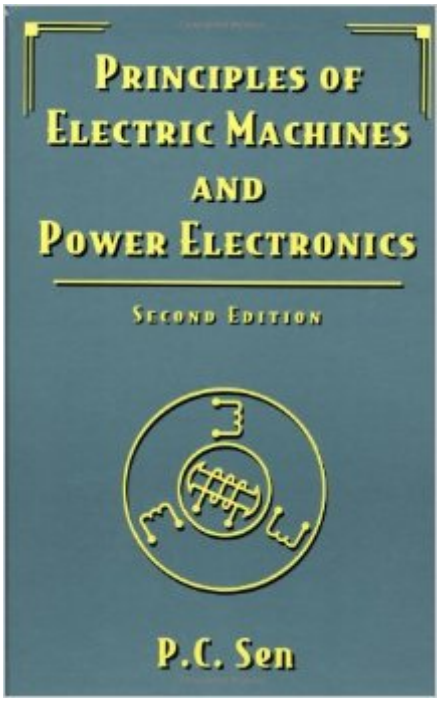
Principles Of Electric Machines And Power Electronics, Second Edition



Synopsis

This new edition combines the traditional areas of electric machinery with the latest in modern control and power electronics. It includes coverage of multi-machine systems, brushless motors and switched reluctance motors, as well as constant flux and constant current operation of induction motors. It also features additional material on new solid state devices such as Insulated Gate Bipolar Transistors and MOS-Controlled Thrysistors.

Book Information

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Customer Reviews

If you need an engineering introduction into generators, motors, transformers, and the likes this book is good. The illustrations not only show simplistic diagrams but actual machines one will find in the job. Has solved examples and end of chapter questions. Covers a lot of ground but delivers the concepts well.

This author is accomplished in his field, unfortunately he really doesn’t care to impart his knowledge to the masses as judged by this book. Topics are introduced without motivation or very little. Only the simplest ideas which the student presumably already knows are explained in any detail. The needed and more challenging concepts which is why you buy a book like this are not developed at all. This perhaps at best was meant to help his students remember and review his lectures. Unfortunately I don’t have access to his lectures. If you like to apply Kirchoff’s Laws to Steinmetz diagrams then this is the book for you. If you want to know why you have a Steinmetz diagram , how

it models your machine and what these circuit theory calculations mean for this model look elsewhere.

There’s a lot of good information in this book, and the writers tried really hard to present in a clear and well-organized manner. And a lot of the time, they succeed. But a lot of the time, they don’t. A big chunk of that can be traced to an index that needs more entries, including a more thorough consideration of the multiple ways someone might look something up. Also, large portions of the books convey information by using variable names, and worse, a lot of different quatities will have the same symbol and be differentiated only by the subscript--and if you forget what that one symbol means and can’t find that one place where it was defined, too bad. A summary table of symbols is sorely needed.So, yeah. I’ve read worse, and I’ve read better.

This is a great book if you are taking a course involving Electric Machines. I usually read a chapter or part of it before my class, and it is quite difficult to understand everything, mainly because this book assumes you actually know a lot about electric circuits. I’d always wait until my class to listen to my teacher’s explanation, who knows a lot about this book. I would recommend this only if you have previously taken courses about electricity and magnetism, or if you have a teacher that can answer your doubts.

Complete of terms and subjects in electric machines.The author sometimes confuse the readers by his ambiguous explanations especially in DC machines and power electronic chapter.Not recommended for a new reader in the context of electric machines.Recommended for readers who learnt basic stuffs in electric machines before and want to have a kind-of dictionary to remember the terminologies and formulas.

I’ve just finished a university course with this book as the reference, and it’s not been a happy experience. The author has a poor grasp of the concept of grammar-checking, and doesn’t follow his own standards (sometimes including the imaginary "i"/"j" in formulas and sometimes leaving it out).But the biggest problem is, the author makes no attempt to get the reader/student to understand WHY and HOW machine behavior is derived. Instead of deriving any equations (via KCL/KVL), PC Sen lists the equations as-is and expects you to memorize them.Unfortunately, this is an engineering course and not English Lit: engineers need explanations and mathematics, not a "plug the variable in here and substitute to determine the answer" book.Throughout the course the

professor would have to point out inconstencies in the formulas provided and direct students to alternative online references as a substitute for this poor book's pitiful attempt at explaining power electronics to readers.

terrible textbookI took this course from the university that the author taught at. the book was this textbook. the pedagogy was terrible, some units such as (At/m) were not properly defined, the commentary was minimal except where it was copied from other books. it seems that the auther cannot be bothered to give a thorough explanation of the the basic concepts, and would only add in text as an afterthought. as a practicing professional in the field and as someone who has taught university level courses, I would say, find another textbook

Cooking Tools to Work! Book 1) Pressure Cooker: 365 Days of Electric Pressure Cooker Recipes (Pressure Cooker, Pressure Cooker Recipes, Pressure Cooker Cookbook, Electric Pressure Cooker ... Instant Pot Pressure Cooker Cookbook) Electric pressure cooker: top 40 easy recipes for your health: pressure cooker cookbook, healthy recipes, slow cooker, electric pressure coookbook Electric Motors in the Home Workshop: A Practical Guide to Methods of Utilizing Readily Available Electric Motors in Typical Small Workshop Applications (Workshop Practice Series)