“An Empirical Investigation of Service Quality and Customer Satisfaction in Professional Accounting Firms: Evidence from North Cyprus”

AUTHORS	Mehmet Aga Okan Veli Safakli

ARTICLE INFO	Mehmet Aga and Okan Veli Safakli (2007). An Empirical Investigation of Service Quality and Customer Satisfaction in Professional Accounting Firms: Evidence from North Cyprus. *Problems and Perspectives in Management*, *5*(3)
RELEASED ON	Monday, 03 September 2007
JOURNAL	"Problems and Perspectives in Management"
FOUNDER	LLC “Consulting Publishing Company “Business Perspectives”

NUMBER OF REFERENCES **0**

NUMBER OF FIGURES **0**

NUMBER OF TABLES **0**

© The author(s) 2024. This publication is an open access article.

An Empirical Investigation of Service Quality and Customer Satisfaction in Professional Accounting Firms: Evidence from North Cyprus

Mehmet Aga[*], Okan Veli Safakli[**]

Abstract

Business organizations make considerable use of professional services. However, it has received less attention in the context of professional business services than of other consumer services in general. This study represents an empirical assessment of service quality and customer satisfaction in professional accounting firms operating in North Cyprus. The general purpose of this study was to examine the potential of SERVQUAL, an instrument frequently employed to assess the quality of consumer services, in professional accounting firms and to identify those managerial actionable factors that impact customer satisfaction. In addition, the study explored the relationship among customer satisfaction, service quality, firm image, and price of service rendered.

The results of the empirical study indicate that (1) the SERVQUAL instrument with five-dimensions provides good measurement of service quality in the context of professional accounting business; only one (i.e., empathy) out of five dimensions of SERVQUAL was statistically significant related to customer satisfaction, (2) service quality has a positive effect on customer satisfaction, (3) firm image and the price of service have positive impact on customer satisfaction, and (4) the price of service directly influences service quality. The impact on satisfaction from highest to lowest in order was, overall firm image, price compared to quality and service quality (empathy), respectively. This tells us the firm image is the most important factor to customer satisfaction, price next and service quality last from firms' perspective. From our empirical results, we may infer that the clients believe that no matter which accounting firm they choose should have a certain degree of service quality guaranteed in the highly competitive battle field.

Key words: Quality of consumer services; Customer satisfaction; Accounting firms; SERVQUAL.
JEL Classification: M30, M31, M40, M41.

Introduction

Today the quality of products and services consumed is of great importance. It is widely accepted that surviving in difficult and competitive conditions of a market economy requires good quality production. To understand and asses the results of efforts realized for good quality production, quality should be measurable. While the quality of goods can easily be measured by taking into account the certain physical properties, the measurement for services is rather difficult because the quality in this case depends on large number of factors.

While there have been efforts to study service quality, there has been no general agreement on the measurement of the concept. The majority of the work to date has attempted to use the SERVQUAL (Parasuraman *et al.*, 1985; 1988) methodology in an effort to measure service quality (e.g. Brooks *et al.*, 1999; Edvardsson *et al.*, 1997; Lings and Brooks, 1998; Reynoso and Moore, 1995; Sahney *et al.*, 2004). SERVQUAL is also started to be applied for accounting and auditing firms (Kang and Bradley, 2002; Keng and Liu, 1998; Armstrong and Smith 1996; Hong and Wu, 2003). Regarding Northern Cyprus no study measuring service quality of accounting firms is encountered. In this respect, the purpose of this study is to assess customers' perceptions of service quality with an accounting service firm. It was a study where investigations using

[*] Near East University, Turkey.
[**] Near East University, Turkey.

© Mehmet Aga, Okan Veli Safakli, 2007.

SERVQUAL was carried out to assess the quality of services provided to clients of local accounting firms in Northern Cyprus.

Professional accounting firms in Northern Cyprus were investigated with the following objectives set for the study:

- To examine the potential application of SERVQUAL in the case of a professional accounting services companies.
- To identify those managerially actionable factors (such as price and firm image) that impact service quality and customer satisfaction at the selected professional accounting firms.

Company formations come in legally described different forms. In Northern Cyprus, there are over 12,000 ltd companies that are legally enforced to get their accounts audited by registered accounting firms (Office of the Registrar and Receiver of Companies, 2006). Correspondingly, there are 251 accounting firms and registered accountants offering auditing services. Due to the latest political and other developments in Cyprus the number of companies are on the increase so is the competition between the accounting firms to maintain or increase their market share. Evidently, there is a need to understand why business companies select and switch accounting firms in general and in Northern Cyprus in particular.

Literature Review and Conceptual Framework

Many of the definitions of service quality revolve around the identification and satisfaction of customer needs and requirements (Cronin and Taylor, 1992: 55-68; Parasuraman et al., 1988, 1985). Parasuraman *et al.* (1985) argue that service quality can be defined as the difference between predicted, or expected, service (customer expectations) and perceived service (customer perceptions). If expectations are greater than performance, then perceived quality is less than satisfactory and a service quality gap materializes. This does not necessarily mean that the service is of low quality but rather that customer expectations have not been met hence customer dissatisfaction occurs and opportunities arise for better meeting customer expectations.

SERVQUAL scale is a principal instrument in the services marketing literature for assessing quality (Parasuraman *et al.*, 1991; Parasuraman et al., 1988). This instrument has been widely utilized by both managers (Parasuraman *et al.*, 1991) and academics (Babakus and Boller, 1992; Carman, 1990) to assess customer perceptions of service quality for a variety of services (e.g. Banks, credit card companies, repair and maintenance companies). The results of the initial published application of the SERVQUAL instrument indicated five dimensions of service quality emerged across a variety of services. These dimensions include tangibles, reliability, responsiveness, assurance and empathy (Zeithaml et al., 1990: 176; Brensinger and Lambert, 1990; Crompton and MacKay, 1989). *Tangibles* are the physical evidence of service, *reliability* involves consistency of performance and dependability, *responsiveness* concerns the willingness or readiness of employees to provide services, *assurance* corresponds to the knowledge and courtesy of employees and their ability to inspire trust and confidence, and finally, *empathy* pertains to caring, individualized attention that a firm provides its customers (Lassar *et al.*, 2000: 245-46).

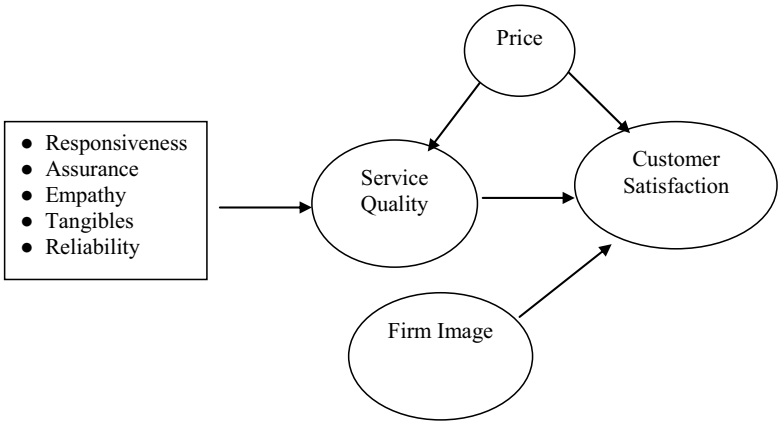
In its original form, SERVQUAL contains 22 pairs Likert scale statements structured around five service quality dimensions in order to measure service quality (Cronin and Taylor, 1992). Each statement appears twice. One measures customer expectations of a particular service industry. The other measures the perceived level of service provided by an individual organization in that industry. The 22 pairs of statements are designed to fit into the five dimensions of service quality. A seven-point scale ranging from “strongly agree” (7) to “strongly disagree” (1) accompanies each statement. The “strongly agree” end of scale is designed to correlate with high expectations and high perceptions. Service quality occurs when expectations are met (or exceeded) and a service gap materializes if expectations are not met. The gap score for each statement is calculated as the perception score minus the expectation score. A positive gap score implies that expectations have

been met or exceeded and a negative score implies that expectations are not being met. Gap scores can be analyzed for each individual statement and can be aggregated to give an overall gap score for each dimension (Parasuraman et al., 1988).

Conceptual Framework

The study applies the model used by Hong and Wu (2003). The model is shown in Figure 1. This model begins with SERVQUAL measurement scale, consisting of five-dimensional structure (responsiveness, assurance, empathy, tangibles, and reliability), to assess service quality. Next, we develop a set of hypotheses surrounding major variables (such as price, firm image, service quality and customer satisfaction). Then, we examine the effect of these variables. Finally, we present a discussion in support of the hypothesized influence of the various variables on service quality and customer satisfaction. According to the model, customer satisfaction and firm image can be defined and intercorrelated as follows:

- "Satisfaction is the consumer's fulfillment response. It is a judgment that a product or service feature, or the product or service itself, provided (or is providing) a pleasurable level of consumption-related fulfillment, including levels of under- or over-fulfillment…" (Oliver, 1997). Although there is conflicting evidence (e.g., Rosen and Suprenant, 1998), the bulk of the literature tends to support satisfaction as an outcome of service quality (Brady and Robertson, 2001; Cronin and Taylor, 1994; Parasuraman *et al.,* 1994; Taylor and Baker, 1994; Teas, 1994). The dominant assumption therefore is that the evaluation of the quality of the service provided determines, along with other factors, the customer's level of satisfaction with the organisation or service provider (Hurley and Estelami, 1998).
- "Firm image refers to perceptions of a firm reflected in the associations held in consumer memory (Keller, 1993). Firm image can impact perceptions of quality, value, and satisfaction and loyalty (Gronroos,1990; Andreessen and Lindestand, 1998).
- "From the consumer's perspective price is defined what is given up or sacrificed to obtain a product or service" (Zeithaml, 1988). Even though the relationship between price and quality is assumed positive, the direction of relationship between price and quality may also be negative (Peterson and Wilson, 1985). On the other hand, while it is reported that postpurchase price perceptions have a significant, positive effect on satisfaction (Voss *et al.,* 1998), the price of the service can greatly influence perceptions of quality, satisfaction, and value (Zeithaml and Bitner, 2000).



Source: Hong, S-C. and Wu, H. (2003), "An Empirical Assessment of Service Quality and Customer Satisfaction in Professional Accounting Firms", *Thirty-Second Annual Meeting,* March 27-29, Northeast Decision Sciences Institute, Providence, Rhode Island, USA.

Fig. 1. A model of customer satisfaction in the context of professional services

Within the framework of the model above, the following hypotheses are tested in the study:

H1: Service quality will have a positive direct effect on customer satisfaction.

H2: Firm image will have positive effect on customer satisfaction.

H3: The price of service directly influences customer satisfaction.

H4: The price of service directly influences service quality.

Methodology

Sources, collection and analysis of data are discussed in this section in order to justify the methods chosen for the proposed investigations.

Sources of data

Key motivating literatures that were scanned and the empirical steps that were followed in the study are discussed below.

Secondary data collection

Literature review into customer satisfaction with regard to service products and the SERVQUAL model was carried out for mainly two reasons. First, whether the SERVQUAL instrument is applicable in the context of professional accounting business was discussed. The appropriate numbers of dimensions of SERVQUAL were explored. Second, the course of analysis of the full model for investigations was introduced.

The measuring instrument, sample and primary data collection

In preparation for the study, in-depth interviews with some partners from accounting firms and some existing clients of the sample companies were conducted to ensure the face validity of the measures. Several academic researchers were approached to provide some advices. Based on their feedback, several items of the original SERVQUAL questionnaire were deleted and modified. The questionnaire was pre-tested with 30 clients of various accounting firms. Respondents have explicitly been asked to indicate any ambiguities or potential sources of error stemming from the format or the wording of the questionnaire. Inputs from these respondents were used to further refine and modify the SERVQUAL instrument.

A cover letter explaining the nature and importance of the research offering a summary report of the findings on completion of the study was sent to the clients of the companies who will be selected purely by random (convenience) sampling. The questionnaire does contain three parts:

Part I does contain questions about the customer's opinion of perceived and expected services, respectively. Part II does ask the customer to evaluate the accounting firm in terms of various constructs. Part III does contain demographic information to determine the title of respondent and type of business engaged, etc. Questionnaires had been hand delivered to owners/managers of customer companies and has been collected later at the convenience of the customer companies. Of the 120 instruments mailed, 109 questionnaires were returned (9 of which were unusable), yielding an effective responsive rate of 91.74%. The sample consists of 100 companies that span all industries from foods, …...to real estate, construction and tourism industries.

Table 1

Demographic information

Items	Total	%
Title:		
Chairman/President	55	55
Vice President	30	30
Accounting Manager	10	10
Other	5	5
Type of Business Engaged:		
Textile	19	19
Service sector	15	15
Electricity company	4	4
Construction	15	15
Rent A Car	5	5
Tourism	4	4
Other	38	38
Number of year:		
0-5	50	50
6-10	18	18
11-15	13	13
16-20	12	12
21-…..	7	7

Measurement of the Constructs

This section explains our measures and validation. All the final scale items are provided in the Appendix 1 and 2. A 5-point Likert scale was applied to measure the different constructs anchored from strongly disagree to strongly agree.

Questionnaire shown in appendix used to measure service quality, customer satisfaction and firm image is taken from the study of Hong and Wu (2003). As to service quality, 19 measurement variables are adapted from Parasuraman et al. (1988; 1991) SERVQUAL instrument to this particular professional accounting business. This led to five-factor dimension of service quality, consisting of tangibles, reliability, responsiveness, assurance and empathy.

Validation of Measures

The SPSS programme was used to analyze the results of the questionnaire. We assessed the validity (reliability) by reviewing the t-test, and after that we explored the interrelationship between dependent variable (customer satisfaction) and the independent variables (service, quality, firm image, and price of services rendered). Durbin-Watson statistic was used to test for the presence of serial correlation among the residuals and Collinearity Diagnostics was tested for possible multicollinearity among the above mentioned explanatory variables.

As discussed in earlier sections, we conducted in-depth interviews with some partners from accounting firms and some of their existing clients while preparing our SERVQUAL questionnaire. Since SERVQUAL is a well-established measure, the scale can be considered to possess content validity. Empirically, convergent validity can be assessed by reviewing the t-tests for the factor loadings of the indicators. If all factor loadings for the indicators measuring the same construct are statistically significant (greater than twice their standard error), this can be viewed as evidence supporting the convergent validity of those indicators (Anderson and Gerbing, 1988). Table 2 presents that all t-tests were significant showing that all indicators were effectively measuring the same construct, or high convergent validity. In addition, those reliability coefficients were also

found acceptable: 0.866 (responsiveness), 0.766 (assurance), 0.772 (empathy), 0.829 (tangibles), and 0.891 (reliability). For subsequent measurement model evaluation and hypothesis testing, we aggregated the SERVUQAL to have five indicators (i.e., RES, ASS, EMP, TAN, and REL) by summing of the measurement items at the first-order construct level.

Table 2

Sig. (2-Tailed) and T values of SERVQUAL scale

Parameter	Sig. (2- Tailed)	T-Value	Reliability (Cronbach's α)
Responsiveness			.866
RES 1	.000	-4.187	
RES 2	.000	-4.119	
RES 3	.000	-5.327	
RES 4	.000	-3.987	
Assurance			.766
ASS 5	.000	-3.796	
ASS 6	.010	-2.619	
ASS 7	.002	-3.112	
ASS 8	.002	-3.188	
Empathy			.772
EMP 9	.004	-2.938	
EMP 10	.000	-4.191	
EMP 11	.000	-3.697	
EMP 12	.003	-3.063	
Tangibles			.829
TAN 13	.047	2.009	
TAN 14	.480	.709	
TAN 15	.917	.104	
Reliability			.891
REL 16	.002	-3.235	
REL 17	.004	-2.947	
REL 18	.001	-3.306	
REL 19	.000	-4.950	

The second measurement model included customer satisfaction, price, and firm image. We calculated Cronbach's alpha for the scale items to ensure that they exhibited satisfactory levels of internal consistency. Reliability was checked by calculating Cronbach's alpha. The reliabilities of these scales were .788 (customer satisfaction), .842 (price), and .844 (firm image), respectively.

Analysis and Results

The following hypotheses cited in the conceptional framework will be tested by applying regression analysis.

H1: Service quality will have a positive direct effect on customer satisfaction.

H2: Firm image will have positive effect on customer satisfaction.

H3: The price of service directly influences customer satisfaction.

H4: The price of service directly influences service quality.

When Table 3 is examined, it shows that all models are statistically significant since $p < .05$. So, substantial correlation between predictor variables and dependent variable exists in the models. Therefore, we need to accept all hypotheses. However, when the significance of predictors (explanatory variables) is examined in Table 4, only one predictor from each model is found to be statistically significant.

Table 3

Summary of Model Findings Testing Hypothesis

	R Square	Durbin-Watson	F	Sig. (*p*)
Model 1 (H1) Service Quality → Customer satisfaction a. Predictors: (Constant), rel2q, tan2q, res2q, emp2q, ass2q b. Dependent Variable: customer satisfaction1	.366	1.873	10.860	.000**
Model 2 (H2) Firm image → customer satisfaction a. Predictors: (Constant), firm image8, firm image7 b. Dependent Variable: customer satisfaction1	.167	1.949	9.699	.000**
Model 3 (H3) Price → Customer satisfaction a. Predictors: (Constant), price6, price4, price5 b. Dependent Variable: customer satisfaction1	.103	1.928	3.694	.014*
Model 4 (H4) Price → Service Quality a. Predictors: (Constant), price6, price4, price5 b. Dependent Variable: Service Quality (SQ)	.225	1.857	9.278	.000**

** significant at $p < .001$, * significant at $p < .05$.

The findings of the models above and the significance of predictors shown in Table 4 can be summarised as follows:

MODEL 1: R-square value indicates that about 36.6% of the variance in customer satisfaction is explained by five predictor variables as the quality dimensions. Among predictors, only empathy has explanatory power on customer satisfaction since $p < .05$. The direction of influence is positive.

MODEL 2: R-square value indicates that about 16.7% of the variance in customer satisfaction is explained by two predictor variables as the image variables. Among predictors, only overall firm image has explanatory power on customer satisfaction since $p < .05$. The direction of influence is positive.

MODEL 3: R-square value indicates that about 10.3% of the variance in customer satisfaction is explained by three predictor variables as the price variables. Among predictors, only price compared to quality has explanatory power on customer satisfaction since $p < .05$. The direction of influence is positive.

MODEL 4: R-square value indicates that about 22.5% of the variance in service quality is explained by three predictor variables as the price variables. Among predictors, only price compared to quality has explanatory power on service quality since $p < .05$. The direction of influence is positive.

Table 4

Summary of Model Coefficients for Testing Hypothesis

	Predictors	Standardized Coefficients	t	Sig.
Model 1 (H1) Service Quality → Customer satisfaction a. Predictors: (Constant), rel2q, tan2q, res2q, emp2q, ass2q b. Dependent Variable: customer satisfaction1		Beta		
	(Constant)		75.944	.000
	RESAVEQS	.250	1.073	.286
	ASSAVEQS	.-054	-.205	.838
	EMPAVEQS	.307	2.111	.037*
	TANAVEQS	.019	.201	.841
	RELAVEQS	.159	1.185	.239
Model 2 (H2) Firm image → customer satisfaction a. Predictors: (Constant), firm image8, firm image7 b. Dependent Variable: customer satisfaction1	(Constant)		7.831	.000
	firm image7	.442	3.221	.002*
	firm image8	-.047	-.345	.731
Model 3 (H3) Price → Customer satisfaction a. Predictors: (Constant), price6, price4, price5 b. Dependent Variable: customer satisfaction1	(Constant)		8.630	.000
	price4	.296	2.267	.026*
	price5	.067	.488	.627
	price6	-.025	-.168	.867
Model 4 (H4) Price → Service Quality a. Predictors: (Constant), price6, price4, price5 b. Dependent Variable: Service Quality (SQ)	(Constant)		-5.887	.000
	price4	.247	2.032	.045*
	price5	.210	1.640	.104
	price6	.086	.613	.542

* significant at $p < .05$.

Testing Problems with Regression Analysis

Autocorrelation' and 'multicollinearity' are the basic problems of regression analysis. When tables for four models are considered together, the same generalized evaluation can be made as follows:

- The Durbin-Watson test is a widely used method of testing for autocorrelation. The Durbin-Watson Statistic is used to test for the presence of serial correlation among the residuals. Unfortunately, SPSS does not print the probability for accepting or rejecting the presence of serial correlation, though probability tables for the statistic are available in other texts. The value of the Durbin-Watson statistic ranges from 0 to 4. As a general rule of thumb, the residuals are uncorrelated if the Durbin-Watson statistic is approximately 2. A value close to 0 indicates strong positive correlation, while a value of 4 indicates strong negative correlation (Durbin and Watson, 1971). Durbin-Watson should be between 1.5 and 2.5 indicating the values are independent (Statistica). As shown in Table 3 Durbin-Watson values belonging to four models are between 1.5 and 2.5 showing the absence of auto correlation.
- Collinearity diagnostics were run to test for possible multicollinearity among the explanatory variables in model 1, model 2, model 3 and model 4. The Table 5 shows multicollinearity test results. As can be seen, considering all models there is no evi-

dence of a multicollinearity problem since the condition index for each dimension is lower than 30 and at least two variance proportions are lower than 0.50 (Tabashnick and Fidell, 1996).

Table 5

Collinearity Diagnostics for Models Testing Hypothesis

	Condition Index	Variance Proportions					
		(Constant)	res2q	ass2q	emp2q	tan2q	rel2q
Model 1 (H1) Service Quality → Customer satisfaction a. Predictors: (Constant), rel2q, tan2q, res2q, emp2q, ass2q b. Dependent Variable: customer satisfaction1	1.000	.02	.01	.00	.02	.01	.02
	1.823	.19	.00	.00	.00	.44	.00
	2.608	.77	.02	.01	.00	.34	.00
	3.757	.00	.08	.04	.04	.15	.67
	4.153	.01	.03	.00	.87	.04	.30
	9.139	.01	.87	.95	.07	.03	.00

Model 2 (H2) Firm image → customer satisfaction a. Predictors: (Constant), firm image8, firm image7 b. Dependent Variable: customer satisfaction1		(Constant)	firm image7	firm image8
	1.000	.00	.00	.00
	12.622	.81	.02	.31
	19.96	.19	.98	.69

Model 3 (H3) Price → Customer satisfaction a. Predictors: (Constant), price6, price4, price5 b. Dependent Variable: customer satisfaction1		(Constant)	price4	price5	price6
	1.000	.00	.00	.00	.00
	13.067	.65	.01	.23	.10
	16.943	.21	.41	.58	.15
	19.774	.14	.58	.19	.75
Model 4 (H4) Price → Service Quality a. Predictors: (Constant), price6, price4, price5 b. Dependent Variable: Service Quality (SQ)					
		(Constant)	price4	price5	price6
	1.000	.00	.00	.00	.00
	13.067	.65	.01	.23	.10
	16.943	.21	.41	.58	.15
	19.774	.14	.58	.19	.75

Discussion and Implications for management

This study added to the understanding and applicability of SERVQUAL by examining the validity of the instrument in the context of accounting firms. In addition, we also explored the relationship among customer satisfaction, service quality, firm image, and price of service rendered by calculating the mean differences between perception and expectation.

Table 6

Perception, Expectation and mean differences

	Perception				Expectation				
Respon-siveness (RES)	Top box	Low box	Mean	Std Dev.	Top box	Low box	Mean	Std. Dev.	Mean differ.
QS1	4.4804	4.2196	4.350	.65713	4.7017	4.4983	4.600	.51247	.-250
QS2	4.3681	4.0719	4.220	.74644	4.6471	4.4329	4.540	.53973	.-320
QS3	4.3971	4.1229	4.260	.69078	4.7905	4.5895	4.690	.50642	.-430
QS4	4.4716	4.1684	4.320	.76383	4.7546	4.5354	4.640	.57770	.-320
Total:			17.15				18.47		-1.32
Assurance (ASS)									
QS5	4.4608	4.1392	4.300	.81029	4.7700	4.5500	4.660	.55450	.-360
QS6	4.5844	4.3556	4.470	.57656	4.7531	4.5469	4.650	.51981	.-180
QS7	4.5621	4.2579	4.410	.76667	4.7864	4.5936	4.690	.48607	.-280
QS8	4.6345	4.4055	4.520	.57700	4.8319	4.6481	4.740	.46319	.-220
Total:			17.70				18.74		-1.04
Empathy (EMP)									
QS9	4.4955	4.2645	4.380	.58223	4.6837	4.4563	4.570	.57305	.-190
QS10	4.3912	4.0288	4.210	.91337	4.6727	4.4673	4.570	.51747	.-360
QS11	4.4035	4.0565	4.230	.87450	4.6899	4.4701	4.580	.55377	.-350
QS12	4.3154	3.9846	4.150	.83333	4.5773	4.3227	4.450	.64157	.-30
Total:			16.97				18.17		-1.20
Tangibles (TAN)									
QS13	4.4788	4.2012	4.340	.69949	4.3170	3.9030	4.110	1.0434	.23
QS14	4.3921	4.1079	4.250	.71598	4.3429	4.0171	4.180	.82118	.070
QS15	4.3869	4.0931	4.240	.74019	4.3762	4.0838	4.230	.73656	.001
Total:			12.83				12.52		.310
Reliability (REL)									
QS16	4.6331	4.3269	4.480	.77172	4.8497	4.6703	4.760	.45216	.-280
QS17	4.6544	4.4056	4.530	.62692	4.8408	4.6592	4.750	.45782	.-220
QS18	4.6822	4.3978	4.540	.71661	4.8846	4.7154	4.800	.42640	.-260
QS19	4.6636	4.3964	4.530	.67353	4.9661	4.8339	4.900	.33333	.-370
Total:			18.08				19.21		-1.13

Dimensionality of SERVQUAL

The five dimensions of SERVQUAL (i.e., Responsiveness, Assurance, Empathy, Tangibles, and Reliability) were supported by the data collected here. This study also found that a significant expectation gap does exist in the sample population. Since the average difference score was calculated by perception minus expectation (negative values imply that perceptions fall short of expectation, and positive values imply that perceptions exceed expectations), the mean score also indi-

cates that the higher (less negative) the score, the higher is the level of perceived service quality. This implies that there is still some room for improvement in terms of service quality. Specifically, they are responsiveness (mean score = -1.320), empathy (mean score = -1.200), reliability (mean score = -1.130), and assurance (mean score = -1.040) from the highest to lowest in order. This indicates that clients need more responsiveness and empathy from their accounting firms and less care about accounting firms' assurance. This result makes sense since most of the filed work is performed at the client's sites. So if an accounting firm needs to stand out in a highly competitive environment, more concerns to their clients are greatly needed. We have positive mean score only for **tangibles** which means that perceptions of respondents are statistically equal to their expectations.

Conclusion & Recommendations

Business organizations make considerable use of professional services. However, it has received less attention in the context of professional business services than of other consumer services in general. The purpose of this study was to examine the potential of SERVQUAL, an instrument frequently employed to assess the quality of consumer services, in professional accounting firms and to identify those managerial actionable factors that impact customer satisfaction. In addition, the study explored the relationship among customer satisfaction, service quality, firm image, and price of service rendered.

The results from H1 to H4 suggest that (1) service quality has a positive effect on customer satisfaction, (2) overall firm image does have positive effect on customer satisfaction, (3) the price of service compared to quality has a significant and positive impact on customer satisfaction, and (4) the price of service directly influences the service quality. Among the components of service quality, we found that only empathy out of five dimensions of SERVQUAL was statistically significant related to customer satisfaction. This indicates that accounting firms have to bear this particular area in mind if they expect to own their clients hearts. This study added to the understanding and applicability of SERVQUAL by examining validity of the instrument in the context of accounting firms. In addition, we also explored the relationship among customer satisfaction, service quality, firm image and price of service rendered. In fact, this is a unique study to investigate customer satisfaction of accounting firms with an empirical study from North Cyprus and Turkey.

As getting into further the components of service quality we found that only one out of five dimensions of SERVQUAL was statistically significant related to customer satisfaction: it is empathy. This may indicate those sample companies are not quite pleased with this area. These findings are also coincided with the results in Table 3 showing one of the largest negative difference score (empathy). Specifically, we can conclude with that accounting firms need to recognize and response effectively to this area (empathy), if they still want to retain customers in highly competitive environment.

Price, firm image and service quality had a positive relationship with customer satisfaction. The impact on satisfaction from highest to lowest in order was, overall firm image, price compared to quality and service quality (empathy), respectively. This tells us the firm image is the most important factor to customer satisfaction, price next, and service quality last from firms' perspective. From our empirical results, we may infer that the clients believe that no matter which accounting firm they choose should have a certain degree of service quality guaranteed in the highly competitive battle field.

References

1. Anderson, J.C. and Gerbing, D.W. (1988), "Structural Equation Modeling in Practice: A Review and Recommended Two-step Approach", *Psychological Bulletin* (103:3), pp. 411-423.
2. Andreassen, T.W. and Lindestand, B. (1998), "The Effects of Corporate Image in the Formation of Customer Loyalty", *Journal of Service Marketing*, 1, pp. 82-92.

3. Armstrong, R. and Smith, M. (1996), "Marketing Cues and Perceptions of Service Quality in the Selection of Accounting Firms", *Journal of Customer Service in Marketing & Management,* 2 (2), pp. 37-59.
4. Babakus, E. and Boller, G.W. (1992), "An Empirical Assessment of the SERVQUAL Scale", *Journal of Business Research*, Vol. 24: 253-68.
5. Brady, M.K., and Robertson, C.J. (2001), "Searching for a consensus on the antecedent role of service quality and satisfaction: An exploratory cross-national study", *Journal of Business Research*, 51 (1), 53-60.
6. Brensinger, R.P. and Lambert, D.M. (1990), "Can the SERVQUAL Scale be Generalized to Business-to-Business Services?", in *Knowledge Development in Marketing*, AMA's Summer Educators' Conference Proceedings, American Marketing Association, Chicago, IL, p. 289.
7. Brooks, R.F., Lings, I.N. and Botschen, M.A. (1999), "Internal marketing and customer driven wavefronts", *Service Industries Journal*, Vol. 19, No. 4, pp. 49-67.
8. Carman, J.M. (1990), "Consumer Perceptions of Service Quality: An Assessment of the SERVQUAL Dimensions", *Journal of Retailing*, Vol. 66, Spring, pp. 33-55.
9. Crompton, J.L. and MacKay, K.J. (1989), "Users' Perceptions of the Relative Importance of Service Quality Dimensions in Selected Public Recreation Programs", *Leisure Sciences*, Vol. 11, pp. 367-75.
10. Cronin, J.J. Jr. and Taylor, S.A. (1992), "Measuring Service Quality. A Re-examination and Extension", *Journal of Marketing*, Vol. 56, July, pp. 55-68.
11. Cronin, J.J. and Taylor, S.A. (1994), "SERVPERF versus SERVQUAL: Reconciling performance-based and perceptions-minus-expectations measurement of service quality", *Journal of Marketing*, 58 (1), 125-131.
12. Durbin J. and Watson G S (1971), "Testing for serial correlation in least-squares regression", *III Biometrika* 58, 1-19.
13. Edvardsson, B., Larsson, G. and Setterlind, S. (1997), "Internal service quality and the psychological work environment: an empirical analysis of conceptual interrelatedness", *Service Industries Journal*, Vol. 17, No. 2, pp. 252-63.
14. Gronroos, C. (1990), "Managing Total Market Communication and İmage", *Service Management and Marketing,* Lexington, Mas: Lexington Books.
15. Hurley, R.F. and Estelami, H. (1998), "Alternative indexes for monitoring customer perceptions of service quality: A comparative evaluation in a retail context", *Journal of the Academy of Marketing Science*, 26 (3), 209-221.
16. Hong, S.C. and Wu, H. (2003), "An Empirical Assessment of Service Quality and Customer Satisfaction in Professional Accounting Firms", *Thirty-Second Annual Meting*, March 27-29, Northeast Decision Sciences Institue, Providence, Rhode Island, USA.
17. Kang, H. and Bradley, G. (2002), "Measuring the performance of IT services. An assessment of SERVQUAL", *International Journal of Accounting Information Systems*, 3 (3), pp. 151-164.
18. Keller, K.L. (1993), "Conceptualizing, Measuring, and Managing Customer-Based Brand Equity, *Journal of Marketing*, January, pp. 1-22.
19. Keng, K.A. and Liu, P. (1998), "Expectation of Service Quality in Professional Accounting Firms: A Singapore Study", *Journal of Customer Service in Marketing & Management*, 5 (2), pp. 39-54.
20. Lassar, W.M., Manolis, C. & Winsor, R.D. (2000), "Service Quality Perspectives and Satisfaction in Private Banking", *Journal of Services Marketing*, 14 (3): 244-271.
21. Lings, I.N. and Brooks, R.F. (1998), "Implementing and measuring the effectiveness of internal marketing", *Journal of Marketing Management*, Vol. 14, pp. 325-51.
22. Oliver, R. (1997), *Satisfaction: A Behavioral Perspective on the Consumer*, McGraw-Hill, Boston.
23. Parasuraman, A., Zeithaml, V.A. and Berry, L.L. (1985), "A conceptual model of service quality and its implication", *Journal of Marketing*, Vol. 49, Fall, pp. 41-50.
24. Parasuraman, A., Zeithaml, V.A. and Berry, L.L. (1988), "SERVQUAL: a multi-item scale for measuring consumer perceptions of the service quality", *Journal of Retailing*, Vol. 64, No. 1, pp. 12-40.

25. Parasuraman, A., Berry, L.L. & Zeithaml, V.A (1991), "Refinement and Reassessment of the SERVQUAL Scale", *Journal of Retailing*, Vol. 67: 420-50.
26. Parasuraman, A., Zeithaml, V.A, & Berry, L.L. (1994), "Reassessment of expectations as a comparison standard in measuring service quality: Implications for further research", *Journal of Marketing*, 58 (1), 111-124.
27. Petersen, R. And Wilson, W.R. (1985), "Perceived Risk and Price-Reliance Schema and Price-Perceived-Quality Mediators", in *Perceived Quality*, J. Jacoby and J. Olson, Eds. Lexington, MA: Lexington Books, pp. 247-268.
28. Rosen, D.E., and Suprenant, C. (1998), "Evaluating relationships: Are satisfaction and quality enough?", *International Journal of Service Industry Management*, 9 (2), 103-125.
29. Reynoso, J. and Moore, B. (1995), "Towards the measurement of internal service quality", *International Journal of Service Industry Management*, Vol. 6, No. 3, pp. 64-83.
30. Sahney, S., Banwet, D.K., and Karunes, S. (2004), "A SERVQUAL and QFD approach to total quality education: A student perspective", *International Journal of Productivity and Performance Management*, Vol. 53, No. 2, pp. 143-166.
31. Statistica, *Let's Regress with the Fug.* Retrieved March 11, 2007, from http://www.statistica.com.au/html/regression_spss.html
32. Tabashnick, B.G. and Fidell, L.S. (1996), *Using Multivariate Statistics,* 3rd ed., Harper Collins Publishers, New York, NY.
33. Taylor, S.A., and Baker, T.L. (1994), "An assessment of the relationship between service quality and customer satisfaction in the formation of consumers' purchase intentions", *Journal of Retailing*, 70 (2), 163-178.
34. Teas, R. (1994), "Expectations as a comparison standard in measuring service quality: An assessment of a reassessment", *Journal of Marketing,* 58 (1), 132-139.
35. Voss, G.B., Parasuraman, A. and Grewal, D. (1998), "The Role of Price, Performance, and Expectations in Determining Satisfaction in Service Exchanges", *Journal of Marketing*, Vol. 62 (October), pp. 46-61.
36. Zeithaml, V.A. (1988), "Consumer Perceptions of Price, Quality, and Value: A Means-End Model and Synthesis of Evidence", *Journal of Marketing*, 52 (July), pp. 2-22.
37. Zeithaml, V.A., Parasuraman, A. & Berry, L.L. (1990), *Delivering Quality Service: Balancing Customer Perceptions and Expectations*, Free Press, USA.
38. Zeithaml, V.A and Bitner, M. (2000), *Service Marketing*, McGraw-Hill, New York.

APPENDIX

An Empirical Assessment of Service Quality and Customer Satisfaction in Professional Accounting Firms

(Customers of _____Ltd)

The aim is to measure the quality of service in an accounting firm operating in Northern Cyprus. Please respond to all questions set in three sections below. Your responses will be kept in strict confidence.

Thank you for your kind co-operation.

Near East University

Section 1 – Company/respondent identification

What is the registered name of your company?

How long has your company been in operation?

0-5 years	6-10 years	11-15 years	16-20 years	21+ years

How long has your company been receiving accounting services from…….?

0-5 years	6-10 years	11-15 years	16-20 years	21+ years

What is your current position at the company?

Do you have a say in selecting an accounting service for your company?

Yes ☐ No ☐

Section 2 – SERVQUAL measurement variables

Please use the following table to rank your responses to situations 1 to 19.

Strongly satisfied	Somehow satisfied	Neither satisfied nor dissatisfied	Somehow dissatisfied	Strongly dissatisfied
5	4	3	2	1

Latent Variable	Measurement Variable	**Perception**				
		5	4	3	2	1
Responsiveness (RES)	1. Willingness to help customers					
	2. Prompt service to customers					
	3. Keeping customer informed about when services will be performed					
	4. Readiness to respond to customers' request					
Assurance (ASS)	5. Employees who instill confidence in customers					

Latent Variable	Measurement Variable	Perception				
		5	4	3	2	1
	6. Employees who are consistently courteous					
	7. Employees who have the knowledge to answer customer questions					
	8. Making customers feel safe in their transactions					
Empathy (EMP)	9. Convenient business hours					
	10. Giving customers personal attention					
	11. Employees who understand the customer's needs					
	12. Having the customer's best interest at heart					
Tangibles (TAN)	13. Employees who have a neat, professional appearance					
	14. Visually appealing facilities					
	15. Modern equipment					
Reliability (REL)	16. Providing services at the promised time					
	17. Dependability in handling customers' service problems					
	18. Providing services as promised					
	19. Maintaining error-free records					

Section 3 – Variables for satisfaction, price, and corporate image

Please use the following table to rank your responses to situations 1 to 8.

Strongly satisfied	Somehow satisfied	Neither satisfied nor dissatisfied	Somehow dissatisfied	Strongly dissatisfied
5	4	3	2	1

Latent variable	Measurement variable	1	2	3	4	5
Customer satisfaction	1. Overall satisfaction					
	2. Expectancy disconfirmation (performance that falls short of or exceeds expectations)					
	3. Performance versus the customer's ideal service provider in the category					
Price	4. Price compared to quality					
	5. Price compared to other companies					
	6. Price compared to expectations					
Firm image	7. Overall firm image					
	8. Firm image compared to other companies					

Thank you for your kind co-operation.