

# Dining atmospherics and food and service quality as predictors of customer satisfaction at sit-down restaurants

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## Abstract

South African sit-down restaurants operate in a fiercely competitive environment and customer satisfaction has proven critical for survival in this and other service industries. A satisfied customer spreads positive word-of-mouth, returns, and contributes to profitability. Extant literature indicates that customer satisfaction is in turn impacted by product and service quality, and also by the atmospheric elements present in the servicescape. It is, however, important to determine the extent to which food and service quality and dining atmospherics predict customer satisfaction within a South African sit-down restaurant context before restaurateurs embark on marketing strategies to enhance these aspects to cultivate customer satisfaction. The study therefore measures these constructs and determines the extent to which they predict customer satisfaction.

The study is quantitative and descriptive in nature. Data was collected through self-administered questionnaires from 250 sit-down restaurant diners in urban areas of South Africa's North-West Province. The results indicate that respondents' perceptions of food and service quality are significant predictors of customer satisfaction at sit-down restaurants. Respondents' perceptions of dining atmospherics also predict customer satisfaction when food and service quality are controlled. The article provides recommendations on how dining atmospherics, food quality and service quality can be enhanced to improve customer satisfaction at sit-down restaurants.

**Keywords:** customer satisfaction, dining atmospherics, food quality, service quality, sit-down restaurants

## Introduction

In the South African restaurant industry competitiveness has become so fierce that several sit-down restaurants cannot survive or grow and are forced to shut down due to customer losses, insufficient resources and bankruptcy (Stats SA 2012: 2; Von Ulmenstein 2011). In addition to

increasing pressure from fast-food and other food service outlets entering the market, sit-down restaurants also need to adapt to the changing dynamics of the general family structure (Moolman 2011: 131; Vanniarajan & Meharajan 2012: 4). Ryding (2011: 504) adds that the modern customer has evolved in such a way, that their demands and expectations are more

sophisticated than ever before, resulting in an even more competitive industry.

Due to the challenges in the restaurant industry, sit-down restaurant marketers need to investigate new ways of establishing and maintaining a competitive advantage over rivals. According to Choy, Lam and Lee (2012: 11), aspects such as dining atmospherics, food quality and service quality contribute significantly to the success and longevity of restaurants. In fact, it is universally known that customers visit a restaurant to enjoy food in pleasant company while experiencing great service (Salem-Mhamdia & Ghadhab 2012: 269). Customers also do not eat out just for the food; together with high quality food and service, the dining atmosphere plays a critical role in the overall dining experience, which can in turn influence regularity of patronage (Mhlanga 2013: 314).

To ensure satisfied customers, Ryu, Lee and Kim (2012: 201) propose that excellent food and service, together with a pleasant atmosphere should be provided during the dining experience. Ha and Jang (2012: 204) further opine that food and service quality are essential in determining customer satisfaction as well as customers' future behaviour towards the restaurant. The research of Countryman and Jang (2006), Heung and Gu (2012), Jang and Namkung (2009) and Ryu *et al.* (2012) also emphasise the positive effect of dining atmospherics on customers' satisfaction and behavioural intentions. The aim of this study is therefore to measure customers' perceptions regarding food and service quality and dining atmospherics at sit-down restaurants in the North-West Province of South Africa, and determine the extent to which these constructs predict customer satisfaction.

## **PROBLEM STATEMENT, PURPOSE AND OBJECTIVES**

Urban South Africans are exposed to an array of sit-down restaurants, but competitiveness has become so fierce that several restaurants have been forced to shut down due to customer loss,

insufficient resources and bankruptcy (Stats SA 2012: 2; Von Ulmenstein 2011). The South African restaurant industry is further considered highly dependent on customer demand and the country's economic stability and growth (Welter 2012: 61). If customers are satisfied with the food and service quality they receive at the restaurant, they will be more likely to communicate positively about the restaurant, revisit the restaurant, and subsequently contribute to the profitability of the restaurant (Kaura, Datta & Vyas 2012; Kim, Ng & Kim 2009). Dining atmospherics is furthermore also viewed as critical in impacting customer satisfaction, mainly because customers' responses to the environment form part of their consumption experience (Ha & Jang 2012: 205). The purpose of this study is, therefore, to determine the extent to which customer perceptions of food quality, service quality and dining atmospherics at sit-down restaurants predict customer satisfaction within a South African context before restaurateurs at sit-down restaurants embark on marketing strategies to enhance these aspects in order to improve customer satisfaction. The following specific objectives are formulated:

- Uncover the demographic profile of respondents.
- Provide insights into the restaurant patronage habits of respondents.
- Measure the perceptions of respondents regarding the dining atmospherics, food quality, service quality and customer satisfaction at their favourite sit-down restaurant.
- Determine whether perceptions of food and service quality and dining atmospherics predict customer satisfaction at sit-down restaurants.

## **BACKGROUND TO THE STUDY**

### **The South African restaurant industry**

The South African restaurant industry is highly competitive and restaurateurs have to attain and maintain a sustainable competitive advantage in order to survive and grow (Stats SA 2012: 2; Von

Ulmenstein 2011). Welter (2012: 61) notes that the South African restaurant industry is, as expected, highly dependent on customer demand.

During an economic downturn, fewer customers have the financial means and/or willingness to visit restaurants, leaving restaurateurs to compete for a share in a stagnant or shrinking market (Welter 2012: 59). Despite this challenge, the national food and beverage industry of South Africa has shown continuous growth during the recessionary period. The total income generated by this industry increased by 5.2% in October 2013 when compared with the same period in 2012, and restaurants proved to be the largest contributor (45%) to the total income of the industry (Stats SA 2013: 3). The market leaders in the South African sit-down restaurant industry during 2012 were Spur Steak Ranches represented through 254 outlets, and Ocean Basket represented through 143 outlets (Euromonitor International 2013: 2). According to Ha and Jang (2012: 211), this growth can be ascribed in part to the changing lifestyles of customers, who are slowly resuming their spending in this industry by indulging in prepared meals, rather than preparing it themselves. It is furthermore believed that restaurateurs need to realise that customers – who sacrifice their time and money at a restaurant – expect to receive benefits from the restaurant in the form of quality food and services in an attractive environment. Restaurants should, therefore, offer the best quality food and service to impress, satisfy, attract and retain current and potential customers (Namkung & Jang 2010: 1249).

### **Dining atmospherics**

Heung and Gu (2012: 1170) describe atmospherics as the conscious design of a space in order to encourage specific emotional effects in the customer, to ultimately enhance his/her willingness to purchase a product or service. According to Ha and Jang (2012: 205), dining atmospherics can be considered critical in influencing customers' level of satisfaction, predominantly because customer

responses to the environment form part of their consumption experience.

To gain a proper understanding of dining atmospherics, it is important to describe the various dimensions that comprise dining atmospherics. Extant literature suggests that several ambience and design factors can be considered as dining atmospheric dimensions, namely style, layout, colours, lighting, furnishings and ambience (Countryman & Jang 2006; Ha & Jang 2012; Kumar *et al.* 2010).

#### *Style*

Kumar *et al.* (2010: 6) indicate that style enhances the beauty and theatrical feel of a restaurant. It also adds personality and assists in communicating the brand image. A visually pleasing design and style in a restaurant can therefore positively influence a customer's mood (Hultén 2011: 277).

#### *Layout*

Heung and Gu (2012: 1176) are of the opinion that a restaurant with a good layout helps to avoid overcrowding, which in turn creates a positive impression among restaurant patrons, and is therefore considered a key atmospheric element in enhancing the dining experience (Harris & Goode 2010: 232).

#### *Colours*

According to Levy and Weitz (2012: 491), colour can contribute to the 'mood' of a restaurant. Different colours and/or colour combinations can portray a different message or image to customers (Kumar *et al.* 2010: 5). Thus, by understanding the target customer and the effect of various colours on the perceptions and moods of these customers, the restaurant's image can be determined as well as communicated to customers (Countryman & Jang 2006: 537).

#### *Lighting*

Lighting influences the mood and atmosphere in a restaurant. Countryman and Jang (2006: 537) state that customers tend to associate soft incandescent lighting with a higher quality restaurant; whereas bright fluorescent

lighting is typically associated with a cheaper restaurant. Kumar *et al.* (2010: 5) add that lighting can be used to draw attention away from less attractive areas, and also to highlight certain areas of the restaurant. The authors profess further that lighting can help to create excitement, to change a customer's mood, and help improve the restaurant's image (Kumar *et al.* 2010: 5).

#### *Furnishings*

According to Ha and Jang (2012: 205) the type of furniture of the restaurant needs to fit in with the mood and image of the restaurant. The type furniture is also influenced by the target market the restaurant wants to attract, such as mature customers who typically place more emphasis on comfortable furniture. The furniture can ultimately determine the amount of time a customer spends in the restaurant (Countryman & Jang 2006: 537).

#### *Ambience*

Ambience refers specifically to the atmosphere and mood in the restaurant. This atmospheric element is difficult to change, because customers' perceptions about the ambience of a restaurant differ. A positive evaluation of the ambience of a restaurant can lead to positive beliefs and associations with the restaurant (Countryman & Jang 2006: 536).

#### **Perceived quality**

Perceived quality refers to the customer's judgement regarding the overall performance of a product or service (Zeithaml 1988: 3). As customers generally have predetermined expectations when visiting a restaurant, it is crucial that restaurateurs pay attention to perceived quality in an attempt to meet these expectations (Namkung & Jang 2008: 142). In the restaurant industry in particular, Choy *et al.* (2012) and Ha and Jang (2012: 206) distinguish between two dimensions of perceived quality, namely *food quality* and *service quality*.

#### *Food quality*

Quality food can, in brief, be described as food that is well-presented, fresh and tasty

(Ha & Jang 2012: 209; Ryu *et al.* 2012: 208). From their research, Namkung and Jang (2008: 149) identify food presentation and taste as the most influential food quality factors, whereas Ha and Jang (2012: 204) identify food variety as the most important contributor. According to Jangga, Sahari and Basir (2012: 2765), however, restaurants should also consider additional factors such as pricing, presentation, taste, portioning, and value for money when addressing food quality issues.

The research of Ha and Jang (2012), Ryu and Han (2010), and Ryu *et al.* (2012) further indicate that those customers who perceived the quality of food they received at a restaurant as good, were more inclined on spreading positive word-of-mouth and repatronising the restaurant. Edwards (2013: 1), however, notes that quality food is not the only contributor towards customers' satisfaction with a restaurant, and that service quality should also be considered.

#### *Service quality*

In the restaurant industry in particular, service quality refers to the level of service provided by restaurant employees, which in turn depends upon the interactions between customers and restaurant employees (Ha & Jang 2010: 521). These interpersonal service experiences ultimately serve as a way for customers to evaluate the quality of the service offering, and to form their overall quality perceptions of the restaurant (Ryu *et al.* 2012: 201).

By providing quality service, businesses can ultimately improve satisfaction and minimise service failures, and successfully attract and retain customers (Tesfom & Birch 2011: 378). Therefore, building on customer-employee interactions should result in high levels of restaurant service quality, which should result in customer satisfaction (Ryu *et al.* 2012: 201).

#### **Customer satisfaction**

Schiffman and Kanuk (2010: 29) define customer satisfaction as a customer's perception of the performance of a product

or service, in relation to his/her expectations. Bowden and Dagger (2011: 501) mention that customers are satisfied if the performance of a product or service meets their expectations, while they are dissatisfied if expectations are not met. Customer satisfaction is further consistently identified as a key antecedent to loyalty, repurchasing, and long-term relationships, since it positively influences customers' affective commitment, trust and delight (Dagger, Elliot & Bowden-Everson 2013: 52, 67).

As a result, businesses generally aim to meet and/or exceed customers' expectations in an attempt to encourage loyalty and commitment (Martin, O'Neill, Hubbard & Palmer 2008: 224). According to Rust and Huang (2012: 48), poor service and business practices tend to result in lost customers. In terms of restaurants, Jangga *et al.* (2012: 2765) profess that customers evaluate aspects related to both the food and the service received, so as to decide whether their predetermined expectations have been met. Therefore, to ensure satisfied customers, restaurateurs should ensure that overall performance corresponds with customers' expectations (Raychaudhuri & Farooqi 2013: 35). When obtaining customer information, the restaurant can focus on satisfying these specific needs which will result in customer satisfaction, and attaining favourable behavioural intentions towards the restaurant (Choy *et al.* 2012: 11).

### **The relationship between the constructs of the study**

Heung and Gu (2012: 1175) and Ryu *et al.* (2012: 217) found that restaurant atmospherics has a significant and direct effect on customer satisfaction. Kim *et al.* (2009: 16) and Ryu and Han (2010: 323) support this notion further by indicating that dining atmospherics is also a significant determinant of customer satisfaction. Ha and Jang (2010: 527) profess that atmospherics can also impact on the effect of food and service quality on customer satisfaction

Furthermore, Ha and Jang (2010: 528), Kim *et al.* (2009: 16) and Ryu and Han (2010: 324) profess that customers' perceptions of food and service quality have a significant positive effect on overall customer satisfaction. Ladhari, Brun and Morales (2008: 570) view service quality as an effective tool to impact the satisfaction of restaurant patrons.

The following hypothesis is therefore formulated to determine the separate effects of dining atmospherics versus food and service quality on customer satisfaction at sit-down restaurants within a South African context.

H1: Customer perceptions of food and service quality significantly predict customer satisfaction at sit-down restaurants within a South African context when dining atmospherics is controlled for.

### **RESEARCH METHODOLOGY**

A quantitative descriptive research design was followed to execute the study. The study population included residents of major urban areas of the North-West Province of South Africa who have frequented a sit-down restaurant at least once during the six-month period prior to the questionnaire being fielded. Non-probability convenience sampling was used to select respondents to take part in the study.

A self-administered questionnaire was designed to collect data from respondents. The questionnaire consists of several sections and commences with a preamble explaining the purpose of the research, rights of the respondents, completion instructions as well as a screening question.

The subsequent sections of the questionnaire include structured questions designed to obtain (1) a demographic profile of respondents, and to gain (2) insight into the patronage habits of respondents. A seven-point unlabelled Likert-type scale was used to measure the key constructs of the study (i.e. dining atmospherics, food quality, service quality

and customer satisfaction) with 1 representing 'strongly disagree' and 7 'strongly agree'. Items were either adapted or adopted from scales obtained from the work of Countryman and Jang (2006), Dagger and Sweeney (2007), Ha and Jang (2012), Jang, Liu and Namkung (2011), Joseph-Mathews, Bonn and Snepenger (2009), Namkung and Jang (2008) and Soriano (2002) who in turn also adopted and adapted items from scales used in previously published work.

Five trained fieldworkers were employed to collect the data. The fieldworkers had to approach prospective respondents, read the preamble and determine whether the prospective respondent qualified to partake in the study by fielding the screening question. Once a prospective respondent qualified and was willing to take part in the study, the self-administered questionnaire was handed to the respondent to complete. Upon completion the questionnaire was returned to the fieldworker who ensured the questionnaire was complete. Afterwards the researchers checked the quality of the completed questionnaires. In total, 250 questionnaires were suitable for analysis.

SPSS version 21 was used to capture, edit and clean the data. The data analysis strategy included the calculation of frequencies and percentages for variables used to describe the demographic profile of respondents, as well as their sit-down restaurant patronage habits. The next stage of the data analysis strategy involved the assessment of the internal consistency reliability of each scale measuring a particular construct or underlying dimension of a construct. Once validity and reliability of the scales could be confirmed, overall mean scores and standard deviations were calculated for each of the key constructs of the study. In order to test the hypothesis formulated for the study, a hierarchical multiple regression analysis was performed once the assumptions underlying this technique were assessed and were adequately met.

## FINDINGS OF THE RESEARCH

### Demographic profile of respondents

Table 1 provides insights into the demographic profile of respondents who took part in the study.

**Table 1: Demographic profile of respondents**

Variable	Count	Percentage
<i>Age</i>		
27 years and younger	94	37.6
28 to 36 years	17	6.8
37 to 48 years	47	18.8
49 to 67 years	63	25.2
68 years and older	29	11.6
<i>Highest level of education</i>		
Some high school	8	3.2
Matric / Grade 12	79	31.6
Tech diploma / degree	72	28.8
University degree	54	21.6
Postgraduate degree	37	14.8
<i>Gender</i>		
Male	79	31.6
Female	171	68.4
<i>Primary employment status</i>		
Full-time employed	129	51.9
Part-time employed	9	3.6
Self-employed	12	4.8
Student	56	22.5
Housewife or househusband	7	2.8
Retired	31	12.4
Unemployed	3	1.2
Other	2	0.8

It can be seen from Table 1 that the majority of respondents are 27 years and younger (37.6%), followed by those who are between 49 to 67 years of age

(25.2%). The majority of respondents completed high school (31.6%). They are closely followed by those who have completed a technical diploma or degree

(28.8%). Around two thirds of the respondents are female (68.4%) with 31.6% of respondents being male. Just over half of respondents are full-time employed (51.9%) and nearly a quarter of respondents are students (22.4%).

### Sit-down restaurant patronage habits of respondents

Table 2 provides an exposition of the restaurant patronage habits of respondents.

**Table 2: Sit-down restaurant patronage habits of respondents**

Variable	Count	Percentage
<i>Favourite sit-down restaurant (top five)</i>		
Spur Steak Ranch	78	31.2
Ocean Basket	25	10.0
Mike's Kitchen	18	7.2
Beef Boys	16	6.4
Wimpy	15	6.0
<i>Regularity of eating at the sit-down restaurant</i>		
Every second day	1	0.4
Twice a week	2	0.8
Once a week	16	6.4
Once every two weeks	28	11.2
Once a month	79	31.6
Once every two month	44	17.6
Once every three months	47	18.8
Once every six months	33	13.2

It is evident from Table 2 that Spur Steak Ranch is the favourite sit-down restaurant for nearly a third (31.2%) of respondents, followed by Ocean Basket (10.0%), Mike's Kitchen (7.2%), Beef Boys (6.4%) and Wimpy (6.0%). The top five favourite sit-down restaurants were identified by 60.8% respondents as being their favourite. The balance of respondents (39.2%) opted for one of 39 other restaurants. Just over half (50.4%) of respondents eat at a sit-down restaurant once a month or more regularly. Respondents furthermore indicated that they spend an average of R157.03 per meal (with a standard deviation of R104.36) indicating a considerable variation between respondents in the amount spent per meal at their favourite sit-down restaurant.

### Validity

As mentioned earlier, all items were either adopted or adapted from existing scales measuring the same constructs in previous studies. These authors found the measurement scales valid to measure these constructs. The researchers furthermore assessed the validity of the scales measuring the constructs dining atmospherics, service quality, food quality as well as customer satisfaction within the

context of this particular study. In order to assess whether the scales measuring the constructs of the study do in fact embody these constructs, exploratory factor analyses with the aid Maximum Likelihood Model were used to extract the factors and Varimax was used to rotate the factor solutions (Matsunaga, 2010:107; Pallant, 2010:185).

A single factor was extracted for each of the four constructs of the study. The six dimensions of dining atmospherics furthermore explain 68.816% of the variance, the seven items measuring service quality explain 66.145% of the variance, the eight items measuring food quality explain 57.532% of the variance and the three items measuring customer satisfaction explain 83.142% of the variance. The scales measuring the constructs can thus be considered valid.

### Internal consistency reliability

Table 3 provides insight into the reliabilities of the four main constructs of concern in this study as well as the underlying dimensions of dining atmospherics. According to Pallant (2010: 6), Cronbach's alpha coefficients can be calculated to determine the internal

consistency reliability of a scale measuring a particular construct. The author furthermore contends that the closer the Cronbach's alpha coefficient is to 1.00, the

higher the internal consistency reliability of a scale while a value of at least 0.70 or higher is appropriate (Pallant, 2010: 6).

**Table 3: Cronbach's alpha coefficients**

Construct	No of items	Cronbach's alpha coefficient
Dining atmospherics	24	0.958
Food quality	7	0.899
Service quality	7	0.737
Customer satisfaction	7	0.951

It is evident from Table 3 that the Cronbach's alpha coefficients for all constructs are above 0.70 and the scales measuring these constructs and underlying dimensions can be considered reliable. One item was, however, removed from the food quality scale in order to improve the internal consistency reliability of the scale from 0.646 to an acceptable 0.899. Once validity and reliability of the

scales could be established, standard deviations and overall mean scores were calculated for the main constructs of the study.

#### **Descriptive results for constructs**

Table 4 presents the standard deviations (SD) and overall mean scores for each of the main constructs of the study.

**Table 4: Descriptive results**

Item	SD	Mean
Dining atmospherics	0.872	5.45
Food quality	0.827	6.04
Service quality	1.186	5.73
Customer satisfaction	1.002	5.98

Given that a seven-point scale was used to measure respondents' level of agreement with items contained in the scales measuring the key constructs of the study, it is evident that respondents agreed overall fairly strongly with items measuring these constructs. The highest mean was realised for food quality (mean = 6.04), followed by customer satisfaction (mean = 5.98), service quality (mean 5.73) and dining atmospherics (mean = 5.45) respectively.

#### **Hypothesis testing**

##### *Assessing the assumptions of a multiple regression analysis*

Before a hierarchical multiple regression analysis is performed, several assumptions regarding the data have to be met with respect to sample size, collinearity, data distribution, linearity, outliers, as well as homoscedasticity

(Pallant 2010: 150-151). With respect to these assumptions, the following can be reported:

- Based on the number of independent variables being considered (three independent variables), a minimum sample size of 74 is required to conduct a multiple regression analysis. With a sample size of 250 realised for this study, this assumption was met (Pallant 2010: 150).
- A multiple regression analysis furthermore requires adequate correlation between the independent variables without the correlations being so strong that multicollinearity occurs. The correlation coefficients between pairs of independent variables all range below the maximum of 0.9 ( $0.570 < r < 0.644$ ) (Pallant 2010: 151).

- With respect to collinearity diagnostics that also assist in diagnosing multicollinearity between variables, a Tolerance value higher than 0.1 is required and the Variance Inflation Factor (VIF) should be less than 10 for each independent variable so as to not violate the multicollinearity assumption. In this instance, the assumption of multicollinearity is not violated (Tolerance values  $\geq 0.488$  and VIFs  $\leq 2.049$ ) (Pallant 2010: 158).
- The data points on the Normal probability P-P plot are in a straight line and therefore fairly normally distributed. The data points on the scatter plot are furthermore in a rectangular formation, indicative that the assumption related to homoscedasticity has been met, while cases with maximum Mahalanobis distances exceeding 16.27 were removed since they can be regarded as outliers where three independent variables are considered. Finally, the researchers ensured that no case had a Cook's distance of more than 1 as these cases (outliers) could adversely

affect the results (Tabachnik & Fidell (2007) cited in Pallant 2010: 158-160).

Based upon the abovementioned assessment, the use of a hierarchical multiple regression analysis to test the alternative hypothesis of the study was permissible. The independent variable dining atmospherics was first entered (Model 1) followed by food quality and service quality (Model 2) in order to determine their separate effects.

*Evaluating the model*

It is evident from Table 5 that Model 1 (including dining atmospherics) explains 38.4% of the variance in customer satisfaction. Once dining atmospherics has been controlled and food and service quality variables were entered, Model 2 explains 63.4% of the variance in customer satisfaction. Based upon the p-value for the F change, the inclusion of food quality and service quality in the model (Model 2) leads to a significant (p-value < 0.0005) increase of 25.0% in the variance explained in customer satisfaction.

**Table 5: Model summary<sup>c</sup>**

Model	R	R <sup>2</sup>	Adjusted R <sup>2</sup>	R Square Change	F Change	Sig. F Change
1	0.620 <sup>a</sup>	0.384	0.381	0.384	146.407	0.000
2	0.796 <sup>b</sup>	0.634	0.629	0.250	79.618	0.000

a Predictor: (Constant), Dining atmospherics

b Predictors: (Constant), Dining atmospherics, Food quality, Service quality

c Dependent variable: Customer satisfaction

From Table 6 it is evident that Model 2 (including all three independent variables) is also furthermore significant (p < 0.0005).

**Table 6: ANOVA<sup>a</sup>**

Model		Sum of Squares	df	Mean Square	F-value	p-value
1	Regression	76.839	1	76.839	146.407	0.000 <sup>b</sup>
	Residual	123.336	235	0.525		
	Total	200.175	236			
2	Regression	126.910	3	42.303	134.534	0.000 <sup>c</sup>
	Residual	73.265	233	0.314		
	Total	200.175	236			

a Dependent variable: Customer satisfaction

b Predictor: (Constant), Dining atmospherics

c Predictors: (Constant), Dining atmospherics, Food quality, Service quality

*Evaluating the independent variables*

From Model 2 in Table 7 it is evident that all three independent variables, namely

dining atmospherics ( $\beta$ -value = 0.188), food quality ( $\beta$ -value = 0.409) and service quality ( $\beta$ -value = 0.319) are significant

predictors of customer satisfaction (p-values < 0.0005). Food quality proved to be the best predictor of customer

satisfaction, followed by service quality and then dining atmospherics.

**Table 7: Coefficients<sup>a</sup>**

Model		Standardised coefficient Beta-value	t	p-value
1	Constant		7.601	0.000
	Dining atmospherics	0.620	12.100	0.000
2	Constant		0.697	0.486
	Dining atmospherics	0.188	3.553	0.000
	Food quality	0.409	7.568	0.000
	Service quality	0.319	5.619	0.000

a Dependent variable: Customer satisfaction

Based upon the results, the following findings can be made regarding the hypothesis formulated:

H1 that customer perceptions of food and service quality significantly predict customer satisfaction at sit-down restaurants within a South African context when dining atmospherics is controlled for can be accepted.

## DISCUSSION AND IMPLICATIONS

The majority of respondents taking part in the study are young, relatively well educated and full-time employed representing, what one could consider, an attractive market for sit-down restaurants in South Africa. As is evident from the patronage habits of respondents, Spur Steak Ranches followed by Ocean Basket are considered the favourite sit-down restaurants of most respondents. This finding is in line with the Euromonitor International (2013: 2) report on the South African restaurant industry. Just over half of the respondents frequent a sit-down restaurant once a month or more, indicating that sit-down restaurants do have customers that frequent them regularly. The balance of those surveyed patronise sit-down restaurants only once every two months or less. This presents an opportunity for sit-down restaurants to develop marketing strategies to increase the frequency with which this group patronises sit-down restaurants. The study also uncovered that respondents spend an average of R157.03 per meal, but this varies considerably between respondents.

Respondents rate food quality, service quality and dining atmospherics fairly high with food quality realising the highest overall mean score, followed by service quality and dining atmospherics respectively. Customer satisfaction also realised a positive overall mean score. The positive scores can be expected, since the rating applied to respondents' favourite sit-down restaurant.

Since the aim of the study was to determine the extent to which food and service quality as well as dining atmospherics predict customer satisfaction, a hierarchical multiple regression analysis was conducted to determine the effects of dining atmospherics and food and service quality separately. The results of the hierarchical multiple regression analysis indicate that when only dining atmospherics is considered, the regression model explains just over a third of the variance in customer satisfaction, indicating that other factors are also at play in predicting customer satisfaction at sit-down restaurants within a South African context. Once dining atmospherics is controlled for and food and service quality's ability to predict customer satisfaction is considered, Model 2 explains nearly two thirds of the variance in customer satisfaction, realising a 25% increase in variance explained. When the standardised coefficients were examined, it became clear that dining atmospherics, food quality and service quality are all

significant predictors of customer satisfaction, although to varying extents.

Food quality (the taste, freshness, innovativeness, temperature, consistency, variety and healthy nature of the food) is the most important predictor of customer satisfaction. Since perceived food quality predicts customer satisfaction, it is important for restaurateurs to focus on maintaining and/or improving food quality by focusing on the taste, freshness, innovativeness, temperature, consistency, variety and healthy nature of the food they offer. Through customer surveys restaurateurs are able to determine food quality perceptions of patrons and improve on those aspects that lag behind the rest.

Service quality (the willingness, courtesy, competency, concern, pleasing appearance and attentiveness of staff) is the second most important predictor of customer satisfaction. Since perceived service quality predicts customer satisfaction, it is important for restaurateurs to focus on ensuring that employees who come into contact with patrons (such as waiters) are willing to assist patrons, are courteous, concerned about and attentive to patrons, that they are competent and pleasing in appearance at all times. Through customer surveys restaurateurs are able to determine service quality perceptions of patrons and improve on those aspects that lag behind the rest.

The findings with respect to food and service quality are in line with the findings of other studies including those of Ha and Jang (2010), Namkung and Jang (2008) and Ryu *et al.* (2012). From the literature review, it is also evident that customers generally have pre-determined expectations regarding food and service quality when visiting sit-down restaurants. If customers are satisfied after visiting a restaurant, they will be more likely to revisit the restaurant in future, and contribute to the restaurant's profitability and sustainability.

Dining atmospherics (the style, layout, colours, lighting, furnishings and ambience

of the restaurant) is least important, but still a significant predictor of customer satisfaction. This is also in line with the findings of other studies including Harris and Goode (2010), Heung and Gu (2012), Jang *et al.* (2011), and Joseph-Mathews *et al.* (2009). Restaurateurs of sit-down restaurants therefore need to consider the improvement of the overall dining atmosphere of a restaurant, to in the end enhance customers' satisfaction. It is, however, suggested that restaurateurs determine the perception of patrons towards the different dining atmospherics and focus on improving those elements found lacking. Dining atmospherics can typically be improved by optimising the design and layout of the restaurant, implementing the most fitting colour schemes and furniture (based on the type of establishment), and creating the desired ambience by means of effective light use, to mention only a few strategies.

## LIMITATIONS AND FUTURE RESEARCH

Limited secondary data is available with respect to the South African restaurant industry. This could be ascribed to the fact that South Africa is a developing country with often limited and outdated information being available. As a result, it is difficult to gain proper insight into the restaurant industry and the environment within which it operates.

In terms of the empirical study, the main limitation is the fact that a sample frame could not be obtained. This resulted in a situation where prospective respondents were targeted based upon convenience, limiting the representativeness of the sample. The study was also limited to one province in South Africa, namely the North-West Province, which impacts the generalizability of results.

Future studies can therefore expand this research by identifying a more representative sample, including all nine South African provinces in the study. A larger sample can also be considered. Furthermore, instead of surveying respondents about their favourite sit-down

restaurants, surveys can be conducted at restaurants to gain insight into respondents' dining experiences at particular restaurants, irrespective of it being their favourite restaurant or not.

## CONCLUSION

In order to retain their customers in a competitive restaurant industry, restaurateurs at sit-down restaurants in

South Africa have to ensure customer satisfaction amongst their patrons. Food quality followed by service quality and dining atmospherics respectively, were all found to significantly influence customer satisfaction at sit-down restaurants. The study provides insight into the aspects restaurateurs need to consider in order to increase customer satisfaction and to ultimately be sustainable and prosper.

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