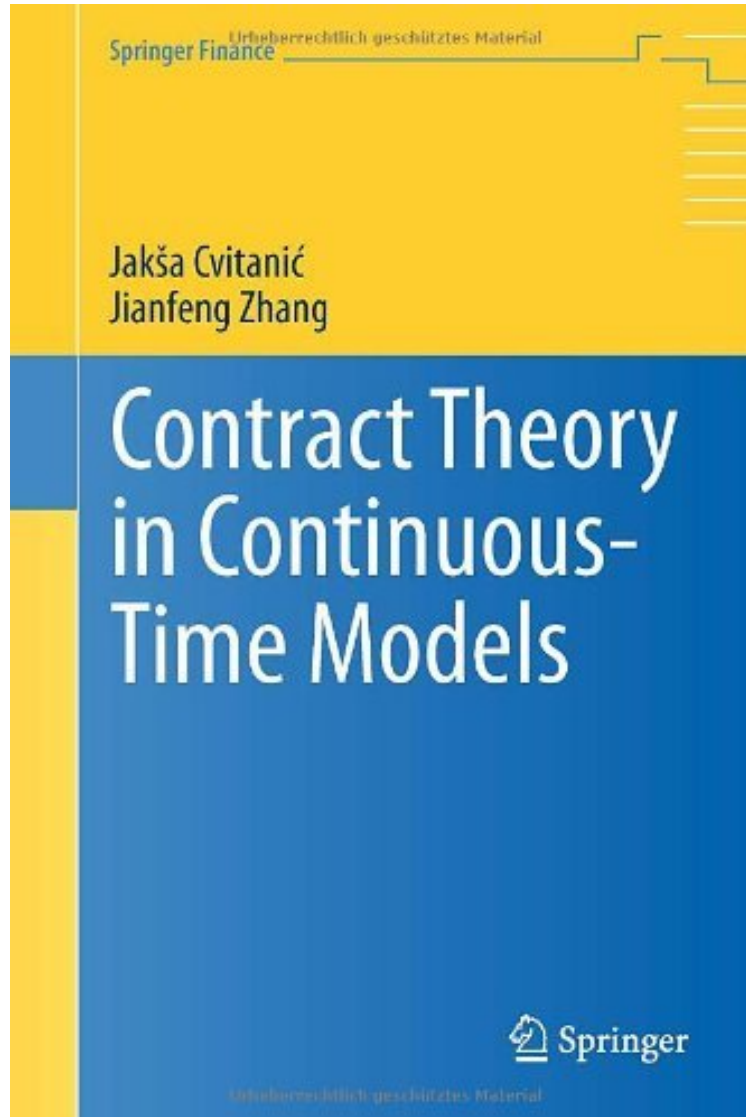


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Jaksa Cvitanic, Jianfeng Zhang

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Jaksa Cvitanic, Jianfeng Zhang : Contract Theory in Continuous-Time Models (Springer Finance) before purchasing it in order to gauge whether or not it would be worth my time, and all praised Contract Theory in Continuous-Time Models (Springer Finance):

1 of 3 people found the following review helpful. A decisive book about a very important argument. By Edoardo Angeloni The theory, that we can read here, is a model surely significant about the asymmetric information. The author has an approach particularly important, because he is able to apply the mathematics theory. In fact he is a strong expert of stochastics, and he allows us to follow so many aspects. We can see what is the risk, the adverse selection, the control theory, the backward- forward methods. This approach is no very simple, but a lector, who knows

sufficiently good the mathematics, should be interested to study it.

In recent years there has been a significant increase of interest in continuous-time Principal-Agent models, or contract theory, and their applications. Continuous-time models provide a powerful and elegant framework for solving stochastic optimization problems of finding the optimal contracts between two parties, under various assumptions on the information they have access to, and the effect they have on the underlying "profit/loss" values. This monograph surveys recent results of the theory in a systematic way, using the approach of the so-called Stochastic Maximum Principle, in models driven by Brownian Motion. Optimal contracts are characterized via a system of Forward-Backward Stochastic Differential Equations. In a number of interesting special cases these can be solved explicitly, enabling derivation of many qualitative economic conclusions.

"The book under review provides a complete treatment of the principal-agent problem that covers all cases treated in economic literature . . . It is the first of its kind in that it provides a fully developed mathematical framework addressing the principal-agent problem with complete proofs and explanations of all mathematical tools used therein. . . . The introduction of this book is accessible to a general audience." (Olympia Hadjiiladis, Bulletin of the American Mathematical Society, Vol. 52 (3), July, 2015)

"The present book presents a nice exposition of the theory of the stochastic maximum principle, starting with BSDEs, and of its applications to contract theory. . . . I recommend it to anyone working on or teaching the mathematical aspects of contract theory and/or stochastic control." (Etienne Pardoux, SIAM , Vol. 57 (2), June, 2015)

"This book considers contract theory in continuous time. . . . This book is a good reference book for researchers and graduate students in economic theory, finance and mathematical economics. Continuous-time contract theory is particularly useful in finance. This book provides a basic methodological framework, which can be used to develop further advances, both in applications and in theory." (Susheng Wang, Mathematical s, August, 2013)

From the Back Cover

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About the Author

Jakšcarić; Cvitanić held positions at Columbia University (Statistics), University of Southern California (Mathematics and Economics), and currently at Caltech (Social Sciences). He has served on the editorial boards of journals in the areas of Financial Mathematics, Applied Probability and Optimization, as well as on the Council of the Bachelier Finance Society. Jianfeng Zhang is currently associate professor at the University of Southern California (Mathematics Department).