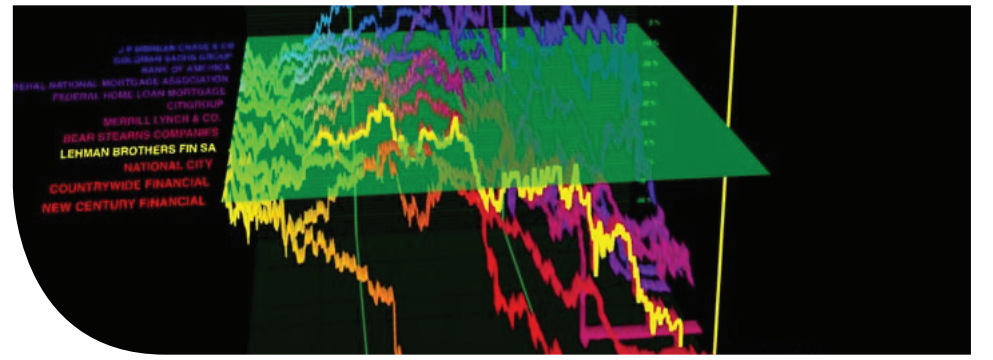


# Career Spotlight

## Quantitative Financial Market Analyst

*A quantitative financial market analyst is a person who works in finance using numerical or quantitative techniques to analyze markets for various purposes.*



### EDUCATION

Quantitative financial market analysts often come from mathematics or physics backgrounds rather than finance related fields, and they are a major source of employment for people with physics and mathematics Ph.D's. In almost all the cases employers look for a post graduate degree with specialization in a financial stream and some stress on engineering. Computer programming and math have a lot of weight and many employers look for knowledge of advanced calculus and C++ programming skills.

### WHEN MATH IS USED

A quantitative analyst is essentially a financial engineer who uses advanced mathematics to formulate the pricing as well as determining the levels of risks involved in a particular business model or strategy. To make such important decisions a quant uses the current financial data along with the past economic trends. Based on the data obtained from the research, a model is created that decides the prices for trading various equities and shares. You will find that almost every quant is very comfortable with statistics and uses logical analysis of the data as well as some educated guesses to find out the best investment plans for their clients and employers.

### POTENTIAL EMPLOYERS

Quantitative financial market analysts work in the financial markets, specifically in the banking industry to support trading and sales functions.

### FACTS

Harry Markowitz's 1952 Ph.D thesis "Portfolio Selection" was one of the first papers to formally adapt mathematical concepts to finance.

### CITATIONS

[http://en.wikipedia.org/wiki/Quantitative\\_analyst](http://en.wikipedia.org/wiki/Quantitative_analyst)

[http://www.payscale.com/research/US/Job=Quantitative\\_Analyst/Salary](http://www.payscale.com/research/US/Job=Quantitative_Analyst/Salary)

<http://www.indeed.com/salary/Quantitative-Analyst.html>

<http://www.math.uci.edu/undergraduate/major.php>

### MATH REQUIRED

- College Algebra
- Trigonometry
- Calculus I and II
- Linear Algebra
- Differential Equations

**Low-end Salary:** \$60,063/yr

**Median Salary:** \$73,670/yr

**High-end Salary:** \$92,849/yr