



The Play's the Thing

Mathematical Games for the Classroom and Beyond *Alan Lipp*

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Binding: Paperback Recreations & Games **Price:** £9.99 / \$18.95 **BISAC code:** MAT025000

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Extent: 148 pages **Rights Held:** World

Size: 216 x 140mm / 8.5 x 5.5

Illustrations: 100+ figures and tables

Description

Presents 18 mathematical games and develops the concepts of game analysis and winning strategies.

The book presents 18 games and develops the concepts of game analysis and winning strategies. Students are encouraged to play these mathematical games together, collect data developed through their play, and analyze the data to develop a winning strategy. The book provides the basis for a six- to eight-week unit on mathematical games. Each chapter also functions as a self-contained and independent exploration so that selected chapters may be used as supplementary classroom investigations or as independent projects. The book includes both familiar games (such as Quadrangles and Nim) and many others that will be new and exciting to most readers. Through the exploration of mathematical games, *The Play's the Thin*g introduces teachers and students to the fun of play and to the mathematics behind the fun.

Readership: Students can use the games to develop both inductive and deductive reasoning as they investigate strategies for winning, while teachers can incorporate these games into any class as an enjoyable interlude between traditional topics. Anyone with an interest in mathematics will enjoy solving the challenges in this book.

Contents

Acknowledgements; Prologue: To the Teacher; Act 0: To the Student; Act 1: Blockers; Act 2: Nimble; Act 3: More Variations; Act 4: Take Away 1, 2, 3; Act 5: Two Piles: A Hidden Game; Act 6: Two Piles 1, 2, 3; Act 7: Nim; Act 8: Flit; Act 9: Mr Flit; Act 10: Landis; Act 11: Add'em Up; Act 12: Connect-the-Dots; Act 13: Boxes; Act 14: Hold That Line; Act 15: The Fifteen Game; Act 16: Sliders; Act 17: Lynch; Act 18: Progression: Down and Up; Act 19: Harder Stuff; Answers

About the Author

Alan Lipp has been teaching mathematics since 1966, and has been playing games even longer. He has taught in middle schools, high schools, and universities. He lives in South Deerfield, Massachusetts with his wife and a very spoiled cat.

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