

Development Strategies for Exploiting Local Resources through the Views of the Local Residents

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Abstract. In order to halt the migration from rural areas to the cities and to encourage people to return or move to rural regions, it is critical to examine the local residents' views on different development paths. Employing the techniques of social psychology, this study investigates residents' views on the present situation and development potential in the Regional Unit of Drama in Greece. The analysis indicated that most residents were dissatisfied with the degree that the beautiful locations as well as the events, products and services are promoted by various bodies. At the same time, they were willing to support the establishment of a single body which would undertake the management and exploitation of local natural resources while they considered that such body could create new jobs and coordinate actions more effectively.

Keywords: environmental communication; local development; residents' attitudes; sustainable development.

1 Introduction

Urbanization together with rural population's inward migration led to uneven development and to the expansion of differences among various Regions in Greece (Chatzitheodoridis et al., 2016). To alleviate economic issues and to trigger prosperity in such Regions, the exploitation of local resources is a prerequisite for achieving and

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maintaining local development. In specific, the available resources play a critical role in local development and can involve both the natural environment and wealth sources such as metal ores which can become products of added value once they are processed (Soutsas, 2006).

The major economic changes with the most important being the transformation of the economy, make the development in less-favored areas a particularly challenging issue (Polyzos, 2011). An indicative example of such areas would be the Regional Unit of Drama, which is located in the northernmost part of Greece and away from large urban centers. The Regional Unit of Drama has suffered severely not only from the large-scale migration towards Greek urban centers or other countries, but also from the loss of jobs which began in the mid-1980s and lasts until today. Despite these negative conditions, the Region is a distinct case study because the exquisite local natural wealth can support multiple activities included in alternative tourism and attract tourists both from the wider area and other countries. However, this potential remains, to a great extent, unexploited.

Against this background, the present paper aims to investigate residents' views on the current situation as well as the development potential in the Regional Unit of Drama. The investigation of their views is important for designing effective communication strategies and targeted actions in the future.

2 Methodology

The area of study was the Regional Unit of Drama which is part of the Region of East Macedonia and Thrace, in Greece. The Regional Unit of Drama is located in the northernmost part of Macedonia and in the westernmost part in the administrative Region of East Macedonia and Thrace. The research instrument was the questionnaire and in total 500 residents completed the questionnaire. The questionnaire consisted of 23 items and most of these items were closed-ended questions with four- and five-point Likert scales as well as few dichotomous questions. The collection of the questionnaires started in November 2016 and ended in September 2017. To scrutinize the obtained data, the SPSS 23 was used and, in specific, descriptive statistics and Principal Component Analysis (PCA) were conducted.

3 Results

3.1 Socioeconomic characteristics

In terms of gender, female respondents (68.4%) outnumbered their male counterparts (31.6%). Regarding age and education level, 39.4% were aged between 41 and 50 years and many respondents were university (34.2%) and high school graduates (28.6%). Regarding occupation, a considerable share of respondents was

employed in the public sector (18.4%) while the majority, by 70.4%, was married and a significant share had two children (39.4%).

3.2 Communication policy on the promotion and exploitation of local resources

Communication policy as a means to harness local resources can be characterized by multiple and different objectives. In this study, the residents' responses were analyzed according to the measures of central tendency and dispersion (mean, median and standard deviation) (Table 1). First, the residents were required to evaluate three major objectives that communication policy sets in order to exploit local resources. As it can be seen in Table 1, the 'Promotion of local products' was the highest ranked objective (mean=4.10) followed by the "Promotion of alternative tourism types" (mean=3.95) and "Public awareness about environmental protection" (mean=3.83).

Table 1. Measures of central tendency and dispersion concerning communication policy objectives to promote and exploit local resources

Communication policy objectives	Mean	Median	Standard deviation
Promotion of local products	4.10	4.0	1.03
Promotion of alternative tourism types	3.95	4.0	1.11
Public awareness about environmental protection	3.83	4.0	1.06
Total	1.83	2.0	0.60

Next, respondents were asked which media should be used to promote local resources. As shown in Table 2, the "Internet" and "Television-Radio" were regarded as the most suitable media to promote local resources. These were followed by "Newspapers-magazines", "Posters-banners" and "Printed advertising material".

Table 2. Measures of central tendency and dispersion concerning the media's promotion of local resources

Media	Mean	Median	Standard deviation
Internet	2.05	2.0	0.78
Television – radio	1.93	2.0	0.73
Newspapers – magazines	1.79	2.0	0.64
Posters – banners	1.66	1.0	0.88
Printed advertising material	1.60	2.0	0.71

The attraction of specific tourist groups consists an important strategy to promote tourism. According to the residents, efforts aiming at promoting tourism in the Region should focus primarily on "Greek tourists" while the following preferred tourist types were "Tourists travelling in groups", "Foreign tourists" and "High-profile tourists" (Table 3).

Table 3. Measures of central tendency and dispersion regarding residents' preference for tourist types

Tourist types	Mean	Median	Standard deviation
Greek tourists	4.34	5.0	1.07
Tourists travelling in groups	4.02	4.0	1.12
Foreign tourists	3.96	4.0	1.22
High-profile tourists	3.66	4.0	1.26

Then, residents' satisfaction with various bodies, in terms of their efforts to promote local natural resources, was examined. Overall, the residents expressed a low level of satisfaction with all bodies, however, "Municipality", "Regional administration" and the "Ministry of Economy, Development and Tourism" received the highest rankings (Table 4).

Table 4. Measures of central tendency and dispersion relating to residents' level of satisfaction with various bodies in terms of their efforts to promote local natural resources

Bodies	Mean	Median	Standard deviation
Municipality	1.93	2.0	0.75
Regional administration	1.85	2.0	0.77
Ministry of Economy, Development and Tourism	1.70	2.0	0.58
Media	1.60	2.0	0.63
Tourist offices	1.59	2.0	0.64

3.3 Level of promotion of the local events, products and services

The Regional Unit of Drama involves characteristic products, monuments and events which could attract visitors. The residents, however, perceived that they are promoted at different degrees and, in specific, the events of "Oneiroupoli (Dream city)" (mean= 4.21) followed by the "International short-film Festival of Drama" (mean= 3.55) were the most promoted events (Table 5).

Table 5. Measures of central tendency and dispersion regarding the promotion of characteristic products, monuments and events of the Region

Characteristic products, monuments and events	Mean	Median	Standard deviation
"Oneiroupoli" (Dream city)	4.21	4.0	0.91
International short film festival of Drama	3.55	4.0	1.24
"Draminognosia" (Wine tasting in Drama)	3.04	3.0	1.23
Local customs and traditions	2.73	3.0	1.12
Local traditional products	2.57	3.0	1.02
Sites and landscapes of particular natural beauty	2.29	2.0	0.95
Alternative activities	2.19	2.0	1.16
Archaeological sites and museums	2.16	2.0	0.94
Food and recreation services	2.15	2.0	0.97

To scrutinize residents' responses regarding the promotion of events, products and services, Principal Component Analysis was performed (Siardos, 2002, Hair et al., 2010). According to the results shown in Table 6, the first factor includes the characteristics, services and products which receive limited promotion. In specific, this factor was formed by the variables "Food and recreation services" (A13.8, mean= 2.15), "Alternative activities" (A13.7, mean= 2.19), "Local customs and traditions" (A13.9, mean= 2.73), "Local traditional products" (A13.6, mean= 2.57), "Archaeological sites and museums" (A13.4, mean= 2.16) and "Sites and landscapes of particular natural beauty" (A13.5, mean= 2.29). Conversely, the second factor involves the local events which are highly promoted. That is, the "International short film festival of Drama" (A13.2, mean= 3.55), "Oneiroupoli (Dream city)" (A13.1, mean= 4.21) and "Draminognosia" (Wine tasting in Drama) (A13.3, mean= 3.04) formed this factor.

Table 6. Results of Principal Component Analysis and analysis of category reliability

Variables	F1	F2	CFV
A13.8 Food and recreation services	0.916		0.839
A13.7 Alternative activities	0.874		0.768
A13.9 Local customs and traditions	0.829		0.733
A13.6 Local traditional products	0.799		0.729
A13.4 Archaeological sites and museums	0.795		0.706
A13.5 Sites and landscapes of particular natural beauty	0.686		0.827
A13.2 International short film festival of Drama		0.863	0.804
A13.1 "Oneiroupoli" (Dream city)		0.832	0.694
A13.3 "Draminognosia" (Wine tasting in Drama)		0.814	0.812
Explained variance	47.1%	29.7%	
Total explained variance	76.8%		
Cronbach's alpha	0.925	0.835	
Total scale reliability	0.930		
Mean factorial degree	2.35	3.60	
Standard deviation	0.88	0.99	
Kaiser-Meyer-Olkin (KMO) Test	0.846		
Bartlett's test of sphericity: chi-square=3558.556, DF= 6, p<0.0001			

3.4 Measures to improve the current situation

The residents were positive to the establishment of a single body which would be responsible for the management and exploitation of local natural resources as they considered that it would result in the "Creation of new jobs" and "Creation of better conditions for increasing income" (Table 7).

Table 7. Measures of central tendency and dispersion regarding the effects of establishing a single body for the management and exploitation of local natural resources

Effects	Mean	Median	Standard deviation
Creation of new jobs	3.33	3.0	0.55
Creation of better conditions for increasing income	3.30	3.0	0.56
Better coordination of actions	3.29	3.0	0.57
Positive contribution to tourism development in the Region	3.27	3.0	0.54
Participation of more parties in decision-making processes	3.15	3.0	0.51
Higher effectiveness of the relevant actions	3.15	3.0	0.53
Total	3.24	3.0	0.63

The residents were finally asked whether they would be willing to participate in a single body for the management and exploitation of local natural resources. As presented in Table 8, the respondents were divided with 55% being willing and 45% being unwilling to participate.

Table 8. Frequency and percentages concerning residents' willingness to participate in a single body for the management and exploitation of local natural resources

	Frequency	Percent
Yes	275	55.0
No	225	45.0
Total	500	100.0

4 Conclusions

Any communication policy is doomed to failure unless it consists part of a wider strategy targeted towards the future local development of the Region. For this reason, coordination between various local bodies, who undertake production activities or own businesses, and residents is necessary. In the context of a wider coordination, a communication strategy ought to be targeted while setting clear and realistic objectives.

According to the residents of Drama, the main objectives of communication policy ought to be the promotion of local products through the Internet and the attraction of tourists. It was also interesting that, in terms of the promotion of local natural resources, the residents were dissatisfied with the actions of the Municipality and the Regional Administration but were satisfied with tourism offices, the media and the Ministry of Economy, Development and Tourism. In addition, they perceived that there is a 'two-speed' promotion of local resources with the first being the well-known events "Oneiroupoli" (Dream city), the "International short film festival of Drama" and "Draminognosia" (Wine tasting in Drama) and the low speed being the beautiful natural sites and landscapes as well as the local traditional products of the Region.

Finally, more than half residents (by 55%) were positive to the establishment of a single body for the management and exploitation of local natural resources and perceived that it could create new jobs and better conditions for increasing income.

References

1. Chatzitheodoridis, F., Kontogeorgos, A., Liltsi, P., Apostolidou, I., Michailidis, A. and Loizou, E. (2016) Small Women's Cooperatives in Less Favored and Mountainous Areas under Economic Instability. *Agricultural Economics Review* 17(1), p. 63-79.
2. Hair, J.F., Black, W.C., Babin, B.J. and Anderson, R.E. (2010). *Multivariate Data Analysis*. 7th Edition. New York: Pearson.
3. Polyzos, S. (2011) *Regional development*, p. 626. Athens: Kritiki Publications.
4. Siardos, G. (2002) *Methods of Multivariate Statistical Analysis*. Part I. Thessaloniki: Ziti Publications.
5. Soutsas, K., Tsantopoulos, G., Arabatzis, G. and Christopoulou, O. (2006) 'Characteristics of tourism development in mountainous regions using categorical regression: The case of Metsovo (Greece)', *International Journal of Sustainable Development and Planning*, 1, p.32-45.