

CASE STUDY

Analysis of social capital impact on rural sustainable development: A case study from villages of central part of Torbat Heydarieh City

G. Ghavidel¹, M. Jahani², H. Ghanbarzadeh², H. Rahimi³

¹Department of Geography and Rural Programming, Islamic Azad University, Mashhad Branch, Mashhad, Iran

²Department of Member of Academic Staff, Islamic Azad University, Mashhad Branch, Mashhad, Iran

³Department of Member of Academic Staff, Payame Noor University, Mashhad, Iran. E-mail: alijavadi401@gmail.com

Submitted: 02.05.2018. Accepted: 16.05.2018

From the point of view of sustainable development, social capital, along with natural capital, human made and human capital, is an inseparable part of the wealth of each nation and is one of the key factors for the development of rural areas in order to fix inequalities. The present study aims to analyze the effects of social capital on sustainable rural development. Case study is on Villages in central part of Torbat-e-Heidarieh city. The research template approach is in terms of quiddity and methodology, descriptive and analytical, and gathering data and information was from library and field methods based on the preparation and completion of questionnaires. Out of 52 villages in the central part of Torbat Heydarieh, 10 villages were selected as the sample population of the research. For the 2047 family survey population Statistical Society, 324 household questionnaires were selected through the Cochran formula. Which was distributed among them in appropriate to households of the villages and sampling method of household superintendents was also systematic random sampling. Findings of the research show that in all villages the status of most of the components of sustainable development is at an upward average level, in the component of employment and income, Siyuki and Houz-e Sorkh villages, in the investment component, Senobar village, in the educational component, Tajrud village, in component Welfare and services, Siyuki village and in the environmental components, Senobar, Kaskak and Oumi villages were in the best position. The final results in the study social capital impact on the sustainable development of villages shows that, based on the structural model, the value of t equal to 1.96 was more, so it can be concluded that this path coefficient is significant at the error level of 0.05, the positive coefficient (0.581) shows the positive impact of social capital on the sustainable development of villages.

Keywords: Social capital; rural development; sustainable development; Torbat Heydarieh

Introduction

Social capital through social partnership and trust among individuals and groups leads to sustainable rural development, and the main goal of sustainable rural development with considering the role of social capital in it, is to improve the quality of life of villagers, empower villagers, to identify the potential and appropriate capacity building. Increasing the spirit of partnership and mutual trust, increasing self confidence of individuals, developing the communication network of villagers inside and outside the rural environment, and overall institutional development and sustainable development of the village (Eftekari et al., 1394).

Today, to further development in rural areas, various actions and measures have been taken and solutions is presented for increasing production, improving knowledge and technology, improving communication networks, increasing income and employment, reducing poverty and inequality, diversifying the economy Rural and etc. which the set of these measures is in the effort to reach the development of villages. (Azkia & Imani, 2008) One of the challenges of sustainable rural development today is the lack of attention to the social capital of villagers, which has spread in the form of thousands of subcultures in the geographical area of Iran, that recognition of this capital will certainly facilitate the process of planning for rural development for experts and have a partnership of villages to better implement the program. (Salmani et al., 2008).

Sustainable development has different economic, social, cultural and environmental dimensions. Since it human is at the heart of development and development plans must be implemented by humans, the role of social capitals as a human resource in the process of sustainable development is important.

In this research, with the aim of sustainable development of the village, the researcher, after expressing the meaning and concept of social capital, seeks to find out its relationship with sustainable rural development. Sustainable development is a kind of development in which the needs of the current generation are met from existing resources, while resources are also preserved as a legacy of the future.

In this research, the researcher seeks to study social capital and sustainable rural development in the villages of central part of Torbat Heydarieh city in Khorasan Razavi province. The central part of Torbat Heydarieh has two villages, BalaVelayat and PaenVelayat with the population of 35157 people and 52 villages. This research seeks to answer the general question: What is social capital affecting the sustainable rural development in the study area?

Importance and necessity of research

One of the issues that has been very popular in recent years and is influenced by a large number of social and economic life-relationships of humans is the issue of social capital.

Studies in this area show that some of the important variables such as trust in our country have been decreasing in recent years, and this has raised many concerns. The decline of these variables, and ultimately social capital, has led to many social abnormalities and increased costs of economic exchanges (Mirshajie, 2009).

Social capital is one of the issues that affect the all-round development process and get affected of the development process. This category is considered as an important theoretical tool for the study of the role of social variables in sustainable rural development. The Torbat-e-Heydarie city with the rural community and traditional livelihoods since the past has been relatively popular in coherence and social solidarity.

The study of social capital at the moment and its role in sustainable development is one of the requirements of study. Due to the fact that there has not yet been a comprehensive study in this area, this research is necessary. The present research is based on the applicational purpose, that results can be used in the planning. In order to achieve the desired results and assess the relationship between the distribution of social capital in sustainable rural development and rural households, four indicators for social capital (partnership, trust, social cohesion and social networks) and three dimensions for sustainable rural development (economic and social and environmental) Is defined for each indicator and item.

Research purposes

Considering that the purpose of this study is to investigate the role of social capital on sustainable development of Torbat Heidarieh villages, its specific objectives are as follows:

- Ideal Goals: Reducing Urban and Rural Inequality.
- Overall Goals: Reducing Immigration, which in consequence of this, the Villages have durability and survival.
- Specific Goals: improving living conditions, employment and investment in agriculture, and etc.

Research questions

According to the issue's expression, the necessity and the goals stated for the present research, the research questions are as follows:

Is there a relationship between social capital and economic rural development?

Is there a relation between social capital and the improvement of the social status of villages?

Research assumptions

Based on the research questions, the research assumptions that are in line with the raised questions are as follows:

1. There is an effective relationship between social capital and rural economic sustainability.
2. There is an effective relationship between social capital and social sustainability of villages.

Research background

Social capital is one of the newest conceptualizations of social science, which has become the bridge between sociology, economics, and politics and has led the field to numerous interdisciplinary studies.

Eftekhari et al. (2015), in an article entitled "Explaining the Spatial Pattern of Social Capital in Sustainable Rural Development with case: Villages in Khorasan Razavi Province", aimed at promoting the rural development level, concluded that the spatial pattern of social capital of villages in the study tends towards a centralized or clustered pattern. On the other hand, the results did not show a significant statistical relation between the natural situation of the studied villages and the distance from the city, with the type of spatial pattern of social capital in the study area.

Mohammadi Yeganeh et al. (2015) in a research entitled "Analysis of the Areas of Sustainable Rural Livelihoods Development with Emphasis on Social Capital Case Study: Zarrin Dasht Rural District", concluded that social capital of rural households is in a favorable level and between Social capital and sustainable livelihoods of households there is an independent and completely meaningful relationship.

In a study, Ghodrati et al. (2011) titled " Analysis of Social Capital and Women's Reform in Sabzevar City", concluded that there is a positive relationship between variables such as level of education, membership in groups and place of residence and occupational status with Women's reproductive level.

Miri et al. (1999) in a study entitled "The Role of Social Capital in Rural Development wit Case Study: Posht-e Aab Region of Sistan)", used three indicators of Putnam's interest: trust, participation and networks in relation to social capital evaluation. The results of their studies showed that the highest level of variance among social capital dimensions was related to network dimension and there was a significant relationship between social capital and rural development.

Salmani et al. (2010), in a paper entitled "Investigating the Dimensions of Social Capital in Rural Development with Case Study: Baghesan and Borun villages from Ferdows city", which first identified social capital indicators, found that interaction, Plays the most role among the indicators of social capital in rural development.

In 2008, Spielman et al. conducted a study titled "Networks and Rural Innovation Systems on Ethiopian small hand farmers, The purpose of their study was to improve the welfare of this rural community. In fact, this paper addresses this section of agriculture and improves its interactions with other sectors to provide the ground for the development of innovation

processes for them. The results of the study indicate that the Ethiopian government's policy of improving the welfare of villagers has increased through market access for petty farmers.

Matuschke in 2008 study the effects of social networking systems in rural innovation systems, Matuschke has tried to assess the level of villagers adjustment, especially farmers, under name of rural social media, on innovations and create innovative opportunities in rural areas. At the end he argued that the existence of a specific framework can help create a social network with features such as a broad understanding of innovation, support innovative activities in villages, and the design and development of new approaches in this field.

Theoretical Basics of Research

The concept of social capital

Social capital at the beginning is a series of processes that lead to outsourcing, which is the result of social action. Therefore, social capital is a group of social actions, and includes those hands that are either durable or affect those who are durable. Putnam argued that social capital, unlike other capitals, would not be eroded and expanded if applied correctly (Mohan, 2002). Social capital can be considered one of the newest ideas and concepts of social science. The attractiveness and importance of the term "social capital" is that this term is used as the bridge between sociology, economics and politics, and as a communication concept that links various fields, interdisciplinary studies has created a lot. The concept of social capital was first used in the 1960s, especially in Bourdieu's work. He believes that the place of the perpetrators in the fields and the social scene depends on the amount of their relative capital, and is determined by the specific strategies that they are adopting to achieve their goals (Field, 2008).

Bourdieu's social capital is a collection of material and spiritual resources that allow a person or group to have a stable network of more or less institutionalized relationships of mutual acquaintance (Fields, 2007; Abdullahi, 2008), which gives its members the support of collective capital and deserves it to be credible (Bourdieu, 2008). He believes that social networking is not in itself, but as a human or physical capital, is the product of applied and planned investment strategies, the production and reproduction of social capital requires a permanent effort on investment (Hobbes, 2008). Putnam considers voluntary associations to be social trust, social networks (face-to-face) and civil engagement (Wollebaeck, 2001). Social capital is a public benefit and, therefore, is a social issue. According to many writers, social capital prevents individual self-reliance, encourages cooperation, reduces transaction costs, reduces the likelihood of trading, increases knowledge transfer and solidarity. On the other hand, it may disrupt the flow of information and limit individual freedom. (Alexander Junging, 2007), in the concept of social capital, attributed its roots to Bourdieu (1986) and Coleman. With subsequent development by Burt (1992), Putnam (1995) and Lane (2001) Social capital can be considered as the sum of actual or potential resources that are related to having a more or less sustainable network (Nicola et al., 2011).

Elements and components of social capital

Tavakoli et al. in his article, which is the result of a case study on the analysis of the amount of social capital in urban and rural border areas of Sistan, summarizes the definitions of the concept of social capital in the following table and concludes that in all of this definitions (Tables 1-11), trust is referred as the main component of social capital:

Table 1. Definitions of social capital.

Definition of the social capital	Experts
The ability of people for sustainable benefits through membership in social networks or other community structures	Ports
A unique personal communication network and privileged institutional affiliation	Bluelw, Erly, Wade
A context of cooperative relationships among citizens who help each other to resolve problems	Brham, Roan
The ability of individuals to collaborate and support together for general purposes in groups and organizations	Fukuyama
Norms and networks that allow people to participate in collective actions for mutual benefit and can be measured by methods such as measuring the level of social trust and levels of membership in formal or informal civil society associations.	Tajbakhsh, Saghafi, and Kouhestani Nezhad
Social capital is at the very beginning a process of processes that lead to outsourcing, which is the result of social action	Collier
Thus, the social crisis is a social action class, and includes those hands that either endure themselves or affect those who are durable	

And then, according to the above definitions, the experts put forward the following eight important elements of social capital:

- Participation in the local community,
- Activism in a social position,
- Feeling trust and security,
- Neighborhood links,
- Friendship and family ties,
- Capacity to accept differences,
- Costing life and work connections.

Development basics

Developing with the complex foundations that accompany it, has been in global writing for many years and is still regarded as a good point of reference in the scientific and executive institutions.

The concept of sustainable development, as in development, is evolving in various ways in the form of diverse concepts such as the expression of perspectives, the exchange of values, moral development, social restructuring, the process of transformation towards a better future, the risk of environmental degradation, the empowerment of the people. Creating new capacities, respecting indigenous information and knowledge, raising awareness and information, bringing people to life satisfaction, and freedom of choice and equality in access to opportunities (Sarafi, 1999).

In rural development, all of these concepts have been considered, all of which are somehow an exploratory idea of the sustainable development that is considered in meeting the needs of the present generation, taking into account the need of future generations.

The concept and definition of sustainable rural development

Sustainable rural development is the unification of social, economic, cultural and environmental dimensions in order to raise the level of livelihood and well-being of rural people. In sustainable rural development, attention to environmental factors is very important. (Azkia, 2008).

In the context of the conceptual process of the "concept of development" in its general sense, "the concept of rural development" has evolved over time, as the old paradigms of rural development have led to an increase in the fair distribution of income, poverty reduction, adjustment of inequalities for gaining Equal opportunities in terms of resources and benefits, an overall increase in quality of life, and finally, the effective participation of modern and local institutions in the process is not planned. And this also paves the way for a change in the rural development paradigm. In the context of the new doctrine to overcome the challenges facing development on the eve of the third millennium, the concept of sustainable development has been considered as the basis for rural development planning. But the definition in this study of sustainable rural development is "management of the regulation of human relationship with the environment itself, in which the linking of social and economic systems is considered with ecological supervision".

Specific objectives for rural development and sustainable development are food security, increased participation, environmental protection and poverty reduction. Today, these four objectives are considered as the international charter in all academic and executive circles. (Eftekhari, 2003).

Sustainable rural development strategies

Therefore, in order to realize the true development of a sustainable rural community, there is a need for more resources based on human and social capital, which also requires better mobilization and equipping, and should add to their effectiveness and identify a more correct path and provide local capacity for its sustainability.

1. For the impoverished social mobilization, the new strategy must be a participant in the process of prioritizing the social process of economic products, which requires a limit to democracy and value.
2. An empowerment approach for local communities. To "uplift development", or in other words, the use of resources and a spatial position does not take place for the exclusion of non-committed group members into the local community and ultimately be institutionalized with capacity building.
3. Equilibrium with the capacity of the natural environment and the conservation of the ecosystems will in fact target the "canopy" between humans and the environment.
4. Provide the necessary arrangements for the implementation of the work of a community assembly in a "biomonitorial" or province, which also involves the development of co-development in a higher spatial level.
5. Establishing a popular movement in the country's rural environment, which is key to establishing a good governance system or government, and as a result, all actors and players in development in public and private sectors and civil society will increasingly reduce competition in the wider community (Sarraf, 2004).

Research methods

In general, the means and stages of systematic collection of information and their logical analysis for achieving a certain goal are called the scientific method of research (Nabavi, 1373). The method of research approach is of the nature and method, descriptive and analytical, but in addition the data are gathered and the information from library methods (articles, theses and Internet resources) and the field is in addition to direct observation and interviewing, based on the preparation and completion of questionnaires. In the analytical method, through the T test, correlation, step-by-step regression, X2, will be analyzed, and will be taken into account in accepting and rejecting the hypotheses.

Out of 52 villages located in the central part of Torbat-e-Heydarieh, 45 villages were selected from the crowd (villages above 100 inhabitants) to determine the number of sample villages in the village. In the classification category, the villages were divided into 4 groups of 499-100, 999-500, 2499- 1000, 4999-2500, and then, according to the population and household size, and the factor of distances and proportional distribution of 10 villages (20% of the villages) were specified and selected as the sample population of the research. The population of all villages other than central Torbat Heydarie and sample size were selected through Cochran formula and samples by stratified random sampling.

Table 2. Sample villages.

Names of the Village	Number of Population in 95	Number of Households
----------------------	----------------------------	----------------------

Kame Oliya	361	129
Senobar	2948	392
Fahandar	1080	342
Damsak	650	191
Omi	616	194
Hoz-e Sorkh	445	146
Tajrood	122	34
Sangalabad	744	226
Siyuki	1145	343
Kaskak	160	50
total	8271	2047

For the 2047 family survey community, the Cochran formula uses 250 questionnaires for the head of household as the sample population of the study that has been distributed among the families of the households, as well as the systematic random sampling method of rural household careers. Validity of experts and experts has been surveyed using a pretest test. Honiz's questionnaire was used for reliability of Cronbach's alpha.

Table 3. Shows statistical population by stratified sampling and proportional sampling.

Sample villages	Villages of the region	Population
	Save-Senjedboor-AbbasAbad-Mahmoud Abad-Trosak-Zaman Abad-Ghale-No	99-0
Kame Oliya-	MalekAbad-Bekavol-Serishaa-Kame Sofla-Kama Oliya-Houze Sorkh-JafarAbad-	499-100
Kaskak-Tajrood-	AmirAbad-Tajrood-AllahAbad-Kaskak-Khouragh-Ghozan-KaajDerakht-Bisghafizan-	
Houze Sorkh	Sheikh Abolghasem-Masjerd-Khodabandeh-Moreshk-Baagh Miyun	
Omi-Sangalabad-	Qandashtan-Banhang-Ziaoddin-Dughshak-Sarkariz-Karizak Khojavi-Oryan-	999-500
Damsak	Shotorkhasb-Omi-BuriAbad-Sangalabad-Noghab-Damsak-Hajiyar	
Fahandar-Siyuki	Fahandar-Deh Paeen-Aghuyeh-Farzagh – Some'e-Abrood-Siyuki-Esfiukh-Fadard	2499-1000
Senobar	Manzar-Senobar	2499-1000
total number-10	52	

Research findings

In this research, Wilcoxon test, t-test, Kruskal-Wallis test and Kolmogorov-Smirnov test and structural equations with partial least squares method were used for data analysis. In this section, along with inferential statistics, descriptive statistics of the data from 250 questionnaires were presented and then analyzing the data based on inferential and descriptive statistics.

In this section, descriptive responses of respondents to the questionnaire are discussed. In each clause, the valid percentage (the percentage of options selected after deleting the lost answers) in each option, along with the mean, standard deviation, and the significance level of the K2 test are included. Given that the valuation of the items was done in the form of (very much=5, high=4, average=3, low=2 and very low=1), the average is higher than 3 (the average of the five Likert spectrum) the donor is more in agreement and a lot of comments are made by the respondents. The Q2 test for each item has been performed by respondents to check the equal choice of choices, with a meaningful level of less than 0.05, indicating that they are not choosing the same options in the target group by the respondents, and if the level is significant The result is more than 0.05, indicating the same choice of options by the respondents.

Descriptive study of social capital dimension

Subsequent social capital including 4 components of participation, trust, social cohesion, membership in networks and groups including items 1 to 20 in the questionnaire were designed for this purpose, and the descriptive statistics of these items are presented in the following table:

Table 4. Descriptive statistics of the social capital dimension.

Component	Question	Very Much	Much	Medium	Low	Very Low	Average	Deviation	p-test value of k2
Contribution	1. How much is the participation of people in solving the problems of the village?	80/14	20/43	00/40	60/1	40/0	70/3	75/0	00/0
Contribution	2. To what extent is the number of people involved	40/32	00/56	60/11	00/0	00/0	21/4	63/0	00/0

	in the elections?								
	3. What is the extent to which people with the village trustees participate in the cooperation?	00/8	80/38	80/50	60/1	80/0	52/3	70/0	00/0
	4. How much participation is it with the government?	00/8	00/38	60/51	20/1	80/0	90/3	08/6	00/0
	5. To what extent is the partnership between farmers?	47/18	04/59	29/21	40/0	40/0	33/4	06/6	00/0
Trust	6. To what extent do family members trust each other?	00/56	40/38	60/5	80/6	40/0	50/4	60/0	00/0
	7. What is the extent to which people trust the police force?	00/10	40/52	40/30	00/0	00/0	65/3	77/0	00/0
	8. How much trust do people have in their friends?	80/24	40/62	80/12	00/0	00/0	12/4	60/0	00/0
	9. How much public confidence in the government is?	42/4	22/54	76/39	80/0	40/0	00/4	07/6	00/0
	10. To what extent are people's trust in rural institutions?	40/2	00/40	60/55	20/1	40/0	81/3	07/6	00/0
Social solidarity	11. How much is the level of people's cooperation in improving neighborhoods?	20/1	80/34	80/60	20/3	00/0	34/3	56/0	00/0
	12. How much co-operation and cooperation between people is?	40/6	40/58	80/34	40/0	00/0	71/3	59/0	00/0
	13. How much conflict and conflict between the villagers are? *	2.007	2.40	40.660	60.9	9.80	2.81	0.86	0.00
	14. What is the rate of visitation of patients from patients?	00/30	40/56	60/13	00/0	00/0	16/4	64/0	00/0
	15. What is the extent of the company's participation in the mourning ceremony?	60/57	40/40	00/2	00/0	00/0	56/4	54/0	00/0
Membership in networks and groups	16. To what extent do families have a relationship with each other?	20/41	60/53	20/5	00/0	00/0	36/4	58/0	00/0
	17. To what extent are people's membership in cooperatives?	80/0	80/14	80/70	80/10	40/2	39/3	10/6	00/0
	18. How much is the use of urban experiences in villages?	00/2	40/44	20/51	40/2	00/0	46/3	58/0	00/0
	19. How much cooperation between people and councils is?	20/13	20/61	20/25	40/0	00/0	87/3	62/0	00/0

20. People donate to 20/23 20/57 20/19 40/ 0/0 0/4 66/0 00/0
relatives when needed. 0

Examining the components of social capital contributions

Considering that the components studied in the dimension of social capital each contain more than one item and is of a quantitative scale, considering the data volume of more than 30, according to the central limit theorem, the mean of the data has a normal distribution And T can be used to compare the mean of components with the number 3. The results of this test are included in the table below:

Table 5. Results of the comparison of the average social capital components with the number 3 by the T test.

Component	Average	Standard deviation	Statistics t	degree of freedom	p-value	result
Contribution	9308/3	48673/2	918/5	249	000/0	more than average
Trust	0160/4	77463/1	052/9	249	000/0	more than average
Social cohesion	7160/3	31986.	393/35	249	000/0	more than average
Membership in networks and groups	8232/3	27916/1	175/10	249	000/0	more than average

In the T test, if p is divisible by 2, it is less than 0.05, depending on the positive or negative statistics of t, it can be concluded that at what level is the component in question. If p-value divided by 2 is less than 0.05 and t-test statistic is negative, the studied component is less than average (3). If p-value divided by 2 is less than 0.05 and t-test is statistically significant, then the studied component is more than average (3). If p-value divided by 2 is more than 0.05, then the mean of the studied component has no significant difference with the average (3).

Based on the results obtained, it is seen that the status of all four components of social capital is more than average, and the 95% confidence interval is obtained for the average difference of each component with the number 3, which is given in the table below, in This table, if the confidence interval contains only positive numbers, indicates that the difference is only positive and therefore the mean is significantly more than 3 (moderate).

Examining the components of social capital in terms of the villages studied

In order to determine the average components of social capital dimension by the villages studied, the following table presents the average of these components by villages:

Table 6. Average components of social capital in terms of the studied villages.

	Participation	trust	social cohesion	Membership in networks and groups
Omi	643/3	748/3	583/3	626/3
Tajrood	500/7	700/5	720/3	620/3
Houz-e Sorkh	576/3	576/3	741/3	459/3
Damsak	626/3	765/3	609/3	757/3
SangalAbad	762/3	746/3	608/3	462/3
Siyuki	970/3	010/4	755/3	425/4
Senobar	850/3	483/4	774/3	870/3
Fahandar	695/3	755/3	715/3	740/3
Kame Oliai	893/3	880/3	853/3	920/3
Kaskek	980/3	100/4	880/3	760/3

It can be seen from the table that in all villages the status of social capital components is on the upside, while Tajrood village is in the best position in the next two dimensions of social capital. The village of Kaskak shows better status than other villages in the component of social cohesion, and the village of Siyuki, in terms of membership in networks and groups, shows the best situation in the total villages surveyed.

Examining the economic and social dimensions of sustainable development

Given that the research items in the 5 Likert scale have been evaluated, it has a sequential scale which, by means of the Wilcoxon test, is compared to the midpoint of these terms with the number 3 (average number of five Likert spectra).

Table 7. Results of the comparison of the items related to the economic index of sustainable development with the number 3 by Wilcoxon test.

Component	Questions	Data	Number	Total rank	P-Wilcoxon Result	Value Test	Result		
Employment	1. The degree of satisfaction with the job	More than 3	84	4200/00	0/000		more than the average		
		Less than 3	23	1578/00					
		Equal 3	143	-					
	2. The working population			8			555/00	0/000	less than the average
		More than 3	147	11535/00					
		Less than 3	95	-					
Income	1. Satisfaction with income	More than 3	30	1125/00	0/000		less than the average		
		Less than 3	61	3061/00					
		Equal 3	159	-					
	2. Earning resources			7			339/50	0/000	less than the average
		More than 3	147	11595/50					
		Less than 3	96	-					
Investment	1. The desire for investment in the countryside	More than 3	76	3248/00	0/000		more than the average		
		Less than 3	9	407/00					
		Equal 3	165	-					
	2. The savings amount			212			23305/50	0/000	more than the average
		More than 3	5	347/50					
		Less than 3	33	-					
			Equal 3						

Based on the results, it is seen that all items related to the economic index from the sustainable development dimension are less than average (including the item of the employed population and components of the income, and others are more than average).

Study of the components of sustainable development dimensions by villages case study

In order to evaluate the components of the sustainable development dimension by the villages studied, the following table presents the mean of these components by villages:

Table 8. Average of Components of Sustainable Development Dimensions by Villages.

	Employment	Income	Investment	Population	Education	Welfare and services	Physical
Omi	652/2	435/2	696/3	652/2	239/3	278/3	761/3
Tajrood	800/2	550/2	550/3	650/2	500/3	415/3	200/3
Houz-e Sorkh	794/2	765/2	794/3	500/2	294/3	071/3	706/3
Damsak	848/2	761/2	739/3	522/2	304/3	339/3	370/3
SangalAbad	519/2	192/2	423/3	096/2	096/3	888/3	596/3
Siyuki	913/2	738/2	775/3	600/2	450/3	455/3	750/3
Senobar	859/2	533/2	913/3	543/2	424/3	370/3	696/3
Fahandar	538/2	313/2	650/3	563/2	238/3	355/3	500/3
Kame Oliai	633/2	500/2	633/3	467/2	200/3	293/3	367/3
Kaskek	450/2	200/2	650/3	400/2	300/3	440/3	500/3

It can be seen from the table that in all villages the status of most sustainable development components is at an elevated level. In the employment and income component, all villages are less than average, and the best situation in these two components is in the villages of Siouki and in the study of the status of the investment component, all villages are in a moderate upward situation, and the poplar village has the best status.

By analyzing the population component as shown by previous tests, the status of this component is less than the average and the village is in better condition. However, the educational component is located in a moderate upward situation in all villages and Tajrood village is in the best position of this component. The status of the welfare component and services in the village of Siyuki is at its best.

Table 9. Route coefficient and significance related to the first hypothesis.

hypothesis	direct path	path coefficient	Standard deviation	t-statistic	Result
1	Social capital--- economic	470/0	050/0	493/9	confirmed

Also, in studying the effect of social capital on social sustainability of villages, based on the structural model and according to the following table, the t-statistic is 10.232 and the significance level is 0.05 with t is 1.96. It can be concluded that this path coefficient is significant at the error level of 0.05. The positive coefficient obtained (0.498) indicates the positive effect of social capital on the social sustainability of villages.

Table 10. The path coefficient and significance associated with the second hypothesis.

Hypothesis	Direct Path	Path Coefficient	Standard Deviation	T-Statistic	Result
2	Social capital--- cultural and social	0/048	0/048	10/322	confirmed

Finally, in the study of the effect of social capital on sustainable development of villages, based on the structural model and according to the following table, the t-statistic is 13.696.69 and the significance level of 0.05 with t is 1.96. The result This path coefficient is significant at the error level of 0.05, the positive coefficient obtained (0.581) indicates the positive effect of social capital on the sustainable development of villages, so the main hypothesis is confirmed at 95% confidence level.

Table 11. The path coefficient and significance associated with the main hypothesis.

Hypothesis	Direct Path	Path Coefficient	Standard Deviation	T-Statistic	Result
main	Social capital--- Sustainable Rural Development	581/0	043/0	596/13	confirmed

Conclusion

Nowadays, many designers and planners consider social capital as an important tool for sustainable development of the environmental, social, cultural and economic dimensions, and pay particular attention to this, and practically social capital and development Sustainable are also complementary in many aspects. Understanding this capital will certainly facilitate the planning process in developing rural areas and will have positive economic, social and environmental consequences in the development of rural areas. In the absence of social capital, other capital will lose its effectiveness. Hence, the issue of social capital is considered as a pivotal principle for achieving development. The findings of the analysis of this research show. To investigate the social capital of villagers (in four indicators), based on the t test, the indicators of the level of trust of villagers are in satisfactory level. Therefore, since the relationship between social capital and rural sustainability is measured using Spearman correlation coefficient, the following results are obtained:

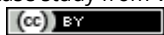
The significance level is less than 0.05 and the relationship between social capital and economic sustainability is significant. In the study of the effect of social capital on economic sustainability of villages, based on the structural model and according to the following table, the t-test is 9/949 and the significance level is 0.05 with t is 1.96. It can be concluded that this The path coefficient is significant at the error level of 0.05. The positive coefficient obtained (0.470) indicates the positive effect of social capital on the economic sustainability of the villages.

References

Keseljovic, A. (2007). Understanding social capital within the framework of economic theory of organization: a theoretical approach. *Management*, 12(1), 1-24

- Mousavi, M. T. (2008). Social capital in Iran; Current situation, Future prospects and the possibility of passerology. *Journal of Social Welfare*, 6, 25.
- Azkaia, M. (2008). Concepts of Rural Development, Tehran, Nasrin.
- Azkaia, M., & Imani, A. (2008). Sustainable Rural Development. Publications Information.
- Bourdieu, P. (2001). Theory of Action, Practical Reasons and Rational Selection, Translated: Morteza Mardiha, Tehran, Role.
- Bourdieu, P. (2008). Shapes of Capital, Translation, Shojaee Baghini, Mehdi, Conceptual Foundations of Social Capital. Research Institute for Cultural and Social Studies.
- Currency Exchange Asghar (2004). Effect of Participation in Rural Development. *Journal of Improvement and Management Management Studies* No 43.
- Eftekhari, A., & Seyyed, A. B. (2012). Theoretical Foundations of Sample Village Development Pattern. Guilan Governorate Publications.
- Exchange, M. (1999). Regional Planning Basics. Planning and Budget Organization Publications, Tehran.
- Field, J. (2009). Social Capital, Translation by Gholam Reza Ghaffari, Hossein Ramezani. Tehran: Desert.
- Fukuyama, F. (1984). Social Capital of Trust, Democracy and Development, Kian Tajbakhsh, First Edition. Shiraz Publishing.
- Hobbes, G. (2008). What is social capital? A brief overview of literature, Translation, Shojaee Baghini, Mehdi. Conceptual Foundations of Social Capital, Research Institute for Cultural and Social Studies.
- Miri, G., Javan, J., Afrakhteh, H., & Shayan, H. (2010). The Role of Social Capital in Rural Development (Case Study: Sistan Backspace). *Geography and Regional Development Magazine*, 14.
- Moham, G., & Mohan, J. (2002). Placing Social Capital. *Progress in Human Geography*, 26(2).
- Mohammadi, Y., Mehdi, B. C., & Mohammad, V. (2013). The Role of Religious Tourism in Rural Development with Emphasis on Quality of Life and Social Capital, Case Study; Gepchagh Village, Miandoab City. *Geographic Sciences Applied Research Journal*, 30.
- Nabavi, B. (1994). Introduction to the Research Method in Social Sciences. Farvardin Library Publishing.
- Nicole, B. E., Charles, S., & Cliff, L. (2011). Connection strategies: social capital implications of Facebook-enabled.
- Power, H., Yarahmadi, A., Mokhtari, M., & Afrasyabi, H. (2011). Analysis of Social Capital and Fertility of Women in Sabzevar Township. *Geographical Studies of Arid Areas*, 14.
- Roknoddin, E., Abdolreza, M., Samira, P., & Mehdi, M. (2015). Explaining the Spatial Pattern of Social Capital in Rural Sustainable Development (Case: Khorasan Razavi Villages). *Quarterly Journal of Rural Space and Rural Development*, 4(1).
- Salmani, M. T., Farideh, R. L., Mehdi, M., & Jalili, P. Z. (2008). Investigating the Dimensions of Social Capital (Civil Participation, Social Interaction and Trust) in Rural Development (Case Study: Baghestan and Brun-Ferdows Villages). *Geography and Regional Development Magazine*, 12.
- Shojaee, B., Mohammad, M., Mehrmanesh, A., & Ansari, R. (2008). Conceptual Foundations of Social Capital. Tehran: Research Institute for Cultural and Social Studies.
- Shucksmith, M. (2000). Endogenous Development, Social Capital and Social Inclusion: perspectives from leader in the UK. *Sociologia Ruralis*, 40(2), 208-218.
- Spielman, D. J., Ekboir, J., Davis, K., & Ochieng, C. M. O. (2008). An innovation systems perspective on strengthening agricultural education and training in sub-Saharan Africa. *Agricultural Systems*, 98, 1-9.
- Wollebaek, D. (2001). Does Participation in Voluntary Associations Contribute to Social Capital. *Nonprofit & Voluntary Sector Quarterly*, 31, 1.
- Yadolahi, F., Jahangir, R., & Seyyed, M. (2012). The Role of Social Capital and Human Capital in Youth Entrepreneurship in the Village of Karbal. *Human Resource Research*, 79, 1391.

Citation: Gholamreza, G., Mehdi, J., Ghanbarzadeh, H., Rahimi, H., (2018). Analysis of social capital impact on rural sustainable development: A case study from villages of central part of Torbat Heydarieh City. *Ukrainian Journal of Ecology*, 8(3), 32-41.



This work is licensed under a Creative Commons Attribution 4.0. License
