



ICE Education

International Oil Trader Academy

ICE Futures Europe, London

ICE Education and IBH have combined their expertise to provide an innovative and practical programme covering all aspects of the physical crude oil, products and traded derivatives market through our market leading Oil Trader Academy.

With the global oil markets being subject to extreme volatility and change due to a series of geopolitical events, this is the ideal time and opportunity to understand the drivers of oil price movements and tools at your disposal to protect against and trade around your organisations market position.

As an outcome from the course you will:

- Review crude oil supply, demand and products
- Understand crude oil refining, evaluation and selection
- Explore physical and derivative oil markets, shipping and contracts
- Appreciate pricing formation, trading and price risk management
- Learn about futures, swaps, options and over-the-counter markets
- Become familiar with trading techniques and terminology
- Participate in trading and hedging simulation exercises and improve negotiation skills

Who is the programme for

This programme will appeal to: oil and product traders, refiners, economists, analysts portfolio managers, risk managers, operations managers, brokers and other related front, middle and back office staff.

Core Structure

Module 1

Physical crude & products trading

14-18 October 2024

20-24 January 2025

16-20 June 2025

6-10 October 2025

Module 2

Trading Simulations, Physical Crude & Product Trading, Refineries and Options

21-25 October 2024

27-31 January 2025

23-27 June 2025

13-17 October 2025

MODULE	PRE-31 OCTOBER RATE	STANDARD RATE
MODULE 1	£4,500 + VAT	£4,995 + VAT
MODULE 2	£4,500 + VAT	£4,995 + VAT
FULL COURSE — ALL PARTS	£8,495+ VAT	£9,000 + VAT

MULTI BOOKING DISCOUNTS: 10% FOR 2ND DELEGATE AND 15% FOR 3RD DELEGATE**

** FOR SAME COMPANY BOOKINGS WHEN BOOKED AT THE SAME TIME

Trainer biographies

Chris Heilpern

Chris Heilpern traded oil and energy in Europe, Africa, the Middle East and Asia during a career that spanned eighteen years. He has worked for an oil major, a top trading company, and investment banks. He has extensive experience in supply and trading for refining systems as well as the challenges of running proprietary physical trading books in Europe, Africa, and Asia. His experience was rounded out with several years of trading derivatives for investment banks in the Asia-Pacific region. Since leaving trading in 2008 Chris has taught finance and trading at top French business schools, presented corporate training in commodities and energy in France and abroad, and consulted with top European companies on trading and contract arbitration. He is bilingual in French and English and resides in the South of France.

John Fry

John Fry has worked in the energy markets since 1986 when he joined Man International as a broker on the oil desk. He specialised in futures and options and qualified as a trader in the IPE option pit. He executed the first principal OTC oil deals for Man and became head of the energy desk in London. John moved over to the OTC energy market in 1997 and worked for Koch Petroleum Group helping to develop their energy derivatives business.

Damian Faulkner

Worked in the gas & power industry for over 15 years working for ExxonMobil, Enron and BP in a variety of back and front office roles. During his time at BP, he was a Contract Manager for a large Power Station as well as the senior UK power trader, trading the prompt, curve and interconnector electricity markets, as well as the carbon emissions element of the clean spark spreads. Later, he moved on to trade the UK gas curve and finally the European gas curve covering France, Italy, Germany, the Netherlands, Belgium and France.

Steve Jones

Steve has over 20 years experience working in the oil and gas industry, within the back, mid and front office. As an Equity Crude and Gas trader at BP he helped build a complex portfolio of trading books based in Germany. Steve has extensive experience developing risk management reporting, trader exposure and profit and loss systems for various clients. He has been a key participant in the design and development of simulation based trader training programmes.

Steve Deighton

Has over 25 years of experience in the Energy Trading business. He traded for 12 years in the UK and the US, mainly for BP, but also had experience with an American utility company, LG&E, running their Nat Gas and Electricity Options Trading Book and with Barclays Derivatives Team back in London. After returning to trade at BP he moved on to become a Trading Manager for Light Ends and then the Crude Oil Team. He switched to become Director of Learning & Development for BP's Integrated Supply and Trading Business in London, taking over the Trader Graduate Programme. He created BP's Trader Training School and ran training courses around the world for key customers. After 12 years in this role, he retired from BP to spend more time with my family.

Steve Herbert

Over 40 years of front-line commercial experience in the Oil Industry. He began his career in London with Shell, moving to Germany in 1990 to run their NWE Lubricants business. Joined Marc Rich in 1991 and was there as it transitioned into Glencore, managing their Black Sea Processing operation. He had the opportunity to join Masfield, a small private company, to run their East African supply business and subsequently headhunted to join Vitol in 2003, where he managed their Nigerian crude and gasoline business. In 2007, he was asked to join

BP to develop their Nigerian gasoline business. During this time, he succeeded in developing a crude oil processing contract with NNPC, which enabled BP to source their first-ever direct crude oil supply for their refining system. In 2010, he began working with the BP Training team, subsequently moving full-time in 2012, working on their graduate recruitment and training programme. He left BP in 2018 and joined TwoTwo Five in Jan 2023.

Melanie Powney

She has over 30 years of experience in the Oil Energy Trading and Supply business working for BP, whom she left during the COVID years. Her roles at BP were varied: she traded physical gasoline in the UK, then moved to South Africa, where she was responsible for purchasing and hedging the crude oil for the BP JV Refinery. She returned to work in the UK as the Inland Wholesale Manager. This was followed by a role as the LPG Global Supply and Logistics Manager. Upon returning to BP's trading arm, she had roles in Strategy, as the Business Manager for the Head of Trading for Europe and then as Trading Manager for the Middle Distillates team. She switched to Learning & Development for BP's Supply and Trading Business in London. Her team were responsible for commercial training and the Trader (Graduate and A-level) recruitment and development programmes.

Module 1: Physical crude oil & products trading

Day 1 — Fundamentals of the Oil Industry

Demand in the oil industry

- Demand drivers
- Changes and developments

Supply in the oil market

- Natural resources
- Unconventional supply
- Shale revolution

Oil refining

- Necessary link in the industry
- Types of refineries
- Economic challenges

A word on opec

Day 2 — Overview of Trading

Contract types

- Spot / Term / Forwards / Futures
- FOB vs CIF

Trading crude oil

- Choices in the industry
- Who we are defines how we trade

Risk in oil trading

- Contracts to manager risk

- Clauses and their value

Benchmarks & pricing

- Contango and backwardation
- The value of the differential
- The OSP and the risk in trading

Day 3 — Shipping

Overview of the shipping industry

- Vessel sizes and trading choices
- Vessel acceptability
- Costs and ownership

Charterparty types

- Spot / Single Voyage
- Term charter

Worldscale and freight calculations

Day 4 — Crude Oil Pricing and Moving Oil from A to B

- The Brent complex
- Brent price relationships

Managing price risk in crude trading

- Understanding exposure
- Using futures
- Swaps (CFD's)
- Making a price in crude oil trading

Day 5 — Products Trading

- Differences between crude and products trading
- Refining as a source of products
- Quality issues in products markets

Price creation in product markets

- Trading the arbitrage
- Locational value
- Understanding import and export parity

Making prices in products markets

- Crack values

Module 2: Trading Simulations, Physical Crude & Product Trading, Refineries and Options.

Day 1 — Understanding and Trading the Futures Market

Introductions - 9.00 am – 9.30 am

Oil markets overview - 9.30 am – 11.00 am

- Current Macro Oil and Products Fundamentals
- Explaining derivatives

Break 15 mins

Derivative trading simulation tutorials* 11.15 am – 11.45 am

- Terminology and Simulation System Introduction
- Trade futures, swaps and Brent/Dubai EFS

Flat Price futures trading simulation* 11.45 pm – 12.45 pm

- Buy and Sell Brent futures within a specified Value at Risk trading limit
- Interpret fundamental news stories and observe price trends

Lunch 1 hour

Trading best practice 1.45 pm – 2.45 pm

- Trading best practice and discipline
- Useful trading rules
- Technical trading basics

Technical charting simulation * 2.45 pm – 3.45 pm

- Trade technicals using chart analysis; trendlines, candlesticks and moving averages to trade RBOB
- Spot trends and use indicators to identify trade entry/exit points

Break 15 mins

Time spreads and backwardation/contango 4.00 pm – 5.00 pm

- Time Spreads
- Market structure - Contango/Backwardation

Day 2— Refining

Time spreads simulation* 9.30 am – 10.30 am

- Trade up to 3 different spreads on Brent
- Understand how spreads react to fundamental news

Physical crude trading - 10.30 am – 11.30 am

- How Crude Oil is produced and exported
- What determines the value of different Crude Oils
- How Crude Oil is priced and traded, benchmark pricing

Break 15 mins

Physical crude cargoes trading simulation* - 11.45 am – 12.35 pm

- Buy and Sell cargoes of North Sea and West African Crude Oil
- Understand how refinery yields affect Crude differentials
- Appreciate the importance of liquidity in physical Crude markets

Introduction To Refined Products - 12.35 pm – 1.00 pm

- What are Refined Products and their main uses
- How are Products priced and traded

Lunch 1 hour

Introduction To Refineries (Part 1) - 2.00 pm – 3.00 pm

- Basic Crude distillation and complex refining
- Refinery Optimisation activities
- Calculate Refinery margins and Crude pecking orders

Break 15 mins

Introduction To Refineries (Part 2) - 3.15 pm – 4.00 pm

- Basic Crude distillation and complex refining
- Refinery Optimisation activities
- Calculate Refinery margins and Crude pecking orders

Refining simulation* - 4.00 pm – 5.00 pm

- Manage a Refinery: Buy Crude and sell Products cargoes
- Calculate Refinery margins and adjust run rates accordingly
- Optimise your Refinery, switch Crudes as prices change

Day 3 — Physical Cargo Trading

Arbitrage and worked example - 9.30 am – 10.30 am

- How to calculate and identify Arbitrage opportunities
- Relative volatilities: Futures, Cargoes and Freight
- Using futures to hedge Arbitrage movements
- Use of a spreadsheet to calculate and monitor Arbitrage values
- Placing an Arbitrage trade: Volatility, liquidity and order of trades

Global crude arbitrage simulation* - 10.30 am – 11.30 am

- Calculate Arbitrage opportunities across a portfolio of Crude Oils
- Place all the trades necessary to Arbitrage Crude Oil cargoes
- Deal with a wide variety of pricing scenarios; Dated Brent, WTI, Dubai; Fixed and Floating

Break 15 mins

Global refined products arbitrage simulation* - 11.45 am – 12.45 pm

- Calculate Arbitrage opportunities across a portfolio of refined Oils
- Place all the trades necessary to Arbitrage Oil Product cargoes
- Deal with a wide variety of pricing scenarios; LSGO, ULSD, RBOB; physical settlements; Fixed and Floating

Lunch 1 hour

Hedging - 1.45 pm – 2.45 pm

- What is meant by a floating price
- Understanding floating prices based on Dated Brent
- Calculating the daily hedge, and forward pricing profiles
- Managing pricing risk on a portfolio of trades

Break 15 mins

Swaps and hedging spread exposure - 3.00 pm – 3.30 pm

- What is a swap, and how are they traded
- Using swaps to manage risk and create trading strategies
- Differential swaps
- Managing spread exposure when hedging

Hedging physical cargoes simulation* - 3.30 pm – 5.00 pm

- Respond to new trades and manage the basic daily and arbitrage hedges
- Use futures and swaps to manage price exposures
- Adjust hedges as BL dates and quantities change

Day 4 — Managing assets

Pricing Windows - 9.30 am – 10.30 am

- What are pricing windows
- Understanding why they are important
- Looking at the methodology

Pricing Window simulation* - 10.30 am – 11.30 am

- Participate in a pricing window
- Manage cargoes exposure to the settlement prices

Break 15 mins

Hedging refinery margins - 11.45 am – 12.30 pm

- How to hedge a refinery margin with swaps and futures
- Cracks - Exchange traded and OTC crack spreads

Lunch 1 hour

Hedging refinery margins simulation * - 1.30 pm – 2.45 pm

- Manage an advanced refinery portfolio
- Anticipate the impact of news and price on margins
- Hedge and speculate on refinery margins

Storage valuation and optimisation - 2.45 pm – 3.45 pm

- Contango markets: What do “carry” and “full carry” mean
- Optimising Storage and hedging Storage trades

Break 15 mins

Storage optimisation simulation* - 4.00 pm – 5.00 pm

- Use futures to manage a portfolio of physical oil and tankage
- Move oil in and out of storage as you react to market structure
- React to the volatility of time spreads and maximise extrinsic value

Day 5 — Options and Portfolios

An introduction to options 9.30 am – 10.30 am

- Options basics; Inputs to the premium and pricing
- How can we value an Option?
- Time & Volatility
- The greeks
- Options trading strategies

Financial options trading simulation 10.30 am – 11.30 am

- Entrepreneurially trade any combination of Brent and WTI options

Break 15 mins

Trading around physical assets (using options) 11.45 am – 12.45 pm

- Optimising Storage, arbitrage, pipelines: Intrinsic and Extrinsic value

Lunch 1 hour

Optimising Storage using an options model trading simulation 1.45pm – 2.45pm

- Use futures and an options model to manage a portfolio of physical oil products and tankage
- Move oil products in and out of storage as you react to market structure
- React to the volatility of time spreads and maximise extrinsic value

Break 15 mins

Equity crude trading simulation 3pm – 5pm

- Work in a team to manage an Equity Crude based trading portfolio
- Sell equity crude cargoes looking for best value, considering arbitrage and storage
- Manage term purchases and sales
- Look for additional entrepreneurial opportunities

*Denotes simulation based practical

5pm Course close

Further information

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