1. Record Nr. UNINA9910746096203321 Autore Liu Peng Titolo Quantitative Trading Strategies Using Python: Technical Analysis, Statistical Testing, and Machine Learning / / by Peng Liu Berkeley, CA:,: Apress:,: Imprint: Apress,, 2023 Pubbl/distr/stampa **ISBN** 1-4842-9675-3 [1st ed. 2023.] Edizione Descrizione fisica 1 online resource (341 pages) Disciplina 005.133 Electronic trading of securities Soggetti Python (Computer program language) Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Description based upon print version of record. Implementing the Momentum Trading Strategy Nota di contenuto Chapter 1: Introduction to Quantitative Trading -- Chapter 2: Understanding the Electronic Market -- Chapter 3: Understanding Risk and Return -- Chapter 4: Forward and Futures Contracts -- Chapter 5: Trend Following Strategy -- Chapter 6: Momentum Trading Strategy --Chapter 7: Backtesting A Trading Strategy -- Chapter 8: Statistical Arbitrage with Hypothesis Testing -- Chapter 9: Optimizing Trading Strategies with Bayesian Optimization -- Chapter 10: Optimizing Trading Strategies with Machine Learning. Build and implement trading strategies using Python. This book will Sommario/riassunto introduce you to the fundamental concepts of quantitative trading and shows how to use Python and popular libraries to build trading models and strategies from scratch. It covers practical trading strategies coupled with step-by-step implementations that touch upon a wide range of topics, including data analysis and visualization, algorithmic trading, backtesting, risk management, optimization, and machine learning, all coupled with practical examples in Python. Part one of Quantitative Trading Strategies with Python covers the fundamentals of

trading strategies, including an introduction to quantitative trading, the electronic market, risk and return, and forward and futures contracts.

following, momentum trading, and evaluation process via backtesting.

Part II introduces common trading strategies, including trend-

Part III covers more advanced topics, including statistical arbitrage using hypothesis testing, optimizing trading parameters using Bayesian optimization, and generating trading signals using a machine learning approach. Whether you're an experienced trader looking to automate your trading strategies or a beginner interested in learning quantitative trading, this book will be a valuable resource. Written in a clear and concise style that makes complex topics easy to understand, and chock full of examples and exercises to help reinforce the key concepts, you'll come away from it with a firm understanding of core trading strategies and how to use Python to implement them. You will: Master the fundamental concepts of quantitative trading Use Python and its popular libraries to build trading models and strategies from scratch Perform data analysis and visualization, algorithmic trading, backtesting, risk management, optimization, and machine learning for trading strategies using Python Utilize common trading strategies such as trend-following, momentum trading, and pairs trading Evaluate different quantitative trading strategies by applying the relevant performance measures and statistics in a scientific manner during backtesting.