



## KUINKA KÄÄNNÄT ORGANISAATIOSI YMPÄRI?

### **EKOSYSTEEMIT KORVAAVAT SIILOAJATTELUN**

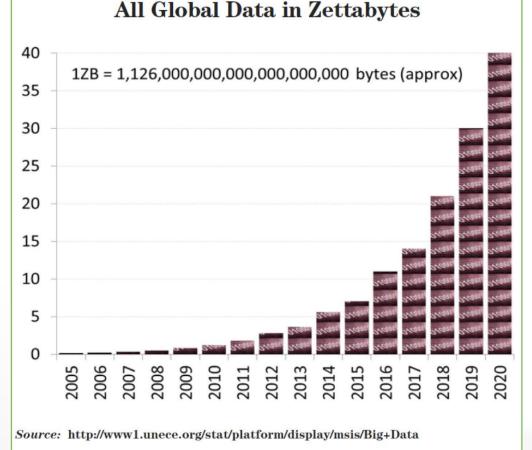
### Paavo Ritala

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### **DATAA. LIIKAA DATAA!**

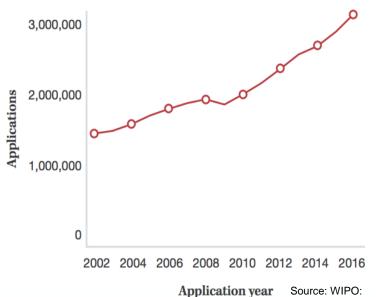




World Intellectual Property

Indicators 2017

### Patent applications worldwide



# Faster pace of information exchange and consumption



- 2013 a Twitter hashtag stayed within the top 50 for 17.5 hours on average, a number which gradually decreases to 11.9 hours in 2016\*
- Length of TV commercials: 60 seconds (1950s) to 30 seconds (1970s) to 15 or even 6 seconds (now)\*\*

<sup>\*</sup>Source: Lorenz-Spreen, P., Mønsted, B. M., Hövel, P., & Lehmann, S. (2019). Accelerating dynamics of collective attention. *Nature communications*, *10*(1), 1759.

<sup>\*\*</sup>https://www.voices.com/blog/effective\_length\_for\_tv\_commercials/



## Deterioration of existing knowledge

- 65 % of primary school kids will have jobs that do not exist now\*
- > 50% of professional skills become obsolete in 5 years\*\*
- Professionals stay 4,5 years in the same job\*\*

<sup>\*</sup>The Future of Jobs and Skills, World Economic Forum 2016

<sup>\*\*</sup> Rewriting the rules for the digital age 2017, Deloitte Human Capital Trends



# MIKÄ MUUTTUU?

MITÄ SILLÄ ON VÄLIÄ?

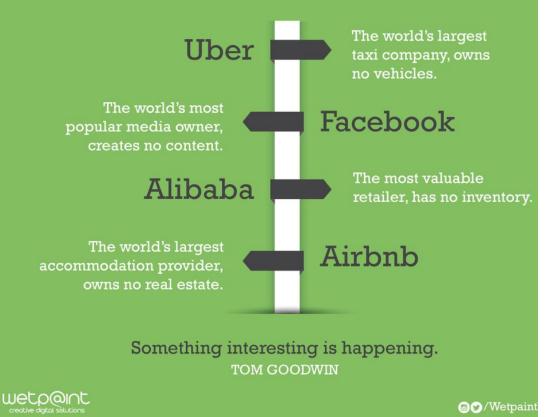
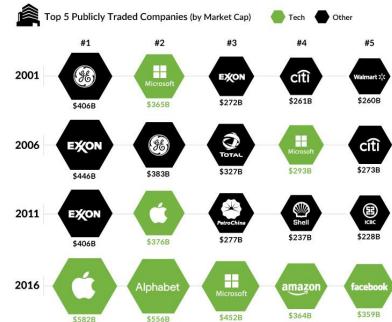


Chart of the Week

### THE LARGEST COMPANIES BY MARKET CAP

The oil barons have been replaced by the whiz kids of Silicon Valley



visualcapitalist.com



Economic era	Standardization	Customization	Connectivity
Dominant business model	Market penetration	Market segmentation	Market creation
Growth drivers	Achieving scale economies	Expanding into new market segments	Creating and connecting new market structures
Ideal form of organizing	U-Form  (Centralized, vertically integrated functional structures)	M-Form and P-Form  (Multi-divisional and matrix structures; project-based organizations)	S-Form  (Platform-based markets; business and innovation ecosystems)
Key assets	Tangible assets; mostly internal	Information and knowledge; internal and external	Relationships and connections; mostly external
Core organizational capabilities	Planning and controlling	Delegation and collaboration	Co-evolution and orchestration

Adapted and modified from Miles, R. E., Miles, G., Snow, C. C., Blomqvist, K., & Rocha, H. (2009). The I-form organization. California Management Review, 51(4), 59-74.

## **Disruption #1: Organizing form**



Selforganization De-centralized coordination

Centralized coordination

## Disruption #2: Networks & connectivity



Alliances & networks

Multi-sided platforms & ecosystems

Vertical integration & outsourcing

# Disruption #3: Sources of competitive advantage



Combinative capabilities

Ecosystem generativity

Organizational efficiency & differentiation



### **EKOSYSTEEMI – UUSI TAPA ORGANISOITUA?**





# Ecosystem– analogy from the nature

- Ecosystem = A biological environment consisting of all the organisms living in a particular area, as well as all the nonliving (abiotic), physical components of the environment with which the organisms interact, such as air, soil, water and sunlight
- Eco = A prefix mostly relating to ecological or environmental terms
- System = Set of interacting or interdependent components forming an integrated whole



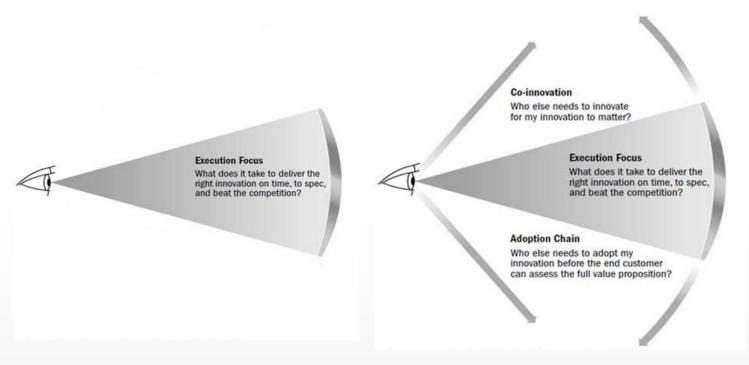


# Ecosystem– analogy from the nature

- Processes of natural evolution: Variation, selection, retention
- Self-organization (vs. deliberate design)
- Co-evolution of actors
- Emergence of macro-level phenomena from microlevel interaction
- Simultaneous collaboration and competition among "species" of the ecosystem and among ecosystems







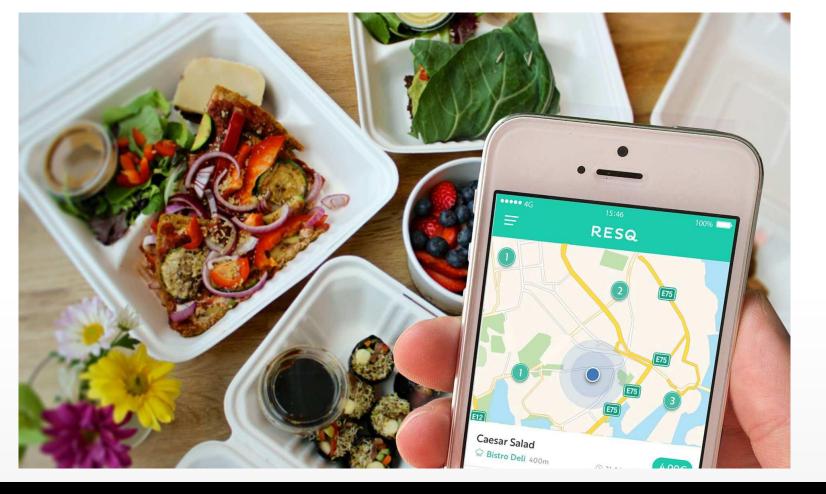
Ron Adner (2013) The Wide Lens: What successful innovators see that others miss. Penguin Books.





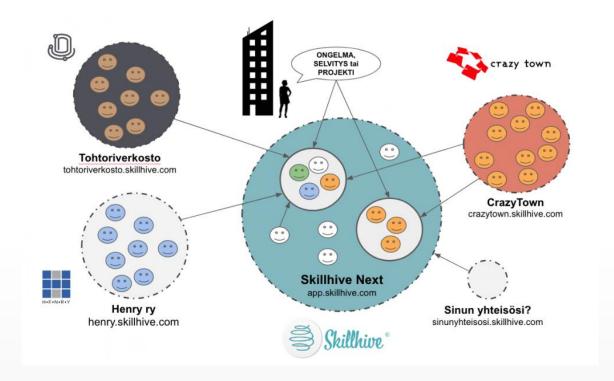


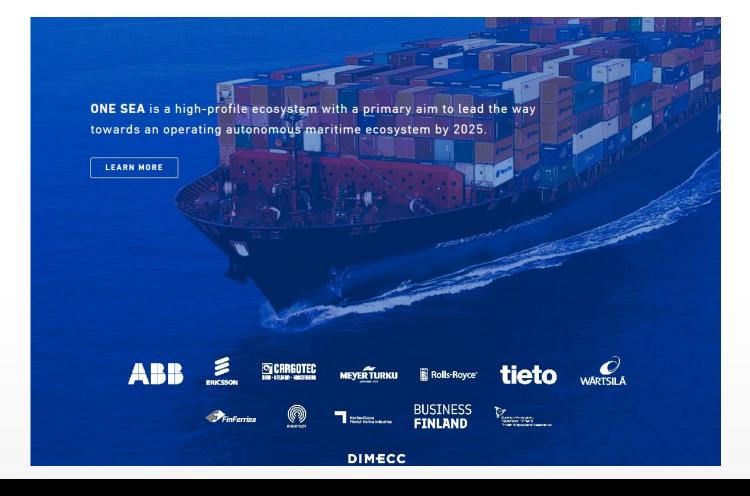




















#### Picture sources:

Department of Jobs, Enterprise, and Innovation, 2014. *National Policy Statement on Entrepreneurship in Ireland 2014.*; http://www.thenextsiliconvalley.com/2017/09/11/6616-pay-it-forward-culture-is-key-to-success-of-silicon-valley-innovation-ecosystem/

### INNOVATION PLATFORM AND STARTUP ECOSYSTEM OF TAMPERE





DIMECC













UKK-instituutti











### Main ecosystem concepts\*

Ecosystem construct	Main characteristics	Closely related constructs / overlapping discussions
Business ecosystem	<ul><li>a) Business ecosystems emphasizing collaboration and supply chain/network aspects</li><li>b) Business ecosystems emphasizing the co-evolution of competition and collaboration in organizational fields</li></ul>	Business networks, strategic networks, value networks/chains, value nets
Innovation ecosystem	<ul><li>a) Firm-centric innovation ecosystems related to the focal actor and its technology, platform, brand, etc.</li><li>b) National, regional or technological innovation ecosystems</li></ul>	Innovation networks (micro), National and regional innovation systems (macro)
Entrepreneurial ecosystem	Start-up and entrepreneurial ecosystems that are often located in particular geographical areas or around a certain industry	(Entrepreneurial) clusters and regions, National and regional systems
Platform ecosystem	Ecosystems typically owned or governed by a "hub actor" or "platform leader" that connects various sides of markets to facilitate exchange over a digital platform	Two- and multi-sided markets
Service ecosystem	Ecosystems emphasizing the systemic and institutional nature of value (co)creation with a focus on service exchange and resources	Product-service systems; Service-dominant logic

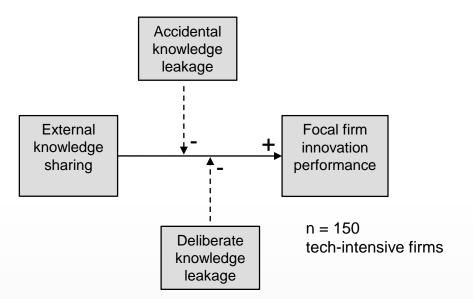
<sup>\*</sup> Based on Aarikka-Stenroos, L., & Ritala, P. (2017). Network management in the era of ecosystems: Systematic review and management framework. *Industrial Marketing Management*, 67, 23-36.



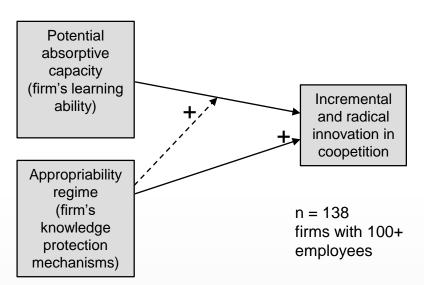
### JOHTAMISHAASTEITA JA -MAHDOLLISUUKSIA

### The knowledge sharing paradox





Ritala, P., Olander, H., Michailova, S., & Husted, K. (2015) Knowledge sharing, knowledge leaking and relative innovation performance: An empirical study. *Technovation* 



Ritala, P., & Hurmelinna-Laukkanen, P. (2013) Incremental and radical innovation in coopetition—The role of absorptive capacity and appropriability. *Journal of Product Innovation Management* 

### **Orchestrating innovation** networks & ecosystems





Main coordination mechanisms in the exploratory phase

Main coordination mechanisms in the exploitative phase

Management

Delegating roles and tasks for network members, setting up schedules Coordinating efficient supply and demand

Orchestration

Motivating members to join the network, ensuring knowledge sharing & mobility, communicating vision

Maintaining the network structure and innovation appropriability in order to realize the objectives

Ritala, P., Armila, L., & Blomqvist, K. (2009). Innovation orchestration capability—Defining the organizational and individual level determinants. Int. Journal of Innovation Management.

Ritala, P., Hurmelinna-Laukkanen, P., & Nätti, S. (2012). Coordination in innovation-generating business networks-the case of Finnish Mobile TV development. Journal of Business & Industrial Marketing

### Organizing loosely coupled ecosystems

### - case SHOKs



Tekes ja strategisen huippuosaamisen keskittymät (SHOK)

### KNOWLEDGE ECOSYSTEM AS PREFIGURATIVE ORGANIZATION

#### Joint search for the knowledge domain:

Knowledge domain is identified through *probing* the tentative scope of the domain, as well as *formulating the common goal* among the affiliated actors.

#### Implications of the joint search on organizing:

Knowledge ecosystem lacks a clearly distinctive character. Preliminary basis of collective actorhood is obtained by formulating a common goal.

#### Main organizing challenges:

Navigating through the ambiguity and lack of clear direction of the joint knowledge search.

#### Degree of organizability:

Elements of organizing are absent but there is an anticipation of them to be introduced later.

## Affiliation-based participation: A loose relationship to the ecosystem and to the other participants; provision of self-resourced inputs based

on voluntary action.

#### Informal coordination:

Coordination concerns the search for the knowledge domain and agenda setting via gathering the dispersed initiatives and viewpoints together.

#### KNOWLEDGE ECOSYSTEM AS PARTIAL ORGANIZATION

#### Joint search within the knowledge domain:

The knowledge domain is renegotiated and reframed by reinforcing the common goal, as well as by selectively revealing actor-specific knowledge among the ecosystem members.

#### Implications of the joint search on organizing:

Knowledge ecosystem exercises its collective actorhood and has a distinctive character compared to other knowledge ecosystems.

#### Main organizing challenges:

Finding an appropriate balance between members' own goals and the common goal.

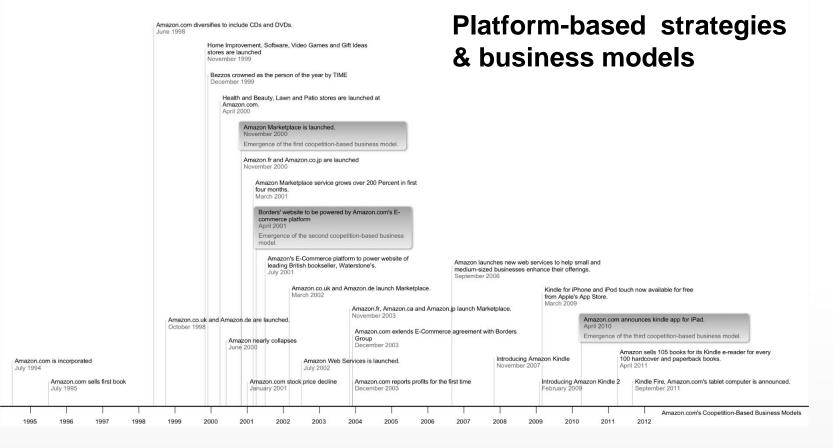
#### Degree of organizability:

Elements of organizing, such as regulation and monitoring, are present and are in use for coordinating the participants and their knowledge creation activities.

### Membership-based

participation: A formal membership scheme where membership is granted and regulated. Membership provides access to ecosystem-specific resources and involves specific responsibilities.

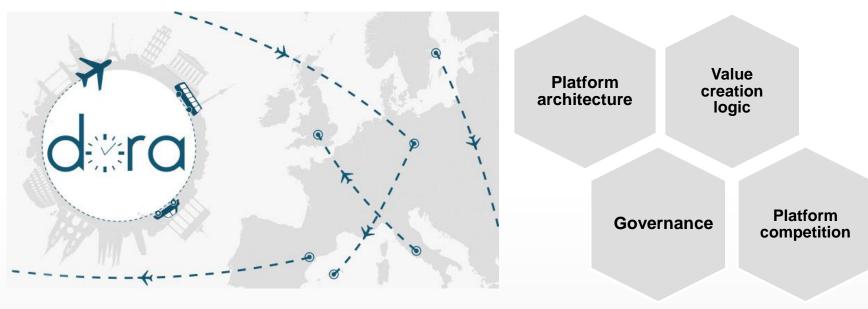
#### Formal regulation and monitoring: Monitoring concerns the search within the knowledge domain, and the activities and outputs of knowledge creation; members' contributions are monitored against preset criteria and plans.





### Platform design framework





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