

The Kingdom Of Infinite Number: A Field Guide



Synopsis

Just as bird guides help watchers tell birds apart by their color, songs, and behavior, *The Kingdom of Infinite Number* is the perfect handbook for identifying numbers in their native habitat. Taking a field guide-like approach, it offers a fresh way of looking at individual numbers and the properties that make them unique, which are also the properties essential for mental computation. The result provides new insights into mathematical patterns and relationships and an increased appreciation for the sheer wonder of numbers. Every number in this book is identified by its "field marks," "similar species," "personality," and "associations." For example, one field mark of the number 6 is that it is the first perfect number-- the sum of its divisors (1, 2, and 3) is equal to the number itself. Thus 28, the next perfect number, is a similar species. And the fact that 6 can easily be broken into 2 and 3 is part of its personality, a trait that is helpful when large numbers are being either multiplied or divided by 6. Associations with 6 include its relationship to the radius of a circle. In addition to such classifications, special attention is paid to dozens of other fascinating numbers, including zero, pi, 10 to the 76th power (the number of particles in the universe), transfinite and other exceptionally larger numbers, and the concept of infinity. Ideal for beginners but organized to appeal to the mathematically literate, *The Kingdom of Infinite Number* will not only add to readers' enjoyment of mathematics, but to their problem-solving abilities as well.

Book Information

File Size: 1823 KB

Print Length: 398 pages

Publisher: Henry Holt and Co. (September 15, 2001)

Publication Date: September 15, 2001

Language: English

ASIN: B005KJVRFI

Text-to-Speech: Enabled

X-Ray: Not Enabled

Word Wise: Not Enabled

Lending: Not Enabled

Screen Reader: Supported

Enhanced Typesetting: Enabled

Best Sellers Rank: #514,936 Paid in Kindle Store (See Top 100 Paid in Kindle Store) #26

in Kindle Store > Kindle eBooks > Nonfiction > Science > Mathematics > Popular & Elementary >

Counting & Numeration #41 in Kindle Store > Kindle eBooks > Nonfiction > Science > Mathematics > Pure Mathematics > Number Theory #136 in Books > Science & Math > Mathematics > Popular & Elementary > Counting & Numeration

Customer Reviews

This is a fascinating book that gives one a tour of numbers, their properties, idiosyncracies and uses in quick computation etc. Having each number somewhat independent from one another you can read any chapter at random and gain quite a bit. The text does require concentration to fully appreciate the ideas. Also I found that having a notepad and pencil proves quite handy. In some cases I had to read certain paragraphs twice to fully understand the material. There is one drawback that I just cannot overlook. The editing is substandard. Granted a typo here and there can be forgiven but it appears that in this case the number of errors is quite significant. Hence the four star rating. However, if you like numbers and their properties this is a good book to have by one's bedside to read a chapter or two daily.

It's like a bird book, but for numbers. No need to read it in order, and good for short attention span type reading. There are a million little factoids in here. My son blames this book for making him major in math.

The presentation of the kingdom of numbers as a field guide is a very clever idea. The book is visually engaging, giving numbers the "personality" that I'm sure experienced number theorists feel. It is clear that an enormous amount of effort has gone into the production of this book, and the result is enormously interesting. Unfortunately, not nearly as much effort went into the editing of the text. Numerous errors exist that exhibit carelessness on the part of the author and irresponsibility on the part of the editor(s). The book claims that 2 is a perfect square and that 1 is one order of magnitude larger than 0. Several more mathematical falsehoods and sloppy errors are in the book that will not fit in this review. Two or three mistakes might be attributed to typographical errors, but my list reached 15, and I make no claim that this list is complete. Hopefully this book will be more carefully edited before it goes to paperback, because it is a fine book, aside from its errors.

Not since the great Indian mathematician Srinivasi Ramanujan has anyone gotten so involved in the personality of numbers to the extent as which Bryan Bunch has, and the reader is far better off for it. The classic story about Ramanujan and the personality of numbers is the tale about the number

1729. When he was ill in a hospital in England he was paid a visit by his friend and colleague G. H. Hardy, who had been given a ride in a taxicab bearing that number. Upon greeting Ramanujan, Hardy remarked that 1729 seemed like an exceedingly dull number and he hoped that this would not be taken as a bad omen. Ramanujan immediately answered: "No, no, my friend, on the contrary; it is a very interesting number. It is the smallest number that can be formed by adding two cubes together in two different ways!"

Such is the involvement of author Bryan Bunch with the personality of numbers. His tales of whole numbers from one to googolplex, fractions, algebraic, transcendental and imaginary numbers is sure to entertain and inform any reader with an interest in the world of numbers. His work is such that there is no such thing as an uninteresting number. To prove that there can be no such thing as an uninteresting number, consider the following: 'One' is interesting because it is considered neither prime nor composite; 'two' is interesting because it is the only even prime number; 'three' is the smallest odd prime number; 'four' is the smallest even number to be a square; 'five' is a Fermat prime; 'six' is the smallest perfect number;...until the first 'uninteresting' number is reached. The fact that it is the first uninteresting number immediately makes it interesting!

Despite a few minor errors and the November 14 discovery of the primality of $2^{13446917}-1$ (replacing $2^{6972593}-1$ as the largest known prime number), I still believe that this book would be of great interest to any reader with an interest in numbers. $1729 = 1^3 + 12^3 = 9^3 + 10^3$, in case you are interested in the Ramanujan story.

Not since the great Indian mathematician Srinivasi Ramanujan has anyone gotten so involved in the personality of numbers to the extent as which Bryan Bunch has, and the reader is far better off for it. The classic story about Ramanujan and the personality of numbers is the tale about the number 1729. When he was ill in a hospital in England he was paid a visit by his friend and colleague G. H. Hardy, who had been given a ride in a taxicab bearing that number. Upon greeting Ramanujan, Hardy remarked that 1729 seemed like an exceedingly dull number and he hoped that this would not be taken as a bad omen. Ramanujan immediately answered: "No, no, my friend, on the contrary; it is a very interesting number. It is the smallest number that can be formed by adding two cubes together in two different ways!"

Such is the involvement of author Bryan Bunch with the personality of numbers. His tales of whole numbers from one to googolplex, fractions, algebraic, transcendental and imaginary numbers is sure to entertain and inform any reader with an interest in the world of numbers. His work is such that there is no such thing as an uninteresting number. To prove that there can be no such thing as an uninteresting number, consider the following: 'One' is interesting because it is considered neither prime nor composite; 'two' is interesting because it is the

only even prime number; 'three' is the smallest odd prime number; 'four' is the smallest even number to be a square; 'five' is a Fermat prime; 'six' is the smallest perfect number;...until the first 'uninteresting' number is reached. The fact that it is the first uninteresting number immediately makes it interesting! Despite a few minor errors and the November 14 discovery of the primality of $2^{13446917}-1$ (replacing $2^{6972593}-1$ as the largest known prime number), I still believe that this book would be of great interest to any reader with an interest in numbers. $1729 = 1^3 + 12^3 = 9^3 + 10^3$, in case you are interested in the Ramanujan story.

[Download to continue reading...](#)

The Kingdom of Infinite Number: A Field Guide Number Tracing Book For Preschoolers: Number Tracing Book, Practice For Kids, Ages 3-5, Number Writing Practice An Infinite Number of Parallel Universes The Sixteenth Round: From Number 1 Contender to Number 45472 What is my number?: a game of number clues for 3rd and 4th graders Contemporary's Number Power 4: Geometry: a real world approach to math (The Number Power Series) Aprender Inglês: N.º 3: Textos Paralelos, Fácil de ouvir, Fácil de ler : [Learn English: Number 3, Parallel Texts, Easy to Hear, Easy to Read]: Curso de Áudio de Inglês, N.º 3 [English Audio Course, Number 3] Aprender Alemão, N.º 2: Textos Paralelos, Fácil de ouvir, Fácil de ler [Learn German, Number 2: Parallel Texts, Easy to Hear, Easy to Read]: Curso de Áudio de Alemão, N.º 2 [German Audio Course, Number 2] Number Words and Number Symbols: A Cultural History of Numbers Number Talks: Whole Number Computation, Grades K-5: A Multimedia Professional Learning Resource Field Guide to Binoculars and Scopes (SPIE Field Guide Vol. FG19) (Apie Field Guides) A Field Guide to Western Reptiles and Amphibians: Field marks of all species in western North America, including Baja California (Peterson Field Guides(R)) The Hidden Magic of Walt Disney World: Over 600 Secrets of the Magic Kingdom, Epcot, Disney's Hollywood Studios, and Disney's Animal Kingdom The Phoenix of Destiny: An Epic Kingdom of Fantasy Adventure (Geronimo Stilton and the Kingdom of Fantasy: Special Edition) Kingdom's Quest (Kingdom, Book 5) Kingdom's Quest (Kingdom Series) Gospel of the Kingdom: Scriptural Studies in the Kingdom of God Thy Kingdom Come: Tracing God's Kingdom Program and Covenant Promises Throughout History Kingdom's Dawn (Kingdom, Book 1) Kingdom's Hope (Kingdom, Book 2)

[Contact Us](#)

[DMCA](#)

[Privacy](#)

