are net prices, subject to local VAT. Prices indicated with [1] include VAT for books; the €(D) includes 7% for Germany, the €(A) includes 10% for Austria. Prices indicated with [2] include VAT for electronic products; 19% for Germany, 20% for Austria. All prices exclusive of carriage charges. Prices and other details are subject to change without notice. All errors and omissions excepted. [3] No discount for MyCopy.

