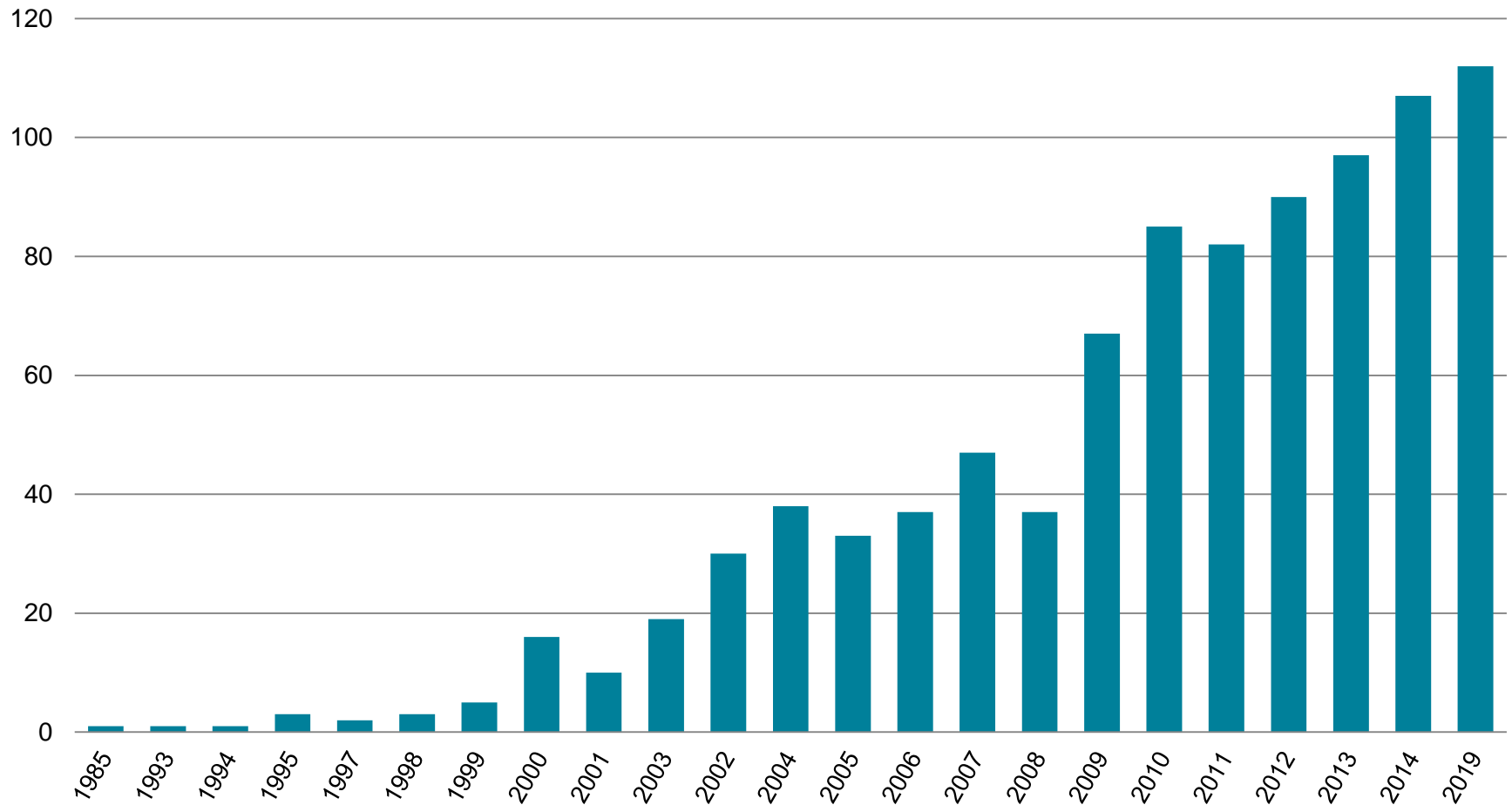


Digital Entrepreneurship and the Lean Start-up Approach

Dr. Dennis Steininger

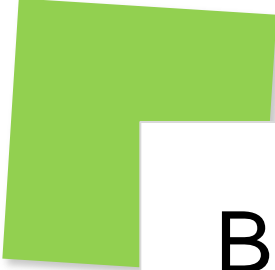
15.05.2019, Corfu

Introduction



Queried on March 24th: 2019, Database: EBSCO, Host: Business Source Premier

What does „business model“
mean for you?

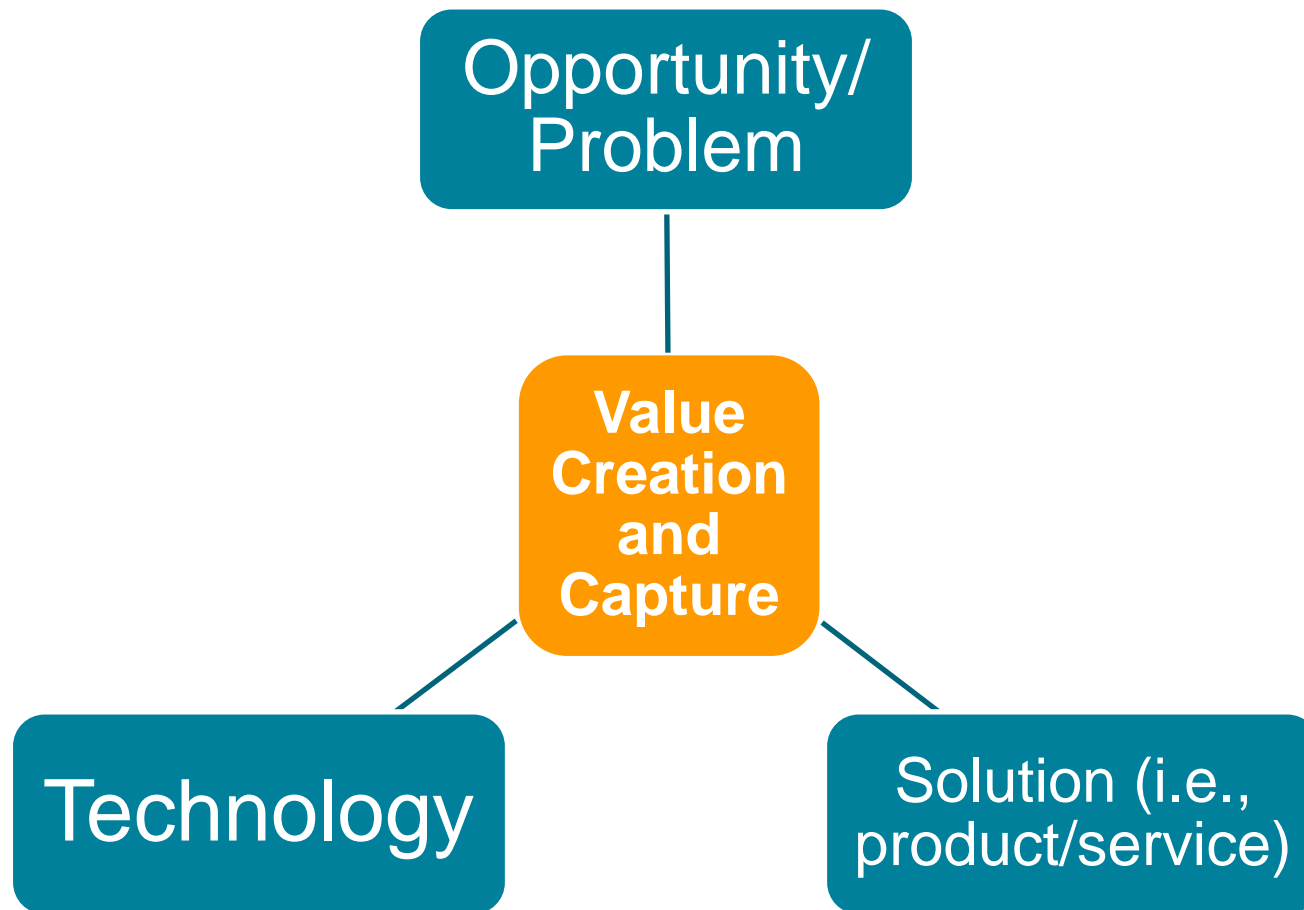


**Business models explain
how firms create and
capture value.**

Amit and Zott (2001)

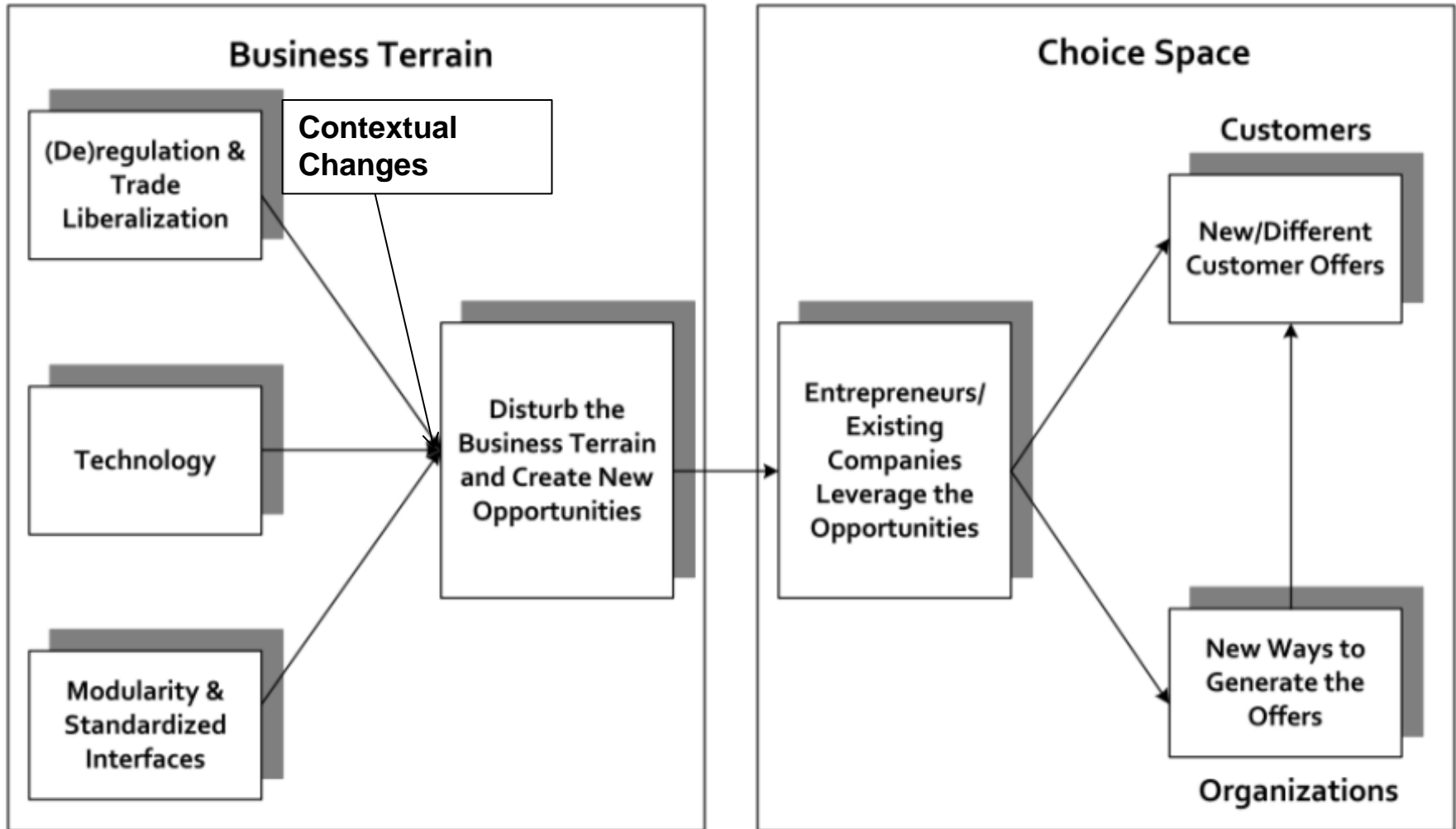
Amit, R., and Zott, C. 2001. "Value Creation in E-Business", *Strategic Management Journal* (22), pp. 493-520.

The Business Model Concept Brings Everything Together



What enables new opportunities?

Introduction



Keen, P., and Williams, R. 2013. "Value Architectures for Digital Business: Beyond the Business Model," *MIS Quarterly* (37:2), pp. 643–647.

- 1. Fundamentals of the business model concept**
- 2. The business model canvas tool**
- 3. Lean approach for business model development**

- 1. Fundamentals of the business model concept**
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What do you need the business
model concept for?

A business model is important for:

- ▶ **Understanding and communicating** of business logic by capturing and visualizing it
- ▶ **Innovating, designing and changing** business activities
- ▶ **Simulating and patenting** of designed business logic
- ▶ **Enabling measurement, analysis, evaluation and inter-firm comparison** of business logic
- ▶ **Improving of decisions** related to a firm's success or new ventures

Al-Debei, M. M., und Avison, D. 2010. „Developing a unified framework of the business model concept“, *European Journal of Information Systems* (19:3), S. 359–376.

Osterwalder, A. 2004. „The Business Model Ontology - A Proposition in a Design Science Approach.“

Veit, D., Clemons, E., Benlian, A., Buxmann, P., Hess, T., Kundisch, D., u. a. 2014. „Business Models: An Information Systems Research Agenda“, *Business & Information Systems Engineering* (6:1), S. 45–53.

What is the difference between a business plan and a business model?

Fundamentals of the business model concept

A business plan

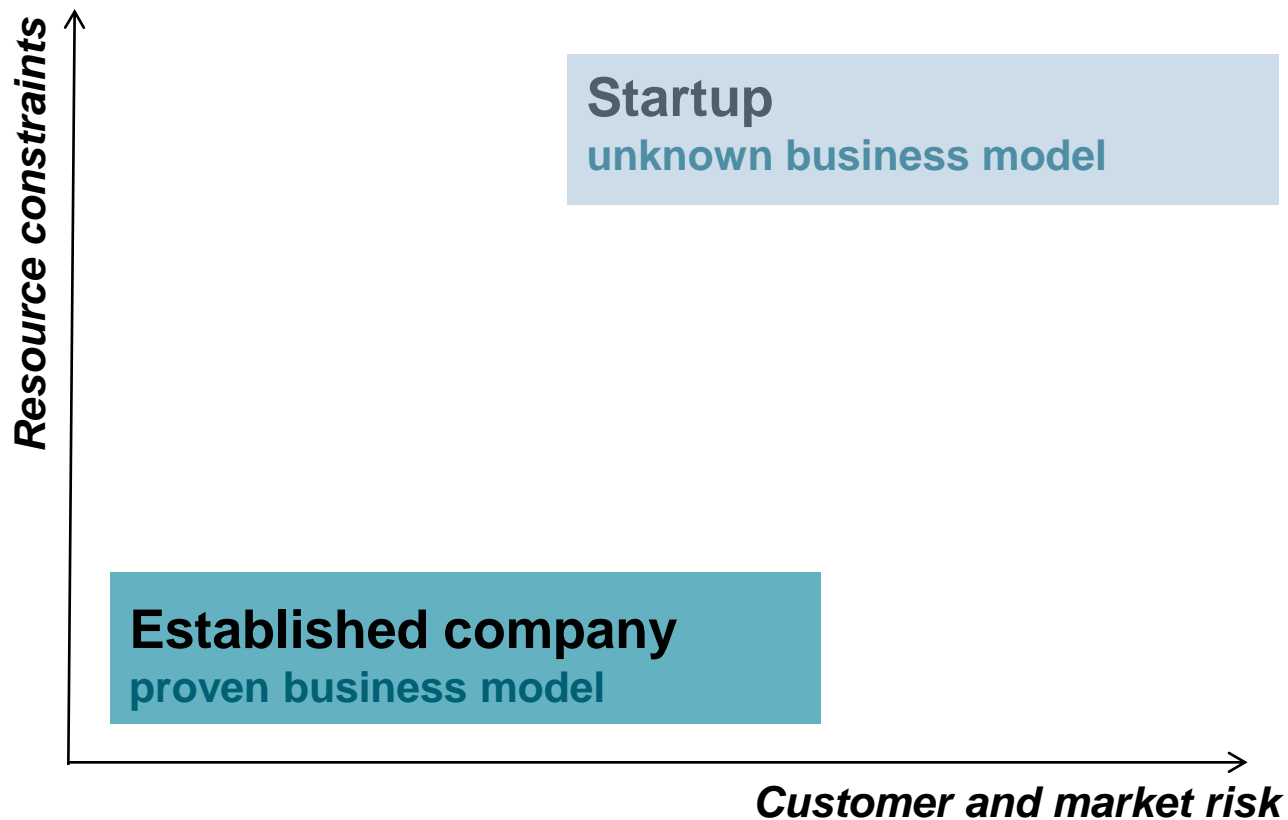
- ▶ Is a document that describes a firm's business model
- ▶ Always takes into account the competitive environment
- ▶ Includes financing and financial scenarios and forecasts



Laudon, K. C., and Traver, C.G. 2017. *E-commerce 2017: Business. Technology. Society* (13th ed.).
Timmers, P. 1998. „Business Models for Electronic Markets“, *Electronic Markets* (8:2), S. 3–8.

Fundamentals of the business model concept

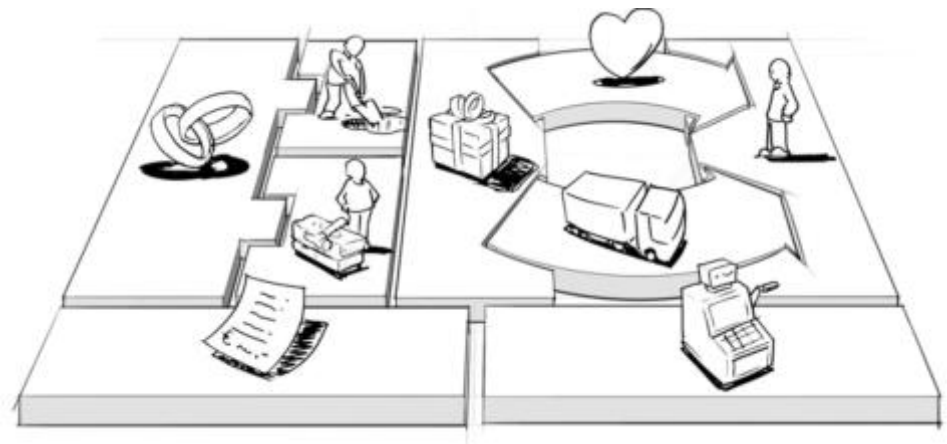
“Startups are all about the unknown...”



1. **Fundamentals of the business model concept**
2. **The business model canvas tool**
3. **Lean approach for business model development**

The business model canvas tool

- ▶ A strategic management template for developing new or documenting existing business models
- ▶ Allows visual charting, sketching and brainstorming
- ▶ Consists of 9 building blocks, based on extended business model components
- ▶ Proposes questions for each building block
- ▶ Introduced by Osterwalder based on his research work



Osterwalder, A. and Pigneur, Y. 2010: *Business Model Generation: A Handbook for Visionaries, Game Changers, and Challengers*.

https://www.youtube.com/watch?v=41q_zn8jMaE&t=76s

The business model canvas tool








The Business Model Canvas

Designed for:

Designed by:

On:

Iteration:

<h3>Key Partners</h3>  <p>Who are our Key Partners? Who are our key suppliers? Which Key Resources are we acquiring from partners? Which Key Activities do partners perform? How can we reduce our costs? How can we increase our revenues? How can we create new value?</p>	<h3>Key Activities</h3>  <p>What Key Activities do our Value Propositions require? Our Distribution Channels? Customer Relationships? Revenue Streams? Key Resources: Key Partners: Key Channels: Key Revenue Streams: Key Costs: Key Revenue Streams: Key Costs:</p>	<h3>Value Propositions</h3>  <p>What value do we deliver to the customer? Which one of our customer's problems are we helping to solve? What bundles of products and services are we offering to each Customer Segment? Which customer needs are we satisfying? Key Resources: Key Partners: Key Channels: Key Revenue Streams: Key Costs: Key Revenue Streams: Key Costs:</p>	<h3>Customer Relationships</h3>  <p>What type of relationship does each of our Customer Segments expect us to establish and maintain with them? Which ones have we established? How are they integrated with the rest of our business model? How costly are they? Key Resources: Key Partners: Key Channels: Key Revenue Streams: Key Costs: Key Revenue Streams: Key Costs:</p>	<h3>Customer Segments</h3>  <p>For whom are we creating value? Who are our most important customers? Key Resources: Key Partners: Key Channels: Key Revenue Streams: Key Costs: Key Revenue Streams: Key Costs:</p>
<h3>Cost Structure</h3>  <p>What are the most important costs inherent in our business model? Which Key Resources are most expensive? Which Key Activities are most expensive? Key Resources: Key Partners: Key Channels: Key Revenue Streams: Key Costs: Key Revenue Streams: Key Costs:</p>		<h3>Revenue Streams</h3>  <p>For what value are our customers really willing to pay? For what do they currently pay? How are they currently paying? How would they prefer to pay? How much does each Revenue Stream contribute to overall revenues? Key Resources: Key Partners: Key Channels: Key Revenue Streams: Key Costs: Key Revenue Streams: Key Costs:</p>		

1. Fundamentals of the business model concept
2. The business model canvas tool
3. **Lean approach for business model development**

9 out of 10 startups fail.

Chakrabarti, R. 2017. *9 Out of 10 Start-ups Fail. Here's Why!* in Entrepreneur Retrieved 15. Mai, 2018, from <https://www.entrepreneur.com/article/295798>.

You need 58 new products for one successful one.

Why?

A startup is not a smaller version of a big company



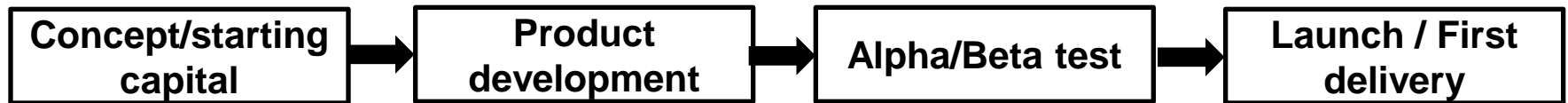
Example “Webvan” (Dotcom Blase, end of the 20th century):

- ▶ Revolution of the US food retail sector because of online orders
- ▶ Founded in 1996 → 1999: Had already collected 400m euro venture capital
- ▶ Hiring experienced managers
- ▶ Setting up a website, warehouses and fleet delivery trucks, as well as positive customer experiences

→ Only 24 months after the IPO, Webvan went bankrupt. **Why?**

Lean approach for business model development

In the 20th century, every company used some kind of product management model to introduce a new product



Traditional product management models are POSSIBLY appropriate if established companies:

Already know the customers

Know that the market is stable and well-defined

Can determine product characteristics in advance

Know what the competitors are like...

Only very few startups and companies match these criteria. Still, too often, all parties involved in the startup cling to such a plan, which, in some circumstances, could have destructive consequences



Deadly Sin #1:

Assuming you know what the customer wants

- ▶ On day one, a startup is a faith-based initiative built on guesses.
- ▶ Often, a delivery for a customer is hastily prepared without even talking to them before.

→ *To succeed, founders need to get out of the building and ask customers about their needs.*



Deadly Sin #2:

The “I know what features to build” flaw

- ▶ Is implicitly driven by Deadly Sin #1.
- ▶ Without direct and continuous customer contact, it is unknown whether the developed product features will match those the customers want.

→ *It is essential to constantly be in contact with the customers during the entire development stage.*



Deadly Sin #3: Focusing on the launch date

- ▶ Pressure from executives and investors results in everyone adhering to the scheduled launch date by all available means.
- ▶ Often, overhastily, the product is finished off not fully developed.
- ▶ Often, people tend to forget „WHO“ buys the product and „WHY“ the customers want to buy it.
- ▶ This stage has an extremely high need for capital.
- ▶ Only after the launch, many startups realize that the customer rush is smaller than expected.

The rapid growth of Webvan strictly followed the milestones put down in the business plan – the startup did not take into account that there were not enough customers available...



Deadly Sin #4:

Emphasizing execution instead of testing, learning, and iteration

- ▶ Initial hypotheses need to be tested and proven before they can be regarded as facts.
- ▶ Startups need to be in constant search mode and question everything to find their perfect Business Model.

→ *The skill to learn from mistakes is a feature of a successful startup.*

Webvan hired directors for sales promotion, marketing and product management, who worked according to strict strategies. Shortly after the product launch, they already employed 50 employees.

Maurya, A. 2012. "Running Lean: Iterate from Plan A to a Plan That Works". 2nd Edition. Sebastopol, CA: O'Reilly & Associates.



Deadly Sin #5:

Writing a traditional business plan that does not allow for trial and error

- ▶ In the starting period, traditional metrics like profit and loss account, balance sheet and cashflow get in the way. What is important is the cash burn rate.
- ▶ Board members and executives mostly only want information on milestones like beta tests and the first customer delivery. Thereby, a long list of tests and experiments gives evidence about the progress.

→ *If the executive board does not ask the right questions, they will waste time.*

Webvan did not have a milestone that said “Pause for a moment and evaluate what is happening” – otherwise, they would have noticed the difference between the 2000 actual and the 8000 planned orders a day.

Maurya, A. 2012. “Running Lean: Iterate from Plan A to a Plan That Works”. 2nd Edition. Sebastopol, CA: O'Reilly & Associates.



Deadly Sin #6: Prematurely scaling your company based on a presumption of success

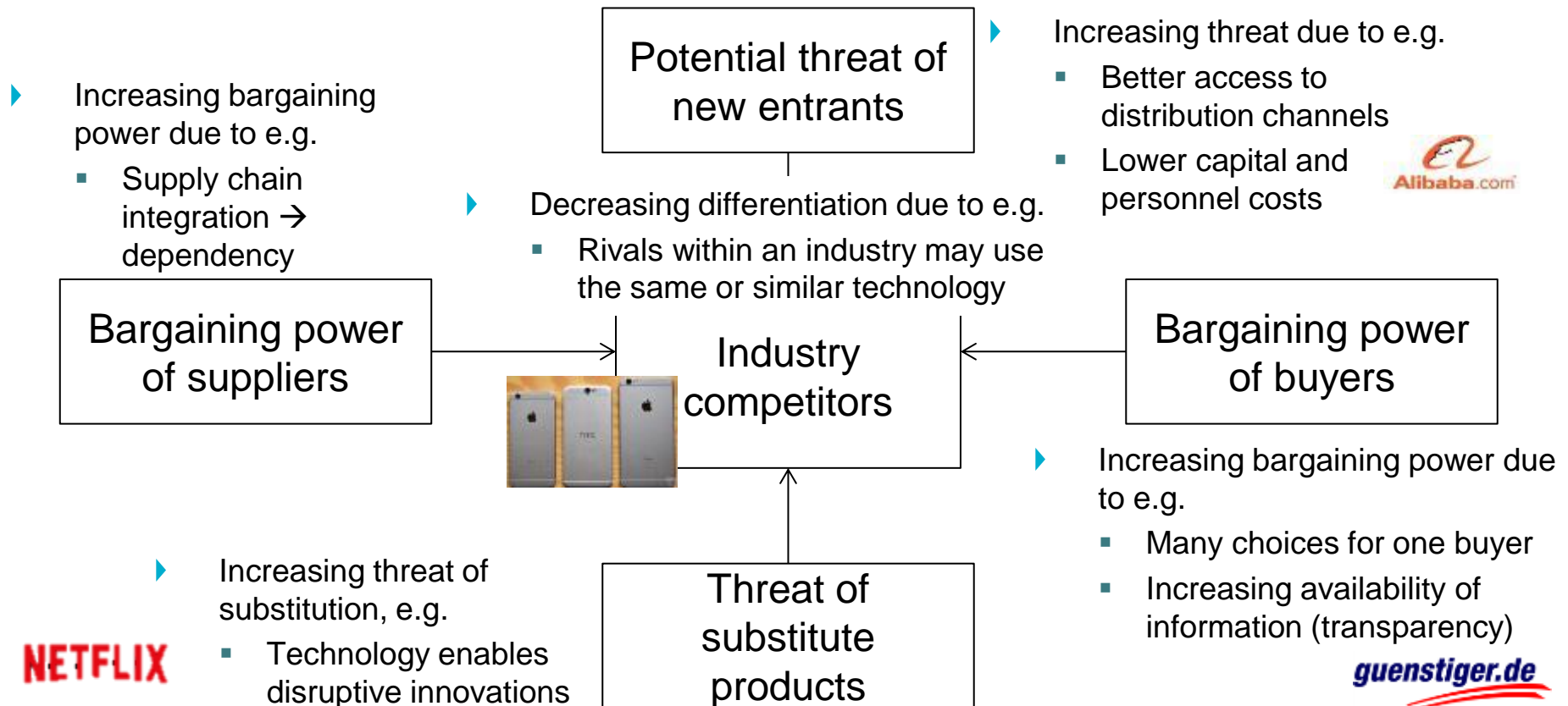
- ▶ Traditional plans leave little room for error, learning, iteration and customer feedback.
- ▶ Recruitments and expenses should only then be increased when sales and marketing bring about predictable, reproducible and scalable processes.
- ▶ No business plan survives first contact with customers.

Webvan's hasty attempts at scaling led to mistakes being acknowledged when it was already too late.

Why are there specifically high failure rates for IT-associated startups?

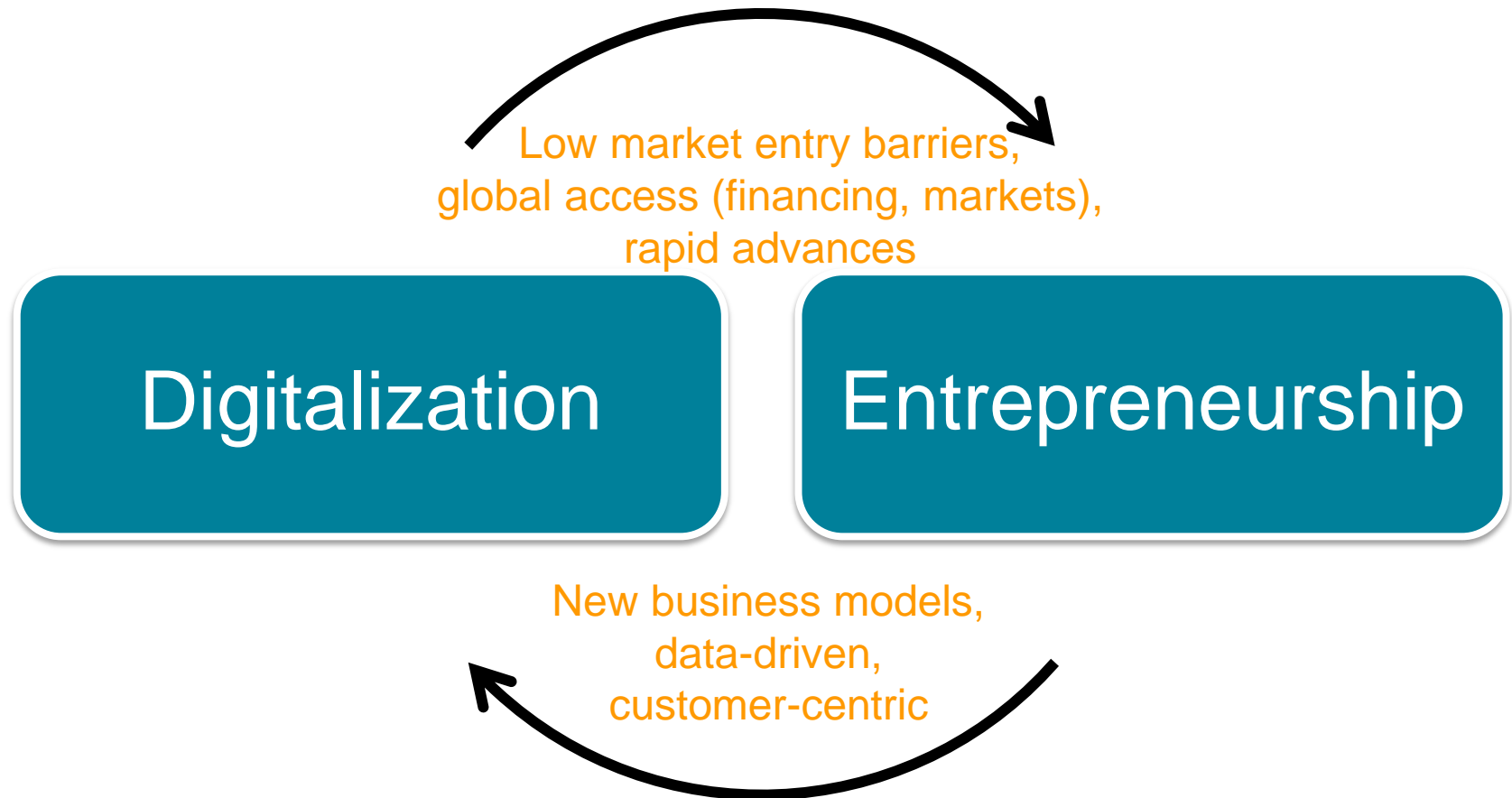
Lean approach for business model development

How IS may increase competition in an industry (Recap)



Porter, M. E. 2001. "Strategy and the Internet," *Harvard Business Review* (79:3), pp. 62–79.

Lean approach for business model development



- ▶ Quick adaptation and learning with new technologies and business models needed!
- ▶ Before running out of resources
- ▶ Seen in many successful new firms

Challenges for Algorithm-based Business Models: The Case of Spotify

- ▶ Spotify pays uploaders of playlists/music by number of listeners
- ▶ New uploads: Algorithmic check for uniqueness and existing copyrights
- ▶ Several people started uploading one-tone songs
- ▶ Gave listening tasks to Mechanical Turk
- ▶ Made over \$300,000 in per week until Spotify realized it
- ▶ All due to an automated and incentivizing business model



Open Source Business Models: The Case of Magento



- ▶ Started as a service company – didn't scale well
- ▶ Released their software as open source to become a product startup
- ▶ Tried support BM but: *"People just don't like that because if you have a good open source product, they don't need your support and services. They actually just want to use it."* – Yoav Kutner
- ▶ Then shifted to dual licensing BM: Enterprise edition and a community edition - differentiated on features – But one important thing is ecosystem and developers would just offer missing extensions for community edition in marketplace (often for free) – you are competing the ecosystem
- ▶ Enterprise customers see it and start asking why they pay so much only for support at the end
- ▶ Offered hosting service – hosting became commodity
- ▶ Today: Platform as a Service – scalable resources

Summary: Challenges to Startup Success in a Digital World

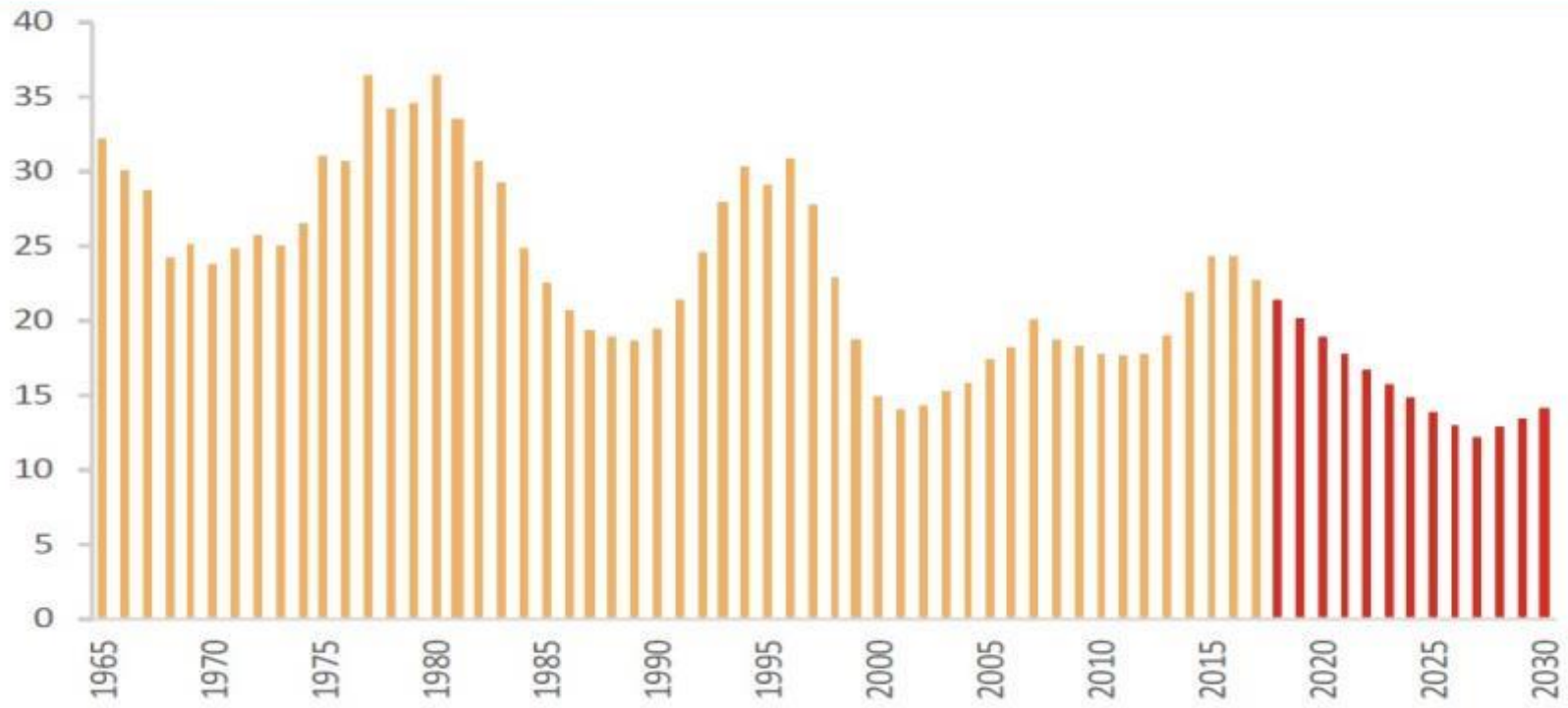
- ▶ Low entry barriers due to digitalization
- ▶ Easy access to production labs, digital workforce, data, users (e.g., maker movement, design crowd)
- ▶ Very rapid new technological developments
- ▶ Value creation/capturing logic for new technology unknown (e.g., Twitter)
- ▶ New technologies and related unknown business models bring more risk and complexity
- ▶ Specific effects such as the economics of information and digital products increase complexity and make competition fiercer
- ▶ Specifics of electronic markets such as network externalities also make things more complex



Challenges of Digital and Open Source Business Models

>> Increased Speed and Failure

Chart 1: Average Company Lifespan on S&P 500 Index
Years, rolling 7-year average



Data: Innosight analysis based on public S&P 500 data sources. See endnote on methodology. www.innosight.com

What to do?

Use the lean approach and customer
development!

Not only in startups ;-)

**We do not need a perfect
plan A!**

But a path to a functioning plan...



STANFORD
TECHNOLOGY
VENTURES PROGRAM

Steve Blank

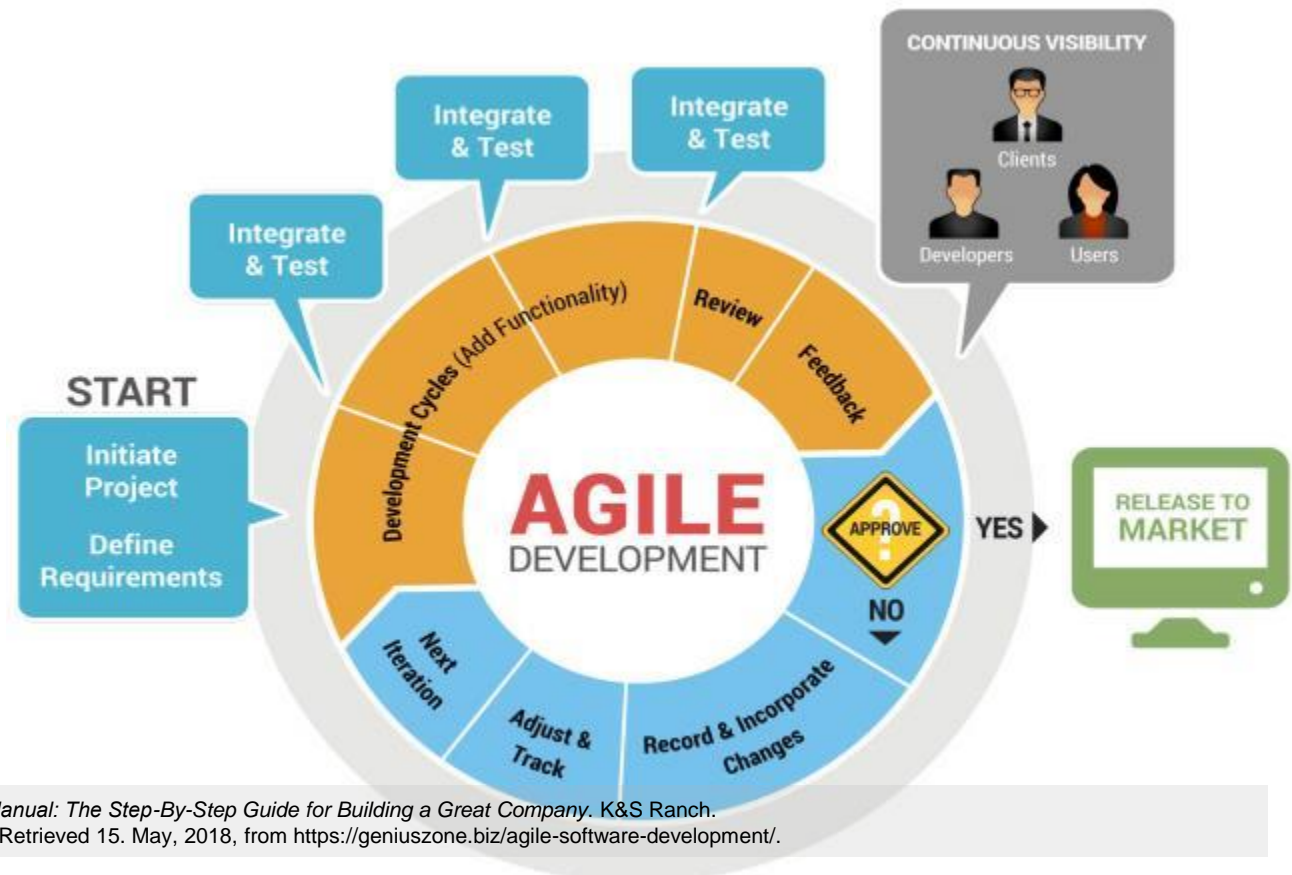
Serial Entrepreneur and Angel Investor

October 1, 2008

Tools for Developing Digital Business Models

The Lean Startup Approach combines:

- ▶ Steve Blank's customer development method and
- ▶ Agile Software Development

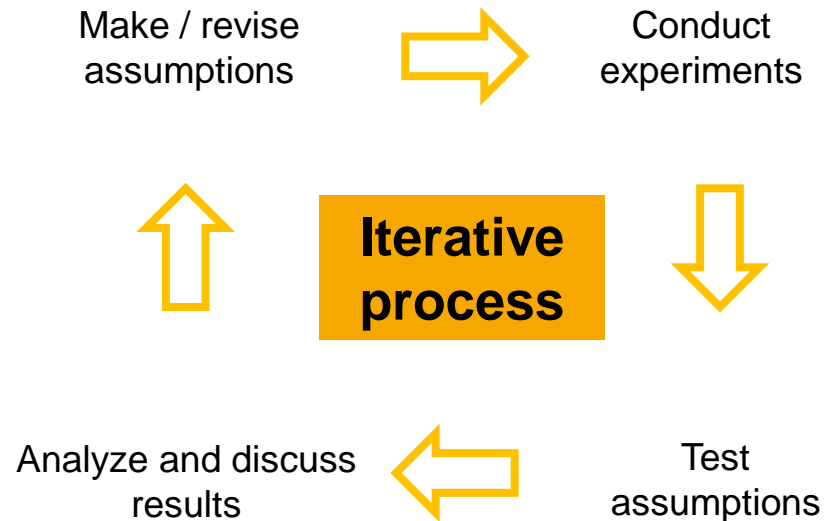
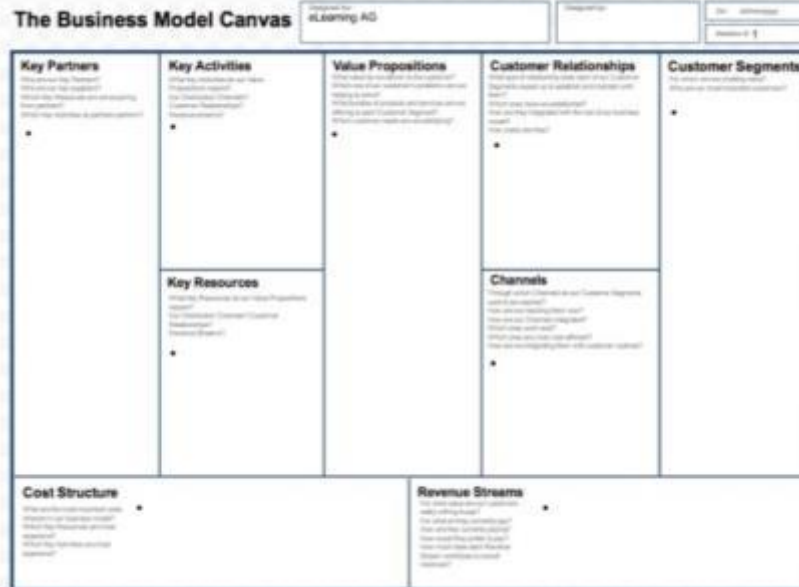


Blank, S. & Dorf, B. 2012. *The Startup Owner's Manual: The Step-By-Step Guide for Building a Great Company*. K&S Ranch.
Geniuszone. 2018. *Agile Software Development*. Retrieved 15. May, 2018, from <https://geniuszone.biz/agile-software-development/>.

Tools for Developing Digital Business Models

Underlying framework:
BM canvas / lean canvas

Customer Development and Agile
Software Development: Iterative Process



Geniuszone. 2018. *Agile Software Development*. Retrieved 15. May, 2018, from <https://geniuszone.biz/agile-software-development/>.
Osterwalder, A. and Pigneur, Y. 2010: *Business Model Generation: A Handbook for Visionaries, Game Changers, and Challengers*.

Tools for Developing Digital Business Models

- ▶ The problem is in the center of the approach
- ▶ Highly iterative process to turn plan A into a functioning plan
- ▶ Functioning plan: Reproducible, scalable
- ▶ Iterating and learning quickly before resources are exhausted
- ▶ “Get out of the building and meet customers” (Steve Blank)
- ▶ Uses the business model canvas in a modified version
- ▶ Can be used very well for product development in established companies



The 3 principles of the lean approach:

1. Document your plan A

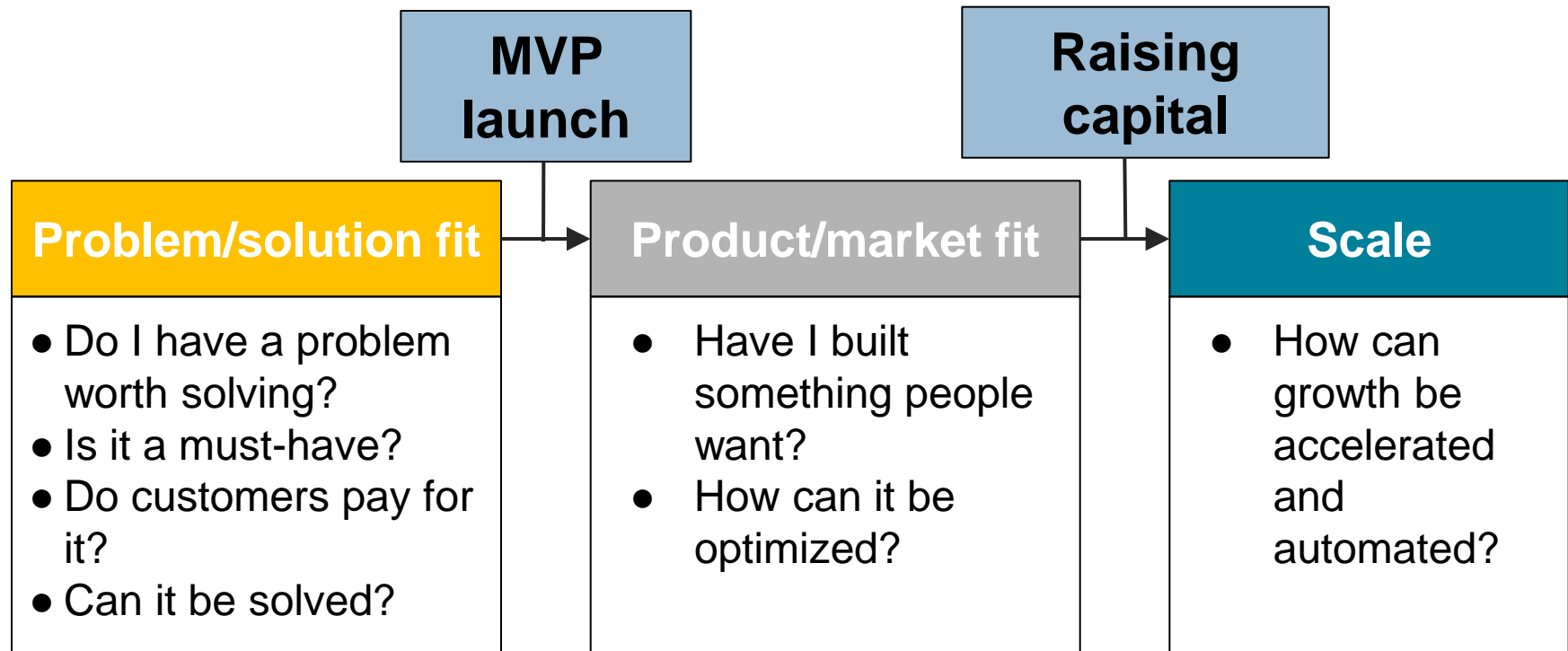
The 3 principles of the lean approach:

- 1. Document your plan A >> lean canvas**

Lean approach for business model development

The 3 principles of the lean approach:

1. Document your plan A >> **lean canvas**
2. Identify the **risks** of the sections

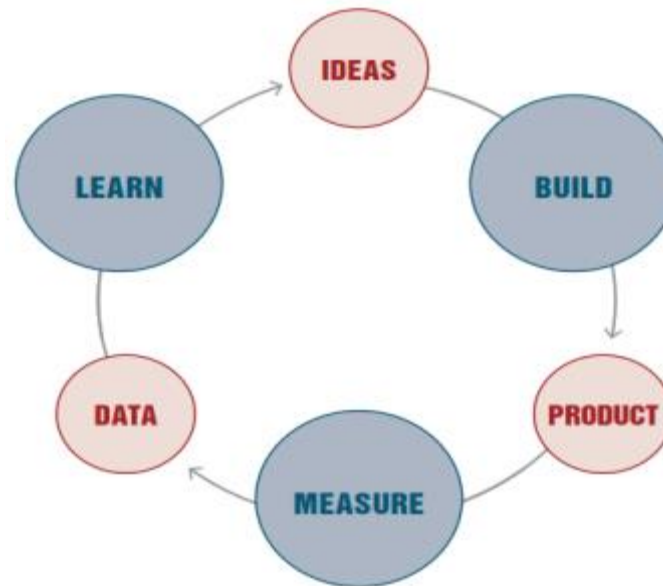


Blank, S. & Dorf, B. 2012. *The Startup Owner's Manual: The Step-By-Step Guide for Building a Great Company*. K&S Ranch.

Lean approach for business model development

The 3 principles of the lean approach:

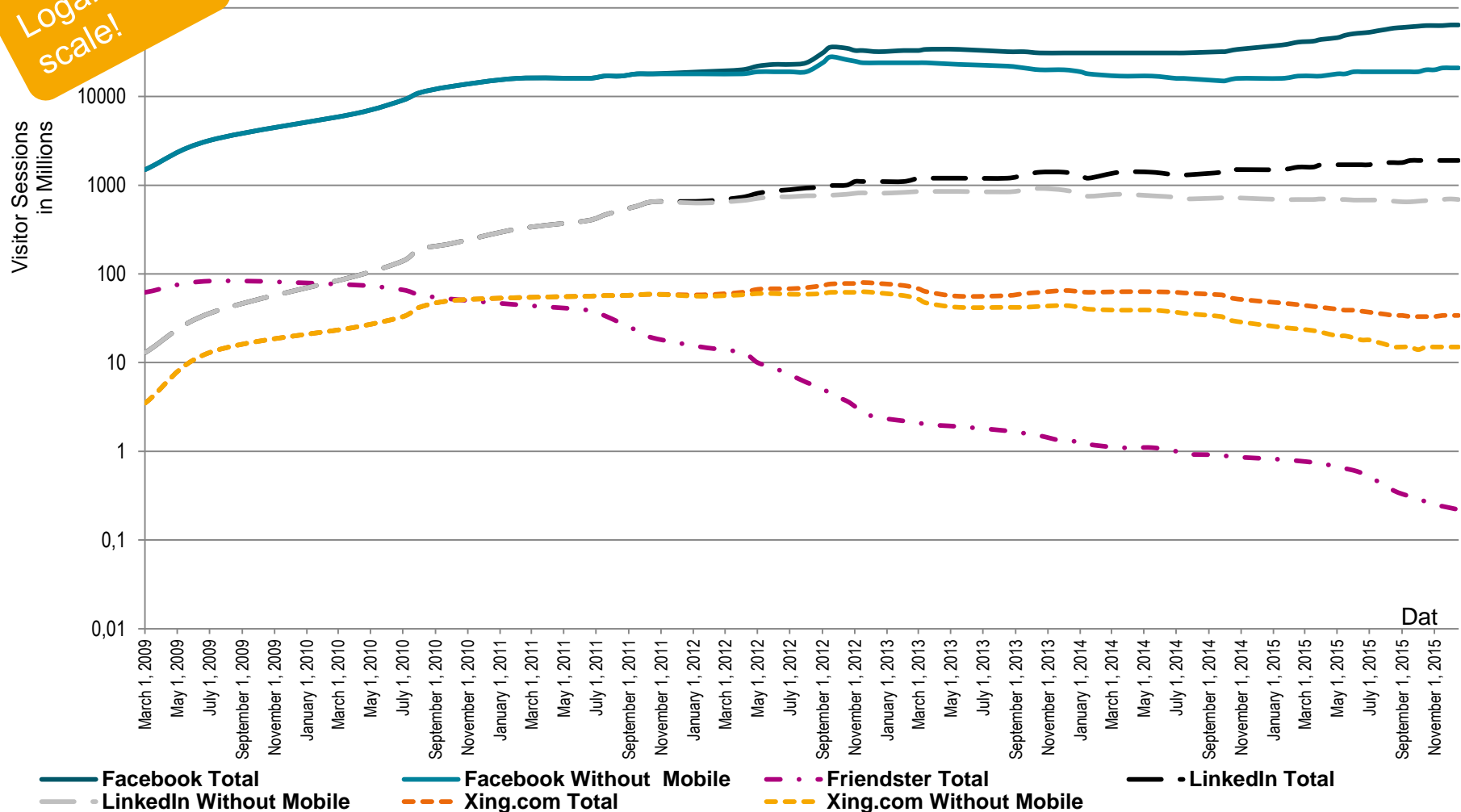
- ▶ Document your plan A >> **lean canvas**
- ▶ Identify the **risks** of the sections
- ▶ **Test and revise** your plan systematically



Blank, S. & Dorf, B. 2012. *The Startup Owner's Manual: The Step-By-Step Guide for Building a Great Company*. K&S Ranch.

Lean approach for business model development

Logarithmic scale!



Steininger, D. M. 2016. Digital Entrepreneurship: Definitions, Business Models, and Network Externalities, Mannheim: Dissertation, University of Mannheim.

Friendster

- ▶ At its peak time the largest SNS (>115 million users)
- ▶ Seen as the **early mover** of leisure-oriented SNS
- ▶ Offered free basic membership
- ▶ Was discontinued in 2015
- ▶ Located in Silicon Valley, USA



Facebook

- ▶ The largest global SNS (>2000 million users)
- ▶ Market leader of leisure-oriented SNS
- ▶ Late mover
- ▶ Most offers and features free of charge
- ▶ Heavily funded by VC from beginning
- ▶ IPO in 2012
- ▶ Located in Silicon Valley, USA



The case of LinkedIn vs. Xing

- ▶ LinkedIn (Silicon Valley, USA)
 - One of the largest global SNS (>570 Mio.)
 - Market leader of professional SNS
 - Most offers and features free of charge
 - Heavily funded by VC from beginning
 - IPO in 2011

- ▶ Xing (Hamburg, Germany)
 - European leader of professional SNS (>17 Mio.)
 - Offers free basic membership
 - Early IPO in 2006
 - Struggling to retain users



Lean approach for business model development



“I went to my first hackathon and fell in love. The next day I was totally beat but couldn’t wait to do the next one. Two weeks later I asked some people, ‘When’s the next one?’ and they said it wasn’t planned. I sent out an e-mail saying, “Hey, I’m going to get some Chinese food and hack all night.” It was super successful, and most of the company was there”

“Reid Hoffman was a big fan of ‘now build it and break it and then fix it’ and then also, how did it go? ‘If you launch a product that is perfect for the customer, you have waited too long with launching’. That is also a quote that you will constantly hear from him.

For example, our first jobs product was relatively simple and there were features missing on the right and left side but it was usable.

*It was not good, not beautiful, but it was usable and **we were able to see what worked and what didn’t and then further build on that** and further develop [...]. Exactly, yes exactly. That [lean startup approach] was a big thing of Reid Hoffman”*

Also established firms use the lean approach



- ▶ Day-1 principle
- ▶ Joy of experimentation and improvisation
- ▶ Proud of fault tolerance
- ▶ Meetings begin with summary of latest failure
- ▶ Famous fails: fire smartphone, first marketplace

“We always experiment instead of only following one idea”

- Jeff Wilke – CEO -

An example of how to use lean business modeling



Lean canvas



Problem

The 3 main
problems

Lean approach for business model development

EXAMPLE: Use the Kipling Method

Rudyard Kipling used a set of questions (5W + 1H) to help trigger ideas and solve problems.

- **WHAT**
What is the problem? (What are the symptoms?)
- **WHERE**
Where does the problem occur? (respectively, where did it emerge?)
- **WHEN**
*When does the problem occur? (respectively, when did it first occur?)
But also: When do you know the problem is solved?*
- **WHY**
Why did the problem occur?
- **WHO**
Who is affected by the problem? (respectively, who needs to be involved in the solution?) (Persons, departments, organizations, etc.?)
- **HOW**
*How does the problem show itself?
But also: How can you solve the problem?*

Lean canvas



Problem

The 3 main problems

Ex.:

- It is time-consuming to share many photos/videos
- Parents have no free time
- There are numerous requests

Lean canvas



Problem

The 3 main problems

Ex.:

- It is time-consuming to share many photos/videos
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Customer Segments

Target customers



Lean canvas



Problem

The 3 main problems

Ex.:

- It is time-consuming to share many photos/videos
- Parents have no free time
- There are numerous requests



Customer Segments

Target customers

Ex.:

- Parents (Doers)
- Family and Friends (Observers)
- *Early Adopters:* Parents of small children

Lean canvas



Problem

The 3 main problems

Ex.:

- It is time-consuming to share many photos/videos
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Value Propositions

A message stating why your product /service is different and worth buying.



Customer Segments

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Lean canvas



Problem

The 3 main problems

Ex.:

- It is time-consuming to share many photos/videos
- Parents have no free time
- There are numerous requests



Value Propositions

A message stating why your product /service is different and worth buying.

Ex.:

- Fastest way to share photos/videos
- *High-level:* sharing without upload



Customer Segments

Target customers

Ex.:

- Parents (Doers)
- Family and Friends (Observers)
- *Early Adopters:* Parents of small children

Value proposition

- ▶ A customer value proposition gives an overall view of a company's bundle of products, services and client advice
- ▶ It is the sum of the total benefits a customer is promised to receive in return for a payment (or other value transfer)



What are the 5 most important competitive attributes that characterize a game console's offer?



attribute 1
e.g. performance

Lean approach for business model development

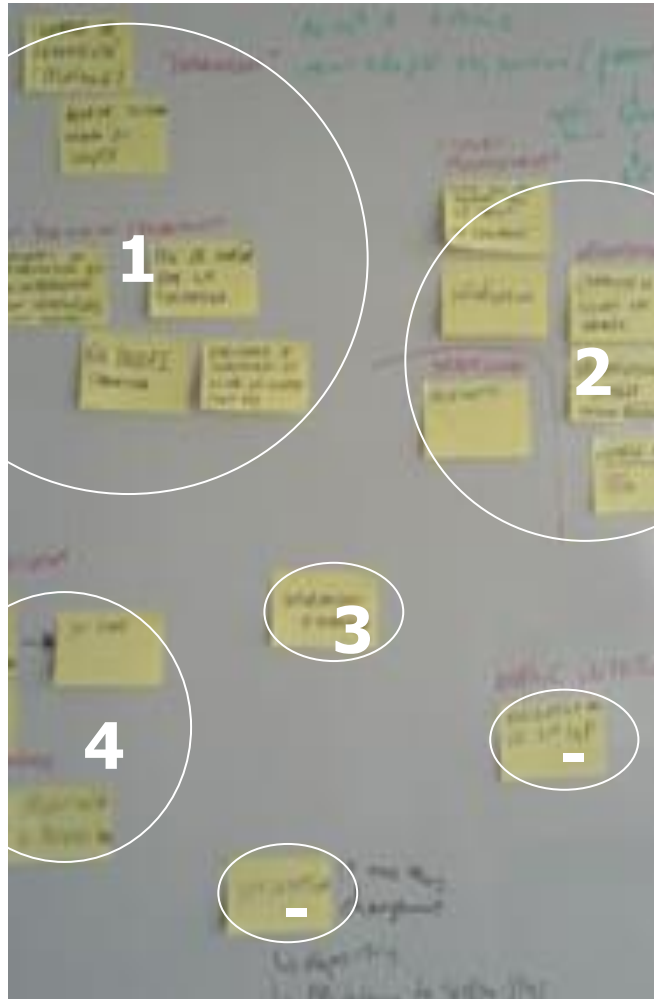
SONY

Microsoft



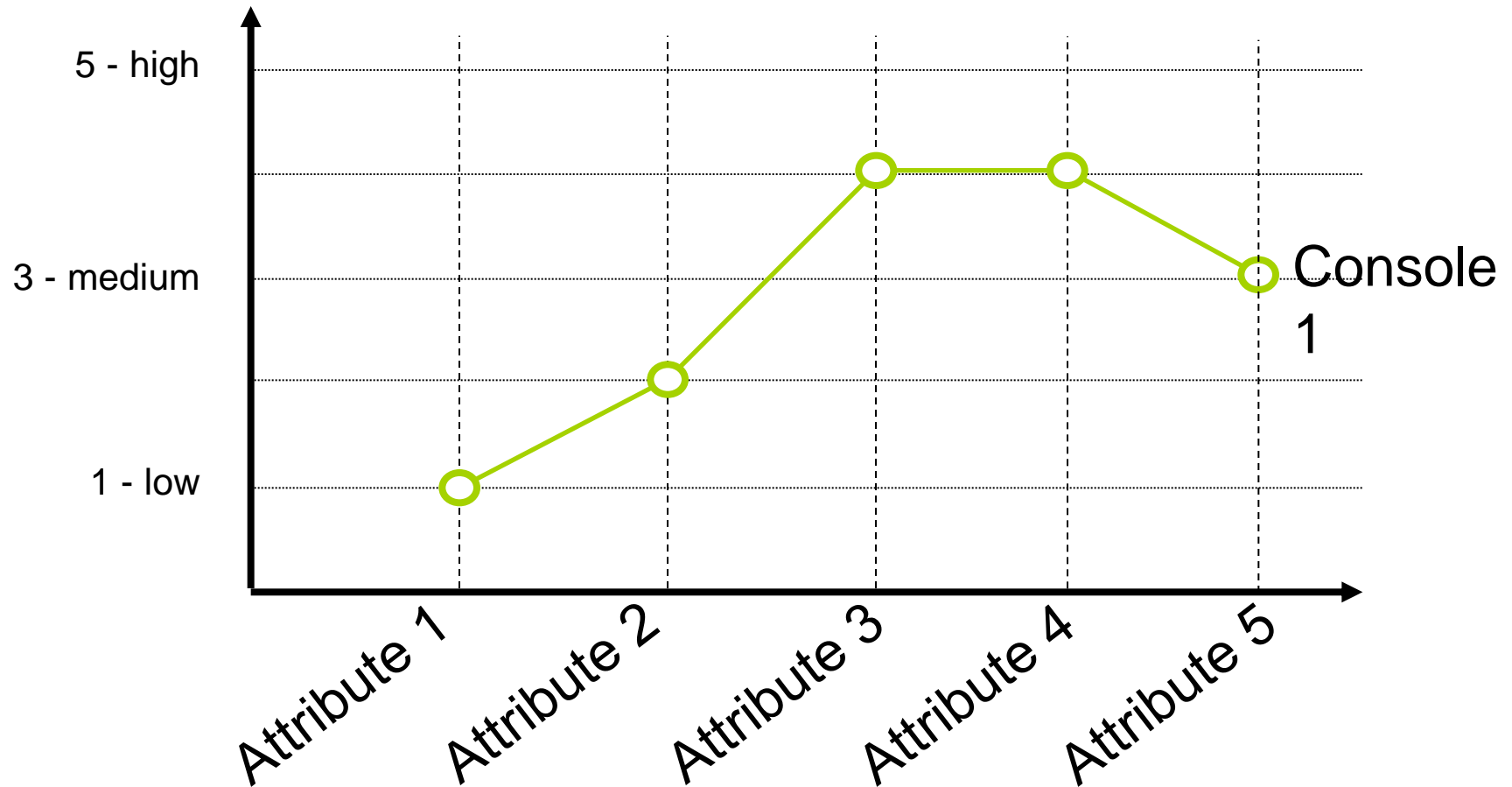
Nintendo

Lean approach for business model development







1. Most important attribute
2. Second most important attribute
3. ...
4. ...

Visualizing and comparing value propositions



Lean canvas

 Problem	 Solution	 Value Propositions	 Customer Segments
<p>The 3 main problems</p> <p>Ex.:</p> <ul style="list-style-type: none">- It is time-consuming to share many photos/videos- Parents have no free time- There are numerous requests	<p>3 most important features</p>	<p>A message stating why your product /service is different and worth buying.</p> <p>Ex.:</p> <ul style="list-style-type: none">- Fastest way to share photos/videos- <i>High-level:</i> sharing without upload	<p>Target customers</p> <p>Ex.:</p> <ul style="list-style-type: none">- Parents (Doers)- Family and Friends (Observers)- <i>Early Adopters:</i> Parents of small children

EXAMPLE: Visioning





- ▶ A vision is a 'motivating view of the future'. It creates pull. It gives direction.
- ▶ Imagine brilliant and innovative future. Think about what you are trying to achieve.
- ▶ Go out into the future. Look around and see what is there.
- ▶ Use dynamic and emotive words to paint motivating pictures.
- ▶ Phrase it in the present tense to make it more immediate.
- ▶ Use active verbs that talk about what is happening.
- ▶ Test it with others to ensure it works for them too.
- ▶ Visioning works because we are an imaginative species and are motivated by what we perceive as a possible or desired future.

Example: 200 years ago, today, in 200 years








Creatingminds. 2018. *Visioning*. Retrieved 15. May, 2018, from <http://creatingminds.org/tools/visioning.htm>.






Lean canvas

 Problem	 Solution	 Value Propositions	 Customer Segments
<p>The 3 main problems</p> <p>Ex.:</p> <ul style="list-style-type: none">- It is time-consuming to share many photos/videos- Parents have no free time- There are numerous requests	<p>3 most important features</p> <p>Ex.:</p> <ul style="list-style-type: none">- Without upload- Photo integrated- Automated message	<p>A message stating why your product /service is different and worth buying.</p> <p>Ex.:</p> <ul style="list-style-type: none">- Fastest way to share photos/videos- <i>High-level:</i> sharing without upload	<p>Target customers</p> <p>Ex.:</p> <ul style="list-style-type: none">- Parents (Doers)- Family and Friends (Observers)- <i>Early Adopters:</i> Parents of small children






Lean canvas

 Problem	 Solution	 Value Propositions		 Customer Segments
<p>The 3 main problems</p> <p>Ex.:</p> <ul style="list-style-type: none">- It is time-consuming to share many photos/videos- Parents have no free time- There are numerous requests	<p>3 most important features</p> <p>Ex.:</p> <ul style="list-style-type: none">- Without upload- Photo integrated- Automated message	<p>A message stating why your product /service is different and worth buying.</p> <p>Ex.:</p> <ul style="list-style-type: none">- Fastest way to share photos/videos- <i>High-level:</i> sharing without upload	 Channels Path to customers	<p>Target customers</p> <p>Ex.:</p> <ul style="list-style-type: none">- Parents (Doers)- Family and Friends (Observers)- <i>Early Adopters:</i> Parents of small children

Lean canvas

 Problem	 Solution	 Value Propositions		 Customer Segments
<p>The 3 main problems</p> <p>Ex.:</p> <ul style="list-style-type: none"> - It is time-consuming to share many photos/videos - Parents have no free time - There are numerous requests 	<p>3 most important features</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Without upload - Photo integrated - Automated message 	<p>A message stating why your product /service is different and worth buying.</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Fastest way to share photos/videos - <i>High-level:</i> sharing without upload 	<div data-bbox="1153 696 1524 1216">  Channels Path to customers <p>Ex.:</p> <ul style="list-style-type: none"> - Friends - Parents preschoolers - Birthday parties - AdWords/Facebook - Word-of-mouth </div>	<p>Target customers</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Parents (Doers) - Family and Friends (Observers) - <i>Early Adopters:</i> Parents of small children

Lean canvas






 <h2>Problem</h2> <p>The 3 main problems</p> <p>Ex.:</p> <ul style="list-style-type: none"> - It is time-consuming to share many photos/videos - Parents have no free time - There are numerous requests 	 <h2>Solution</h2> <p>3 most important features</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Without upload - Photo integrated - Automated message 	 <h2>Value Propositions</h2> <p>A message stating why your product /service is different and worth buying.</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Fastest way to share photos/videos - <i>High-level:</i> sharing without upload 	 <h2>Channels</h2> <p>Path to customers</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Friends - Parents preschoolers - Birthday parties - AdWords/Facebook - Word-of-mouth 	 <h2>Customer Segments</h2> <p>Target customers</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Parents (Doers) - Family and Friends (Observers) - <i>Early Adopters:</i> Parents of small children
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Revenue Streams

Revenue Model, Customer Lifetime Value, DB

Lean canvas







 Problem <p>The 3 main problems</p> <p>Ex.:</p> <ul style="list-style-type: none"> - It is time-consuming to share many photos/videos - Parents have no free time - There are numerous requests 	 Solution <p>3 most important features</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Without upload - Photo integrated - Automated message 	 Value Propositions <p>A message stating why your product /service is different and worth buying.</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Fastest way to share photos/videos - <i>High-level:</i> sharing without upload 	 Channels <p>Path to customers</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Friends - Parents preschoolers - Birthday parties - AdWords/Facebook - Word-of-mouth 	 Customer Segments <p>Target customers</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Parents (Doers) - Family and Friends (Observers) - <i>Early Adopters:</i> Parents of small children
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Revenue Streams

Revenue Model, Customer Lifetime Value, DB
 Ex.: 30 days free trial/ 49 \$ a year









Lean canvas

 Problem The 3 main problems Ex.: <ul style="list-style-type: none">- It is time-consuming to share many photos/videos- Parents have no free time- There are numerous requests	 Solution 3 most important features Ex.: <ul style="list-style-type: none">- Without upload- Photo integrated- Automated message	 Value Propositions A message stating why your product /service is different and worth buying. Ex.: <ul style="list-style-type: none">- Fastest way to share photos/videos- <i>High-level:</i> sharing without upload	 Customer Segments Target customers Ex.: <ul style="list-style-type: none">- Parents (Doers)- Family and Friends (Observers)- <i>Early Adopters:</i> Parents of small children
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Lean canvas

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 Cost Structure Customer acquisition, logistics, hosting, staff Ex.: Hosting Heroku (in the beginning: 0 dollars), 40hrs*65\$/h = ~10k/month		 Revenue Streams Revenue Model, Customer Lifetime Value, DB Ex.: 30 days free trial/ 49 \$ a year	








Lean canvas

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Lean canvas

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Lean canvas

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Key Metrics

Measurable key activities

- A- Registration
- A- 1. set up gallery
- A- share album
- R - invitation
- R- after trial > pay



Channels

Path to customers

- Ex.:
- Friends
 - Parents preschoolers
 - Birthday parties
 - AdWords/Facebook
 - Word-of-mouth

EXAMPLE: Perspectives of competitive advantage

Competitive advantage (EXAMPLE)

- ▶ Can be analyzed from **two perspectives**:
market-based (MBV) <=> resource-based (RBV)
- ▶ Market based (external) view of competitive advantage:
 - Competitive advantage grows out of value a firm is able to create for its buyers that exceeds the firm's cost of creating it
 - Value is what buyers are willing to pay
 - Superior value stems from:
 - Offering lower prices for the same product
 - Providing benefits that legitimate a higher price
 - Generic strategies for competitive advantage
 - Cost leadership
 - Differentiation
 - Focus



Barney, J. 1991. "Firm Resources and Sustained Competitive Advantage," *Journal of Management* (17:1), pp. 99 -120.
Porter, M. E. (1998): *Competitive Strategy: Techniques for Analyzing Industries and Competitors* (1st ed.), Free Press.

EXAMPLE: What are strategic resources?








Resource-based (internal) view of competitive advantage: (EXAMPLE)



- ▶ Competitive advantage grows out of resources the firm controls, including all assets, capabilities, organizational properties, firm attributes, information, knowledge etc.
- ▶ Questions to identify the competitive advantage arising from a resource:

Valuable?	Rare?	Costly to imitate?	Exploited by org.?	Competitive implications
No	--	--	No	Competitive disadvantage
Yes	No	--		Competitive parity
Yes	Yes	No		Temp. competitive adv.
Yes	Yes	Yes	Yes	Sustained competitive adv.








Barney, J. 1991. "Firm Resources and Sustained Competitive Advantage," *Journal of Management* (17:1), pp. 99 -120.


Lean canvas

 Problem	 Solution	 Value Propositions	 Unfair Advantage	 Customer Segments
<p>The 3 main problems</p> <p>Ex.:</p> <ul style="list-style-type: none"> - It is time-consuming to share many photos/videos - Parents have no free time - There are numerous requests 	<p>3 most important features</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Without upload - Photo integrated - Automated message <p> Key Metrics</p> <p>Measurable key activities</p> <ul style="list-style-type: none"> - A- Registration - A- 1. set up gallery - A- share album - R - invitation - R- after trial > pay 	<p>A message stating why your product /service is different and worth buying.</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Fastest way to share photos/videos - <i>High-level:</i> sharing without upload 	<p>Difficult to copy / buy</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Community - Network externalities - Lock-In <p> Channels</p> <p>Path to customers</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Friends - Parents preschoolers - Birthday parties - AdWords/Facebook - Word-of-mouth 	<p>Target customers</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Parents (Doers) - Family and Friends (Observers) - <i>Early Adopters:</i> Parents of small children

 Cost	 Revenue
<p>Product</p> <p>ing, staff</p> <p>Ex.: Hosting Heroku (in the beginning: 0 dollars), 40hrs*65\$/h = ~10k/month</p>	<p>Market</p> <p>ue, DB</p> <p>Ex.: 30 days free trial/ 49 \$ a year</p>

Lean canvas

 Problem	 Solution	 Value Propositions	 Unfair Advantage	 Customer Segments
<p>The 3 main problems</p> <p>Ex.:</p> <ul style="list-style-type: none"> - It is time-consuming to share many photos/videos - Parents have no free time - There are numerous requests 	<p>3 most important features</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Without upload - Photo integrated - Automated message 	<p>A message stating why your product /service is different and worth buying.</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Fastest way to share photos/videos - <i>High-level:</i> sharing without upload 	<p>Difficult to copy / buy</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Community - Network externalities - Lock-In 	<p>Target customers</p> <p>Ex.:</p> <ul style="list-style-type: none"> - Parents (Doers) - Family and Friends (Observers) - <i>Early Adopters:</i> Parents of small children
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 **Cost Structure**

Customer acquis

Ex.: Hosting Heroku (in the be

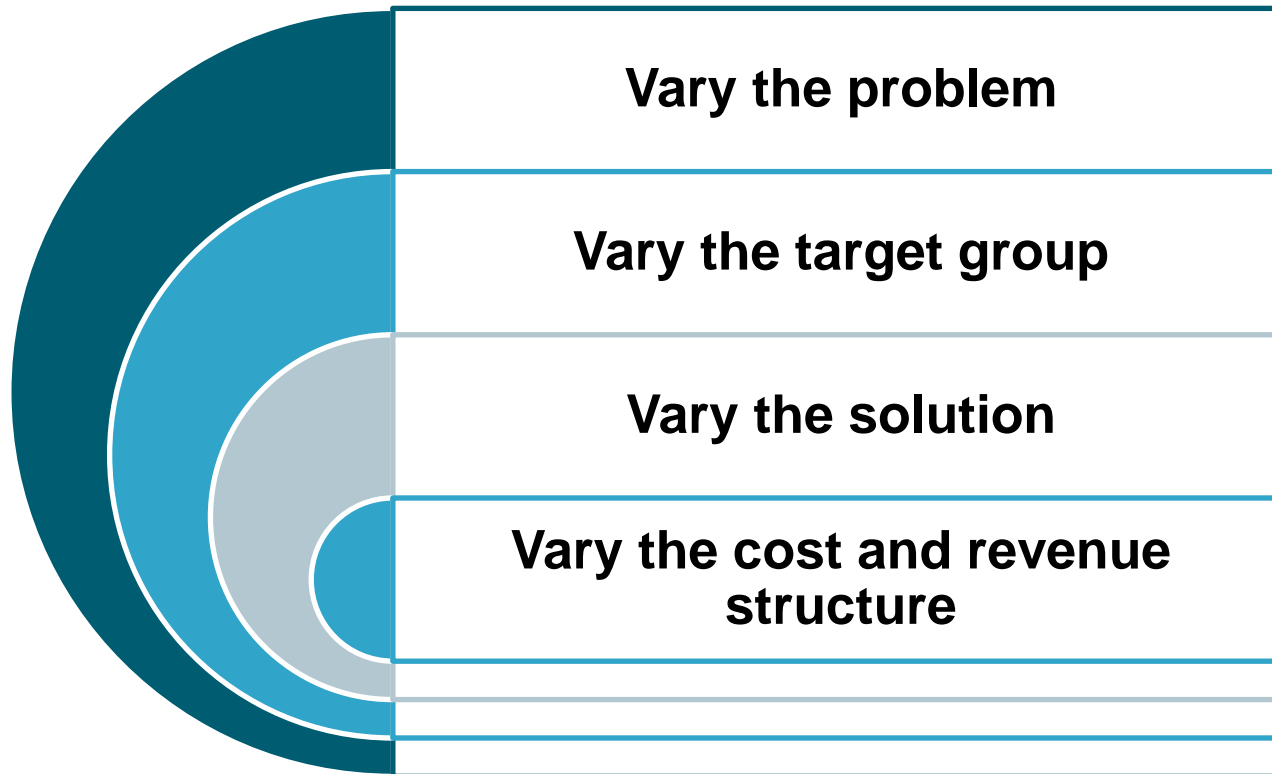
~10k/month

Break-even: ~2500 customers








Customer Lifetime Value, DB

49 \$ a year

Generate alternative canvases:



Lean canvas: Service for video photographers

 Problem The 3 main problems Ex.: <ul style="list-style-type: none">- It is time-consuming and error-prone to share videos- Most sites only offer Thumbs Alternatives: FTP, CDN	 Solution 3 most important features Ex.: <ul style="list-style-type: none">- Without upload- Progressive streaming	 Value Propositions A message stating why your product /service is different and worth buying. Ex.: <ul style="list-style-type: none">- Fastest way to share videos- <i>High-level:</i> sharing after upload	 Unfair Advantage Difficult to copy / buy Ex.: <ul style="list-style-type: none">- ?	 Customer Segments Target customers Ex.: <ul style="list-style-type: none">- Video photographers (Doers)- Clients (Observers)- <i>Early Adopters:</i> Music, sports, video games
 Cost Structure Customer acquisition, logistics, hosting, staff Ex.: Hosting Heroku (in the beginning: 0 dollars), 2*40hrs*65\$/h = ~20k/month		 Revenue Streams Revenue Model, Customer Lifetime Value, DB Ex.: 30 days free trial/ 199 \$ a year		
Break-even: ~1200				

Break-even: ~1200

customers

*“Innovation comes from **saying no to 1,000 things** to make sure we don’t get on the wrong track or try to do too much.”*

Steve Jobs

Lean approach for business model development

Discuss / evaluate canvases using these criteria:

- ▶ Customer needs (problem):
 - Prefer problems which are needed the most
 - There should be at least one problem you cannot ignore
- ▶ Accessibility (channels):
 - Prefer tests with customer segments that are easily accesible
 - This way, you get out on the street to learn faster
- ▶ Income / cost structure (revenues / costs):
 - Look for customer segments who tolerate higher prices
 - Look for customer segments who cause lower costs
- ▶ Market size (customer segment):
 - Look for a segment that offers you a big enough market
- ▶ Technical feasibility (solution):
 - Is the solution feasible within the limits of the resources available?
 - Does the solution have a minimum amount of suitable features?



Choose the most appealing canvas and phrase the content as falsifiable hypotheses:

- ▶ „Being known as an expert attracts early adopters“
(channel hypothesis)
- ▶ „One blogpost leads to 100 registrations“



Blank, S. & Dorf, B. 2012. *The Startup Owner's Manual: The Step-By-Step Guide for Building a Great Company*. K&S Ranch.

Lean approach for business model development

Start with experiments and interviews:

- ▶ Product risk: What are you solving? (problem)
- ▶ Market risk: Who are the competitors? (existing alternatives)
- ▶ Customer risk: Who has the pain? (customer segments)



Blank, S. & Dorf, B. 2012. *The Startup Owner's Manual: The Step-By-Step Guide for Building a Great Company*. K&S Ranch.

The problem interview

1. **Welcome:** Introduction
2. **Collect demographics:** Age, education, children, photos, how often?
3. **Tell a story:** Set problem context
4. **Problem ranking:** Which is the most important one, others?
5. **Explore customer's worldview:** Work processes, assessment, discuss hypotheses, what are minimum features?
6. **Wrapping up:** Do you want to get to know the product? Would you name us other interview partners who have children?
7. **Document results:** Directly afterwards



Blank, S. & Dorf, B. 2012. *The Startup Owner's Manual: The Step-By-Step Guide for Building a Great Company*. K&S Ranch.

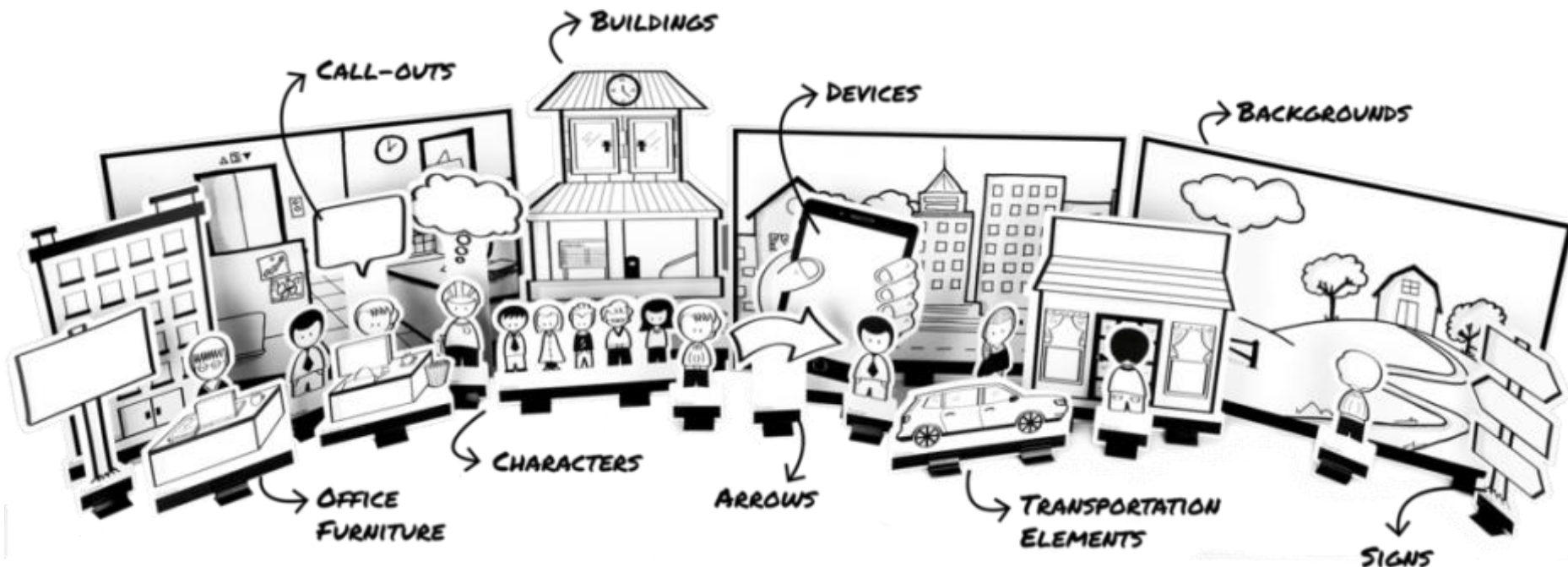
With the results of interviews

- ▶ Iterate and update canvas with new insights
- ▶ Build MVP on a small scale (scribble/demo/prototype)
- ▶ And keep learning and improving

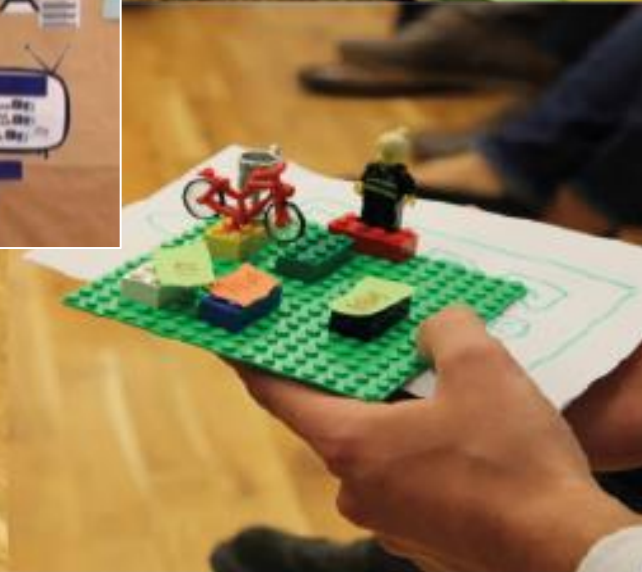


Tools for Developing Digital Business Models

SAP Scenes for Developing User Stories



<https://experience.sap.com/designservices/approach/scenes>







SEAT

MOON

SEAT



SEAT



MONILA
SEAT
2

Digital prototyping explained by Google experts

<https://www.youtube.com/watch?v=KWGBGTGryFk&t=252s>

The solution interview:

1. **Welcome:** Introduction
2. **Collect demographics:** Age, education, children, photos, how often?
3. **Tell a story:** Set problem context
4. **Demo:** Go through demo and show solution to problems, what is missing, what do they not need? How do they like it?
5. **Test pricing:** Ask if customers would buy it for defined price. Notice reactions: hesitating, direct consent
6. **Wrapping up:** Do you want to get to know the product? Would you name us other interview partners who have children?
7. **Document results:** Directly afterwards

Crowdsourced Rapid User Tests



Document your plan A

Identify riskiest parts of your plan

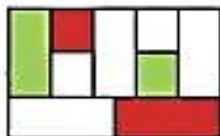
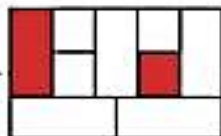
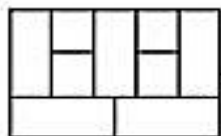
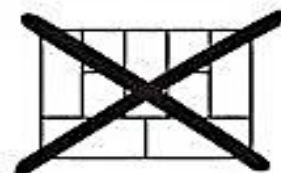
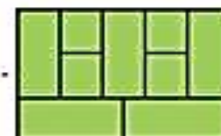
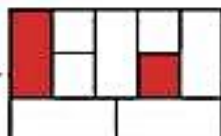
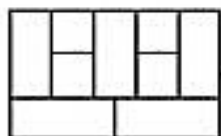
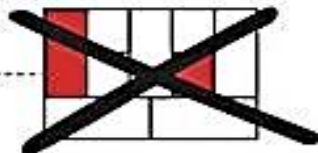
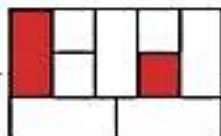
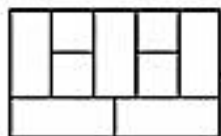
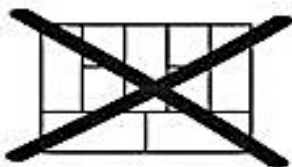
Systematically test your plan

UNDERSTAND
PROBLEM

DEFINE
SOLUTION

VALIDATE
QUALITATIVELY

VERIFY
QUANTITATIVELY



-Brainstorm customers
-Create Lean Canvases

-Prioritize risks
-Business Model Interviews

-Find Prospects
-Problem Interviews

-Build Demo
-Solution Interviews
-Build MVP

-Build Dashboard
-MVP Interviews
-Realize UVP
-Validate full lifecycle

-Constrain features
-Measure progress
-Achieve early traction
-Identify engine of growth
-Scale

Summary

- ▶ Fundamentals of the business model concept
 - Explain how firms create value
 - Bring inputs of the firm to a potentially valuable economic output
- ▶ The business model canvas tool
 - Supports visioning, brainstorming as well as structuring your business idea into a (potentially) working business model
- ▶ Lean approach for business model development
 - Approach the process of business model development iteratively
 - Check for the “9 deadly sins”
 - Get out of the office to assess your risks realistically
 - Focus on a niche at the beginning

„There are no facts
inside the building“

„Develop for the few
and not the many“

Business modeling

Customer development: resources & tools

Traffic:

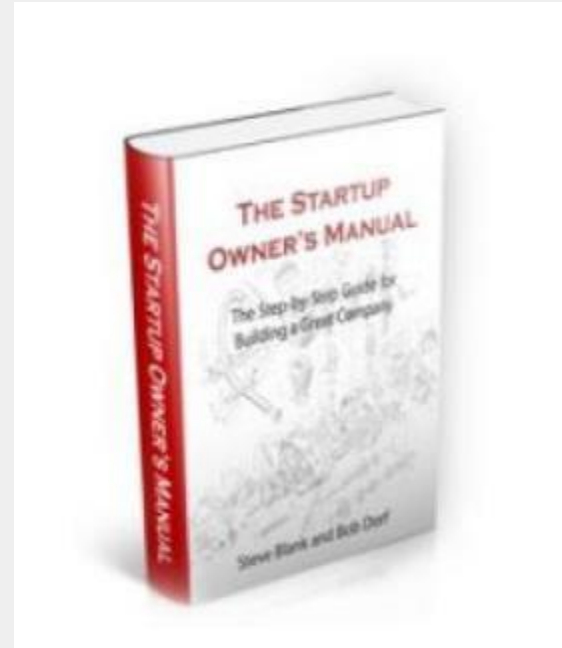
- ▶ Adwords
- ▶ Facebook ads

Test:

- ▶ Landing pages: Unbounce
- ▶ Interviews

Analyze:

- ▶ Heatmaps: Crazy egg
- ▶ Web: Google analytics
- ▶ A/B-Tests: Unbounce



Blog: <http://steveblank.com>

Thank you!



► Primary literature

- Blank, S. & Dorf, B. (2012) The Startup Owner's Manual: The Step-By-Step Guide for Building a Great Company. Pescadero (California), K&S Ranch.
- Maurya, A. 2012. Running Lean: Iterate from Plan A to a Plan That Works, 2. ed., Sebastopol, CA: O'Reilly & Associates.
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- Ries, E. 2014. Lean Startup: Schnell, risikolos und erfolgreich Unternehmen gründen, München, Deutschland: Redline Verlag.