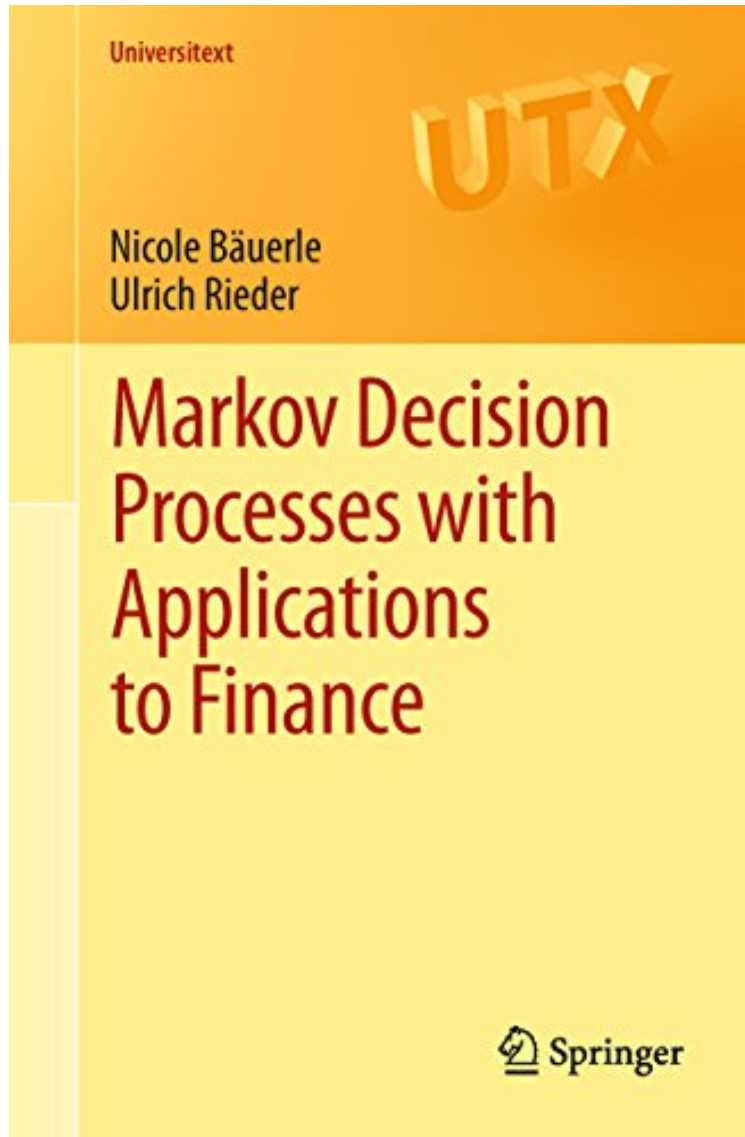


[E-BOOK] Markov Decision Processes with Applications to Finance (Universitext)

Markov Decision Processes with Applications to Finance (Universitext)

Nicole Bäuerle, Ulrich Rieder

**Download PDF | ePub | DOC | audiobook | ebooks*



#2962583 in eBooks 2011-06-06 2011-06-06 File Name: B00F7765PK | File size: 22.Mb

Nicole Bäuerle, Ulrich Rieder : Markov Decision Processes with Applications to Finance (Universitext)
before purchasing it in order to gauge whether or not it would be worth my time, and all praised Markov Decision Processes with Applications to Finance (Universitext):

1 of 1 people found the following review helpful. Solid, challenging
By Dimitri Shvorob
An excellent book, but one for people with serious mathematical bent; I would be very impressed with an undergrad or a master's student in finance

(supposedly part of target audience) able to handle this book's technical level, and perhaps point him/her to less challenging references. (For example, dynamic programming is a standard part of PhD-level macroeconomics coursework, with Lucas-Stokey and Sargent being popular textbooks). No complaints - the authors are entitled to their choice of audience, and, as far as I can tell, do a brilliant job with the text - but there's a certain disappointment about the missed opportunity to *popularize* a subject.

The theory of Markov decision processes focuses on controlled Markov chains in discrete time. The authors establish the theory for general state and action spaces and at the same time show its application by means of numerous examples, mostly taken from the fields of finance and operations research. By using a structural approach many technicalities (concerning measure theory) are avoided. They cover problems with finite and infinite horizons, as well as partially observable Markov decision processes, piecewise deterministic Markov decision processes and stopping problems. The book presents Markov decision processes in action and includes various state-of-the-art applications with a particular view towards finance. It is useful for upper-level undergraduates, Master's students and researchers in both applied probability and finance, and provides exercises (without solutions).