



Disrupt or be Disrupted



Ján KOŠTURIAK

Disrupt or be disrupted

We have to change our business models and knowledge faster than the changes in our environment are happening.

Transformation trends and disruptive technologies that we can use as our competitive advantage or destroy our business will be presented.



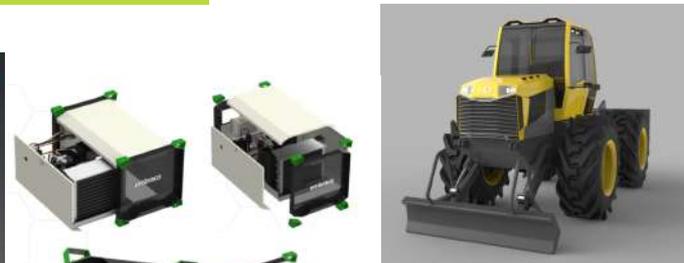
About me

- **Biker**
- **Innovator**
- **Entrepreneur**
- **Mechanical Engineer/Industrial Engineer**
- **Professor**

We are Designing New Business Models



Disrupt or be Disrupted



We are living in the most slowly time we can imagine – in comparison with the coming time



We don't need to minimize risk, but to maximize creativity, speed and entrepreneurship

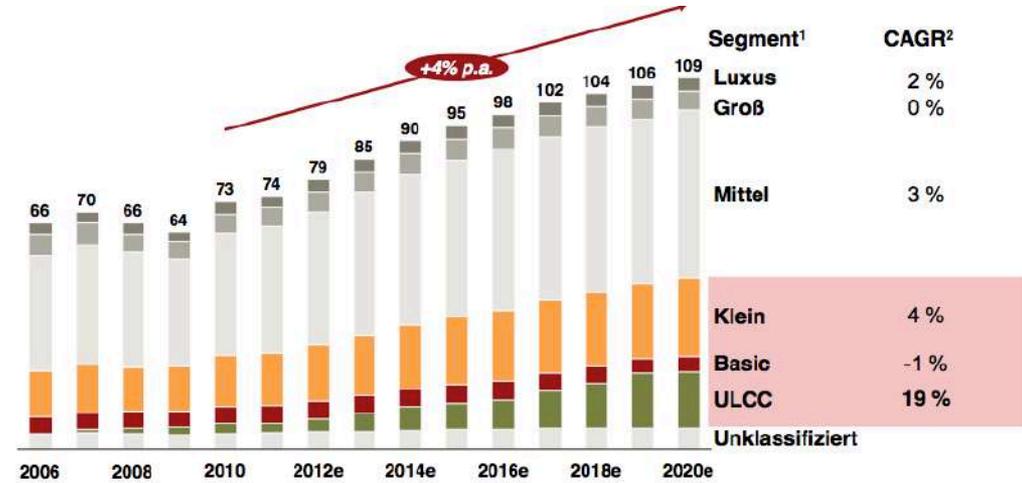
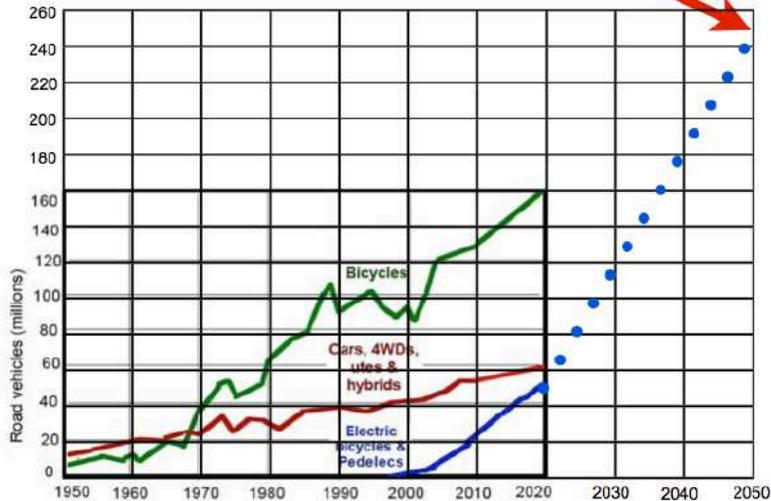
The highest risk is the fear from the risk

Exponential World and Technologies



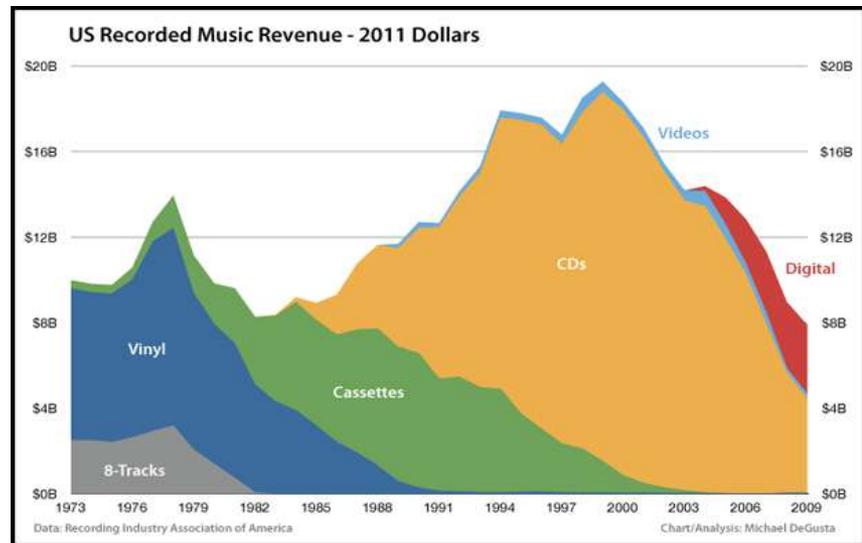
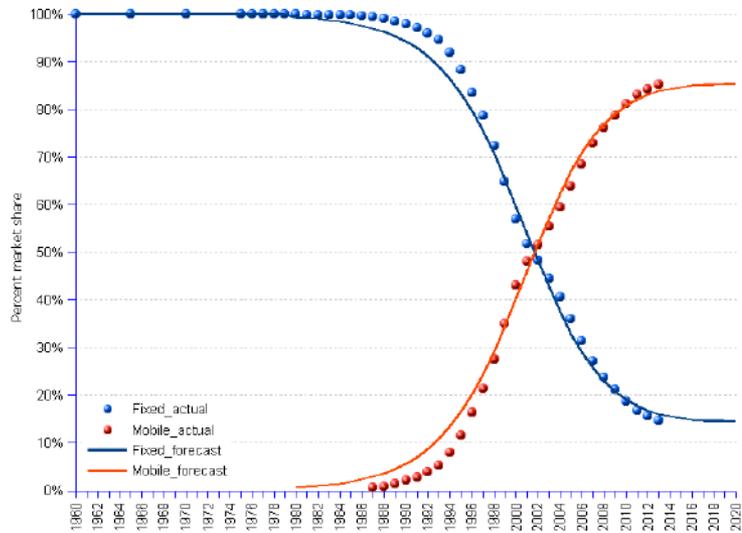
Source: Peter Diamandis, Singularity University

Disruptive technologies

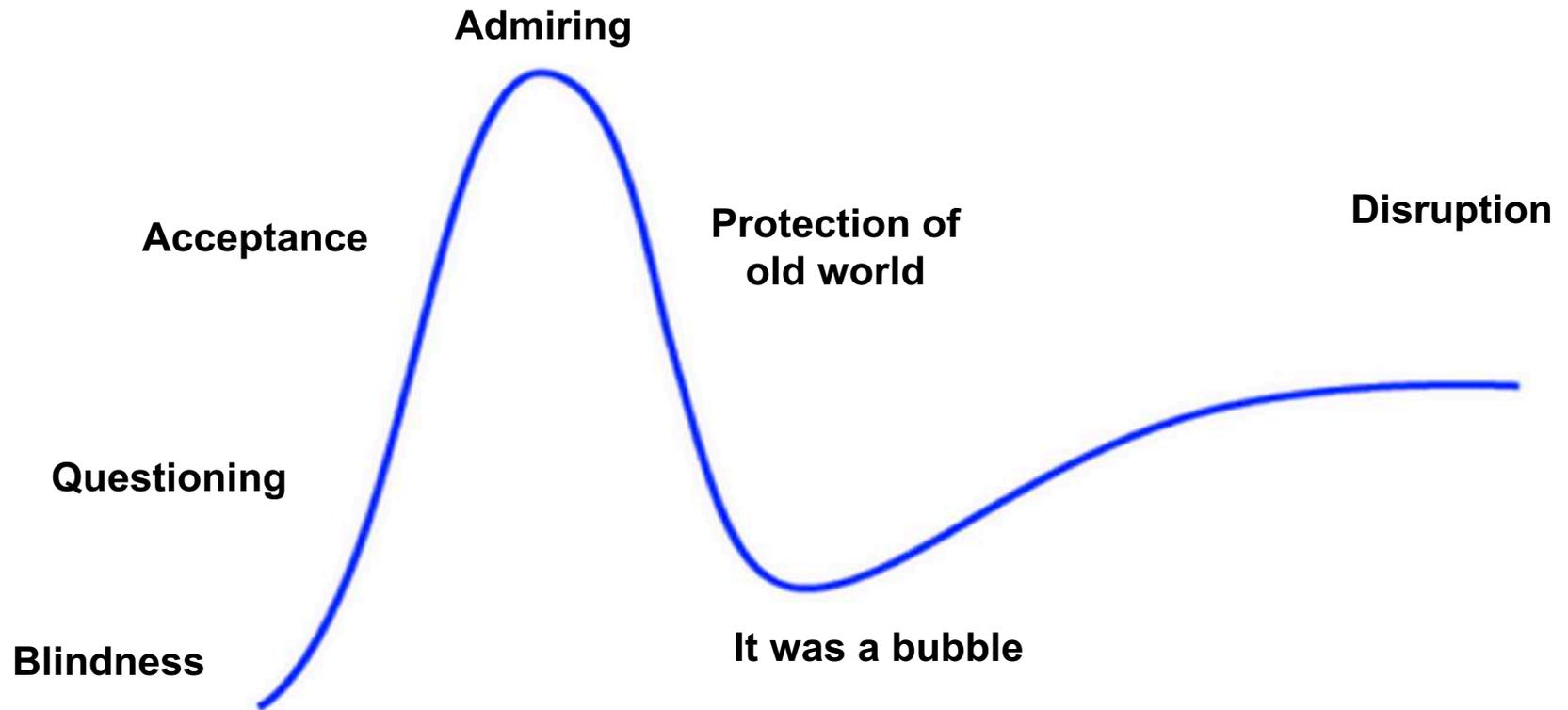
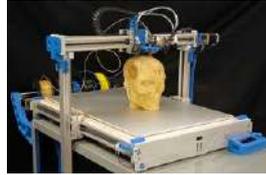


1. Klassifizierung: Luxus = E2F, Groß = D/E1, Mittel = C, Klein = B, Basic = A, ULCC = Sub-A
 2. Compound Annual Growth Rate 2010-2020
 Quelle: A. T. Kearney Prognose

A.T. Kearney 10/01/2012/42610d



Ramp up of disruptive technologies



“Savings at whatever cost”

There are many ways to ruin a company. There is nothing worse than do bad things perfectly and thoroughly with good intentions.



+ 100%

Individual demand,
mass customization

IoT and digital on line
world

Fast penetration of
disruptive technologies

Self service, modular
design, local service

Virtual and augmented
reality

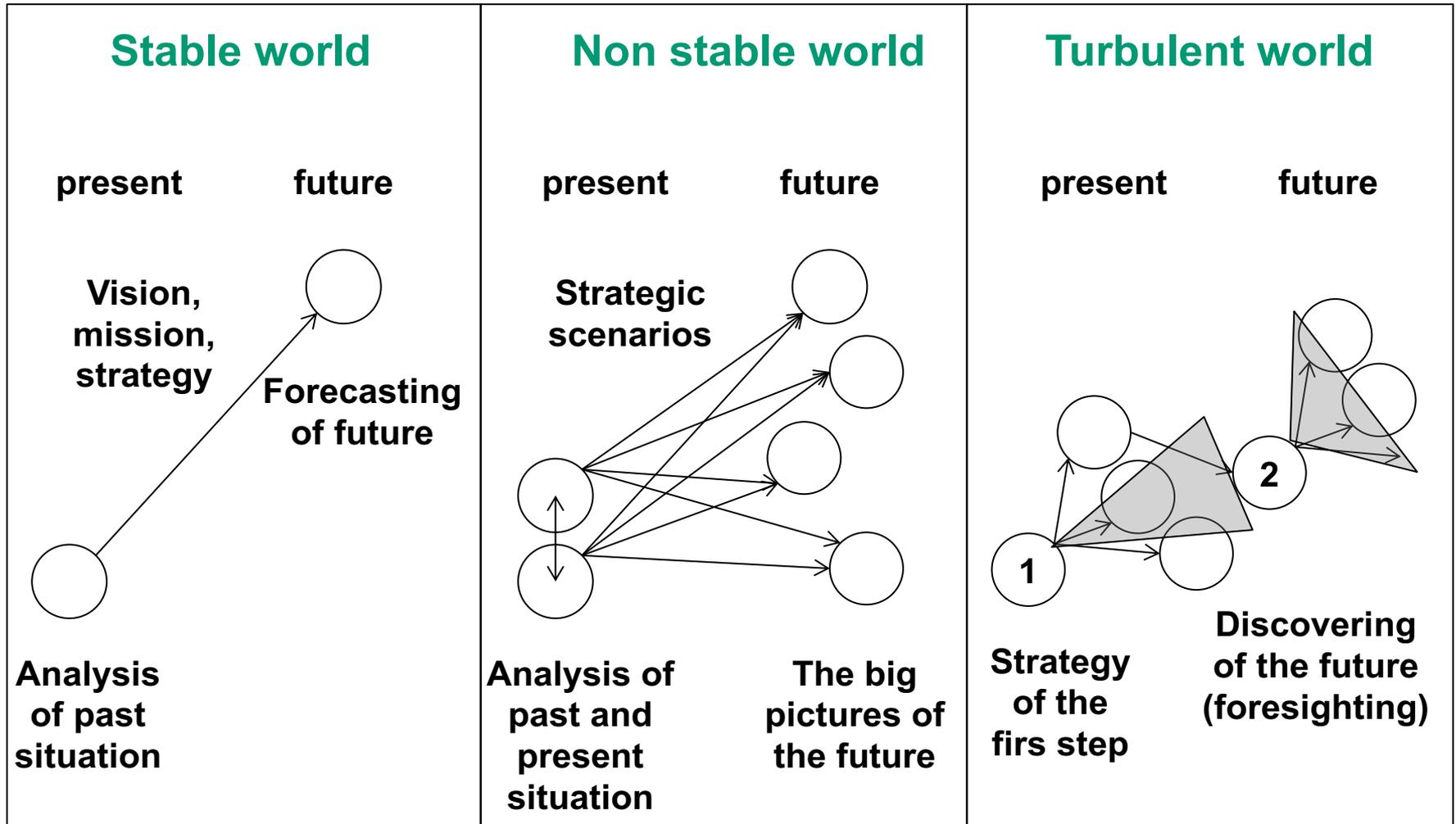
Fast, flexible and direct customer value
delivery, elimination of intermediates in
business models

From push towards pull
marketing and innovations,
from hierarchy toward
network, from cost saving
towards many making, from
robust towards agile design
process, from mass
production towards mass
customization



- 10%

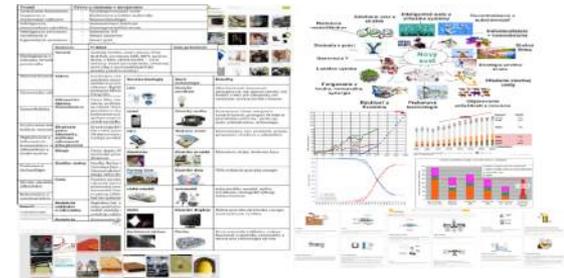
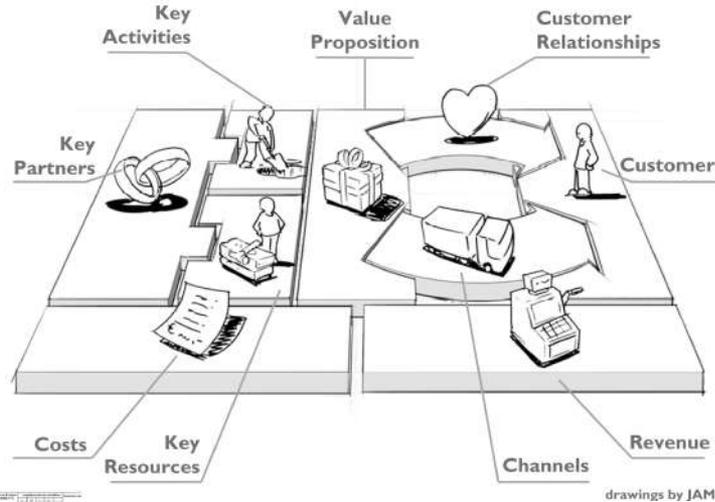
New strategic approach in chaotic world



3A Analyse - Adapt - Act

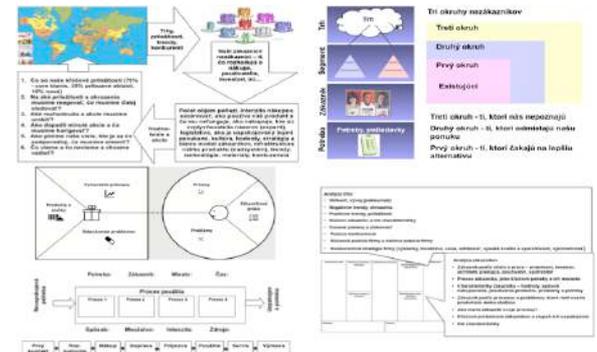
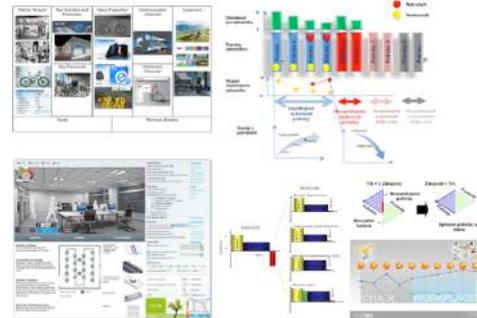
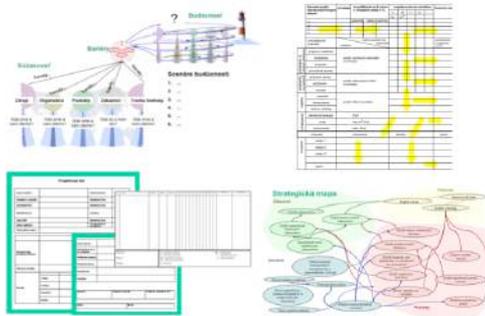
1. Trend analyses and strategic orientation

4. Processes and organization



2. Market and customer analysis

3. Exceptional value proposal

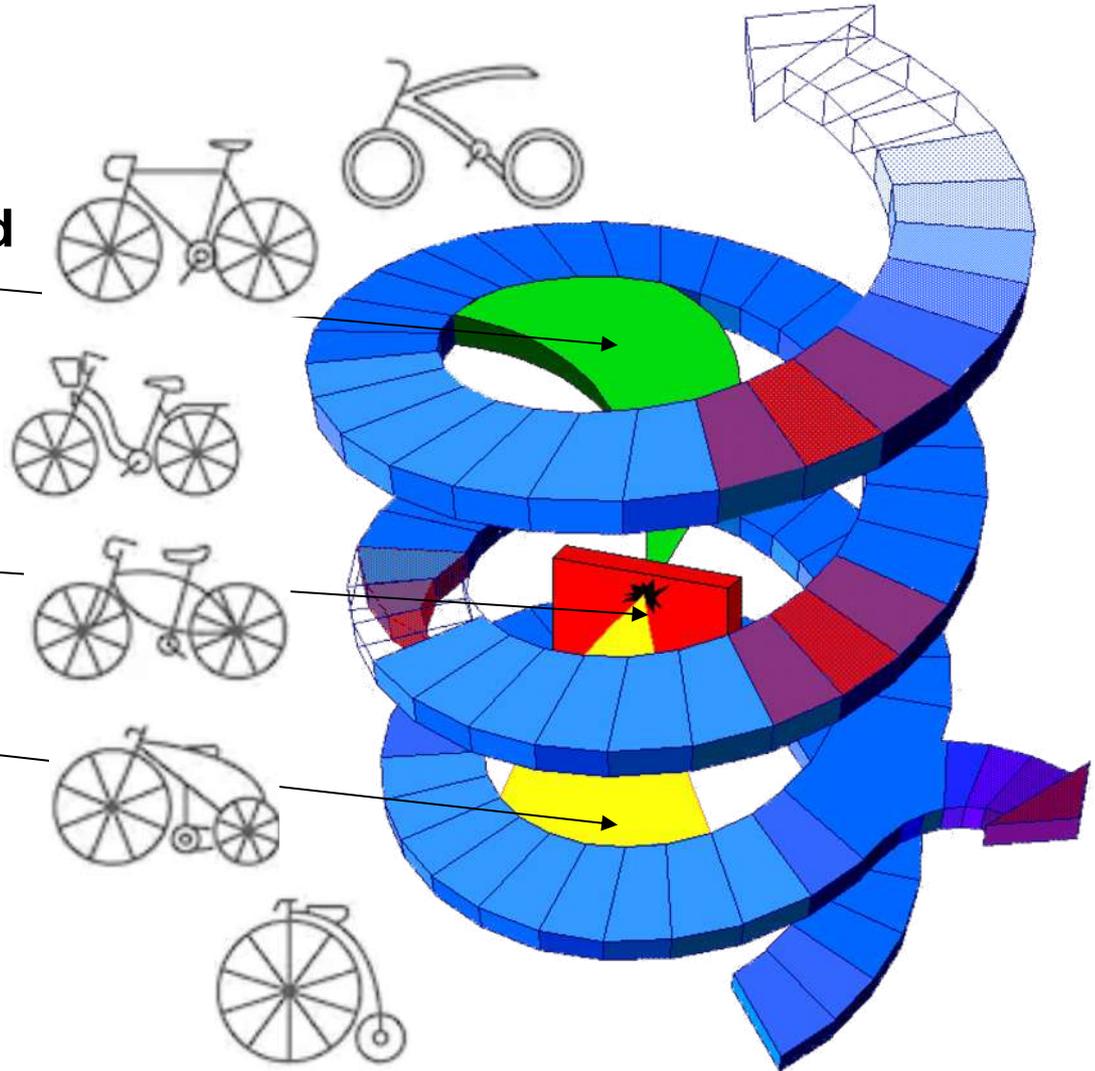


Spiral of Evolution

**New Solutions –
Contradiction Solution
Principles, Variation and
Combination, Final
Solution**

**Contradiction –
Development
Barrier**

**Orientation -
Strategy, Trend
Analysis, Current
State Analysis,
Evolution Trends,
Ideal Solution**

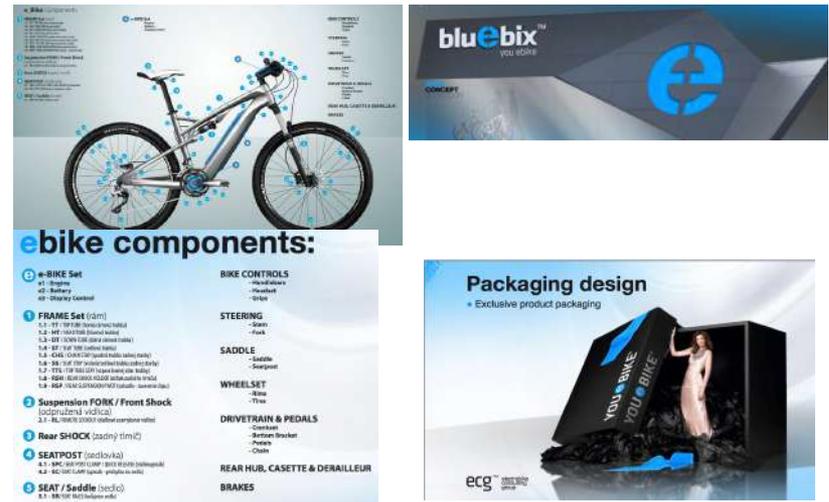


Disrupt or be Disrupted

Customer's Jobs and Problems



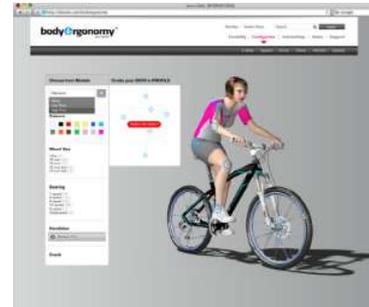
Value Proposition



Processes, Organisation, Key Resources, Partners



Communication and Distribution



eBike Innovation – Patrik Paul, Kinazo Design

1. Idea

Scanning of customer body and customized e Bike geometry



New selling and distribution concept



New eBike concept



2. Prototyping

Business model



Individual product



Delivery and service



3. Realisation

Body scanning and fitting



Modelling and customization



3D printing, production, assembly



From Idea to Result – Patrik Paul, Kinazo Design



aplikovanie dizajnu na pláňu / Znojmo



prezentácia na Události v prahe / Petrův



nový dizajn prezentatívneho panelu kinazo r164



výtvor matematickej R&A detail uchytia kolieska



praca vytvárajú prezentatívneho panelu tvorbu stĺh videa / Slava, Adam a Jano Buttlar 25 April 2017



realizácia stavby panelu / Zilina 26 Apr 2017 čas realizácie 1h / 17 min



Jano Komariak prezentuje Dielo so zameraním kondície Zilina 26 Apr 2017 / 8:01



podrobné detaily uchytienia kolieska

finálny panel Zilina 26 Apr 2017 čas realizácie 1h / 17 min

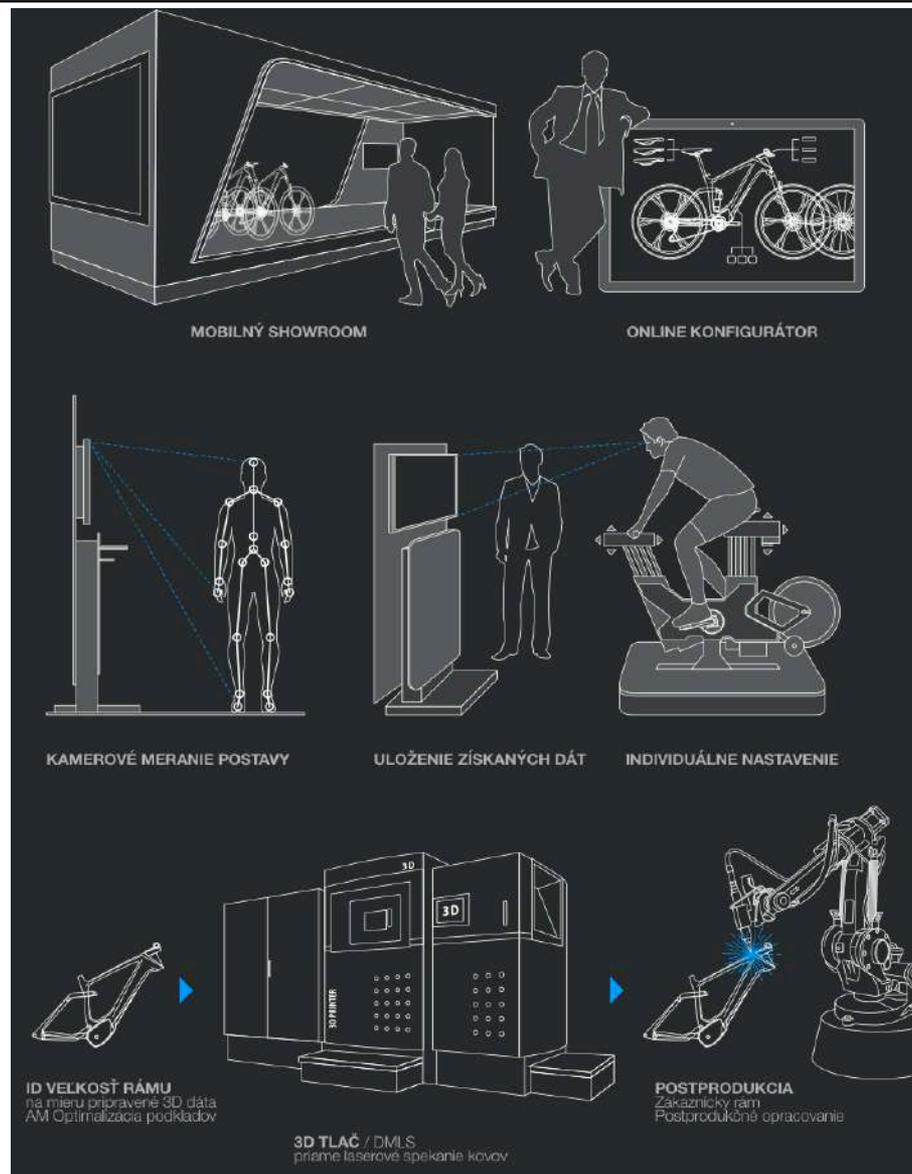


Urobte príkladu rubu k Dielu a havi ju tu !

Finalizácia panelu v predajni RIDE Benka Bystrica / 27 Apr 2017 / 18:50



3D printed customised eBike



Weight reduction by AM computing, new generation of powerful battery, optimized geometry

Design without compromises

Individual fitting

Body, geometry, components, individual design, special application and use

Technology edge



Exceptionality

Co-creation platform

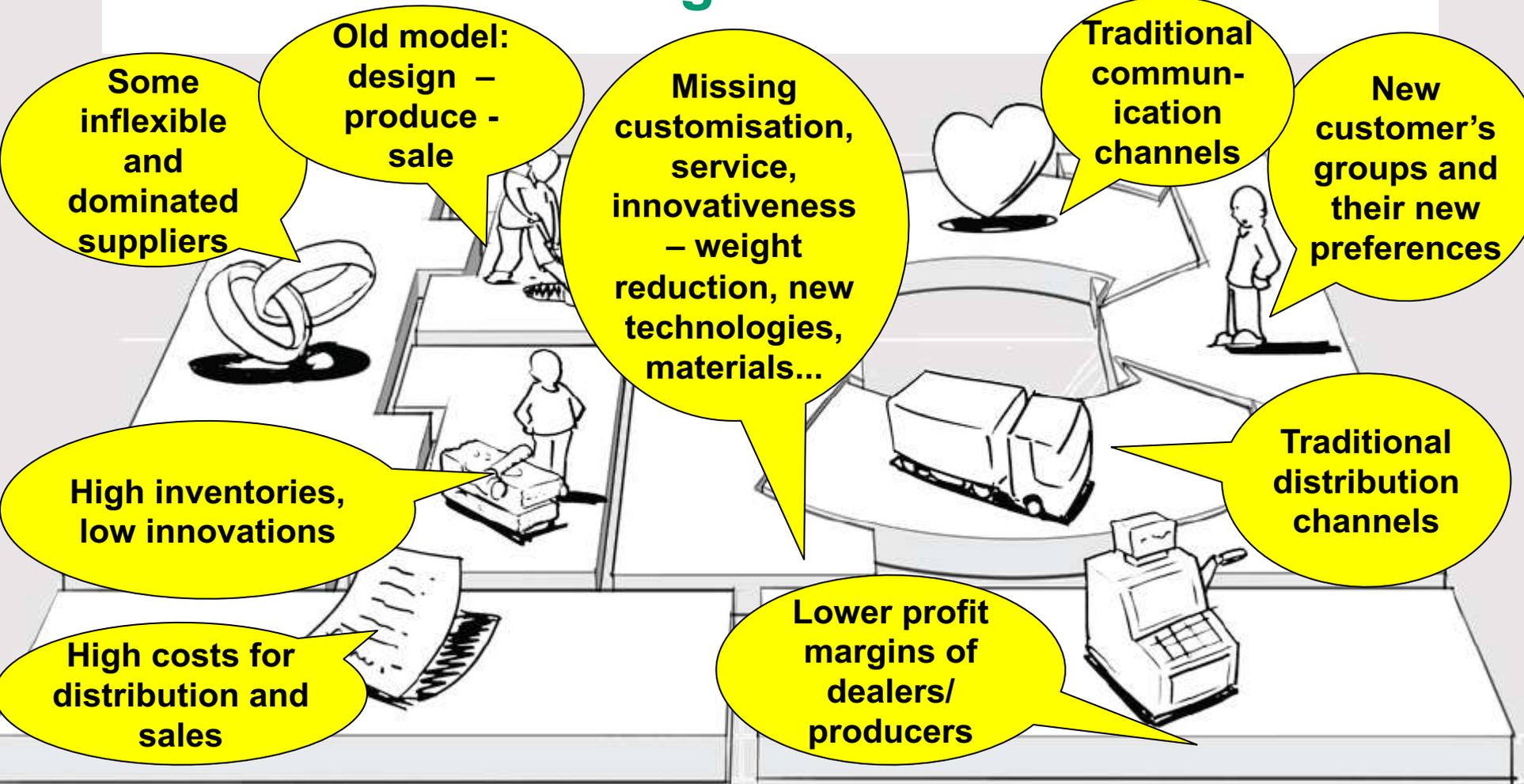
You can develop innovative projects

Individual on line care and service

First 3D printed

Direct sales without intermediates, eBike + assessories fitting, on line shopping, digital service book, customer support in cloud

What is wrong in bike business?



CANVAS Problems in Biking

1. Individualisation



2. Selfservice



3. Elimination of Intermediaries



10. Decent and Fair Company



9. Circular Economy



8. New People's Values and Habits



7. Sharing Economy and Networks



Transformation Trends in Business

4. Re-localisation and Decentralisation



4. Disruptive Technologies



6. Digitalisation and Automation



1. Individualisation



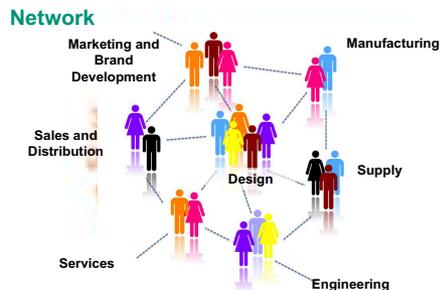
2. Selfservice



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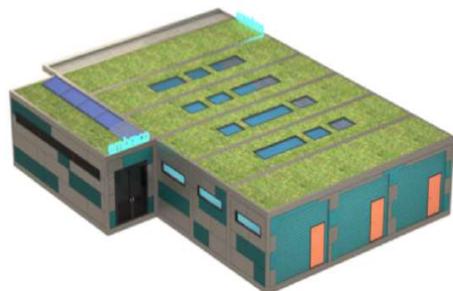


7. Sharing Economy and Networks



Transformation Trends in Business

4. Re-localisation and Decentralisation



4. Disruptive Technologies



6. Digitalisation and Automation



Trends – our research

| Business Model Element | Past | Future |
|---|---|---|
| Customers | Customer segments with common needs and predictable behaviour | Individual customers who are changing needs and have not predictable behaviour |
| Communication and Relationships with Customers | Arvertisement, trade fairs, catalouges, demands/offers, agreements and contracts, technical information and product description | Personal communication, internet, virtual and augmented reality, customer involvement into innovation (open innovation), professional services and trust, customer language and knowledge |
| Distribution Channels | Dealers, distribution networks, many interfaces and intermediaries | Direct connection between value creation and customer, elimination of middle man and intermediaries |
| Value Proposition | Product/Service innovation, facelifting, modernisation, improvement, cost reduction and delivery improvement | Business model innovation, exceptionality, disruptive innovations, speed, excellence, extreme flexibility a customisation |

Trends – our research

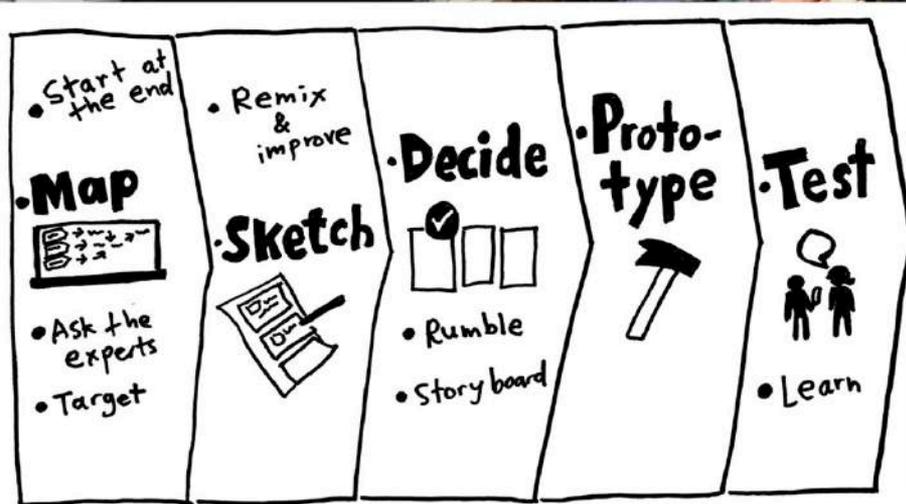
| Business Model Element | Past | Future |
|--|---|---|
| Activities, Processes, Organisation | Continuous value flow to customer demand in production and logistics – customer is a part of production and delivery | Continuous value flow to individual customer in innovation, product design and other processes – customer is a part of innovation |
| Resources | <p>Employees are disciplined executors of jobs and tasks and their involvement in continuous improvement process.</p> <p>Managers focused on defining targets, fulfilling goals and elimination risk</p> <p>Flexible equipment with short setup times</p> | <p>Employees as well as managers are entrepreneurs, „smart creatives“ who are able to solve problems, develop new solutions and take risks and responsibility.</p> <p>People focused on external opportunities, innovations, spin offs and start-ups. Shared Equipment in flexible and fast responsive networks</p> |
| Partner Network | Flexible and productive supply and distribution networks sharing resources and delivering products and services | Innovation networks sharing knowledge, discovering market opportunities and delivering customer value without intermediaries |

Trends and their Consequences on eBike Business

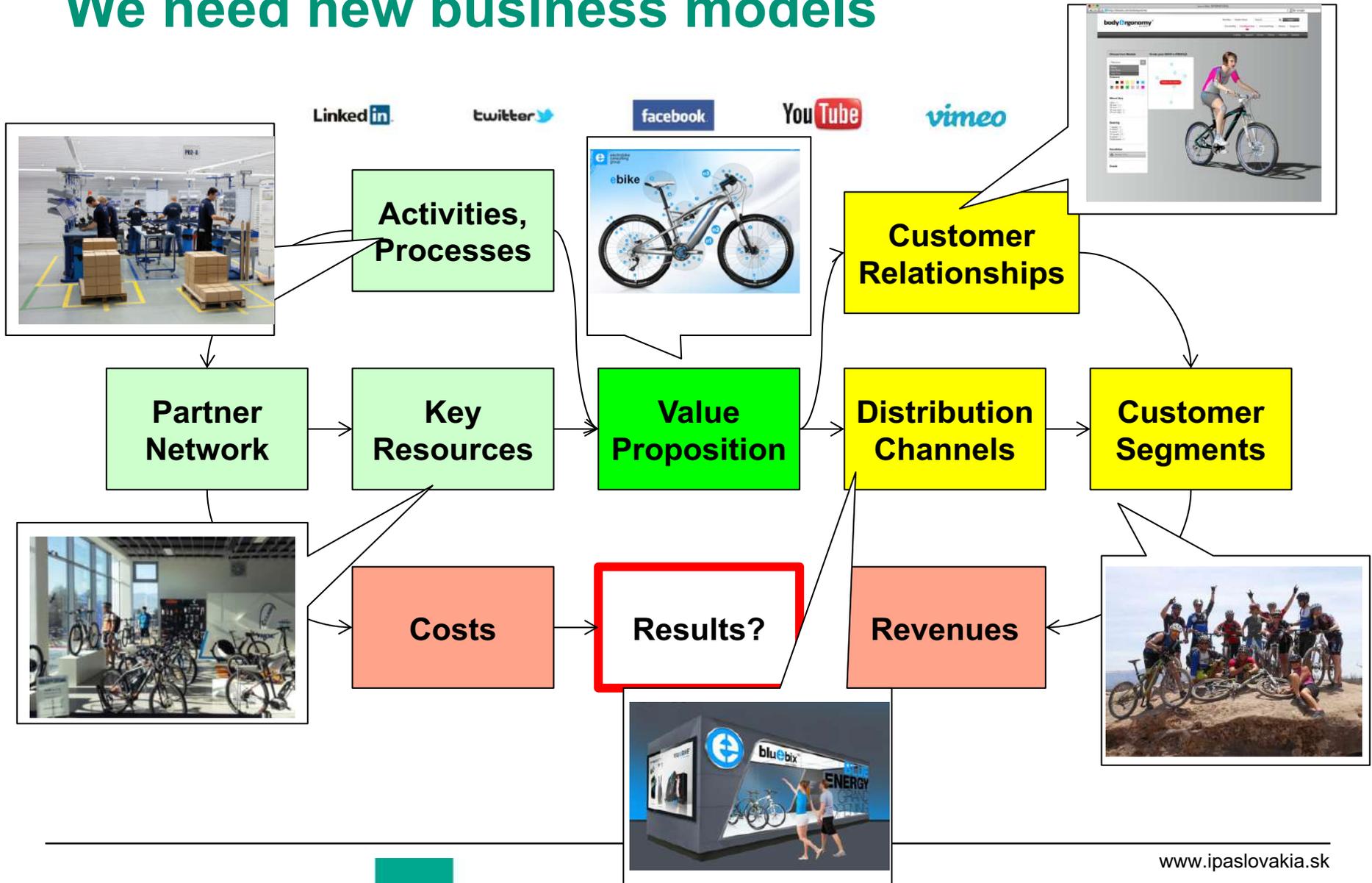
1. Elimination of Intermediates
2. High Speed
3. Flexibility
4. Decentralisation
5. Disruptive Innovations
6. Sharing Economy
7. Selfservice
8. Automation
9. Smart networks, IoT
10. Local production
11. Individualisation
12. Generations Y and Z
13. Circular Organisation
14. Additive Technologies
15. New Materials
16. Virtual Systems

- Direct communication, responsibility
- Empathy and Agility
- Antifragility
- Entrepreneurship, Proactivity
- Flexibility, Adaptability, Learning
- Trust and Open Networks
- Self-development
- Self Configured Manufacturing
- Micro Factories
- Local and Mobile Factories
- Digital Configurators
- Holacracy, Freedom in work
- Recycling of Waste and Printing
- 3D eBike printing
- Weight Reduction of eBike
- Teleworking, Teleservice

From Design – Produce – Sale in years and months towards Sale – Design – Produce in weeks and days



We need new business models



Partner Network



eBike components:

- 1. BIKE SET
 - 1.1. - Battery
 - 1.2. - Display control
- 2. FRAME SET (dóm)
 - 2.1. - 26" (500mm) chromed steel
 - 2.2. - 26" (500mm) chromed steel
 - 2.3. - 26" (500mm) chromed steel
 - 2.4. - 26" (500mm) chromed steel
 - 2.5. - 26" (500mm) chromed steel
 - 2.6. - 26" (500mm) chromed steel
 - 2.7. - 26" (500mm) chromed steel
 - 2.8. - 26" (500mm) chromed steel
 - 2.9. - 26" (500mm) chromed steel
 - 2.10. - 26" (500mm) chromed steel
- 3. Suspension FORK / Front Shock
 - 3.1. - 26" (500mm) chromed steel
- 4. Rear SHOCK (pazdy štítu)
 - 4.1. - 26" (500mm) chromed steel
- 5. SEATPOST (sedlova ká)
 - 5.1. - 26" (500mm) chromed steel
 - 5.2. - 26" (500mm) chromed steel
- 6. SEAT / Saddle (sedlo)
 - 6.1. - 26" (500mm) chromed steel
- BIKE CONTROLS
 - 1. - Display
 - 2. - Battery
- STEERING
 - 1. - Handle
- SADDLE
 - 1. - Saddle
 - 2. - Saddle
- WHEELSET
 - 1. - Wheel
 - 2. - Tire
- DRIVETRAIN & PEDALS
 - 1. - Pedal
 - 2. - Pedal
 - 3. - Pedal
- REAR HUB, CASSETTE & DERAILLEUR
 - 1. - Cassette
 - 2. - Derailleur
- BRAKES
 - 1. - Brake

Key Activities and Processes



Key Resources



Value Proposition



Communication Channels



Distribution Channels



Customers



Costs

Revenue Streams

On line customer monitoring what and how they are using from our products/services – information for marketing, sales, distribution, R+D, innovations



Configuration/selection software

3D digital model, virtual and augmented reality

e-bike components:

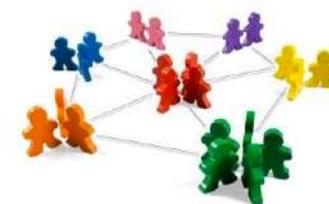
| | |
|---|--|
| <p>01 e-BIKE Set 01 - Engine 02 - Battery 03 - Display Control</p> <p>02 FRAME Set (černý) 1.1 - 17" / 17.5" (standard) (black) 1.2 - 18" / 18.5" (black) (slender) (black) 1.3 - 20" / 20.5" (black) (slender) (black) 1.4 - 21" / 21.5" (black) (slender) (black) 1.5 - 23" / 23.5" (black) (slender) (black) (standard) 1.6 - 25" / 25.5" (black) (slender) (black) (standard) 1.7 - 27" / 27.5" (black) (slender) (black) (standard) 1.8 - 28" / 28.5" (black) (slender) (black) (standard) 1.9 - 29" / 29.5" (black) (slender) (black) (standard)</p> <p>03 Suspension FORK / Front Shock (odkaz na stránku výrobku) 3.1 - 363 (black) (standard)</p> <p>04 Rear SHOCK (odkaz na stránku výrobku) 4.1 - 363 (black) (standard)</p> <p>05 SEATPOST (odkaz na stránku výrobku) 5.1 - 363 (black) (standard)</p> | <p>BIKE CONTROLS Handlebars Grips</p> <p>STEERING Stem Fork</p> <p>SADDLE Saddle Seatpost</p> <p>WHEELSET Rims Tyres</p> <p>DRIVETRAIN & PEDALS Crankset Bottom Bracket Pedals Chain</p> <p>REAR HUB, CASSETTE & DERAILLEUR</p> <p>BRAKES</p> |
|---|--|

Modular designed, customizable, scalable product – Lego principle

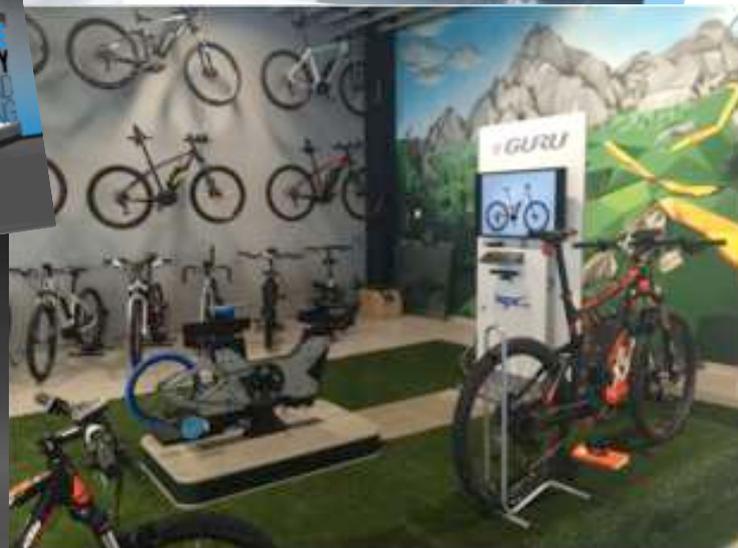
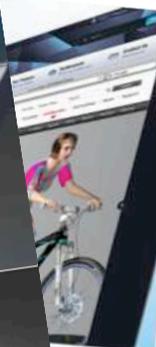
Individual, customized solutions and applications, interface for different customer groups and “playground for game players who are paying for the games”



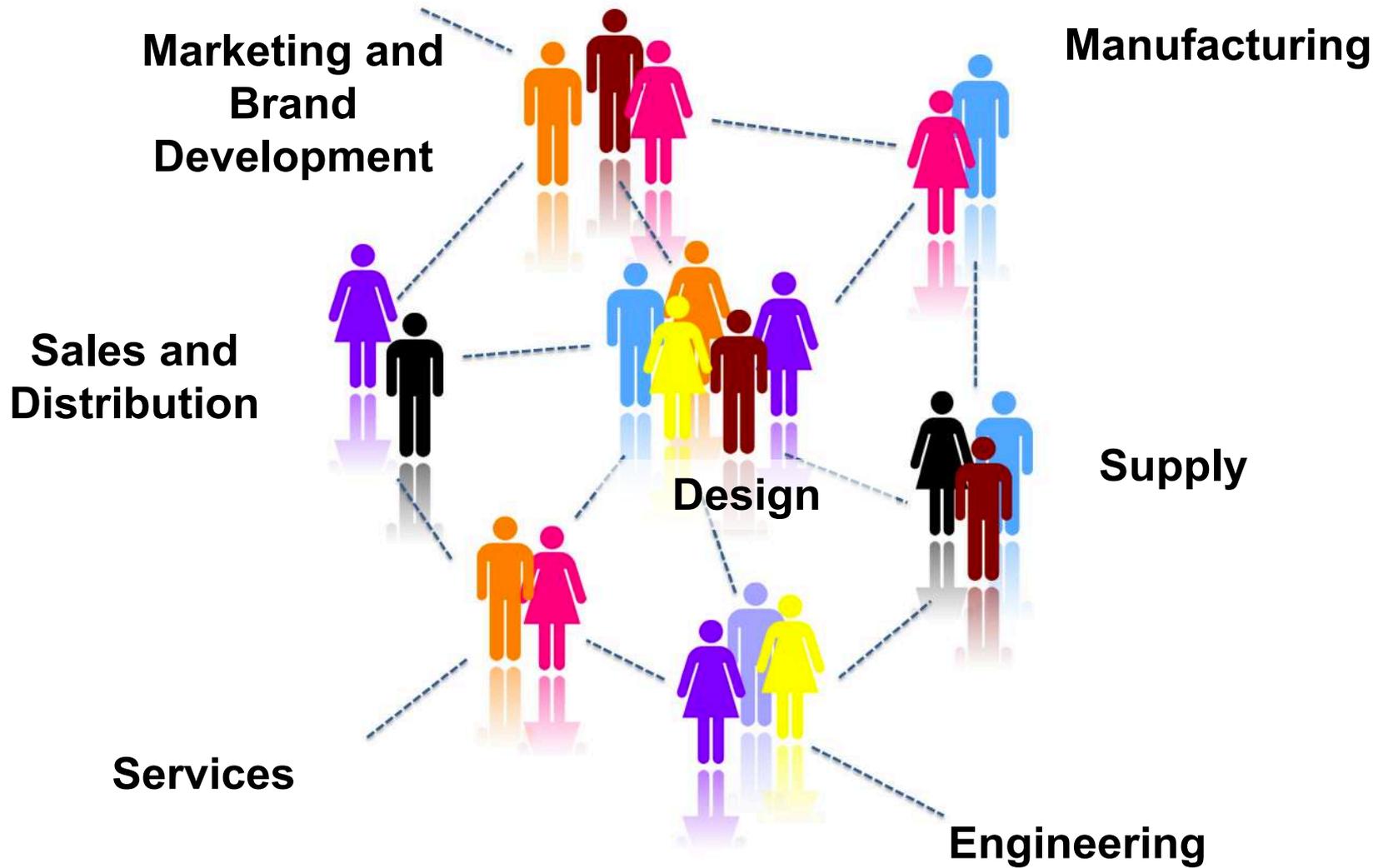
Individual customers – individual bikers, biking groups, dealers, OEM, startups and new solutions



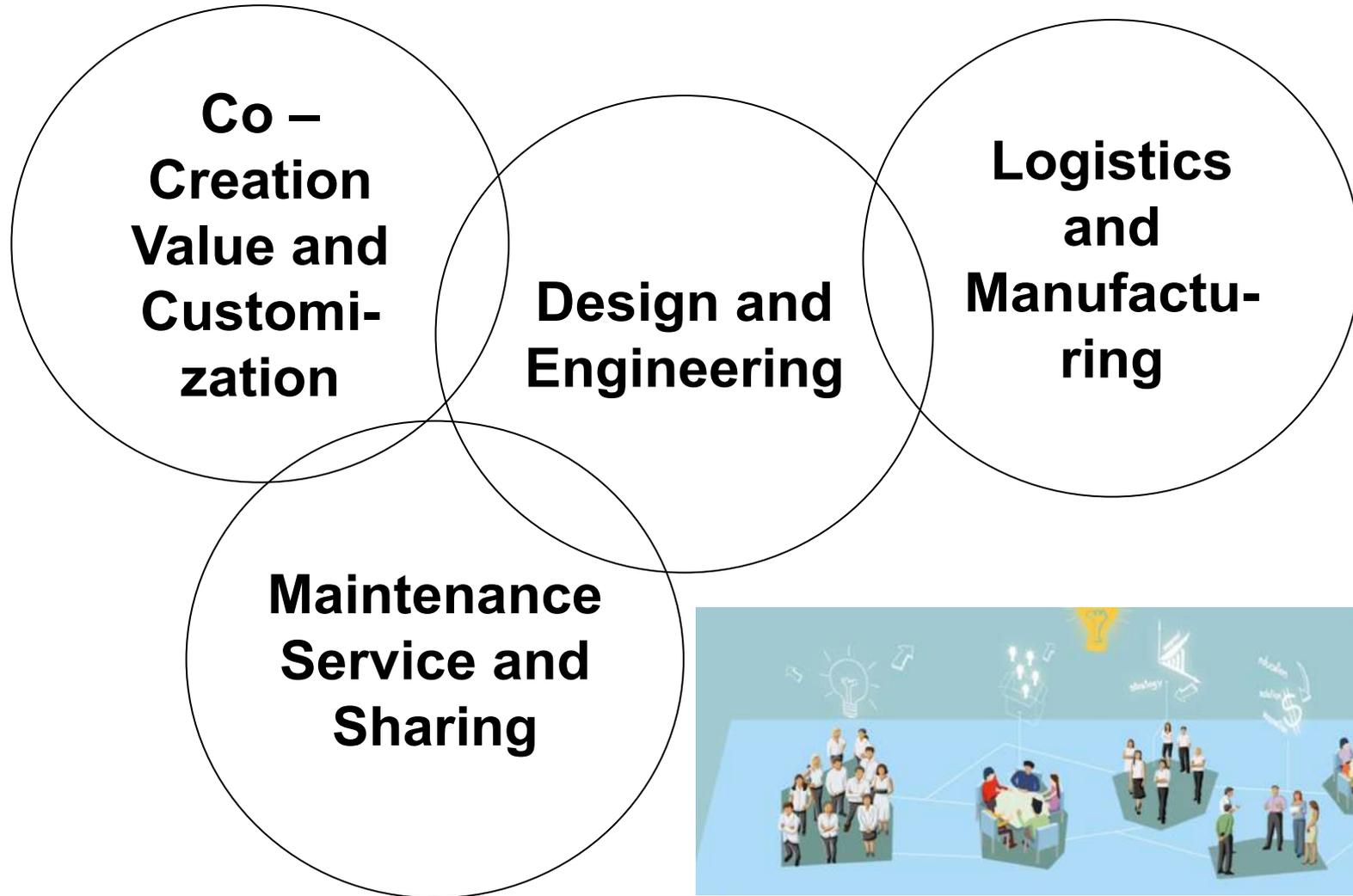
3S – Sales – Service - Sharing



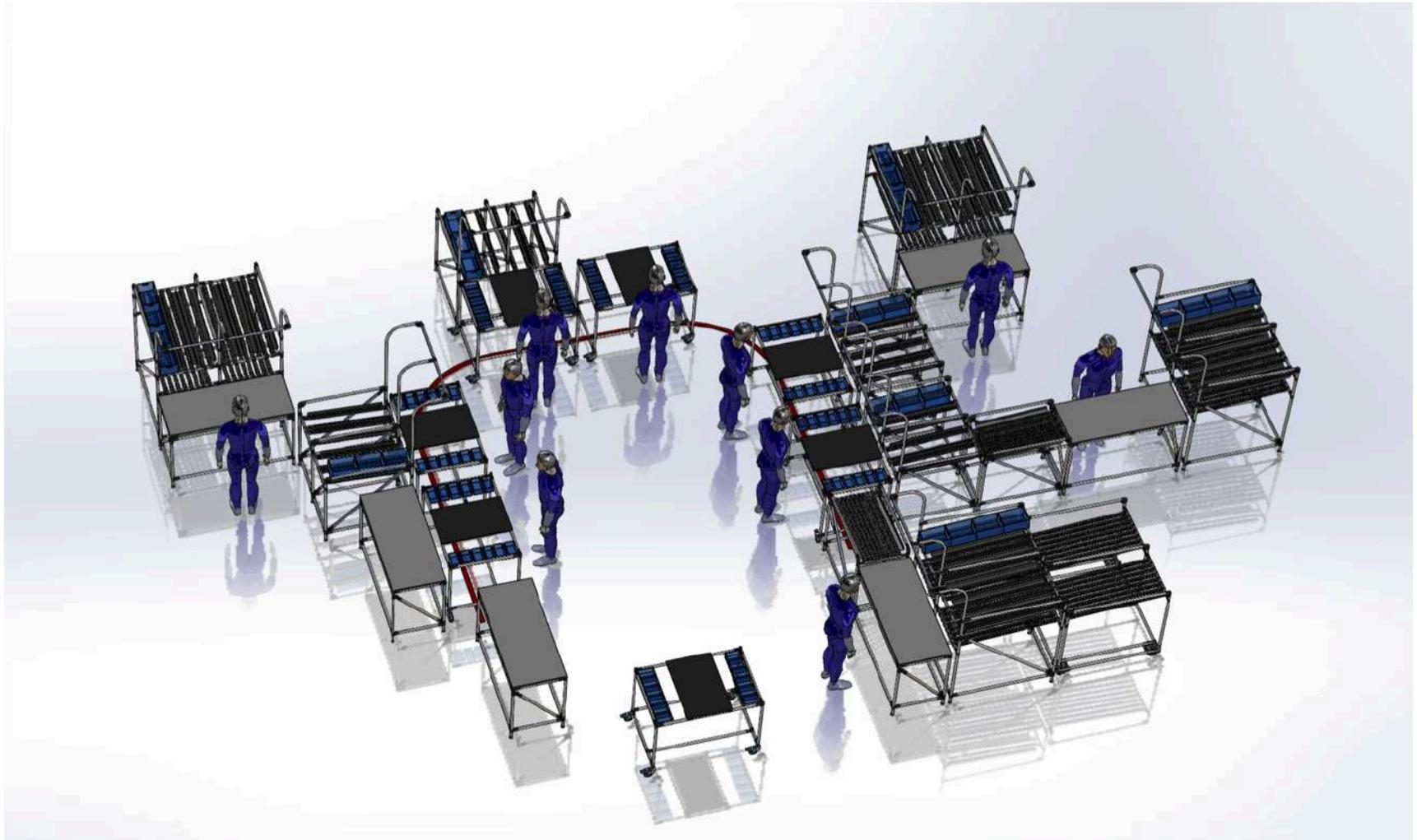
Networks



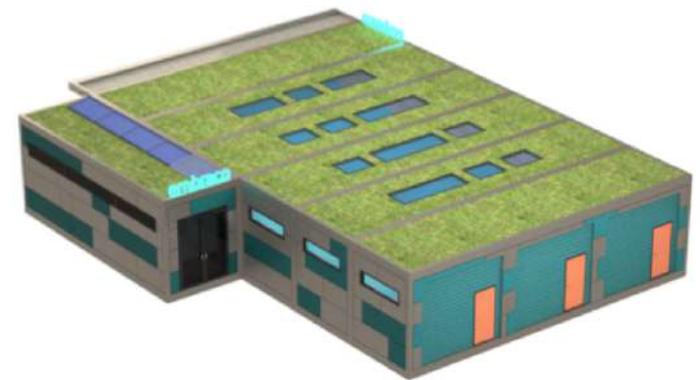
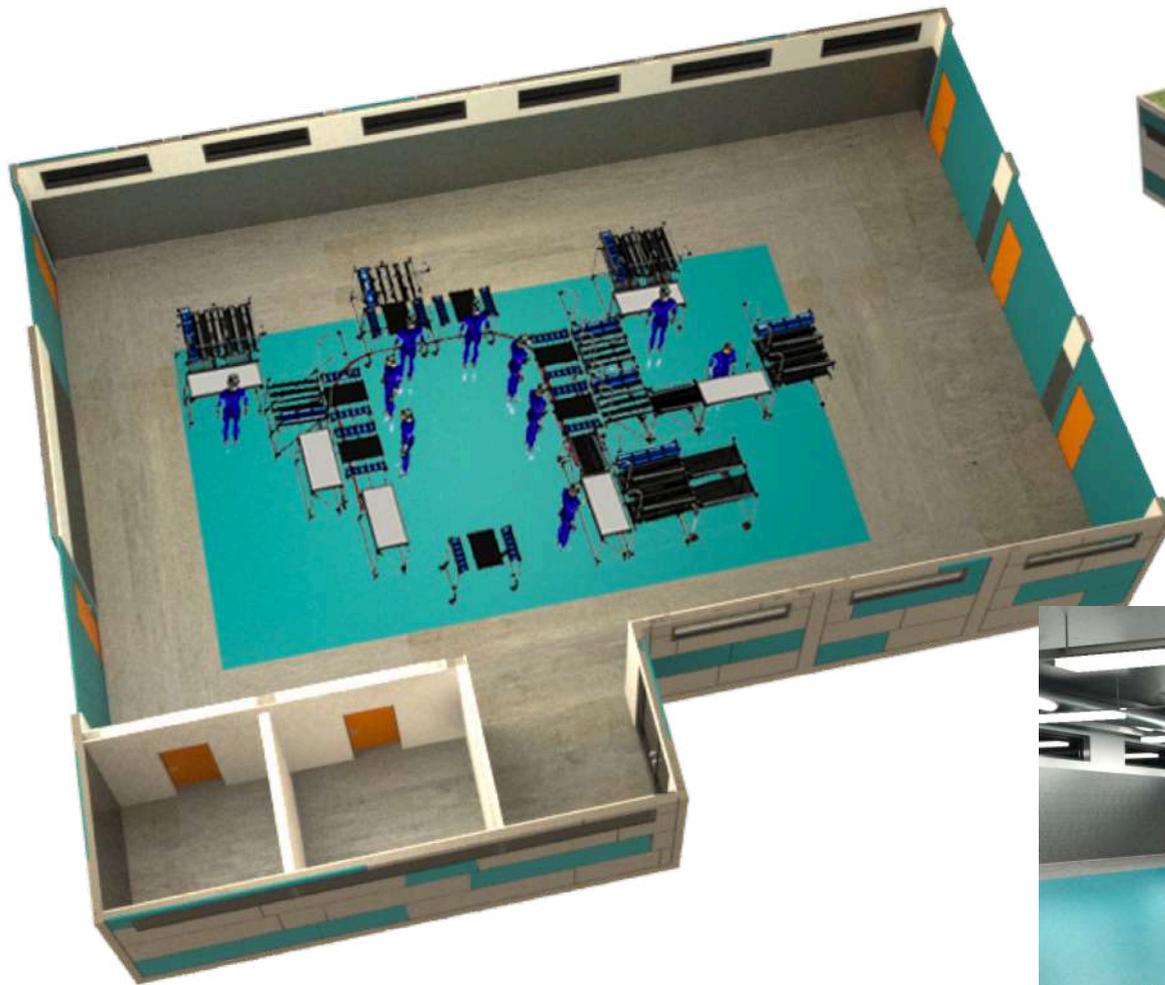
New Manufacturing Concepts - Microfactories



Modular and Mobile Manufacturing



Mobile Factory





**If everything is under
control you are just
not driving
fast enough**

**Thank you for your
attention**

Jan Kosturiak

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