

## Financial Engineering Fundamentals

*Düsseldorf (Germany)*

*17 - 21 February 2025*

UK Training

**PARTNER**



## Financial Engineering Fundamentals

Code: FA28 From: 17 - 21 February 2025 City: Düsseldorf (Germany) Fees: 4400 Pound

### Introduction

The Financial Engineering Fundamentals course is designed to provide participants with a comprehensive understanding of the principles and practices of financial engineering. This course will explore the key concepts and techniques used in the field, equipping participants with the knowledge and skills necessary to analyze and solve complex financial problems. Whether you are a finance professional seeking to enhance your expertise or an individual interested in pursuing a career in financial engineering, this course will provide you with a solid foundation in the subject.

### Objectives

- Understand the key principles and concepts of financial engineering.
- Gain proficiency in applying quantitative techniques to financial problem-solving.
- Learn how to analyze and manage financial risk using various mathematical models.
- Acquire knowledge of derivative instruments and their applications in financial markets.
- Develop the skills to design and implement financial engineering strategies.

### Course Outline

#### Day 1

##### Introduction to Financial Engineering

- Definition and scope of financial engineering
- Historical overview and evolution of the field
- Role of financial engineering in modern finance
- Regulatory framework and ethical considerations

#### Day 2

##### Quantitative Techniques in Financial Engineering

- Time value of money and discounting principles
- Probability theory and statistical concepts
- Mathematical modeling in finance
- Analysis of financial time series data

#### Day 3

A graphic of a chessboard with several chess pieces (a king, a pawn, and a knight) on it, set against a background of concentric circles. The text 'UK Training PARTNER' is overlaid on the right side of the board.

UK Training  
**PARTNER**

### Financial Risk Management

- Introduction to financial risk and risk management
- Value at Risk VaR modeling and analysis
- Portfolio risk assessment and diversification
- Credit risk modeling and default probabilities

### Day 4

#### Derivative Instruments and Markets

- Overview of derivative instruments: futures, options, swaps
- Pricing and valuation of derivatives
- Hedging strategies using derivatives
- Derivatives in risk management and trading

### Day 5

#### Financial Engineering Applications

- Structured finance and securitization
- Financial engineering in investment banking
- Designing and implementing trading strategies
- Case studies and practical applications

UK Training  
**PARTNER**





## Blackbird Training Cities

### Europe



Zurich (Switzerland )



Stockholm (Sweden)



Lyon (France)



Copenhagen (Denmark)



Bordeaux (France)



Annecy (France)



Oslo (Norway)



Edinburgh (UK)



Glasgow (Scotland )



Malaga (Spain)



London (UK)



Istanbul (Turkey)



Amsterdam (Netherlands)  
(Switzerland)



Düsseldorf (Germany)



Paris (France)



Barcelona (Spain)



Munich (Germany)



Geneva



Prague (Czech)



Vienna (Austria)



Rome (Italy)



Brussels (Belgium)



Madrid (Spain)



Berlin (Germany)



Lisbon (Portugal)



Manchester (UK)



Milan (Italy)

### USA & Canada



Los Angeles (USA)



Florida (USA)



Online



Boston (USA)



Washington (USA)



Miami(USA)



New York (USA)



Toronto (Canada)



## Blackbird Training Cities

### Asia



Baku (Azerbaijan)



Maldives (Maldives)



Manila (Philippines)



Bali (Indonesia )



Bangkok (Thailand)



Beijing (China)



Moscow (Russia )  
(Malaysia)



Singapore (Singapore )



Sydney (Australia)



Tokyo (Japan)



Dubai (UAE)



Kuala Lumpur



Jakarta (Indonesia)

### Africa



Kigali (Rwanda)



Cape Town (South Africa)



Accra (Ghana)



Lagos (Nigeria)



Marrakesh (Marocco)



Nairobi (Kenya)



Cairo (Egypt)



Sharm El-Sheikh (Egypt)



Casablanca (Morocco)



Tunis (Tunisia)



## Blackbird Training Clients



UK Training  
**PARTNER**



## Blackbird Training Categories

### Management & Admin

- Professional Skills
- Finance, Accounting, Budgeting
- Media & Public Relations
- Project Management
- Human Resources
- Audit & Quality Assurance
- Marketing, Sales, Customer Service
- Secretary & Admin
- Supply Chain & Logistics
- Management & Leadership
- Agile and Refinement

### Technical Courses

- Hospital Management
- Public Sector
- Special Workshops
- Oil & Gas Engineering
- Telecom Engineering
- IT & IT Engineering
- Health & Safety
- Law and Contract Management
- Customs & Safety
- Aviation
- C-Suite Training



 International House 185 Tower Bridge  
Road London SE1 2UF United Kingdom

 +44 7401 1773 35  
+44 7480 775526

 [training@blackbird-training.com](mailto:training@blackbird-training.com)

 [www.blackbird-training.com](http://www.blackbird-training.com)

UK Training  
**PARTNER**

