

# The Creation of the Beerscape Evaluation Model

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**Undergraduate thesis / Završni rad**

**2020**

*Degree Grantor / Ustanova koja je dodijelila akademski / stručni stupanj:* **RIT Croatia / RIT Croatia**

*Permanent link / Trajna poveznica:* <https://um.nsk.hr/um:nbn:hr:229:685750>

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*Download date / Datum preuzimanja:* **2021-03-07**

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Senior Project

## **The Creation of the Beerscape Evaluation Model**

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Spring Semester 2020

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## ABSTRACT

Although craft beer movement started almost fifty years ago in the USA and UK, independent breweries that produce small quantities of beer of special flavor and quality in a proprietary production process, known as craft breweries, are still emerging businesses in Croatia and the neighboring countries.

This paper investigates the beerscape of such breweries based on Tripadvisor reviews and proposes a new model of their evaluation. The model consists of six measurable factors taken from the wine sector and an additional one – electronic word-of-mouth. After further testing, it could find general application in the beer industry and even in the wider hospitality industry leading to a rather elegant model of servicescape management.

*Key words: craft beer, craft breweries, winescape, beerscape, evaluation model*

## INTRODUCTION

### *Craft beer and craft beer breweries*

Craft beer is beer produced in a small, independently owned breweries. It is generally characterized by the artisan brewing technique, exceptional quality and particular flavor.

The craft beer movement started in the U.S. and UK in 1970s and has since then spread to other countries (Brewers Association, 2019). In Croatia and the neighboring countries craft breweries are still in an early phase of business development as opposed to wine businesses, which are well developed. However, they are starting to contribute to tourist offer.

Craft breweries are a tourist magnet because they are mostly small, privately owned establishments, closely involved with the community by forming a special communication with the customers and providing them with a unique experience. They often have a mission, are fiercely independent and keep their unique ways of operating and preserving their core values (Brewers Association, 2019).

### *Craft beer in the USA*

In the USA, the sales volume growth in 2018 for craft beer was 3.9%. The overall beer market presently stands at \$114.2B while craft beer market makes \$27.6B (24%). The craft beer market segment is further divided between the regional craft breweries (70.0%) and microbreweries (22.5%) which are the biggest drivers of the craft beer movement. The rest is divided between brewpubs (6.3%) and contract brewing companies (1.2%). The number of microbreweries rose from 2,076 in 2014 to 4,522 in 2018 (Brewers Association, 2019).

### *Craft beer in Croatia*

In Croatia craft beer movement started around 2013 with three breweries. Shortly after, several bars specialized in craft beer were opened. At that point, craft brewers started to initiate people into their culture thus changing their mindset to perceive craft beer as a delicacy, similar to wine. Currently, there are more than 50 craft breweries in Croatia (Jakopović, 2019).

Today the craft beer market in Croatia is worth around 50M HRK (cca \$7M) and craft beer is present in most retail stores as well as in bars. As a result, consumers have recognized the authentic product, its value and the story behind it. This is the main point in the craft beer philosophy (Ražnatović, 2019). This new mindset has been reinforced by the Croatian association called “Grupacija malih nezavisnih pivovara (Group of Small Independent Breweries)” dedicated to raising awareness about beers brewed in microbreweries to be seen as an authentic product (Nova Runda, 2019). Another great contribution has come from ramified gastronomy events where craft beer tends to be promoted as an essential element of the trendy food experience (Bujdosó & Szűcs, 2012).

### *Craft beer and tourism*

Craft beer is a good example how new globally reaching trends bring something new to the hospitality industry as a whole. Customer awareness and knowledge are influenced by globalization and technological advancement, which very much change the business landscape (Murray & O'Neill, 2012). Craft beer has become an important reason to travel for many people interested in gastronomy. According to Bujdosó & Szűcs (2012) and Brewers Association (2019), there are two segments of beer tourism. The first concerns the people undertaking a travel primarily because of beer (which includes beer routes, beer weekends, beer themed lunches, beer tastings, etc.) and the second is marked by beer as the secondary source of motivation for traveling to a

certain destination (beer festivals and events, beer museums, visiting breweries and brew houses, obtaining beer-related products, etc.). In this fashion, craft beer has made a great impact on the travel industry in the past few years.

Another important influence on travel, which has been around for much longer, concerns wine, which has given rise to a long-established and well-recognized business with a set customer base. Due to the similarity of wine and beer-related experiences (e.g. beer tasting and wine tasting, brewery and winery visits, etc.) and deficient research on beer experiences conducted to date, it makes sense to start the beer servicescape evaluation model research by borrowing the main experiential elements from the research done on wine.

#### *Servicescape and customer experience*

Numerous studies performed in different service settings have shown that servicescapes influence customers' emotions as well as their satisfaction and loyalty (Wakefield & Blodgett, 2016).

Servicescape can be seen as a physical environment of the venue that has an effect on both customer and employee behavior and should be designed in harmony with the concept of the service that is being provided. It involves many elements such as typology, behavior, environmental dimensions, facility design and layout, etc. (Fitzsimmons & Fitzsimmons, 2004).

Pine and Gilmore (1999) reported that this engaging aspect can be linked to creating a positive, personalized experience for visitors, and explain how the sensory aspects are a simple way to contribute to the experiential quality of a service. Furthermore, according to Bitner (1992) there are three dimensions of servicescape which are identified as:

- ambient conditions (i.e. temperature, music, smell, etc.),

- spatial layout and functionality (i.e. organization of furniture and the benefits they give to the customer), and
- signs, symbols, and artefacts (i.e. decorations and signage which are used to communicate a certain image of the venue to the customer).

Since services have a relatively short duration and customers stay in a certain venue for a limited amount of time, their perception of service quality is based on two elements. The first one relies on intangible factors like responsiveness, reliability, empathy and other (Zeithaml, Berry, & Parasuraman, 1988), while the second element is based on tangible factors such as physical facilities (Bitner, 1992). This is also supported by the fact that, throughout their visit, customers constantly observe everything inside the facility on conscious and subconscious levels, which has a large impact on their attitude towards the place (Wakefield & Blodgett, 1996).

#### *The importance of tap room experience*

A huge part of an in-brewery experience comes from the tap room (a room/bar, generally in the brewery, where beer is available on tap) which helps create an authentic experience and thus the identity of each brewery. The tap room in the hospitality context works as a very influential supporting service, which can add value to the core service, in this case the beer (Kandampully, 2007). It is a useful marketing tool for a brewery to present itself to customers or potential buyers of its products and provide them with information about their brewing philosophy. The highest priority of tap room staff members is to make the customer enjoy the visit. Furthermore, staff members must be willing to form a personalized experience for the customer through education or discussion about the brewery's products and values. This is mostly done through communication between the staff and the customers. These experiences are monetized relatively easily and thus

provide a great revenue stream, since people are willing to be immersed in an authentic experience and make their purchase there, rather than anywhere else (Talpos, 2016).

### *Brewery experience*

There are three main aspects of a brewery experience. These are sensory aspects, the esthetics of the brewery and the concept of traversing. Of the sensory aspects, we consider tastes, smells and sounds like the smell of the malts and hops, different fermenting sounds and the sound of the chilling machinery, which are found as engaging to the visitors. Design, organization, atmosphere and other elements are all considered as the esthetics of a brewery and by that a part of the beerscape. Different elements of the esthetics of the brewery form a part of the atmosphere for the customers and a special, individualized experience. The concept of traversing is another important element of the brewery experience. The customer moving through the brewery, taking pictures, and exploring different elements, along with the brewery's sensory aspects, design and atmosphere have been reported to largely contribute to the overall experience (Talpos, 2016).

### *From winescape to beerscape*

Winescape can be described as visiting a winery and considering all of its aspects rather than the wine itself (Alant & Bruwer, 2010). The winescape setting can be defined as the area around the winery like the vineyards, nature and the general winery surroundings (Thomas, Quintal, & Phau, 2010).

Unlike winescape, the term beerscape has not yet been in common use and has not yet been defined by a set of attributes. Therefore, we decided to borrow the winescape attributes to determine the quality of a certain beer venue. According to Quintal et al. (2015), there are seven basic winescape elements:

- (1) setting,

- (2) atmospherics,
- (3) wine quality,
- (4) wine value,
- (5) wine complementary product,
- (6) signage, and
- (7) wine service staff.

All of the above attributes can be, at least theoretically, applied to beerscape.

**Setting and atmospherics:** Setting-wise, the brewery concept is different from that of winery, as breweries are usually situated in a town, where the surroundings can be bleak and not very attractive or relevant. That is why breweries focus more on the interior design of the venue, i.e. atmospherics, which is the second important winescape attribute. It refers to the features and qualities of the interior space design and decorations.

Since setting is not as important for the beerscape as for the winescape, we decided not to consider it as a beerscape attribute in our research. Thus for the beerscape the atmospherics is likely going to be a major factor as far as the tourists' attitude to the winery/brewery and their overall experience are concerned.

**Quality:** The wine quality can be defined as the quality of the wine produced in the winery and its delivery to the customer (Thomas, Quintal, & Phau, 2010). This can very well apply to the beerscape because craft breweries greatly care about their products and the ideology of production.

**Value:** Wine value can be seen as a value of the wine produced in the winery (in terms of price) (Thomas, Quintal, & Phau, 2010). The same perception of value holds for beer.

**Complementary product:** Complementary products of the winescape can be seen as a variety of supporting services, like dining, accommodation, entertainment and other that could enhance the customer's experience (Thomas, Quintal, & Phau, 2010). Breweries also usually offer dining and entertainment services which complement the core service and provide benefits for the customer.

**Signage:** Winescape signage can be seen as organizing customers' visit to an extent that they understand their role and additionally, as building a brand image for the winery (Thomas, Quintal, & Phau, 2010). The same is true of the breweries.

**Service staff:** The role of the service staff can be crucial in providing customers with the knowledge and in interacting with them in a way to satisfy their expectations while visiting. The winescape service staff can be conceptualized as the knowledge and skills which employees need to have in order to fulfill and enhance the customers' expectations when visiting the winery (Thomas, Quintal, & Phau, 2010). Since craft beer is much less known to people than wine, staff working in the breweries need to be even more knowledgeable and willing to explain when communicating with the visitors in order for them to understand the whole story.

#### *Elements of beerscape*

Based on the above insights from the literature, we will analyze the attributes of beerscape. For that purpose, we modified the set of the winescape attributes by excluding the setting (as explained previously, unlike wineries, which are usually situated in a appealing natural settings, brewery concept is different and breweries are usually situated in towns, in not that attractive settings) and including the eWoM (electronic word-of-mouth) for the following reason.

In modern digital society, the impact of eWoM on customers' decision-making process is extremely important, especially in the hospitality industry. Through eWoM, new customers can

enhance their understanding of experiential attributes (i.e. beerscape) and reduce their purchasing risk. The eWoM can help restaurants build a positive image and increase customers' desire to purchase as well as stimulate their emotions leading them to contribute their own positive eWoM content (Hu & Kim, 2018).

In result, for the purpose of this research, the following beerscape attributes were chosen:

- (1) atmospherics,
- (2) beer quality,
- (3) beer value,
- (4) beer complementary product,
- (5) signage
- (6) beer service staff, and
- (7) eWoM.

It was our intention to test these attributes and see whether the analysis can result in a practical model of measuring the effectiveness of beerscapes.

#### *Research question*

Which are the most important attributes of a successful craft beer tap room experience leading to customer satisfaction?

## METHOD

As the literature review showed, the concept of beerscape has not been defined to date as an experience environment leading to successful tap room or beer serving operation. Consequently, the purpose of this research was to define the beerscape by finding out the crucial elements of the

customer experience, i.e. the tap room experience attributes. To do this, we decided to focus on the tap rooms of the breweries in Croatia and several neighboring countries. This focus stemmed from our interest in the craft beer industry, especially the regional one, and from the working experience in a tap room of the Dubrovnik Beer Company.

The literature review suggests that today craft beer is perceived as a delicacy, similar to wine. It also shows that, whereas winescape is well-defined in the literature, beerscape is still an abstract term waiting to be tackled. This is precisely the gap which we intended to cover with the primary research.

In seeking to apply an appropriate research method, we found out, by talking to winery and brewery owners, that wineries and breweries alike aimed to provide a similar guest experience. We then took seven winescape elements to test whether they were applicable to beerscape. We concluded that the setting was not as important for the beerscape as it was for the winescape, so we proceeded in the primary research with the following six beerscape attributes: atmospherics, quality, value, complementary product, signage, and service staff, also adding eWoM.

The primary research included 15 breweries in Croatia, Serbia, Slovenia, Bosnia and Herzegovina, and Montenegro. From the Tripadvisor pages of each of the selected 15 breweries, 15 reviews were randomly picked and evaluated based on the above mentioned seven experience attributes derived from the winescape and applied to the beerscape. A total of 167 Tripadvisor reviews of the tap rooms available in the period from 10 to 25 November 2019 were analyzed.

The randomization was based on the total number of reviews. For the breweries with more than a hundred reviews, every fifth was included in the analysis until the total set of 15 reviews was completed. For the breweries with the number of reviews between 30 and 100, every third or

second review was taken until the set of 15 reviews was formed. In the cases when the number of reviews was less than 30, the first 15 reviews were taken, or all of them, if less than 15 reviews were available.

The data collected were entered in the Excel spreadsheet in the order of observation. Each attribute mentioned in the review was assigned one point in the Excel spreadsheet. The attribute points were then summed up for each of the 15 tap rooms analyzed and hierarchically ranked.

In addition to that, from the reviews which were written in more detail, the key words were extracted describing a specific attribute which could later on be used to form a word cloud. Only positive key words were taken into account in order for a reader or a brewery owner to have a clear picture on the key elements to focus on or to serve as a clear set of guidelines for forming a beerscape. Through visualization, the word cloud helped us better understand the subtler aspects of the beerscape experience.

The eWoM attribute was determined quantitatively (i.e. total number of selected reviews per tap room, i.e. 167 for all 15 tap rooms), while the average for all breweries was not considered to be relevant for the purpose of this research. The number of reviews was used as a point of reference of the effectiveness of every beerscape, because the attribute was external to the tap room experience (i.e. the eWoM/reviews were left by customers on the external platform, i.e. Tripadvisor, and, in most cases, after the experience), whereas the other attributes were internal, i.e. experienced in the tap room. Consequently, the eWoM did not fall in the same ranking order as the other internal attributes, as they were measured by the frequency of mentions. However, by comparing the internal attribute (i.e. one of the six taken from the winescape) with the external

one (i.e. the number of selected eWoM), we were able to get an additional insight into the relative power of each attribute.

Finally, tap room coefficients were calculated based on the total number of all attribute mentions in relation to the total number of reviews per brewery/tap room on Tripadvisor. Those coefficients, which are reversely proportional to the total number of reviews, i.e. to the eWoM, could be considered as a measure of the customer's tap room experience.

Coefficients were firstly calculated for all the breweries' tap rooms. Since the number of reviews per brewery/tap room varied from more than six hundred to less than 15, in the second step the extremes were removed from the calculation and coefficients were calculated for the breweries with number of reviews between 131 and 15 only.

## RESULTS

The results of primary research for the first six beerscape attributes, i.e. atmospherics, beer quality, beer value, beer complementary product, signage, and service staff (167 Tripadvisor reviews for 15 breweries) are as follows:

**Dubrovnik Beer Company** from Dubrovnik, Croatia had enough reviews (131) allowing us a random choice of 15. Words falling in the attribute "atmospherics" were mentioned seven times. "Beer quality" had twelve mentions. "Beer value" had one mention. "Beer complementary product" had two mentions. "Signage" had no mentions. "Service staff" had ten mentions (Dubrovnik Beer Company, 2019)

**Pivnica Mlinarica** from Zagreb, Croatia had enough reviews (64) allowing us a random choice of 15. “Atmospherics” had nine mentions. “Beer quality” had five mentions. “Beer value” had four mentions. “Beer complementary product” had 13 mentions. “Signage” had three mentions. “Service staff” had ten mentions. (Pivnica Mlinarica, 2019)

**The Garden Brewery** from Zagreb, Croatia had enough reviews (55) allowing us a random choice of 15. “Atmospherics” had 14 mentions. “Beer quality” twelve mentions. “Beer value” had two mentions. “Beer complementary product” had eleven mentions. “Signage” had no mention. “Service staff” had three mentions. (The Garden Brewery, 2019)

**Mandrill Nano-Brewing CO.** from Split, Croatia had enough reviews (27) allowing us a random choice of 15. “Atmospherics” had six mentions. “Beer quality” had six mentions. “Beer value” had six mentions. “Beer complementary product” had five mentions. “Signage” had no mention. “Service staff” had eight mentions. (Mandrill Nano-Brewing CO., 2019)

**Bura Brew** from Poreč, Croatia did not have enough reviews (14) to allow a random choice of 15, so we took the available six (in English). “Atmospherics” had no mention. “Beer quality” had four mentions. “Beer value” was not mentioned. “Beer complementary product” had three mentions. “Signage” had no mention. “Service staff” had five mentions. (Bura Brew, 2019)

**Zmajska Pivovara** from Zagreb, Croatia did not have enough reviews (11) to allow a random choice of 15, so we took the available 11 reviews. “Atmospherics” had seven mentions. “Beer quality” had eight mentions. “Beer value” had two mentions. “Beer complementary product” has not been mentioned, neither has “Signage”. “Service staff” had four mentions. (Zmajska Pivovara, 2019)

**Tap B Craft Brewery & Brewpub** from Split, Croatia did not have enough reviews (11) to allow a random choice of 15, so we took the available nine (in English). “Atmospherics” had four mentions. “Beer quality” had seven mentions. “Beer value” had two mentions. “Beer complementary product” had one mention. “Signage” had no mention. “Service staff” had four mentions. (Tap B Craft Brewery & Brewpub Split, 2019)

**Mali Medo** from Zagreb, Croatia had enough reviews (623) allowing us a random choice of 15. “Atmospherics” had four mentions. “Beer quality” had five mentions. “Beer value” had one mention. “Beer complementary product” had eleven mentions. “Signage” had no mention. “Service staff” had eight mentions. (Mali Medo, 2019)

**Fakin Craft Bar** from Zagreb, Croatia did not have enough reviews (10) to allow a random choice of 15, so we took the available eight (in English). “Atmospherics” had one mention. “Beer quality” had two mentions. “Beer value” had one mention. “Beer complementary product” had five mentions. “Signage” had no mentions. “Service staff” had two mentions. (Fakin Craft Bar, 2019)

**Human Fish Brewery** from Vrhnika, Slovenia did not have enough reviews (12) to allow a random choice of 15, so we took the available ten (in English). “Atmospherics” had seven mentions. “Beer quality” had seven mentions. “Beer value” had no mention. “Beer complementary product” had one mention. “Signage” had no mention. “Service staff” had three mentions. (Human Fish Brewery, 2019)

**Pelicon Brewery** from Ajdovščina, Slovenia did not have enough reviews (four) to allow a random choice of 15, so we took the available four. “Atmospherics” had no mention. “Beer quality” had two mentions. “Beer value” had no mention. “Beer complementary product” had one mention. “Signage” had no mention. “Service staff” had four mentions. (Pelicon Brewery, 2019)

**Dogma Brewery** from Belgrade, Serbia had enough reviews (27) allowing us a random choice of 15. “Atmospherics” had seven mentions. “Beer quality” had eleven mentions. “Beer value” had one mention. “Beer complementary product” had three mentions. “Signage” had no mention. “Service staff” had eleven mentions. (Dogma Brewery, 2019)

**PG Akademija Piva** from Podgorica, Montenegro did not have enough reviews in English (13 vs total of 21) to allow a random choice of 15, so we took the available 13. “Atmospherics” had two mentions. “Beer quality” had eight mentions. “Beer value” had three mentions. “Beer complementary product” had nine mentions. “Signage” had no mention. “Service staff” had five mentions. (PG Akademija piva, 2019)

**Craft Beer Garden #imaimoze** from Mostar, Bosnia and Herzegovina did not have enough reviews (16) allowing us a random choice of 15, so we took the available 14 in English. “Atmospherics” had five mentions. “Beer quality” had seven mentions. “Beer value” had one mention. “Beer complementary product” had four mentions. “Signage” had one mention. “Service Staff” had seven mentions. (Craft Beer Garden #imaimoze, 2019)

**OldbridZ craft brewery** from Mostar, Bosnia and Herzegovina did not have enough reviews (two) allowing us a random choice of 15, so we took the available two. “Atmospherics” had one mention. “Beer quality” had two mentions. “Beer value”, “Beer complementary product”, “Signage” and “Service staff” were not mentioned. (OldbridZ craft brewery, 2019)

The results of the primary research of the beerscape attributes by breweries are shown in Table 1 in the Appendix.

As explained previously, the seventh attribute eWoM was established by the total number of selected Tripadvisor reviews for all 15 breweries, i.e. 167. By comparing each of the six internal

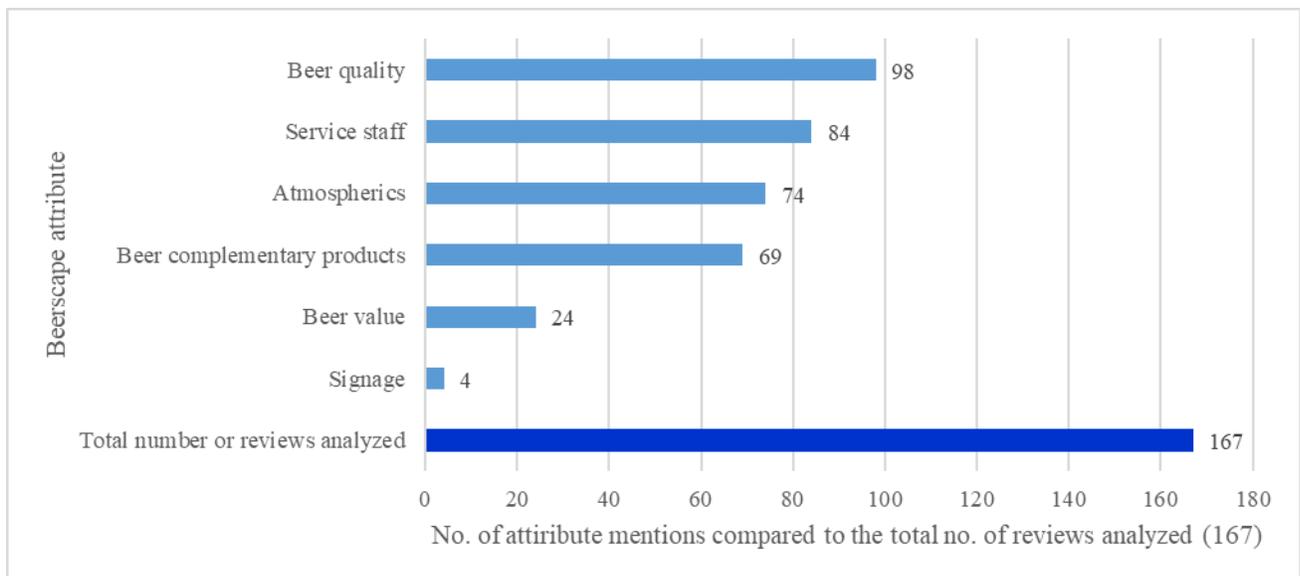
attributes with the external one (i.e. eWoM), we got an additional insight into the relative power of each attribute.

Compared in relation to the frequency of mentions (the total number of attribute mentions vs the total number of analyzed Tripadvisor reviews/eWoM), the attributes were ranked as follows

(Table 2 in Appendix and graph at Figure 1):

1. beer quality (59%)
2. service staff (50%)
3. atmospherics (44%)
4. beer complementary product (41%)
5. beer value (14%)
6. signage (2%)

Figure 1. Ranking of beerscape attributes by the number of their mentions in the total number of analyzed Tripadvisor reviews/eWoM (one review may contain more than one attribute mention).



In addition to the analysis of the frequency of mentions of particular beerscape attribute, the positive key words relating to the particular attribute, found relevant from the previous research (beer quality, service staff, atmospherics, beer complementary product, beer value), were also extracted from the reviews which were written in more detail. These words were then used to form word clouds shown in Figure 2.

Figure 2. Word clouds for beerscape attributes: (1) beer quality, (2) service staff, (3) atmospherics, and (4) beer value.



The most frequently used terms to describe beer quality were great, excellent and good. The service staff was most frequently characterized as friendly and great. Atmospherics was most frequently described with the following words: relaxed, good music, industrial, cozy, nice, and friendly. The terms used to describe beer complementary products were too diverse for the word cloud to be used as form of presentation. Looking generally these terms can be divided in three groups: food (e.g. local, burgers, deserts), brewery tour and promo clothes (e.g. T-shirts, caps). Beer value was most frequently characterized by well-priced and cheap. The word clouds helped us to better understand the subtler aspects of the beerscape experience.

The tap room experiences were further characterized through tap room coefficients which are shown in Table 1. for the whole data set and for the reduced one in Table 2 (“extremes” were removed as described in the Method). The coefficient is the ratio between the number of attribute mentions and the total number of Tripadvisor reviews per tap room.

No.	Brewery	Total number of reviews	Total number of all attribute mentions	Coefficient
1.	Zmajska Pivovara	11	21	1.91
2.	Pelicon Brewery	4	7	1.75
3.	Tap B Craft Brewery & Brewpub	11	18	1.64
4.	Craft Beer Garden #imaimoze	16	25	1.56
5.	Human Fish Brewery	12	18	1.50
6.	OldbridZ craft brewery	2	3	1.50
7.	PG Akademija Piva	21	27	1.29
8.	Dogma Brewery	27	33	1.22
9.	Mandrill Nano-Brewing CO.	27	31	1.15
10.	Fakin Craft Bar	10	11	1.10
11.	Bura Brew	14	12	0.86
12.	The Garden Brewery	55	42	0.76
13.	Pivnica Mlinarica	64	44	0.69
14.	Dubrovnik Beer Company	131	32	0.24
15.	Mali Medo	623	29	0.05

Table 1. Tap room coefficients based on total number of all attribute mentions in relation to total number of Tripadvisor reviews per brewery/tap room for all researched breweries/tap rooms.

No.	Brewery	Total number of reviews	Total number of all attribute mentions	Coefficient
1.	Craft Beer Garden #imaimoze	16	25	1.56
2.	PG Akademija Piva	21	27	1.29
3.	Dogma Brewery	27	33	1.22
4.	Mandrill Nano-Brewing CO.	27	31	1.15
5.	The Garden Brewery	55	42	0.76
6.	Pivnica Mlinarica	64	44	0.69
7.	Dubrovnik Beer Company	131	32	0.24

Table 2. Tap room coefficients based on total number of all attribute mentions in relation to total number of Tripadvisor reviews per brewery/tap room for selected breweries/tap rooms.

## DISCUSSION

The results suggest that the six attributes taken over from winescape, i.e. atmospherics, quality, value, complementary product, signage, and service staff, can be successfully applied to the beerscape. The research and analysis did not show any other attribute to be relevant. However, we observed that not all of the above attributes were equally relevant. The order of importance, based on the impact, i.e. on the percentage of mentions of attribute relative to the total number of tripadvisor reviews analyzed (eWoM attribute), was the following (Figure 1 and Appendix, Table 2): beer quality, service staff quality, atmospherics, beer complementary products, beer value and signage. Accordingly, as expected, beer quality and service staff quality showed to be of highest importance for the beerscape (59% and 50%), but the contribution of atmospherics and beer complementary products also played important roles (44 and 41%). Beer value (14%), and especially signage (2%), showed to be of no great importance for the beerscape of the tap rooms of Croatian and regional craft breweries.

### *Reflections on the measuring model*

There is an interesting dynamic between the above six beerscape attributes taken from the winescape and the eWoM. Since the six beerscape attributes were experienced/observed while the patrons were spending time inside the tap room, we call them “internal”. However, since the eWoM was mainly generated and experienced outside of the beerscape, we call it “external”. As the external attribute was generated by the patron’s experience of internal attributes, one can theorize that there was a correlation between the two. Namely, the higher the patron’s level of internal experience, the higher the patron’s external activity in generating eWoM.

Since eWoM showed to be a good measure of patron's perception of the service/experience quality, we propose the creation of a tool for correlating specific internal attributes with the external attribute (eWoM). This tool would not only measure the quality of specific beerscape attributes and allow comparison with competition, but would also allow managers to understand which attributes could be strengthened in order for patrons to have a better experience and a higher sense of beer value. At least theoretically, the manipulation of the beerscape attributes should have an impact on value perception and, consequently, the revenue. Last but not least, the successful manipulation of attributes theoretically should contribute to the greater word of mouth, which should in turn bring more people in thus perpetuating the growth of revenue.

Provided this measuring model, which calls for further testing, is successful, it would be far from a trivial thing hinging merely on academic interest. It could have a highly applicable and tangible effect, probably exceeding the range of the beer industry and find its application in the larger restaurant sector leading to a relatively elegant model of servicescape management.

#### *Beerscape winning formula*

From our research it could be preliminary concluded that the beerscape, in order to be successful, should focus on the following (Figure 2): high quality, well balanced flavors, variety, innovativeness and uniqueness when beer quality is considered; passion, education, knowledge, helpfulness and friendliness when service staff is considered; when atmospherics is thought of customers prefer simple, modern, urban, industrial environments with a good music and cozy atmosphere; as far as beer value is concerned the most important thing is that tap rooms offer good value for money and that beers are appropriately priced.

Considering the low percentage of the signage attribute, it would be interesting to repeat this study on a different market and see whether the importance of this attribute is conscious, subliminal or merely neglected by the tap rooms included in this research. It would be also interesting to consider a new way of analyzing the signage attribute, possibly from the photo content on Tripadvisor since pictorial language invites the picture response.

### *“Spiritidness” of the servicescape/beerscape*

An additional insight that arose from this research is that, the experience is never a mere sum of the service scape attributes, because the whole is different from the sum of its parts. For this reason, the experience or customers’ perception of quality is not easy to measure. We could say that the customer’s experience of the servicescape’s internal attributes and their combination, very much depends on the customer expectations and the way the tap room experience meets those expectations. The four elements (4Es) of the “experience economy” – entertainment, education, esthetics and escapism (Pine & Gilmore, 1999), combine here with the “fifth element” – “the spirit” of the tap room, which is the whole experience comprising of the four elements which are in some enigmatic way constructed from the servicescape attributes. The “spirit” or “quality” of the place (in the platonic definition of quality existing as an elusive mix of objective and subjective traits) then reflects akin to leaving a platonic “shadow” in the external attribute, i.e. eWoM. We can theorize here that the “spirit” influences the patron’s behavior, based on the simple equation formulated by Kurt Lewine (1946)  $f=(p,e)$ , meaning that behavior is a function of the person interacting with its environment, i.e. the “total of the situation” or, in our interpretation, the “spirit” of the place. The greater the arousal coming from the “spirit”, the greater the influence on the individual’s behavior, i.e. spending and sharing in the eWoM. In our research, we have tried to measure it through tap room coefficients (Tables 1 and 2). This leads to some quite interesting

result of the “spiritedness” of the space, and an interesting new hypothesis of “spirit” that should be further studied.

### *Limitations*

One of the limitations in this research was the relative newness of the regional craft beer industry, as some venues (eight) had fewer than 15 reviews. In those eight cases, we took all available reviews in the range from two to 14. Reviews in languages other than English were not taken into account.

A shortcoming of this analysis regarding the beer complementary products attribute stems from the fact that only seven of 15 tap rooms (47%) offered food. In a more mature market situation, it might make sense to divide the beer complementary products attribute into two, i.e. food and merchandise.

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## Appendix

Table1. The number of beerscape attribute mentions in researched Tripadvisor reviews per brewery.

No.	Brewery	Town	Country	Total number of reviews	Total number of reviews analyzed*/e_WoM	Attribute						
						Atmospherics	Beer quality	Beer value	Beer complement. product	Signage	Service Staff	Total
1.	Dubrovnik Beer Company	Dubrovnik	Croatia	131	15	7	12	1	2	0	10	32
2.	Pivnica Mlinarica	Zagreb	Croatia	64	15	9	5	4	13	3	10	44
3.	The Garden Brewery	Zagreb	Croatia	55	15	14	12	2	11	0	3	42
4.	Mandrill Nano-Brewing CO.	Split	Croatia	27	15	6	6	6	5	0	8	31
5.	Bura Brew	Poreč	Croatia	14	6	0	4	0	3	0	5	12
6.	Zmajska Pivovara	Zagreb	Croatia	11	11	7	8	2	0	0	4	21
7.	Tap B Craft Brewery & Brewpub	Split	Croatia	11	9	4	7	2	1	0	4	18
8.	Mali Medo	Zagreb	Croatia	623	15	4	5	1	11	0	8	29
9.	Fakin Craft Bar	Zagreb	Croatia	10	8	1	2	1	5	0	2	11
10.	Human Fish Brewery	Vrhnika	Slovenia	12	10	7	7	0	1	0	3	18
11.	Pelicon Brewery	Ajdovščina	Slovenia	4	4	0	2	0	1	0	4	7
12.	Dogma Brewery	Belgrade	Serbia	27	15	7	11	1	3	0	11	33
13.	PG Akademija Piva	Podgorica	Montenegro	21	13	2	8	3	9	0	5	27
14.	Craft Beer Garden #imainoze	Mostar	Bosnia and Herzegovina	16	14	5	7	1	4	1	7	25
15.	OldbridZ craft brewery	Mostar	Bosnia and Herzegovina	2	2	1	2	0	0	0	0	3
Total:				1028	167	74	98	24	69	4	84	353

\*Reviews in languages other than English were not taken into account.

Table 2. The number of beerscape attributes mentions and their share in the total number of analyzed Tripadvisor reviews.

Beerscape attribute	Mentions	
	Number <sup>1</sup>	% <sup>2</sup>
Beer quality	98	59
Service staff	84	50
Atmospherics	74	44
Beer complementary products	69	41
Beer value	24	14
Signage	4	2
Total number or reviews analyzed	167	100

<sup>1</sup>Each review may contain more than one attribute.

<sup>2</sup>Number of mentions of particular attribute in the total number of reviews.