

Computational Investing, Part I

031: Mechanics of the Market

Find out how modern electronic markets work, why stock prices change in the ways they do, and how computation can help our understanding of them. Learn to build algorithms and visualizations to inform investing practice.



Objectives:

- Understand order types.
- Understand order book at exchanges.
- Understand how buy/sell orders drive prices up or down.
- Understand the basic infrastructure of an exchange.
- Understand the major computational components of a hedge fund.



Types of Orders (at the Exchange)

- Buy, Sell
- Market, Limit
- Shares
- Price (if Limit)



The Order Book

Ask	\$100.10	100

- Ask \$100.05 500
- Ask \$100.00 1000
- Bid \$99.95 100
- Bid \$99.90 50
- Bid \$99.85



Live Example