Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering)

By Stefano Grivet-Talocia, Bjorn Gustavsen

Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen

Offers an overview of state of the art passive macromodeling techniques with an emphasis on black-box approaches

This book offers coverage of developments in linear macromodeling, with a focus on effective, proven methods. After starting with a definition of the fundamental properties that must characterize models of physical systems, the authors discuss several prominent passive macromodeling algorithms for lumped and distributed systems and compare them under accuracy, efficiency, and robustness standpoints. The book includes chapters with standard background material (such as linear time-invariant circuits and systems, basic discretization of field equations, state-space systems), as well as appendices collecting basic facts from linear algebra, optimization templates, and signals and transforms. The text also covers more technical and advanced topics, intended for the specialist, which may be skipped at first reading.

- Provides coverage of black-box passive macromodeling, an approach developed by the authors
- Elaborates on main concepts and results in a mathematically precise way using easy-to-understand language
- Illustrates macromodeling concepts through dedicated examples
- Includes a comprehensive set of end-of-chapter problems and exercises

Passive Macromodeling: Theory and Applications serves as a reference for senior or graduate level courses in electrical engineering programs, and to engineers in the fields of numerical modeling, simulation, design, and optimization of electrical/electronic systems.

Stefano Grivet-Talocia, PhD, is an Associate Professor of Circuit Theory at the

Politecnico di Torino in Turin, Italy, and President of IdemWorks. Dr. Grivet-Talocia is author of over 150 technical papers published in international journals and conference proceedings. He invented several algorithms in the area of passive macromodeling, making them available through IdemWorks.

Bjørn Gustavsen, PhD, is a Chief Research Scientist in Energy Systems at SINTEF Energy Research in Trondheim, Norway. More than ten years ago, Dr. Gustavsen developed the original version of the vector fitting method with Prof. Semlyen at the University of Toronto. The vector fitting method is one of the most widespread approaches for model extraction. Dr. Gustavsen is also an IEEE fellow.

Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering)

By Stefano Grivet-Talocia, Bjorn Gustavsen

Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen

Offers an overview of state of the art passive macromodeling techniques with an emphasis on black-box approaches

This book offers coverage of developments in linear macromodeling, with a focus on effective, proven methods. After starting with a definition of the fundamental properties that must characterize models of physical systems, the authors discuss several prominent passive macromodeling algorithms for lumped and distributed systems and compare them under accuracy, efficiency, and robustness standpoints. The book includes chapters with standard background material (such as linear time-invariant circuits and systems, basic discretization of field equations, state-space systems), as well as appendices collecting basic facts from linear algebra, optimization templates, and signals and transforms. The text also covers more technical and advanced topics, intended for the specialist, which may be skipped at first reading.

- Provides coverage of black-box passive macromodeling, an approach developed by the authors
- Elaborates on main concepts and results in a mathematically precise way using easy-to-understand language
- Illustrates macromodeling concepts through dedicated examples
- Includes a comprehensive set of end-of-chapter problems and exercises

Passive Macromodeling: Theory and Applications serves as a reference for senior or graduate level courses in electrical engineering programs, and to engineers in the fields of numerical modeling, simulation, design, and optimization of electrical/electronic systems.

Stefano Grivet-Talocia, PhD, is an Associate Professor of Circuit Theory at the Politecnico di Torino in Turin, Italy, and President of IdemWorks. Dr. Grivet-Talocia is author of over 150 technical papers published in international journals and conference proceedings. He invented several algorithms in the area of passive macromodeling, making them available through IdemWorks.

Bjørn Gustavsen, PhD, is a Chief Research Scientist in Energy Systems at SINTEF Energy Research in Trondheim, Norway. More than ten years ago, Dr. Gustavsen developed the original version of the vector fitting method with Prof. Semlyen at the University of Toronto. The vector fitting method is one of the most widespread approaches for model extraction. Dr. Gustavsen is also an IEEE fellow.

Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen Bibliography

- Sales Rank: #4014075 in Books

- Published on: 2015-12-07
- Original language: English
- Number of items: 1
- Dimensions: 9.30" h x 1.50" w x 6.30" l, .0 pounds
- Binding: Hardcover
- 904 pages

Download and Read Free Online Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen

Editorial Review

From the Back Cover

Offers an overview of state of the art passive macromodeling techniques with an emphasis on black-box approaches

This book offers coverage of developments in linear macromodeling, with a focus on effective, proven methods. After starting with a definition of the fundamental properties that must characterize models of physical systems, the authors discuss several prominent passive macromodeling algorithms for lumped and distributed systems and compare them under accuracy, efficiency, and robustness standpoints. The book includes chapters with standard background material (such as linear time-invariant circuits and systems, basic discretization of field equations, state-space systems), as well as appendices collecting basic facts from linear algebra, optimization templates, and signals and transforms. The text also covers more technical and advanced topics, intended for the specialist, which may be skipped at first reading.

- Provides coverage of black-box passive macromodeling, an approach developed by the authors
- Elaborates on main concepts and results in a mathematically precise way using easy-to-understand language
- Illustrates macromodeling concepts through dedicated examples
- Includes a comprehensive set of end-of-chapter problems and exercises

Passive Macromodeling: Theory and Applications serves as a reference for senior or graduate level courses in electrical engineering programs, and to engineers in the fields of numerical modeling, simulation, design, and optimization of electrical/electronic systems.

Stefano Grivet-Talocia, PhD, is an Associate Professor of Circuit Theory at the Politecnico di Torino in Turin, Italy, and President of IdemWorks. Dr. Grivet-Talocia is author of over 150 technical papers published in international journals and conference proceedings. He invented several algorithms in the area of passive macromodeling, making them available through IdemWorks.

Bjørn Gustavsen, PhD, is a Chief Research Scientist in Energy Systems at SINTEF Energy Research in Trondheim, Norway. More than ten years ago, Dr. Gustavsen developed the original version of the vector fitting method with Prof. Semlyen at the University of Toronto. The vector fitting method is one of the most widespread approaches for model extraction. Dr. Gustavsen is also an IEEE fellow.

About the Author
Stefano Grivet-Talocia, PhD, is an Associate Professor of Circuit Theory at the Politecnico di Torino in Turin, Italy, and President of IdemWorks. Dr. Grivet-Talocia is author of over 150 technical papers published in international journals and conference proceedings. He invented several algorithms in the area of passive macromodeling, making them available through IdemWorks.

Bjørn Gustavsen, PhD, is a Chief Research Scientist in Energy Systems at SINTEF Energy Research in Trondheim, Norway. More than ten years ago, Dr. Gustavsen developed the original version of the vector

fitting method with Prof. Semlyen at the University of Toronto. The vector fitting method is one of the most widespread approaches for model extraction. Dr. Gustavsen is also an IEEE fellow.

Users Review

From reader reviews:

Della Richardson:

Do you have favorite book? In case you have, what is your favorite's book? Guide is very important thing for us to be aware of everything in the world. Each e-book has different aim or even goal; it means that book has different type. Some people really feel enjoy to spend their the perfect time to read a book. They can be reading whatever they get because their hobby is reading a book. Consider the person who don't like looking at a book? Sometime, particular person feel need book whenever they found difficult problem or even exercise. Well, probably you should have this Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering).

Lorraine Edler:

This Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) book is not really ordinary book, you have it then the world is in your hands. The benefit you obtain by reading this book is usually information inside this guide incredible fresh, you will get facts which is getting deeper you read a lot of information you will get. This kind of Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) without we know teach the one who looking at it become critical in contemplating and analyzing. Don't be worry Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) can bring if you are and not make your tote space or bookshelves' become full because you can have it with your lovely laptop even cell phone. This Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) having great arrangement in word along with layout, so you will not experience uninterested in reading.

Joseph Nixon:

Is it anyone who having spare time after that spend it whole day by simply watching television programs or just lying down on the bed? Do you need something totally new? This Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) can be the reply, oh how comes? A fresh book you know. You are therefore out of date, spending your spare time by reading in this brand new era is common not a geek activity. So what these books have than the others?

Theresa Frost:

Don't be worry if you are afraid that this book may filled the space in your house, you might have it in e-book technique, more simple and reachable. This kind of Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) can give you a lot of close friends because by you looking at this one book you have matter that they don't and make anyone more like an interesting person.

This kind of book can be one of a step for you to get success. This book offer you information that maybe your friend doesn't recognize, by knowing more than other make you to be great persons. So , why hesitate? We should have Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering).

Download and Read Online Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen #51CIMG9YNE6

Read Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen for online ebook

Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen 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 Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen books to read online.

Online Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen ebook PDF download

Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen Doc

Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen Mobipocket

Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen EPub

51CIMG9YNE6: Passive Macromodeling: Theory and Applications (Wiley Series in Microwave and Optical Engineering) By Stefano Grivet-Talocia, Bjorn Gustavsen