

Sharing in five: the disruptive urban freight transport challenge

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Paper. No: 103 - Sharing in five: a disruptive urban freight transport analysis

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Purpose

The population growth and urbanization, the explosion of e-commerce, and the proliferation of fast delivery options, require innovative solutions and business models to ensure cost-effective, but also environmentally and socially friendly, transportation of goods. Within the logistics industry the sharing economy is considered to be one of most promising - disruptive – developments that could render a major contribution in reducing emissions of its operations. Sharing unused and/or underutilized resources, can unlock new efficiencies in the logistics value chain in an industry where efficiency is the name of the game.

Research Approach

Among five themes in urban freight transport, i.e. city logistics, construction logistics, transportation & warehousing, healthcare logistics and service logistics sharing concepts are studied over. For each company within a theme a business model canvas is constructed. The Business Model Canvas is a business tool used to visualize all the building blocks of starting a business, including customers, route to market, value proposition and finance (Ostwalder et al., 2010).

Rethinking the use and ownership of resources and its related customer relationships forms the essential step to support the creativity in designing new business models. Muñoz & Cohen (2018) have developed a compass for navigating sharing economy business models. As an actionable framework, the Compass helps elucidate the multiple, innovative forms sharing economy businesses are adopting. As a generative tool, it enables entrepreneurs, investors, incubators, and incumbents interested in entering the sharing economy to create, present, and evolve a compelling sharing business model as well as evaluate its extent of robustness.

Findings and Originality

Although most individuals do have some comprehension about the sharing economy from a consumer perspective (AirBnB, Uber cs) our explanatory research shows that most of the companies in the logistics industry have no idea what the effect will be of the sharing economy on the logistics industry as a whole, and on individual companies on how they can benefit from applying sharing economy concepts individually (from a business and societal perspective). This research provides a transition framework based on the business model canvas, the business model compass and benefit-cost-analysis, to find new business models based on sharing principles.

Research Impact

Less literature is available on combing urban freight transport with sharing economy principles. Our



research contributes to the field as in five themes a literature review is carried out. Also the new research framework helps companies with finding new business models for the (over/under) utilized resources.

Practical Impact

Based on our findings we first of all expect to be able to create awareness in the urban freight transport how sharing economy concepts will affect the logistics industry as a whole. Next to creating awareness in the logistics industry as a whole by publishing articles and organizing knowledge sessions and seminars, we aim to advise at least 50 logistics companies. Based on these 50 logistics advices we synthesize on working sharing logistics concepts and their related (new) business models.

References

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