



Predictive Analytics for Marketing

Learn and apply analytic techniques to measure and improve marketing performance.



THE UNIVERSITY OF
CHICAGO



Driven by the digital economy, marketing-applied predictive analytics is a fast-growing field. With businesses generating over 2.5 quintillion bytes of data each day, deriving insights for marketing out of such voluminous data is both a challenge and an opportunity across industries.

Predictive Analytics for Marketing

The fact that consumers have more choices than ever before translates into relentless competition among retailers, service providers, and vendors. Predictive analytics can help marketers stay ahead of the game through a deeper understanding of consumer behaviors, desires, and trends. This kind of analysis leverages AI and machine learning to extract the insights generated through algorithms, data sets, and models to predict future behaviors and inform more effective marketing strategies.

Course Details

Tuition: USD \$2,800

Course Format: Online learning with live, interactive sessions

Duration: Eight weeks

Language: English, spanish, and portuguese

Instructor: Dave Cameron, BS, MSc; Predictive Analytics for Marketing, the University of Chicago

About the Course

Our eight-week Predictive Analytics for Marketing course takes a holistic approach to empower marketing and sales teams to create better, more effective marketing campaigns, execute cross-selling and upselling more efficiently, and provide enhanced customer relations. By the end of the course, you will be able to leverage data to target the right audience, appropriately segment audiences for optimal contact strategy, measure the impact of marketing campaigns, predict future customer purchases, estimate campaign effectiveness; and use predictive modeling to forecast customer lifetime value.

You will learn to:

- Acquire the means to effectively find and evaluate both internal and external sources of data
- Develop skills to determine whether to buy an “off-the-shelf” segmentation or build a customer segmentation in-house
- Construct predictive equations for setting appropriate campaign sizing to meet financial targets
- Recommend—when multiple products can be offered—the product mix to be used for marketing to each customer or prospect
- Measure how to look beyond the individual campaign towards long-term customer value
- Design different operational guidelines to deploy in your organization to address potential cyber vulnerabilities





Who Should Attend?

This course is designed for marketers, managers, and leaders interested in advancing their analytical acumen to measure and improve marketing performance. Basic familiarity with Microsoft Office—Excel, PowerPoint, and Word—is the only prerequisite since much of the data will be provided in Excel.

Meet your Instructor



Dave Cameron is a seasoned data science and predictive analytics leader in both the corporate and startup spaces. He brings over twenty-five years of experience to the University of Chicago. As a forward-thinking executive, Cameron has built and led teams on analytics thought leadership, statistical and product innovation, data-driven performance marketing, and attribution modeling for consumer acquisition, retention, and profit.

He spent over twelve years at Nielsen Holdings, the global measurement and data analytics company, where he served in vice presidential roles in data science, customer segmentation, and statistical methodology. His prior positions include working as the director of data solutions at Merkle, a global performance marketing agency, and his role as the manager of target marketing for Ameritech (now AT&T).

Cameron takes a strategic and pragmatic approach to solving challenging data problems, balancing learning and innovation with efficiency and automation.

Dave Cameron, BS, MSc; Predictive Analytics for Marketing, the University of Chicago

Why the University of Chicago?

Becoming a member of the University of Chicago community means gaining access to world-class instructors and a cohort of curious, diverse individuals. Through a firm grounding in core principles and a rigorous approach to problem-solving, our teaching method—the Chicago Approach—will give you the tools you need to make sense of complex data and turn ideas into impact. Course participants will receive a certificate of completion and join a global network of thought leaders

Approach to Live Digital Learning

Our online learning courses are crafted to support your specific professional development goals. Courses combine e-learning with live, interactive sessions to strengthen your skill set while maximizing your time. We couple academic theory and business knowledge with practical, real-world application. Through online learning sessions, you will have the opportunity to interact with University of Chicago instructors and your peers.





Career Outlook

As consumers increasingly opt for having what they want, when they want it, marketers are turning to predictive analytics to stay a step ahead and foresee their preferences. It is no surprise that the predictive analytics market is growing at a CAGR of 24.5% and is expected to generate revenue of around 22.1 billion by the end of 2026. Today's organizations want data-savvy marketing talent who know how to make sense of the growing volumes of information and ultimately drive sales. More than 380,000 marketing job listings were posted over the past year on LinkedIn.

\$199k

The average salary for jobs that require predictive analytics and modeling skills in the United States

24.5%

The CAGR of the predictive analytics market

\$22.1B

Expected global predictive analytics market revenue by 2026

Potential Job Titles in Marketing-Applied Predictive Analytics

- Brand Analytics Manager
- Chief Marketing Officer
- Content Marketing Specialist
- Customer Insights and Analytics Consultant
- Customer and Marketing Analytics Manager
- Data Engineer
- Data Scientist
- Digital Marketing Manager
- Marketing Analyst
- Marketing Data Analyst
- Marketing Director
- Marketing Manager
- Predictive Analyst
- Predictive Analytics Consultant
- Predictive Analytics Specialist



Weekly Schedule

The Predictive Analytics for Marketing course covers the following topics:

Module 1: Introduction to Targeted Marketing Campaigns

- Introducing three case studies that will be used throughout the course: automotive (manufacturer), travel (cruise lines), and consumer packaged goods (retailer)
- Sample targeted marketing campaigns for each case
- Incremental revenue goals for each case relative to advertising costs
- Approaches to finding appropriate audiences

Module 2: Sources of Data

- Introducing cyber hygiene frameworks
- Reviewing case studies from recent cyberattacks

Module 3: Segmenting the Audience—Part I

- Introducing off-the-shelf segmentation
- Sketching out rule-based segmentation for each use case: product-based, location-based, and market basket-based
- Determining how to apply different contact strategies for each use case: banner ads, email, direct mail, and apps



Module 4: Segmenting the Audience—Part II

- Introducing k-means segmentation
- Building sample segmentation in Excel
- Translating from custom segmentation to activation in each use case: product-based, location-based, and market basket-based

Module 5: Determining Audience Sizing for Positive Return on Investment (ROI)

- Introducing marginal return on investment
- Techniques for appropriate audience sizing
- Theory on linear versus logistic regression—tying back to the three use cases: infrequent purchase, annual purchase possibility, and weekly purchase

Module 6: Using Analytics to Optimize Product Offer

- Introducing expansion from previous models to multiple product lines
- Sharing techniques for appropriate audience sizing
- How to determine whether a contact strategy is appropriate at a high level across use cases



Module 7: Measuring Customer Lifetime Value

- Introducing expansion from campaign focus to lifetime value
- Sharing techniques for appropriate audience sizing
- How to determine whether there is appropriate lifetime value across use case

Module 8: Putting It All Together

- Tying it all together into a coherent story for each use case
- Sharing the latest in data ethics and privacy
- Inherent error in predictive modeling and the associated risks

Course outline may be subject to change based on academic adjustments.

Learn more

To schedule an appointment with admissions, contact admissions@online.professional.uchicago.edu or alternatively you can let us know when we can call you [here](#).

Visit online.professional.uchicago.edu to learn more.