

# Factors Affecting Land and Housing Market Changes (Case Study: Padideh Tourism Compony-Shandiz City in 2009-2014)

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**Abstract:** When the large urban projects (Mega Project) to be loaded on a national scale in a small town, you can see dramatic changes in the market for land and housing in urban settlements. This paper attempts to study the impact of presence and activity of Padideh Shandiz Tourism Company on land and housing market changes examined in 2009 to 2014 from the perspective of citizens. Regarding purpose, this research is applied. Data were collected via library, field study (questionnaire), and descriptive method was used for data analysis (mean, standard deviation) and inferential statistics (factor analysis and one-sample t-test) were performed. The statistical population community, including families living in Shandiz City on the basis of the 2011 census, with a 10,428 population of 3056 households and is required sample size of 160 households was based on Cochran formula. The findings indicate that the direct effects caused by the presence and activities of Padideh Shandiz Tourism Company in the time interval studied, the statistic 43.6% of the biggest impacts on the land and housing market changes have had on the town. Also based on one sample t-test showed a significant difference between the mean and median of the theoretical (3) Shandiz City from the perspective of citizens that are substantially influence of these factors on land and housing market changes. According to the findings, strategies including attention to urban managements of land and housing market changes in the future, due to the low-income indigenous housing, prevention of social conflicts, provision of infrastructure, etc. have been proposed.

**Keywords:** Padideh Tourism Company, environmental factors, urban management, urban housing, Shandiz City.

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## 1- Introduction

Currently, the issue of housing, and changes of its model and value are universal issues, and different societies and countries are faced with it (Gallent et al., 2003). Homelessness and lack of appropriate shelter have increased the problems of housing issue (Milbourne & Cloke, 2006). Therefore, currently, attention to housing is not merely considering physical shelter, and it includes all public services and facilities required for better life (Knapp, 1982). Housing is a basic human need, and the most important commodity that providing it has devoted significant share of public revenue to itself (Ahmadi, 2008). One of the issues that extremely have attracted public attention to itself is housing and its sustainable development along with human development. The important point that is considered in the documents of the second meeting of UN-Habitat is the key role of sustainable settlement and providing suitable housing for people in the process of development (Chaparli, 2008). Housing is one of the most important issues that human beings have been always dealt with it; they have tried to solve this problem to find a reasonable solution for it. The housing issue is the subject that today, all countries, in accordance with their conditions, are involved in to some extent. In developed countries, housing is an aspect of social welfare, and housing development plans are based on qualitative improvement. In our country, housing is counted as the basic need, and providing it is aligned and as important as providing food and clothes (Sattarzadeh, 2009).

In the recent decades, considering rapid increase of population, providing housing has been one of the important economic and social issues. In this regard, access to suitable housing for all urban and rural households is one of the most important issues of governments and policy-makers, particularly poor and vulnerable classes of the society that they live mostly in villages. As Hewitt (1998) reported, final report of Brandt committee indicates that housing is one of the key needs of developing countries (Hewitt, 1998). Today, housing, as a necessity of life, has a particular importance in the programs of economic and social development, and balance between residential needs of community members and necessities of economic and social necessities are some of the issues that should be always considered in the concept of development (Ziyari et.al, 2008). Housing sector cannot be considered as the most important development sectors in a society. This sector, with wide economic, social, cultural, and environmental aspects, has far-reaching effects on presenting society's features and perspectives to general concept (Azizi, 2004). On the other hand, with beginning of the 21<sup>st</sup> century, third world countries are faced with important issues such as providing suitable shelter, employment, and sustainable environment. In the meantime, appropriate shelter has an influential importance because of satisfying household or individual's basic needs in it such as sleeping, resting, and protecting against weather conditions (Ziyari and Zarafshan, 2006).

When a mega project is planned at national scale on a small urban resident, significant evolution is evident in the domain of land and housing market. Padideh Shandiz tourism complex and its symbol (dream town of Padideh), as an urban mega project, has been started since 2009. It has had significant impacts on this small city, and particularly land and housing market; therefore, the main question of this research is that what are the effective factors on the developments of urban land and housing at small urban scale such as Shandiz after presence of tourism complex and building dream city of Padideh Shandiz during 2009 to 2004?

According to the research question, following hypothesis is presented:

The effects of presence and activity of Padideh Tourism Company in the city of Shandiz have had the most impact on the market of urban land and housing in this city.

## 2- Literature Review

Few studies have been done in the field of studying effective factors on housing price at the level of cities in our country, but fewer have been referred to effective factors on the development of land and housing market; therefore, the strength point that increased the importance of this study is a few researches in this field, particularly the studied area and its conditions. In this part, we review some of these researches briefly:

### a. Forging Researches

Laurice (2003), Hai-Zhen et.al. (2005), Gouriéroux and Laferrère (2009), and Karlik and Olgac (2011) dealt with

studying effective factors on housing price in their studies by using hedonic model in California, Hangzhou, China, France. They concluded that factors such as infrastructure level have had the most influence.

Dawkins and Nelson (2002), in the study of relationship between curbing urban development policies and housing price, believed that curbing urban development policies are used widely in planning of land use as a tool for reducing urban sprawl and keeping agricultural land.

Jim and Chen (2006), in the study of effective environmental factors on the price of residential units in Guangzhou (China) addressed the impact of issues such as direction of windows, perspective of green space, the height of floors, closeness to areas covered with trees and surrounded by water, and exposure to noise high-traffic areas.

Wen and Goodman (2013) in the study of relationship between the price of urban land and housing in China indicated that housing price has been increasingly influenced by the price of urban land.

Plantinga et.al. (2013) in the study of 291 urban areas in the U.S. investigated and confirmed the relationship between housing costs (average of house price, average of renting apartment, and average of renting urban lands) and immigration.

Wen and Tao (2015), in the study of multiple urban structure and housing price in the transitional period in Hangzhou, China believed that the impact of urban centers on housing price has been increased gradually so that elasticity and steep of

the price of both of them have been increased from 2003 to 2011.

*b. Iranian Researches*

Sajjadiyan (2001) in article entitled “geographical analysis of Tehran’s urban housing policies and its consequences” believed that Tehran huge growth has been as the result of establishment and dominance of private sector, and ultimately lack of government’s controlling policies in housing sector causing physical and spatial consequences of housing, imbalanced development of the city, suburbanization, establishment of housing on faults or seismic zones.

Poormohammadi and Khunayand (2001) in a research entitled “the study and evaluation of providing housing policies for urban less-income groups, case study: city of Tabriz” stated that inappropriate coverage of urban less-income classes as well as poor classes of the society are one of the big problems that is confronted with providing housing policies in the country and the city of Tabriz.

Asgari and Qaderi (2002), and Akbari et.al. (2004) indicated that the value of residential unit is because of five different groups of accessibility, physical, public, environmental and regulatory factors. Four groups of these factors are influenced by national and local governments’ policies and practices; therefore, ownership on the value of real states is also consistent with the principle of interest.

Azizi (2004) believed that the indexes of urban housing in Iran have been influenced by external and internal factors. Influentially external factors, including demographic-economic and

social factors have resulted in housing boom and bust, and housing programs have been less effective on general situation of housing and its improvement indexes. Internal factors of housing that are mainly affected by manner and process of housing planning form housing situation in specific aspects.

Ziyari et.al. (2008) in an article, entitled “comparative study of quantitative and qualitative indexes of housing in the city of Babol emphasizing on healthy city” indicated that comparative results of city of Babol with Iran’s urban areas show that housing indexes have had recovery trend during 1986 to 2006, and its situation in the city of Babol had been better than other urban areas in the country.

Sabagh Kermani et.al. (2010) in a study, entitled “determining factors of housing price with causative relations approach on vector error correction model, case study: Tehran” stated that there is a relationship in short term among the variables of land price, wholesale price index of construction materials, and the price of gold coin, as a substitution market with housing price.

Pilevar et.al. (2011), in a research, entitled “studying the impact of political decisions on unsustainability and structural evolution of urban land and housing resulting from political approach, case study: city of Bojnurd” indicated that changes in land and housing price in urban areas of Bojnurd were significant after becoming province center so that land price and housing purchase have been increased 61 times and 5 times respectively as comparative study

indicated before and after becoming province center and promotion.

Rahimi et.al. (2013) in an article, entitled “the study of effective factors on urban housing price by using Hedonic Prices (case study: district 2, city of Sanandaj)” indicated that physical factors of housing in district 2 of Sanandaj have more impact than access factors in housing price in this area. However, amongst physical properties, the most impacts are related to land area, floor area, the type of used materials, and city gas services respectively.

Izadi et.al. (2014) in a research entitled, “measurement of effective environmental values on satisfaction from residence case study: Maali Abad area of Shiraz)” indicated that most people are satisfied highly from their residence environment in the studied area, and weather quality, natural landscapes and gardens have had the most important role in this regard.

Reviewing conducted internal and external researches represent the influence of various factors on the market of urban land and housing.

### **3- Theoretical Principles**

#### ***Urban Housing***

Housing functions as a unit of physical facilities or economic and durable commodity that it has social or public role (Bourne, 1981). Moreover, it eliminates financial needs, represents as people’s socioeconomic status and position as well (Cater & Trevor, 1989). Yet, housing is the main factor of socialization of people into the world, and a major and determining commodity in

social organization of space that has crucial role in forming individual identity, social relations, and people’s public purposes (Short, 2006); therefore, housing has different locational, architectural, spatial, physical, economic, financial, psychological and medical aspects (Cullingworth, 1997). In many cases, the most important effective factor on the rate of individual’s satisfaction from residence in neighborhood is housing and its environmental condition (Westaway, 2006). According to Le Corbusier, both aspects of human’s physical and mental needs should be responded with spatial organizing of housing (Yagi & Hata, 1992). Good and suitable housing represents society’s public welfare, but bad and inappropriate housing leads to harmful consequences including illnesses, promiscuity, depravity and corruption of the youth (Rangwala, 1998). Economic factors, architecture style, native language of the area, stylistic trends, weather, geography, and local traditions and customs are effective on the development and design of housing in different places (Sendich, 2006).

One of the estimation methods of changes in urban land and housing is Hedonic technique that it has been used to analyze many aspects of housing market such as taxes, price of public commodities and facilities, racial discrimination and quality of building houses (Hui et al., 2007). In this method, it is assumed that housing is a heterogeneous commodity; therefore, its price reflects people’s willingness to pay for access to required welfare facilities inside and outside the housing (Selim, 2009). In other words, it

is assumed that housing price indicates the maximum money that people are willing to pay for obtaining certain amount of internal facilities, building situation, access to municipal facilities and services (Karlik & Olgac, 2011).

### ***Effective Factors on the Price of Urban Land and Housing***

City, considering intermediaries, is a place where it is possible to achieve to maximum profit, minimum capital risk within the shortest time and least activity by land speculation, rents and monopoly of information. People consider the exchanging value of land and housing. However, they may consider class differences in the city as natural and integral part of urban development (Hosseini, 2006). Effective factors in demand, supply, and determining land price depend greatly on its unique features as a private and public commodity. This dual character of land and willingness to occupy and use of land by people and public sector propose various ownerships and different types of occupation for land (Mohammadpour Omran and Mahmoodi Pati, 2008). In cities, land is an important source for any types of urban development including housing, industry, social services, communication, and infrastructures. Eventually, it is of great importance in improvement of development level. Due to exclusive and special features, land is very valuable; therefore, anyone who controls land, in fact he/she can obtain profitability (Zanganeh, 2009). Three elements can be recognized in increasing the value of urban land. One element originates from investment at the time of

land use change including the costs of elementary task, various costs of land separation, providing municipal services (public or private), and other activities such as land clearing and resettlement of original inhabitants of the land. The second element originates from created changes in permitted uses. The third one originates from spatial changes because of city expansion. The last two elements are not the result of exclusive investment on land. However, they are generally counted as the phenomenon created by community (Poormohammadi et.al, 2012). In general, the most important factors affecting changes in land and housing market are:

a) Environmental factors (natural, social, and economic): Some of the environmentally affective and important factors include proximity or geographical location of land, height, high prestige and social status, immigration, lack of control and socially clear and accurate policy in the field of urban housing, the level of economic activities, the role of city in the region and country, labor wage rates in the city, investment, accumulation of capital that each of which has specific effect on land and housing price (Fanni and Daviran, 2008).

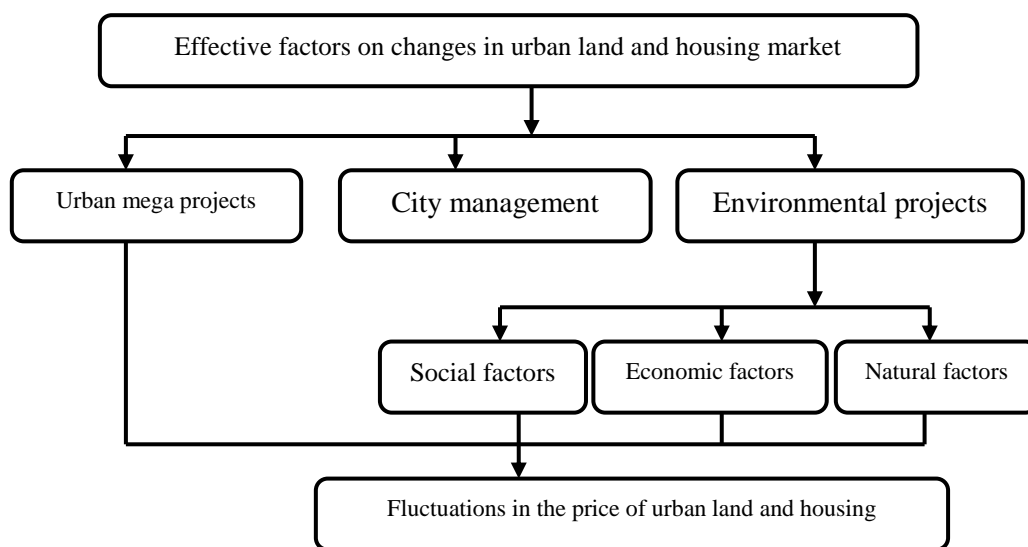
b) Managerial and institutional factors: approving the increase of city limit, municipality performance in issuing construction and density performance, preparing and transferring land by municipality, government's policy in the field of supportive housing (for less-income classes and Mehr Housing), preparing infrastructure facilities and welfare services, and effective presence

of city management can be considered as some of the most important factors.

c) Urban mega projects: large infrastructure business service projects with high prices and vast influence at the performance level of city of ultra-city can be called urban mega projects. It has diverse range regarding entity, land use, function, and range of effectiveness in the city including international large-scale trade and service centers, huge communicative infrastructure projects such as constructing urban metro, constructing technological and recreational townships, prominent urban projects (different and prominent architecture style in the city or designed by famous designers and architectures at the international level), rehabilitation and renovation projects. These projects are called mega ones since they can be led to wide, long-term, and prominent changes in identity, economic and social

structure, and the role and function of city (Altshuler & Luberoff, 2003).

Six features of mega projects include being giant, attractive, costly, controversial, complex, and controlling (Flyvbjerg et al., 2003). Mostly, mega projects confront with two different approaches in urban development plans; from one hand, to projects at large-scale of construction and high symbolic importance such as constructing special museum, and from one hand to other larger projects with complex issues such as mixed residential complex, transport facilities (Orueta & Fainstein, 2008). One of positive and negative impacts of urban mega projects in the field of urban land and housing price is failure to meet housing needs and employment of less income classes of the society and increasing occupational and inexpensive housing opportunities through implementing urban mega projects (Jia et al., 2011, Ponzini, 2011).



Shape1. Conceptual model of research variables

Reference: (Researchers' studies)

**4- Research Method**

Research method is applied, in terms of purpose. It is experimental and descriptive-analytic in terms of method. Part of research data were obtained by field studies with questionnaire and interview, and some others, including theoretical framework of the research, documents, and censuses, were obtained by library method. According to 2011 census, this city had 3056 households and 10428 people. Statistical population of the research includes households living in the city of Shandiz. According to the Cochran formula with possibility level of 95 percent, necessary sample was 160 households for questioning in the city. Choosing households at the level of city is random to observe the principle of equal opportunity in order to select households. Sample size estimation method is:

$$n = \frac{\frac{(1/96)^2 \times 0/5 \times 0/5}{(0/075)^2}}{1 + \frac{1}{3056} \left( \frac{(1/96)^2 \times 0/5 \times 0/5}{(0/075)^2} - 1 \right)} \approx 160$$

- n= sample size
- N: total number of statistical population
- t= confidence level at 95% level
- d= Approximation in parameter estimation of society equals to 0.075
- P= possibility of attribute of 0.5
- q= possibility of no attribute 0.5

In this regard and for the purpose of access to favorable results, a questionnaire was developed to investigate effective factors on urban land and housing market after the activity and presence of tourism company of Padideh Shandiz (because of constructing dream city of Padideh) during 2009 to 2014 in the city of Shandiz in the form of 31 represents related to three indexes of environmental, managerial, and Padideh Tourism Company factors (table1).

**Table1. Effective variables and indexes on changes in urban land and housing market**

Index	Number of Items	Represents	Cronbach's Alpha
Environmental, social, economic, and natural factors	10	Population increase and creating demand, immigration from surrounding villages, change in life style, reduce in the numbers of an urban household, significant presence of young people in the city of Shandiz, citizens' social interactions living in Shandiz with immigrants, available land suitable for development, favorable climate and country location of Shandiz, employment opportunities in the city of Shandiz and hope to economically better tomorrow in the city of Shandiz	0.769
Managerial factors	9	Approval of increase in the city limit, municipality performance in issuing construction and density license, preparing and transferring land from municipality, preparing suitable grounds for investment of private sector, government's policies in the field of constructing supportive housing (for less income classes of the society and Mehr Housing), implementation of Hadi Project of Shandiz from municipality and relevant institutions, effective supervision of engineering offices, providing infrastructure facilities, welfare services, and effective presence of city management	0.887
Presence of Padideh Shandiz Tourism Company	12	Need for housing for the employed labor force, impact of improvement of urban infrastructure, reduce in citizens' immigration, creating job opportunities, creating new grounds of investment and housing, false price increase (rents) for housing, increase in place belonging, trusting Padideh company as a suitable symbol for the city of Shandiz, change in the type of construction material in houses, presence of skilled and semi-skilled construction workers, Improving the quality of transportation lines of Mashhad – Shandiz, raising the level of people's income	0.910
Total	31	-----	0.932

Reference: (Asgari and Qaderi, 2002; Akbari, et.al, 2004; Ziyari et.al. 2008; Rahimi Kakehjoob et.al. 2013; researchers' findings, 2014)

The reliability of the questionnaire was 0.932 by using Cronbach's alpha indicating relatively high confidence coefficient. Data analysis obtained by questionnaire was done through descriptive statistics (mean, standard deviation) and inferential statistics (Pearson correlation, stepwise regression and one-sample t-test). In this research, hedonic model has not been used to identify factors influencing the price of land and housing, but they were detected by the help of citizens.

## 5- Research Findings

### *Studied Area*

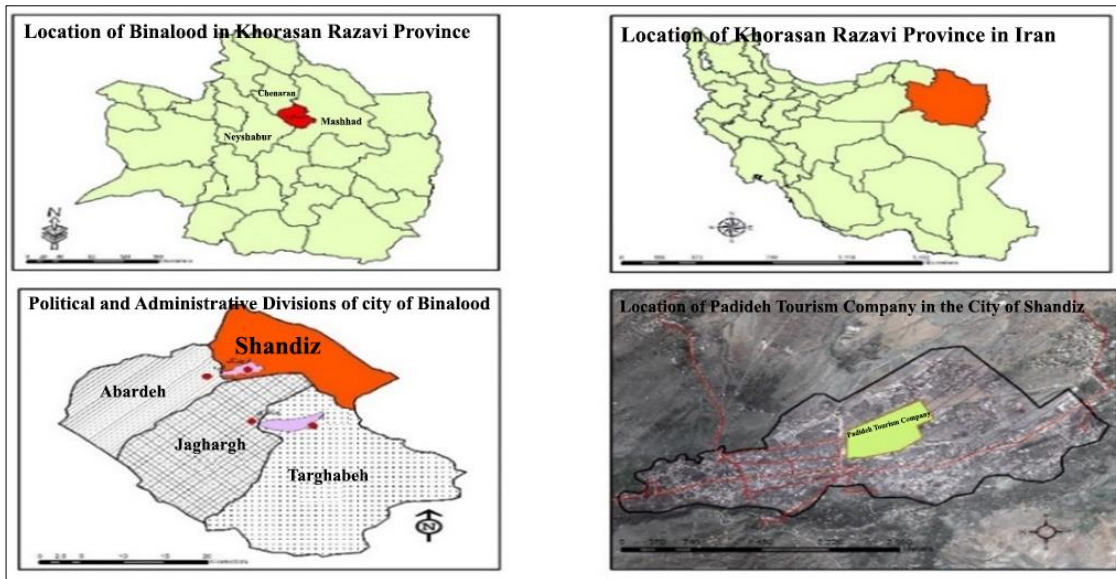
City of Shandiz is located in latitudes of 36 degrees and 23 minutes, longitude 59 degrees and 17 minutes, and average height of 15 Km west of Holy Mashhad. It is the major center of passing leisure time due to its position on the northern slopes of the Binalood Mountains, mild climate, plenty of water, large gardens, and spectacular natural sceneries (Governorship of Khorasan Razavi, 2014). This city had 10428 people in 2011. In terms of political divisions, Shandiz is located in the city of Binalood, it is administered by municipality in terms of management (Statistical Center of Iran, 2011).

The process of constructing dream city of Padideh in Shandiz has been

started since in 2009. According to officials, it was supposed to be finished in 2014, but it has not been finished yet due to legal and financial problems. This complex consists of:

- Aqua Park, with an area of 53 thousand square meters
- Cultural complex and surroundings with the area of 27 thousand square meters
- Five-star hotel with the area of 250 thousand square meters
- Garden of flowers with the area of 40 thousand square meters
- Large shopping and entertainment center of Padideh with the area of 560 thousand square meters
- Administrative complex of dream city of Padideh with the area of 32 thousand square meters
- Residential apartment with the area of 183 thousand square meters
- An indoor amusement park with the area of 30 thousand square meters (International Development Company of Tourism Industry of Padideh Shandiz, 2014).

In this stage of research, raw data are analyzed and changed into understandable information in order to comment about "possible" relations among them.



Map1. Region's location of studied area

**Reference: (Researchers' Findings)**  
**Respondents' Individual Features**

The descriptive findings indicate that 97.5 percent were men and 2.5 were women among 160 respondents. In addition, 85 percent of them were married. In terms of family size, 60.2 percent had 3 or 4 people. Studying their age status indicates that most of them (37.5 percent) were 25 to 34 years old. The average age of 37.8 for all respondents represents this issue. In terms of education, 11.3 percent had elementary degree, 12.5 had the degree of secondary school, 53.8 percent

had diploma, and 22.5 of them had A.A. and higher degrees. Employment status of the respondents indicates that 95 percent were self-employed. A survey conducted on the monthly spending of urban households in Shandiz shows that 35 percent of them had monthly spending between 7500000 Rials to 1250000 Rials. Finally, regarding the issue of urban housing in this research, the results indicate that 57.5 percent of people had houses and 36.6 of them had leased accommodation (table2).

Table2. Respondents' descriptive features

	Feature	Number	Percent
Gender	Male	156	97.5
	Female	4	2.5
Education	Elementary	18	11.3
	Secondary	20	12.5
	Diploma	86	53.8
	A.A. and higher	36	22.5
Household's Monthly Spending (Rials)	Less than 7500000 Rials	18	11.3
	Between 7500000 to 1250000 Rials	56	35
	Between 1250000 to 1750000	28	17.5
	Between 1750000 to 2500000	32	20
	More than 2500000 Rials	26	16.3
Type of Housing	Ownership	92	57.5
	Rental	52	33.6
	Organizational	2	1.3
	Other types	12	7.5

Reference: (Researchers' findings)

The results of price status of property and land indicate that the average price of each square meter of Shandiz properties was 6120000 Rials before beginning of Tourism Company of Shandiz in 2009 aiming to build dream city of Padideh, and it reached to 13100000 Rials on average after building this project. After passing about four years of the company's activity in the city of Shandiz, land price increases 21 percent on average annually. However, if we calculate inflation rate along with growth rate, changes in land price may not be so much, but it should be noted that this

mega project has not come into operation and it is under construction. As most residents say, in this stage, most capital has been absorbed in buying the shares of this company.

***Environmentally Effective Factors on Changes in Urban Land and Housing Market***

In this research, along with factors directly caused by the presence of Tourism Company of Padideh, other factors including environmental and managerial ones have been addressed, to finally be determined that which factors have had the most share in the change of urban land and housing market in the studied period.

**Table3. Environmentally effective factors on changes in urban land and housing market**

Index	Never	Few	Average	Much	Very much	Mean	Standard deviation	Importance factor
Population Increase and Creating Demand	2.5	5	30	37.5	25	3.78	0.968	2
Immigration from Surrounding Villages	12.5	17.5	26.3	32.5	11.3	3.13	1.205	9
Change in Life Style	5	7.5	28.8	43.8	15	3.56	1.004	11
Reduce in the Number of an Urban Household	12.5	18.8	36.3	23.8	8.8	2.98	1.136	8
A significant Presence of young People in the City of Shandiz	8.8	8.8	17.5	43.8	21.3	3.60	1.176	3
Social Interaction of Citizens Living in Shandiz with Immigrants	12.6	20	23.8	32.5	11.3	3.09	1.245	4
Available Land Suitable for Development	12.6	10	30	32.5	15	3.26	1.240	6
Favorable Climate and Country Location of Shandiz	1.3	5	15	27.5	51.3	4.21	1.015	1
Employment Opportunities in the City of Shandiz	10.3	17.5	27.5	27.5	17.5	3.24	1.255	10
Hope to Better Economic Future in the City of Shandiz	7.6	6.3	20	31.3	35	3.79	1.240	12
Total	-	-	-	-	-	3.46	0.657	-

**Reference: (Researchers' findings)**

In this part, environmental factors, including effective economic, social, and natural ones on the changes in urban land and housing market in the city of Shandiz were evaluated by using 10 indexes including population increase, immigration from surrounding villages, life style

change, reduce in the number of an urban household, significant presence of young people, social interaction of citizens living in Shandiz with immigrants, available land suitable for development, country location, employment opportunities, hope to better economic future in the city

of Shandiz. The results after completing questionnaires and their analysis indicate that in general, the indexes of mild climate and country location of Shandiz with the mean of 4.21 had the most, and the index of reduce in the people of an urban household with the coefficient of 2.98 had the least impact; therefore, generally, environmental factors during the studied period have had considerable impact on the changes in land and housing market in the city of Shandiz (table3).

**Managerially Effective Factors on Changes in Urban Land and Housing Market**

Along with environmental factors, city management and its positive and negative impacts can affect urban land and housing market; therefore, in this part, managerial effective factors on changes in urban land and housing market during 2010 to 2014 after the presence and activity of Tourism Company of Padideh in the city of Shandiz were evaluated by using 9 indexes including approval of increase in the city limit, municipality performance

in issuing construction and density license, preparing and transferring land from municipality, preparing suitable grounds for investment of private sector, government’s policies in the field of constructing supportive housing (for less income classes of the society and Mehr Housing), implementation of Hadi Project of Shandiz from municipality and relevant institutions, effective supervision of engineering offices, providing infrastructure facilities, welfare services, and effective presence of city management. The results after completing questionnaires and their analysis indicate that in general, the index of approval of increase in the city limit with the mean of 3.30 had the most and the index of preparing and transferring land by municipality with coefficient of 2.25 had the least impact on increasing construction and change in land and housing market. Thus, in general, managerial factors in the studied period affected partially housing and land market in the city of Shandiz (table4).

**Table4. Managerially effective factors on changes in urban land and housing market**

Index	Never	Few	Average	Much	Very much	Mean	Standard deviation	Importance factor
Approval of increase in the city limit	13.8	8.8	23.8	40	13.8	3.30	1.257	2
Municipality performance in issuing construction and density license	36.3	6.3	28.8	22.5	6.3	2.55	1.368	9
Preparing and transferring land from municipality	40.1	18.8	21.3	15	5	2.25	1.288	11
Preparing suitable grounds for investment of private sector	17.6	12.5	21.3	33.8	15	3.15	1.351	8
Government’s policies in the field of constructing supportive housing (for less income classes of the society and Mehr housing)	12.6	18.8	33.8	18.8	16.3	3.06	1.266	3
Implementation of Hadi project of Shandiz from municipality and relevant institutions	30.1	8.8	38.8	13.8	8.8	2.61	1.307	4
Effective supervision of engineering offices	11.3	10	43.8	30	5	3.06	1.060	6
Providing infrastructure facilities and welfare services	17.6	16.3	18.8	38.8	8.8	3.04	1.297	1
Effective presence of city management	20.1	12.5	35	26.3	6.3	2.85	1.223	10
Total	-	-	-	-	-	2.90	0.868	-

Reference: (Researchers’ findings)

***The impact of Padideh Tourism Company on changes in urban land and housing market***

As it was mentioned before, implementation of urban mega projects will

influence positively or negatively on urban society so does urban land and housing market.

**Table5. Effective factors on changes in urban land and housing market because of Padideh Tourism company in Shandiz**

Index	Never	Few	Average	Much	Very Much	Mean	Standard Deviation	Importance Factor
Need for housing for the employed labor force	3.8	10	21.3	33.8	31.3	3.79	1.110	2
Impact of improvement of urban infrastructure by the help of Padideh Tourism Company	3.8	17.5	27.5	26.3	25	3.51	1.158	9
Reduce in citizens' immigration	15	8.8	20	28.8	27.5	3.45	1.377	11
Creating job opportunities	5	13.8	28.8	22.5	30	3.59	1.198	8
Creating new grounds of investment and housing	13.8	5	12.5	31.3	37.5	3.74	1.376	3
False price increase (rents) for housing	8.8	7.5	23.8	26.3	33.8	3.69	1.259	4
Increase in place belonging	7.5	7.5	25	32.5	27.5	3.65	1.181	6
Trusting Padideh company as a suitable symbol for the city of Shandiz	8.8	3.8	10	32.5	45	4.01	1.227	1
Change in the type of construction material in houses	12.5	1.3	35	28.8	22.5	3.48	1.222	10
Presence of skilled and semi-skilled construction workers	15	16.3	20	28.8	20	3.23	1.350	12
Improving the quality of transportation lines of Mashhad – Shandiz	7.5	3.8	31.3	27.5	30	3.69	1.165	5
Raising the level of people's income	12.5	8.8	13.8	33.8	31.3	3.63	1.344	7
Total	-	-	-	-	-	3.62	0.887	-

**Reference: (Researchers' findings)**

In this part, the impact of Padideh Tourism Company on changes in urban land and housing market was evaluated by using 12 indexes including need for housing for the employed labor force, impact of improvement of urban infrastructure, reduce in citizens' immigration, creating job opportunities, creating new grounds of investment and housing, false price increase (rents) for housing, increase in place belonging, trusting Padideh company as a suitable symbol for the city of Shandiz, change in the type of construction material in houses, presence of skilled and semi-

skilled construction workers, improving the quality of transportation lines of Mashhad- Shandiz, raising the level of people's income. The results after completing questionnaires and their analysis indicate that in general, the index of trusting Padideh company as a suitable symbol for the city of Shandiz with the mean of 4.01 had the most impact and the index of presence of skilled and semi-skilled construction workers with the coefficient of 3.23 had the least impact. Thus, in general, presence of Padideh Tourism Company could affect the changes in land and housing in Shandiz (table5).

***The Analysis of Effectiveness of Factors on Changes in Urban Land and Housing***

Before studying the relationship between dependent and independent variable, at first, normality of the data were examined by using Kolmogorov-Smirnov test. According to the results, triple indexes and all effective factors on changes in land and housing market had normal distribution. In order to study the

relationship among these indexes, Pearson correlation test was used, and to examine the impact factor, stepwise regression was used. Thus, there is a direct correlational relationship between effective factors on changes in urban land and housing and correlation coefficient; between 0.824 to 0.827 at the significance level of 99 percent, indicating considerable impact of these factors.

**Table6. The study of relationship between effective factors on changes in urban land and housing**

Description		Padideh Company	City management	Environmental factors
Total	Correlation coefficient	**0.874	**0.835	**0.824
	Significance level	0.000	0.000	0.000

**Reference: (Researchers' findings)**

In this part of the research, independent variables of environmental and managerial factors and the role of Padideh Tourism Company, and dependent variable of changes in housing and land market were entered into the regression equation by using stepwise multiple regressions. After entering independent variables into the regression equation and calculating the significance of each variable by using stepwise multiple regressions, following results were obtained:

Regression model with  $F= 254.14$  to  $F= 639.46$  at the significance level of ( $\text{sig}= 0.000$ ) is highly significant. In general, the variable of Padideh Tourism Company presence had explanation power of 76.3 percent ( $\text{adjusted } R^2 - 0.763$ ) in the first step. This factor increases to level one by adding other variables in the next steps. According to the test results, multiple correlation coefficients among independent and dependent variables is  $R=0.874$  to  $R=1$  (table7).

**Table7. Estimating coefficient of determination in regression model of effective factors on changes in urban land and housing**

Steps	R	Coefficient of Determination	Durbin-Watson Statistic	F	Significance Level	Result
1	0.874	0.763	-	254.14	0.000	Significant
2	0.971	0.943	-	639.46	0.000	Significant
3	1	1	1.871	-	0.000	Significant

**Reference: (Researchers' findings, 2014)**

In table8, the estimated values of the parameters, their standard deviation, and standardized estimation of regression model parameters, t statistic, and significance level have been reported. In order to study whether residuals are independent or not, Durbin-Watson statistic is used. If the amount is among 1.5 to 2.5, it will represent the independence of the residuals that is equal to 1.871; therefore, the residuals are independent from each other. According to the results, the impact of all indexes in the model is significant. The results indicate that according to the stepwise regression analysis, in the first step and based on the coefficient of determination (R), independent variable of Padideh Tourism Company presence could solely explain 86.3 percent of changes in dependent variable. Its impact factor indicates that for each unit change

because of presence and activity of Padideh Tourism Company, 0.670 change occurs in urban land and housing market, but standard beta coefficient represents that 0.874 percent change occurs in urban land and housing market for one unit standard deviation because of presence and activity of Padideh Tourism Company. These statistics have considerable changes in the third step because according to equal impact of these factors in explaining dependent variable changes, their impact factor was equal, but their standard beta coefficient represents more impact of the presence and activity of Padideh Tourism Company compared with other factors. The amount of t-statistic in the third step, considering acceptable significance level of data, represents more relative importance of Padideh Tourism company impact and managerial factors.

**Table8. The study of effectiveness of factors on changes in land and housing market in the city of Shandiz**

Step	Independent Variables	Coefficient of Variable	Standardized Coefficient (Beta)	t-Statistic	Significance Level	Result
1	*Fixed amount	0.901	-	5.722	0.000	Significant
	Presence of Padideh Company	0.607	0.874	15.85	0.000	Significant
2	*Fixed amount	0.523	-	6.42	0.000	Significant
	Presence of Padideh Company	0.456	0.594	18.27	0.000	Significant
	City management	0.398	0.508	18.63	0.000	Significant
3	*Fixed amount	1	-	0.000	0.000	Significant
	Presence of Padideh Company	0.333	0.434	120.3	0.000	Significant
	City management	0.333	0.425	130.8	0.000	Significant
	Environmental factors	0.333	0.322	90.5	0.000	Significant

**Reference: (Researchers' findings)**

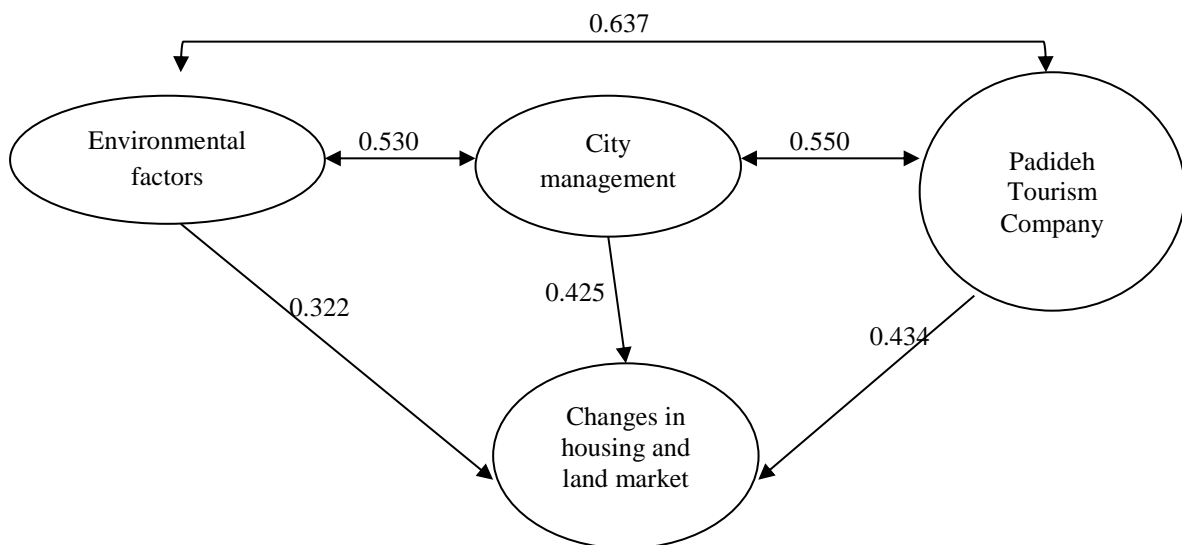
In the following, for the study of direct and indirect impacts of factors affecting land and housing market in the city of Shandiz, using path analysis, it was specified that the impact of Padideh Tourism Company had more important role in changing in land and housing

market in this city with the statistic of 0.745 compared to other factors (table9). Afterwards, the role of city management and environmental factors are almost close to each other although in direct impact, the role of factors related to city management is more prominent (shape2).

**Table9. The study of direct and indirect impact of effective factors on changes in housing and land market in the city of Shandiz**

Variables	Types of impact		
	Direct	Indirect	Total
Padideh Tourism Company	0.434	0.311	0.745
City Management	0.425	0.221	0.646
Environmental Factors	0.322	0.337	0.659

Reference: (Researchers' findings)



**Shape2. Effective factors on changes in land and housing market in the city of Shandiz**  
Reference: (Researchers' findings)

*Comparative Analysis of Effective Factors on Changes in Urban Land and Housing Because of Padideh Tourism Company Presence*

According to the significance level of obtained t-test, if it is less than 0.05, average equality hypothesis with number 3 will be rejected. If the significance level

of t-test is obtained more than 0.05, the hypothesis of average equality with number 3 will be accepted. Finally, decision-making about the importance of index was considered so that if index average is more or equal to 3, the index will be important, and if index average is

significantly less than 3, it will be considered unimportant. In this part, effective factors on changes in land and housing market have been evaluated after presence of Padideh Tourism Company during 2010 to 2014 from citizens' perspective.

**Table10. Importance factor of effective factors on changes in urban land and housing market based on one sample t-test.**

Impacts	Mean	t	Degree of Freedom	Significance Level Sig. (2-Tailed)	Mean Difference	95% Confidence Interval	
						Low Limit	High Limit
Padideh Tourism Company	3.62	6.247	159	0.000	0.620	0.422	0.817
City management	2.90	-1.036	159	0.303	-0.100	-0.293	0.092
Environmental factors	3.46	6.290	159	0.000	0.462	0.316	0.609
Total	3.33	4.299	159	0.000	0.327	0.175	0.478

**Reference: (Researchers' findings)**

In this part, comparing the average of variables with theoretical middle by using one sample t-test indicates that in general, three factors affecting changes in urban land and housing, excluding city management, have had less significance level of 0.05 ( $= \text{Sig} < 0.05 H_1$ ) between case study and theoretical middle in the city of Shandiz; therefore, the indexes of Padideh Tourism Company presence and environmental factors t-statistics equal to 6.247 and 6.29 had the most difference with theoretical middle, but on the other hand, city management, considering that low limit is negative and high limit is positive, there is no significance level between mean and tested value (theoretical middle). The significance level of 0.303 about city management factors also confirms this hypothesis (table10).

## 6- Conclusion and Suggestion

Housing, as one of the primary needs of human being affecting directly human quality of life, is considered as one of the main concerns of families. For this purpose, providing suitable housing has important role in planning of socio-economic development of most countries. Thus, studying changes in land and housing market in cities is considered as one of the serious issues, and these changes are intensified by implementation of urban mega projects. Summing up the results of the study will guide us to this point that Padideh Tourism Company has affected considerably land and housing market in the city of Shandiz during 2009 to 2014; therefore, it is in compliance with the results of (Asgari and Qaderi, 2002; Akbari et.al. 2004) about different

physical, general, environmental, regulatory, and access factors affecting urban housing market. In addition, it is consistent with research findings of (Azizi, 2004 and 2005) believing that indexes of urban housing in Iran are influenced by two types of external and internal factors. Finally, findings of Pilevar et.al. (2011) about changes in housing and land price in urban areas of Bojnurd, after becoming the center of province, confirm it.

Finally, research findings indicated effective factors on changes in urban land and housing in the city of Shandiz after presence of tourism complex and dream city of Padideh Shandzi during 2010 to 2014. According to the results of citizens in Shandiz, the highest impact factor was allocated to the presence of Padideh Tourism Company with the statistic of 0.745, then environmental factors with the statistic of 0.659, and finally city management with the statistic of 0.646 among effective factors on changes in urban land and housing because of Padideh Tourism Company, according to standard Beta output of stepwise regression based on path analysis test. Moreover, according to one-sample t-test, there is a significant difference between the mean of factors and theoretical middle of 3 in the city of Shandiz except from factors related to city management from perspective of citizens, indicating considerable effectiveness of these factors in changes in land and housing market; therefore, according to the research findings, direct consequences of Padideh Tourism Company presence in the city of Shandiz had had the most impact on changes in

this city, and as a result, the hypothesis is confirmed.

The following suggestions are offered, according to the research process and results:

- Since the mega project of dream city of Padideh has not come into operation yet, profound development will be occurred in land and housing market of this small country city located in the suburb of Mashhad metropolis by exploiting it in near future. Thus, city managers should adopt necessary measures to control land and housing market during this time.

- According to the changes in land and housing market in future, more population that is non-indigenous will be entered into this previously closed social area, creating multiple social contexts resulting in the formation of social conflicts in the region and city. Thus, more attention should be paid to primary residents of the city in line with social justice and sustainable development.

- During the process of a major investment such as the establishment and activities of Padideh Tourism Company and its symbol i.e. dream city of Padideh, providing calm and socio-economically secure environment should not be neglected in the city of Shandiz, since tranquility of this area is considered as perspective for its future development, and it can prepare the ground to absorb more tourists to this region in the future.

- Since infrastructures of Shandiz are designed for its current residents, it will not be suitable for constructing a mega project such as Padideh Tourism Company. Thus, urban infrastructures should be provided with cooperation of

private sector (Padideh Company) and city management in short-term for tourists and people who may go there because of direct and indirect activities of this complex.

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