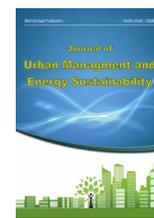


Journal of Urban Management and Energy Sustainability (JUMES)

Homepage: <http://www.ijumes.com>



ORIGINAL RESEARCH PAPER

Investigation the indicators of the worn-out tissue renovation in approach to public participation (Case Study: Rasht city, Iran)

Mohamad Bagheri Harreh Dasht, Mehrdad Ramezanipour*, Kia Bozorghmehr, Ameneh Haghzad

Department of Geography, Faculty of Geography and Urban planning, Islamic Azad university o Chalos, Chalos, Iran

ARTICLE INFO

Article History:

Received 2021-09-19

Revised 2021-09-23

Accepted 2021-12-24

Keywords:

Public participation

Rasht

Renovation

Urban management

Worn-out urban tissue

ABSTRACT

Worn-out urban tissues are the focus of problems in various dimensions, which in some cases are considered the main urban problems, and at the same time, they have many latent capacities and capabilities for inner-city development. Among the solutions that have been used in recent decades to positively intervene such as renovation and improvement of these tissues, there is a collaborative approach in a way that can be effective and useful in the structure of urban management. In this regard, the present research aims to evaluate the indicators of public participation in the renovation of worn-out urban tissues of Rasht city. The research method is descriptive-analytical, which is used to collect information from documentary-library and field methods. The data collection tools of this research were questionnaires, interviews, observations, and field studies. The statistical population of this research is the citizens living in the worn-out area of Rasht city, 384 people were selected as a statistical sample using the random sampling method. Analytical findings of two T-tests and Friedman's test show that the effect of research indicators on people's participation in tissue renewal worn-out is different, so that the economic index items with an average rating of 4.85 have obtained the highest points in the priority and the environmental index items with an average rating of 1.12 have obtained the lowest points in the priority. In the future research, it is also possible to examine the impact indicators of economic factors and considering this idea, it is possible to examine the relationships between the variables and by converting them into paired indices, it can be related to the whole subject with more optimal methods.

DOI: [10.22034/JUMES.2021.1973962.1096](https://doi.org/10.22034/JUMES.2021.1973962.1096)

Running Title: Worn-out urban tissue renovation in public participation



NUMBER OF REFERENCES

26



NUMBER OF FIGURES

2



NUMBER OF TABLES

13

*Corresponding Author:

Email: mehrdadramezanipour1@gmail.com

Phone: +989113307864

1. Introduction

A systemic view of the city means that the issues related to it cannot be seen in a one-dimensional way, and it is necessary to analyze the city and its related issues with a systemic analysis, and in a way that includes the general dimensions of its constituents (UNDP, 2004). Worn-out urban tissues are often among deprived and underutilized areas from social, economic and physical points of view. To revive and modernize these areas, many efforts have been made during the last few decades using different approaches and policies (Mirzaei Arjenki and Shabani Shahreza, 2019). More than 21 and a half million people live in worn-out areas, most of them are from low-income groups. In general, the intervention in the renewal of the worn-out tissue has been proposed in the framework of different perspectives, but since 1950, two views have been important as the boundary of the change of perspective and the role of the government in the literature of the renewal of the worn-out tissue. The first point of view is the provider policy which until recent years has always been a conduit for intervention in the worn-out tissue due to the emergence of problems caused by this type of policy in the social and cultural fields, the level of people's satisfaction and also the common approach to reducing government employment in several, has decreased last year. The second point of view is the empowering policy, which has entered the country's urban planning culture along with the current urban planning literature in line with the people's participation in all fields (Roosta, 2009).

Due to several reasons, including the contradiction with the above plans and the lack of participation of people in the preparation and implementation of the proposed plan, it has caused inefficiency and, in some cases, increased disturbances in the spatial, social, and functional structure of the context (Yazdi, 2010). People's participation means the voluntary participation and freedom in the development process (Sabatier, P. A., and Shaw, L. K. 2009). People's participation in the development process has such credibility that they consider development as participation and analyze urban structures according to the level of successful or unsuccessful public intervention

(Habitat debates, 1966). The goal is to create a platform for citizen participation and raise the level of democracy and civil liberties (Zarrabi and Tehrani, 2009). It is from the perspective of participatory planning that focuses on improving the role of people and citizens in improvement and renovation. Considering the effects of public participation in the renovation of worn-out tissue, the purpose of this research is to investigate the methods of promoting public participation in the improvement and renovation of the worn-out urban tissue in the local structure of Rasht city. About 847 hectares of the area of Rasht Baft city are worn-out with a population of over 115,000 people living there. The largest area of worn-out tissue of Rasht city is located in the central parts of the city, but due to the separate and connected development of the city, the peripheral areas that are today within the legal boundaries of the city, have a share of the worn-out tissue of Rasht. Give in this area, the share of residential use is about 461 hectares, which has the largest share compared to other uses. The small width of the roads and inappropriate access, population density, dilapidation of buildings, the presence of historical monuments scattered on the surface of the worn-out tissue and the fineness of the parts, the instability of construction materials, make the need to pay attention to the renovation of the worn-out tissue of this city even more. Therefore, the renovation and improvement of the worn-out tissues of the city of Rasht, which has a considerable extent, according to the necessity that everyone emphasizes, requires serious action with the participation of people and their actions that are on the one hand the desire of the citizens to participate and on the other hand the efforts of the custodian institutions to follow the worn-out tissue to renew. In the current research, an attempt has been made to answer a question based on the nature of the assessment of the indicators of worn-out tissue with the approach of public participation, so that the main questions are: 1- What are the effective indicators in evaluating the worn-out urban tissue in the public participation approach? 2- What is the mechanism of the intervening indicators in the quality of worn-out tissue in Rasht city? Therefore, it is possible to put forward the main hypothesis that "it seems that,

based on trend surveys, the economic index has the greatest impact on the dimension of people's participation in the worn-out urban tissues of Rasht?" In this regard, the current research tries to prioritize the areas of Rasht city from the perspective of renovating worn-out structures with the approach of public participation.

1.2. Research background

In the field of the public participation role and its effects on the renovation and improvement of worn-out tissue both inside the country and abroad, there have been many studies and researches, which are mentioned in the background of the research for better use of the research results in two research groups abroad and inside the country refer to a few cases of recent research. Alipour Kohi et al. (2021) reached these results that social, economic and cultural indicators affect the willingness of residents to participate (Alipour Kohi et al., 2021). General participation of a component fundamentals is good at planning. A comprehensive plan is a plan that is done with people (Zimmerman, 1996). It is a general public that significantly causes realism in formulating goals and executive capabilities plans and the plan's reliance on data become reliable and accurate and it guarantees the success of the plans (Moazi Moghadam, 2001). The experience of different countries in the world in the implementation of urban development plans also gives the conclusion that the implementation of urban development plans should be outside the power of the governments and finally, the success of the plans depends on the broad participation of the people, local institutions, municipalities and the central government (Shifeta and Rohiklash, 2017). Javadian et al. (2021) in research entitled Factors Affecting People's Participation in Renovation of worn-out tissues in District 15 of Tehran city, reached the results that citizens' participation had a great impact on the improvement process of worn-out tissue in District 15 and among the factors affecting this field can be attributed to economic factors; physical-infrastructure; urban management; socio-cultural and environmental (Javadian et al., 2021). Shahinifar et al. (2019) in research titled measuring the amount of people's participation

in the renovation of worn-out urban structures (for example the old city of Kermanshah), reached these results that between the observed and expected rates of people's participation, there is a significant difference in the renovation of worn-out structures in Kermanshah (Shahinifar et al., 2019). Abedi (2019) in a research "Financing Tools and Factors Affecting People's Participation in the Environmental Improvement of Green City in Iran" concluded that the structure of providing financial resources for the renovation project of worn-out tissue is possible for a city or a district. It may not be effective due to its special laws and conditions, but on the other hand, it can be used effectively in other areas (Abedi, 2019). In his research, Rokivan (2001) investigated the reconstruction of worn-out structures in India with the participation of the people, the results of the research showed that if people's participation is used, it can be seen to have a double effect on citizens' awareness of citizenship rights and the need to recognize their potentials and capabilities were in changing the quality of the living environment. Rius Ulldemolins (2014) in his research on the influence of culture and local identity on the process of renewing worn-out tissue, concluded that culture has played an important role in regional and international competition, especially in the quantitative and qualitative levels of tissue renewal worn-out. In their research for the city of Istanbul, Hestad et al. (2020) reached the conclusion that the one-dimensional view of the authorities and the lack of attention to the participation of the residents has led the residential space of the worn-out tissue to destruction, and sustainable urban renewal can have a positive effect on the health and well-being of the residents of these tissues and leave them to decay and destruction. In a general view, the research mentioned in the focus of the current research can be evaluated in several cases, so that most of the mentioned internal researches: 1- reviewed the dimensions of urban wear and tear in the conceptual and fundamental dimensions and most of the repeated models in structural analysis has provided the main concept. 2- Weariness is more considered in all dimensions such as physical, social, and economic, which is mostly considered the general state of the

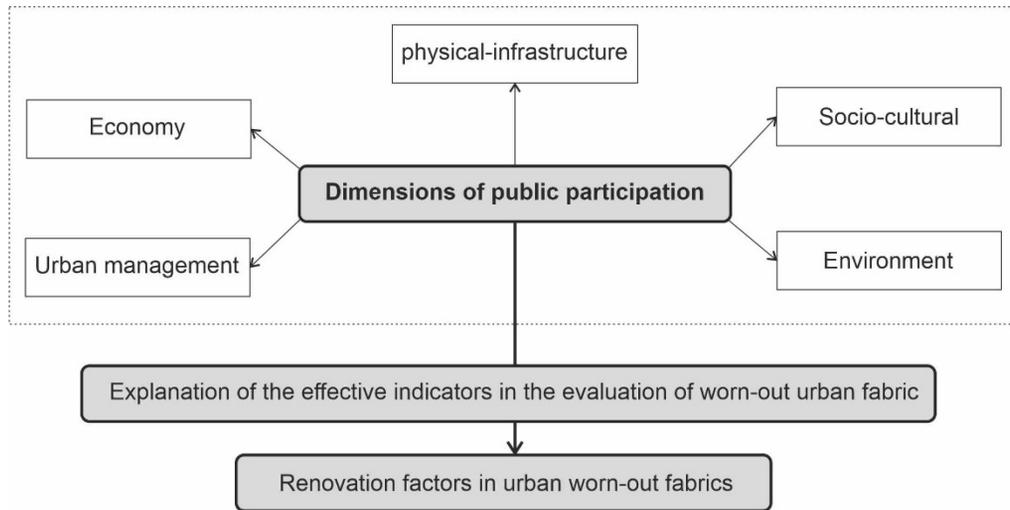


Fig. 1: Research model

concept and has not been specifically addressed to one dimension in its type of evaluation in foreign research. Besides, the issue of wear and tear in urban areas has been addressed in the form of regeneration projects, and the type of evaluation method of its effects has also been done intermittently, but no study has been done on the type of texture and that the historical urban core can intensify these effects, and there are no suggestions in the overall evaluations. They have paid to optimize the works.

Body (form) and function (role) are the two parts that make up the tissue of the city, and when the physical, functional, or both qualities are reduced or disturbed in parts of the urban tissue, wear and tear occur (Daudpour and Nik nia, 2018). There are two types of exhaustion, physical and functional. When the body is damaged, but the activity and use are responsive, or vice versa, partial exhaustion has occurred, and if both the body and function are damaged, complete exhaustion occurs (Azizi and Arasteh, 2009). Fatigue is not limited to the body, but it represents the existence of conditions that threaten life in different dimensions. These conditions include cases such as high crime rates, social problems and economic poverty. It includes the lack of proper physical infrastructure and vulnerability to earthquakes, the inability to provide adequate

relief in times of crisis, and many other issues (Roberts and Sykes, 2000). An inefficient context is an area that is harmful to the safety, health, or well-being of society due to destruction, incomplete and defective planning, inadequate or inappropriate facilities, the existence of harmful uses, the existence of unsafe structures, or a combination of these factors. (Tallon, 2013). Diagnosing and finding a solution to reduce and eliminate inefficiency is one of the important management issues in all scales and is determined according to the level of development, issues, and severity of inefficiency (limit of resilience or crisis) (MacDonald et al., 2009). The process of the fall of an efficient neighborhood or city to inefficiency is called urban decay and this event is mainly related to the deterioration of the available economic conditions in a city, on the other hand, it is an inevitable result of urbanization (Keshavarz and et al., 2010). The participatory approach can establish this deterioration in social life in the logic of urban management based on the social-oriented structure in dysfunctional urban contexts. (Sugrue, 2014). The worn-out urban structures are first of all the dwellings and goods of the people living in them, or at least the goal is to be like that. Expecting people to settle in an environment that lacks the standards of urban life and does not conform to today's needs;

is far from the standards of social justice. It is selfish to look at the old textures as a museum for the sake of the tourists and people who don't have to live in these spaces and avoid any kind of action to make fun of them. At the same time, the existence of relics from ancient times, especially in the critical situation of today's lost generation, is very important and destroying them is not rational by any standard. Thus, the point of view of this research is realism, and in this point of view, intervention is considered permissible, and its main goal today is to build worn-out urban textures and spaces and social development, taking into account cultural aspects. Based on the literature and research background, many thinkers and researchers have chosen indicators to evaluate their research goals based on the operational and theoretical definitions of the concept of public participation in the renovation of worn-out tissue, which is indicated in Figure 1.

2. Material and Methods

The current research is descriptive and analytical in terms of its method, and in terms of its purpose, it is considered to be evaluation and ultimately practical. In its implementation, the survey method has been used, which means that in the first step, the variables are described, and in the second step, the relationship between the research indicators is examined. According to the type of problem and goal, the scale of urban districts in worn-out and inefficient tissue has been proposed, which is related to the extracted dimensions and stated indicators, as well as

including the variable explanation and criteria for evaluating the indicators affecting the worn-out tissue with the approach of public participation. The statistical population studied in this research is the residents of the worn-out tissue of the city of Rasht. According to the census 2015, the population of worn-out tissues residents of this city is equal to 115,000 people. According to Cochran's formula, the size of the sample population with a confidence factor of 95%, which is equal to 384 people in this research, and according to the percentage of worn-out tissue in the areas of Rasht city, its size for each of the areas of this city is as described in table number one. Cronbach's alpha coefficient obtained for reliability evaluation in table number 2 is equal to 0.730, which shows that the questionnaire has relatively favorable reliability and can be used. In addition, in terms of methodology, this research is useful and practical for some urban organizations and bodies, such as the municipality, the housing foundation and the governorate (Tables 1 & 2).

In the current research process, for data analysis, statistical tests such as Pearson's correlation coefficient, and Friedman's test (with graphs) have been used. Moreover, T-test and dispersion coefficient were used to analyze the data. These tests will be done in SPSS software after collecting the questionnaire from the level of the studied area.

2.1. Case Study

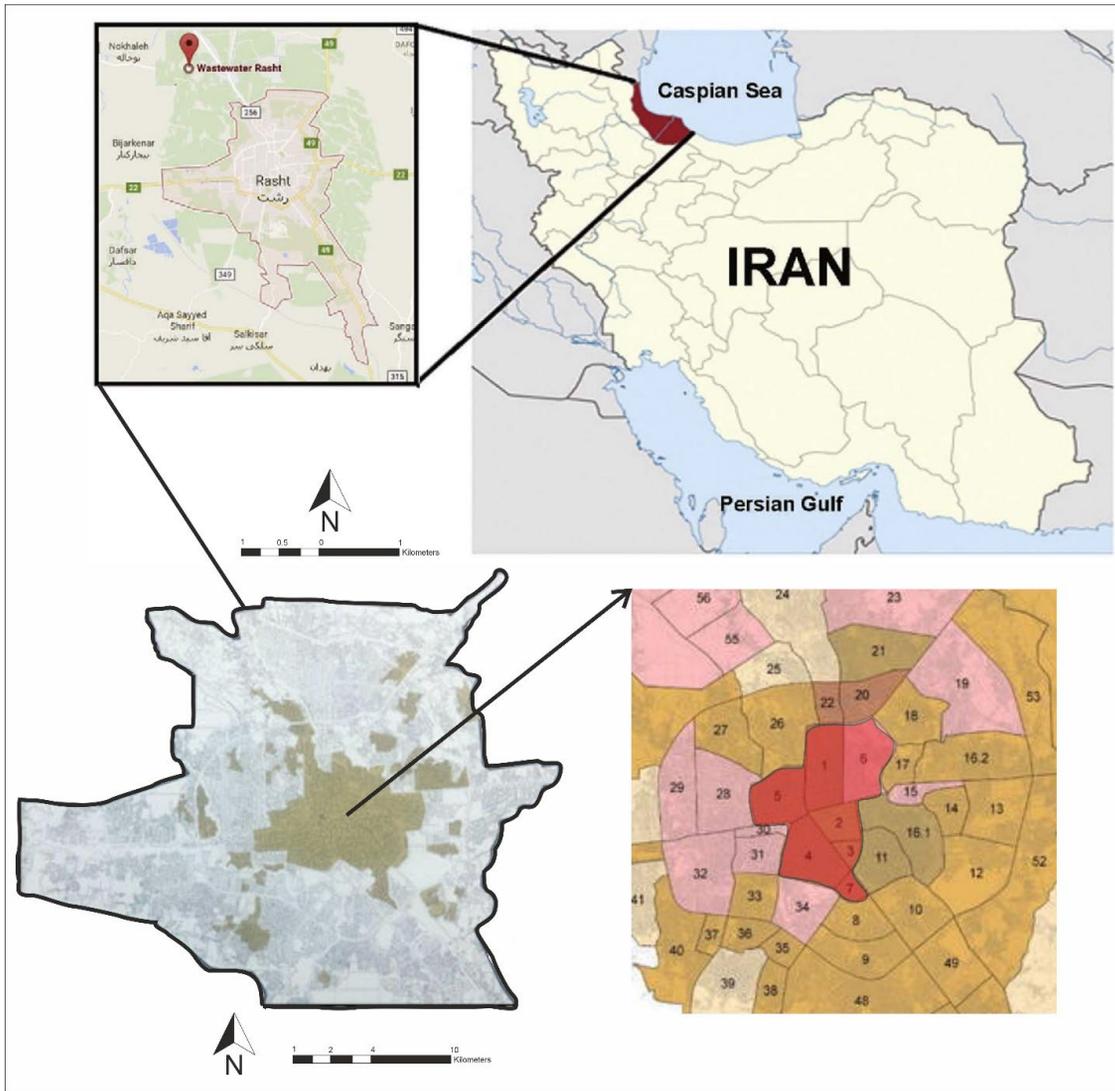
The city of Rasht is located at 49 degrees and 36 minutes east longitude and 37 degrees and

Table 1: Sample size according to the urban areas of Rasht

District	Area (Hectare)	Worn-out tissue percentage	Sample volume
1	135	16/88	65
2	402	50/25	193
3	250	31/25	120
4	13	1/62	6
5	0	0	0
Total	800	100	384

Table 2: Reliability of the questionnaire using Cronbach's alpha method in SPSSsoftware

Reliability Statistics	
N of Items	Cronbach's Alpha
30	0/730



Source: According to the information received from the country's mapping organization, 1400

Fig. 2: Geographical position of Rasht city in Iran and worn-out urban tissues in the same city

16 minutes north latitude, and its distance from Tehran is 325 kilometers. Rasht city is located in the central part of the city and it is limited to Khammam district from the north, Lakan village and Roodbar town from the south, Some Sera and Shaft cities from the west, and Koch-Safhan and Sangar districts from the east. The city of Rasht is the most populated in the north of Iran among the three provinces on the edge of the Caspian Sea and the largest settlement on the southern shores

of the Caspian Sea. Rasht is located on flat and smooth land and is located at an average height of 5 meters above the surface of open water. The Alborz Mountain range is located in the southern part of Rasht city (Figure 2).

The survey of the population of Rasht city districts shows that the fourth district is the most populated with 28.56% of the population of Rasht city and the fifth district is the least populated district of Rasht city with 12.23%. Examining

Table 3: Properties of worn-out tissues of Rasht city by urban districts

District	Urban area (Hectare)	Worn-out tissue areas	Worn-out tissue areas proportion (Percentage)
1	1912	135	7/1
2	675	402	59/6
3	1676	250	14/9
4	1799	13	0/7
5	4101	0	0
Total	10163	800	7/9

the state of worn-out structures in the city of Rasht in table number 4 shows that Rasht city, based on the approval of the Supreme Council of Urban Planning and Architecture of Iran and the Commission of Article Five of this council, has an area of about 800 hectares of worn-out structures (about 7% of the city's area) according to the index Triple selection has worn-out ranges. Zone 2 of Rasht city with an area of 402 hectares has the largest level of worn-out tissue in the city, so that alone about 59% of the approved area of worn-out tissue is located in this area (Table 3).

3. Discussion and Findings

3.1. Findings

This research investigates the renovation of worn-out tissues of Rasht city with the approach of public participation from 5 dimensions, socio-cultural; the environment; urban management; physical-infrastructure; economically used. According to the intended method in the present research, the findings of the research are divided into two descriptive and analytical categories.

3.2. Descriptive findings

Investigating the fields of people's participation in the renovation of worn-out structures has been done using 5 sub-indices. These sub-indices are provided to the respondents in the form of a question and with 5 levels of the Likert scale. The descriptive data of this section are as follows:

- In the socio-cultural dimension, the index of reduction of social problems with a total score of 1510 and an average score of 3.93 (and the highest response in the very high range with 39.84 percent) in terms of respondents for public participation in the renovation and improvement of worn-out tissue. It is more effective than other indicators related to the socio-cultural dimension.

- In the environmental dimension, the index

of the cleanliness of the streets and passages of the neighborhood with a total score of 1457 and an average score of 3.79 (and the highest response in the wide range with 35.94 percent) compared to other indicators of this dimension in public participation for renovation and improving worn-out tissue is effective. So that, the standard deviation and variance of this index are lower than other indices.

- In the aspect of urban management, the index of trust in urban management for renovating the worn-out tissue of Rasht city with a total score of 1161 and an average score of 3.02 has had the greatest impact on the renovation of the worn-out tissue. In the physical-infrastructure dimension, the average incentive density index (maximum 2 floors) is higher than the other four indices. In the economic dimension of people's participation in the renovation of worn-out structures in Rasht city, the index of 100% remission of renovation costs with an average of 3.83 and a total of 1485 points has obtained the highest score compared to other economic indicators.

3.3. Analytical findings

Before choosing the appropriate test for data analysis, it is necessary to find out about their normality. In this research, the Kolmogorov-Smirnov test was used to evaluate the normal distribution of the data. Table 5 with the title of the normal distribution of the data has been examined and analyzed. The analysis of the Kolmogorov-Smirnov test for the current research indicators (social-cultural, environmental, urban management, physical-infrastructure and economic) shows that the sig value is less than 0.05, so the data from the distribution Normality was found and parametric tests (such as independent t) can be used to analyze them. (Table 4).

3.4. The effect of socio-cultural indicators in the renovation of the worn-out tissue of Rasht city

Socio-cultural index using the following items: 1- friendly relationship with the residents of the neighborhood and neighbors; 2- the attractiveness of living in worn-out and old neighborhoods; 3- correct information and advertising; 4- Ethnic and linguistic differences; 5- The reduction of social problems has been analyzed. The results obtained from the statistical analysis in Table 6 show that the actual average obtained (17.25) and the value of Sig or the decision criterion (which is equal to 0.018) are higher than 0.01 percent. Therefore, with a probability of 99%, the actual average is significantly different from the assumed average, and we can admit that we have no reason to reject the null hypothesis and that the socio-cultural indicators of the research have a positive effect on people's participation for the renovation of the worn-out tissue (Table 5).

3.5. The effect of environmental indicators on people's participation in the renovation of the worn-out tissue of Rasht city

The average obtained (real average) from the response of the sample community to the environmental delimitation items affecting people's participation in the renovation of worn-out tissues of Rasht city is equal to 13.38. Since this number is higher than the average value (with a value of 13) and the value of the decision criteria (sig) is higher than 0.05, therefore, with a confidence factor of 99%, the effect of the environmental index on people's participation in the renovation of the city's worn-out tissue can be determined. Rasht proved it (Tables 6 and 7).

3.6. The influence of the urban management index on people's participation in the renovation of the worn-out tissue of Rasht city

The urban management indicators on people's participation in the renovation of worn-out

Table 4: Normal distribution of research data and indicators

	Social-cultural indicator	Environment indicator	Urban management indicator	Physical-infrastructure indicator	Economy indicator
N	384	384	384	384	384
Mean	17.25	13.39	18.34	18.71	21.51
Std. Deviation	6.15	4.41	8.12	5.36	4.51
Absolute	0.119	0.119	0.089	0.147	0.14
Positive	0.104	0.077	0.089	0.12	0.112
Negative	-0.119	-0.119	-0.081	-0.147	-0.14
Test Statistic	0.119	0.119	0.089	0.147	0.14
Asymp. Sig. (2-tailed)	.000c	.000c	.000c	.000c	.000c

Table 5: The effect of the socio-cultural index on participation in the renovation of the worn-out tissue of Rasht city

	Statistic	One-Sample Statistics				
		Bias	Std. Error	95% Confidence Interval		
				Lower	Upper	
N	384					
Social-cultural	Mean	17.2526	-0.0053	0.3262	16.6146	17.906
	Std. Deviation	6.15265	-0.0179	0.17113	5.79507	6.4654
	Std. Error Mean	0.31398				
Test Value = 18						
Social-cultural	t	df	Sig. (2-tailed)	Mean Difference	99% Confidence Interval of the Difference	
					Lower	Upper
	-2.380	383	0.018	-0.74740	-1.5602	0.0654

Tables 6 & 7: The effect of the environmental index in participation for the renovation of the worn-out tissue of Rasht city

		Statistic	Bias	Bootstrap		
				Std. Error	95% Confidence Interval	
				Lower	Upper	
Environmental	N	384				
	Mean	13.3880	0.0027	0.2279	12.9350 13.8255	
	Std. Deviation	4.41372	-0.01427	0.12643	4.15014 4.62853	
	Std. Error Mean	0.22524				

One-Sample Test						
Test Value = 13						
Environmental	t	df	Sig. (2-tailed)	Mean Difference	99% Confidence Interval of the Difference	
					Lower	Upper
	1.723	383	0.086	0.38802	-0.1951	0.9711

Table 8: The effect of urban management index in participation in the renovation of the worn-out tissue of Rasht city

One-Sample Statistics						
		Statistic	Bias	Bootstrap		
				Std. Error	95% Confidence Interval	
				Lower	Upper	
Urban management	N	384				
	Mean	18.3359	0.0094	0.4160	17.4870 19.1380	
	Std. Deviation	8.11530	-0.01051	0.24435	7.63808 8.58144	
	Std. Error Mean	0.41413				

One-Sample Test						
Test Value = 19						
Urban management	t	df	Sig. (2-tailed)	Mean Difference	99% Confidence Interval of the Difference	
					Lower	Upper
	-1.604	383	0.110	-0.66406	-1.7361	0.4080

structures in Rasht city include 1- the existence of a specific institution for the renovation of worn-out structures; 2- trusting the city management to rebuild the worn-out tissue; 3- justice in providing services to the worn-out tissue from the city administration; 4- the support and cooperation of the municipality in the participation of citizens for renovation; 5- informing the government for people's participation in the improvement and renovation of worn-out tissue; 6- government advertisements for people's participation in improving and renovating worn-out tissue; 7- satisfied with the renewal plans of the worn-out

tissue. The results of the single-sample t-test of these indicators in Table 8 show that the average (real average) of the sample population is equal to 18.38. Since the actual average (with a value of 18.33) is greater than the estimated average (with a value of 19), the value of the decision criterion (sig) which is equal to 0.110 is greater than 0.05, so with a confidence factor of 99%, the effect of the urban management index on public participation can be for the renovation of the worn-out tissue of Rasht city, it was proved and there is no reason to reject the null hypothesis of this index (Table 8).

Table 9: The effect of the physical-infrastructure index in the participation in the renovation of the worn-out tissue of Rasht city

One-Sample Statistics						
		Statistic	Bootstrap			
			Bias	Std. Error	95% Confidence Interval	
					Lower	Upper
Physical-infrastructurel	N	384				
	Mean	18.7005	0.0061	0.2738	18.1380	19.2471
	Std. Deviation	5.34613	-0.01470	0.19027	4.93551	5.69463
	Std. Error Mean	0.27282				
One-Sample Test						
Test Value = 20						
Physical-infrastructurel	t	df	Sig. (2-tailed)	Mean Difference	99% Confidence Interval of the Difference	
					Lower	Upper
	-4.763	383	0.000	-1.29948	-2.0057	-0.5932

Table 10: The effect of the economic index on participation in the renovation of the worn-out tissue of Rasht city

One-Sample Statistics						
		Statistic	Bootstrap			
			Bias	Std. Error	95% Confidence Interval	
					Lower	Upper
Economical	N	384				
	Mean	21.5130	-0.0137	0.2167	21.0835	21.9374
	Std. Deviation	4.50701	-0.00305	0.16914	4.16787	4.81074
	Std. Error Mean	0.23000				
a. Unless otherwise noted, bootstrap results are based on 1000 bootstrap samples						
One-Sample Test						
Test Value = 22						
Economical	t	df	Sig. (2-tailed)	Mean Difference	99% Confidence Interval of the Difference	
					Lower	Upper
	-2.117	383	0.035	-0.48698	-1.0824	0.1084

3.7. Physical-infrastructure indicators in public participation in the renovation of the worn-out tissue of Rasht city

Investigating the effect of the physical-infrastructure index using the following items: 1- Willingness to live on one's property; 2- Willingness to gather with neighbors; 3- Strengthening the building according to safety points during construction; 4- Incentive density (maximum 2 floors); 5- Increasing the quality of construction has been done. The results obtained from inferential statistics and one-sample t-tests in Table 9 show

that the actual average obtained (18.70) is lower than the assumed average (20) and on the other hand, the value of the decision criteria (sig) is less than 0.01, which indicates the significance of the relationship between the average effect of indicators in the renewal of worn tissue (Table 9).

3.8. The effect of economic indicators on people's participation in the renovation of the worn-out tissue of Rasht city

Investigating the economic index of the effect of people's participation on the renovation of

Table 11: The effect of the economic index on participation in the renovation of the worn-out tissue of Rasht city

Descriptive Statistics					
Indicators	N	Mean	Std. Deviation	Minimum	Maximum
Social-cultural	384	17.25	6.15	5.00	25.00
Environmental	384	13.39	4.41	4.00	20.00
Urban management	384	18.34	8.12	7.00	35.00
Physical-infrastructural	384	18.70	5.35	5.00	25.00
Economical	384	21.51	4.51	10.00	27.00

Table 12: Prioritizing research indicators using Friedman's test

Indicators	Mean Rank	Priorities
Social-cultural	4.85	1th
Environmental	3.48	2th
Urban management	2.99	3th
Physical-infrastructural	2.56	4th
Economical	1.12	5th

Table 13: Evaluation of the accuracy of the Friedman test

Test Statistics	
N	384
Chi-Square	1188.72
df	4
Asymp. Sig.	0.00

a. Friedman Test

worn-out tissue using 1- economic support (loans and subsidies); 2- reduction of bank interest on loans and bank facilities; 3- lack of financial ability of the residents (reverse); 4- 100% remission of renovation fees; 5- tax exemption for renovation loans for worn-out tissue; 6- the connection of building branches (electricity, water, and gas) has been done free of charge. The results obtained from the one-sample T-test in Table 10 show that the value of the decision criterion (sig) is higher than 0.01, and the results obtained from the comparison of the averages can be accepted with a probability of 99%. is located, and as a result, the economic index has a positive effect on the renewal of the worn-out tissue of the district (Table 10).

3.9. Prioritization analysis of research indicators

Friedman's test has been used to measure the importance and prioritize the effect of research

indicators in the renovation of the worn-out tissue of Rasht. This test is for comparing the average ranks in k variables (groups). In the Friedman test, the H0 assumption is based on the sameness of the average ranks among the groups. Rejecting the null hypothesis means that at least two groups have a significant difference among the groups. The results of this test are presented in the following tables 23-4 (Tables 11-13).

Tables 11 to 13 show the average ranks, the prioritization of indicators, and the accuracy of the Friedman test for each of the research indicators. The Test Statistics table contains the main result of the test. As can be seen in the table, the value of statistic k with 4 degrees of freedom and also the level of significance (p-value) with zero value indicate the rejection of hypothesis H0. Therefore, according to the above outputs, it can be concluded that the effect of research indicators (social-cultural, environmental, urban management, physical-infrastructural and economic) on people's participation in the renovation of worn-out tissue is different. So that, the economic index items with an average rating of 4.85 have obtained the most points in the priority and the environmental index items with an average rating of 1.12 have obtained the lowest points and are in the fifth priority.

4. Conclusion

Compared to some previous researches, such as Javadpour and Kohi Bitsher, the focus of the article is on all dimensions of the urban tissue and also the focus of public participation which is mostly considered on this research is to be focused on the economic dimension of public participation. Since the results indicate the importance of the economic dimension of the concept of worn-out tissue, it is possible to consider the income structure of the people as the main issue in addition to the physical dimension that has a historical course. Based on the study conducted in this section, to operationalize the participatory approach in the process of renovating and improving worn-out structures in Rasht city, a questionnaire in the form of 27 questions has been used. These questions are classified into three sections (characteristics of the sample community, descriptive findings, and analytical findings). Analytical findings of two T-tests (one-sample) and Friedman's test show the effect of research indicators on people's participation in the renovation of the worn-out tissue of Rasht city, and among them, the economic index with a rank average of 4.85 has the highest score so it ranked first. The results obtained from the t-test (single sample) show that the actual average obtained (actual average) and the value of Sig or the decision criteria in the 5 dimensions of the research (including socio-cultural, environmental, urban management, physical-infrastructure and economic) are higher than 0.01 and less than 0.05 percent. Therefore, with a probability of 99%, we can admit that the actual average is significantly different from the assumed average, and the indicators of public participation have a positive effect on the renovation of the worn-out tissue of Rasht city. In the conclusion related to the research hypotheses, the connection and effect of public participation in the renovation and improvement of the worn-out tissue of the city of Rasht have been determined. So that in the five indicators of the research (social-cultural, environmental, urban management, physical-infrastructure, and economic), their weighted average of 95% confidence has had an impact on people's participation to renew the worn-out tissue. This shows the great desire

of the residents for the worn-out tissue in the renovation of the worn-out tissue of the city. In future research, it is also possible to examine the impact indicators of economic factors and look at their historical relationships. Considering this idea, it is possible to examine the relationships between the variables and by converting them into paired indices, it can be related to the whole subject with more optimal methods.

References

- Abedi, S. (2019). financing tools and factors affecting people's participation in the environmental improvement of the green city (a meta-analysis on studies conducted in Iran), *Economics and Urban Planning*, 18-19, 9.
- Alipour Kohi, P.; Ramezani, M. Mirgholami, M. (2021). Investigating the factors affecting residents' participation in the renovation and improvement of the worn-out urban tissue (research case: Odlajan neighborhood of Tehran), *Green Management Art Journal*, No. 3, pp. 75-90.
- Azizi, MM.; Mojtaba A. (2018). Evaluation of the success of consolidation projects in the historical context of Yazd city, a case study. *Urban and regional studies and researches* (5): 1-28.
- Country Mapping Organization, 2021
- Davoudpour, Z.; Maliha Nei K. (2018). Improving and renovating worn-out urban structures is a strategy towards achieving the physical dimensions of sustainable urban development. *Geographical Quarterly of Aamish Environment* (15).
- Habitat D. (1996). "Participation for Efficiency or Empowerment?" Vol. 12, No2, p: 3-50 Leach, W., Pelkey, Leach, WD.; Pelkey, NW.; Sabatier, PA. (2002). Stakeholder Partnership as Collaborative Policymaking Evaluation Criteria applied to Watershed Management in Colifornia and Washington, *Journal of Policy analysis and Management*, 21 (4), 645- 670. <https://doi.org/10.1002/pam.10079>
- Hagh Panah, M.; Karimi, B.; Mehdinejad Darzi, J. (2021). the effects of physical and social factors on the cooperative improvement of worn-out tissues (case study: Nader Kazmi neighborhood of Shiraz), *Arman Shahr Quarterly*, No. 37, pp. 239-251.
- Hestad, D.; Mangalagiu, D.; Ma, Y.; Thornton, T. F.; Saysel, A. K.; Zhu, D. (2020). Enabling environments for regime destabilization towards sustainable urban transitions in megacities: comparing Shanghai and Istanbul. *Climatic Change*, 160(4), 727 -752. <https://doi.org/10.1007/s10584-020-02726-1>
- Javadian, R.; Abroodi, SM.; Ali Mohammadi, H.; Hassanzadeh, M. (2021). Factors affecting people's participation in the renovation of worn-out urban structures (case study: District 15 of Tehran), *Economic and Urban Management Quarterly*, No. 10, pp. 107-123;
- Keshavarz, N.; Nutbeam, D.; Rowling, L.; Khavarpour, F. (2010). Schools as social complex adaptive

- systems: a new way to understand the challenges of introducing the health promoting school's concept. *Soc Sci Med* 70 (10): 1467-74. <https://doi.org/10.1016/j.socscimed.2010.01.034>
- McDonald, S.; Malys, NN.; Maliene, V. (2009). Urban regeneration for sustainable communities: A case study. *Licenses BY Technological and economic development of economy Baltic Journal on Sustainability* 1(15): 49-59. <https://doi.org/10.3846/1392-8619.2009.15.49-59>
- Mehdi Moghadam, H. (2001). urban development plans and the reasons for their realization in Iran, *Abadi Quarterly*, 12th year, No 50
- Mirzaei Arjenki, F.; Shabani Shahreza, AH. (2019). evaluation of the reconstruction plan of the worn-out urban tissue with the approach of public participation in Hematabad neighborhood of Isfahan, *Geography and Environmental Studies Quarterly*, No. 34, pp. 119-134.
- Nazeri, S.; Hamid R. (2017). improvement and renovation of worn-out urban structures, turning threats into opportunities. *Geographical Space journal*, 8th year, no 21.
- Rasht Municipality, statistical yearbook of Rasht city, (2015).
- Rius Ulldemolins, J. (2014). Culture and authenticity in urban regeneration processes: Place branding in central Barcelona. *Urban studies*, 51(14), 3026. <https://doi.org/10.1177/0042098013515762>
- Roberts, P.; and Sykes, H. (2000). *Urban Regeneration*. UK, London: Sage Publication.
- Rokiwan, G. (2011). *The Life style in urban planning*. European Experience, Newcastle university. publisher Newcastle university.
- Sabatier, PA.; Shaw, LK. (2009). Are collaborative watershed management groups democratic? an analysis of California and Washington partnerships. *Journal of Soil and Water Conservation*, 64 (2), 61A-64A. <https://doi.org/10.2489/jswc.64.2.61A>
- Shahinifar, M.; Pahkideh, E.; Charehjo, F.; Khaledian, J. (2019). Measuring the level of people's participation in the renovation of worn-out urban structures (example: the old structure of Kermanshah), *Amash Mohit Quarterly*, 13(48):153-172. <https://dori.net/dor/20.1001.1.2676783.1399.13.48.8.7>
- Sugrue, Thomas J. 2014. *The Origins of the Urban Crisis: Race and Inequality in Postwar Detroit*. <https://doi.org/10.1515/9781400851218>
- Tallon, RAM. (2013). What do young people think of development? An exploration into the meanings young people make from NGO media (Thesis). Wellington, New Zealand: Victoria University of Wellington - Faculty of Education.
- UNDP. (2004). *Guidelines for urban regeneration in the Mediterranean region*. Priority Actions Program Regional Activity Centre.
- Yazdi, MS.; Elahian, JH. (2019). A new approach to the process and structure of preparing plans and programs for urban organization and regeneration: review of findings from the analysis and evaluation of urban landscape plans. The second national conference on the improvement and regeneration of historic, damaged urban structures and informal settlements in Shiraz.
- Zarrabi, E.; Tehrani, S. (2009). Participatory approach in the renovation and improvement of worn-out urban tissues, *Armanshahr journal*, No. 2, 39-49
- Zimmeman, A. (1996). *Public Participation in Planning*, *Common Questions about Planning in Arizona* Issus 6, February.

COPYRIGHTS

©2021 The author(s). This is an open access article distributed under the terms of the Creative Commons Attribution (CC BY 4.0), which permits unrestricted use, distribution, and reproduction in any medium, as long as the original authors and source are cited. No permission is required from the authors or the publishers.



HOW TO CITE THIS ARTICLE

Family, N.; Family, N.; Family, N. (2021). Investigation the indicators of the worn-out tissue renovation in approach to public participation (Case Study: Rasht city, Iran). *J Urban Manage Energy Sustainability*, 3(1): 90-102.

DOI: [10.22034/JUMES.2021.1973962.1096](https://doi.org/10.22034/JUMES.2021.1973962.1096)

