



Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition

By Grigory Vekstein

Download now

Read Online ➔

Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein

Based on the author's many years of lectures and tutorials at Novosibirsk State University and the University of Manchester, **Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition** takes a problems-based approach to teaching continuous media. The book's problems and detailed solutions make it an ideal companion text for advanced physics and engineering courses.

Suitable for any core physics program, this revised and expanded edition includes a new chapter on magnetohydrodynamics as well as additional problems and more detailed solutions. Each chapter begins with a summary of the definitions and equations that are necessary to understand and tackle the problems that follow. The text also provides numerous references throughout, including Landau and Lifshitz's famous course of theoretical physics and original journal publications.

⬇ [Download Physics of Continuous Media: Problems and Solution ...pdf](#)

📖 [Read Online Physics of Continuous Media: Problems and Soluti ...pdf](#)

Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition

By Grigory Vekstein

Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein

Based on the author's many years of lectures and tutorials at Novosibirsk State University and the University of Manchester, **Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition** takes a problems-based approach to teaching continuous media. The book's problems and detailed solutions make it an ideal companion text for advanced physics and engineering courses.

Suitable for any core physics program, this revised and expanded edition includes a new chapter on magnetohydrodynamics as well as additional problems and more detailed solutions. Each chapter begins with a summary of the definitions and equations that are necessary to understand and tackle the problems that follow. The text also provides numerous references throughout, including Landau and Lifshitz's famous course of theoretical physics and original journal publications.

Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein Bibliography

- Sales Rank: #4021470 in Books
- Brand: Brand: CRC Press
- Published on: 2013-03-07
- Original language: English
- Number of items: 1
- Dimensions: 9.20" h x .60" w x 6.10" l, .95 pounds
- Binding: Paperback
- 260 pages

 [Download Physics of Continuous Media: Problems and Solution ...pdf](#)

 [Read Online Physics of Continuous Media: Problems and Soluti ...pdf](#)

Editorial Review

Review

This book presents an excellent and exemplary collection of up-to-date exercises and their solutions on continuous media, covering a wide range of topics from electro-, magnetohydro- and fluid dynamics, and from the theory of elasticity. The author is an international expert with many years of research and teaching experience in the field. Each chapter begins with a comprehensive summary of definitions and the mathematical description of the physical laws necessary to understand and solve the series of problems that follow. The problems and exercises are a gradual built up in each of the topics and they introduce the reader step by step into the principles of the subject. The solutions are well explained and detailed with additional readings when necessary. This exercise book is written in a true scholarly manner that allows the reader to understand the basic principles and physical laws of continuous media. This problem-solving book is highly recommended to graduate and postgraduate students, postdoctoral researchers or to scientists who want to refresh their knowledge or teach the subject at university level.

?Robert Erdelyi, University of Sheffield

Professor Vekstein's book is a wonderful resource for both condensed-matter physics courses and self-study. The problems are chosen to illustrate physical phenomena without unnecessary complications. The solutions are very clear; they set the student on a sure path to solution, while still leaving some details to be worked out by the student. I think this is a pedagogically efficient format. I recommend this book to every student of continuous matter, as well to any scientist wishing to familiarize themselves with this important branch of physics. I fondly remember a few of the problems in this book from being a student in Professor Vekstein's Physics of Continuous Media class at Novosibirsk University some 30 years ago.

?Dmitry Budker, University of California, Berkeley

Vekstein is a brilliant scientist with a strong international reputation. His book is highly recommended and fills a unique niche. It will be invaluable to final year physics and applied mathematics undergraduates, together with masters and PhD students, by complementing the standard textbooks on electromagnetism, fluid dynamics and MHD. Drawing on his long experience of superb teaching of these subjects at a high level, Vekstein has compiled an intriguing set of problems in these areas that reveal common themes often missing from the standard texts. He also masterfully guides the reader through the complexities of their solutions.

?Eric Priest, University of St Andrews

Classical physics constitutes a major cornerstone in the foundation of contemporary science. There are several well-known textbooks presenting the theoretical background, but much less handbooks providing practical exercises which are indispensable for the learning process.

This book written by Grigory Vekstein provides readers with a unique opportunity of studying the fundamentals of classical physics "hands on," by doing some important and original exercises following the detailed, extended comments. Thanks to the pedagogical talent and experience of the author, readers have an opportunity to grasp all basic elements of mechanics of fluids and solids as well as electrodynamics in one nicely composed and relatively compact book.

?Vladimir Tikhonchuk, University of Bordeaux

Users Review

From reader reviews:

Marina Tijerina:

This Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition usually are reliable for you who want to be considered a successful person, why. The key reason why of this Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition can be one of many great books you must have will be giving you more than just simple examining food but feed a person with information that possibly will shock your before knowledge. This book is actually handy, you can bring it everywhere and whenever your conditions both in e-book and printed ones. Beside that this Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition forcing you to have an enormous of experience such as rich vocabulary, giving you test of critical thinking that we realize it useful in your day pastime. So , let's have it and luxuriate in reading.

Stephanie Carter:

This book untitled Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition to be one of several books in which best seller in this year, honestly, that is because when you read this reserve you can get a lot of benefit into it. You will easily to buy this particular book in the book retail outlet or you can order it by means of online. The publisher on this book sells the e-book too. It makes you more easily to read this book, as you can read this book in your Touch screen phone. So there is no reason to you personally to past this publication from your list.

John Fouts:

As a university student exactly feel bored to be able to reading. If their teacher asked them to go to the library as well as to make summary for some book, they are complained. Just little students that has reading's spirit or real their hobby. They just do what the educator want, like asked to the library. They go to there but nothing reading significantly. Any students feel that reading through is not important, boring in addition to can't see colorful photos on there. Yeah, it is for being complicated. Book is very important in your case. As we know that on this era, many ways to get whatever we really wish for. Likewise word says, many ways to reach Chinese's country. Therefore this Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition can make you feel more interested to read.

Nicole Powell:

A lot of people said that they feel bored stiff when they reading a guide. They are directly felt the item when they get a half portions of the book. You can choose the actual book Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition to make your own personal reading is interesting. Your personal skill of reading expertise is developing when you just like reading. Try to choose very simple book to make you enjoy to learn it and mingle the opinion about book and examining especially. It is to be 1st opinion for you to like to available a book and examine it. Beside that the book

Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition can to be your brand new friend when you're really feel alone and confuse in doing what must you're doing of this time.

Download and Read Online Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein #NK5SYUW9L7E

Read Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein for online ebook

Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein Free PDF d0wnl0ad, audio books, books to read, good books to read, cheap books, good books, online books, books online, book reviews epub, read books online, books to read online, online library, greatbooks to read, PDF best books to read, top books to read Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein books to read online.

Online Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein ebook PDF download

Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein Doc

Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein Mobipocket

Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein EPub

NK5SYUW9L7E: Physics of Continuous Media: Problems and Solutions in Electromagnetism, Fluid Mechanics and MHD, Second Edition By Grigory Vekstein