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Analysis of kulbari's economic position in the northwest border villages of Iran (a study of paveh border villages)

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Abstract One of the most important issues along the Iran-Iraq border (Kurdistan) is the Kulbari phenomenon. The phenomena have forced the inhabitants of these border regions, whether old or young, men or women, to some extent be involved. Problems of life and finances of this phenomenon cannot be ignored by any viewer. The present paper is an attempt to study the economic position of Kulbari's in the northwestern border villages of Iran more specifically the border villages of Paveh. For the same purpose the library documentary and field study methods have been used. A questionnaire was prepared keeping the statistical population in mind, of which 113 questionnaires were answered. Results thus obtained shows that the most important parameter affecting the political dimension of the Kulbari phenomenon in the border villages is the communication policy between the two border states, the ideology, and strategies of the two border states, and the border policy. In the economic dimension, the most important parameter includes the supply of necessities of life, employment and unemployment in the border region, the absence of agricultural and pasture land; and in the geographical dimension the most important parameters affecting the stability of the Kulbari phenomenon is the development level of the border region relative to the center. Finally, the paper also provides some AQ1 suggestions to solve the Kulbari issue in the study area. AQ2

Keywords Kulbari · Paveh Villages · Border Development · Economic Position

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Introduction

In recent times any development planning has had sustainable development as its focal theme. The debates around the term sustainable was initiated for the first time in 1987 by Groharlem Brountland (*Our Common Future*) and it suggested " *proper and efficient management and utilization of basic, natural, financial and human resources to achieve desired consumption patterns that is possible by using technical facilities and appropriate organization*" and will not just fulfill the needs and aspirations of present society but of future as well.(Malek-Abadi & et al., 2016). Sustainability analysis for the border regions studies the effect of any phenomena or activity with respect to components of the economic, social and biophysical environment. (Amirahmadi & et al., 2017). Therefore, the basic needs of individuals specifically in the economic dimension are essential aspects of any society that can change and be an important element of the society culture (Rani, 2015). Needs, based on temporal, spatial, and technological and cultural factors have different origins, forms, and content (Qaderzadeh & Qaderi, 2013). In the economic structure of the rural areas of different countries, agriculture is an essential livelihood (Momeni, 2017; Jasuri, 2015; Jaefare javan, 2011). Such an economic and occupational structure in rural areas has raised specific issues, such as less resilience to short-term climate fluctuations, crop price fluctuations at the time of harvest, marketing and product marketing constraints, and the dependence of offshore users and foreign markets, explicit and hidden unemployment, declining returns on capital, destruction of basic natural resources, the vulnerability of rural economy and income source instability, weakening of rural economy and Culture, rural migration and marginalization (Annabestani, 2014). In the meantime, border villages have a significant position. Residents of border villages are more vulnerable to the livelihoods of border villages because of their lower-income sources and their limitations (Bazrafshan, 2018; Tayebnia & Manouchehrr, 2016). This has caused a phenomenon called kulbari during the border villages of Kurdistan province, Paveh. In the present study, it has been analyzed the shaping and stability parameters of the kulbari along the borders of Iran and Iraq. In order to, the main objectives of this paper are consisting of:

1. Identifying the most important factors affecting Kulbari's excellence in the Paveh County Villages.
2. Identifying the presentable strategies for organizing the Kulbari's activities in the Paveh County Villages.

Literature review on research

In recent decades, different approaches and perspectives have been taken as how factors interact on both sides of the border shows different forms of permeability and boundary interactions.

Martinez model

While attempting to define a border region, the typology of border regions (Oscar J. Martinez, 1994) needs to be presented (Wróblewski, 2013). One example is the border between the USA and Mexico that distinguishes four stages of borderland interaction: (1) Alienated borderlands, (2) Coexistent borderlands, (3) Interdependent borderlands and (4) Integrated borderlands (Fig. 2). In the "alienated borderlands", the routine cross-border interactions are practically non-existent. The permeability i.e. the extent of the free border is very low. The border is functionally closed and the residents of the neighboring countries act as strangers to each other. In the case of the "coexistent borderlands", the border is slightly open, so that international relations are possible but only a limited cross-border interaction develops. The borderland interdependence exists if regions on both sides of the border are symbiotically linked with each other. Economic complementarities generate cross-border interaction and collaboration, which stimulate the development of markets, capital and labor. Moreover, the "interdependent borderlands" are characterized by social relationships across the border. On the other hand, some factors such as over immigration, trade competition and ethnic nationalism influence the cross-border relations and the border regime negatively. In the "integrated borderlands", no barriers exist to trade and human movement across the common border. The neighboring regions merge economically, with capital, product, and labor flows. The major political differences between the neighboring countries are eliminated and the locals perceive themselves as members of one social system

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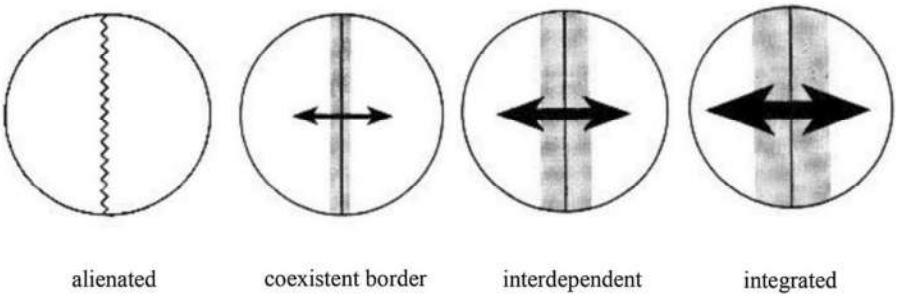

Fig. 1 Models of borderlands interaction by O. J. Martinez Wróblewski, (2013)

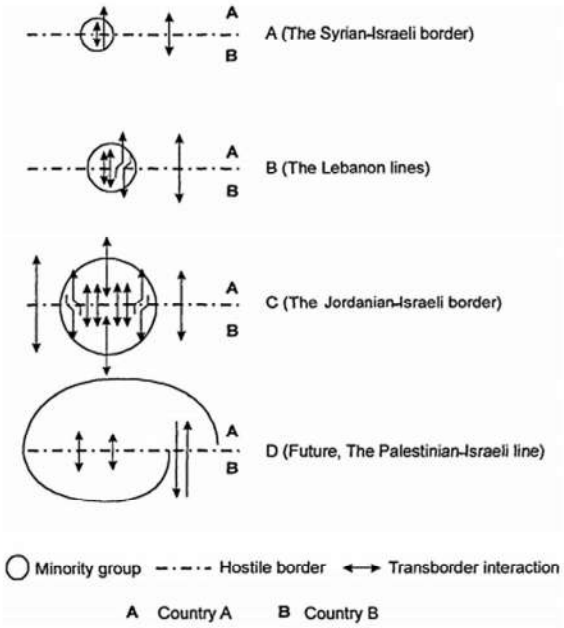

Fig. 2 Soffer's model (Soffer, 1994)

(Martinez, 1994). In the sense of Martinez, the widely-used term "trans-border region" (or" cross-border region") is equitable with the "integrated borderlands" (Kladivo & Others, 2012).

Soffer model

In his paper, (Soffer, 1994) has examined the connections along the border between adjacent states with a history of conflict between them. He used House's model as a tool for examination, but he did not follow him in including all aspects of transaction flows for there was insufficient data about those flows for his study area on the Israel-Lebanon border. However, he selected the Israeli de facto border with Lebanon including the then Israeli-occupied 'Security Zone', as the focus of his study. He also briefly examined the Israeli de facto borders with Jordan and Syria. Soffer discussed the interaction of people, trade, the use of infrastructure, and the government contacts across the border. The main concept in his model is: "Where there is a minority living on both sides of the border, ties should be expected even if the border is sealed and hostile (Alshaikh, 2001; Soffer, 1994). By this concept, he challenged Minghi (1991) who stated that interaction does not exist along boundaries under threat of conflict or under the stress of confrontation (Soffer, 1994). Soffer also explained that the connection along the hostile border is mainly based on family ties and local trade. Moreover, he maintained that governments on both sides may establish connections between them even if the situation at the border was violent, and eventually this will prepare the ground for peace. He concluded in his paper that there is: a correlation between the strength of the trans-border connections and the size of the minority population which lives on both sides of the border (Safer 1994, p.190 from Alshaikh, 2001: 57). As Fig. 2 (a, b) illustrates, the interaction at the border with Syria within the occupied Golan Heights as well as with Lebanon is limited because the size of the Golan Druze minority group and the size of the Lebanese minority groups (i.e. Christians, Sunnis, Shiites, and Druze) are relatively small on both sides. At the border with Jordan, Soffer claimed that the connection there is greater because the size of minority groups, which includes 1.5 million Palestinians on the West Bank and 1.5 million Palestinians on the East Bank, is bigger (see Fig. 3c). Finally, Soffer also maintained that if a Palestinian state is established in future, the connection between the Palestinians on the Israeli side, which he estimated as one million, and the Palestinians in the

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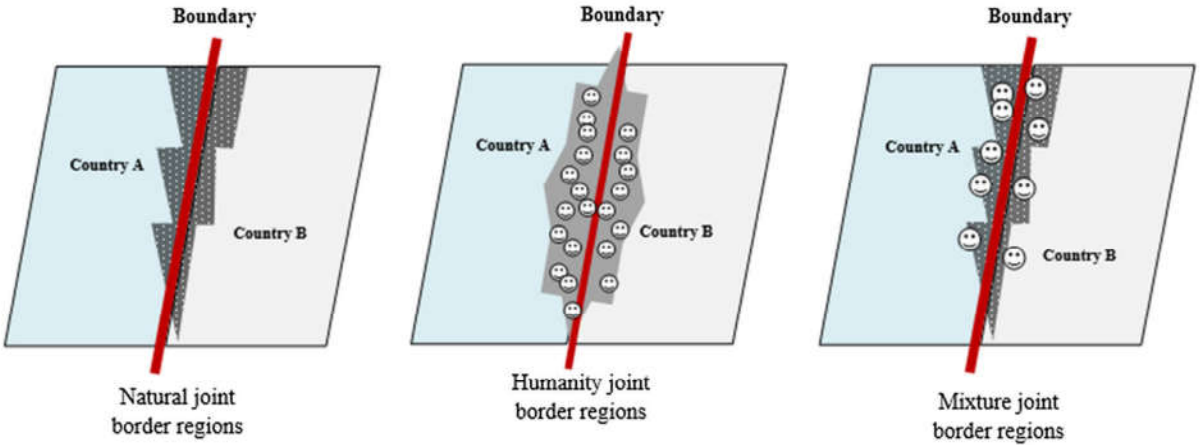

Fig. 3 Joint border region between two countries (Janparvar, 2017)

future state, which he estimated as one and a half million, would be greater than the previous three cases AQ3 (Alshaikh, 2001: 58).

Janparvar's model

Most of the previous literature on border regions remains ambiguous. The definitions and views expressed on the border region, it is articulated interchangeably with the border line, or it is considered by the concept of border limit. The border region has a lot of differences with the borderline and border limit exactly. On the other hand, scientist has tried to focus their work on defining the characteristics and characteristics of these areas without defining the border region. One of the few definitions available in the short form for the border region is that the border regions are the geographic regions adjacent to the boundary. But in a more precise explanation of this concept, it can be said that the border region is the immediate geographic space of the boundary lines with different dimensions that are directly affected by the boundaries. It should be noted that the width of the border region is proportional to the status and function of the borders and is influenced by the surrounding environment. In general, it should be said that with the increase in the effectiveness of the borders through developments in various fields of technology and the expansion of the commodities and human movements, the width of the border region is increasing because these direct and immediate effects extend the geographical space of the borders. In the border region, it should be noted that since the border regions are away from the centre, they always face threats of marginalization and deprivation, and these areas are also considered as critical and strategic points of any country. The isolated and non-productive nature of such areas, especially as they are either mountainous or desert areas, has been confronted with lack of affluence, so these population lack motivation for living and pose economic and security problems to the government, their income decline, unemployment and inaccessibility of basic needs increase. Another problem affecting the border regions is depopulation and emigration of the border residents to large cities because of the lack of incentives for living in these areas. Since the landowners in these regions are economically weak, some of them do illegal work. In general, productive occupations cannot invested in such areas. It should note that the border regions have the following general characteristics:

- Far from the centre;
- Geographic, economic, development situation and in the country;
- Has a superior cross-country position to communicate with other countries;
- Being in the front line of friendly or hostile encounters;
- Demographic density (in most cases);
- having natural, human or combined links across borders (most of the time);

Based upon the above discussion border regions can be classified into two parts:

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- *Joint border region* In this type the geographic landscape both sides is same and comprises a single region that border line divides into two equal parts. We should note here that the control and management of such regions are difficult and challenging. Joint border region has following shapes:
- *Natural joint border regions* In this type of border region, the geographic landscape that covers the borderline is naturally occurring on both sides of the border, not only the same, but also complementary, and half-interconnected. For example, you can refer to a plain or forest that is naturally a separate and interconnected ecosystem and crosses the boundary line.
- *Humanity joint border regions* In this type of border region, the geographic landscape that covers the borderline is naturally occurring on both sides of the border are different, but according to humanity has vast conjunction together and form a single humanity geographic landscape. For example, one ethnic group with the same language, religion and mores that form a specific single geographic landscape and divided by borderline into two separate parts. The space of position of this ethnic group in both part of the border region forms humanity joint border region.
- *Mixture joint border regions* In this type of border region, the geographic landscape that covers the borderline naturally and humanity occurring on both sides of the border has vast conjunction together and we cannot simply recognize two sides (Janparvar, 2017) (Fig. 3)

Disjoint border regions

In this type of the border region, the geographic landscape that covers the borderline occurring on both sides of the border are different are each side of border has its natural and humanity geographic landscape. So, we can say that borderline in this border region by demarcation separate different or little sameness geographic landscape. In this way, control and management of this border region are easier and without challenges sides (Janparvar, 2017). (Fig. 4).

Material and method

The present study is quantitative in nature and applied in purpose. The research method is descriptive-correlation in terms of data acquisition and data processing. In this study, library and field methods were used as a questionnaire to obtain the required information and data collection. The statistical population of the study included all *kubars* who were active in the Paveh city passages, and due to the informal nature of the job, no exact statistics were available, after referring to the 160 passages mentioned. The questionnaire version was provided to the statistical population and 113 questionnaires were answered. In this research, there are two types of independent and dependent variables. The independent variable is a property of the physical or social environment that accepts the values by interfering with or manipulating the researcher so that its impact on the other variable (dependent variable) can be observed. The independent variables in the present study are listed in Table 1 The dependent variable is a variable whose value affected by the independent variable. The dependent variable in the present study is the sustainability of the *kubari* phenomenon in the studied city, which has been subdivided and classified into three components (geographical, political, and economic) from the above theories and perspectives.

To ensure the validity of the questionnaire, researchers in the field of research after reading the questionnaire questions and points stated their corrective viewpoints and brief corrections were made to the questionnaires. Finally, the validity of the questionnaire was confirmed by a panel of experts. Cronbach's alpha coefficient was used to assess the reliability of the research. SPSS software and statistical tests (Kmo) and (regression) were used to rank the influential variables and their effect on the continuity of the kulbari phenomenon. Table 2

Study area

Paveh is located in western Iran and is 112 km far from Kermanshah. It lies in a sub-region along the Iran-Iraq border commonly referred to as Hewraman, which is situated within the larger geographical region of Kurdistan. The city is considered by inhabitants of the region as the capital of Hewraman (Heydari &

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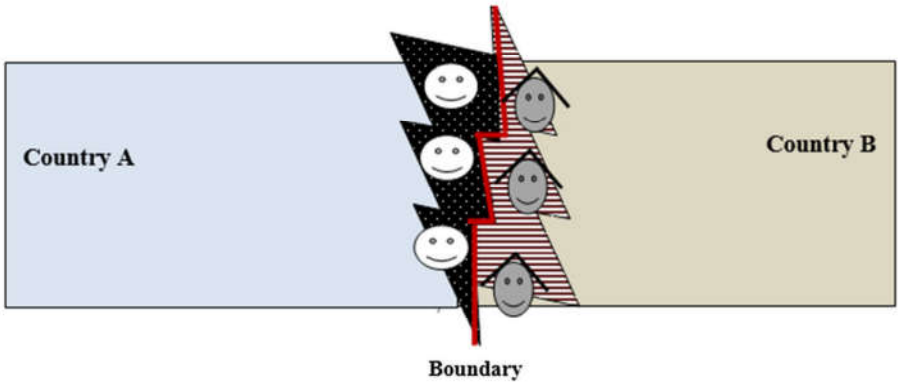

Fig. 4 Disjoint border regions (Janparvar, 2017)

Table 1 Research variables **Source** Research Findings, 2020

Components	Articles
Geographical	Distance from the center of the boundary zone, the natural boundary of the boundary zone beyond the boundary, crossing position of the boundary zone, limitation of agricultural land and pasture
Political	The feeling of equality or political discrimination of frontier residents with the center, the presence or absence of frontier residents, the attitude of frontier residents to the frontier, the communication policy of the two frontier states, the ideology and strategies of the frontier states, the governing frontier policy (open, semi-open and closed (
Economic	Employment and unemployment situation in the border region, type of border dwellers' economy (agriculture and livestock, industry and services), public needs supply, border area development level relative to center, level of development on both sides of the border, price differences on both sides of the border, Satisfaction with income, Satisfaction with the cost of living situation

Table 2 Cronbach's test results **Source** Research Findings

Reliability test	
Numbers	Alpha Count
18	0.825

Bakhtar, 2018). Paveh is situated along a mountain-side like most cities and villages in the Hewraman region. Behind the city is the Shaho mountain and ahead of the city is a view of Atashgah, another mountain that was once the site of pilgrimages for ancient religions in the region. Among the most visited places is the Quri Qaleh caveman which is considered as the longest watery cave in the Middle East. The cave is located around 25 km from Paveh's city center. Paveh city is one of the five border cities of Kermanshah province with an area of 1260 km and according to the Census of 2016 its population was 60,431 people (Iran Statistics Center, 2016). The first language spoken by the population in the city is mostly Kurdish, but the language which is used in schools and offices is Persian, the official language of Iran in which almost everyone in the city is fluent. The city is 96 km west of the border with Iraq. Sirwan River is one of the biggest rivers in Paveh. It rises near Sanandaj, in the Zagros Mountains of Iran. Table 3

It then descends through the mountains, where for some 32 km it forms the border between the two countries. It finally feeds into the Tigris below Baghdad. Navigation of the upper reaches of the Diyala is not possible because of its narrow defiles, but the river's valley provides an important trade route between Iran and Iraq. The city is one of the main passageways of the kulbari due to its less developed and proximity to Iraqi Kurdistan. Figure 1 shows the city's surroundings, including the four border villages of Haniemerlum, Shushami, Dezawar where the kulbars gather to move goods, though most Kulbars come from other areas than these villages. Table 4

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Table 3 KMO test **Source** Research Findings, 2020

KMO value	0.851
Chi square	0.269
degrees of freedom	112
Significance level	0.000

Result and discussion

In this part of the research, a confirmatory factor analysis test was used to rank the factors affecting the stability of the kulbari phenomenon in the Paveh border region. And the significance level is equal to zero indicating the suitability of the experimental model used. Table 5

In this analysis, for the extraction of components, principal component method is used and orthogonal rotation (varimax period). In all the four components accounted for 69.8% of the factors contributing to the stability of the kulbari phenomenon. According to the results, the first component was 26.3% of the variance, the second component with 17.7% of the variance, the third component of 13.5% of the variance, and the fourth component with 12.3% of the variance. As can be seen, the first factor is more important highlighting the continuation of the kulbari phenomenon. Table 6

After the rotation of the factor (matrix period), variables of spectrum items related to factors affecting the continuation of the kulbari phenomenon in the Paveh border township are categorized in terms of correlation into five and in each main variable is a factor that correlated with it. The results of the categorization obtained from questions related to the factors affecting the stability of the kulbari phenomenon upon rotation show in general two items (for example distance from the center boundary and satisfaction with the cost of living situation) of 18 items in each category were not aligned or had no effect, but the rest of the options had different effects from high to low. Among that the most important items are "public needs supply status" with a score of 0.875, "two borders communication policy" with a score of 0.840, "employment and unemployment status in the border area" with score of 0.838 and "ideology and strategies of two boundary countries" with score of 0.832 left the continuation of the kulbari phenomenon in the border town of Paveh. Further, the sub-criteria that scored high on each criterion can be used as a practical approach to control the continuity of the Coulomb phenomenon in the study area.

Investigating the relationship between the research components and the continuity of the Kulbari phenomenon in the study area

The output obtained from the linear regression analysis it is found that the adjusted coefficient of determination for the variables entered into the research model was (R square = 0.891), indicating that 89% of the variance and variability of the causes of the continuation of kulbari phenomenon were Paveh frontier is caused by variables in the equation and the rest (11%) of the dependent variables are due to the influence of external factors and variables, known as error square e 2. The results of multiple regression analysis of the above variables can be standardized mathematically as: $Y = b0 + X1b1 + X2b2 + X3b3 + \ldots + Xnbn$ In this equation of the dependent variable which is the cause of the continuation of the kulbari phenomenon, b0 (i = 0, 1, 2…, n) constant coefficient and X1. X2, … are independent variables. In the study geographic variables (0.370), political (0.583), economic (0.475) were identified as influencing factors that can be used for the calculation of regression. In general, based on the results of linear

Table 4 Operating Matrix **Source** Research Findings, 2020

Components	The special initial numbers			squared of the rotating factor loads		
	Total	Variance percentage	Cumulative percentage	Total	Variance percentage	Cumulative percentage
1	6.4	35.579	35.579	4.74	26.355	26.355
2	3.73	20.741	56.320	3.18	17.767	44.011
3	1.31	7.329	63.649	2.43	13.532	57.543
4	1.17	6.206	69.855	2.21	12.312	69.855

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Table 5 Classification of compatibility items using post-matrix factor analysis method **Source** Research Findings, 2020

Category	Principal components	Sub-components	Coefficient
1	Geographical	The natural continuity of the border region beyond the border	0.782
		Border crossing position	0.793
		Restrictions on agricultural land and pasture	0.795
2	Political	The feeling of equality or political discrimination of border-dwellers with the center	0.654
		Acting or not being politically motivated by border residents	0.657
		Border residents' attitude to the border	0.751
		The communication policy of the two countries borders	0.840
		The ideology and strategies of the two countries border	0.832
		Governing Border Policy (open, semi-open and closed)	0.798
3	Economic	The employment and unemployment situation in the border region	0.838
		Type of Border Residents Economy (Agriculture & Livestock, Industry & Services)	0.675
		Public supply requirements	0.875
		Level of development of the border area towards the center	0.823
		Different levels of development on both sides of the border	0.686
		Price difference on both sides of the border	0.786
		Satisfaction with earning	0.656

Table 6 Detailed Results of the Regression Model **Source** Research Findings, 2020

Variables	Non-standard beta coefficient	Standard error coefficient	Standard beta coefficient	T	Significant level
Geographical	1.205	0.087	0.370	13.86	0.000
Political	1.466	0.091	0.583	16.02	0.000
Economic	1.241	0.091	0.475	13.66	0.000

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regression and the significance level and standard beta coefficient, the causes of continuation of the kulbari phenomenon through political components and variables were suggested in the research, in other words, considering the results can be said that the political component will have the most to do with the continuation of the kulbari phenomenon, that is, with the increase in the influence of political components among the kulbars in the study area, the kulbari tendency will also change. Economic and geographic variables are also in the following categories of the degree of relationship with the continuity of the Kulbari phenomenon.

The results of regression test showed that the political components mentioned in the study had the greatest impact on the continuation of the *kulbari* phenomenon in the border town of Paveh, among the political dimension items based on the confirmatory factor analysis (Kmo). Communication policy of the two border states, ideology and strategies of the two border states and the border policy dominated, in the border town of Paveh, the continuation of the *kulbari* phenomenon depends largely on the type of foreign relations of Iran with Iraqi Kurdistan. Whenever appropriate commercial and economic communication and consequently openness to legal boundaries occur the tendency for cross-border trade from official bases is increasing, but over the past few years, due to political differences and due to tensions between Iran and the Kurdish region, the boundaries in the city of Paveh have been heavily influenced by these tensions and for a long time had been in trouble with the formal

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business. This type of policy which closed formal trade routes at the borders between Iran and other neighbors due to cross-sectional political tensions with them, has led to a greater willingness to engage in informal activities at the borders, especially in Paveh and kulbari, one of these informal jobs is the result of a lack of proper communication policy with the western neighbor. In other words, the ideology of the country's foreign policy, which has linked cross-cutting issues and political tensions to other issues, has led to unofficial jobs over the past few years, including smuggling, which is a *kulbari* phenomenon. If there is an increasing trend, the historical experience of the people has shown that the border policies in this region are not fully stable and that the border can be closed at any moment and that trade can be boomed across the border through official means and have made their people adapt to the conditions created so that they are less harmed by these policies, so there is more informal bases of trade in the border regions of Iran in general and in Kermanshah province and Paveh in particular.

The results of the regression indicate the importance of economic issues in the continuation of the *kulbari* phenomenon in the border regions. Among the items presented in the economic dimension based on the confirmatory factor analysis test results, the most important factor affecting the continuation of the *kulbari* phenomenon was the general necessity of life. The misery index is an economic indicator that shows the economic and social status of a society. They combine the unemployment rate and inflation rate to obtain the misery index. Kermanshah province in 1997 after Charmahal and Bakhtiari score 46.5. It is known as the poorest province in the country in terms of misery index (Tab Nak Economik, 1398). It is not known that if the situation in Kermanshah province, such as Paveh, if it is not worse, it will not be better than that of the province, according to the results of most of the surveyed people in the Paveh border area

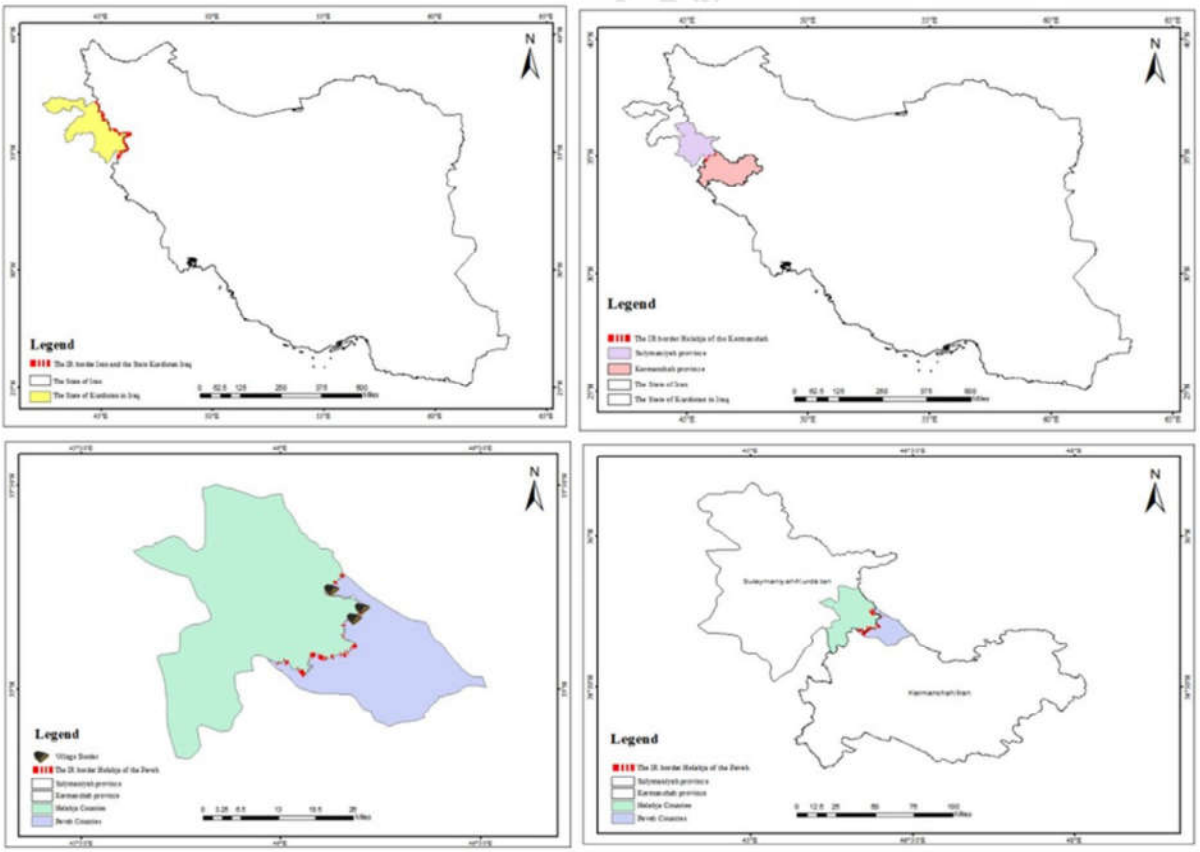

Fig. 5 A View of Study Area Region. **Source** Research Findings, 2020

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have had a problem with their basic living needs, such as home rentals, essential living supplies such as food and clothing for women and children, staggering medical costs, 300% gasoline costs and, consequently, expensive ones. All products come together to make the decision to take on the risky *kulbari*. Therefore, the most important driver of the statistical population of the research is the tendency towards *kulbari*'s activity to provide basic living costs. Employment and Unemployment in the frontier area is the second most important factor affecting the continuation of the *kulbari* phenomenon based on the results of the KMO test as mentioned above. The employment situation in these areas is inadequate, so creating sustainable employment and a level of wages commensurate with the cost of living can reduce the tendency towards this phenomenon. Given the bitter experiences that border regions have experienced during various periods due to the poor and unstable economy these areas, and their consequences, are some of the top priorities for job selection in these areas, and are less likely to be formalized and in the absence of this formal occupation, they tend to informal employment. In other words, in the border areas of Iran, especially in the border town of Paveh, due to the lack of employment and on the other hand the rising momentum of commodity inflation, the cost of living in these areas increases sharply every day and makes life easier for ordinary people. Hard and overwhelming, the combination of these factors tends to lead to the cost of living in every way possible, which is the Coulomb phenomenon in these areas due to unsatisfactory living costs. Bringing a diverse range of people, ranging from a 12-year-old child to a 65-year-old man, given the mountainous areas of Paveh are serious hazards, such as falling into the valley, getting caught in the snow and cold, clashing with law enforcement and eventually death, despite all the consequences but the number of people employed in this informal sector, the economy in the border regions is not diminishing, but more and more people are turning to jobs due to the deteriorating situation in the border regions. The *kulbari* phenomenon will not be resolved in the short term, but over time, along with increasing levels of development and prosperity in the border regions and, in turn, increasing long-term employment. To reduce the tendency of the phenomenon occurs. Level of development of border area to center: the third factor affecting the causes of the continuation of the *kulbari* phenomenon is based on the results of the KMO test. The development has implications, including lower levels of investment, lower levels of investment lead to lower levels of employment, create employment shortages, and create a recession with high inflation in Iran. It affects the lives and livelihoods of the citizens of the country, especially the Paveh border regions, and ultimately the people are forced to move to informal employment and *kulbari*. Hence the difference in the level of development of the border regions relative to the center has a major impact on the continuation of the trend towards *kulbari*. Citizens of the border regions of Iran and especially of the study area, because of economic and livelihood problems in their geographical environment, there is always a feeling of discrimination and citizenship in their country and this has caused certain political behavior in the long run. Divergence and non-participation in political decision-making (elections) is one of the issues, and somehow the government has enough social capital in these areas to convince people to reduce their desire for informal employment, including Colbert, Not enjoyable. In other words, the citizens living in the border regions, considering the historical experience of injustice and discrimination that the central governments (over the past century) have towards these areas, tend to view the informal economy as a response to these discriminations and its sustainability continues. AQ5

Conclusions

Among the geographical factors affecting the continuation of the kulbari phenomenon among Paveh residents based on the factor analysis test the absence of agricultural or pasture land has had a significant effect on the kulbari tendency. In fact one of the main reasons for turning to kulbari tradition. Kulbari's job among the citizens of the border regions is the lack of economic diversity in these areas, given the low level of services and facilities in these areas and especially in its rural areas and lack of adaptation strategies agriculture and livestock have lost their former boom another reason for the bandonment of power. Agriculture is process of urbanization and the increasing urbanization of rural areas, the migration to the cities taking away the possibility of agriculture or animal husbandry which is part of the economy of such border

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regions. Industry in the border regions of Iran, especially in Paveh, has a very low level of investment and therefore does not have a good economic return for investors, hence the poor environmental situation for agriculture and the lack of sufficient investment to solve environmental problems. The situation in this part of the economy in Paveh has worsened. So, the only way left for people to turn to false and illegal jobs (based on the country's official discourse) is that kulbari is one of these jobs, given that in the memory and history of frontier citizens, the economy is stable and robust. There have been no jobs and the transition to formal employment over many generations has been institutionalized in a way that even if the conditions for employment in other economic sectors, including agriculture and industry are available people are less inclined to work in this field. Unless they have over many years invested heavily in these areas, from the perspective of the people's experience, their historical and biological status in the border regions has changed.

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