

## **About the Course**

The Algorithmic Trading course will provide an understanding of algorithmic trading strategies and their implementation in financial markets. Participants will learn various trading methodologies, strategies, and system architecture behind algorithmic trading. They will also gain insights into risk management and coding their strategies into algorithms.

### Course Content

### ▶ Introduction to Algorithmic Trading

- Introduction to Algorithmic Trading
- Different Trading Methodologies
- Trends in Algorithmic Trading: Global and India
- Benefits of Algorithmic Trading

#### Capital Market Strategies

- Calendar Spread
- Cash Future Arbitrage Strategy
- Index Arbitrage
- Pair Trading
- News-Based Trading Strategies
- Conversion- Reversal

### Strategy Development and Back-testing

- Ideation and Strategy Creation
- Common Pitfalls(Look-ahead bias, survivorship bias etc.)
- Strategy Module
- Parameter Optimization
- Transaction Cost Analysis
- Performance Measurement Statistics

### Order Types

- Different Order Types
- Execution Trading Strategies

### Algorithmic Trading: System Architecture

- Algorithm Trading Mechanics
- Market Data
- CEP Engine
- Order Routing / Order Manager
- Colocation
- Smart Order Routing (SOR)
- Connectivity Options
- Operational considerations and pitfalls

### ► Money Management and Risk Management

- Optimal Capital Allocation
- Different stages involved in RiskManagement
- Risk Management Specific to High
  Frequency & Algorithmic Trading

# **Course Features**

Live online interactive classes by professional faculty

Class recordings will be available for 3 months

Course access through Mobile, Desktop & Laptop

**Get certified by NSE Academy** 

**Access to Content on Digital Platform** 

# **Course Objective**

The course aims to equip participants with the knowledge and skills to build, back-test, optimize, and implement algorithmic trading strategies. Participants will learn to code their own strategies and gain practical insights into risk management and optimal capital allocation.

# **Eligibility**

This course is suitable for individuals with a basic understanding of financial markets and trading concepts. Prior programming knowledge is helpful but not mandatory. It is designed for investors, financial professionals, and anyone interested in algorithmic trading strategies.

### **Contact Details**

Masheera: +91 7715905414 | Madhu: +91 9342596944

Email ID: gen\_pdp@nse.co.in

Fees: Rs 5,500 + 18% GST (Rs 6,490 inclusive of GST)

REGISTER & PAY NOW

# **Refund Policy**

- Registration Fees paid by the candidate shall not be refunded under any circumstances after the classes have commenced.
- In case the registered candidate wishes to cancel the registration for the program the candidate shall inform NSE Academy via a written request/Email request a minimum of 2 working days before the commencement of the program. Once approved the candidate will be refunded 90% of the total course fees paid for the respective program.

<sup>\*</sup> NSE Academy reserves the right to change or modify the class date/ time due to certain exigencies.