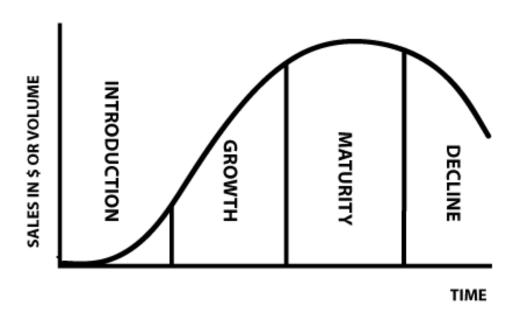
# **DATA-DRIVEN DYNAMIC MARKETING STRATEGY** (MKTG 612)

Spring 2021, Quarter 3

## COURSE DESCRIPTION, REQUIREMENTS AND ASSIGNMENTS

Professor Eric T. Bradlow
The K.P. Chao Professor
Professor of Marketing, Statistics, Economics and Education
Chairperson, Wharton Marketing Department
Vice-Dean, Analytics at Wharton



# **Objectives**

This course focuses on helping you refine your skills in developing a marketing strategy and seeing how the marketing tactics selected need to be in alignment with that strategy. We will focus specifically on issues such as the selection of which businesses and segments to compete in, how to allocate resources across businesses, segments, and elements of the marketing mix, how to launch new products into the market, as well as other significant strategic issues facing today's managers in a dynamic competitive environment.

All of these issues will be discussed and couched in the context of the dynamic nature of market evolution that occurs throughout the Product Life Cycle (PLC), pictured above. Students will develop strategic thinking skills and learn to apply analytical and data science tools to help formulate effective marketing tactics in each phase of the PLC.

### **Outline of Each Class Session**

While the exact structure of each class will vary depending on whether it is a case or lecture, in general each session will have three facets:

- 1) The real-world business problem. Most classes will begin with an example of a critical current issue that managers confront. This could be either a formal case (highlighted in green in the course schedule below that students read and prepare in advance), or a minicase that I introduce in-class. For formal case discussions, we will assume that everyone has read and is prepared to discuss the case. It is not necessary to do any library work or bring in outside information about the company or the industry beyond what is described in the case. In fact, it will distract from the case discussion as we are learning how to make better strategic marketing decisions given the information available at the time of the case. We will focus on principles, theories, and basic applications of marketing strategy. Discussion and questions are strongly encouraged.
- 2) Analytical frameworks for thinking through the problem. For the business problem being discussed, the class will explore a range of general analytical frameworks through which the problem might be approached and evaluate their comparative strengths and weaknesses. The purpose of this is to provide a systematic basis for narrowing down the set of candidate options and choosing a best option in light of the available data.
- 3) *Informing the decision through data*. Given a general analytic framework, most classes will go on to explore how greater precision can be brought to the application through the use of data---both in the form of customer insights (marketing research), and secondary data.

### **Course Website**

Many of the course's activities will involve the use of Wharton's Canvas software. Please bookmark this website and check it as often as necessary. This site will contain copies of class handouts, and other general information about the course.

# **Online Lectures and Recordings**

All of the lectures will be delivered synchronously and online. All class lectures will be recorded. When in class, the expectation is that you will have your camera on and be on mute except when you would like to participate (which is strongly encouraged!).

### Data and R code

In most lectures, there is a "toolkit takeaway" part of the lecture where I discuss the use of data and statistical methods for data-driven marketing strategy. On each assignment page in canvas, I have posted the data set (used in class) as well as the R code (or an Excel spreadsheet) that generated the output for those of you that want to reproduce the analyses.

# **Grading**

The weighting of the inputs for the final course grade is:

Class Participation	10%	
Four (Out-of-Class) Assignments	40%	
Final Exam (take home)	50%	

Each component of your grade (i.e. participation, assignments, quizzes, and final exam) is Z-scored, and then your grade is constructed from your weighted Z-score. 100% of your grade in this course is individual-based and hence you should not work on the assignments with other students or discuss them prior to turning them in. After turning them in, feel free to learn from your common experiences; and, in fact, you are encouraged to do so.

## **Class Participation and Attendance:**

Attendance in class is <u>not required</u> and is not graded; but poor attendance will affect your class participation grade as you can't get credit for (positive) participation (which is graded) if you are not there. However, for those of you that don't attend the class, there are other ways to earn participation which includes: (1) submitting related real-world content on class material, (2) submitting data that can be used for the course, or (3) submitting slides/video that can be used in the course. Those can be submitted directly to me with an explanation of why it is related to the course.

For those classes that you attend, all course sessions involve active classroom discussion based on careful preparation of the readings and cases, with a focus on both theoretical questions and practical implications. You should be prepared both to share your ideas and to listen to and interpret issues presented by others. *The quality of your contribution counts for much more than the quantity*. Comments that move a discussion forward in a productive direction are particularly welcome.

#### **Class Meeting Times:**

I teach four sections (i.e. a block) of each lecture. One block is on Mondays 1:30-3:00, Mondays 3:00-4:30, Tuesday 9:00-10:30 and Tuesday 10:30-12. The other block is on Wednesday 1:30-3:00, Wednesday 3:00-4:30, Thursday 9:00-10:30 and Thursday 10:30-12. You should attend the lecture time you are assigned, however, if in a given week you need to attend a different one, you may attend whichever lecture time works best or watch the recording (if you can't attend any of the lectures).

#### **Class Assignments**

There are four (out-of-class) assignments (listed in RED below) with specific due dates. All of these assignments are due PRIOR to the class in which they are covered, and the due dates are clearly listed on the course calendar. No late assignments will be accepted. These four assignments will be equally weighted (10%) towards the 40% Out-of-Class Assignment part of your grade. More details on the assignments are below.

## **Four Out-of-Class Assignments**

The links for submitting:

- Assignment 1: Medicines Case Numbers and Analysis
- Assignment 2: CCC Case Numbers and Analysis
- Assignment 3: Customer Analytics From Academia to Practice
- Assignment 4: FutureView Experience and Assignment

are all on the course Canvas website. Each of these assignments will also be discussed in a lecture that follows their due date. All assignments should be submitted via Canvas, and/or the weblink on Canvas that provides a form for submitting the required materials.

Assignment 1: Medicines Case Numbers and Explanation (two pages maximum) due by Friday, January 29<sup>th</sup> at 9am.

The Medicines company is typical of a start-up that has to decide what price to charge at product launch as well as forecast year 1 and year 2 sales. Your assignment has two parts:

- There is a link on the Medicines Canvas Assignment page that you click on that brings you to an online form where you should enter your recommended price per dose and your forecasts of year 1 and year 2 sales.
- Through canvas, submit a <u>no more than 2-page (single-spaced) explanation</u> of how you computed your numbers, what assumptions you made, and how you might empirically validate those assumptions.

Answers that rigorously lay out their assumptions, even if those assumptions may be speculative, and tie those assumptions to specific recommendations and forecasts will receive highest credit.

Assignment 2: CCC Case Numbers and Assignment (two pages maximum)
due Friday February 5<sup>th</sup> by 9am

Making strategic decisions in highly competitive and mature markets provides significant challenges to marketing managers. The CCC case is such an example. Your assignment here has two parts:

- Using the Canvas link that takes you to the Wharton Learning Labs "Rules of Engagement" application, read the CCC case, and then enter your budget numbers for advertising, trade promotion and in-pack premiums for the current fiscal year as well as your "competition decision rules" for those budget numbers going forward.
- Through canvas, submit a <u>no more than 2-page (single-spaced) explanation</u> of why you chose those competition decision rules going forward to set budgets.

Assignments that thoroughly consider the role of competition and incorporate those beliefs about competitor action into ones' competition decision rules will receive the highest credit.

# Assignment 3: Customer Analytics – From Academia to Practice (two pages maximum) due Friday February 12<sup>th</sup> by 9am.

Big data, data science, predictive analytics, machine learning, deep learning, etc... are all buzz words now that every manager/analyst/investor/thought leader should know something about. Your assignment (in two pages (single-spaced) or less) is to select one of the three academic papers that I have posted on the Canvas site and specifically describe how the particular method described can be utilized by a marketing manager to determine one (or more) of the 4 Ps (Price, Product, Promotion, Placement) across the product life cycle. Assignments that specifically link the paper's methods to a specific P and how it can be set will receive the highest credit.

# Assignment 4: FutureView experience and write-up (two pages maximum) due Friday February 19<sup>th</sup> by 9am

Marketing research methods are well-established to estimate demand, optimally design products, and determine target segments when the product/service of interest is to be launched soon and/or is of an incremental change. However, many of you make take jobs at firms (e.g. Google, SpaceX, Tesla, Virgin Galactic etc...) that are building products for far off into the future for which customers have little to no familiarity. Yet, the needs of data-driven marketing strategy still exist. Your assignment here is two-fold:

- Click on the link to the Wharton Learning Labs FutureView application and participate in the experience. We will be utilizing your experiences in class, so come prepared to talk about it.
- The data that emerges from FutureView is valuable for dynamic marketing strategy decisions describe in the class. In two (single-spaced) pages or less, first, explicitly

describe the data that you would capture from FutureView if you were going to utilize it as a business intelligence tool for marketing strategy. Second, be explicit about how you could use FutureView data to determine target segment(s), price, demand, distribution, shape of the PLC, etc...

Assignments that are specific about the data that emerge from FutureView and how you would explicitly tie that to specific marketing strategy decisions will receive the highest score.

# Final Examination (due Sunday March 7th by 5pm)

The multiple-choice final examination for this course will be a take-home examination. It will be made available on the course Canvas site on Wednesday, March 3<sup>rd</sup> at 9am. The exam will consist of questions about marketing strategy and will also cover the cases and analysis methods that we have discussed in class. From the time that you start the examination (not download, but start), you have 90 minutes to complete it (canvas has a timer). The Wharton School and University of Pennsylvania Honor Code applies. This is an individual-level examination. You are not allowed to discuss this exam with anyone, during or even after the examination period. You may use outside materials, and it is open-book and open-notes, but note that the 90 minute time limit includes any time you might use to do outside research, look at your notes, etc....

## **Contact Information**

Professor Eric T. Bradlow 761 JMHH (215) 898-8255 (W) (610) 322-8091 (Cell) ebradlow@wharton.upenn.edu @ebradlow, @WhartonCA, @WMoneyball

#### **Course Outline**

#### <u>Session</u>

1. January 20-21 **Overview of Strategic Marketing Issues** W/TH Case: Kindle Fire 2. January 25-26 M/TU Market Research for New Product Design #1 Case: Shell Oil (mini-case + in-class) 3. January 27-28 W/TH Market Research for New Product Design #2 Assignment 1: Medicines Case due Friday Jan 29th by 9am 4. February 1-2 M/TU **Pricing for New Product Launch** Case: The Medicines Company (A) 5. February 3-4 W/TH Pioneering v. Follower (Entry Strategy) Assignment 2: CCC Case due Friday Feb 5<sup>th</sup> by 9am 6. February 8-9 M/TU Competing in the Growth/Mature Phase **Dealing with Competition** 7. February 10-11 W/TH Case: Canadian Children's Cereal Assignment 3: Customer Analytics due Friday Feb 12th by 9am 8. February 15-16 **Multi-Product Resource Allocation** M/TU 9. February 17-18 **Customer Analytics for CLV growth** W/TH Case: Blue Apron Assignment 4: FutureView Simulation due Friday Feb 19th by 9am 10. February 22-23 Marketing in the Decline Stage M/TU 11. February 24-25 W/TH **Marketing for Products of the Future** 12. March 1-2 M/TU **Selecting the Entire Marketing Mix/Course** Wrap-Up Case: Aqualisa Quartz

TAKE-HOME FINAL EXAM POSTED WEDNESDAY MARCH 3<sup>RD</sup> AT 9AM DUE BY SUNDAY MARCH 7<sup>TH</sup> AT 5PM

Week Starting	Monday	Tuesday	Wednesday	Thursday	Friday
January 17 <sup>th</sup>	18	19	Lecture 1: Overview of Marketing Strategy: Kindle Fire Case	Lecture 1: Overview of Marketing Strategy: Kindle Fire Case	22
January 24 <sup>th</sup>	Lecture 2: Market Research for New Product Design #1: Shell Oil Case	Lecture 2: Market Research for New Product Design #1: Shell Oil Case	Lecture 3: Market Research for New Product Design #2	Lecture 3: Market Research for New Product Design #2	Assignment 1: Medicines numbers due by 9am
January 31 <sup>st</sup>	Lecture 4: Pricing for New Product Launch: Medicines Company Case	Lecture 4: Pricing for New Product Launch: Medicines Company Case	Lecture 5: Pioneering v Follower (Entry Strategy)	Lecture 5: Pioneering v Follower (Entry Strategy)	Assignment 2: CCC Case numbers due by 9am
February 7 <sup>th</sup>	Lecture 6: Competing in the Growth/Mature Phase	Lecture 6: Competing in the Growth/Mature Phase	Lecture 7: Dealing with Competition: CCC Case	Lecture 7: Dealing with Competition: CCC Case	Assignment 3: Customer Analytics due by 9am
February 14 <sup>th</sup>	Lecture 8: Multi- product Resource Allocation	Lecture 8: Multi- product Resource Allocation	Lecture 9: Customer Analytics for CLV growth Case: Blue Apron	Lecture 9: Customer Analytics for CLV growth Case: Blue Apron	Assignment 4: FutureView Simulation due by 9am
February 21st	Lecture 10: Marketing in the Decline Stage	Lecture 10: Marketing in the Decline Stage	Lecture 11: Marketing for Products of the Future (FutureView Simulation)	Lecture 11: Marketing for Products of the Future (FutureView Simulation)	26
February 28 <sup>th</sup>	Lecture 12: Selecting the Entire Marketing Mix/Course Wrap-Up: Aqualisa Quartz Case	Lecture 12: Selecting the Entire Marketing Mix/Course Wrap-Up: Aqualisa Quartz Case	FINAL EXAM POSTED AT 9AM	4	5

March 7 <sup>th</sup>	8	9	10	11	12
FINAL EXAM DUE BY 5PM					