

AI in E-Commerce Mastering Dynamic Pricing and Market Analysis

Duration: 5 Days

Language: en

Course Code: PI2 - 126

Objective

By the end of this course, participants will be able to:

- Understand the role of AI in shaping modern e-commerce strategy.
- Apply machine learning algorithms for dynamic pricing and inventory control.
- Analyze customer data to segment markets and personalize pricing offers.
- Use AI tools for competitor monitoring and real-time price adjustment.
- Interpret market trends using predictive analytics and data visualization.
- Build and implement AI-driven pricing models that align with business goals.
- Address data governance, fairness, and ethical considerations in pricing automation.

Audience

This course is ideal for:

- E-commerce managers and digital marketing professionals.
- Pricing analysts and revenue optimization specialists.
- Product managers and business development teams.
- Data scientists and AI engineers working in retail or tech.
- Retail entrepreneurs and online store owners.
- Anyone seeking to modernize their e-commerce operations through AI.

Training Methodology

This course combines hands-on sessions with expert-led instruction, business case reviews, and guided tool exploration. Participants will apply AI concepts to real e-commerce scenarios, design pricing strategies using sample datasets, and develop their own dynamic pricing workflows through collaborative exercises.

Summary

Artificial Intelligence is redefining the e-commerce landscape by enabling smarter pricing strategies, accurate demand forecasting, and real-time market analysis. In highly competitive online markets, businesses that leverage AI gain a clear edge—offering personalized prices, predicting customer behavior, and responding quickly to market shifts.

This course provides participants with a deep understanding of how AI can optimize pricing and market strategy in the digital commerce environment. From dynamic pricing engines and competitor tracking to customer segmentation and behavioral analytics, participants will explore practical tools and techniques to transform data into profit. Through case studies, tool demos, and strategy-building sessions, learners will acquire the skills to drive growth and stay competitive in the ever-evolving world of online retail.

Course Content & Outline

Section 1: The Role of AI in E-Commerce Strategy

- Overview of AI technologies transforming online retail.
- Key benefits: automation, personalization, real-time responsiveness.
- Types of AI used in e-commerce: machine learning, NLP, computer vision.
- From static to dynamic: evolution of pricing strategies.
- Case study: How AI boosted profit margins for a global online brand.

Section 2: Fundamentals of Dynamic Pricing

- What is dynamic pricing and how does it work?
- Key factors influencing real-time price changes.
- Overview of algorithms used in pricing models.
- Types of pricing strategies: demand-based, competitor-based, value-based.
- Tools and platforms supporting AI-driven pricing (e.g., Prisync, Wiser, Sniffie).

Section 3: Data-Driven Market and Customer Analysis

- Collecting and preparing data for AI analysis.
- Identifying pricing patterns through historical data.
- Customer segmentation using clustering and behavioral modeling.
- Sentiment analysis and customer intent prediction.
- Hands-on: Building customer personas with AI-powered insights.

Section 4: Competitive Intelligence and Real-Time Adjustments

- Tracking competitor pricing strategies using scraping and monitoring tools.
- Market demand forecasting and seasonal trend analysis.
- Implementing automatic price adjustments in your e-commerce platform.
- A/B testing and pricing experiments with AI support.
- Real-time dashboards for monitoring performance and competition.

Section 5: Ethical Pricing, Risk, and Future Innovation

- Transparency and fairness in algorithmic pricing.
- Avoiding bias and customer backlash in dynamic systems.
- Regulatory compliance and data privacy considerations.
- Future trends: hyper-personalization, voice commerce, and autonomous agents.
- Final project: Design a full AI-powered dynamic pricing strategy for a sample product line.

Certificate Description

Upon successful completion of this training course, delegates will be awarded a Holistique Training Certificate of Completion. For those who attend and complete the online training course, a Holistique Training e-Certificate will be provided.

Holistique Training Certificates are accredited by The CPD Certification Service (CPD), and are certified under ISO 9001 and ISO 29993 standards.

CPD credits for this course are granted by our Certificates and will be reflected on the Holistique Training Certificate of Completion. In accordance with the standards of The CPD Certification Service, one CPD credit is awarded per hour of course attendance. A maximum of 50 CPD credits can be claimed for any single course we currently offer.

Categories

AI, Data and Visualisation, Sales & Marketing, Technology

Tags

Artificial Intelligence, E-commerce, Modern technology, AI in E-Commerce

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