



## MGMT 701: STRATEGY AND COMPETITIVE ADVANTAGE

Fall 2018

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### SYLLABUS

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This class is designed to be an upper-level course in strategy. It provides concepts and ideas for the tool-kit of the manager involved in the strategy process. We start out with the question of how value can be created and, more importantly, appropriated. This leads to the general issue of how a competitive advantage can be built. We will focus in our discussion on new concepts that have been developed around the notions of complementarities and fit. In the next section of the course, we look at the question of what decisions managers can make to sustain a competitive advantage. In the last section of the course, we will be dealing with strategy making in the face of environmental changes.

Early in the course we will form student groups who will work during the semester on the final project. More information will be provided on the first day of class. At the end of the semester, each group will present their work.

Your grade will be composed of the final paper draft (8%), final paper presentation (8%), feedback for the other group (8%), final paper (37%), and class participation (39%). The discount rate for late papers is severe. In order to pass this class, you have to make a good-faith effort with respect to class attendance, participation and the paper.

Please note, to avoid potential conflicts of interests on teams, you cannot take this class with the Pass/Fail option.

Please note that this syllabus is subject to change with prior announcements.

Also note that overheads will be posted after each class on Canvas.

The TAs for this class are Kate Odziemkowska (kodzi@wharton.upenn.edu) and Jaeho Choi (jhchoi@wharton.upenn.edu). The TAs will be mainly responsible for your paper projects.

### **A short note on proper citations**

To most of you this will be probably self-evident, but I want to make sure that we all understand: Copying paragraphs from sources (magazine, newspaper articles, analyst reports etc.) without properly citing them is a SERIOUS offense! Properly citing means: if you copy word-by-word, you have to mark this by enclosing the copied text with quotation marks “ “ and citing the source. Even if you don't copy word-by-word, but you take someone else's idea, you have to indicate in a citation the source of that idea. This citation has to follow directly the idea (attach a footnote or an endnote). At the end of the paper, you should then list all sources that you have cited in the text.

Let me re-iterate: Non-proper citing is a very serious academic offense that in other courses has led professors to fail students and bring these students to the attention of the academic review board of the University. I think all of us want to avoid any such incident – and it is really easy to avoid such problems. Simply be careful in your papers that you attribute ideas/frameworks etc. that you use to their respective sources.

## **I. PREVIEWS**

### **8/28 Session 1: Course Logistics, What is Strategy? Five-Force Analysis**

Mintzberg, Henry, and James A. Waters. 1985. "Of Strategies, Deliberate and Emergent." *Strategic Management Journal* 6: 257–272.

Porter, Michael E. 2008. "The Five Competitive Forces that Shape Strategy." *Harvard Business Review*, January, pp. 79-93.

*Study questions:*

Please read the Mintzberg and Waters (1985) piece and review your notes on Five-Force Analysis. The Porter (2008) article is a nice recap of industry analysis.

1. How would you define "strategy"?
2. Who makes strategy? Who should make strategy? In your experience, have strategies been deliberate or emergent?
3. What is a Five-Force Analysis? What makes such an analysis difficult?

### **8/30 Session 2: Preview Case**

*Case:* Intel Corporation: 1968-1997, 9-797-137

*Study questions:*

1. How did Intel create a competitive advantage in DRAMs?
2. Why did Intel get out of DRAMs in 1985?
3. How did Intel build a competitive advantage in microprocessors? How has the company managed to sustain this advantage?

## **II. VALUE CREATION, APPROPRIATION, AND FIT**

### **9/4 Session 3: Complementors**

<p><i>Complete Team Sign-Up by 5pm on 9/5 Via Canvas</i></p>
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Brandenburger, Adam M., and Barry J. Nalebuff. 1996. Co-opetition pp. 11–34.

Case: Power Play (A): Nintendo in 8-bit Video Games, 9-795-102

*Study questions:*

1. Nintendo successfully recreated the home video game business following the Atari-era boom and bust. How did it do so?
2. How was Nintendo able to capture value from the home video game business? Use the Value Net as a starting point for your answer.

## 9/6 Session 4: Value Creation, Value Appropriation

Brandenburger, Adam, and Harborne Stuart. 1996. "Value-Based Business Strategy." *Journal of Economics and Management Strategy* 5 (1): 5–24.

*Study questions:*

Please review the concepts of value creation, value appropriation, and added value from your notes from MGMT 611/612. If you need, please read Sections 1-6 of the Brandenburger/Stuart paper. To check your understanding of the concepts of value creation and added value answer the following questions:

1. There are three firms, labeled  $A$ ,  $B$ , and  $C$ , each able to produce a single unit of a product. There are numerous suppliers, each of which can supply the necessary input to only one firm; each supplier has a supplier cost (or opportunity cost) of \$4. There are two buyers, each interested in buying at most one unit. Both buyers have a willingness-to-pay of \$9 for each firm's product.
  - a. What is the total value of this game?
  - b. What is the added value of each player?
  - c. How much value do you expect each player to capture?
  - d. Now suppose a slight change to the game. Everything is the same for firms  $B$  and  $C$  as before. But now, suppliers have a supplier cost of \$5 for supplying firm  $A$ , and buyers have a willingness-to-pay of \$11 for firm  $A$ 's product. Recalculate the added values of the players, and find how much value each player will capture, in the second game.
2. There are three firms, labeled  $A$ ,  $B$ , and  $C$ , each able to produce a single unit of a product. There are numerous suppliers, each of which can supply at most one firm. Each supplier has a supplier cost of \$2 of supplying firm  $A$ , a supplier cost of \$3 of supplying firm  $B$ , and a supplier cost of \$5 of supplying firm  $C$ . There are two buyers, each interested in buying at most one unit. Each buyer has a willingness-to-pay of \$10

for firm *A*'s product, a willingness-to-pay of \$12 for firm *B*'s product, and a willingness-to-pay of \$13 for firm *C*'s product. Thus, firm *A* is the cost leader in this market, and firm *C* is the differentiator or high-quality provider.

- a. What is the total value of this game?
- b. What is the added value of each player?
- c. How much value do you expect each player to capture?
- d. How does this example relate to Porter's claim that firms should avoid becoming "stuck in the middle"?

### 9/11 Session 5: Positioning and Complementarities

*Paper Topic Proposal Due at the Beginning of Class 9/11. Please bring one hardcopy.*

*Please turn in a copy of Lincoln's activity system at the beginning of class*

Porter, Michael E. 1996. "What is Strategy?" Harvard Business Review (November-December): 61–78.

Milgrom, Paul, and John Roberts. 1992. Economics, Organization, and Management Chapter 4, pp. 108–116.

Milgrom, Paul, and John Roberts. 1995. "Complementarities and Fit: Strategy, Structure, and Organizational Change in Manufacturing." Journal of Accounting and Economics 19: pp 191-196, 199-205.

Optional: Siggelkow, Nicolaj. 2002. "Evolution toward Fit." Administrative Science Quarterly, 47: 125-159.

Optional: Porter, Michael E. and Nicolaj Siggelkow. 2008. "Contextuality within Activity Systems and Sustainability of Competitive Advantage." Academy of Management Perspectives, 22 (2), pp. 34-56.

1. What, in your view, are the five key points in Porter's article?
2. What is the definition of complementarity as given by Milgrom and Roberts?
3. Using the information given in Section 5 of the "Complementarities and Fit" paper, draw an activity system of Lincoln Electric. **Please turn in a copy of your activity**

**system at the beginning of class.** (It can be hand-drawn as long as I can read it; don't waste time on fancy graphics.)

The last two readings are optional. The Siggelkow (2002) paper provides a more longitudinal perspective to the topic of activity systems. The Porter & Siggelkow (2008) article goes into more depth into issues involving complementarities and interactions in general and reviews recent academic research that has been done on this topic.

### 9/13 Session 6: Positioning Applied: Low Cost

*Case:* Airborne Express (A), 9-798-070

*Study questions:*

1. How has the express mail industry structure evolved in recent years? How have the changes affected small competitors?
2. How has Airborne survived and prospered in its industry?
3. Quantify Airborne's sources of advantage (**this means you need to crunch some numbers**). Since the case does not allow you to compare willingness to pay across companies more than qualitatively, we will focus on costs. Specifically, compare the costs of an overnight letter shipped by Airborne Express to one shipped by Federal Express.
4. What must Robert Brazier, Airborne's President and COO do in order to strengthen the company's position?

### 9/18 Session 7: Positioning Applied: Differentiator

*Case:* Husky Injection Molding Systems, 9-799-157

1. What is Husky's strategy? Why has the company been so successful in the period prior to the recent problems?
2. Are Husky injection molding systems worth the premium price the company charges? Be precise (i.e., crunch numbers).
3. What has caused Husky's current difficulties?
4. How might Robert Schad, Husky's CEO, and the company respond? How should they respond?

## 9/20 Session 8: : Positioning Applied

*Case:* Trader Joe's, 9-714-419

*Study questions:*

1. How do firms in the supermarket industry make money?
2. What are the key sources of Trader Joe's competitive advantage?
3. What are the main threats to Trader Joe's competitive advantage? Is their advantage sustainable?
4. How would you modify Trader Joe's strategy going forward?

## 9/25 Session 9 Positioning Applied

*Case:* LEGO (A): The Crisis, N9-73-478

*Study questions:*

As this case opens, iconic toymaker LEGO stands on the brink of bankruptcy. Jørgen Vig Knudstorp, LEGO's young and newly appointed CEO, must size up changes in the toy industry, learn from the company's recent moves, and craft a strategy that will put LEGO back on track.

1. What has led the LEGO Group to the edge of bankruptcy?
2. What is your assessment of the management moves during "the growth period that wasn't" and "the fix that wasn't"?
3. As Jørgen, what would you do throughout the LEGO Group in order to turn the company around? Be specific.

## 9/27 Session 10: Positioning Applied

*Case:* eHarmony, 9-709-424

*Study questions:*

1. Why do people want to meet others on-line instead of finding them in the real world?

2. How structurally attractive is the on-line personals market?
3. Does eHarmony have a competitive advantage? If so, where does it come from?
4. How serious is the competitive threat to eHarmony?
5. Which of the four options should Waldorf pursue?

**10/2 Session 11: Time for Research: No Class**

**10/4 Fall Break: No Class**

**10/9 Session 12: Connected Strategy**

1. Our claim is that many firms are trying to move from episodic interactions with customers to a much tighter link with customers in which they receive demand/preference information in real time and respond with the requisite supply (often at smaller "portion sizes") very quickly. What firm examples come to your mind?

**III. SUSTAINABILITY OF A COMPETITIVE ADVANTAGE**

**10/11 Session 13: The Decision to Commit to Large Irreversible Investments**

*Case:* Du Pont's Titanium Dioxide Business (A), 9-390-112

*Study questions:*

1. As Chairman of DuPont's Executive Committee, would you vote for the "maintain" strategy or the "growth" strategy? Why?
2. How much of a cost advantage does DuPont have in titanium dioxide? For example, what cost advantage would DuPont have producing  $\text{TiO}_2$  in a 100,000 ton per year (tpy) ilmenite chloride plant compared to  $\text{TiO}_2$  produced in a 50,000 tpy rutile chloride plant added by one of its competitors? [**Bonus question** for number crunchers: Using data from Table 1, derive your own estimates of economies of scale and economies of learning.]
3. How sustainable is DuPont's competitive advantage?



## **10/16 Session 14: Student group meetings**

### **10/18 Session 15: Sustainability**

Ghemawat, Pankaj. 1991. Commitment Chapter 5: pp. 81–103.

Ghemawat, Pankaj, and Patricio del Sol. 1998. “Commitment versus Flexibility?”  
*California Management Review* (Summer): 26–42.

*Study questions:*

1. How do firms sustain their competitive advantage in Ghemawat’s view? How does this view differ from Porter’s view?
2. What are the five key take-aways from the Ghemawat & del Sol piece?

## **10/23 Session 16: Student group meetings**

### **10/25 Session 17: Competitor Reactions**

*Case:* Bitter Competition: HSC vs. Nutrasweet (A): 9-794-079

*Study questions:*

1. As Bob Shapiro, you face competition in Europe and Canada for the first time. What do you do? Launch a price war or accommodate this entry? What are the payoffs for each strategy?

## **10/30 Session 18: Managerial Decision Making**

Kahneman, Daniel, Dan Lovallo, and Olivier Sibony. 2011. “Before You Make that Big Decision.” *Harvard Business Review* (June): 51–60.

*Study questions:*

Please read the Kahneman et al. HBR article. As you reflect on your own decision making, and of that which you have experienced in the organizations that you have worked for, which of the decision making pathologies that Kahneman describes have you been able to observe?

## 11/1 Session 19: Strategic Inflection Points, Increasing Returns

Grove, Andrew S. 1996. Only the Paranoid Survive. pp. 27–35.

Arthur, Brian W. 1996. "Increasing Returns and the New World of Business." *Harvard Business Review* (July-August): 101–109.

*Study questions:*

I would first read the few pages by Grove, then the Arthur article.

1. What is a Strategic Inflection Point? How do you recognize one? (Please try think of ways beyond the ones Grove suggests.) Where in the cases that we have studied did SIPs occur? What are other examples of SIPs?
2. What does Arthur mean by the term "increasing returns"?
3. What are instances of increasing returns that we have seen in the cases that we have studied?
4. Under what (general) conditions should we expect increasing returns?
5. How do you exploit increasing returns?

## 11/6 Session 20: Information Asymmetry and Entry

*Case:* Honda (A): 9-384-049

*Study questions:*

1. What is the strategy that has allowed Honda to be so successful in the motorcycle industry and, in particular, in the United States?
2. How did Honda come to have this strategy and its associated choices?

<i>Paper Draft Due by 9am 11/6. Please bring one hardcopy to class.</i>
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## 11/8 Session 21: Barriers to Change

*Case:* will be distributed in previous class

## 11/13 Session 22: Architectural, Disruptive Change, Change in the Presence of Fit

Bower, Joseph L., and Clayton Christensen. 1994. "Disruptive Technologies: Catching the Wave." *Harvard Business Review*, January-February: 43–53.

Henderson, Rebecca M. and Kim B. Clark. 1990. "Architectural Innovation: The Reconfiguration of Existing Product Technologies and the Failure of Established Firms." *Administrative Science Quarterly* 35: 9–30.

Siggelkow, Nicolaj. 2001. "Change in the Presence of Fit: The Rise, the Fall, and the Renaissance of Liz Claiborne." *Academy of Management Journal*, 44, pp. 838-857.

optional: Sosa, Manuel, Steven D. Eppinger, and Craig M. Rowles. 2007. "Are Your Engineers Talking to One Another When They Should?" *Harvard Business Review*, November, pp. 133-142.

optional: Christensen, Clayton M. 1997. The Innovator's Dilemma pp. 3–28.

*Study questions:*

1. How do Henderson and Clark explain that leading firms are frequently upset by entrants?
2. How does Christensen explain that leading firms are frequently upset by entrants?
3. Is tight fit among activities a liability when the environment changes?
4. Is the reasoning developed by these authors transferable outside the realm of technological innovation? How?

## 11/15 Session 23: Modularity and Competitive Advantage Revisited

Baldwin, Carliss Y., Kim B. Clark. 1997. "Managing in an Age of Modularity." *Harvard Business Review* (September-October): 84–93.

*Study questions:*

1. What are the benefits of modularization? How would you try to quantify these benefits?
2. Is the concept of modularization useful outside the domain of product design?
3. How would you define Competitive Advantage? What should a company maximize (at least from the perspective of the capital providers)?

*Paper Feedback Due by Beginning of Class 11/15; please bring one hardcopy*

**11/20 Session 24: Time for Research: No Class**

**11/23 Thanksgiving: No Class**

**11/27 Session 25: Strategic Planning**

Optional: Lafley, A.G., Roger L. Martin, Jan W. Rivkin, Nicolaj Siggelkow. 2012.  
“Bringing Science to the Art of Strategy” *Harvard Business Review*, September, pp. 56-66.

*Study questions:*

You don't need to read the HBR article, I will talk about it in detail. It's there for your reference.

1. You are being asked by your boss/your client: “Please help us in drafting up our next strategic plan.” What do you do? What questions do you need to have addressed?  
**Please write-up your answer (1-2 pages bullet point).**

#### **IV. IT'S YOUR TURN**

**11/29 Session 26: Group Presentations**

Please read the papers that will be presented at the respective session.

**12/4 Session 27: Group Presentations**

Please read the papers that will be presented at the respective session.

**12/6 Session 28: Wrap-Up**

Optional: Competition and Business Strategy in Historical Perspective, 9-798-010

*Study questions:*

If you find time, I would recommend reading the strategy survey piece. It provides a nice overview of the field of strategy from both an academic and consulting point of view. I believe you will enjoy it as a “capstone” reading for this class.

*Final Paper Due 12/12 at noon! & peer evaluation form*