ENTREPRENEURIAL STRATEGY

STARTER SEMINARS 2020-2021
SESSION 3
Entrepreneurial strategy
Core assets
Problem/solution fit
Product/market fit
Perspectives on entrepreneurial strategy
Entrepreneurial strategy

Core assets
Problem/solution fit
Product/market fit
Perspectives on entrepreneurial strategy
Entrepreneurial strategy is the means through which an organization establishes and re-establishes its fundamental set of relationships with its environment.

J. Murray
1984
"It arises with the creation of a new organization: it must innovatively establish itself in the business ecosystem to survive. Once established, it is evoked by potential or actual misfit between organization and its ecosystem.

J. Murray
1984"
“You know what strategy is, Marc? Something falls on your plate and you decide to do something with it. Or not.”

Ignace De Bock
2004
WORKFLOW

Creativity & Idea generation

Idea translation

Idea implementation

Research

Selection

Execution

The scientist

The strategist

The entrepreneur
Strategy is finding a viable spot in the ecosystem and setting out a course towards it
- There is this whole world of companies organized in supply chains, around standards...
- There is this permanent evolution due to innovations and industry life cycles
- How do you fit?

Covering these dimensions are a key preoccupation of every entrepreneur
- Not answering these key questions (convincingly) is a major issue

These questions apply as well for startups and for established companies that initiate new projects.
- What do you bring to the table?

- What offering do you build based on this; what is the added value of this offer for your customers?

- What is the concrete plan: how do you build and bring this offering to the market? Will you make money?
<table>
<thead>
<tr>
<th><strong>Core assets</strong></th>
<th><strong>Problem / Solution fit</strong></th>
<th><strong>Product / Market fit</strong></th>
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<tr>
<td>What exactly are your core assets?</td>
<td>Who is your customer?</td>
<td>What will be your place in the supply chain/ecosystem?</td>
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<tr>
<td>Are your core assets exclusive?</td>
<td>What is his/her pain?</td>
<td>Who will be your key partners?</td>
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<td>In what stage of finalization are they? What remains to be done?</td>
<td>What does he/she do today?</td>
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<td>Do you have freedom to operate?</td>
<td>What solution do you offer?</td>
<td>What resources do you need to start, grow?</td>
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<td>What strategy fits your core assets?</td>
<td>Why are you better than alternatives?</td>
<td>Is it an attractive market?</td>
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Entrepreneurial strategy

Core assets

Problem/solution fit
Product/market fit
Perspectives on entrepreneurial strategy
“It all starts with something (relatively) unique you have in hand: core assets. These assets allow for the continuity of your business.”
What do you bring to the table?

- What offering do you build based on this, what is the added value of this offer for your customers?

- What is the concrete plan? How do you build and bring this offering to the market?
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Note on terminology
- Assets, Competencies, Capabilities
  - Generally interchangeable terms; we use the term ‘assets’ (except when we cite authors)
  - “Kernactiva, kerncompetenties”
- Resources and capabilities
  - Resources are tradable and non-specific to the firm
  - Capabilities are firm-specific, often tacit knowledge

We use core assets as overarching term.
ABOUT CORE ASSETS

EXAMPLES

- A **patent** on the antibodies of camels
- A **secret** formula for a refreshing drink
- A **brand** name everybody knows and likes
- An **installed base** of users on a social network
- The IT **infrastructure** and algorithms to deliver a perfect search experience to 1.000 billion requests per year
- The **expertise** to build 50 kilometer long tunnels
- The **talent** to design clothes, write songs
- Iron Man, Elephant Man, Conchita Wurst...
Characteristics of core assets

- Provide potential access to wide variety of markets
- Make a substantial contribution to customer benefits
- Are difficult for competitors to imitate

In running your business you enhance these core assets and develop new ones over time.

- Core competencies are enhanced as they are used.
- These in turn open new horizons.
- No-one can rely on the same core assets forever
- They may be limited in time
  - e.g. patent duration: 20 years
  - IBM and computing

(Source: The Core Competence of the Corporation, Prahaland and Gamel, HBS 5-6/1990)
Core competencies yield a definition of the company and the markets it serves. They provide a logic for product and market diversification, make resource allocation priorities transparent to the organization, and allow technologists, engineers, marketers, and others to have a shared understanding of goals. Ideally, a company creates a sustainable competitive advantage based on its core competencies. Few companies will build world leadership in more than five or six core competencies, and when it comes to core competencies, it is difficult to get off the train, walk to the next station, and then re-board. Based on core competencies, you develop a commercial offering and a plan for a venture.

(Source: The Core Competence of the Corporation, Prahalad and Hamel, HBS 5-6/1990)
CLASSIFICATION

- **Physical** (e.g. natural resources, equipment, money)

- **Intellectual** (e.g. creative talent, patents, copyrights, trade marks, expertise, experience)

- **Organizational** (e.g. low cost retail, one-day package delivery, marketing, ability to attracts talents, innovation and product development).

- **Market** (e.g. market share, brand name, distribution channel)

- **Resources & capabilities** (e.g. tradable knowledge; often tacit knowledge)
As a rule: **the more unique the more valuable**
- Of course it all depends on how important the subject of your exclusivity is

**Exclusivity is a sliding scale**
- The patent on the invention
  - Xerox
- **Brand** names
  - Pablo Picasso, Coca-Cola, Google
- **Market leadership** is by definition quite exclusive
  - Microsoft Windows/Office: broad markets
  - Barco screens: niche markets
- **Oligopolies**
  - 3 gaming Console Manufacturers
  - Oil and gas, pharma giants
- The opposite of exclusivity: large number of quasi identical suppliers
  - Pitta Bars...
- In certain **technology** domains **unique IP is a requirement** (ex. pharma), in nearly all it is of substantial value
- Exclusivity/leadership can be **regional**
  - Walmart: low cost retail US market,
  - Vs. Colruyt: low cost retail Belgian market
- Is the segment in which you claim leadership **relevant**?
  - ‘Market leader in PDA’s’ (without GSM functionality)
- Core assets do not need to be exclusive, the **combination** of ‘not so special assets’ can be valuable
  - Vietnamese boat refugee landed in Belgium + knowledge of French + ex-restaurant owner -> Vietnamese restaurant in Brussels
Assessing the uniqueness of your core assets...

**Red ocean**

- Compete with the existing
- Beat competition
- Exploit existing demand
- Make value/cost trade-off
- Differentiation or low cost

**Blue ocean**

- Create uncontested markets to serve
- Make competition irrelevant
- Create and capture new demand
- Break value/cost trade-off
- Differentiation and low cost

(Source: Kim & Mauborgne, 2015)
IS EXCLUSIVITY ENOUGH?

CORE ASSETS EXCLUSIVITY

- **Relevance**
  - Not enough to have core assets...
  - ... Someone must want them (or the products you derive from them)

- **Feasibility**
  - ... And you can make money delivering them
  - ... And there are no showstoppers: manufacturing, for use of product

- Finding the **right use** of your assets in the right market can be a creative process
  - Seeing the opportunity
<table>
<thead>
<tr>
<th>Type</th>
<th>Cost</th>
<th>Time</th>
<th>Limits</th>
<th>Value in negotiation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Intellectual Property</td>
<td>$$$$$ + enforce</td>
<td>20 year</td>
<td>- time limit</td>
<td>- sign of real technology</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>- freedom to operate</td>
<td>- signal threat of possible litigation</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>- how watertight?</td>
<td>- strength varies by sector</td>
</tr>
<tr>
<td>Secrecy, complexity</td>
<td>$</td>
<td>indefinite</td>
<td>- once the secret is out...</td>
<td>hard to bargain if your asset is secret (unless you can show the results)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>- requires effective organization</td>
<td></td>
</tr>
<tr>
<td>Speed</td>
<td>$$</td>
<td>short</td>
<td>need to repeatedly innovate</td>
<td>hard to bargain when speed is of essence</td>
</tr>
<tr>
<td>Branding, reputation</td>
<td>$ - $$</td>
<td>definite</td>
<td>relaunch from time to time, creativity required</td>
<td>favorable position when you have a strong brand</td>
</tr>
</tbody>
</table>

Adapted from “managing innovation and entrepreneurship”, Fiona Murray, 2008
IP STRATEGY
EXAMPLE
IBM

The last 17 years IBM has been granted more U.S. patents than any other applicant, an unprecedented **4,914 in 2009**.

More than the number of patents granted last year to Microsoft, Hewlett-Packard, Oracle, Apple, Accenture, and Google **combined**.

**IBM's worldwide portfolio** now covers more than **40,000 inventions**, from microprocessors for video games to the erasable read-write CD.

spent $5.8 billion on R&D last year, or 6% of its total revenue.

IBM's patents produce considerable income
- Fees from licensing and custom-developing IP for other companies: $1.1 billion in 2009
- Their patent department is a profit center

But: IBM's U.S. patents over the past five years ranks **only eighth in value**.
CORE ASSET STRATEGIES

- Merck and Liquid Crystal (Displays)
- Used in displays for LCD televisions, notebooks and PC monitors, mobile phones, clocks and watches, measuring instruments, digital cameras, camcorders, navigation systems ...
- ‘More than 2,500 patents for liquid crystals, their mixtures and display applications.’
- 69% market share in Liquid Crystal in 2007, 60% in 2017
- 2007: Liquid Crystal business comprised 13% of revenue and 50% of operating profits for Merck
- HQ in Germany, but main LC business based in East Asia.
- ‘More than 100 years of liquid crystal production at Merck’
- Quantity of LCs used in devices...
  - The display of a mobile phone contains about 5 mg of LC, a notebook. 0.3 to 0.4 g and a 32” LCD TVs panel 2g
  - The annual world market production of LCs is about 40 tonnes
  - In case of a 32” HD panel, the liquid crystal represents about 6% of total material cost
Pfizer relies on a single set of patents covering cholesterol drug Lipitor for a fourth of its total sales, an estimated $11 billion last year.

Qualcomm collects almost all its revenue—$10.4 billion in 2009—from selling licenses for and making the chips containing its patented 3G mobile-phone technology, known as CDMA.

Horacio Gutiérrez, chief intellectual property officer (at a/o Microsoft), says patents are treated not as a profit center but "as a currency that you use to trade to another company" for its patents. Volume is an important gauge of a company's innovation, he adds, but "only if they are high-quality patents."
Dr. John S. Pemberton invented Coca-Cola in 1886. Since then, the formula has been kept shared only with a small group.

The secret formula of Coca-Cola is kept in a vault in the United States.

You can visit the Vault of the Secret Formula at the World of Coca-Cola in Atlanta.

“The formula for making Coca-Cola is a trade secret. We have it for more than 130 years. Only The Coca-Cola Company knows how to make Coca-Cola. When you buy one of our drinks, you can be sure you’re getting the same delicious and refreshing experience time and time again!”

It is rumored that only two Coca-Cola executives know the secret formula for Coke. To prevent losing the recipe, the two are strictly forbidden to take the same plane.
CORE ASSET STRATEGIES

- Adobe developed 2 file format standards
  - Postscript: for printing = exchange between PC and printers
  - PDF: for file exchange between users, computer systems
- In both cases Adobe published the specifications
- Acrobat allowed plug-ins
- Consequences
  - Anybody could write Postscript/PDF applications
  - Nobody felt uneasy in adopting Postscript/PDF as standard file format
- Beat competition in speed, quality, marketing
- A whole ecosystem developed around Adobe.
This book provides a description of the PDF file format and is intended primarily for application developers wishing to develop PDF generator applications that create PDF files directly.

It also contains enough information to allow developers to write PDF consumer applications that read existing PDF files and interpret or modify their contents.
1. Disney characters and stories

2. Animatronics and Show Design
   - Disney has been the pioneer in the field of automated show elements: animatronics, lighting, sound and music, and other show effects, coordinated into a customer-pleasing package.

3. Storytelling, Story Creation and Themed Atmospheric Attractions:
   - This is an investment in the right people and having them learn ways to tell stories effectively

4. Efficient operation of theme parks:
   - They were the inventors of the efficiently-run modern theme park, reaching entirely new levels of cleanliness, safety and productivity while giving a uniformly high-quality entertainment experience to very large numbers of people.
   - A lot of this competency was gained through trail-and-error over the past 45 years. Knowing how to efficiently serve so many people so well may actually be more important to Disney’s success than any other ability.
For technology entrepreneurs...

- The long road from the lab to a usable product is almost systematically underestimated

- A lab demonstrator is NOT a product
  - Functioning in all circumstances
  - Manufacturable
  - No fatal flaws
  - Compliance to regulations
  - ...
  - + acceptance, financial viability...

- Be very very sober in analyzing what remains to be done
  - And the time it will take
  - Engineers always think it’s going to be easy...

- Validation is key!
  - It works
  - It works in real life circumstances
  - It has been manufactured in x units
  - It is being used by end users
- Method of estimating technology maturity
- Used by a wide variety of organizations, e.g. NASA, DoD, EU, ESA...
- Definitions of European Commission

<table>
<thead>
<tr>
<th>TRL</th>
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<tbody>
<tr>
<td>1</td>
<td>Basic principles observed</td>
</tr>
<tr>
<td>2</td>
<td>Technology concept formulated</td>
</tr>
<tr>
<td>3</td>
<td>Experimental proof of concept</td>
</tr>
<tr>
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<td>Technology validated in lab</td>
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<tr>
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<tr>
<td>6</td>
<td>Technology demonstrated in environment</td>
</tr>
<tr>
<td>7</td>
<td>System prototype in environment</td>
</tr>
<tr>
<td>8</td>
<td>System complete and qualified</td>
</tr>
<tr>
<td>9</td>
<td>Proven system in operational environment</td>
</tr>
</tbody>
</table>
- tot hier sessie 1
DO YOU HAVE FREEDOM TO OPERATE?

FREEDOM TO OPERATE

- Freedom to operate (FTO) means you have the freedom to test, market, or sell a product or service in a specific area or application domain.
- The phrase is often used when determining if a specific action can take place without infringing on the intellectual property rights of another.
  - Generally patents you will infringe when you do your thing.
- Tactical question, but potential showstopper.
  - Especially in technology & life sciences.
- Can also be prosaically linked to employment contracts.
  - Non-compete clauses.
- See also IP & TT session.
Canon core assets 1980’s
- Fine optics
- Precision manufacturing
- Microelectronics

Applied them to series of markets
- Copiers, printers, semiconductor manufacturing equipment, camera’s
- Passed Xerox in worldwide market share in copiers with fraction of R&D budget

Share value 1980-1988 +264%

Step to digital photography: develop new core assets
- Imaging sensor: CMOS sensor, DIGIC image processing chip
1. First core asset: a (much) better search algorithm
   - Patent owned Stanford University, shares in Google sold for $336 million in 2005
   - Resulted in rapid massive adoption of Google search

2. Then: the underlying IT infrastructure
   - Own server hardware, operating system
     - Making it possible to upscale very fast
     - And to roll-out YouTube, Gmail, Google Earth...
   - Cost savings: up to three time the computing performance per dollar of other contenders

3. Then: credibility
   - See Google’s philosophy ‘Ten things we know to be true’
     - ‘You can make money without doing evil’
   - We trust the Google search results
   - We like an advertising-free homepage

4. Then: a profitable business model
   - Context-sensitive textual ads next to search results sold via auction
   - Re-use of ads on other websites
   - Network effects (where?)

5. Then: organizational capabilities
   - To attract the brightest
   - To innovate
EXXONMOBIL

CORE ASSET EXAMPLES
EXXONMOBIL

- The world largest petroleum fields
- The expertise and equipment to exploit these fields and move the oil to users
- The refineries to process petroleum into a wide range of products
- The sales, marketing and distribution (gas stations) capabilities to sell all these products
Location: the sole friterie in Schepdaal
- Good cook
- Active in social life of Schepdaal
Entrepreneurial strategy
Core assets
Problem/solution fit
Product/market fit
Perspectives on entrepreneurial strategy
What do you bring to the table?

What offering do you build based on this, what is the added value of this offer for your customers?

What is the concrete plan? How do you build and bring this offering to the market?
Problem / solution fit is the confirmation that the problem is real and the solution is right, as validated by potential customers. It’s about generating value.
OPTRIMA: PLENTY OF PROBLEM/SOLUTIONS...

- **Television**
  - DepthSense™ and OptriCam™ enables natural interface to TVs based on simple gestures, allowing new and intuitive ways of interacting with your media-centre. A simple hand gesture will change the TV channel, turn up the volume, surf the Internet or flip through the photo or music library.

- **Gaming**
  - **You are the controller**

- **Automobile**
  - Optrima NV has licensed its DepthSense™ 3D CMOS Sensor technology to Melexis NV for adaption of the technology to the automotive market.

- **Health-Lifestyle**
  - New applications that can help elderly people or less valid patients home, in hospitals or in care centers benefit from “gaming alike rehabilitation and revalidation programs”.

- **Automation**
  - Optrima’s DepthSense™ and OptriCam™ systems provide reliable 3D data for autonomously guided vehicles, with improved obstacle identification and avoidance, service robots in industrial and in assembly, quality control monitoring, material handling and automation.

- **Security**
  - By using the OptriCam™ 3D Time-of-Flight camera a reliable set of depth data becomes available. This increases the robustness and flexibility of many surveillance, inspection, and logistics systems: camera based factory automation, person-counting applications at airports, elevator and door/gate security detection systems.
## Key Dimensions and Questions

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Especially in **B2B** clear, rational reasons determine if products are bought

**B2C** adds other arguments to the mix, but rational reasons remain applicable

The customers you target (or someone else) will need to spend money on your product
- And not on the endless range of alternatives

Will that happen?

It is essential that you know clearly, explicitly, why a customer should buy; you must therefore fully understand the logic of the customer

-> You **must** consider things from the perspective of your customer

**The focus is on your customer**, his needs, how your solution complies to these needs, **and competitive offerings**

You **build on your core assets** to create ‘solutions’ for ‘products’
WHO IS YOUR CUSTOMER?

WHO IS EXXONMOBIL’S MOST IMPORTANT CUSTOMER?

PE ➔ PE FILM ➔ Packaged Bottle ➔ Distribution ➔ With End-customer

ExxonMobil ➔ Converter ➔ Coca-cola Company ➔ Colruyt ➔ You
1. If there’s a problem or issue with your offering in the final product, **who is responsible** for taking the action required to rectify the situation?

2. Who stands to **lose the most financially** if there’s a problem or issue with your offering?

3. Who is the most likely to **recognize the value** provided by your offering?
WHO IS YOUR CUSTOMER?

THE MOST IMPORTANT CUSTOMER

WHO IS YOUR CUSTOMER?

PE
PE FILM
Packaged Bottle
Distribution
With End-customer

ExxonMobil
Converter
Coca-cola Company
Colruyt
You

Who is ExxonMobil’s most important customer?
The most important customer: exercise

- Military vehicle armament case
- The manufacturer
  - produces the “best performing” fiber in the market... 4x better
  - But all products meet existing MIL specs.
- Who is the MIC of Bekaert?
  - If there’s a problem or issue with your offering in the final product, who is responsible for taking the action required to rectify the situation?
  - Who stands to lose the most financially if there’s a problem or issue with your offering?
  - Who is the most likely to recognize the value provided by your offering?
WHO IS YOUR CUSTOMER?

THE MOST IMPORTANT CUSTOMER: EXERCISE

BEKAERT’s most important customer...

Solution: The manufacturer meets with the US Military share...
“we have a fiber which is 4x better but costs more”

At that meeting, they propose to set up a meeting with the military, the Fabricator and the Bekaert Value Innovation Team

• ... the message
• ... we want you to use this fiber
• ... cost is a NON ISSUE
• ... protecting our men and women is THE ISSUE
Our tool for understanding customer needs (and segments), and how your product/service meets those needs (compared to alternatives): performance criteria

So it is about understanding customer decision criteria, market segments, and alternatives to your product/service.

The key questions:
- What criteria are determining in the purchase decision of your customers?
- Does their importance vary over different types of customers, creating market segments?
- How does your solution score on these performance criteria?
- How do alternatives score?

The key challenges
- Identifying the relevant criteria
  - And not skipping the ones you don’t like
  - Denial is not an option
- Assessing different market segments
- Assessing correctly how you and alternatives score

Note on terminology: “customer requirements” is also commonly used.
Exercise: you order a pizza online. What are your performance criteria?
1. Define who is your customer
   - List known or suspected market segments: customer groups with specific needs

2. List criteria known or suspected to weigh in the customer decision
   - Sources:
     - Expertise, informal information
     - Hunches, convictions
     - Market surveys, customer surveys
     - A strike of genius in the definition of the criteria can make the difference!
     - Market segments = different sets or criteria, weight of criteria

3. ‘Calibrate’ each criterion
   - What is the show stopper level?
   - When is the product ‘good enough’?

4. Optionally: define the relative importance of each criterion

5. Perform market research
   - See part on marketing (later)
COMPARING PERFORMANCE CRITERIA

WHY ARE YOU BETTER?

- How do you (and your competitors) really score on the performance criteria
  - Denial is not an option
- Have you taken all dimensions along?
  - Criteria
  - Network effects, brand...
- Beware if you do not have a compelling competitive advantage
  - As a starter you often have a lot of competitive disadvantages to overcome
WHAT IS HIS/HER PAIN?

- **Palm gridpad**
  - Too big and heavy
  - Too expensive
  - For use inside specialized markets
  - No PC connectivity

- **Apple Newton**
  - Heavy and cumbersome
  - Mediocre handwriting recognition
WHAT IS HIS/HER PAIN?

Clearly defined target group: mobile professionals
- Not: general consumer, market niches such as transport & logistics

Clear definition of added value
- Electronic pocket agenda: agenda, address book, to do list, notes
- NOT a computer-in-the pocket

Performance criteria
- Simplicity
- Small size
- Reasonable price
- Attractive design
- Connectivity
- Reliable input (through easily learned character set)

1996: huge success
WHAT IS HIS/HER PAIN?

PERFORMANCE CRITERIA: PALM COMPUTERS

- Apple Newton weaknesses:
  - Complex
  - Dysfunctional for input
  - No connectivity

- Palm Pilot improvements:
  - Simplicity
  - Size
  - Connectivity
  - Handwriting input

Diagram showing performance criteria for handheld devices:
- Simplicity
- Small size
- Connectivity
- Low price
- Design

Handheld device performance envelope 1996
WHAT IS HIS/HER PAIN?

PERFORMANCE CRITERIA: DISPLAY TECHNOLOGIES

Figuur 26: performance envelope: E Ink vs. OLED vs. LCD, toekomstige situatie
**WHAT IS HIS/HER PAIN?**

**ANTIBODY PERFORMANCE CRITERIA**

<table>
<thead>
<tr>
<th>High Affinity</th>
<th>High Selectivity</th>
<th>Low Toxicity</th>
<th>Cavity Binding</th>
<th>Stability</th>
<th>High Solubility and no Tendency to Aggregate</th>
<th>Tissue Penetration</th>
<th>Alternative Routes of Administration</th>
<th>Tailored in vivo half-life</th>
<th>Ease and Low Cost of Manufacturing</th>
<th>Bi-specific and Multivalent Formats</th>
<th>Speed of discovery</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Small Molecule</strong></td>
<td>+</td>
<td>+</td>
<td>+</td>
<td>+</td>
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WHAT IS HIS/HER PAIN?

PERFORMANCE CRITERIA

- A formalized way to think about
  - Customer needs
  - Market segments
  - The way your offering/solution complies to their needs
  - Comparing your offering/solution to alternatives

- You must be able to indicate the key differentiators of your offering and why they matter

- If you can’t, you don’t have a viable offering!
ARE THERE ANY SHOW-STOPPERS?

- Watch out for **show-stoppers**
- Applies to all aspects: sometimes a criterion, or a minimum score, is a must
  - PDA’s of 5 kilograms have no chance
- May only apply to certain segments
ARE THERE ANY SHOW-STOPPERS?

THE APPLE NEWTON
Value Propositions are business or marketing statements that summarize why a consumer should buy a product or use a service.

Business buyers are rational buyers. So help them in their decision making process.

The ideal value proposition is
  - concise
  - Appeals to the customer’s strongest decision-making drivers.
  - Often fully quantified analyses of the impact of switching to your product, financially and from perspective of features
  - Substantiated and documented

Companies pay a high price when customers lose sight of the company’s value proposition.

(Source: www.investopedia.com)
(Most) Managers who make purchase decisions want to do business with suppliers that fully grasp critical issues in their business and deliver a customer value proposition that’s simple yet powerfully captivating.

James C. Anderson
Suppliers can provide such a customer value proposition by making their offerings superior on the few elements that matter most to target customers, demonstrating and documenting the value of this superior performance, and communicating it in a way that conveys a sophisticated understanding of the customer’s business priorities.

James C. Anderson
**Substantiate your claim**
- Rockwell Automation precisely calculated cost savings from reduced power usage that customers would gain by purchasing Rockwell’s pump solution instead of a comparable offering.
- Rockwell used industry-specific metrics to communicate about functionality and performance—including kilowatt-hours spent, number of operating hours per year, and dollars per kilowatt-hour.

**Document the delivered value**
- Create written accounts of cost savings or added value that existing customers have actually captured by using your offerings.
- Chemical manufacturer Akzo Nobel conducted a two-week pilot on a production reactor at a prospective customer’s facility to study the performance of its high-purity metal organics product relative to the next best alternative in producing compound semiconductor wafers.
Example: company that manufactured **resins used in exterior paints**.

- By researching the needs of commercial painting contractors—a key customer segment—the company learned that labor constituted the lion’s share of contractors’ costs, while paint made up just 15% of costs.
- Armed with this insight, the resin maker emphasized that its product dried so fast that contractors could apply two coats in one day—substantially lowering labor costs.
- Customers snapped up the product—and happily shelled out a **40% price premium** for it.

The resin manufacturer **deepened its understanding of key customers in several ways**.

- It enrolled managers in courses on how painting contractors estimate jobs.
- It conducted focus groups and field tests to study products’ performance on crucial criteria.
- It also asked customers to identify performance trade-offs they were willing to make and to indicate their willingness to pay for paints that delivered enhanced performance.
- And it stayed current on customer needs by joining industry associations composed of key customer segments.
The company’s technology lets businesses set up policies for how certain data like Social Security numbers or emails can be used throughout the organization to prevent regulatory missteps.

Additionally, Collibra’s tools can link to data repositories stored in places like Amazon Web Services, Microsoft Azure, and Salesforce’s software to manage sales data. Presumably, this makes it easier for people to find information that may be scattered in different databases.

Van de Maele likens the service to how libraries archive books and give visitors tools like index cards to find books that they’re looking for.

(source: http://fortune.com/2019/01/29/google-collibra-data-investment/)
to hier deel 2
Global **packaging supplier** headquartered in Hartsville, South Carolina.

Although the redesigned packaging provided six favorable points of difference relative to the next best alternative, Sonoco chose to **emphasize one point of parity and two points of difference** in what it called its distinctive value proposition (DVP).

The value proposition was that the redesigned packaging would:

- Deliver significantly greater manufacturing efficiency in the customer’s fill lines, through **higher-speed closing**
  - Allowing users to move from a seven-day, three-shift production schedule during peak times to a five-day, two-shift operation.
- Provide a **distinctive look** that consumers would find more appealing
- All for the **same price** as the present packaging.
- Sonoco chose to include a point of parity in its value proposition because, in this case, the customer would not even consider a packaging redesign if the price went up.
Entrepreneurial strategy
Core assets
Problem/solution fit ctd.
Product/market fit
Perspectives on entrepreneurial strategy
Global **packaging supplier** headquartered in Hartsville, South Carolina.

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<table>
<thead>
<tr>
<th>Core assets</th>
<th>Problem / Solution fit</th>
<th>Product / Market fit</th>
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</thead>
<tbody>
<tr>
<td>What exactly are your core assets?</td>
<td>Who is your customer? What does he/she do today?</td>
<td>What will be your place in the supply chain/ecosystem?</td>
</tr>
<tr>
<td>Are your core assets exclusive?</td>
<td>What is his/her pain?</td>
<td>Who will be your key partners?</td>
</tr>
<tr>
<td>What strategy fits your core assets?</td>
<td>What solution do you offer?</td>
<td>Can you make money with this product / market combination?</td>
</tr>
<tr>
<td>In what stage of finalization are they? What remains to be done?</td>
<td>Why are you better than alternatives?</td>
<td>What resources do you need to start, grow?</td>
</tr>
<tr>
<td>Do you have freedom to operate?</td>
<td>Are there any show-stoppers?</td>
<td>Is it an attractive market?</td>
</tr>
</tbody>
</table>

**ENTREPRENEURIAL STRATEGY**

**KEY DIMENSIONS AND QUESTIONS**
Business Aspects of Innovation in Materials
Metallocene Polyethylene (mPE) Developments at ExxonMobil Chemical

(or See WPO)
Major drivers for primary, secondary and tertiary packaging growth:

- Trade and logistics
- Consumer markets evolutions

Data from: Applied Market Information
Example of PE Business Chain

**PRODUCTS & SERVICES**

- **PE PRODUCER**
- **CONVERTER**
- **CONVERTER’S CUSTOMER**
- **END-USER**

**NEEDS & WANTS**

- THROUGHPUT
- FLEXIBILITY
- GAUGE CONTROL
- PACKAGING SPEED
- SEAL QUALITY
- SEAL THROUGH CONTAMINANTS
- PACKAGE INTENSITY
- SHELF LIFE
- OPENABILITY
- PACKAGE – CONTENT
- INTERACTION
- RECYCLABILITY

The business chain is characterized by two opposite flows:

- A cumulative set of Needs & Wants flowing from the end-user to the PE producer
- Products & Services going in the opposite direction
UNDERSTANDING THE MARKET...

Packaging and Product Bundling Trends & Drivers

Consumer – Retail
- Point-of-purchase differentiation impacts ultimate buying decision
- Advertisement spending shifts from traditional media to point-of-purchase influencing
- Increased emphasis on environmental impact – more sustainable flexible film solutions

Distribution Channels
- In-store cost reductions and more efficient waste stream management
- Package simplifications (e.g. removal of cardboards)
- Improved stock rotation
- Rise in warehouse & club-store retailing, outdoor displays

Packaging Trends
- Packaging functionality expands
- Shelf appeal becomes an ever more important dimension of packaging value
- Accelerated growth in multi-pack merchandising
- Display packaging grows at the cost of bundling in developing markets
- Source reduction and move toward single-material packaging systems
Collation Shrink Film Development Trends

- Snug fit around the product
  - Efficient/controlled shrinkage
  - 'Bull's-eye' as handle
  - Stiffness

- Packaging line performance
  - Seal consistency
  - Efficient/controlled shrinkage
  - Low coefficient of friction

- Optical properties
  - Low haze, good contact
  - or 'see-through' clarity
  - High gloss for printing

- Downgauging potential
  - Source reduction
  - Unit cost reduction
  - More sustainable flexible film solutions

- Package integrity
  - Puncture resistance
  - High holding force
  - No hole formation
**Metallocene Catalysts vs. Ziegler Natta Catalysts**

- **Metallocene**
  - More selective, more active catalysts
  - Polymer molecules are very similar
  - Significantly improved product properties

- **Ziegler Natta**

**ExxonMobil Chemical**
SEGMENTING THE OFFERING...

**mPE Value Proposition**

**Exceed™ mPE resin**
- Superior film toughness and strength
- Outstanding film impact resistance
- Excellent optical properties
- Superior film sealing performance

**Enable™ mPE resin**
- Replacing LDPE resin-rich blends
  - Equivalent processability
  - Up to 25% downgauging
  - LDPE shrink properties
  - Excellent see-through clarity
- Replacing LLDPE resin-rich blends
  - Business simplification
  - Up to 20% improvement in output
  - Excellent bubble stability
  - LL-HA0 performance benefits

Exceed and Enable mPE resins form a unique portfolio that facilitates business opportunities expansion across the value chain.
SEGMENTING THE OFFERING...
**Exceed™ mPE resin – Value Proposition**

“Exceed™ mPE is the leading edge mPE that expands the possibilities for experts working in the most demanding film applications to meet, and often redefine, the film performance attributes demanded by the value chain globally.”

- Superior film toughness and strength balance translate into significant film downgauging:
  - Reduces costs: raw material, inventory, processing, delivery and disposal.
  - Offers more sustainable solutions to brand owners and retailers through reduced packaging weight.
  - Less packaging lines shutdown (Stretch Hood).

- Superior film impact resistance offers:
  - Less application failure & after sales support from converters & packaging machine manufacturers (stretch hood).
  - Improved package integrity.
  - Improved tamper resistance (beverages).

- Superior film optical properties (gloss, haze & transparency) offer:
  - Improved print quality.
  - Better packaged product appeal.
  - Improved consumer brand recognition leading to higher revenue (beverages).
  - Improved bar code reading (apparel).

- Superior film sealing performance offers:
  - Increased packaging line speed at no cost (stretch hood).
  - Delayed packaging line investment.
  - Improved integrity and shelf-life for packages relying on seals layers (pouches, terminated bags, etc...)
  - Less packaging lines shutdown (PTS).
Enable™ mPE resin – Value Proposition

Enable™ mPE offers an unprecedented combination of film processing and HAD performance benefits in a single unique resin, leading to improved business operations and increase productivity.

Operational Stability: Have a broad operating window on both LLD and LD equipment that withstands fluctuations in manufacturing conditions
- Ability to process at lower melt temperatures provides greater bubble stability, improved melt strength, and greater shear thinning
- Stable, worry-free operations

Extended Output: Increase line capacity through faster processing
- Increased output (up to 20%) at no additional cost when replacing LL-rich blends – increased revenue
- Postpone future equipment investments
- Reduce or eliminate the use of polymer processing aids – lower cost operations

Bouncing Simplicity: Simplify your sourcing and operations with a single unique resin designed to replace blends
- Eliminate blending complexity and errors
- Reduced inventory costs by reducing the number of resins needing to be sourced
- Reduce or eliminate the need for sourcing LDPE

Versatility with HAD Performance: Tackle the performance needs of several applications
- Tackle the mechanical performance requirements of LL-rich structures
- Improve the toughness of LD-rich structures - 20% downgauging possible
- Extend the life of LD equipment – opportunity to enter new applications

ExxonMobil Chemical
Enable™ mPE resin Based Collation Shrink Film

Enable™ mPE resin core layer offers
- Limit cost and weight reduction
- Lower logistics costs
- Leading to more sustainable flexible film solutions

Exceed™ mPE resin skin layer offers
- Improved optical properties
- Improved puncture
- Outstanding sealing properties

At 25% thinner gauge ...
- Equivalent toughness, improved puncture
- Equivalent shrinkage and holding force
- Low haze
- Good cut-ability

Data from tests performed by or on behalf of ExxonMobil