

### 37E00100 Information Economy:

#### **Sharing/Gig Economy Platforms**



### Topics of the day

- Sharing/Gig Economy
  - Sharing economy platforms
  - Evolution of sharing economy platforms
  - Boundary fluidity in sharing/gig economy
- Article of the day:
  - Constantiou, I. Marton, A. & Tuunainen, V.K. (2017). "Four Models of Sharing Economy Platforms". MIS Quarterly Executive, Dec 2017 (16:4)



### Economy, economics and exchanges

- Economy = a system of production, distribution, exchange and consumption of goods
- Economics = the problem of how to best allocate scarce resources
- Types of exchanges
  - Market exchange involves self-interested transactions regulated by market institutions and price.
  - Gift giving is also often self-interested; it is mediated by (generalized) reciprocity and rituals.
  - Sharing does not involve transfer of ownership and does not necessarily assume individual ownership of property.



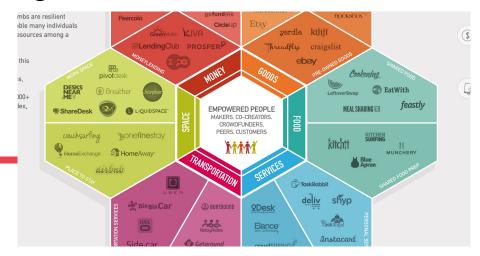
#### Related concepts

- Access-based consumption (Bardhi and Eckhart 2012) marketmediated consumption without owning the goods
- Collaborative consumption (Belk 2014; Hamari, Sjöklint and Ukkonen 2015) – consumers coordinate resource acquisition and distribution
- Platform economy (Cohen and Sundarajan 2015; Cusumano 2014) creating value by bringing different parties together on digital platforms
- Commons-based production (Ostrom 1990; 2000; 2010; Benkler 2006) production and consumption without individual ownership
- **Gift systems** (Giesler 2006) systems in which goods are exchanged under generalized reciprocity
- Online labor platforms (Huang et al 2021) platforms that enable the trading of services by connecting buyers who need services with providers willing to deliver those services
- Gig economy (Huang et al 2020) a market system where organizations and independent workers engage in short-term ondemand work arrangements mediated through digital platforms



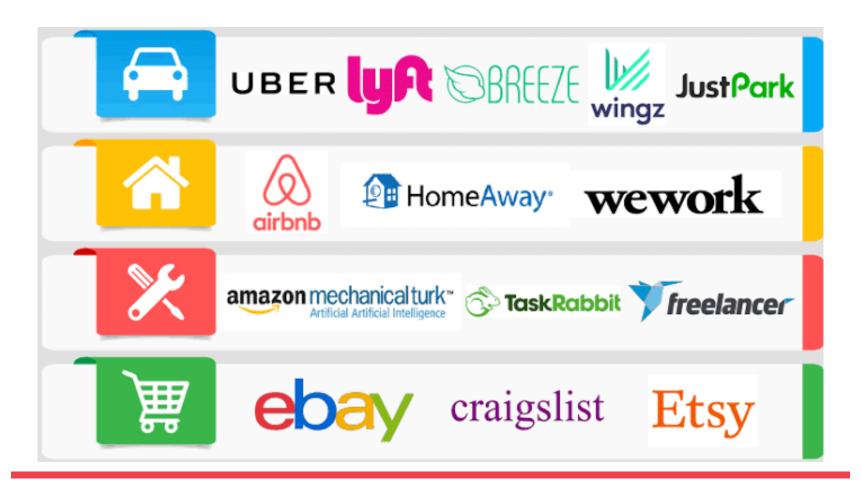
### Sharing/Gig economy

- Two/many-sided platforms that enable sharing of physical products or the provision of services based on physical assets
  - dynamics of the digital world
  - constraints of the physical world
- Disrupting industries and markets
- Benefits and challenges
- Commodification of everything?





### Sharing/Gig Economy by sector





**Source**: Sedkaoui, S. & Benaichouba, F. (2019)

# Sharing/Gig Economy Disruptors' Competitive Moves

- Entry point
  - Low end vs High end
- Growth Rate
  - Network effects
- Evolutionary Trajectory and Speed
- Diversification into other Industries



#### Common reasons for failure

- Lack of Providers
- Insufficient Analysis of the Sharing Market
- Trust and Safety
- Hidden Resource Requirements
- Unscalable Technical Design
- Unclear Legal Environment
- Business Termination through Acquisition



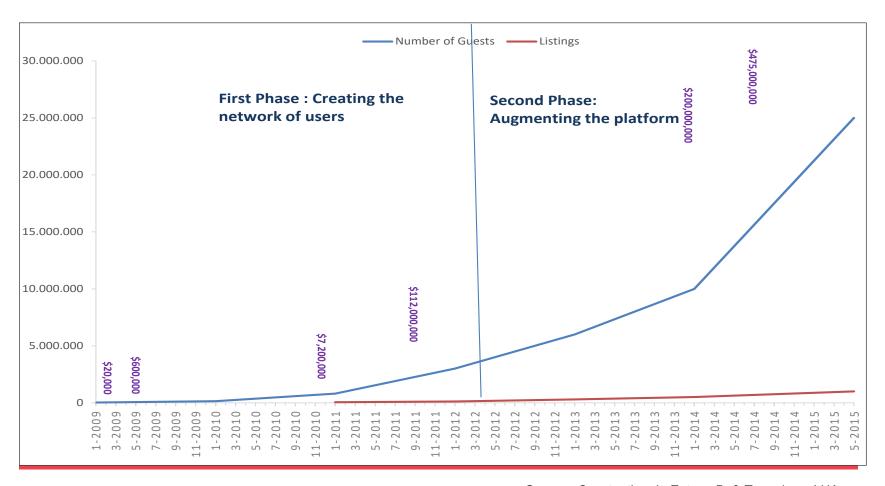
# Understanding sharing economy platform evolution

- Platform economics
  - Two/many-sided markets
  - Network effects
  - Lock-in and switching costs
  - "chicken and egg problem"
  - Subsidies to one side
- Information infrastructures
  - installed base
  - Bootstrap problem
  - Adaptability problem
  - Cultivation strategy: process orientation, user mobilization and learning





### The evolution phases of Airbnb





**Source**: Constantiou, I., Eaton, B. & Tuunainen, V.K. (2016), The Evolution of a Sharing Platform into a Sustainable Business (2016), HICSS-49, Kauai, HI, USA, Jan 5-8, 2016.

### **Evolution of Airbnb through two phases**

- First Phase: Creating (mobilizing) the network of users
  - Building the Hosts' side
    - Supply side
    - value adding, trust and security tools and services for hosts
  - Strengthening the Guests' side
    - Valued adding guest services
- Second Phase: Augmenting the Platform
  - Incremental improvements of the the platform
    - Both for guests and hosts
    - Societal level tools
  - Extending the value of the platform
    - Regulations and rules





**Source**: Constantiou, I., Eaton, B. & Tuunainen, V.K. (2016), The Evolution of a Sharing Platform into a Sustainable Business (2016), HICSS-49, Kauai, HI, USA, Jan 5-8, 2016.

## Insights from platform economics and II theory

- (1) Creating the network of users
  - PE: "zig-zag strategy", two sides, network effects, reputation
  - II: bootstrapping problem
- (2) Augmenting the platform
  - II: adaptability problem, cultivation
    - Process, learning, mobilization







**Source**: Constantiou, I., Eaton, B. & Tuunainen, V.K. (2016), The Evolution of a Sharing Platform into a Sustainable Business (2016), HICSS-49, Kauai, HI, USA, Jan 5-8, 2016.

#### Some remaining questions

- How to compete in or with sharing/gig economy?
  - nature of the product (physical-digital) and the consumption experience
  - notion of ownership and the boundaries between private and public
  - product or service markets dynamics and the key players strategies
- Role of trust
  - How do we build trust in strangers online and offline?
  - What is the role of platform in securing and underwriting sharing exchanges?
- What is the role of institutions and regulation in sharing economy?
- How to resolve the problems of sharing economy?
  - "dark side" of the gig economy
  - Legal issues



### Organizational boundaries

#### Traditional

- Vertical vs Horizontal
- Organizational inside vs environmental outside
- Clearly identified membership with rules for entry and exit

#### Recent developments:

- Blurring of work and private life
- Outsourcing
- Open innovation and crowdsourcing
- Co-opetition

#### Alternative organizational forms

- Communities and collectives
- Social movements
- Temporary organizations



### Four organizational boundary concepts

- boundaries of efficiency, which differentiate internal, hierarchical governance from market-based governance in order to minimize transaction costs.
- (2) Boundaries of **power** are drawn around the sphere of influence exerted by an organization in order to maintain or increase its autonomy and to strengthen its strategic position.
- (3) Boundaries of **competence** differentiate the resources and capabilities owned by the organization in order to maximize its value and to exploit new opportunities outside of the organization.
- (4) Boundaries of **identity** demarcate the collective feeling of "whowe-are"; they enable sensemaking in order to maintain coherence between organizational activities and organizational identity.



### Efficiency and transactions in Sharing Economy

- Platform is the locus for...
  - accessing idle resources as shareable goods or services
  - mixing hierarchies, markets and clans
- Digital technology is for ...
  - minimizing transaction costs
  - governing through software code



# Power and dominance in Sharing Economy

- Platform is the locus for...
  - forming strategic relationships with casual participants
  - increasing inter-dependencies
- Digital technology is for ...
  - exerting strategic control over ecosystem
  - making markets newly vulnerable



# Competence and resources in Sharing Economy

- Platform is the locus for...
  - co-creating resources
  - orchestrating assets out of idle resources not owned or directly controlled by the platform
- Digital technology is for ...
  - leveraging resources and capabilities
  - enabling co-creation through boundary resources



# Identity and membership in Sharing Economy

- Platform is the locus for...
  - curating identity claims
  - building narratives of personal freedom and empowerment
- Digital technology is for ...
  - producing algorithmic identities
  - providing cognitive frames through reputation systems



### **Boundary Fluidity in Sharing Economy**

- Efficiency:
  - mix hierarchies, markets and clans
- Power:
  - treat casual participants as their strategic partners
- Competence:
  - orchestrate strategic idle resources not owned by the platform
- Identity:
  - neglect membership in favor of reputation systems and algorithmic identities



#### The fluid boundaries of sharing economy platforms

	Fluid boundaries of			
	Efficiency	Power	Competence	Identity
Platform is the locus for	accessing idle resources as shareable goods or services	<ul> <li>forming strategic relationships with casual participants</li> </ul>	<ul> <li>co-creating resources</li> <li>orchestrating assets out of</li> </ul>	<ul> <li>curating identity claims</li> <li>building narratives of</li> </ul>
	<ul> <li>mixing hierarchies, markets and clans</li> </ul>	<ul> <li>increasing inter- dependencies</li> </ul>	idle resources not owned or directly controlled by the platform	personal freedom and empowerment
Digital technology is for	<ul> <li>minimizing transaction costs</li> </ul>	<ul> <li>exerting strategic control over ecosystem</li> </ul>	<ul> <li>leveraging resources and capabilities</li> </ul>	<ul> <li>producing algorithmic identities</li> </ul>
	<ul> <li>governing through software code</li> </ul>	<ul> <li>making markets newly vulnerable</li> </ul>	<ul> <li>enabling co- creation through boundary resources</li> </ul>	<ul> <li>providing cognitive frames through reputation systems</li> </ul>

## **QUESTIONS?**

virpi.tuunainen@aalto.fi

