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DRIVERS OF RESIDENTIAL DEVELOPERS' MARKETING STRATEGIES BASED ON BUYER PREFERENCES

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INTRODUCTION

According to a household budget survey on consumption expenditures published by the Turkish Institute of Statistics, the monthly expenditure of a middle income family for housing and rent is 28.2%, higher than any other expenditure. Residential building investments account for 2-8% of GDP (The Building Information Centre, 2011). Being the most populated city in Turkey, İstanbul is one of the major focus areas of construction companies in the country (Kömürlü, 2012 and 2011a). The city is very important in terms of economic, social and cultural significance. Potential buyers in İstanbul are looking for residential alternatives that meet their particular requirements (Kömürlü, 2011b). These expectations may be related to pricing, legal issues, architectural features, quality considerations, location, social facilities, seismic risks, means of transportation, and developer reputation.

In this study, the perceptions of developers about potential buyer expectations in İstanbul are investigated and ranked. The analytic hierarchy process (AHP) is used in the analysis.

THE RESIDENTIAL CONSTRUCTION MARKET IN ISTANBUL

Owning residential property is preferred not only for occupation but also for investment, which is considered to be a major investment option in Turkey (Balamir, 1999; Kömürlü and Önel, 2007; Esmeray, 1996). People tend to purchase apartments in order to stop paying rent. Once they own their apartment, they invest their savings in purchasing other apartments.

The construction sector is closely correlated with the economic environment. As seen in **Figure 1**, during the past decade, there have been two negative growth periods in the Turkish construction sector. One of them was due to the national economic crisis triggered by insolvent

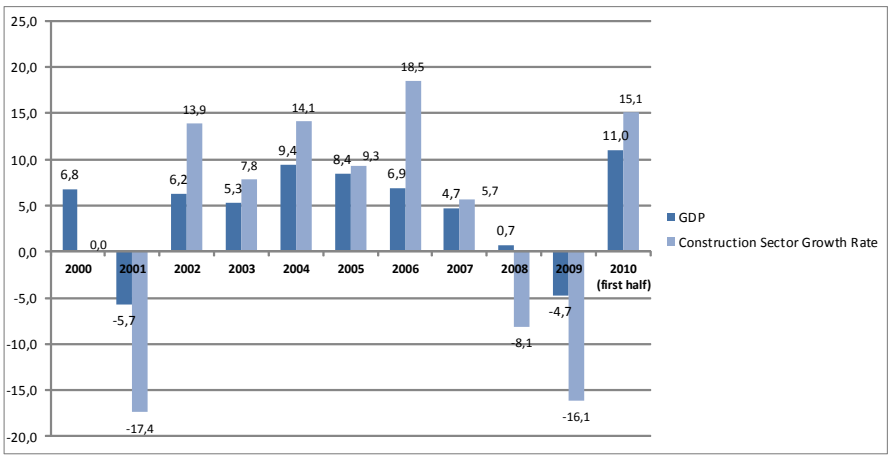

Figure 1. GDP and Construction Sector Growth Rates between 2000 and 2010 in Turkey

financial institutions in Turkey in 2001, and the other was related to the global crisis in 2008 which was followed by a recession in 2009 (Kömürlü, 2011a).

Within the construction sector, housing with its particular futures different from the other productions, has a central role and affects the health of the financial system directly (Ellis, 2011). Residential buildings dominate the construction sector in Turkey. According to Turkish Statistical Institute (2011) residential buildings account for 86% of all buildings registered for a construction, this value is even higher (92%) in İstanbul. **Table 1** shows that 80% of all buildings are residential. Approximately 10% of the buildings are located in İstanbul where the existing building stock of 3,393,077 units is quite large when compared to the housing stock of 16,235,830 units in Turkey. Despite decreases in housing production in 2007 and 2008 because of the recession in the global economy, the number of housing units produced annually has never gone below half a million, as seen in **Table 2** (Turkish Statistical Institute, 2011, The Building Information Centre, 2011).

The ever growing and developing İstanbul with its new work areas encourages the development of new settlements. The city is being transformed with the newly built houses and shopping centers (Kömürlü and Öztekin, 2009a). **Figure 2** shows that İstanbul is the top ranked city

Table 1. New buildings and additions in Turkey and Istanbul based on floor area m^2, 2010. (Source: Turkish Statistical Institute, 2011, The Building Information Centre, 17-28)

	Residential Buildings	%	Nonresidential Buildings	%	Total
Turkey	134.233.446	80%	32.766.251	20%	166.999.697
Istanbul	19.168.843	75%	6.422.138	25%	25.590.981

Table 2. Changes in housing units between 2005 and 2010 in Turkey. (Source: Turkish Statistical Institute, 2011, The Building Information Centre, 2011, 28)

Year	Number of Housing Units	House Unit Increase Rate with Respect to the Previous Year (%)
2005	545.336	65,4
2006	597.786	9,6
2007	581.029	-2,8
2008	501.005	-13,8
2009	516.229	3,0
2010	817.092	58,3

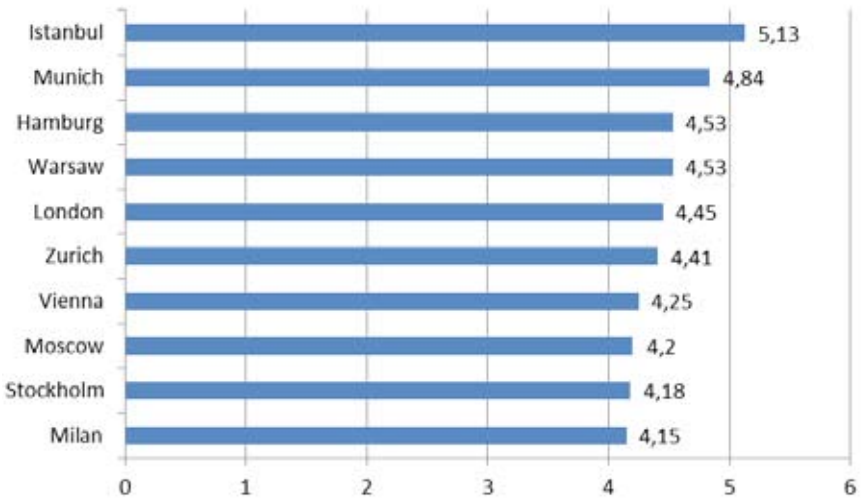

Figure 2. City development prospects In "Emerging Trends in Real Estate Europe 2010"

1: Abysmal 5: Fair 9: Excellent

in terms of real estate development potential in Europe (Pricewaterhouse Coopers, 2010). Residential building developers inevitably focus on İstanbul because she is quite an important city from the point of view of residential construction.

Inhabitants of İstanbul tend to buy their apartments for different reasons, such as being close to their work place, being located on relatively less vulnerable seismic region, having different transportation options, availing themselves of the different financial deals offered by the developers, enjoying certain architectural features, and benefiting from the social environment. The objective of this study is to determine the perceptions of developers relative to potential customers' expectations. Developers were interviewed and the collected information was analyzed by using an AHP model.

THE ANALYTIC HIERARCHY PROCESS (AHP)

The analytic hierarchy process (AHP) was developed by Saaty (1980) for providing flexibility in understanding and analyzing complicated problems. It is a systematic procedure for representing the elements of any problem hierarchically. It organizes the basic rationality by breaking down a problem into its smaller constituent parts and then guiding decision-makers through a series of pair-wise comparison judgments to express the relative strength or intensity of impact of the elements in the hierarchy (Saaty and Kearns, 1985). It is a multi-criteria decision making technique.

AHP involves pair-wise comparisons, where the elements of the problem are compared with respect to their relative weights on the objective they share in common. Each element is compared in pairs with other elements in the same set according to their contributions to their common parent node in the level immediately above. There are several comparison methods to analyze pair-wise evaluations. In this study, a nine-point scale is used to depict the intensity of the relative importance as shown in **Table 4**.

A priority vector W is calculated by solving the eigenvalue problem. The relative importance of n factors is obtained by solving Equation 1.

$$A \cdot w = \lambda_{max} \cdot w \quad (1)$$

where, A represents the matrix of pairwise comparisons, w the vector of relative weights, λ_{max} the largest eigenvalue in matrix A.

Comparisons must fall in an admissible range for consistency. The consistency index is defined by Equation 2.

$$CI = \frac{\lambda_{max} - n}{n-1} \quad (2)$$

where, n is the number of criteria considered. An important parameter is the consistency ratio to that assesses the extent of the deviation from consistency. It is given by Equation 3.

$$CR = \frac{CI}{RI} \quad (3)$$

where RI is the average value of CI for random matrices. Judgments are considered by Saaty (1980) to be consistent if the consistency ratio (CR) is less than 0.10.

AHP has been used extensively in construction research over the years. For example, Kramer et al. (2011) determined the weigths of social objectives for a housing association to allocate its resources to achieve its goals. Al-Harbi (2009) used AHP in construction project management (2009). Shapira and Simcha (2009) identified the factors affecting safety in the operation of tower cranes. Lai et al. (2008) determined the budget for public building construction projects. Dikmen and Birgönül (2006) assessed the risks and opportunities of international construction projects. Gürgün and Hanoğlu (2005) used the same method to prioritize the seismic risk of school buildings for retrofit implementation. Günhan and Arditi (2005) used AHP in making international expansion decisions for construction companies.

Intensity of Relative Importance	Definition	Explanation
1	Equal importance	Two preferences contribute equally to the objective
5	Essential or strong importance	Experience and judgment strongly favor one preference over another
9	Extreme importance	The evidence favoring one preference over another is of the highest possible order of affirmation
2-4 & 6-8	Intermediate values between the two adjacent judgments	When compromise is needed
Reciprocals of above non-zero numbers	If a preference has one of the above values compared with the second preference, then the second preference has the reciprocal value when compared to the first	

Table 3. Scale of relative importance

METHODOLOGY OF THE STUDY

The AHP model developed for this study is based on nine criteria as potential client expectations:

Economic factors

Economic factors consist of purchasing power, living standards, house value, method of finance, payment plan, and heating and maintenance costs. These factors are affected directly by the income level of the buyers. Depending on the method of financing, the risk of buyer default is either on the developer or on the bank. Heating and maintenance costs are important because of their impact on the buyer's budget.

Legal issues

Although housing projects are required to meet all legal obligations, of all the residential buildings in Turkey, only 62% have construction permits and 33% have occupancy permits (Kömürlü and Önel 2007; Berberoğlu, 2005). Some dishonest developers sell units before breaking ground, but tend to resell the same units to other parties in the time gap between the end of construction and the receipt of the title, In such cases, the buyer runs the risk of not receiving the title for the unit purchased. Thus, buyers seek the developers that strictly abide by legal requirements. Different ministries are collaborating to generate strategies to prevent illegal construction and illegal sales. Nevertheless, the majority of the existing building stock suffers from legal ambiguities in İstanbul. Therefore, this issue may be an important factor when purchasing property.

Architectural functions

The architectural design of a house is an important factor affecting the buyer's decision. The architectural design must meet the buyer's needs in terms of surface area, number of rooms, orientation, floor level, plan, etc.

Quality of construction

The quality of construction influences the buyer's preferences. The quality of the materials (tiles, doors, etc.) used, the functional design and the decoration of the kitchen and bathrooms are of particular interest to potential buyers, including quality and the location of the washing machine and the dishwasher.

Location

The neighbourhood is important for buyers. Locations that are safe and that have potential for new development may be appealing to younger buyers. Good infrastructure and a view on nature, sea, forest, etc. may also be a factor.

Existence of social facilities

Social facilities are widely emphasized in new projects in İstanbul. These facilities may include parking garages, parking lots, fitness centers, swimming pools, sports facilities, and proximity to daycares and schools.

Compliance with seismic codes

Although compliance with seismic codes is mandatory for all new buildings, the recent earthquakes in 1999 showed that buyers should be conscious about the seismic integrity of the property they are purchasing because only 62% of the residential buildings in Turkey have construction permits and only 33% have occupancy permits (Kömürlü and Önel 2007; Berberoğlu, 2005); it is unlikely that buildings with no construction/ occupancy permits comply with seismic codes. In addition to that, not all buyers are aware that there is a seismic code for building construction or that compliance with this code is mandatory. This factor is also of particular importance since İstanbul is located in a major earthquake zone and buyers may be interested to know if the building complies with the most recent earthquake resistance codes.

Means of transportation

Access to the location where the building is located is important for buyers. Being close to downtown, close to public transportation routes, or close to some important spots may be desired characteristics. Given the heavy traffic conditions in İstanbul, being close to the highway or to public transportation routes may be important for those buyers planning to purchase property in the suburbs. Also, proximity to health facilities, educational institutions, and airports may affect a buyer's decision.

Developer brand

Buyers inquire about the reputation of developers. They need to know how developers perform in an economic crisis, or how their buildings perform in a severe earthquake. Buyers are interested in information about buildings completed by developers as reference.

After the preliminary model was set up, a pilot study was conducted with two managers in charge of sales of residential units for more than 15 years. Their feedbacks helped to finalize the hierarchy in the model. The model was refined to include the nine client expectations cited above. The Expert Choice software was used for the analysis of the pair-wise comparisons provided by the participating developers.

The nine developers that contributed to this study account for a considerable portion of the residential building construction market in İstanbul. Participating companies have been operational for 10 to 65 years. Some of them also undertake projects outside Turkey. In addition to construction, they also operate in land development, project design, energy, real estate, and tourism. They have built 10.000 to 15.000 housing units each throughout their lifetimes, with one developer that has built 30.000 units in addition to the 10.000 units under construction. Their names are listed in the Acknowledgement section at the end of the paper.

FINDINGS OF THE STUDY

The comparisons of the companies are shown in **Table 4**. The values below the diagonal of the matrix are not shown as they are the reciprocals of the values above the diagonal. All consistency ratios (CR) for all companies were found to be below the recommended threshold of 0.10.

The participating developers' perceived ranks of the nine factors are summarized in **Table 5**. Each developer company was analyzed

independently to identify its perception of apartment buyers' preferences. The mean rankings of participating developers' perceptions of the nine factors and their standard deviations are presented in **Table 5**. The rank of each factor for every developer has been summed up and divided by the number of developers in order to find the mean ranking for that specific factor. As a result, mean rankings represent the importance of each factor regarding the developers' perceptions. Given the low standard deviations, it can be stated that there is reasonable agreement between the respondents despite the slight differences that may have been caused by different company policies, different types of clients, and different locations in İstanbul.

The cost of the delivery, available financing and the final delivery cost to the buyer should be carefully balanced for financing housing projects (Hosny et al., 2012). Those buyers who are seeking loans have to deal with high inflation, high real estate taxes, low income and low savings, insufficient capital accumulation, high budget deficits (Aydın, 2006). Besides financial institutions that provide mortgage arrangements, developer companies also provide innovative payment plans to attract

Table 4. Pair-wise comparisons of participating developers

	Economic Factors			Legal Issues			Architectural Functions			Quality of Construction			Location			Existence of Social Facilities			Compliance with Seismic Codes			Means of Transportation			Developer Brand		
Economic Factors	1	1	1	6	7	5	2	3	3	9	8	5	8	2	2	6	8	3	3	5	7	6	3	3	2	1/5	1
	1	1	1	9	9	8	3	4	3	5	6	4	1	2	4	4	7	5	5	3	4	2	2	5	2	4	3
	1	1	1	1/8	9	7	3	5	3	8	6	4	1/2	3	1/4	1	6	6	8	7	5	1/3	3	3	1	2	1/4
Legal Issues				1	1	1	1/5	1/8	1/4	7	1	1	5	1/7	1/4	4	1/3	1/5	2	1/2	1	7	1/5	1/3	1	1/9	1/5
				1	1	1	1/7	1	1/4	1/7	1/5	1/5	1/9	1	1/4	1/7	1/3	1/3	1/5	1	1/3	1/7	1/2	1/4	1/9	3	1/2
				1	1	1	7	1/5	1/6	8	1/6	1/4	4	1/8	1/7	8	1/6	1/3	8	1/2	1/2	4	1/7	1/5	3	1/9	1/8
Architectural Functions							1	1	1	8	8	4	6	2	1	2	8	1/3	1	3	4	6	3	3	1/2	1/5	1/4
							1	1	1	3	2	2	1/7	1/2	1/4	3	3	1/3	5	3	1	1/4	1/3	1/3	1	1	1/3
							1	1	1	5	1/3	3	1/5	1/5	1/6	1/2	1/2	3	4	5	4	1/3	1/7	3	2	1/4	1/4
Quality of Construction										1	1	1	1/5	1/7	1	1/7	1	1/3	1/9	1/3	3	1/3	1/7	1	1/9	1/9	1/5
										1	1	1	1/8	1/7	1/3	2	4	1	2	1/5	1	1/7	1/9	1/5	1/7	1	1/4
										1	1	1	1/8	1/3	1/4	1/5	2	2	1	6	6	1/5	1/3	1/3	1/4	1/4	1/5
Location													1	1	1	1	9	1/3	1/7	6	4	3	2	3	1/9	1/3	1/4
													1	1	1	5	9	4	4	2	2	3	1	1	1	3	1/2
													1	1	1	5	5	8	4	6	8	1/2	1/3	5	2	1/5	2
Existence of Social Facilities																1	1	1	1/6	1/3	5	1	1/7	4	1/8	1/9	1/4
																1	1	1	3	1/6	2	1/5	1/8	1/3	1/4	1/6	1
																1	1	1	3	5	4	1/5	1/3	1/4	1/3	1/4	1/6
Compliance with Seismic Codes																			1	1	1	8	1/7	1/3	1	1/6	1/8
																			1	1	1	1/5	2	1/3	1/7	2	1
																			1	1	1	1/5	1/6	1/6	1/6	1/8	1/7
Means of Transportation																						1	1	1	1/8	1/3	1/4
																						1	1	1	1/2	4	2
																						1	1	1	3	1/4	1/4
Developer Brand																									1	1	1
																									1	1	1
																									1	1	1

Developer Comparisons (with CR values)	A (0.10)	B (0.09)	C (0.06)
	D (0.10)	E (0.09)	F (0.09)
	G (0.10)	H (0.10)	I (0.09)

prospective buyers. The advantages of such plans include lower interest rates and less bureaucracy (Ersan, 2008). According to the survey results presented in **Table 5**, economic factors ranked as the most important factor. Most potential buyers are in search for an appropriate payment model (Gürgün and Kömürlü, 2010a). They typically prefer paying in installments rather than paying a lumpsum. They also dislike a large downpayment. For example, a residential project is advertised by a developer with three different payment options. The first option is a 10-year plan where the buyer pays in installments with interest. The second option offers 0% interest on installments for a three year payment contract. The third option provides a 5% discount if the total amount is paid upfront (Soyak, 2012).

Developer brand name is a rather new criterion, which gained importance in the last decade particularly during periods of economic crises and earthquakes (Gürgün and Kömürlü, 2010b, Kömürlü and Öztekin, 2009a). Due to bad experiences in such periods, buyers are inclined to purchase property constructed only by reputable companies that deliver structurally sound projects on schedule, within budget, and of good quality. In his study on location decision factors of residential development, Kaiser (2001) hypothesizes that the two important factors for decision are the

Developers' Perceptions of Buyer Preferences	Rankings										
	Developer A	Developer B	Developer C	Developer D	Developer E	Developer F	Developer G	Developer H	Developer I	Mean Ranking	Standard Deviation
Economic factors	1	2	2	2	1	1	1	4	2	1,78	0,97
Developer brand	2	1	1	3	7	4	2	5	1	2,89	2,09
Location	7	4	5	1	3	3	4	3	5	3,89	1,69
Means of transportation	8	5	6	4	2	2	3	2	8	4,44	2,46
Architectural functions	3	3	4	5	6	7	7	6	3	4,89	1,69
Existence of social facilities	6	7	3	7	9	5	6	7	6	6,22	1,64
Legal issues	5	8	8	9	5	9	9	1	9	7,00	2,78
Quality of construction	9	9	7	6	8	8	5	9	4	7,22	1,86
Compliance with seismic codes	4	6	9	8	4	6	8	8	7	6,67	1,80

Table 5. Mean rankings and standard deviations of developers' perceptions

developer and the home buyer. From the developers' side, there are certain characteristics that indicate the size, and thus the operation attitude of developers. Among these characteristics, type of firm, scale of operation, entrepreneurial approach, and life cycle of the firm directly affect the locational decision of the development, as well as the production function, such as purchasing methods, amount of prefabrication etc. (Kaiser, 2001). It has been realized by the developers that marketing power of brand name recognition is a new aspect in residential market (Çelen, 2012).

New developments can be built on land that is cheaper than the land closer to downtown or already established neighborhoods (Shiller, 2007). On the other hand, good quality infrastructure and services enhance the desirability of a housing unit and the quality of life of the residents (Mathur, 2008). Location considerations include environmental conditions, and commuting costs (Richardson, 1971; Pollakowski, 1982; Anderson and Crocker, 1971; Henderson, 1977; Koramaz and Dökmeci, 2012). The location of a property expresses the quality and extent of the neighborhood and the quality and level of the infrastructure such as roads and sidewalks. This factor is of particular importance in İstanbul because suburbs have gained importance after the 2000s (Dökmeci and Lale, 1994). New developments at the periphery of old town centers increase both size and density, which in turn affect the number and size of vacant lots for new construction (Koramaz and Dökmeci, 2012). Access to the property using practical and economical means of transportation affects buyers' satisfaction about the property, and is reflected in the price they are willing to pay for this property (Koramaz and Dökmeci, 2012). As a result, the location factor is in third place in **Table 5**.

According to the census conducted in 2010, the total population of İstanbul is 13,255,685 (IBB, 2010). The growth rate is impressive, adding 300,000 people to the population annually (Belkaya et al., 2008). İstanbul Metropolitan Municipality is responsible for public transportation in İstanbul. An underwater tunnel, Marmaray will provide a full upgrade to the existing commuter rail system with an additional rail line to the existing two lines (Belkaya et al., 2008). The Marmaray Project will connect the western-most part of İstanbul to the western-tip of Kocaeli. The total length of rail system will be 76 km. It will be carrying 76,000 passengers per hour in both directions at peak times (Belkaya et al., 2008). Marmaray will relieve the public transportation stress of İstanbul to a certain extent. However public transportation is currently inadequate and cannot meet demand (Evren, 2010). To overcome this problem, inhabitants of İstanbul prefer using cars for transportation. As of March 2012, there were 2,927,650 vehicles circulating in traffic, as a result of which İstanbul suffers from heavy traffic almost any time of the day (Tramer, 2012). Long connecting time emphasizes the importance of accessibility to the project location for potential buyers. If the location of the apartment to be purchased is closer to the downtown area or close to public transportation routes, it reduces commuting times. On the other hand, if the project is developed in a suburban region, then proximity to a highway exit or public transportation routes becomes important. With all these considerations, means of transportation appear as the fourth factor influencing the decision.

The architectural properties of a housing unit are related to its functionality, design and efficient use of the spaces inside the unit. Torbica and Stroh (2001) analyzed the factors that affect satisfaction using a questionnaire survey administered to nearly 300 house buyers. They

found that the house design factor, which represented floor plan, scale and proportion, number and size of the rooms, kitchen and bathroom design, placement of electrical outlets, and brightness or lighting in the house during daytime, was picked by the respondents as the most important factor. Developers use the number and size of rooms as marketing points (Gürgün and Kömürlü, 2010b). There has been a considerable supply in housing units in the 1980s. Following the big size family trend of old times, these new units had mostly been three-bedroom apartments. The shifts in social life like the rise in marriage age, the increase in the number of unmarried people, and the increase in the rate of divorce have changed family trends and have reduced the size of the average household significantly (Bolat, 2007; Kömürlü and Öztekin, 2009a). The size of housing units has shifted from three-bedroom to one-bedroom and studio apartments (Çelen, 2012). As the production and business districts were pushed to the outer borders of the city, and as the number of people with higher education and income has increased, younger and more affluent white collar workers started preferring living separate from their families in relatively smaller housing units such as studios and one-bedroom apartments (Ren, 2008). In addition, the temporary relocations of foreign white collar workers in İstanbul have increased the popularity of these small units. Developers use famous architects not only in İstanbul but also worldwide for increasing sales, achieving international recognition, and attracting investments (Richard, 2005; Rowe and Kuan, 2002; Ren, 2008). According to a research study that focused on the US market, office buildings designed by famous architects are more profitable compared to the rest (Fuerst et al., 2011). The value of a residential property is measured by the property's merit and the contentment of the users. Designers, not only designate the physical, aesthetic, social, economic and technological properties of the housing units, but they also impact the value of the settlement as a whole (Kayasu and Yaşar, 2003; Kömürlü and Öztekin, 2007).

Enhancing the appeal of buildings by adding social facilities is quite common. The decision to purchase an apartment involves the consideration of services that are conducive to a preferred life style (Shiller, 2007). Starting from the 1950s, in order to meet increasing demand, the production of mass housing has accelerated (Cömertler, 2003; Kömürlü and Öztekin, 2007). Lifestyle has been recognized as a new consideration by urban-scale project developers (Çelen, 2012). The change from small single buildings to large multiple buildings has increased the importance of facilities and services. While traditional neighborhoods meet daily social needs, like grocery shopping, taking children to school, going to the parks, going to restaurants, coffee shops, taverns, worship places, within their boundaries (Leyden, 2003), most of these services are expected to be part of large multiple building developments. These facilities and services that are part of residential developments are used by developers as marketing advantages.

The legal issues factor is very important not only in İstanbul, but in Turkey as well. The legal status of the current house stock in Turkey shows that only 62% of the houses have a construction permit and only 33% have an occupancy permit. In other words, only 33% of the housing units were built, which means in compliance with construction codes and laws, and that only one third of these are legally habitable (Kömürlü and Önel 2007; Berberoğlu, 2005). With this fact known by the majority of the population, potential house buyers seek legality and compliance to codes. However,

since the residential developers that participated to this research are well established and reputable companies, house buyers reasonably believe that these companies would not initiate any construction project without having all legal aspects covered. Therefore even though most of the existing building stock in İstanbul suffers from legal issues related to ownership, habitability and deeds, potential buyers appear not to focus on this factor (7th factor in **Table 5**), because they believe reputable companies such as those who participated in the study operate within the law.

Satisfying buyers' quality expectations is a common problem in Turkish residential construction. Kazaz and Birgönül (2005) conducted a survey of 500 households to determine the satisfaction of buyers relative to the quality of housing units. They found that the average level of quality perceived by buyers is between poor and average. Additionally, buyers were compelled to change floor coverings, interior paint, and electrical circuitry. They also tended to modify cabinets, faucets, sinks, exhaust fans in bathrooms and kitchens after the delivery of the units. Since construction quality is related to the materials used, the functional design, and the hardware used in the bathrooms and kitchen, it is of particular interest to buyers. However, this factor ranked next to last in this study presumably because a developer with an established brand name and good reputation is expected to provide these services well.

The last factor that appears at the bottom of the list is compliance with seismic codes. İstanbul is located in a major earthquake zone. It is important for buildings to perform well against any seismic activity. The two severe earthquakes in 1999 (magnitude 7.4 and 7.2 on the Richter Scale) caused the collapse of and heavy damage to a large number of reinforced concrete buildings due to the structural deficiencies of these buildings (Sezen et al., 2003). Poor construction quality and practice, and non-compliance with the existing seismic code were the main reasons for such losses. After 1999, buildings that are designed and constructed according to code became the norm. Although the Code for Buildings That Will be Constructed in Earthquake Zone, which was published in 2007, directs designer to extra safety (Kömürlü and Öztekin, 2009b), compliance to this code is mandatory. The major residential building developers began using their compliance with earthquake design codes as a marketing tool. In time, compliance with earthquake design code became a default feature and is normally provided by all reputable companies as a matter of course. As a result, although it is an important factor in buying a housing unit, this factor is ranked last in **Table 5**.

CONCLUSION

Residential construction constitutes by far the biggest part of building construction in Turkey. It is therefore of significant importance to investors and developers. Development and marketing strategies for residential construction depends on buyers' preferences. This study focuses on developers' perceptions of buyers' preferences. Nine factors, including economic factors, developer brand, location, means of transportation, architectural functions, existence of social facilities, legal issues, quality of construction, and compliance with seismic codes, are investigated and ranked using the analytic hierarchy process (AHP). The main objective of this study was to provide guidance to potential buyers and developers.

The study indicates that developers perceive the price of the property, the quality of the developer, and the location of the property to be the three most important buyer preferences. The remaining factors that were studied in this research appear to be related to one of these three factors. For example, 'means of transportation' is closely related to the location of the property; 'architectural functions', 'social facilities', 'legal issues', 'quality of construction', and 'compliance with seismic codes' are part and parcel of the developer's reputation, knowhow, experience, technical capabilities, and financial might. The study therefore suggests that a conveniently priced housing unit that is built by a reputable developer in a desirable neighborhood satisfies most buyers' preferences. It is of course no surprise that all developers strive to offer competitive pricing and payment plans, hence making selling price the most important factor potential buyers consider when making a decision. However, developers must also spend significant effort to cultivate a reputation that emphasizes good quality design and construction, no legal entanglements, and adherence to seismic codes. They should also make sure that the location of the property is appealing to prospective buyers, as measured by the quality of the neighborhood and the ease of commuting to work.

The results of this study can be used by existing and potential developers in the residential market to improve their approach to their investment and marketing strategies. If developers fail to predict the trends in the market, they may end up investing in constructing property that is difficult to sell. As a result, developers' costs may go up because of the larger inventory that is harder to sell, and the extra cost of marketing. In addition, the level of buyer satisfaction may go down. The information in this study is expected to reduce the likelihood of producing housing units that do not fulfill buyer requirements, hence reducing the number of unsold vacant units. Concerning buyers, the information in this study can help them focus on the factors that are considered most important by the majority of buyers.

In future research, it would be interesting to investigate the differences between the perceptions of developers of different sizes. Also, a comparison of potential buyers' preferences and the perception of developers would shed light on how informed developers are about their customers' wishes.

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KONUT ÜRETİCİLERİNİN PAZARLAMA STRATEJİLERİNİ YÖNLENDİREN KONUT ALICISI TERCİHLERİ

Değişen sosyal, ekonomik ve kültürel etmenler, gayrimenkul olarak konut alım karar tercihlerini etkilemektedir. Konut alıcılarının ülke, bölge ve yörelerin dinamiklerine göre değişkenlik gösteren tercihleri, konut projelerinin özelliklerini ve akımlarını doğrudan etkilemektedir. Ekonomik durum ve yıkıcı depremler, son on yılda İstanbul'daki konut proje geliştirme yaklaşımlarını ve alıcı kararlarını yeniden şekillendirmiştir. Değişik mimari özelliklere, sosyal tesislere sahip, çeşitli tasarım ve uygulama niteliklerini karşılayan projeler ilgi görmekte ve tercih edilmektedir. Bu çalışmada, yerleşmek üzere alım gerçekleştiren potansiyel konut alıcılarının tercih ölçütlerinin tespit edilmesi ve sıralanması amaçlanmıştır. Çözümleme çalışması, İstanbul'daki konut projelerinin çoğunluğuna imza atan büyük konut üretim firmalarının bakış açısından gerçekleştirilmiştir. Bu amaçla, gerek yazın taraması, gerekse de bölgede uygulama yapan profesyonellerle yapılan görüşmelerde elde edilen bilgilere Analitik Hiyerarşi Yöntemi (AHY) uygulanmış, konut üretim firmalarının bakış açısından konut alıcılarının tercihleri dokuz kategoride ele alınmıştır. Çalışmalar sonucu, bu etkenlerin, firmaların satış ve pazarlama politikaları, fiyat seviyesi ve ödeme koşulları, sosyal etkenler, mimari özellikler, konum ve ulaşım gibi özellikler sebebiyle firmadan firmaya çeşitlilik gösterdiği saptanmıştır. Bölge özellikleri ve gerçeklerinin yapılan analitik çalışmayla değerlendirmesi ve hem konut alıcılarına, hem de konut üreticilerine yansıtılması bu çalışmanın temel amacıdır.

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