

## **MEASURING CUSTOMER SATISFACTION AND SERVICE QUALITY IN THE PULA CITY RESTAURANTS, REGION OF ISTRIA, CROATIA**

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### **Abstract**

**Purpose** – The purpose of this research paper is to empirically investigate overall customer satisfaction and overall service quality in the Pula city restaurants in Croatia.

**Methodology** – Structured questionnaire technique was used to determine the service quality in the restaurants and the customer satisfaction. SPSS software analysis is used to determine the means and results are interpreted. In order to meet the survey's goals, univariate and bivariate statistics was performed.

**Findings** – The results indicated high level of customers satisfaction with overall restaurant service quality and high level of overall customer satisfaction with city restaurants.

**Contribution** – The results shows that the offer of the restaurants is suitable to the requirement of foreign consumers, which improves the quality of the gastronomic offer. This research also helps the restaurateurs and gastronomic sector in improving their offer and service quality to maximize consumer satisfaction.

**Keywords** Gastronomic tourism, customer satisfaction, service quality, tourist destination

### **INTRODUCTION**

The food industry is an important component in tourism and one of the excellent tourist attractions in the destination. Therefore, this study examines the most important segments of the food industry, service quality, but also the quality of gastronomic offer in the Pula city restaurants, Croatia, and customer satisfaction, which are strictly linked to successful restaurant business and customer loyalty. All these elements enable further business development and modernization of the service sector. In the same time, globalization, urbanization, modernization, and migration have modelled and transformed the way in which modern civilization consumes food (UNWTO, 2017). Customers are looking for different food experiences, from usual daily consumption to culinary enjoyment in starred restaurants. Nowadays, the gastronomy tradition has become a strong element of the culture of the territory, which includes traditions and customs, where the recipes are part of the intangible cultural heritage of the tourist destination. Many regions and countries want to protect their traditional cuisine and culture of food under the UNESCO in order to gain a food and cuisine image which will attract a large number of tourists (Cuccia, et al., 2016; GoUNESCO, 2014). As Yurtseven and Kaya (2011) say “food is an extremely important part of the culture of a region”, but also a part of the city, of a village or hamlet. Foods associated with a particular region can attract tourists to this destination if strategically marketed at periodical events, festivals or on the right social media platforms (Viljoen, Kruger, and Saayman, 2017). So, according to Hjalager (2003), the new tourists seek food and beverage combinations

and eating experiences that foster learning. For these tourists, food in the destination does not only satisfy hunger but such consumption means gaining in-depth knowledge about local cuisine and destination's culture. For Richards (2002, 10-11), food becomes the ideal sign of tourism consumption. Eating is an obligatory part of the holiday experience, and therefore lends itself as a tool of distinction for everybody. We can show off our cultural capital relating to the destination by eating 'authentic' food in the destination. The traveller can escape from the mass tourist hordes by finding that 'hidden' local restaurant where only 'locals' go. In this way, travel becomes pleasure for all our senses, but also for personal cultural growth and enrichment. For this reason, it is not surprising that gastronomic tourism is a growing travel trend and according to Kivela and Crofts (2006), is an emerging phenomenon attracting millions of tourists who are motivated to travel by activities related to food experiences; the quality, variety and uniqueness of local products; and the opportunity to experience exclusive events. Henderson (2009) says that gastronomic tourism is also becoming a significant area of growth for destinations, and that it is regarded as a great marketing opportunity. According to Berg and Sevón (2014, 289), food and gastronomy is directly and indirectly affecting the character of the place and its brand-image, but also contributes to the local economy of the destination, because "a third of tourists' spending is devoted to food", say Quan and Wang (2004).

## 1. LITERATURE REVIEW

According to Ryu and Han (2010), links between restaurants and destinations have played important roles in the overall success of regional tourism, especially when it comes to the customer's overall satisfaction with destination. The same is on the local level. But in both cases, when it comes to customer satisfaction, it is important to consider their expectations as well. According to Oliver (1980), satisfaction refers to the perceived diversity between previous expectation and perceived performance after consumption. On the other side, consumer satisfaction is also closely related to organization's future revenue and profits. As a result of the direct link with profits, the issue of service quality and customer satisfaction has become a focus of the hospitality industries. So, more and more companies are compelled to assess and improve their service quality in an effort to attract customers (Gilbert and Veloutsou, 2006), which is the most important strategy in the restaurant business where during daily work and regarding the future development, the inevitable connections arise between quality of service and customer satisfaction. Kivela and Crofts (2009) stated that in the restaurant industry, customers not only evaluate the quality of food but also the quality of service they encounter during their dining experience, which all together affects the overall customer satisfaction with the stay in the restaurant, the loyalty of the guest and the revisit of the guest to the restaurant. These elements are interdependent. Many authors as Ryu et al. (2012) and Chang et al. (2011), mentioned the importance of food quality in terms of destination food experience with taste ingredients and presentation of plates like quality attributes. Furthermore, in this research, the concept of customer satisfaction is operationalized as overall satisfaction because, according to Taylor and Baker (1994), is a determinant of customer loyalty. Considering consumer behaviour, several studies suggest that service quality significantly influences consumers' decisions on restaurants (Clemes, Gan and Sriwongrat, 2013). Related to that, Hui and Zheng (2010) defined

satisfaction as an evaluative judgment of a specific transaction resulting from perceived quality. International Standardization Organization (ISO) defined quality as the totality of features and characteristics of a product or service which is based on its ability to satisfy stated or implied needs (Shaharudin, Mansor and Elias, 2011). According to Armstrong (2012) ability to perform the promised service dependably and precisely is known as reliability. Also, as Iqbal et al. (2010) say, providing service in a timely manner is highly appreciated by customers and good service providers understand this aspect. Many studies have been made regarding service quality and customer satisfaction in the restaurants (Parasuraman, Zeithaml, and Berry, 1988; Jain and Gupta, 2004; Kuo et al., 2011; Canny, 2014; Marinelli, Simeone and Scarpato, 2015; Al-Tit, 2015; Mensah and Dei Mensah, 2018; Kim et al., 2019). Therefore, numerous restaurant studies (Jang, and Namkung, 2009; Jeong and Jang, 2011; Canny 2014) related to the dining experience include different dimensions like food quality, service quality, physical environment, customer satisfaction and behavioral intentions.

## **2. METHODOLOGY**

### **2.1. Hypothesis development**

This research intends to further investigate the extent to which gastronomic offer meets tourism demand, since the gastronomic offer is an integral part of the image of the tourist destination. The database for this research paper is based on the qualitative and quantitative research “Measuring customer satisfaction and service quality in the Pula city restaurants in Croatia” made by authors during summer 2019 (from June to September). The study intended to answer two research questions: 1. What is the level of overall customers’ satisfaction with the city restaurants? 2. What is the level of satisfaction with overall service quality during food consumption in the city restaurants? The aim is also to present the results of the research conducted regarding the quality of the gastronomic offer, but also to discover which measures and activities are important for the purpose of possible improvement. In order to answer the research questions, the following hypotheses were proposed: H<sub>1</sub>: The gastronomic offer significantly contributes to the quality of the entire tourist offer of the destination. H<sub>2</sub>: Restaurateurs need to adapt to the demands of tourists and improve the gastronomic offer in order to be competitive and recognizable. H<sub>3</sub>: There is statistically significant difference between customer satisfaction with variety and choice of food in the restaurants and gender. H<sub>4</sub>: There is statistically significant difference between overall satisfaction with restaurant service quality and gender. H<sub>5</sub>: There is statistically significant relationship between overall satisfaction with restaurant service quality and sociodemographic characteristic of the respondents.

### **2.2. Questionnaire design**

In this research paper a self-administered questionnaire was used for on-site data collection. During the questionnaire design, the questions were adopted and modified from Marković et al. (2011) and Kim et al. (2019), according to the specificity of the destination and its offer. The questionnaire was structured in four parts. First, socio-demographic profile of the respondents was measured with 12 questions (age, gender,

country, profession, level of education, annual earnings, employment status, type of transport, length of stay, how they chose the destination, with whom they travel, in which part of the region they stay); the second part explores customer satisfaction regarding food and service quality (9 questions), the third part refers to physical environment with 2 questions (restaurant location and restaurant's atmosphere during meals), and the last part is related to the overall customers' satisfaction with the restaurants in Pula (2 questions), which is very important for the future development of culinary tourism in the destination, as well for future revisiting. The questions were measured with a five-point Likert-type scale, ranging from highly unsatisfied (1) to highly satisfied (5) for the questions regarding customer satisfaction with food quality, restaurant menu, service quality, restaurant atmosphere, environment, destination and local gastronomy in the destination restaurants.

### **2.3. Data collection procedures**

The questionnaire was distributed in three city restaurants in Pula, Croatia, (Mediterraneo, La Cuxina and Kantina), in the period of high season, from June to September 2019. The target population was all adult restaurants guests, from 18 years onwards, who were willing to complete the questionnaire. The philosophy of the restaurants is focused on the use of local food and products (zero kilometer) and on good service quality. The food offer is based on mix of traditional and modern cuisine. The selected restaurants had also ample sitting space. In total 300 questionnaire were distributed and 252 returned, which presents a response rate of 84%. For scientific research recommended sample size is from 200 to 250 according to Hair et al. (1998), so the latter conditions were fulfilled. Customers completed the questionnaire after consuming food, at the time of payment with the support of restaurant staff. Data were analyzed using the statistical package SPSS 20.0. In order to meet the survey's goals, for measuring overall service quality and customer satisfaction, univariate (descriptive statistics) and bivariate statistics (Mann-Whitney U test, T-test, ANOVA and correlation analyses) was performed.

## **3. RESULTS**

### **3.1. Descriptive statistical analysis**

After surveying, collecting and processing data with the statistical package SPSS 20.0, the following results were obtained:

Table 1: Socio-demographic profile of survey participants

Variable	N	% of Responded	Variable	N	% of Responded
<b>Gender</b>			<b>Earnings</b>		
Male	128	50.8	<20.000	66	26.2
Female	124	49.2	20.001-40.000	86	34.1
<b>Age</b>			40.001-60.000	53	21.0
<20	15	6	60.001-80.000	18	7.1
20-29	76	30.2	80.001-100.000	15	6.0
30-39	46	18.3	101.000-120.000	8	3.2
40-49	49	19.4	120.001-140.000	3	1.2
50-59	42	16.7	>140.001	3	1.2
60-69	17	12.5	<b>Country</b>		
>70	7	2.8	USA	2	0.8
<b>Employment status</b>			Italy	37	14.7
Employed	205	81.4	France	17	6.7
Unemployed	9	3.6	Germany	35	13.9
Retired	18	7.1	Croatia	5	2.0
Student	20	7.9	Austria	33	13.1
<b>Profession</b>			Slovenia	11	4.4
Student	25	9.9	UK	13	4.9
Qualified Employee	60	23.8	Hungary	6	2.4
Freelance Artist	10	4.0	The Netherlands	26	10.3
Engineer	33	13.1	Switzerland	9	3.6
Entrepreneur	19	7.5	Denmark	4	1.6
Scientist	10	4.0	Norway	4	1.6
Manager	45	17.9	Sweden	6	2.4
Journalist	2	0.8	Serbia	3	1.2
Administrator	14	5.6	Finland	5	2.0
Technical Assistant	10	4.0	Poland	2	0.8
Pensioner	14	5.6	Spain	1	0.4
Other	10	4.0	Portugal	6	2.4
<b>Education</b>			Australia	10	4.0
			Russia	1	0.4
			Israel	1	0.4
			Brazil	4	1.6
			New Zealand	1	0.4
			South Africa	1	0.4
			Belgium	7	2.8
			Bosnia and Herzegovina	1	0.4
			Ukraine	1	0.4

Source: Authors

The results of univariate statistical analysis in Table 1 shows a socio-demographic profile of survey participants. The majority of the respondents were male 50.8% and 49.2% were female sex. The majority of the customers are between 20-29 years old (n=76; 30.2%). The oldest population between (>70) years old are least frequented restaurant customers in this sample (n=7; 2.8%). The following are other consumers in restaurants by age: 19.4% between 40-49 years old; 18.3% between 30-39 years old; 16.7% between 50-59 years old and 12.5% between 60-69 years old. The most frequent customers are from Italy (n=37; 14.7%), followed by Germany (n=35; 13.9%), Austria (n=33; 13.1%), The Netherlands (n=26; 10.3%), France (n=17; 6.7%), UK (n=13; 4.9%), Slovenia (n=11; 4.4%), Australia (n=10; 4%), Switzerland (n=9; 3.6%). The 23.8% of the customers are qualified workers, 17.9% are managers, 13.1% are engineers, 9.9% are students, 7.5% are entrepreneurs, 5.6% are administrators, 5.6% are pensioners; 4.0% freelance artists, 4.0% scientist, 4.0% technical assistant, 0.8% journalist and 4.0% of respondents with other professions. Data shows that 81.4% of the consumers are employed and 7.1% are retired; 7.9% are students (which means that if we look at the total number of students surveyed (9.9%), part of them work and study at the same time) and 3.6% are unemployed. The restaurants in Pula are visited mostly by the consumers with the annual earnings between 20.001 and 40.000 euros 34.1%; under 20.000 euros 26.2% and 21.0% with annual earnings between 40.001 and 60.000 euros.

### 3.1.1. Frequency distribution

The following frequency analysis is based on the important question in the food and restaurant industry, the customer satisfaction. The following results were obtained.

Table 2: Satisfaction with overall restaurant service quality

	Frequency	Percent	Valid Percent	Cumulative Percent
<b>HIGHLY UNSATISFIED</b>	3	1,2	1,2	1,2
<b>UNSATISFIED</b>	3	1,2	1,2	2,4
<b>NEUTRAL</b>	39	15,5	15,5	17,9
<b>SATISFIED</b>	160	63,5	63,5	81,3
<b>HIGHLY SATISFIED</b>	47	18,7	18,7	100,0
<b>Total</b>	252	100,0	100,0	

Source: Authors

Out of the Table 2. the customers are highly satisfied (18.7%) with overall restaurant service quality. Most of the customers (63.5%) it's satisfied with overall restaurant service quality.

Table 3: Overall satisfaction during staying in restaurants

	Frequency	Percent	Valid Percent	Cumulative Percent
<b>HIGHLY UNSATISFIED</b>	1	,4	,4	,4
<b>UNSATISFIED</b>	4	1,6	1,6	2,0
<b>NEUTRAL</b>	46	18,3	18,3	20,2
<b>SATISFIED</b>	160	63,5	63,5	83,7
<b>HIGHLY SATISFIED</b>	41	16,3	16,3	100,0
<b>Total</b>	252	100,0	100,0	

Source: Authors

Out of the Table 3. the customers are highly satisfied (16.3%) with overall satisfaction during staying in restaurant. Most of the customers (63.5%) it's satisfied with overall during staying in restaurants.

Table 4: Satisfaction with Istrian gastronomy offer

	Frequency	Percent	Valid Percent	Cumulative Percent
<b>HIGHLY UNSATISFIED</b>	2	,8	,8	,8
<b>UNSATISFIED</b>	6	2,4	2,4	3,2
<b>NEUTRAL</b>	61	24,2	24,2	27,4
<b>SATISFIED</b>	146	57,9	57,9	85,3
<b>HIGHLY SATISFIED</b>	37	14,7	14,7	100,0
<b>Total</b>	252	100,0	100,0	

Source: Authors

Out of the Table 4. the customers are highly satisfied (14.7%) with Istrian gastronomy offer and the most of the customers (57.9%) it's satisfied.

Table 5: Satisfaction with variety and choice of food in the restaurants

	Frequency	Percent	Valid Percent	Cumulative Percent
<b>HIGHLY UNSATISFIED</b>	6	2,4	2,4	2,4
<b>UNSATISFIED</b>	12	4,8	4,8	7,1
<b>NEUTRAL</b>	50	19,8	19,8	27,0
<b>SATISFIED</b>	155	61,5	61,5	88,5
<b>HIGHLY SATISFIED</b>	29	11,5	11,5	100,0
<b>Total</b>	252	100,0	100,0	

Source: Authors

Out of the Table 5. the customers are highly satisfied (11.5%) with Istrian gastronomy offer and the most of the customers (61.5%) it's satisfied. Neutral is 19.8% costumer. Furthermore, it has been tested, if the variables are normally distributed with the tests according to "Kolmogorov-Smirnov" in the Table 6 for the following variables: customer satisfaction with overall restaurant service quality, customer overall satisfaction during staying in restaurant and customer satisfaction with overall destination hospitality. The variables are not normally distributed as  $p = 0.000 (< 0.05)$ , (see Table 6).

Table 6: Test of normality

	Kolmogorov-Smirnov <sup>a</sup>			Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
<b>SATISFACTION WITH OVERALL RESTAURANT SERVICE QUALITY</b>	,337	252	,000	,768	252	,000
<b>OVERALL SATISFACTION DURING STAYING IN RESTAURANT</b>	,336	252	,000	,785	252	,000
<b>SATISFACTION WITH OVERALL DESTINATION HOSPITALITY</b>	,299	252	,000	,830	252	,000

Source: Authors

It also follows from the descriptive statistical analysis, that the 29.8% of consumers finished high school and 38.7% has university degree, while only 9.9% of the sample has a master or PhD degree and just 3.2% has only primary education. Other consumers typologies: 71.4% chose the destination through the internet, 62.7% come with a car, 40.5% travel with the partner and 34.9% with the family; 61.1% are on vacation from 7 to 10 days; 51.2% in private accommodation and 36.5% in the hotel. Most respondents 84.1%, stay on the coastal part of the Region of Istria and just 15.9% in the rural part. The results show that 69.4% of respondents visit the city center two or more times and 79.0% of them visit restaurants two or more times during holidays. The largest number of respondents visited restaurants in Pula during July (38.5%) and August (39.7%). Also 41.6% of them want to return to the destination, 41.3% may return and only 17.1% of them will not return next year.

The customers profile reflected the target population of the mentioned city restaurants, which are middle-age consumers with high education, loyal to the destination and restaurants. The results indicated as well high level of satisfaction with overall restaurant service quality during food consumption, 82.2% of the respondents (satisfied and highly satisfied), and high level of overall customer satisfaction with the city restaurants with 79.8% (satisfied and highly satisfied) of the respondents. Overall customer satisfaction in the restaurants derived from the customer's expectation and customer's actual experience. The results of the research also confirm that when selecting a destination, the gastronomic offer is very important for the 63% of the respondents and that the guests



in the destination want to acquire new knowledge precisely in the field of traditional gastronomy (32.5%).

Customers are satisfied with food quality (80.6% of respondents), and 73% are satisfied with the variety and choice of food in the restaurant. The majority (75.8%) of respondents were satisfied with the location of restaurants, and 78.6% of respondents were satisfied with the atmosphere in restaurants. Therefore, the interesting data comes from the survey regarding trends in gastronomy, where 69.8% of respondents prefer traditional food, 15.1% modern cuisine, 7.6% slow food and just 1.6% fast food, which means that consumers are increasingly educated about healthy food and the importance of consumption domestic products. The data confirm that the gastronomic offer and food and service quality are at a high level and that gastronomy is a very important link in the promotion, then in creating of the image of the destination, as well as in the offer of the destination itself. The destination must work on informing consumers and promoting traditional gastronomy, as the results show that tourists have poorly knowledge of the gastronomy of the place (25.8%) or have no knowledge of local gastronomy (13.9%). Only 23.8% of the respondents have a satisfactory level of knowledge about traditional Istrian food. The results also indicated high mean scores for satisfaction with food quality, 3.92 and satisfaction with Istrian gastronomy offer which is 3.83. Regarding physical environment, 65.9% of respondents are satisfied with restaurant atmosphere, 12.75 are highly satisfied and 2.4% are unsatisfied; than 61.1% of tourists are satisfied with restaurant location, 14.7% are highly satisfied and just 0.8% are unsatisfied. Regarding spending per person for a meal in a restaurant, 52.4% of guests spend between 20.01-40.00 euros, 23.4% spend <20.00 euros, 14.3% spend between 40.01-50.00 euros and just 3.2% spend > 60.01 euros per meal.

### **3.1.2. Measures of central tendency and variation**

The centre of a frequency distribution can be calculated and shown where it lies (see Table 7). This is also known as the central tendency (Field, 2009). According to Verma (2013), there are several commonly used measures: Mean, Median, Mode, St. Deviation, Variance, Skewness, Kurtosis, Range and Percentiles. These are the results for descriptive statistical analysis of the overall customer satisfaction with restaurant service quality. The mode is simply the score that occurs most frequently in the data set. In this case the most frequent score is 4. Another way to quantify the centre of a distribution is to look for the middle score when scores are ranked in order of magnitude, (Field, 2009). In this case study, the median is 4. The standard deviation is a measure of variability, the value of which depends upon how closely the values cluster around the mean value. The standard deviation is the square root of the average squared deviation of the scores from its mean value and is represented by sigma (Verma, 2013, 42). In this case study the overall customer satisfaction varies between 3.265 – 4.675 (Mean - Std. deviation / Mean + Std. deviation). The variance is the square of the standard deviation. It can be defined as the average of the squared deviations of scores from their mean value.

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defined as the average of the squared deviations of scores from their mean value. It also measures variation of the values in the distribution. It shows the magnitude of variation among the scores around its mean value. It measures the consistency of data. Higher variance indicates more heterogeneity, whereas lower variance represents more homogeneity in the data (Verma, 2013, 45). The variance is 0.497. The skewness gives an idea about the symmetry of the data. In symmetrical distribution, if the curve is divided in the middle, the two parts become the “mirror image” of each other. If the curve is not symmetrical, it is skewed (Verma, 2013, 50). This variable has a long “tail” because of the negative value of  $-0.992$ . The kurtosis is a statistical measure used for describing the distribution of observed data around the mean. It measures the extent to which the observations cluster around the mean value. For a normal distribution, the value of kurtosis is 0. A positive value of the kurtosis in a distribution indicates that the observations cluster more around its mean value and have longer tails in comparison to that of normal distribution, whereas a distribution with a negative kurtosis indicates that the observations cluster less around its mean and have shorter tails (Verma, 2013, 51). In this study, the kurtosis for the variable overall customer satisfaction with restaurant service quality is 3.017. The range is the crudest measure of variability and is obtained by subtracting the lowest value from the highest one in the data set. It is based on only two extreme values. The range is simple to compute and is useful when it is required to evaluate the whole data set. The range is useful in showing the maximum spread within a data set. It can be used to compare the spread between similar data sets (Verma, 2013, 41). For the variable overall customer satisfaction with service quality, the range is 4. Percentiles are used to develop norms based on the performance of the subjects. A given percentile indicates the percentage of scores below. For example, P40 is a score below which 40% scores lie. The median is also known as P50, and it indicates that 50% values lie below it. Percentiles can be computed to know the position of an individual on any parameter (Verma, 2013, 52). For the variable customer satisfaction with overall restaurant service quality, the percentile 25, 50 and 70 is 4.

Table 7: **Satisfaction with overall restaurant service quality**

N	Valid	252
	Missing	0
Mean		3,97
Median		4,00
Mode		4
Std. Deviation		,705
Variance		,497
Skewness		-,992
Std. Error of Skewness		,153
Kurtosis		3,017
Std. Error of Kurtosis		,306
Range		4
Minimum		1

N	Valid	252
	Missing	0
Maximum		5
Sum		1001
Percentiles	25	4,00
	50	4,00
	75	4,00

Source: Research results

Table 8: Satisfaction with the gastronomic offer

	Mean	Std. Deviation	Analysis N
<b>SATISFACTION WITH FOOD QUALITY</b>	3,92	,718	252
<b>SATISFACTION WITH TRADITIONAL FOOD OFFER</b>	3,73	,777	252
<b>SATISFACTION WITH ISTRIAN GASTRONOMY OFFER</b>	3,83	,728	252

Source: Authors

In the Table 8 respondents clearly indicated that they were most satisfied with the quality of the food - average rating  $\bar{x} = 3.92$ . Regarding satisfaction with the Istrian gastronomic offer, the respondents rated it with an average rating  $\bar{x} = 3.83$ . Furthermore, they rated the satisfaction with the traditional gastronomic offer with an average rating of  $\bar{x} = 3.73$ .

Table 9: Satisfaction with the overall offer and the ambience

	Mean	Std. Deviation	Analysis N
<b>SATISFACTION WITH RESTAURANT LOCATION</b>	3,87	,724	252
<b>SATISFACTION WITH RESTAURANT ATMOSPHERE</b>	3,87	,701	252
<b>SATISFACTION WITH OVERALL RESTAURANT SERVICE QUALITY</b>	3,97	,705	252
<b>OVERALL SATISFACTION DURING STAYING IN RESTAURANT</b>	3,94	,665	252
<b>SATISFACTION WITH VARIETY AND CHOICE OF FOOD IN THE RESTAURANTS</b>	3,75	,811	252

Source: Authors

Furthermore, in Table 9 the respondents indicated that they were most satisfied with the quality of the restaurant staff with average rating  $\bar{x} = 3.97$ , satisfaction with their stay in the restaurant with the average rating  $\bar{x} = 3.94$ . They were equally satisfied with the

location of the restaurant and the atmosphere in the restaurant with average rating  $\bar{x} = 3.87$ . They were also satisfied with the diverse offer of food in the restaurants (average rating  $\bar{x} = 3.85$ ).

Table 10: **The importance of gastronomy**

	Mean	Std. Deviation	Analysis N
<b>IMPORTANCE OF GASTRONOMY FOR CHOOSING DESTINATION</b>	<b>3,62</b>	<b>1,073</b>	<b>252</b>
<b>LEVEL OF KNOWLEDGE ABOUT ISTRIAN TRADITIONAL FOOD</b>	<b>2,86</b>	<b>1,164</b>	<b>252</b>
<b>LEVEL OF INTEREST FOR ISTRIAN TRADITIONAL GASTRONOMY</b>	<b>3,06</b>	<b>,921</b>	<b>252</b>

Source: Authors

Table 10 shows that, considering the importance of gastronomy when choosing destination, respondents answered with an average score  $\bar{x} = 3.62$ . The respondents rated the level of interest in Istrian traditional gastronomy with the average rating  $\bar{x} = 3.06$ . As regards the level of knowledge about Istrian gastronomy, the results show that the level of knowledge about gastronomic offer is not sufficiently developed, the lowest average grade of respondents is  $\bar{x} = 2.86$ .

### 3.2. Bivariate statistical analysis

#### 3.2.1. Mann-Whitney U test

The Mann-Whitney U test is used to compare differences between two independent samples / groups.

Research question: Is there a statistically significant difference between customer satisfaction with variety and choice of food in the restaurants and gender?

$H_0$ : There is no statistically significant difference between customer satisfaction with variety and choice of food in the restaurants and gender.

$H_1$ : There is statistically significant difference between customer satisfaction with variety and choice of food in the restaurant and gender.

Table 11: **Satisfaction with variety and choice of food in the restaurants by gender**

<b>GENDER</b>	<b>N</b>	<b>MEAN RANK</b>	<b>SUM OF RANKS</b>
<b>MALE</b>	128	121,96	15611,50
<b>FEMALE</b>	124	131,18	16266,50
<b>TOTAL</b>	252		

Source: Research results

Table 12: **Test statistics<sup>a</sup>**

	<b>SATISFACTION WITH VARIETY AND CHOICE OF FOOD IN THE RESTAURANTS</b>
Mann-Whitney U	7355,500
Wilcoxon W	15611,500
Z	-1,153
Asymp. Sig. (2-tailed)	,249
a. Grouping Variable: GENDER	

Source: Research results

A Mann-Whitney U test shows there is no statistically significant difference between satisfaction with variety and choice of food in the restaurants and gender, z-score is -1.153 and  $p = 0.249 (> 0.05)$ , which means that  $H_0$  is accepted.

Research question: Is there a statistically significant difference between overall restaurant service quality and gender?

$H_0$ : There is no statistically significant difference satisfaction between overall restaurant service quality and gender.

$H_1$ : There is statistically significant difference satisfaction between overall restaurant service quality and gender.

Table 13: **Satisfaction with overall restaurant service quality by gender**

<b>GENDER</b>	<b>N</b>	<b>MEAN RANK</b>	<b>SUM OF RANKS</b>
<b>MALE</b>	128	125,59	16075,00
<b>FEMALE</b>	124	127,44	15803,00
<b>TOTAL</b>	252		

Source: Research results

Table 14: **Test Statistics<sup>a</sup>**

	<b>SATISFACTION WITH OVERALL RESTAURANT SERVICE QUALITY</b>
Mann-Whitney U	7819,000
Wilcoxon W	16075,000
Z	-,236
Asymp. Sig. (2-tailed)	,813
a. Grouping Variable: GENDER	

Source: Research results

The Mann-Whitney test U shows there is no statistically significant difference between satisfaction between overall restaurant service quality and gender, z-score is -0.236 and  $p = 0.813 (> 0.05)$ , which means that  $H_0$  is accepted.

### 3.2.2. T – test analysis

Research question: Is there statistically significant relationship between overall restaurant service quality and sociodemographic characteristics of the respondents?

$H_0$ : There is no statistically significant relationship between overall restaurant service quality and sociodemographic characteristics of the respondent.

$H_1$ : There is statistically significant relationship between overall restaurant service quality and sociodemographic characteristics of the respondent.

The differences between the two groups, male and female, will be tested. Appropriate statistical test for this research question is the t-test for independent samples. Several statistical routines require that the gathered data is normally distributed, or at least do not deviate far from normality (normal distribution is sometimes referred to as the Gaussian distribution). A subjective method for assessing normality is the histogram (Aljandali, 2016, 32).

Table 15: The results of Independent T-test

	GENDER	N	Mean	Std. Deviation	Std. Error Mean
SATISFACTION WITH OVERALL RESTAURANT SERVICE QUALITY	MALE	128	3,95	,787	,070
	FEMALE	124	4,00	,612	,055

Source: Research results

Table 16: Levene's Test

Variable	Levene's Test						
	F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std.error Difference
SATISFACTION WITH OVERALL RESTAURANT SERVICE QUALITY							
Equal variances assumed	4.756	,030	-,615	250	,539	-,055	0.089
Equal variances not assumed			-,617	238,8	,538	-,055	0.089

Source: Research results

In Table 16 the mean scores of man and women were compared with overall satisfaction with restaurant service quality. The  $H_0$  is accepted while the t – value is -0.615 and p – value 0.539 ( $>0.05$ ) what means that there is no statistically significant relationship between overall customer satisfaction and gender. The results have shown that male have slightly higher satisfaction level. The results of the homogeneity of variances tested by

the Levene's test, in this case the variances are not homogeneity because the p-value is 0.030 ( $p < 0.05$ ).

### 3.2.3. One-way ANOVA

The one-way analysis of variance (ANOVA) is used to determine whether there are any statistically significant differences between the means of two or more independent groups.

Table 17: Variances analysis by country of origin

	Sum of Squares	df	Mean Square	F	Sig.
<b>Between Groups</b>	19,306	27	,715	1,518	,055
<b>Within Groups</b>	105,499	224	,471		
<b>Total</b>	124,806	251			

Source: Research results

Note: dependent variable (Satisfaction with overall restaurant service quality)

The results from Table 17 have shown there is no statistically difference between mean scores of Country of Origin and satisfaction with overall restaurant service quality (p-value  $0.055 > 0.05$ ).

Table 18: Variances analysis by level of education

	Sum of Squares	df	Mean Square	F	Sig.
<b>Between Groups</b>	2,761	4	,690	1,397	,236
<b>Within Groups</b>	122,045	247	,494		
<b>Total</b>	124,806	251			

Source: Research results

Note: Dependent variable (Satisfaction with overall restaurant service quality)

The results from Table 18 have shown there is no statistically difference between mean scores of Level of Education and satisfaction with overall restaurant service quality (p-value  $0.236 > 0.05$ ).

Table 19: Variances analysis by Annual Earning

	Sum of Squares	df	Mean Square	F	Sig.
<b>Between Groups</b>	2,597	7	,371	,741	,638
<b>Within Groups</b>	122,209	244	,501		
<b>Total</b>	124,806	251			

Source: Research results

Note: dependent variable (Satisfaction with overall restaurant service quality)

The results from Table 19 have shown there is no statistically difference between mean scores of Annual Earning and satisfaction with overall restaurant service quality (p-value  $0.638 > 0.05$ ).

### 3.2.4. Correlation analysis

According to Lind et al. (2006), correlation analysis is the study of the relationship between variables. The variable that is being predicted or estimated is the dependent variable and the variable that provides the basis for estimation is the independent variable. The Pearson correlation is used when two variables are normal/scale type, and the Spearman is used when two variables are ordinal. Considering the observed ordinal type of the variables the Spearman's coefficient is used. According to Horvat and Mijoč (2018, 488), the data of the ordinal variable can be sorted by a certain intensity of the property, and only differences in rank are observed, and not the original differences in individual values. Ordinal data measured on the ordinal scale of measurements are arranged in order from lowest to highest value. The sign of the coefficient suggests the direction of connection between the independent variable  $x$  and the dependent variable  $y$ . An increase in the value of both variables results in a positive coefficient, while a negative correlation coefficient is the result of an increase in the first variable with a simultaneous decrease in the value of the second variable.

Research question: Is there a statistically significant relationship between sociodemographic characteristics of the respondent and overall customer satisfaction?

$H_0$ : There is no statistically significant relationship between overall restaurant service quality and sociodemographic characteristics of the respondent

$H_1$ : There is statistically significant relationship between overall restaurant service quality and sociodemographic characteristics of the respondent

Table 20: Correlation between overall restaurant service quality and sociodemographic characteristics of the respondents

	Variable	SATISFACTION WITH OVERALL RESTAURANT SERVICE QUALITY	
Pearson correlation	Education	Correlation Coefficient	,088
		Sig. (2-tailed)	,165
		N	252
Pearson correlation	Annual earnings	Correlation Coefficient	,093
		Sig. (2-tailed)	,142
		N	252
Pearson correlation	Country	Correlation Coefficient	,198**
		Sig. (2-tailed)	,002
		N	252
Pearson correlation	Profession	Correlation Coefficient	,055
		Sig. (2-tailed)	,383
		N	252
Pearson correlation	Return to destination	Correlation Coefficient	-,112
		Sig. (2-tailed)	,077
		N	252

\*p-value 5%

Source: Research results



Based on Pearson's correlation coefficient ( $r: 0.198$ ;  $p\text{-value } 0.002 < 0.05$ ), we conclude there is a statistically significant relationship, but a weaker correlation of variables between overall customer satisfaction with restaurant service quality and country of origin. There is also no statistically significant value between the overall customer satisfaction with restaurant service quality and return to destination ( $r: -0.112$ ;  $p\text{-value } 0.077 > 0.05$ ) (H1).

Based on the values of the obtained correlation coefficients, it is possible to determine the existence of a positive weak relationship, but not statistically significant, between overall customer satisfaction with restaurant service quality and education  $\rho: 0.088$ ;  $p\text{-value } 0.165 > 0.05$ , annual earnings  $\rho: -0.093$ ;  $p\text{-value } 0.142 > 0.05$  and profession  $\rho: 0.055$ ;  $p\text{-value } 0.383 > 0.05$ .

## DISCUSSION AND CONCLUSION

Food consumption connects territorial producers, tourists and all actors of the tourist industry in the destination. Food is the main promotional product of every territory and the basic tourist's need. The purpose of the research was to measure the level of tourists' satisfaction with the gastronomic offer in the city of Pula, to further determine the socio-demographic characteristics of tourists as consumers, and to analyse whether Pula's gastronomic offer is recognizable to a foreign clientele. The study has identified the influence of dining experience on customer satisfaction. Consistent with the previous research, according to Ruy and Han (2010), dining experience is one of the important factors that related to customer judgment by comparing customer expectation on restaurant tangible and intangible products (food and service quality; interaction between customers and employees) with the actual performance of restaurant. According to Canny's research (2014, 28), service quality in dining restaurants is important like a food as the main product in the restaurant industry, which also results from this study. Several studies on consumer behavior in restaurants also suggest that service quality significantly influences consumers' decisions on restaurants (Clemes, Gan & Sriwongrat, 2013). The results of this research indicated high level of overall customers satisfaction with service quality and overall customer satisfaction during their stay in the restaurant (mean scores are 4). The results of the research indicate that hypotheses H1 and H2 strengthened the high level of consumer satisfaction due to the fact that the gastronomic offer of the destination significantly contributes to the quality of the tourist offer in the city of Pula. The offer of all restaurants is adapted to the requirements of foreign consumers, which improves the quality of the gastronomic offer. All these elements are of great importance for the destination to be more competitive and recognizable from a gastronomic point of view. Regarding hypothesis H<sub>3</sub>: There is statistically significant difference between customer satisfaction with variety and choice of food in the restaurants and gender, no statistically significant difference was found between the variety and choice of food in restaurant and gender. About H<sub>4</sub>: There is statistically significant difference between satisfaction with overall restaurant service quality and gender, it was found that there is no statistically significant difference at the level of 5% significance of the test between satisfaction with overall restaurant service quality and gender. The conclusion for the H<sub>5</sub>: there is a statistically significant correlation of lower intensity at the level of 5%

statistical significance of the test only between overall restaurant service quality and the country of origin of the respondents.

Furthermore, it should work on the level of information and dissemination of knowledge regarding the gastronomy of the destination, since it is indicated that there is insufficient knowledge and interest among foreign guests. It is important to emphasize that consumer satisfaction is not related to their level of education, annual income and profession, but more to the country of origin and the desire to return to the destination. Several limitations were identified during the research: 1. The period of data collection was just in the main season what could be extended during the whole year; 2. The example size should be largest in order to generalized the results; 3. The research must be carried out in even more restaurants in order to obtain more credible results regarding the overall tourist satisfaction with gastronomy in the city of Pula. This research is a good basis for continuing and deepening consumer satisfaction research in terms of improvement and complementarity, as well as upgrading the tourist and gastronomic offer of the destination for a stronger experience when visiting Pula and Istria County, as well as for exploring the intangible cultural gastronomic heritage of the territory.

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