

IMPACT OF THE SHARING ECONOMY ON FUTURE BUSINESS MODELS

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Abstract

The growth of the sharing economy is probably one of the most meaningful global socio-economic evolution in the past ten years (Koen Franken, 2017). The definition “sharing economy” is mostly used to describe the business model with digitized platforms for peer-to-peer exchanges (Geissinger et al., 2019; Belk, 2014; Juho et al., 2016). This article presents an approach to research that estimates the sharing economy and principally the main factors and conditions, what stimulates and drives the development of sharing economy as a perspective business model. Firstly, we define the understanding of sharing economy as one of the most engaging business models in nowadays according to economic literature study. Secondly, we conduct the analysis of the perspective and sustainable evolution of sharing economy mostly in the past decade. Furthermore, we identify forces which are driving the sharing economy for economic development. Thus, we design the conceptual framework of the sharing economy as a perspective and digitally based business model.

Key words

international business, business dynamics, economic development, sharing economy, business models, digitalization.

JEL Classification: O10, O11, O12

Introduction

The growth of the sharing economy and its importance on economic development stimulates questioning, what factors and conditions are encouraging the sharing economy as a perspective business model. In the recent ten years the definition “sharing economy” is constantly analyzed as one of the business models where digitized platforms operate in the process of peer-to-peer exchanges (Geissinger et al., 2019, Hamari et. al., 2016, Belk, 2014). However, Mi and Coffman (2019), Wilson (2014) highlight importance of a community-based online platform in the sharing economy, while others (Kathan et. al. 2016, Barhdi and Eckhardt, 2012), characterize this economic model as case with non-ownership and temporary access-based type of economy. Our research studies, mainly based on surveys done by Acquier et. al (2017), Richardson (2015), Frenken (2017), Srineck (2017), demonstrate the sharing economy as an umbrella conception with its main cores – access-based, community-based and platform-based economies.

Therefore, the economic research studies and statistical data presents that the sharing economy is creating considerably amounts of economic value to different types of sectors and especially it makes an influence on hospitality and transport sectors. In 2014, Airbnb

received about 425,000 guests per night and it was generally 22% larger amount than Hilton Worldwide (PwC, 2015). Hereinafter, the sharing economy is developing rapidly and 105 million of U.S. inhabitants or 51% of U.S. adult population, were consumers of the sharing economy platforms as the users of the providers of goods and services in 2015 (Godelnik, 2017).

The aim of this article is to clarify the main factors and conditions what stimulates and drives the development of the sharing economy as a perspective business model and to put it into interpretation by designing a conceptual framework. Thus, we presented the main driving forces principally based on research studies of Hodkinson et. al (2017), Owyang (2013), Goudin (2016), Bocker and Meelen (2016), Frenken and Schor (2017), Curtis and Lehner (2018), Mi and Coffman (2019), and further, we conceptualized the framework of the sharing economy as perspective business model.

Yet, in economic research papers there are limited insights how the sharing economy has directly changed the traditional business models and what are the future reflections of the sharing economy versus the traditional business models, thus this could be the future economic research.

Understanding of the Sharing Economy

The prompt progress of the sharing economy over the last decade has significantly risen the usage of the definition “sharing economy” in research literature, but still there are a lot of discrepancies among researchers explaining this business model.

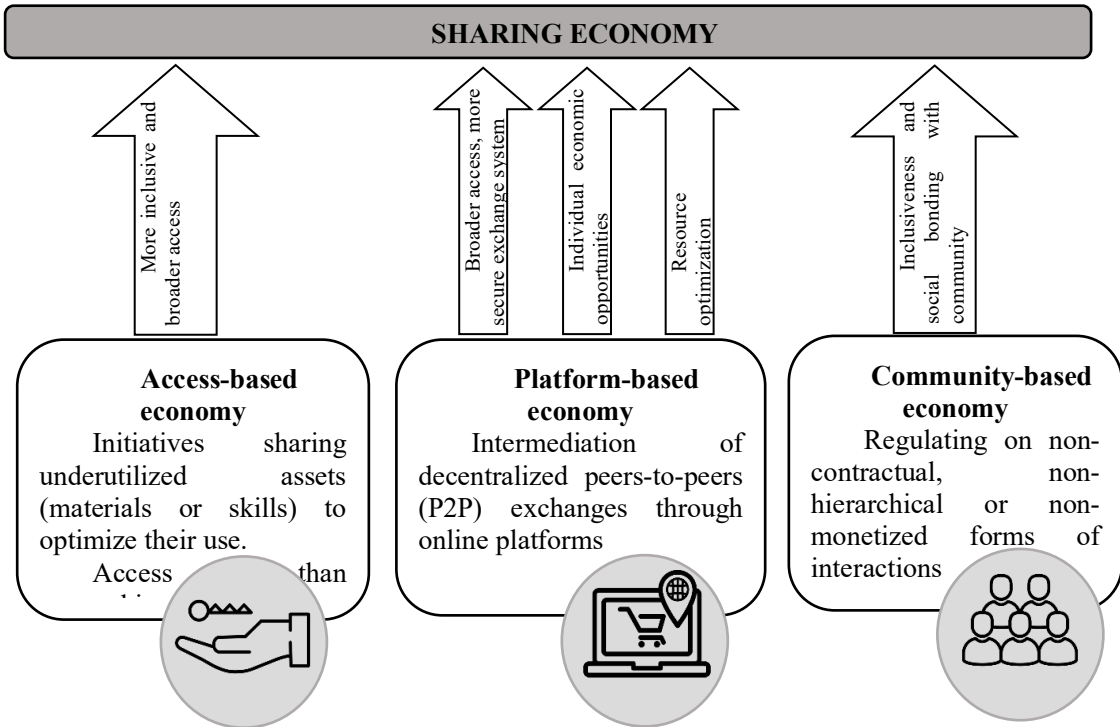
As highlighted by the European Economic and Social Committee (2016), the concept of the sharing economy has been trying to link a number of activities over the past couple of decades, and this business model that has become the subject of scientific discussion, covering a wide range of different activities, services and goods and recently has so far not had a single concept. In addition to the concepts of the sharing economy used in the scientific literature by researchers, there are considerable amount of its synonyms: “collaborative consumption” (Bostman and Rogers, 2010), “commercial sharing systems” (Lamberton and Rose, 2012), “co-production” (Humphreys and Grayson, 2008), “the mesh” (Gansky, 2010), “access-based consumption” (Bardhi and Eckhardt, 2012), “non-ownership form of consumption” (Habibi et al., 2017), “in web platforms facilitated peer-to-peer exchanges” (Aloni, 2016), “access-based consumption of products and services that can be online and offline” (Barnes, Mattsson, 2016) and so on. All these concepts have been suggested by different authors to avoid inaccuracies and ambiguities. Although, this term has recently become widespread among researchers, there is no common determination of sharing economy meaning. Thus, sharing economy interests substantially many different disciplinary issues including economy, marketing, customer performance, law, innovation, sociology, geography and anthropology (Acquier et al., 2017). This leads to the situation that it is difficult to characterize sharing economy in

common and acceptable definition by different research audiences and this contributes to the sharing economy as an umbrella construct. According to our research study, definition “sharing economy” could be explained as an umbrella term not only for sharing of items, but also second-hand markets, exchange platforms, peer-to-peer lending, engagement economy (Frenken, 2017, Acquier et al., 2017) which operates through online platforms (Hamari et al., 2016). Examples of such kind of business models are Zipcar, Airbnb, Uber, Freecycle, Facebook, YouTube, Twitter and other business models where customers can online access and use item corresponding to their needs.

Based on economic literature review, sharing economy conceivably could be described as model, acting on these essential cores: access economy, platform economy and community-based economy (Acquier et al., 2017, Figure 1). Considerably, corresponding aspect about the sharing economy, presented by Richardson (2015), is that this business model operates through three performances: community, access and collaboration.

In the access -based economy consumers make transactions, who are built not on the ownership of the goods, but on the accession to them, and this promotes to the optimization of the use of different items. The access-based transactions have been long existed in for-profit business models (for examples leasing furniture, or rental equipment) and in non-profit business models (for example taking books for reading in public libraries). Consequently, the access economy has been transformed into the model offering services as an alternative to the products, and a lot of items are shared now rather than being purchased, and this kind of economy could be non-profit, or for profit, public – private collaboration, or cooperative case (Acquier, 2017).

Figure 1. The main cores of the sharing economy



Source – adapted model, based on Acquier et. al (2017), icons sourced from “The Noun Project”.

Research conducted to Acquier (2017) study, shows that the access-based economy gives advantages for customers to achieve wider and cheaper services in short period. This makes an impact on environmental issues, because the access-based economy promotes sustainable solutions instead of irrepressible purchasing of products.

The platform-based economy is another essential core of the sharing economy. In economic literature it is defined that the platform economy is a package of performances that intermediately acts in a decentralized way between peers through Web-based platforms. Based on Srineck (2017) research study, digital platforms arguably are gaining significant weight in contemporary capitalism. This idea supports Evans and Gawer’s (2016) global survey resulting that about 70% of unicorns (private start-up company with a value upper than \$1 billion) are platform based companies. The total value of such kind of companies was more than \$4.3 trillion in 2016, so this demonstrates the importance of platform-based economy, which is

also one of the core elements of the sharing economy. Such platforms generate economic value by linking and arranging transactions instead of producing themselves and create potent network effects on the whole ecosystem joining users and suppliers.

Evolution of the Sharing Economy

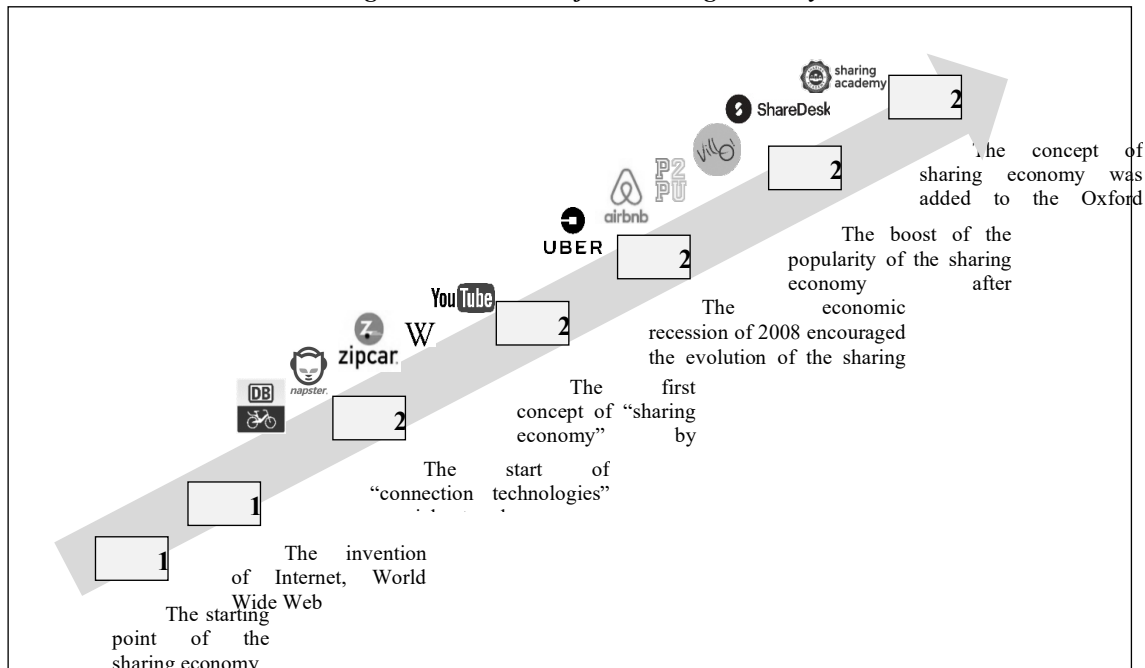
The interpretation of sharing as “consumers granting each other temporary access to their underutilized physical assets, possibly for money” (Frenken and Schor, 2017: 4-5), points that the business model of the sharing economy exists as long as humanity itself. Such kind of collaboration was common among groups of relatives, families, friends or neighbours, but the scope of collaboration was limited because of trustworthiness of unknown customers (Frenken, 2017). The book “Community Structure and Collaborative Consumption: A routine activity approach” written by Marcus Felson and Joe L. Spaeth in 1978 is principally committed as the starting-

point of the sharing economy (Dudek and Salek, 2016). Although the content of collaboration consumption described in this book was far from the definition of the sharing economy used during this decade, but the idea of the sharing provided interest from the academy and business sides. The development of information communication technologies and expansion of Web 2.0 has enabled the progress of online platforms development generating user content and item sharing collaboration (Hamari et al., 2016) or as other researchers (Zhang et al., 2018) stated, expansion of the ways “for sharing underused resources and skills” (Figure 2). According to Marshall (2019) 1990 was the starting point of the modern sharing economy, when Berners - Lee, together with the team, created an innovative technology for public purposes, such as e-mail and user friendly Web. Initially, the Internet was mainly used mostly by the communities of researchers, but in 1995 it was already used for commercial purposes, too. The examples of such businesses are Book Stacks Unlimited, who started e-commerce in 1992 and Amazon, who was launched two years later. Ebay was established in 1995 by founder Pierre Omdyar with an aim to sell goods and services online and had an ambition to make a collaboration between individual sellers and as well as buyers (Marshall, 2015).

The development of modern technology was one of the key factors enabling evolution of the sharing economy in the early 21st century. Social networks and exchanging of data establishes trust among individuals who didn't know each other and promoted rapidly expanding sharing of underused items and experiences or skills. Such an example is Napster, allowing free of charge peer-to-peer sharing of digital audio and media files, and it is called the pioneering player in the role of the sharing, using information communication technologies. Another example is Call a Bike – German bike hire system established in 1998 and is operated since 2000. Subsequently, the exchanging of digital content, such as self-made video materials or photography included open source software storage (for example, GitHub,

SourceForge), content sharing platforms (for example, YouTube, Facebook, Instagram), online encyclopedias (for example, Wikipedia) and peer-to-peer sharing (for example, The Pirate bay), became more and more popular (Zhang et al., 2019). The progress of social networks, or as Sunjoo Oh and Moon (2016) calls “connection technologies”, enabled the boost of social relations, and this resulted the trust among the sharing items providers and users, and the development of the sharing economy. Furthermore, because of the advantages of social network technologies, product sharing became not forced by location and time. The era of social networking and data or item sharing platforms between consumer communities engaged the establishment of the first sharing economy-based companies offering car rentals (Zipcar, Greenwheels, GoGet), bike rental (Call a bike, City Rader), peer-to-peer money lending (Zopa, Lending club, Prosper), accommodation (Couchsurfing) and other services. Sunjoo Oh and Moon (2016), Hamari (2016) and others stated that two of the main reasons, that encouraged the evaluation of the sharing economy, are the global economic recession in 2008 and prompt development of communication technologies. Marshall (2015) points out that the boom in the sharing economy growth has been recorded in late 2008 after the global economic crisis. Declining consumer confidence in business, rising unemployment, falling consumer purchasing power have forced people to cut their expenses and explore new ways for earning money. The global economic recession influenced changings in habits of the individuals and for example one survey shows that Americans are reducing their consumption and are assuming about a simpler living by giving priority to sharing, but not owning (Sunjoo Oh and Moon, 2016). Goudin (2016) near the bellow listed two main reasons that forces the evaluation of sharing economy, lists factor of underused resources of skills. Particularly, during the economic recession, there were established sharing economy platforms such as Airbnb and Uber the world leading international business models.

Figure 2. Evolution of the sharing economy



Source – created by authors with logos from respective company websites.

After 2010, then Botsman and Rogers published the book “What’s Mine is Yours: The Rise of Collaborative Consumption”, the definition “sharing economy” has become considerably popular among researchers and business players (Cheng, 2016). Authors Bostman and Rogers were the first authors, who pointed the differences between the sharing economy and collaborative consumption. They marked that the main characteristic of the sharing economy is the usage of the platform, in which persons are sharing underused items. Nowadays the possibility to share a home, a car or a food became tangible with technology platforms like Airbnb, Uber, EatWith and others (Belk, 2014).

Thus, among researchers still there are a lot of discussions in explanation of definition “sharing economy”, but despite of all these disagreements the concept of sharing economy was included to the Oxford dictionary in 2015 and it is clarified as “An economic system in which assets or services are shared between private individuals, either for free or for a fee, typically by means of the Internet”.

Driving Forces of the Sharing Economy







According to the report made by PwC (2015), the sharing economy produced \$15 billion in revenue in the whole world in 2015, and it is forecasted that it will produce \$335 billion in revenue within upcoming ten years. Based on Campbell (2018), in China, corresponding to official figures, the sharing economy should generate approximately 10% of China’s gross domestic product (GDP) by 2020 and it should even give rise to 20% by 2025. The same author reports that this model of economy operates \$500 billion in transactions between around 600 million individuals in 2017. Thus, it is important to clarify, what are the most relevant forces, leading to such a significant role in the economic development with the perspective of the sharing economy.

Research studies based on works of Goudin (2016), Bocker and Meelen (2016), Hodgkinson et al. (2017), Owyang (2013), argue that the sharing economy reveals on the various forces that are related to economic, social and societal, environmental and technological factors that affect users and providers of the sharing economy in various approaches (Figure 3).

The **economic, social and societal, environmental and technological efforts** that are encouraging development of the sharing economy and drives forward providers and of this business model – users and providers. A survey, made by Bocker and Meelen (2016) in Amsterdam, showed that sharing in accommodation sector is more economically stimulated, and sharing in such sectors like car and meal sharing, are mostly forced by social

factors. This study also displayed that young, low-income owned persons are more economically oriented, and young, higher-income owned and obtained higher education persons are more socially and societally motivated; besides female are more environmentally reasoned than man. Study of Bocker also showed, that the sharing economy users are more economically motivated than the providers.

Figure 3. The main sharing economy’s driving forces according different actors

	 Economic	 Social and societal	 Environmental	 Technological
 For Users	<p>Economic crisis driving people with financial difficulties to revisit consumption style.</p> <p>Access to high quality goods that are too expensive to purchase.</p>	<p>Expanding users’ social networks with like-minded new connections.</p> <p>Altruistic reasons.</p> <p>Anticipation of reciprocation.</p>	<p>Oriented to a healthy life style.</p> <p>Appealing the environmental friendly, sustainable consumption.</p>	<p>Lower transaction costs influenced by advantages of connection technologies.</p>
 For Providers	<p>Monetary benefits from capitalizing on idle capacity or unused asset.</p> <p>Self-employment or freelancing opportunities with flexible working hours.</p> <p>Business’ productivity because of better utilize of shared goods.</p>	<p>Establishing networks of loyal customers for continuous transactions.</p> <p>Access wider markets with higher transactions volumes through user recommendations.</p>	<p>Increased environmental consciousness, where not utilizing spare capacity is perceived as counterproductive to sustainability.</p>	<p>Possibility to share items with unknown persons in the possibly safer way.</p> <p>Lower transaction costs influenced by advantages of connection technologies.</p> <p>Advantages of electronic commerce enabled worldwide</p>

Source – adapted based on Hodkinson et. al (2017) and Owyang (2013), icons sourced from “The Noun Project”.

The global economic recession and decline in economy has resulted the allocation of the financial resources of people. After crisis 8 out of 10 American inhabitants were purchasing less, and 9 out of 10 were looking for an easier life in the perspective of items using, but not owning. Thus, the sharing economy gave such an advantage for users, even for the access to prime

quality goods that were too expensive to own (Oh and Moon, 2016). The **economic forces** driving the sharing economy as a perspective model of economy are indisputably positive. The economic dimension of the sharing economy is reflected with maximization of goods and services productivity. The sharing of the specific item, that its owner would use only a few times,

is exhausted to the maximum, as access with economic added value is granted to every user of the sharing economy and as the result of such collaboration users save time, money and other resources, and providers earn extra income. As Oh and Moon (2016) claims, the sharing economy generates transactions “that value social relations over monetary benefits”. Frenken (2017), Mi and Coffman (2019) predicate that lower transaction costs between providers and users are one of the main impact. Ewans and Gawer (2016) point that the sharing economy drives productivity of economy through eminently efficient matching of goods or services providers and users.

The expanding usage of the smartphones, the decreased information data's costs, big population of people in urban cities, also stimulated the development of the sharing platforms. This excess capacity generates perfect conditions for collaborations that match supply and demand. As Hodkinson and others (2017) pointed in their white paper: “with uncertainty around pension systems across the world, sharing assets has the potential to augment pension income and can help prevent old-age poverty”. This statement authors explained with the possibility of the advantages of the sharing economy, for example, the older person living in the big city and owning a car with the possibility of the car sharing platform could earn periodical income with the feasibility of ride sharing. This would generate economic added value as for the sharing economy provider, as well for the user, and as the result creates conditions for financial flexibility (Owyang, 2013).

Recent studies done by Frenken and Schor (2017), Curtis and Lehner (2018) proposes that the sharing economy is directed by **the social and societal factors**, or as the researchers commit is economically gained over altruism. Furthermore, users of the sharing economy lists that social issue is significantly meaningful and more valuable in the societal perspective than traditional business model. Frenken and Shor (2017) argues that sharing platforms gives an advantage for users with possibility to build new social connection, and even new relationships between participants of the sharing economy. In the sociological review Ladegaard (2018), based on Boston sample, argues, that hosting service providers are keen to make the collaborations with services users from foreign countries, who

could be called “comfortably exotic”, this means contrasting enough to be impressive, but comparable enough to be appropriate. Thus, the sharing economy reduces social inequality by enabling more equivalent distribution of goods and services.

Based on PwC study (2015) 78% of the sharing economy users comply, that the sharing economy scales down irrelevant waste. Mi and Coffman (2019) also point that this model of economy makes confident **environmental impact** by reducing the amount of resources used for the customers' needs and helps to reduce pollution, promotes sustainable community. Zhang and Mi (2018) stated, that bike sharing reduced carbon dioxide (CO₂) emission by 25.000 tons, and nitrogen oxide (NO_x) emission by 64 tons in Shanghai, and saved 8.358 tons of petrol.

Recently, the platforms of the sharing economy deliver exceptionally opportunities for sharing for inhabitants of urban cities. The assets of goods, skills or knowledge give a profitable basis for sharing using **communication technologies in exchanging platforms**. Frenken (2017), Mi and Coffman (2019) predicate that lower transaction costs between providers and users are one of the main impact encouraging the economic progress of the sharing economy. Nowadays the financial transactions are possible in the easier and cheaper way than it was operated in the past, so this advantage is based on the opportunity of communication technologies.

All these factors might argue, the emergence and development of the phenomenon of the sharing economy during the past decade and this business model is substantially prevalent in cities (Hodkinson et al., 2017). Sharing can augment supply during the peak seasons and correspond to the needs of high demand: for example, the touristic places can gain from the sharing economy with the support of the sharing platform, which allows owners or the hosting services providers make accommodation feasible during peak moments, rather than starting building new constructions. On the other hand, the sharing economy sometimes results abundance of supply: for illustration, in China, such businesses like MoBike (bike-sharing), or Molisan (umbrella-sharing) have designed an overflow of bicycles and umbrellas at sharing stores, instead of elaborating the use of current

recourses (Hodkinson et al., 2017). The amount of the sharing economy has been significantly increased since 2010: a global survey, made by Ewans and Gawer (2016), points that the sharing economy's companies had a total market amount of \$4.3 trillion achieved in 2015 and had directly employed 1.3 million persons all globally. This study stated that the sharing economy is one of the considerable catalyst of innovation during recent periods and this corresponds to the fact that in 2014 9 sharing economy platforms were owners of 11.585 patents in the USA. Thus, a lot of start-up companies uses the sharing economy business model and has been directly funded by venture capitals, incubators, accelerators or other investment resources (Ewans and Gawer, 2016). However, the regional allocation and the value of sharing economy platforms vary considerably across the globe. In 2015 Asia had 82 sharing economy platforms, North America 64, Europe 27, Africa and Latin America 3, but if analyzing the global market value of this innovative business platforms, the leader is North America with generating 72,6% (\$3,123 billion), and Asia 21,6% (\$930 billion), and Europe 4,2% (\$181 billion), and Africa and Latin America 1,6% (\$69 billion) in 2015 (Ewans and Gawer (2016)). This corresponds, that the sharing economy contributes particularly to the development of global economy.

The main driving forces of the sharing economy, as a perspective business model, correlate with each other and result the developing collaboration via digital platforms between main actors of the sharing economy – the providers, the users and governance. Thus, the sharing economy, as an innovative and promising business model, is based on digital platforms, accessed to underutilized goods, and serviced in the most efficient ways, and built on the sustainable communities. Significant amount of goods and services are nowadays shared instead of owned, and this method is enabled with the usage of decentralized exchanges between the providers and the users within digital platforms. Dakhli et al. (2016) such platforms call “club goods”, characterizes as assets with lower transactions charges which could be sometimes near zero. The sharing economy interactions are based on community building between the main actors of this business model, because it

The Conceptual Framework of the Sharing Economy as a Perspective Business Model

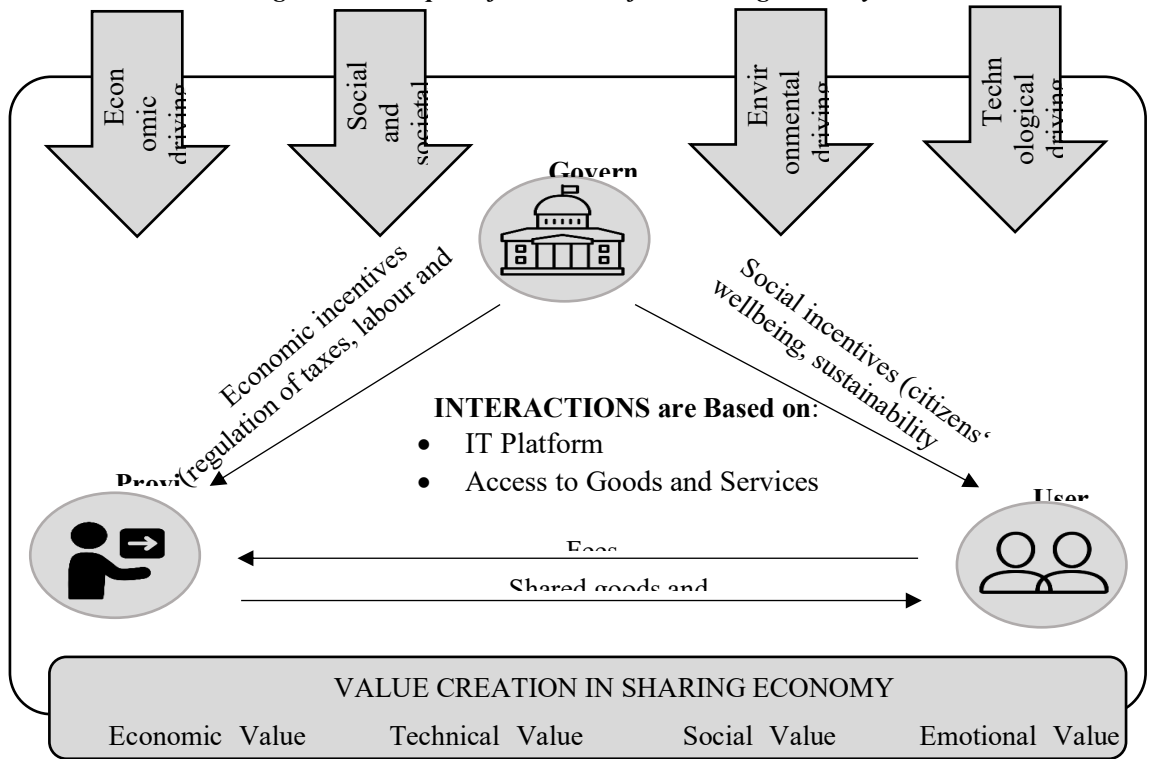
Our research study shows that the sharing economy is a perspective business model, which commits considerable impact on regional and global economies, and gives the opportunities for more sustainable world by giving users, who do not have enough financial recourses or do not want to buy new items, the access to underutilized items for a cost or for free; and for providers, owning such underutilized goods to earn more income or to benefit from social perspective. The sharing economy in economic research papers is constantly describing as a measure solving such challenges like overconsumption and income inequality. Sharing based business model with the advantages of communication technologies in exchanging platforms promotes for the collective use of remaining or new goods and services.

The narrow analysis of the researchers, who studied the sharing economy phenomenon, gives the scientific scope to present the main outcome of this study – the conceptual framework of the sharing economy driving ahead as a perspective business model (Figure 4). This model was developed based on the main cores of the sharing economy, the main actors of the sharing economy, the essential factors driving this innovative business model. promotes a community conception, creates social engagement, captures values of social missions via collective scheme. The users of the sharing economy gain the advantages as lower expenses on wider assortment of goods and services, progress of individual competences and entrepreneurship, flexible capital flows and etc. This business model has affirmative impacts via reduction in the complete and compulsory resources, enables reduce carbon footprint, emissions and redundant waste. Speaking about transport sector, car sharing action can condition environmental impact by decreasing the amount of kilometers drove. Such behaviors could lead to better human life by moving persons' practice from car ownership to sharing. Services and goods providers perform a critical economic part in controlling and decreasing transaction costs. The providers as well as users mainly have an aim to maximize the economic profit, whilst governments principally strive for wellbeing of

citizens. However, this business model causes significantly impact on the evolution of innovative economies and growth of GDP in the countries, regions and all around the globe. The

sharing economy will develop sustainable economic growth through bilateral cooperation between government, users and providers of underutilized goods and services.

Figure 4. Conceptual framework of the sharing economy



Source – created by authors, icons sourced from “The Noun Project”.

Conclusion

The concept of sharing is used for a long time, but the sharing economy, as a perspective business model was encouraged with the development of digital innovation, Internet, social, communication technologies which committed sharing conceivable with all its’ advantages. Together, these processes have created changing methods of the traditional business models with innovative ones, and the attractiveness of the sharing economy mostly concentrates on the exceptional speed in which persons can operate with goods or services. As Martin et al. (2015) pointed that the sharing economy becomes “more commercially-oriented over time”. The online platforms enhanced the

productivity of transactions, corresponding to lower transactions costs and increased underutilized assets exchanging between peers. Some researchers argue, that the sharing economy is an alternative to market capitalism and it might certainly sustain capitalism instead (Acquier et al., 2017).

This paper, from an academic perspective, points the understanding of the sharing economy as an innovative and perspective business model, presents principally the main factors driving to approaching economy’s development and demonstrates the conceptual framework of the sharing economy. The framework, created by authors of this research study, supplements the research works done by Acquier et al. (2019), Mi and Coffman

(2019), Petropoulos (2017), Acquier et al. (2017), Belk (2014), and others, and states that the sharing economy mainly generates significant impacts on economy and creates economic, technical, social, emotional, environmental values for all the participants of this business model – providers, users and government. Thus, this business model gives a challenges and perspective economic impact mostly on urban places and these insights should be illustrated in future research. This research study analyzes perspectives of the sharing economy and value creation for the whole individuals participating in this business model, so future study should include not only advantages of the sharing economy, but also the economic disadvantages of such business model too.

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