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Drivers of Different Types of Collaborative Consumption

Determinantes de Diferentes Tipos de Consumo Colaborativo

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Abstract: In this paper, we set out with two objectives: investigate the determinants to explain the satisfaction with different types of collaborative consumption and investigate the determinants to explain the intention to recommend different types of collaborative consumption. It develops and tests a research model using structural equation modeling. The survey data were collected from 431 collaborative consumers. Based on our results model, economic benefits and utility are the key motivators for these consumers. That is, collaborative consumers from Brazil are not very concerned about the environmental impacts, appear very independently-minded and opportunistic, and do not feel the impact of social influence upon their activities. Our model makes a contribution to the emergent stream of literature on the sharing economy, because, to our knowledge, this is the first study to formally test the drivers of collaborative consumption considering more than three kinds of collaborative practices.

Keywords: Collaborative Consumption, Sharing Economy, Drivers of Collaborative Consumption, Structural Equation Modeling.

Resumo: Esta pesquisa possui dois objetivos principais: investigar os determinantes da satisfação com diferentes tipos de consumo colaborativo e investigar os determinantes que explicam a intenção de recomendar diferentes tipos de consumo colaborativo. Para tanto, foi desenvolvido e testado um modelo conceitual por meio da modelagem de equações estruturais. Os dados foram obtidos em uma *survey* aplicada com 431 consumidores colaborativos. A partir dos resultados obtidos, constatou-se que os benefícios econômicos e a utilidade são os determinantes-chave para tais consumidores. Ou seja, a preocupação ambiental não é uma das motivações principais, assim como a influência social. Este consumo é motivado por questões utilitárias e individuais. Nosso modelo contribui para a literatura de economia compartilhada, pois, ao que parece, este é o primeiro artigo em que se analisam os determinantes do consumo colaborativo, considerando mais de três tipos de práticas colaborativas.

Palavras-chave: Consumo colaborativo, Economia compartilhada, Determinantes do consumo colaborativo, Modelagem de equações estruturais.

CONTEXTUALIZATION

In today's marketplace, consumers are redefining the nature of consumption at an amazing rate through practices such as car sharing and goods redistribution (PROTHERO et al., 2011). The potential sustainability benefits associated with these practices are interesting from an organizational and environmental perspective, particularly in the context of the increasing urbanization that many countries experience today. While co-owning properties has been widely accepted for a while, the notion of sharing bikes, cars, or even rides on an on-demand

basis is just now starting to gain widespread popularity (COHEN; KIETZMANN, 2014). In this sense, the emerging Collaborative Consumption (CC) has been influenced by the drive for sustainability, including such issues as economic austerity, social development needs, awareness of the wasteful nature of consumerism, and issues of global warming and environmental pollution (BARNES; MATTSSON, 2017).

Collaborative consumption is a form of consumption where people coordinate the acquisition of a resource for a fee or other compensation (BELK, 2014). Although it seems to be affecting only a small proportion of consumers and entrepreneurs, CC reflects a global readiness to shift values away from excessive consumption to more prudent solutions to everyday problems (PROTHERO et al., 2011) and involves millions of users and makes up a profitable trend many businesses invest in (BOTSMAN; ROGERS, 2010). In the car industry alone, manufacturers, dealers and suppliers are likely to experience significant impact from collaborative consumption, as are supporting services in car financing, insurance, taxation, servicing, cleaning, and retailing of sundries (HARTL; HOFFMAN; KIRCHLER, 2015; BARNES; MATTSSON, 2016). Airbnb is offering temporary space such as apartments, or houseboats in more than 65,000 cities in 191 countries (AIRBNB, 2018). The US market value for used children's clothes alone is said to be between USD 1-3 billion (BOTSMAN; ROGERS, 2010).

Although collaborative consumption is a competitive business model, there is neither much knowledge about the antecedents of collaborative activities nor why many people are still reluctant to participate in this emerging trend (MÖHLMANN, 2015). Recent study has demonstrated that enjoyment and perceived usefulness are the key motivators for sharing intentions and consumers who feel part of communities adding to a feeling of enjoyment and a desire to participate in car sharing and to tell others about it (BARNES; MATTSSON, 2017). Although people might have started participating in collaborative consumption for intrinsic reasons (e.g. perceived sustainability), the motivations might have shifted toward extrinsic ones (e.g. economic benefits) (HAMARI; SJÖKLINT; UKKONEN, 2016). Another research has showed that cost savings, familiarity, trust and utility are the most important determinants to explain the satisfaction with carsharing service and temporary accommodations (MÖHLMANN, 2015).

Surprisingly, recent empirical research contributions did not consider different types of collaborative consumption. These articles have discussed the motivators for CC in specific service contexts (EFTHYMIU; ANTONIOU; WADDELL, 2013; HAMARI; SJÖKLINT; UKKONEN, 2016; BARNES; MATTSSON, 2017) or comparing two contexts (MÖHLMANN, 2015). Our article wants to fill this empirical study gap about the determinants of different types of CC. Specifically, we set out with two objectives: our first goal is to investigate the determinants to explain the satisfaction with different types of collaborative consumption. Our second goal is to analyze the

determinants to explain the intention to recommend different types of collaborative consumption.

This study contributes to the CC literature in two ways. First, in contrast to past research, which has generally considered one type of collaborative consumption (e.g., carsharing), this research recognizes CC as a multi-dimensional construct which is applied in different sectors such as goods reselling, books lending and cohousing.

Second, there was a finding that collaborative consumption has positive effects on lower-income consumers and may democratize access to a higher standard of living (SANTOSO; ERDAKA, 2015). However, collaborative consumption research still lack of quantitative studies from developing country that has lower-income citizens such as Brazil (ARRUDA et al., 2016). Furthermore, while Brazil has the biggest economy in Latin America, Brazil faces challenges in reducing the dichotomy between economic development and environmental and social concerns (ABREU et al., 2015). In this sense, this article aims to fill this academic gap.

COLLABORATIVE CONSUMPTION

Defining collaborative consumption is not a simple task, as the various research studies do not agree on a common definition (see BELK, 2010; ARNOULD; ROSE, 2015; BELK, 2016). Botsman and Rogers (2010), the authors of the seminal book 'What's Mine is Yours', define CC as the "traditional sharing, bartering, lending, trading, renting, gifting, and swapping redefined through technology and peer communities". According to Barnes and Mattson (2017, p. 1), information technology is a key factor underpinning collaborative consumption. Instead they suggest that CC is "the use of online marketplaces and social networking technologies to facilitate peer-to-peer sharing of resources (such as space, money, goods, skills and services) between individuals, who may be both suppliers and consumers". In Belk's (2014, p. 1597) perspective, Botsman and Rogers' definition is broad and mixes marketplace exchange, gift giving, and sharing. He suggests that "collaborative consumption is people coordinating the acquisition and distribution of a resource for a fee or other compensation".

In spite of differences in wording, all definitions embrace the environmental component and reflect the main aspect of CC: the importance of access and share, instead of ownership, to products and services thereby benefiting people, profit and planet (BOTSCHAN; ROGERS, 2010). In sharing, two or more people may enjoy the benefits and costs that flow from possessing a thing (BELK, 2007), and includes joint ownership, voluntary lending and borrowing, pooling and allocation of resources and authorized use of public property. Instead CC excludes sharing activities where no compensation is involved, as well as gift giving that constitutes a permanent transfer of ownership (MÖHLMANN, 2015).

TYPES OF COLLABORATIVE CONSUMPTION

Many types of collaborative services have been growing rapidly, with or without local government support, due to improved information and communication technologies have made them possible at scale (BELK, 2014; RIVERA et al., 2016). In spite of the recent business and academic interest, collaborative business models have existed for decades (BOTSMAN; ROGERS, 2010). For instance, first-generation bikesharing models emerged in the 1960s in Amsterdam and as of December 2013, there were nearly 700 programs in cities around the globe (COHEN; KIETZMANN, 2014). Nowadays, business models are emerging that apply social networking technologies to further share goods and services such as cars, bikes, apparel, equipment, tools, residential spaces, money, skills and expertise (BOTSMAN; ROGERS, 2010).

Carpooling is associated with vehicle owners allowing other passengers to ride in the same vehicle to and from the same or similar destinations. The majority of carpooling schemes are not associated with drivers seeking to profit, but rather supporting the subsidizing of the vehicle owner's costs while contributing to reduced traffic congestion and pollution (COHEN; KIETZMANN, 2014).

The most active market for collaborative consumption is car sharing, an area of sharing with potentially high economic and environmental benefits (BARNES; MATTSSON, 2017). At their core, all carsharing business models seek to reduce the need for individual ownership of personal vehicles (SHAHEEN; COHEN, 2007). While most carsharing schemes are for-profit, carsharing companies are often dependent on support of local governments to provide incentives related to parking, discounts on tolls, and access to designated high-occupancy vehicle lanes (COHEN; KIETZMANN, 2014).

Despite the growing global motorization, bikesharing systems' demand is continuously increasing. These systems combine the advantages of bike usage, such as low cost, autonomy, flexibility, accessibility and health benefits, with the advantages of renting (as opposed to owning) (EFTHYMIOU et al., 2013). Most bikesharing programs have some membership fees as well as usage fees. In some cases bikesharing programs are only accessible to local residents whereas in other cities, the service is available to visitors and residents alike (COHEN; KIETZMANN, 2014).

Many CC practices are evidenced in Brazilian context. The examples span the sectors of consumer goods (general goods reselling, kids' stuff reselling and books lending), residential/tourism (cohousing and P2P accommodations) and transport (P2P rental car, bikesharing, carsharing and carpooling) (Table 1). These CC practices were chosen because they are recurrently mentioned in studies about collaborative consumption and sharing economy but this compilation does not present an exhaustive list of existing practices in Brazil.

TABLE 1
Collaborative consumption practices evidenced in Brazil

CC platform		Sector	Website
Name	CC practice		
OLX	General goods reselling		olx.com.br
Mercado Livre	General goods reselling	Consumer goods	mercadolivre.com.br
Ficou Pequeno	Kids' stuff reselling		ficoupequeno.com
Tempresto	Books lending		tempresto.com.br
EazyCity Cork	Cohousing	Residential/ Tourism	eazycork.com
Airbnb	P2P accommodation		airbnb.com
Parpe	P2P rental car		parpe.com.br
Mobilicidade	Bikesharing		mobilicidade.com.br
Bicicletar	Bikesharing	Mobility	bicicletar.com.br
Vamo Fortaleza	Carsharing		vamofortaleza.com
Blablacar	Carpooling		blablacar.com.br

The authors (2018)

Many types of bikesharing business models are developed in Brazil. The main business model evidenced is the Sponsorship-Based Bikesharing. In some cases, sponsorship-based models are publicly owned and managed by a third-party operator whereas in others, a private company gains sponsor support for implementing a local bikesharing project (COHEN; KIETZMANN, 2014). Bicicletar and Mobilicidade follow the second sponsorship-based model. A health insurance company is the title sponsor of Bicicletar bikesharing system in Fortaleza – the fifth biggest Brazilian city – and a bank is the main sponsor of Mobilicidade, the major bikesharing initiative in Brazil. Over than 1 million people have already downloaded Mobilicidade's app.

RESEARCH MODEL AND HYPOTHESES

Our research model (Figure 1) illustrates the determinants of satisfaction and intention to recommend CC. We propose six possible and distinguishable categories in which the forthcoming hypotheses are developed, namely economic benefits, environmental benefits, trust, enjoyment, utility, and familiarity.

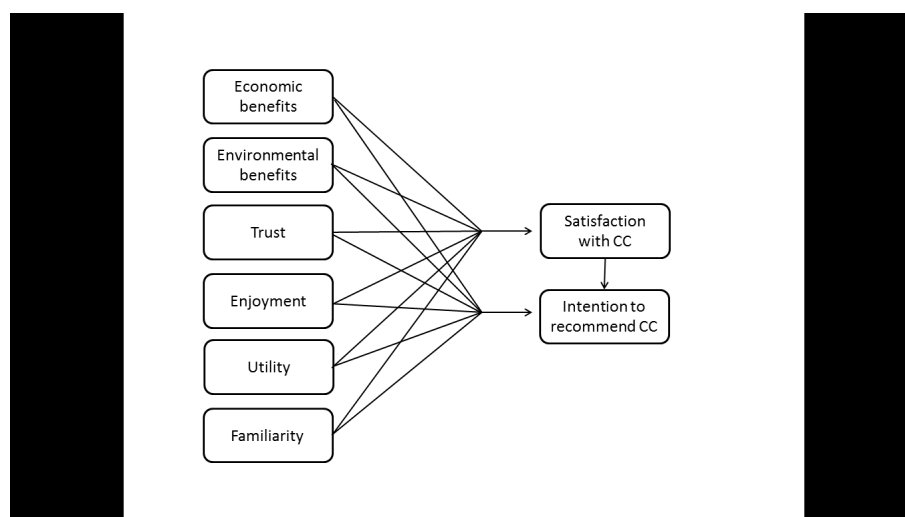


FIGURE 1
Research Model
The authors (2018).

The economic benefit of collaborative consumption is the most dominant factor in discussions about CC (BARNES; MATTSSON, 2017). Pedersen and Netter (2013) find that key benefit of CC in fashion libraries is the opportunity to experiment with styles and looks without having to pay full price. Santoso and Erdaka (2015) explored a collaborative consumption system (product-service system from babyloania.com) and concluded that perceived value for saving costs is the significant measurement factors of first time CC experience and affect customer loyalty. Recent studies also show that carsharing and perceived economic benefits are associated (BARDHI; ECKHARDT, 2012; SCHAEFERS, 2013; SHAHEEN; COHEN, 2007; SHAHEEN et al., 2012).

Möhlmann (2015) proposed a framework on the determinants of choosing a sharing option and tested with two quantitative studies. In study 1, users of the B2C car sharing service car2go, and in study 2, users of the C2C online community accommodation marketplace Airbnb are surveyed. The results reveal that cost savings is positive related with the satisfaction and the likelihood of choosing a sharing option again in both studies. Hamari, Sjöklint and Ukkonen (2016), in turn, investigated people's motivations to participate in CC. The data were collected from 168 registered users of the service Sharetribe who were recruited via an official Sharetribe – an international CC hub that offers its service package to various organizations – e-mail newsletter. The results showed that participation in CC is motivated by many factors such as economic gains. Tussyadiah (2015) also supported the conclusion that economic benefits can be a motivator for CC. We therefore posit that:

H1a. Perceived economic benefits will be positively associated with satisfaction with CC.

H1b. Perceived economic benefits will be positively associated with intention to recommend CC.

Sharing solutions are generally considered to have more environmental benefits compared with nonsharing solutions because the combining of material goods leads to the increased intensity in the usage of one single product entity (MÖHLMANN, 2015). According to Botsman and Rogers (2011), sustainability is often an unintended consequence of CC, because the initial motivations may not be about “being green”.

Collaborative consumption has been regarded as a type of consumption that engages especially environmentally and ecologically conscious consumers (HAMARI; SJÖKLINT; UKKONEN, 2016) and collaborative customers even willing to choose more costly but environmentally-friendly alternatives (COSTAIN et al., 2012). On the other hand, Hamari, Sjöklin and Ukkonen (2016) concluded that environmental benefits are important determinants to share intentions, but economic benefits are a stronger motivator for intentions to participate in CC. Schaefers (2013, p. 75) found that “environmental friendliness of carsharing was welcomed as a positive side-effect, but not as a dominant motive”. Thus, it is hypothesized that:

H2a. Perceived environmental benefits will be positively associated with satisfaction with CC.

H2b. Perceived environmental benefits will be positively associated with intention to recommend CC.

CC models often involve the interaction of individuals who have never met or may never meet, which has led many researchers to turn their attention to the concept of trust (HUBER, 2016; PISCICELLI et al., 2014; ROSEN et al., 2011). This driver is one of the most important determinants of CC satisfaction (BOTSMAN; ROGERS, 2010; CHAN; SHAHEEN, 2012) and refers to trust in the provider of a collaborative consumption service and to the other consumers one is sharing with (MÖHLMANN, 2015; BENOIT et al., 2017).

The analysis of the case of Ecomodo, a UK-based online marketplace through which people can lend and borrow each other's objects, spaces and skills either free of charge or for a small fee, concluded that “building trust is essential for the sharing economy to thrive and, perhaps, serve as an engine for rediscovering neighborhoods and local communities” (PISCICELLI et al., 2014, p. 7). Möhlmann (2015) concluded that trust is an essential determinant of the satisfaction with a CC in carsharing and C2C accommodation marketplace contexts. She argued that “managers need to make sure that trust building measures are implemented and communicated to respective stakeholders”. Lamberton (2016) affirms that understanding trust is likely to be an integral part of understanding collaboration, but its means of attainment may differ dramatically. In this sense, we investigate the relationship between the trust and CC.

H3a. Trust will be positively associated with satisfaction with CC.

H3b. Trust will be positively associated with intention to recommend CC.

Another fundamental dimension of CC motivation is the nature of the enjoyment derived from the activity itself. There are two kinds of

intrinsic motivations: enjoyment derived from the activity itself and value derived from acting appropriately – that is, conforming to norms (LINDENBERG, 2001). Enjoyment has been regarded as an important factor also in other sharing-related activities, such as information system use and information sharing on the Internet (NOV, 2007; NOV et al., 2010).

Some people might take part in CC simply because it is fun and provides a meaningful way to interact with other members of the community. Social networking services and similar service design used elsewhere can be seen to especially promote relatedness which is a major determinant for intrinsically motivated use such as enjoyment (HAMARI; SJÖKLINT; UKKONEN, 2016). We therefore posit that:

H4a. Enjoyment will be positively associated with satisfaction with CC.

H4b. Enjoyment will be positively associated with intention to recommend CC.

Many researchers have discussed that utility influences an individual's consumption decisions and habits, including in collaborative consumption contexts. Henning-Thurau et al. (2007) find utility to be a significant factor to conduct illegal file sharing. Pedersen and Netter (2013) concluded that CC in fashion libraries can't stay open long if the clothes available are not attractive to its members. Thus, fashion libraries may benefit from upgrading their collections, e.g. through partnerships with fashion brands or small designers, in order to create more value for members.

In fact, Möhlmann (2015) found that utility has a positive effect on the satisfaction with a sharing option and positive effect on the likelihood of choosing a sharing option again. This leads to the following hypotheses:

H5a. Utility will be positively associated with satisfaction with CC.

H5b. Utility will be positively associated with intention to recommend CC.

The last determinant in the framework refers to the familiarity with a CC option. When consuming a certain product or service, consumers incur transaction costs. Some consumers might be reluctant to use a service for the first time, because they do not have any experience with it (MOELLER; WITTKOWSKI, 2010). In other words, they do not have sharing knowledge (HENNING-THURAU et al., 2007).

For instance, a high familiarity with sharing services might help users to minimize these transaction costs Möhlmann (2015). Therefore, familiarity might be a relevant determinant of the satisfaction and further usage of sharing options. It is hypothesized:

H6a. Familiarity will be positively associated with satisfaction with CC.

H6b. Familiarity will be positively associated with intention to recommend CC.

In this study, all six determinants are conceptualized to have an effect on the satisfaction with CC and on the intention to recommend CC. In spite of the recent study which concluded that satisfaction with sharing

option have not a positive effect on the likelihood of using a sharing option (MÖHLMANN, 2015), many studies concluded that when customer satisfaction toward a product or service is equivalent or greater than customer expectation, the customer might continue purchasing the product and recommend the product to others, including green products (ECKHARDT et al., 2010; FOLLOWS; JOBBER, 2000). This leads to hypothesize the following:

H7. Satisfaction with CC will be positively associated with intention to recommend CC.

After discussing the hypotheses of this study, the methodological procedures will be described.

METHODOLOGY

The research reported in this paper is quantitative, descriptive and exploratory in nature and was performed using an online survey. The data consist of responses obtained from 431 collaborative consumers from Brazil. In this research, we focused in not only one or two types of CC, but we investigated these kind of collaborative consumers in Brazil: carsharing, bikesharing, general goods reselling, kids' stuff reselling, books lending, cohousing, P2P accommodation, P2P rental car and carpooling. Thus, all the respondents consume at least one of these types of CC.

We employed the electronic form, using the GoogleDocs tool to assemble the questionnaire. The Google Forms offering was selected to develop and host our survey, because it provides the facilities for various types of questions and also offers a back-end that tabulates the responses into a spreadsheet. Furthermore, summary statistics of the results are also presented. The form was disseminated through various channels, including social media (such as Facebook) and student lists at Federal do Ceará University (Brazil) as well as personal contacts of the authors. The responses were gathered in July 2017. The characteristics of the final sample are shown in Table 2.

Over half of the sample was female (57.9%). The majority of the sample was composed of university students aged between 18 and 25 years. If the respondent consumes more than one type of CC, he/she should choose the preferred collaborative product or service. General goods reselling is the most frequently type of CC used by the respondents (33.5%).

TABLE 2
Sample profile

Variable	Specification	Frequency (%)
Gender	Male	42.1
	Female	57.9
Age	18-25	50.2
	26-35	27.8
	36-45	11.4
	46-55	7.1
	56 and older	3.5
	High school (non-graduate) or below	0.8
Education (highest degree)	High school graduate	2.5
	University student	58.9
	Bachelor's degree	24.5
	Master's degree	7.9
	Doctoral degree	5.4
	General goods reselling	33.5
Most frequently used type of CC	P2P accommodation	17.5
	Cohousing	3.8
	Carsharing	4.7
	Bikesharing	18.5
	Kids' stuff reselling	2.5
	Books lending	2.9
	P2P rental car	7.6
	Carpooling	9

The authors. (2018)

The survey was delivered to respondents in Portuguese. The survey content was first created in English, then translated into Portuguese by natives and back-translated into English to ensure accuracy and consistency of meaning between languages. We measured each construct with three, four or five items that were all on a 7-point Likert scale. All items were adapted from existing prominent published sources (VAN DER HEIJDEN, 2004; BOCK et al., 2005; CHAI et al., 2012; LAMBERTON; ROSE, 2012; MÖHLMANN, 2015; HAMARI; SJÖKLINT; UKKONEN, 2016). The English version of the scale items are shown in next section.

The primary analytical technique was Structural Equation Modeling (SEM). This technique provides the possibility to run multivariate, multilevel path analyses and, thus, permits more complex models than traditional regression analyses. For instance, path modeling provides a powerful tool to investigate both direct and mediated effects (Hair et al., 2010). Furthermore, SEM analyses are the primary technique when using latent psychometric variables. The descriptive demographic data were analyzed in SPSS 22, and all of the model testing was conducted through partial least squares (PLS) analysis with SmartPLS 2.0 M3.

RESULTS

Initially, we tested convergent validity with three metrics: average variance extracted (AVE), composite reliability (CR), and cronbach's alpha. All of these values were acceptable (see Table 3). According to Nunnally (1978), AVE should be greater than 0.5, CR greater than 0.7, and Cronbach's alpha above 0.8.

The construct Enjoyment had a slightly smaller alpha than recommended; however, the other validity metrics were good and the lower alpha is not likely to point to a validity issue. The construct passed all of the validity and reliability tests. Discriminant validity was first assessed by a comparison of the square root of the AVE of each construct to all correlations between it and other constructs, where all of the square roots of the AVEs should be greater than any of the correlations between the corresponding construct and another construct (CHIN, 1998).

Second, we assessed discriminant validity by confirming that all items corresponding to a specific construct had a higher loading with the appropriate construct than with any other construct (HAIR et al., 2013). Third, following Nunnally (1978), we determined that no intercorrelation between constructs was more than 0.9 in the correlation matrix.

TABLE 3
Convergent and discriminant validity

	AVE	CR	Alpha	SAT	INT	ECO	ENV	TRU	ENJO	UTI	FAM
SAT	0.629	0.841	0.839	0.823							
INT	0.733	0.873	0.881	0.753	0.857						
ECO	0.812	0.916	0.904	0.793	0.682	0.814					
ENV	0.653	0.782	0.847	0.674	0.623	0.549	0.779				
TRU	0.755	0.832	0.869	0.812	0.583	0.612	0.423	0.854			
ENJ	0.721	0.871	0.713	0.736	0.723	0.592	0.498	0.404	0.780		
UTI	0.820	0.914	0.847	0.772	0.563	0.683	0.512	0.423	0.420	0.869	
FAM	0.783	0.887	0.891	0.750	0.592	0.583	0.523	0.512	0.475	0.398	0.854

The authors (2018).

All three tests indicate that the discriminant validity and reliability are acceptable. Lastly, we randomized the order of the measurement items in the survey, limiting respondents' ability to detect patterns between measurement items and reducing the likelihood of common method bias (HAIR et al., 2010).

The analysis reveals that the, among the drivers, two determinants – economic benefits and utility – had positive effect on satisfaction with collaborative consumption and intention to recommend collaborative consumption at the same time. In other hand, environmental benefits perceived had no significant effect neither on the satisfaction with CC nor on intention to recommend CC variable. The results are summarized in Table 4 and Figure 2.

TABLE 4
Results of the structural model

Hypothesis	Path coefficients	Support
H1a: Economic benefits → Satisfaction with CC	0.38***	Yes
H1b: Economic benefits → Intention to recommend CC	0.27***	Yes
H2a: Environmental benefits → Satisfaction with CC	0.03 n.s.	No
H2b: Environmental benefits → Intention to recommend CC	-0.09 n.s.	No
H3a: Trust → Satisfaction with CC	0.13*	Yes
H3b: Trust → Intention to recommend CC	0.02 n.s.	No
H4a: Enjoyment → Satisfaction with CC	0.16*	Yes
H4b: Enjoyment → Intention to recommend CC	0.08 n.s.	No
H5a: Utility → Satisfaction with CC	0.24***	Yes
H5b: Utility → Intention to recommend CC	0.17*	Yes
H6a: Familiarity → Satisfaction with CC	0.13*	Yes
H6b: Familiarity → Intention to recommend CC	0.01 n.s.	No
H7: Satisfaction with CC → Intention to recommend CC	0.28***	Yes

*p < .05; **p < .01; ***p < .001; n.s., not significant; SmartPLS bootstrapping: 5000 iterations.
The authors (2018)

In support of hypotheses 1a and 1b, the data reveals economic benefits to have a positive and significant effect on the satisfaction with CC (.38***) and intention to recommend CC (.27***). Hypotheses 2a and 2b are rejected because it did not receive statistical support from the data. A significant path coefficient was estimated from trust on the satisfaction with CC (.13*) in line with hypothesis 3a, but hypothesis 3b was not confirmed by the data.

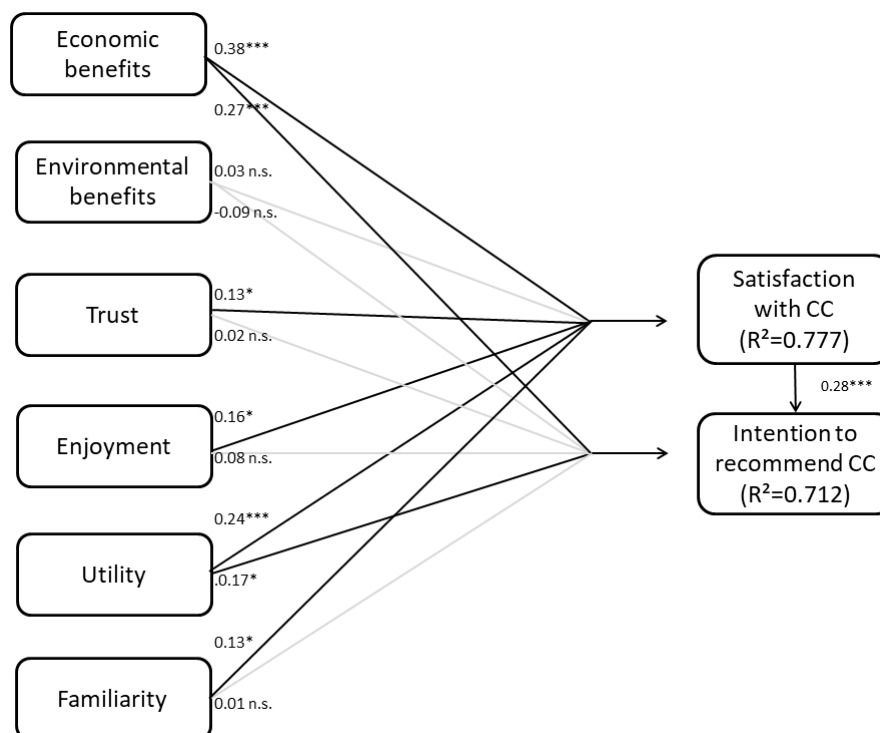


FIGURE 2
Results of the PLS analysis
The authors (2018).

In support of hypothesis 4a and rejection of hypothesis 4b, the data reveals enjoyment to have a positive and significant effect on the satisfaction with CC (.16*) but no significant effect on the intention to recommend CC. The important role of utility as hypothesized in 5a and 5b can be confirmed because a highly significant and positive effect was estimated on the satisfaction with a sharing option (.24***) variable and intention to recommend (.17*). Hypothesis 6a is supported by the data because a significant path coefficient was estimated from familiarity on the satisfaction with CC (.13*) variable. However, hypothesis 6b did not receive statistical support. Finally, a significant effect was estimated from the satisfaction with CC on the intention to recommend collaborative consumption (0.28***). Thus, hypotheses 7 receive statistical support.

The coefficient of determination ($R^2 = .777$) of the variable satisfaction with CC indicates that more than two thirds of the variable's variance (77%) can be explained by its predictors. All predictors of intention to recommend CC construct explain about almost two thirds of the variable ($R^2 = .712$). These R^2 values indicate that a high percentage of the endogenous variable variances are explained. Thus, one can argue that the model is well conceptualized.

DISCUSSION AND CONCLUSIONS

The growing sharing economy promises to bring about a radical change in consumer purchasing and consumption, both online and offline,

potentially presenting a phenomenon as important to economies in the coming decade as e-commerce was during the last decade. In an effort to better understand collaborative consumption, this paper has developed and tested an original model for explaining consumer outcomes. The model has nomological validity, explaining 77.7% of the variance of satisfaction with CC and 71.2% of intention to recommend CC. The model also displayed acceptable reliability, validity and goodness of fit using the measures employed.

The motivators for collaborative consumption are both intrinsic and extrinsic. Based on our results model, economic benefits and utility are the key motivators for these consumers. That is, collaborative consumers are not very concerned about the environmental impacts, appear very independently-minded and opportunistic, and do not feel the impact of social influence upon their activities. This is perhaps in line with recent studies (BARDHI; ECKHARDT'S, 2012; BARNES; MATTSSON, 2017) which concluded that car sharing appears to be associated with self-interest and utilitarianism.

Consumers feel part collaborative communities, adding to a feeling of enjoyment and a desire to use share products and tell others about it. Concurrently, consumers perceive significant benefits from sharing activities, spearheaded by economic benefits, with social and environmental benefits playing a significant but less important role (and depending particularly on consumers' disposition regarding sharing and green behavior). Paradoxically, they also do not consider trust to be a particular consideration for using the platforms themselves, but think that it is an important requisite for recommending the site to others.

Our model makes a contribution to the emergent stream of literature on the sharing economy as well as mainstream literature on consumer behavior. To our knowledge, this is the first study to formally test the drivers of CC considering more than three kinds of collaborative practices. Our study also uses data from real consumers and finds support for this relationship. Thus, we make a contribution by discovering the important role of utility perceived in carrying forward different types of perceived benefits to determine recommendation and sharing satisfaction. The final research model provides a comprehensive coverage of intrinsic and extrinsic factors to understand consumer behavior in a collaborative consumption context.

Our research has implications for practice and points to areas of development for collaborative consumption in order to build communities of loyal followers via word-of-mouth in Brazil. The pattern of determinants that works for the in order to create successful collaborative consumption websites developers should aim to build cohesive communities of consumers that have an affinity with the nature of the sharing activities and each other. Cohesive communities of sharers will not only create social benefits but also engender a sense of belonging that contributes to creating an enjoyable experience. Marketing to the right groups is essential: price-conscious individuals that are active

sharers and users of social media, who are not necessarily environmental conscience.

For Brazilian managers of B2C and C2C collaborative consumption services, the results of this paper offer important insights with high relevance for the acquisition but also retention of customers. Different stakeholder groups can be addressed more adequately when marketing the determinants identified in this study in a targeted way. Managers of B2C and C2C services should adapt their market activities to respond to the fact that rational and self-centered determinants were found to be essential including utility, cost savings, and familiarity. Furthermore, managers need to make sure that trust building measures are implemented and communicated to respective stakeholders

In order to create word-of-mouth about collaborative consumption websites, managers should also focus upon building mechanisms that create trust. Such structural assurance mechanisms include those that ensure that problems of adverse selection, which inhibit the building of critical mass, do not occur. These include providing the legal framework and policies that fairly manage transactions and resource use, secure payment mechanisms and protection, appropriate insurance policies, helpful and accurate review and reputation systems, user identification and tracking (including audit), and the flagging of problem users. Furthermore, the service should be pleasurable to use because enjoyment is an important motivator. The problem of free-riders can be alleviated using trust systems or gamification, or even by employing stricter resource allocation mechanisms that enforce contribution and not just consumption.

Finally, there are limitations of this study that need to be discussed. First, this research solely assessed the strength of different determinants on two endogenous variables but not the interrelations between these determinants. Future research might address more comprehensive research questions on such interdependencies. Second, only satisfaction and intention to recommend CC were investigated but not actual behavior. Further research might test this in longitudinal studies or with experimental designs. Finally, it is important to keep in mind that this study were conducted among users of sharing services. Determinants of usage or nonusage might differ to nonusers of sharing services.

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