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Shopping malls attractiveness: a segmentation approach

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Abstract

Purpose – The paper aims to determine the attractiveness factors of UAE shopping malls from the shoppers' perspective and then to segment shoppers according to these attractiveness factors.

Design/methodology/approach – A survey of university staff and principal component factor analysis were used to identify shopping mall attractiveness factors. Segmentation approach using *K*-means cluster analysis was also used to segment mall shoppers due to the identified factors.

Findings – This study revealed six mall attractiveness factors from the shoppers' perspective: comfort, entertainment, diversity, mall essence, convenience, and luxury. It also arrived at three mall shopper segments, specifically, relaxed shoppers, demanding shoppers, and pragmatic shoppers. Each segment was profiled in terms of mall attractiveness attributes, demographics and shopping behaviour.

Research limitations/implications – This study is limited in that it surveyed UAE University staff as shoppers. Thus, findings may not be representative of UAE shoppers in general.

Practical implications – Identifying mall attractiveness factors for a segmented market gives a better understanding about patronage motives than when it is applied to the market as a whole. This enables mall managers to develop the appropriate retailing strategies to satisfy each segment.

Originality/value – This is the first study to provide an insight of mall attractiveness factors as identified by different shopper segments in an Arabian environment without ignoring the special cultural differences in the UAE.

Keywords Shopping centres, Market segmentation, Consumers, United Arab Emirates

Paper type Research paper

Introduction

The last few years have witnessed an accelerating increase in the United Arab Emirates retail sector. UAE residents and visitors can easily notice a growing movement in establishing shopping malls all over the country. For example, Dubai is in the process of launching a nine million square foot shopping centre, "Dubai mall" in 2007, which will be the largest mall in the world (Andersen, 2003, 2005).

Factors such as economic prosperity, cultural differences, ethnic mix, and lifestyle changes in the UAE, in addition to hot weather and humidity, have changed the UAE consumers' shopping patterns from traditional marketplace "souq" to shopping centre (El-Adly, 2001).

In fact, malls play a major role in consumers' lifestyle (Terblanche, 1999). They have become not only a centre for shopping but also a community centre for social and recreational activities (Ng, 2003). Stores, food courts, restaurants, cinemas, children's play areas, interactive entertainment, social use areas, relaxation spaces and promotional areas are now major components of any mall (Terblanche, 1999).

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With the growing number of malls, shoppers tend to be more selective. They are more likely to patronise malls that are more attractive and have a wide variety of stores and merchandise that match their preferences. Therefore, it is essential for mall managers to know the extent to which their malls are attractive to their shoppers (Wong *et al.*, 2001). However, mall attributes that are attractive for some shoppers are not necessarily attractive for others. Therefore, the purpose of this paper is to determine the attractiveness factors of shopping malls from the shoppers' perspective and then segment shoppers according to these attractiveness factors.

Shopping mall attractiveness

With the growth of the malls industry, where various new malls were built and millions of square feet of retail space were added to existing shopping malls each year (Berman and Evans, 2004), many academic studies were carried out to cover different aspects of shopping malls. The relationship between the malls managers and tenants was one of the addressed aspects (Kirkup and Rafiq, 1994; Prendergast *et al.*, 1996, 1998; Bruwer, 1997; Addae-Dapaah and Yeo, 1999). Research on shopping malls was developed to compare between the views of mall and non-mall retailers (Prendergast *et al.*, 1998). The relationship between malls attributes and productivity was also investigated (LeHew and Fairhurst, 2000).

Patronage motives were among the most heavily examined topics in retailing (Yavas, 2003). However, just a few empirical studies have analysed the motivational aspects of consumers that explain their attraction to shopping malls (e.g. Bodkin and Lord, 1997; Ruiz, 1999; Dennis *et al.*, 2001; Nicholls, *et al.*, 2000, 2002). The starting point was that some shoppers were attracted to malls due to purely economic motives; others were attracted due to emotional motives, while multi-purpose shoppers had a combination of these motives (Ruiz, 1999). For example, Bodkin and Lord (1997) concluded that the most important reasons for selecting malls were convenience, presence of a specific store in the mall, services and prices. Nicholls *et al.* (2000) found that Chilean consumers' mall visits were driven, primarily, by purchasing factors while consumers in the USA visited their mall for more diverse reasons, largely revolving around entertainment. Bloch *et al.* (1994) examined the effect of mall physical environment on consumers' emotional states and found that malls were viewed by consumers as a place not only for shopping, but also for other activities, such as entertainment. In the same line, Nicholls *et al.* (2002) found that today's mall patrons tend to be more leisure driven than shoppers in the early 1990s. Wakefield and Baker (1998) found that the mall environment influences the desire to stay and re-patronage intentions to the mall. Other studies have pointed out the importance of the shopping centre image as a critical determinant of consumer patronage decisions (Finn and Louviere, 1996; Sit *et al.*, 2003). Terblanche (1999) studied the impact of four dimensions on shopping centre patronage, namely, functional, recreational, socializing, and convenience. These were based on the perceived benefits that consumers enjoy when visiting a super regional shopping centre. He found that recreation appears to be the major benefit pursued by shoppers that patronise a super regional shopping centre. Demographic and psychographic characteristics of mall patrons were also described (Bellenger *et al.*, 1977; Bloch *et al.*, 1994; Roy, 1994). Martin and Turley (2004) studied the attitudes of the young segment (19-25 years old) towards malls, and factors motivating consumption. They found that they were more likely to be objectively rather than socially motivated to patronise. In addition to the effect of malls' internal attributes on patronage, other attributes such as travel components that include comfort, reliability of transport mode, effort, tension, distance, and value were significant in affecting shopping centres' patronage (Ibrahim, 2002).

Regarding shopping malls attractiveness, just a few studies have investigated this concept. The aim of these studies was to determine the image or attractiveness dimensions of the mall, the consistency amongst them, and their predictive power (Ruiz, 1999; Dennis *et al.*, 2002a; Dennis *et al.*, 2002b; Wong and Yu, 2003). Mall managers need to recognise that a mall image can be managed, promoted, and improved (Kupke, 2004). Although, the concept of "branding" is well known in consumer products, Dennis *et al.* (2002a) demonstrated that techniques of brand image measurement can be used for malls and can help towards customer satisfaction and commercial success for shopping malls (Dennis *et al.*, 2002b). Ruiz (1999) examined the nature of the image of shopping malls and detected three image dimensions in the malls, namely, shopping environment and variety, parking, and shopping environment and professionalism. Likewise, Wong *et al.* (2001) developed an instrument, "SCATTER" to assess the shopping centres' attractiveness from the consumers' perspective. The "SCATTER" instrument included 21 attributes categorised into five factors, namely, location, quality and variety, popularity, facilities and sales incentives (Wong *et al.*, 2001). Although, the mall image can be viewed as a bundle of attributes (Dennis *et al.*, 2002a), an anchor store within a mall had a substantial impact on consumers' images of mall and consequently on shopping mall patronage (Burns, 1992; Finn and Louviere, 1996).

Previously mentioned research identified attractiveness factors of shopping malls assuming that consumers are homogenous in their choice of malls. This assumption contradicts the fact that consumers are different, and therefore, it is necessary to segment the market (Suarez *et al.*, 2004). In this concern, Suarez *et al.* (2004) revealed the existence of different segments of consumers in their shopping centre choice. The importance of adopting a segmentation strategy in shopping mall management was highlighted by Frasquet *et al.* (2001). They demonstrated that the determinant factors of preference for a mall differ by consumer segment and concluded that modelling shopping centre choice produces better results when it is preceded by a segmentation of the sample than when it is applied to the non-segmented market.

Over the last three decades, there has been a substantial amount of research on market segmentation for consumer goods and services. However, segmentation research in retailing was very rare and concentrated on individual stores, not on the mall itself (Frasquet *et al.*, 2001; Ruiz *et al.*, 2004). Two segmentation approaches have been introduced in the marketing literature, a priori and cluster-based segmentation (also called *post-hoc*).

Priory segmentation has been subject to criticism in that it focuses on the external characteristics of consumers (e.g. sex, age and social class) in describing the differences between segments' behaviour. These external characteristics are not necessary determinants of buying behaviour (Harrison, 1995). Thus, we find that just a few researchers have used this approach in shopping centre segmentation. For example, Lee *et al.* (2005) studied shopping centre factors that have an influence on shopping enjoyment of male segment. They found that "shopping-centre features", "ancillary facilities", "value-added features" and "special events" are significant in affecting male shoppers' enjoyment. Also, Dennis *et al.* (2001) in a part of their study used different subsets of a priori segmentation pairs: male/female, higher/lower socio-economic groups, higher/lower household income, older/younger and auto/public transport. However, the final pair was based on *post-hoc* segmentation. They identified two groups, "service" and "shops" importance motivation, which were more effective than conventional a priori segmentation bases in modelling spending behaviour.

Compared with a priori segmentation, the *post-hoc* or cluster-based approach has obtained much attention in shopping mall segmentation. Using this approach, a heterogeneous population is segmented on the basis of homogeneous responses from within the population (Gwin and Lindgren, 1982). In this concern, Finn and Louviere (1990) identified shopper segments based on differences in shopping mall consideration sets and investigated the differences in mall choice parameters for these segments. At the same line, Boedeker (1995) segmented shoppers on the basis of their general choice criteria of a retail outlet, into two groups the "new type shoppers" who value both the recreational and economic/convenience characteristics of a retail outlet and the "traditional shoppers" who were much lower in their desire for the recreational aspects. Mall attributes have been used by Reynolds *et al.* (2002) to segment malls into five segments namely enthusiasts, basic, apathetic, destination and serious. Sit *et al.* (2003) used the mall image attributes to segment shoppers into six market segments labelled as the "serious" shopper, the "entertainment" shopper, the "demanding" shopper, the "convenience" shopper, the "apathetic" shopper, and the "service" shopper.

Regarding shoppers behaviour in the mall, Bloch *et al.* (1994) concluded that consumers vary in the way they behave in the mall and in perceived benefits bringing them to the shopping mall. Specifically, they recognised four mall inhabitant groups – mall enthusiasts, traditionalists, grazers, and minimalists. Each group interacted with or consumed the mall habitat in a distinctive manner. Similarly, Ruiz *et al.* (2004) used the activities that shoppers perform in the mall as a basis of segmentation. They identified four segments, namely, recreational shoppers, full experience shoppers, traditional shoppers and mission shoppers.

Using the importance-performance technique, Yavas (2003) assessed the relative strengths and weaknesses of 24 mall attributes as viewed by two shopper segments: those shoppers who prefer to shop there, versus those who favour a competitor mall. He found that there were significant differences for both importance and performance ratings across these two shopper segments.

Unlike prior studies of shopping segmentation that focused on western cultures and on a shopping mall format, Jin and Kim (2003) segmented Korean shoppers according to their shopping motives in patronising discount stores into four segments labelled as leisurely motivated shoppers, socially-motivated shoppers, utilitarian shoppers and shopping-apathetic shoppers.

Although shopping motives may be a function of retail format, cultural, economic, and social environment (Jin and Kim, 2003), prior studies on mall patronage motives, have focused on cultures and environments rather than the Arabian environment. In addition, the majority of prior studies have dealt with shoppers in their choice of mall as one segment. Therefore, this study adds to the limited number of shopping malls segmentation research by determining mall attractiveness factors as identified by different shopper segments in the Arabian environment without ignoring the special cultural differences in the UAE.

Method

This study is mainly based on a questionnaire survey. It was developed in the light of the study purpose and consulting the literature on mall attractiveness, image, and patronage (Wakefield and Baker, 1998; Wong *et al.*, 2001; Ibrahim and Ng, 2003; Sit *et al.*, 2003). It was of a closed question format so as to promote quick and easy response. It was divided into two sections. The first section addressed 26 mall attractiveness attributes which were scaled on a five-point scale ranged from "very important" to "not important at all" to determine the relative importance of each attribute. The second section included the demographic characteristics of all respondents and some behavioural variables. This questionnaire was written in both Arabic and English languages since considerable percentage of residents in the UAE are non Arabic speaking. The translation accuracy from Arabic to English was achieved using the back translation method. Then, the questionnaire was pre tested on a small convenience sample of 15 faculty members and staff of the UAE University to determine their understanding and to make any required modification to it. The letter that accompanied the questionnaire was personally signed and printed on headed university papers. It also included some statements that explained the aim of the study and the confidentiality of the information.

570 questionnaires were personally delivered to the departments' secretaries at the UAE University to collect data from faculty members, instructors, and staff at their departments. Moreover, to increase the response rate, the author himself surveyed those who did not respond through departments' secretaries. UAE University is the largest university in the UAE in terms of number of students, colleges, departments, and faculty members. It has faculty members, instructors, and staff from different nationalities and cultures. Those UAE nationals who are working at the university are from different emirates and cities in the UAE.

Data collection continued for about one month and a half. A total of 407 questionnaires (71 per cent) were received. Of this total, 404 completed questionnaires were used in the data analysis. The rationale behind surveying university faculty members, instructors, and staff is that they have characteristics very much in common with the typical mall shoppers (Rafiq and Fulford, 2005). All respondents were mall shoppers from different categories of gender, age, nationality, and income.

Of the 404 respondents, 51 per cent were males and 49 per cent were females. The age of 29.4 per cent of respondents was less than 30 years; 33.9 per cent aged between 31 and 40; 26.7 per cent were aged between 41 and 50; 8.7 per cent were aged between 51 and 60 years. UAE nationals represent 25.6 per cent; Arabs 55.2 per cent; Europeans 4.5 per cent; Americans 8.7 per cent; Asians 3 per cent, Africans 2.3 per cent; Australians 0.7 per cent. Monthly income of 16 per cent of respondents was less than 4,000 Dhs (1$ = 3.67 Dhs); 18.8 per cent got monthly income between 4,001 and 7,000 Dhs; 15.7 per cent got between 7,001 and 10,000 Dhs; 42.8 per cent got monthly income between 10,001 and 20,000 Dhs; 6.7 per cent got monthly income more than 20,000 Dhs.

Results

Shopping mall attractiveness factors

In order to extract the mall attractiveness factors, principal component factor analysis on the 26 attractiveness attributes was performed. It revealed six factors which explain 54.19 per cent of data variability. Only one attribute was excluded from the analysis, specifically, "mall is in a trading area" since it was not loaded to any of the revealed six factors.

As shown in Table I, factors were labelled by observing items which comprised of each of them. The first factor that labelled "comfort" contains seven attributes related to the mall security, parking space, comfort, width, cleanness, and having all the

Factors	Mall attractiveness attributes	Factor loading
Comfort		
V. 21	Security in the mall	0.668
V. 13	Availability of large car parking space	0.635
V. 22	Shopping mall has all the family needs	0.614
V. 15.	Comfortable seats during shopping	0.608
V. 23	Mall width	0.552
V. 16	Cleanness of the mall	0.516
V. 14	Comfortable interior design	0.453
	Eigen value = 6.789	$\alpha = 0.794$
Entertainment		
V. 1	Promotional campaigns in the mall	0.661
V. 5	Presence of fun and entertainment programs	0.645
V. 17	Existence of fun spaces for kids	0.640
V. 6	Availability of loyalty programs	0.619
V. 10	Entertainment places for youth	0.589
	Eigen value = 2.119	$\alpha = 0.752$
Diversity		
V. 20	Plurality and variety of restaurants	0.784
V. 24	Availability of int'l stores branches	0.727
V. 19	Existence of large food court	0.720
V. 18	Presence of cinemas in the mall	0.636
	Eigen value = 1.650	$\alpha = 0.761$
Mall essence		
V. 2	Products' quality in the mall	0.720
V. 25	Level of prices is appropriate to my income	0.522
V. 9	Plurality and variety of stores	0.507
V. 7	Availability of after sale services	0.437
	Eigen value = 1.301	$\alpha = 0.530$
Convenience		
V. 8	Supermarket existence in the mall	0.672
V. 11	Ease of reaching to the mall	0.654
V. 4	Late working hours in the mall	0.594
	Eigen value = 1.187	$A = 0.407$
Luxury		
V. 3	External appearance of the mall	0.568
V. 26	Popularity of the mall	0.508
	Eigen value = 1.044	$A = 0.496$

Note: Extraction method: principal component analysis

Table I. Factor loadings and reliability of the mall attractiveness attributes family needs. The second factor includes five attributes that mainly focus on presence of entertainment programs and spaces for kids and youth, therefore, it is labelled "entertainment". The third factor labelled "diversity" and included attributes referring to the variety in restaurants, stores, food, and cinemas to satisfy shoppers from different cultures, nationalities, and backgrounds. The fourth factor "mall essence" reflects the operational aspect of the mall that is products quality, price, after sale service, and stores variety. The fifth factor "convenience" included three attributes which was concerned with the mall accessibility, namely, supermarket existence, ease of reaching to the mall, and late working hours in the mall. Finally, the sixth factor that was labelled "luxury" comprised two attributes only, explicitly external appearance and popularity of the mall.

Shopping mall shoppers segments

K-means cluster analysis was used to segment shoppers according to the mall attractiveness attributes. The number of segments was determined by the agglomeration coefficients in the hierarchical cluster analysis which was used for guidance in deciding how many segments are required to be in the analysis. It is advised to stop agglomeration as soon as the increase between two close steps becomes large (Norusis, 1994). There was a large increase in the value of the agglomeration coefficient from a three-cluster to a two-cluster solution (it is increased from 82.123 in stage 392 to 95.250 in stage 393). Therefore, three clusters were considered to be the appropriate number of clusters to segment the mall shoppers. The cluster information for each case in the *K*-means cluster analysis was used to specify the number of the final cluster to which the case was assigned (SPSS help manual). By implementing this procedure, the number of cases in each cluster and cluster membership were determined as follows: "Cluster 1 = 174 shoppers, i.e. 44 per cent"; "Cluster 2 = 169 shoppers, i.e. 43 per cent"; "Cluster 3 = 52 shoppers, i.e. 13 per cent". Nine cases were not assigned to any of the three clusters since they contained missing values. Split samples method was used to validate segments ($F = 17.747$, p-value $= 0.000$).

Differences among segments were found significant at a significance level less than 0.05 for all mall attractiveness attributes. Age, nationality, and number of family members living with the respondent in the UAE were significant while, other demographic characteristics such as sex, marital status, and monthly income, age categories of children were not significant with $p < 0.05$. Two shopping behaviours were also significant among segments, specifically, time spent in the mall per trip on average and time of visiting shopping mall. Two other shopping behaviours (i.e. no. of malls that the shopper is dealing with regularly and number of visits to malls per week) were not significant at a significance level less than 0.05.

Segment 1: relaxed shoppers. This is the largest segment (44 per cent of the respondents). The demographic profile of this segment is illustrated in Table II. Shoppers in this segment tend to be young. About 61 per cent are less than 40 years. The majority of shoppers in this segment are Arabs (20 per cent UAE nationals, and 64 per cent from other Arab countries). About one fourth of shoppers in this segment (23 per cent) are either living alone or have one family member live with them in the UAE. The shopping behaviour of this segment as illustrated in Table III shows that about two thirds of shoppers in this segment (63 per cent) spend less than two hours in the mall and prefer to do their shopping in the weekends.

Demographic characteristics	Segment 1 (per cent)	Segment 2 (per cent)	Segment 3 (per cent)	χ^{2*}	Sig.**
Age				19.870	0.000
Less than 30	22	42	17		
From 31 to 40	39	30	29		
From 41 to 50	29	20	38		
From 51 to 60	10	7	8		
More than 60	–	1	8		
Nationality				48.591	0.000
UAE citizen	20	38	8		
Arabian	64	52	35		
European	3	2	18		
American	7	4	29		
Asian	2	3	2		
African	3	1	6		
Australian	1	–	2		
No. of family members living in the UAE				6.423	0.040
None	11	11	29		
One member	12	5	14		
Two members	19	23	12		
Three members	15	19	12		
Four members	15	13	15		
Five members and more	24	29	19		
No. of cases	174	169	52		

Notes: *Kruskal Wallis test; **$P < 0.05$

Table II. The demographic characteristics of the segments

Shopping behaviour	Segment 1 (per cent)	Segment 2 (per cent)	Segment 3 (per cent)	χ^{2*}	Sig.**
Time spent in the centre per trip on average				24.597	0.000
Less than one hour	12	8	31		
1-2 hours	51	42	46		
2-3 hours	30	32	19		
3 hours or more	7	18	4		
Time of visiting centre				14.417	0.001
Week days	38	30	59		
Weekends	62	70	41		
No. of cases	174	169	52		

Notes: *Kruskal Wallis test; **$P < 0.05$

Table III. The shopping behaviour of the segments

According to mall attractiveness attributes shown in Table IV, shoppers in this segment put great emphasis on comfort, mall essence, and convenience. In terms of comfort factor, shoppers are very concerned about comfort, security, width, parking, and cleanness of the shopping centre. Thus, malls should offer comfortable seating and rest areas, controlled indoor temperature, ample parking, and safety to enable shoppers to spend time, to shop, or to socialize in the mall. Regarding mall essence, shoppers in

Table IV. Segments of the shopping mall shoppers

	Mall attractiveness attributes	Segment 1	Segment 2	Segment 3	*F*	Sig.*
Comfort						
V. 21	Security in the mall	4.74	4.90	4.10	42.351	0.000
V. 13	Availability of large car parking space	4.74	4.80	4.08	24.576	0.000
V. 22	Shopping mall has all the family needs	4.60	4.82	3.50	72.060	0.000
V. 15	Comfortable seats during shopping	4.45	4.74	3.23	74.038	0.000
V. 23	Mall width	4.22	4.64	3.38	48.146	0.000
V. 16	Cleanness of the mall	4.79	4.95	4.42	35.142	0.000
V. 14	Comfortable interior design	4.41	4.69	3.56	54.902	0.000
Entertainment						
V. 1	Promotional campaigns in the mall	3.97	4.34	2.31	96.917	0.000
V. 5	Presence of fun and entertainment programs	2.68	3.96	2.10	88.113	0.000
V. 17	Existence of fun spaces for kids	4.22	4.63	2.38	132.65	0.000
V. 6	Availability of loyalty programs	3.30	4.13	2.21	75.631	0.000
V. 10	Entertainment places for youth	2.96	4.20	1.77	126.72	0.000
Diversity						
V. 20	Plurality and variety of restaurants	3.85	4.66	3.19	72.917	0.000
V. 24	Availability of int'l stores branches	3.06	4.34	3.00	66.168	0.000
V. 19	Existence of large food court	3.86	4.56	2.90	82.082	0.000
V. 18	Presence of cinemas in the mall	2.15	3.86	2.17	122.63	0.000
Mall essence						
V. 2	Products' quality in the mall	4.52	4.63	4.31	4.059	0.018
V. 25	Level of prices is appropriate to my income	4.42	4.75	4.04	22.552	0.000
V. 9	Plurality and variety of stores	4.47	4.78	4.04	22.910	0.000
V. 7	Availability of after sale services	4.41	4.53	3.77	15.576	0.000
Convenience						
V. 8	Supermarket existence in the mall	4.51	4.63	3.71	27.679	0.000
V. 11	Ease of reaching to the mall	4.66	4.76	4.31	12.172	0.000
V. 4	Late working hours in the mall	3.82	4.12	3.52	6.465	0.002
Luxury						
V. 3	External appearance of the mall	4.01	4.54	3.46	36.313	0.000
V. 26	Popularity of the mall	3.57	4.21	2.58	50.212	0.000

Note: $^{*}P < 0.05$

this segment are looking for store variety, products' quality, after-sale services as well as appropriate prices to their income. Thus, mall management has to respond to these needs through a balanced tenancy of stores that complement each other in the quality and variety of their product offerings (Bruwer, 1997). Concerning mall convenience, shoppers give great importance to supermarket existence in the mall and ease of reaching to the mall. Therefore, if mall management wants to satisfy the convenience need of their shoppers, they should enlarge its tenant mix to include a supermarket, have good layout and adequate directions inside the mall, use outside signage to guide shoppers to malls, provide shuttle buses services, and operate late working hours. On the other hand, they put average emphasis on entertainment, diversity, and luxury of shopping mall.

Segment 2: demanding shoppers. This is the second largest segment (43 per cent of the respondents). It is the youngest segment since 72 per cent of shoppers in this segment are less than 40 years. 90 per cent of shoppers in this segment are Arabs (38 per cent UAE nationals, and 52 per cent from other Arab countries). Only a small percentage of shoppers (16 per cent) are either living alone or with one member only in the UAE. Around half of the shoppers spend less than two hours in their trip to the shopping centre and most of them do their shopping at the weekend.

Shoppers of this segment consider all attractiveness factors of the mall very important. They give greater importance to all attractiveness factors than the other two segments, specially, to entertainment, diversity, and luxury. Concerning this, shopping malls should emphasize how the diversity of stores contributes to the overall pleasantness of the shopping environment. Diversity in food outlets and entertainment has a strong effect on desire to stay (Wakefield and Baker, 1998). For mall managers, this is important because there is evidence that spending will increase as consumers stay longer in a retail environment (Donovan *et al.*, 1994 as cited in Ng, 2003).

Segment 3: pragmatic shoppers. This is the smallest segment (13 per cent of the respondents). Demographically, more than half of the shoppers of this segment (54 per cent) are more than 40 years and 57 per cent of them are non-Arabs. This information will help mall management about the mix of stores needed to succeed and to satisfy different ethnic groups in the UAE. Differently from other segments, 43 per cent of shoppers are either living alone or with one member only in the UAE. About three fourths of shoppers (77 per cent) spend less than two hours in their trip to the shopping centre and 59 per cent of them do their shopping in the weekdays.

Shoppers of this segment are concerned only with mall essence factor. They see products' quality, appropriateness of prices to their income, popularity and variety of stores as important in choosing the shopping mall. Therefore, malls should have complementary and competing stores to enable shoppers to compare prices and quality. In addition, to satisfy this segment, malls can offer mall-wide sales, gift with purchase, quantity discount, and gift-voucher once a minimum purchase value is reached. Some other attributes are considered important by this segment such as security, parking space, cleanness and ease of access. On the other hand, the entertainment factor is considered not important by this segment when choosing a mall. The existence of a large food court, presence of a cinema, and the popularity of the shopping mall are viewed as not important from this segment's view point.

Conclusions and implications for shopping mall management

The purpose of this study was twofold. Firstly, to determine shopping mall attractiveness factors and secondly, to segment shoppers in terms of the shopping mall attractiveness factors. Regarding the determination of shopping mall attractiveness factors, the results revealed six mall attractiveness factors from the shoppers' perspective, namely comfort, entertainment, diversity, mall essence, convenience, and luxury. Of the six attractiveness factors, three are consistent with the findings of Wong *et al.* (2001) who identified five shopping centre attractiveness factors, namely location, quality and variety, popularity, facilities, and sales incentives. The "comfort", "mall essence" and "convenience" factors in this study tend to be similar to Wong *et al.* (2001) "facilities" "quality and variety" and "location" respectively. Also, the "comfort" and "convenience" factors in this study are in harmony with the "quality of the centre" and "convenience" factors identified by Bellenger *et al.* (1977), and to some extent, in line with "atmosphere leisure" and "accessibility" factors explored by Frasquet *et al.* (2001).

They also found to be associated with "amenities" and "micro-accessibility" factors concluded by Sit *et al.* (2003). The "comfort" and "diversity" factors in this study support the Wakefield and Baker (1998) findings in that physical environment of malls and mall tenant variety are important determinants of patronage behaviour.

The "entertainment" factor revealed in this study supports the findings of Bloch *et al.* (1994) in that malls are viewed by consumers as a place, not only for shopping, but also for other activities, such as entertainment. It also supports the viewpoint of Sit *et al.* (2003) that entertainment deserves to be a distinct factor that comprises multiple items rather than a single item. The "mall essence" factor in this study was found to be identical with the "value assortment" in the LeHew *et al.* (2002) study, but it was partially similar to the "retail environment" identified by Ibrahim and Ng (2003).

To comply with shopping mall attractiveness factors identified in this study, mall management should do the following: to make shoppers comfortable in their shopping, it is important to have comfortable seats, ample parking space, secured mall, and give attention to the mall cleanness. Since, many shoppers are looking for entertainment, so malls management have to create a pleasant environment for shopping if they want shoppers to visit shopping malls more frequently and spend more times in the malls. This can be accomplished by having family entertainment centres, video games, cinema, special events, window shopping and restaurants. Shopping mall managers cannot ignore ethnic diversity in their trading areas. Therefore, they should have variety of stores, food service, restaurants and entertainment, to meet the diversity factor of shopping centre patrons. Recent studies on shopping centre preferences and choice have highlighted the importance of food courts and entertainment facilities in attracting higher levels of patronage (Sirpal and Peng, 1995 as cited in Wong and Yu, 2003). Shopping malls should also have a good tenant mix. Kaufman and Lane (1996) concluded that a mall that delivers a clear and well positioned mix of outlets would stand more chance of success. Empirical studies have shown that tenant variety affects the time consumers spend in the mall and their patterns of movement (Brown, 1991), the mall image (Finn and Louviere, 1996), and have a strong influence on mall excitement (Wakefield and Baker, 1998).

To fulfil the shoppers demand for mall essence factor, mall managers should have the right tenant mix to enable shoppers to compare prices and quality appropriate to their needs and income. This study shows that convenience factor is not just ease of reaching mall, but also late working hours and existence of supermarket within mall. So, choosing the appropriate location, giving more attention to shoppers' time, and having a supermarket in the mall are critical in satisfying shoppers' needs for convenience. Convenience in malls can also be achieved through cross shopping when shoppers get multiple types of products in multiple retail tenants. Over the years, the cross-shopping convenience in malls has expanded to include service outlets and entertainment providers such as food courts, art exhibits, restaurants, video arcades, movie theatres, hair salons, and dental offices (Kim, 2002). This study also shows the luxurious importance of the mall represented by external appearance and popularity of the mall. Thus, it is important to promote the mall as a unique identity and take care of the external appearance as well as the architecture, interior design, layout, and decoration of the shopping mall.

Regarding the segmentation of shoppers in terms of the shopping mall attractiveness factors, this study has identified three distinctive segments, namely relaxed shoppers, demanding shoppers, and pragmatic shoppers. Each segment has its own patronage motives that differ from other segments. This gives a better understanding about why a specific segment is attracted to the shopping mall more than just knowing what the attractiveness factors are as whole. Profiling each segment in terms of attractiveness factors, demographics, and shopping behaviour helps mall managers in developing the appropriate retailing strategy that satisfy each segment.

Limitations and future research

This study is limited in that it surveyed faculty, instructors, and staff in UAE University as shoppers. Although, UAE University is the largest university in the UAE, the findings may not be representative of UAE in general. Hence, research in other cities and other shoppers is required to examine the validity and reliability of the identified attractiveness factors and shoppers segments.

The low reliability for the two factors "convenience" and "luxury" represents another limitation that needs further research to explore the psychometric basis of these factors.

This study does, however, offer several directions for future research. First, to what extent there is a significant difference between shopping mall attractiveness factors as identified by shoppers and their satisfaction about these factors in the shopping mall. Second, is there a significant difference between mall shoppers and managers in regard to these attractiveness factors?

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