

## **Agritourism in Montenegro – Empirical research in the function of strategic development**

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**Abstract:** The aim of this paper is to consider the strategic opportunities and importance of agritourism development in Montenegro, identifying key factors that may help agritourism to position itself as an integral part of both rural and overall tourism offer of Montenegro. The paper contains empirical research, which was conducted using a questionnaire on a stratified random sample, and the data were analyzed using statistical methods – factor analysis and descriptive statistics. The author came to the conclusion that in the development of agritourism, Montenegro has not yet taken the competitive position it should have, considering its huge potential for development of this form of tourism. Based on the obtained results, the factors that have a significant impact on the development of agritourism were identified, and a set of recommendations for current and potential holders of agritourism offer was created, in order to improve their tourism and marketing strategy.

**Keywords:** agritourism, Montenegro, rural tourism, strategy, development

**JEL classification:** Z32

## **Agroturizam u Crnoj Gori – Empirijsko istraživanje u funkciji strategijskog razvoja**

**Sažetak:** Cilj rada je da se sagledaju strategijske mogućnosti i značaj razvoja agroturizma u Crnoj Gori, identifikovanjem ključnih faktora koji mogu pomoći da se agroturizam pozicionira kao sastavni dio ruralne i ukupne turističke ponude Crne Gore. Rad sadrži empirijsko istraživanje, koje je sprovedeno korišćenjem upitnika na stratifikovanom slučajnom uzorku, a podaci su analizirani korišćenjem statističkih metoda – faktorske analize i deskriptivne statistike. Autor je došao do zaključka da u razvoju agroturizma Crna Gora još uvijek nije zauzela konkurentsku poziciju kakvu bi realno trebalo da ima s obzirom na neosporne potencijale. Na osnovu dobijenih rezultata izveden je zaključak o faktorima koji imaju signifikantan uticaj na razvoj agroturizma, te date preporuke sadašnjim i potencijalnim nosiocima agroturističke ponude, u cilju unapređenja njihove turističke i marketing strategije.

**Ključne reči:** agroturizam, Crna Gora, ruralni turizam, strategija, razvoj

**JEL klasifikacija:** Z32

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## 1. Introduction

In the last years of the 20th century, there was an intensive growth and dispersion of tourists around the world as well as the emergence of various trends defined in the theory of tourism as specific, alternative or selective forms of tourism. Namely, the process of creating tourism policy in order to encourage the development of selective tourism is a highly sophisticated and demanding activity, which implies emphasized multidisciplinary, as well as the support of all participants in creating tourism policy (Vučetić, 2008). Analyzing the views of a large number of authors on this topic (Bramwell, 1994; Lane, 1994; Lane, 2009; Sharpley & Roberts, 2004), rural tourism may be defined as a broad area with a predominantly natural environment that makes a specific tourism product. On the other hand, rural tourism, as a specific type of tourism, is in many cases one of the priority factors in the development of a particular rural place. Namely, due to rural tourism, it is possible to create foundations and arrange rural areas in accordance with long-term development goals, stopping the depopulation of the rural population and preventing the collapse of the demographic structure of rural areas. In addition, rural tourism promotes the activation of local potentials, as well as the development of rural areas as promising for life and business. All of the above leads to the improvement and preservation of both ecological and cultural and other values of rural settlements and rural households.

Furthermore, Fagioli et al. (2014) emphasize that rural tourism is one of the fastest growing forms of tourism, because of its ability to adapt to emerging trends in tourism demand, which are increasingly paying attention to the values of nature, culture, healthy and organic food and villages. Rural tourism may be explained as a holiday with the primary goal of getting to know the people, heritage and way of life in rural areas, where tourists, mainly participate in traditional agricultural activities (Rural Tourism Handbook, 2020). This represents the dimensions and conceptually determines agritourism, which is most often recognized in the literature as rural tourism.

However, the definition of the term “agritourism” is not so simple, because it represents tourism on a farm or household, but defined in this way does not include many different forms or complex activities developed in different countries. Namely, agritourism includes a combination of agricultural and tourist activities, where tourists observe or participate in traditional agricultural activities, without negative impacts on the ecosystem or on the productivity of rural households (Rural Tourism Handbook, 2020). Agritourism refers to tourism products and services that are directly correlated with agricultural products and stays in rural households, which include recreational activities, as well as the creation of homemade products and their resale (Sznajder et al., 2009). Numerous studies (Cánoves et al., 2004; Darău et al., 2010; Sharpley, 2002; Sznajder et al., 2009), analyzing different forms of tourism, consider agritourism as a part of rural tourism, among other forms (ecotourism, cultural tourism, adventure, hunting, etc.) whose activities take place in rural areas. However, the terms rural tourism and agritourism are sometimes equated in the literature (Roberts et al., 2003).

Based on the abovementioned, the subject of this paper is the identification and significance of factors in the function of strategic development of agritourism in Montenegro, with the aim of positioning agritourism as an integral part of rural and overall tourist offer of Montenegro. The paper contains an empirical research on the attitudes and perceptions of the holders of agritourism offer in Montenegro. Namely, in order to find out what the agritourism holders think and know about this area, i.e. how they perceive it, a research was conducted on a sample of 38 agricultural households in Montenegro. In this context, the analysis of survey data conducted in December 2021 should indicate the level of importance and opportunities that agritourism has on the life and work of the local population in rural areas of Montenegro. The paper provides an overview of the existing literature, with a critical review of the topic,

statistical processing of data collected by this research, discussion of the results, as well as recommendations.

## 2. Literature review

The scientific literature recognizes the term “agritourism” as a combination of the prefix “agro” (Greek agrós) meaning field and the word “tourism” (Greek tornos) meaning circular movement (Petrović, 2014). We have already mentioned that this term is often identified with the term rural tourism, i.e. they are used as synonyms, although agritourism is developing as an independent segment of tourism. Since agritourism implies engaging in agricultural activities and production of agricultural products in the countryside, it is in direct correlation with rural tourism, emphasizing that staying in rural accommodation is a key part of agritourism (Petrović, 2014).

Based on the aforementioned features of agritourism, its basic characteristics are (Franić & Grgić, 2002): non-pollution, absence of noise, healthy climate, preserved nature, natural beauties, conditions for recreation and sports, free movement of tourists and traffic connections.

Furthermore, agritourism activities are characterized by two approaches: modern and traditional approach (Petrović, 2014). The modern approach implies the participation of tourists in the activities and everyday life of the households they visit and their active engagement in agricultural affairs. On the other hand, the traditional approach is characterized by the passive stay of tourists, without involvement in agricultural activities, with an emphasis on the observation of doing business by the host. It should be emphasized that agritourism is not an acceptable form of business for all entities (agriculturists), while those who want to succeed in this business should have certain resources within the facility in which they want to perform agritourism activities. Characteristic of all entities, from the local population engaged in tourism, to registered rural households and other entities in agritourism, is that they all make mostly direct contact through communication with guests and visitors.

In order to properly define the agritourism offer, it is necessary to know who provides services in agrotourism, what service providers offer, to whom, or for whom agritourism products/services are offered, how further development of agritourism offer is planned, where product/service exchange takes place, etc. (Petrović, 2014).

In this sense, agritourism accommodation units are characterized by rural tourist households and catering facilities in domestic industry, in the form of houses, apartments or rooms for rent. What differentiates the above types of agritourism accommodation units is the active life in the facility itself. Namely, in rural tourist households, the owners (hosts) actively live there and are engaged in agriculture, while in the case of domestic catering establishments, the owners mostly live elsewhere, and the facility is rented out to tourists. In that sense, a rural tourist household may be defined as an active type of accommodation. On the other hand, the objects of catering activity in the domestic industry are defined as a passive type of accommodation. In addition to the basic division of agritourism accommodation units, various forms of accommodation units have been identified in the literature, such as agro hotels, agro-camping, agro-huts, rural hotels, etc. (Orlić & Brščić, 2012; Sznajder et al., 2009). On the other hand, if we look at the length of stay of tourists, i.e. visitors in accommodation units, there are: one-day tourists (it is necessary to provide one or more meals) and multi-day tourists (who mostly spend their holidays there and for whom it is necessary to provide accommodation services (Cox et al., 2011). In addition to the abovementioned, different categories of agritourists may be defined (Jolly & Reynolds, 2005), such as: passing agritourists (those who stay for several hours and passively observe activities in a given household); all-day

agritourists (those whose stay does not exceed 12 hours are considered excursionists and do not need accommodation services); agritourists who use foam (those who stay in the household all day and spend the night in it); weekend agritourists (those who use the weekend to tour rural areas, usually come on Friday afternoons and stay until Sunday); multi-day agritourists (those who spend part or all of their vacation in an agritourism household, staying from a minimum of three days to a maximum of three or more weeks).

In addition to the length of stay, the age group can also be an element of segmentation, i.e. agritourism entities can narrowly opt for a particular age group and thus form units specialized in (George & Rilla, 2011): children, teenagers, students, businesses, team building, retirees, etc.

In general, the development of agritourism contributes to the economic well-being of rural areas. Agritourism ensures optimal use of labor and creates a secure platform for the placement and sale of products, reduces costs and ensures the stability of rural areas, which together strengthens tourism capacity. All of the above points to the exceptional impact of agritourism on the economic aspects of rural areas. From the mentioned correlation of rural environment and agritourism, we may conclude that agritourism activity is very useful for the development of rural areas and ensuring their sustainable future, because this form of tourism enables the affirmation of natural advantages of rural areas.

Numerous studies dealing with this topic (George & Rilla, 2011; Joshi & Bhujbal, 2012) point out that, in addition to generating additional income, the motives of service providers in agritourism are also the opportunities to meet cultures and other people, to preserve cultural heritage, followed by the preservation of the natural environment, the authenticity of the household, and the identity of the site. In order to realize these motives and to achieve success on the market, agritourism destinations should focus on building an identity or brand, which would in a way unite quality, people, culture, landscapes and the like. Given the current situation in the world, where trends in tourism are shifting to rural areas and motivate modern populations to return to nature and clean, unpolluted environment, agritourism can nurture local culture, customs and traditions to occupy a very important market segment (MacLeod & Gillespie, 2010) and at the same time become one of the strategic and efficient ways of future development of rural tourism both at the global level and in Montenegro.

### **3. Empirical research – analysis of attitudes, perceptions and significance of agritourism factors in Montenegro in the function of strategic development**

#### **3.1. Defining hypotheses, conceptual model and research methods**

Based on a review of relevant literature and using data obtained from empirical research, several hypotheses have been formulated that analyze the factors that influence the assessment of the state, importance and possibilities of agritourism development in Montenegro, which are:

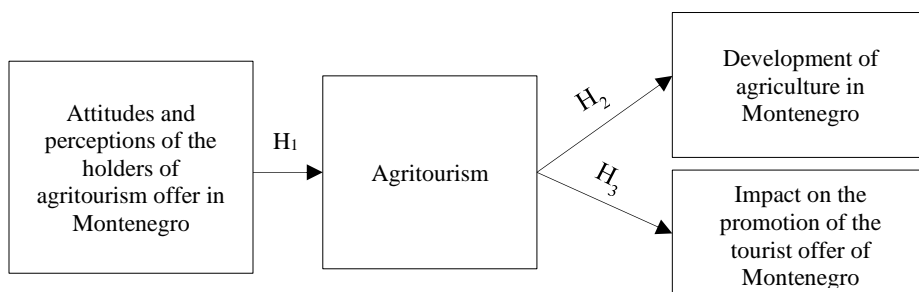
*H<sub>1</sub>: Holders of agritourism offer in Montenegro have positive attitudes and perceptions about the importance of agritourism development.*

*H<sub>2</sub>: The development of agritourism is positively correlated with the development of agriculture in Montenegro.*

*H<sub>3</sub>: The development of agritourism has a positive impact on the promotion of the tourist offer of Montenegro.*

The conceptual model, based on the above hypotheses, is given in the figure below.

Figure 1: The conceptual model of research



Source: Author's research

In order to obtain objective answers to defined hypotheses, statistical analysis of data collected by the survey was applied. Namely, having in mind the goals of the research, defined hypotheses, the results of previously published research on rural and agritourism, the questionnaire form (survey) was developed by the author. The prepared questionnaire (in Montenegrin language) was sent to 88 e-mail addresses of agritourism providers in Montenegro, registered or available on the website of associated rural households at the time of the survey ([Rural Tourism Handbook, 2020](#)). This site was created to enable families living in rural areas and engage in agriculture to generate additional income and create an additional motive in order to preserve Montenegrin villages. Based on the abovementioned, it may be concluded that this is a stratified random sample. The sample included representatives of agritourism from all three regions (north, center, south) in order to ensure greater representativeness of the sample. Thus, the demographic structure of the respondents was as follows: 71.05% from the northern region, 13.16% from the southern region, and 15.79% were from the central region. Having in mind that the northern region is crucial for the field of agritourism, we are of the opinion that the structure of the sample enabled a relatively balanced representation of agritourism from the whole country and the significance of the obtained results. The survey was conducted in December 2021. It lasted 15 days and 38 fully completed surveys were returned, giving a response rate of 43.18%. The questionnaire defined 20 questions. The questionnaire mostly contained multiple-choice questions. Some of the questions answered were the perceptions of the respondents on the Likert scale rated from 1 to 5 (1 - I do not agree at all; 5 - I completely agree). Data were analyzed using descriptive statistics and exploratory factor analysis methods. The collected data were processed in the SPSS program (Statistics 20). The results of the research are presented below.

### **3.2. Research results – attitudes and perceptions of agritourism offer holders in Montenegro in the function of creating a development strategy**

At the beginning of the analysis, an insight into the demographic characteristics of the respondents is given. The analysis of the results of descriptive statistics shows that the majority of respondents in the survey (71%) are male, while 29% of respondents are female. These results are meaningful bearing in mind that the heads of family and rural households in Montenegro are mostly men. On the other hand, these results correlate with the results of other research that showed that the main reasons for women's lack of interest in staying in rural communities are the following: rural women rarely own property, hold landowners and have a role in agricultural production ([Despotović et al., 2016](#))

When we talk about the age structure, in 60.53% of cases the respondents were between 21 and 40 years old, which indicates that young people are more interested in this type of tourism than middle-aged and older respondents. This is a very encouraging fact, considering that

today more and more young people are moving from rural areas to cities, so it is necessary to stimulate them to return to the countryside and engage in agritourism. It was also stated in correlation with the data that in Great Britain, the majority of visitors to agritourism sites are between 25 and 35 years old, pointing to the growing trend in the number of young people who want to visit the village ([Country & Town House, 2022](#)).

When we talk about employee education on family farms in Montenegro, the largest share belongs to people with secondary school education. Namely, 44.74% of respondents had a university degree, and 52.36% of respondents had secondary education. Only one respondent held an elementary school diploma. Looking at the educational structure, it is especially important to point out that human resources play an important role in the development of agritourism. Namely, all those who work on farms and are engaged in agritourism, in addition to the knowledge needed to perform agricultural activities, must have certain entrepreneurial and communication skills, as well as a culture of communicating with people ([Grgić et al., 2015](#)), and recognizing educational factors as those of great importance for the development of agritourism.

In addition, the results of the research showed that agritourism is most represented in the northern region (71.05%), while the southern and central part of Montenegro are less active in this form of tourism. It is obvious that the development of agritourism contributes to the preservation and improvement of rural areas, especially those in mountainous regions, which makes the results meaningful and justified.

Furthermore, when asked about the ownership structure of the agricultural farm on which the respondents live and work, 60.53% answered that the owners of the farm are their parents, while 39.74% of the respondents have their own farms. The owners of the agricultural farm live mainly with their family on the property ([Baćac, 2011](#)), so the redistribution of the ownership structure of the respondents is logical. It is important to point out that out of the total number of those who personally own farms, the largest number belongs to the age group from 51 to 60, which implies that there are almost no young people who own the farms. This fact should be paid special attention when stimulating and motivating young people to engage in agritourism in Montenegro. This form of tourism in Montenegro is most often organized in the form of an agricultural farm (89.47% of respondents), while 10.53% of respondents are not registered. Namely, agricultural farms in this context are designed as an organizationally and business-complete economic unit, which includes one or more production units and is engaged in agricultural activities ([Agriculture and Rural Development Law, article 2](#)). Respondents in most cases are engaged in fruit growing (26.32%), followed by vegetables (21.05%) and livestock (18.42%). From the agricultural branches that are less represented, viticulture can be singled out, as well as floriculture and horticulture.

Almost all households in the observed sample emphasize that they are engaged in organic production. Such data is encouraging because numerous studies ([Li et al., 2021](#); [Mugauina et al., 2020](#)) show that the production of healthy and organic food and rural tourism will be increasingly represented in the coming period, especially after the COVID-19 pandemic. This, at the same time, can be one of the recommendations when it comes to the strategy of agritourism development in Montenegro. However, the fact that the concept of work in the field of agritourism in Montenegro is relatively new and a category quite unknown to respondents shows that as many as 92.11% of surveyed households are not familiar with regulations to be followed when starting / running agritourism, while only 7.89% are familiar with the abovementioned regulations. Although knowledge of regulations is not the strength of households, all respondents showed that they intend to engage in agritourism in the next 5 years, and are also of the opinion that the demand for agritourism is growing, and an increase in agritourism is expected in Montenegro, which gives strategic importance to this area.

The motive for agritourism activities in most respondents is the restoration of the grandfatherland (39.47%), which shows an emotional characteristic that is mainly related to nostalgia for the roots. In addition, the increase in income (21.05%) and the employment of family members (18.42%) stand out as very important motives for engaging in agritourism. Mostly family members participate in the performance of work on the agricultural holding (78.95%), while in 21.05% of households, in addition to the family, seasonal workers also perform work on the agricultural holding.

When we talk about subsidies that respondents use to improve their business, the survey showed that agritourism providers most often use loans from the Investment and Development Fund (16.98%), the support programs of the Ministry of Economic Development (15.09%) and the support programs of the Ministry of Agriculture, Forestry and Water Management (15.09%). This is followed by local government support programs, loans from the Employment Service of Montenegro, EU funds, and incentive measures for regional development through state aid. On the other hand, the research showed that 1/5 of the respondents do not use subsidies, which may imply rural holders being insufficiently informed about the possibilities of supporting the development of agritourism in Montenegro.

The research showed that the bearers of agritourism offer in Montenegro most often perceive agritourism as a combination of agriculture and tourism (22.62%), and as an active stay in rural areas in terms of participation in rural affairs (19.05%). In 10.71% of cases, respondents perceive agritourism as relaxation (escape from the crowd / stress), or tourism in a rural household.

In addition to the above, the analysis showed that the Internet is the dominant form of promotion of agritourism providers in Montenegro (42.17% of cases). This is followed by promotion through travel agencies (22.89% of respondents), as well as promotion at tourism fairs and through events and manifestations (8.43% each). What attracts attention is the fact that promotion through newspapers and TV is represented in a relatively small percentage (7.23%, i.e. 6.02%, respectively). Furthermore, family farms in the agritourism sector in Montenegro use sponsorship as a form of promotion in a very small degree. The form of digital advertising or marketing that respondents most often use to promote their agritourism offer are social networks (74.51% of respondents). Holders of agritourism in Montenegro have recognized the usefulness of social media tools, which has been confirmed in the results of other research. Namely, social media enables providers to effectively reach both current and potential consumers and users and to budget wisely (Kallmuenzer et al., 2018; Peters & Kallmuenzer, 2018). Agritourism offer in Montenegro is also promoted through websites (17.65% of respondents). The least used instruments for the promotion of agritourism offer are mobile and e-mail marketing, as well as bloggers and influencers. The recommendation to the holders of agritourism offer is to focus in the future on these efficient forms of digital advertising/marketing, whose importance is still clearly not recognized in Montenegrin agritourism.

### **3.3. Factor analysis – identification and significance of agritourism factors in Montenegro**

In the continuation of the research, we focused on obtaining answers to the research question on identifying factors that are recognized in the field of general importance and significance of agritourism in Montenegro, as well as those that explain how other factors affect the development of agritourism. The obtained results justify the application of factor analysis, because the Kaiser-Meier-Olkin (KMO) measure (0.710) is higher than the lower limit.

Further, factor analysis seeks a pattern of relationships between a large number of variables. In the continuation of the paper, a correlation matrix for sixteen variables is presented, which identifies the importance of agritourism.

Table 1: Correlation matrix for sixteen variables identifying the importance of agritourism

|  | 1     | 2     | 3     | 4     | 5     | 6     | 7     | 8     | 9     | 10    | 11    | 12    | 13    | 14    | 15    | 16    |
|--|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| Correlation<br>[Agritourism contributes to the preservation of rural areas - 1]    | 1.000 | .939  | -.173 | .663  | .484  | .694  | .645  | .668  | .539  | .537  | .565  | .664  | .619  | .593  | .443  | .064  |
| [Agritourism enables the development of the rural economy - 2]                     | .939  | 1.000 | -.167 | .669  | .626  | .796  | .785  | .863  | .694  | .644  | .726  | .772  | .689  | .791  | .579  | .180  |
| [Agritourism pollutes the environment - 3]   | -.173 | -.167 | 1.000 | -.221 | -.409 | -.417 | -.327 | -.098 | -.298 | -.604 | -.312 | -.367 | -.494 | -.043 | -.409 | -.415 |
| [Agritourism increases the value of existing agricultural production - 4]          | .663  | .669  | -.221 | 1.000 | .637  | .773  | .759  | .533  | .412  | .658  | .431  | .759  | .692  | .652  | .594  | .481  |
| [Agritourism contributes to the retention of people in rural areas - 5]            | .484  | .626  | -.409 | .637  | 1.000 | .838  | .870  | .659  | .683  | .928  | .715  | .831  | .722  | .611  | .903  | .734  |
| [Agritourism enriches the overall tourist offer of the country - 6]                | .694  | .796  | -.417 | .773  | .838  | 1.000 | .973  | .767  | .731  | .873  | .765  | .950  | .899  | .736  | .838  | .474  |
| [Agritourism should be encouraged by state financial support - 7]                  | .645  | .785  | -.327 | .759  | .870  | .973  | 1.000 | .804  | .725  | .855  | .759  | .926  | .831  | .777  | .870  | .511  |
| [Agritourism increases the competitiveness of agricultural holdings - 8]           | .668  | .863  | -.098 | .533  | .659  | .767  | .804  | 1.000 | .796  | .632  | .833  | .748  | .629  | .842  | .611  | .233  |
| [Agritourism enables the creation of new jobs - 9]                                 | .539  | .694  | -.298 | .412  | .683  | .731  | .725  | .796  | 1.000 | .695  | .864  | .651  | .563  | .621  | .683  | .244  |
| [Agritourism contributes to increasing the volume of agricultural production - 10] | .537  | .644  | -.604 | .658  | .928  | .873  | .855  | .632  | .695  | 1.000 | .727  | .862  | .840  | .581  | .880  | .643  |
| [Agritourism contributes to the development of local infrastructure - 11]          | .565  | .726  | -.312 | .431  | .715  | .765  | .759  | .833  | .864  | .727  | 1.000 | .681  | .636  | .745  | .763  | .315  |



|   |      |      |       |      |      |      |      |      |      |      |      |       |       |       |       |       |
|---|------|------|-------|------|------|------|------|------|------|------|------|-------|-------|-------|-------|-------|
| [Agritourism has a positive effect on the authenticity of the space in which it takes place - 12] | .664 | .772 | -.367 | .759 | .831 | .950 | .926 | .748 | .651 | .862 | .681 | 1.000 | .937  | .760  | .831  | .529  |
| [Agritourism promotes the economic development of the country - 13]                               | .619 | .689 | -.494 | .692 | .722 | .899 | .831 | .629 | .563 | .840 | .636 | .937  | 1.000 | .674  | .769  | .528  |
| [Agritourism contributes to the satisfaction of the local population - 14]                        | .593 | .791 | -.043 | .652 | .611 | .736 | .777 | .842 | .621 | .581 | .745 | .760  | .674  | 1.000 | .659  | .390  |
| [Agritourism contributes to the preservation of tradition - 15]                                   | .443 | .579 | -.409 | .594 | .903 | .838 | .870 | .611 | .683 | .880 | .763 | .831  | .769  | .659  | 1.000 | .674  |
| [Agritourism contributes to the retention and return of the population to the villages - 16]      | .064 | .180 | -.415 | .481 | .734 | .474 | .511 | .233 | .244 | .643 | .315 | .529  | .528  | .390  | .674  | 1.000 |

Source: Author's research

Based on the results from Table 1, we can conclude that further factor analysis is justified. Namely, further analysis identifies common correlation matrix factors.

Table 2: Extraction of factors by the method of main components for sixteen variables that identify the importance of agritourism

| Total Variance Explained |                     |               |              |                                     |               |              |                                   |               |              |
|--------------------------|---------------------|---------------|--------------|-------------------------------------|---------------|--------------|-----------------------------------|---------------|--------------|
| Component                | Initial Eigenvalues |               |              | Extraction Sums of Squared Loadings |               |              | Rotation Sums of Squared Loadings |               |              |
|                          | Total               | % of Variance | Cumulative % | Total                               | % of Variance | Cumulative % | Total                             | % of Variance | Cumulative % |
| 1                        | 10.903              | 68.142        | 68.142       | 10.903                              | 68.142        | 68.142       | 7.862                             | 49.136        | 49.136       |
| 2                        | 1.801               | 11.259        | 79.401       | 1.801                               | 11.259        | 79.401       | 4.842                             | 30.265        | 79.401       |
| 3                        | .962                | 6.013         | 85.414       |                                     |               |              |                                   |               |              |
| 4                        | .859                | 5.366         | 90.780       |                                     |               |              |                                   |               |              |
| 5                        | .356                | 2.223         | 93.003       |                                     |               |              |                                   |               |              |
| 6                        | .331                | 2.071         | 95.073       |                                     |               |              |                                   |               |              |
| 7                        | .238                | 1.488         | 96.562       |                                     |               |              |                                   |               |              |
| 8                        | .176                | 1.097         | 97.659       |                                     |               |              |                                   |               |              |
| 9                        | .135                | .841          | 98.500       |                                     |               |              |                                   |               |              |
| 10                       | .092                | .572          | 99.072       |                                     |               |              |                                   |               |              |
| 11                       | .073                | .457          | 99.529       |                                     |               |              |                                   |               |              |
| 12                       | .039                | .246          | 99.775       |                                     |               |              |                                   |               |              |
| 13                       | .028                | .176          | 99.950       |                                     |               |              |                                   |               |              |
| 14                       | .004                | .028          | 99.979       |                                     |               |              |                                   |               |              |
| 15                       | .003                | .021          | 100.000      |                                     |               |              |                                   |               |              |
| 16                       | 3.138E-5            | .000          | 100.000      |                                     |               |              |                                   |               |              |

Extraction Method: Principal Component Analysis

Source: Author's research

The initial hypothesis defined two factors as important for identifying the significance and importance that agritourism has in Montenegro. The principal components method distinguishes two factors with a value greater than 1. They explain 79.401% of the total variations.

Tabela 3: Factor loads after rotation to identify the importance of agritourism

| Rotated Component Matrix <sup>a</sup>  | Component   |              |
|--|-------------|--------------|
|  | 1           | 2            |
| [Agritourism contributes to the preservation of rural areas]                                 | <b>.849</b> | .046         |
| [Agritourism enables the development of the rural economy]                                   | <b>.951</b> | .123         |
| [Agritourism pollutes the environment]   | .010        | <b>-.722</b> |
| [Agritourism increases the value of existing agricultural production]                        | <b>.629</b> | .433         |
| [Agritourism contributes to the retention of people in rural areas]                          | .563        | <b>.748</b>  |
| [Agritourism enriches the overall tourist offer of the country]                              | <b>.780</b> | .570         |
| [Agritourism should be encouraged by state financial support]                                | <b>.784</b> | .555         |
| [Agritourism increases the competitiveness of agricultural holdings]                         | <b>.917</b> | .151         |
| [Agritourism enables the creation of new jobs]   | <b>.750</b> | .304         |
| [Agritourism contributes to increasing the volume of agricultural production]                | .561        | <b>.737</b>  |
| [Agritourism contributes to the development of local infrastructure]                         | <b>.779</b> | .348         |
| [Agritourism has a positive effect on the authenticity of the space in which it takes place] | <b>.744</b> | .586         |
| [Agritourism promotes the economic development of the country]                               | <b>.634</b> | .632         |
| [Agritourism contributes to the satisfaction of the local population]                        | <b>.839</b> | .226         |
| [Agritourism contributes to the preservation of tradition]                                   | .559        | <b>.783</b>  |
| [Agritourism contributes to the retention and return of the population to the villages]      | .066        | <b>.860</b>  |

Extraction Method: Principal Component Analysis

Rotation Method: Varimax with Kaiser Normalization

a. Rotation converged in 3 iterations

Source: Author's research

At the end of this part of the analysis, factor loads after rotation are observed. Based on the results shown in Table 3, we conclude that the first factor has the highest values of factor loads for variables describing that **agritourism enables the development of rural economy** (0.951), **agritourism increases the competitiveness of agricultural holdings** (0.917), and that it contributes to the preservation of rural areas (0.849); thus, this factor can be named *The importance of agritourism for the development of rural economy and competitiveness*. The second factor has the highest factor load for the variables which point out that **agritourism contributes to the retention and return of the population to the villages** (0.860), **agritourism contributes to the preservation of tradition** (0.783), and **agritourism contributes to the retention of people in rural areas** (0.748), so this factor may be called *The importance of agritourism for the preservation of tradition, return and retention of the population in villages*.

Furthermore, it is necessary to obtain the answer to the research question whether both identified factors are equally important. The above factors explain 79.401% of the variations in the importance of agritourism in Montenegro. Of these, the first factor, identified as *The importance of agritourism for the development of rural economy and competitiveness*, explains 49.136% of the variation, whereas the second, *The importance of agritourism for the preservation of tradition, return and retention of the population in villages*, explains 30.265% of variation. It may be concluded that first factor has a greater impact on explaining the importance of agritourism in Montenegro compared to the second one.

In the continuation of the research, we conduct an exploratory factor analysis in order to identify the factors that affect the development of agritourism in Montenegro. The obtained results indicate the justification of the use of factor analysis, because the KMO measure (0.691) is higher than the lower limit, while the probability of error in rejecting the starting point is 0% correlation matrix.

Table 4. Correlation matrix for five variables that identify the impact on the development of agritourism in Montenegro

| <b>Correlation Matrix</b> |  | 1     | 2     | 3     | 4     | 5     |
|---------------------------|--|-------|-------|-------|-------|-------|
| Correlation               | [Natural resources are used to a greater extent through agritourism - 1]                                     | 1.000 | -.489 | -.098 | .450  | .630  |
|                           | [The older population is more interested in agritourism than the younger population - 2]                     | -.489 | 1.000 | .180  | -.498 | -.400 |
|                           | [Agriculturists who are engaged in agritourism need additional education - 3]                                | -.098 | .180  | 1.000 | -.351 | .102  |
|                           | [Business integration of agricultural producers has a positive impact on the development of agritourism - 4] | .450  | -.498 | -.351 | 1.000 | .383  |
|                           | [It is easier for agriculturists to market their products and services through agritourism - 5]              | .630  | -.400 | .102  | .383  | 1.000 |

Source: Author's research

By analyzing the values of correlation coefficients for these factors, it may be concluded that it is justified to continue the application of exploratory factor analysis, in order to identify factors that are crucial for the development of agritourism in Montenegro. Next, using the analysis of the main components, the usual factors contained in the table of correlation coefficients are identified.

Table 5. Extraction of factors by the method of main components for five variables that identify the impact on the development of agritourism in Montenegro

| <b>Total Variance Explained</b> |                     |               |              |                                     |               |              |                                   |               |              |
|---------------------------------|---------------------|---------------|--------------|-------------------------------------|---------------|--------------|-----------------------------------|---------------|--------------|
| Component                       | Initial Eigenvalues |               |              | Extraction Sums of Squared Loadings |               |              | Rotation Sums of Squared Loadings |               |              |
|                                 | Total               | % of Variance | Cumulative % | Total                               | % of Variance | Cumulative % | Total                             | % of Variance | Cumulative % |
| 1                               | 2.175               | 43.492        | 43.492       | 2.175                               | 43.492        | 43.492       | 2.043                             | 40.854        | 40.854       |
| 2                               | 1.170               | 23.401        | 66.893       | 1.170                               | 23.401        | 66.893       | 1.302                             | 26.039        | 66.893       |
| 3                               | .938                | 18.764        | 85.657       |                                     |               |              |                                   |               |              |
| 4                               | .455                | 9.098         | 94.755       |                                     |               |              |                                   |               |              |
| 5                               | .262                | 5.245         | 100.000      |                                     |               |              |                                   |               |              |

Extraction Method: Principal Component Analysis

Source: Author's research

Two factors were extracted by the method of main components, which significantly influence the development of agritourism in Montenegro. These two factors explain 66.893% of the total variations.

Table 6: Factor loads after rotation to identify the importance of agritourism

| Rotated Component Matrix <sup>a</sup>  | Component    |              |
|--|--------------|--------------|
|  | 1            | 2            |
| [Natural resources are used to a greater extent through agritourism]                                     | <b>.821</b>  | -.138        |
| [The older population is more interested in agritourism than the younger population]                     | <b>-.597</b> | .134         |
| [Agriculturists who are engaged in agritourism need additional education]                                | .057         | <b>.938</b>  |
| [Business integration of agricultural producers has a positive impact on the development of agritourism] | .521         | <b>-.610</b> |
| [It is easier for agriculturists to market their products and services through agritourism]              | <b>.920</b>  | .113         |

Extraction Method: Principal Component Analysis

Rotation Method: Varimax with Kaiser Normalization

a. Rotation converged in 3 iterations

Source: Author's research

The analysis of the results in Table 6 points to the following conclusions: the first factor has the highest value of factor loads for the variable which describes **that it is easier for agriculturists to market their products and services through agritourism** (0.920); almost equally important is the variable stating that **natural resources are used to a greater extent through agritourism** (0.821); therefore, this factor may be called *the Factor of placement and resources*. It is very important to point out that the variable stating that the older population is more interested in agritourism than the younger population has a negative value of the factor load. Thus, it may be concluded that the younger and middle-aged population has a significant impact on further development of agritourism in Montenegro, which is also shown by the method of descriptive statistics. The second factor that has the highest value points out that **agriculturists who are engaged in agritourism need additional education** (0.938), so this factor may be called the *Factor of investment in agritourism education*. It is important to point out that the variable belonging to this factor claiming that the business integration of agricultural producers has a positive impact on the development of agritourism has a negative value of the factor load. This imposes a conclusion that agriculturists engaged in agritourism in Montenegro do not always recognize the importance of business integration for the development of agritourism, but act individually. Thus one of the emerging recommendations is networking within the agritourism sector through associations, clusters etc.

Furthermore, the paper provides the answer to the research question on the equal significance of the identified factors. The obtained results show that the mentioned two factors explain 66.893% of variations in the impact on the development of agritourism in Montenegro. Of these, the first factor, identified as the *Factor of placement and resources*, explains 40.854% of the variations, whereas the second, the *Factor of investment in agritourism education*, explains 26.039% of the variations. It may be concluded that the first factor has a greater impact on the development of agritourism in Montenegro compared to the second factor.

The results obtained by use of factor analysis confirmed the importance of agritourism in Montenegro as a factor contributing to the development of rural economy and competitiveness, and the recognition of this form of rural tourism as a factor for preserving tradition, return and retaining the population to the villages. In addition, this analysis provided confirmation of the importance of placements and resources, as well as investments in agritourism education. Finally, the results obtained by applying these methods correspond to literary sources, pointing out the importance of agritourism in terms of socio-economic development of individual regions, and may serve different decision makers to develop strategies for agritourism development in Montenegro.

## **4. Recommendations for improving the development of agritourism in Montenegro**

Based on a detailed analysis of agritourism in Montenegro, given in this paper, the author has devised several recommendations aimed at contributing to the creation of a strategic approach to agritourism, with a view to its further development. They are as follows:

- Amend the legal provisions and regulations with clear and easily understandable definitions of all issues related to agritourism and participants in this sector and make them transparent.
- Promote these amendments to public through workshops, where they will be further clarified.
- Provide clarification of existing regulations.
- Define legal provisions for categorization of facilities and working conditions and explain them with examples for easier understanding.
- Design incentive activities that will improve the existing range of offers.
- Form associations of agritourism offer holders, which would also offer institutional support for the promotion and development of agritourism products.
- Develop an adequate system of motivation and incentives for people to engage in agritourism.
- Stimulate greater participation of women in agritourism.
- Improve the quality of services through constant monitoring and analysis of demand.
- Stimulate a higher level of linking agritourism with the production of healthy and organic food and other compatible areas.
- Increase the awareness of opportunities to support the development of agritourism in Montenegro.
- Strengthen human resources in agritourism through various forms of education and implementation of positive examples of good practice.
- Indicate the possibilities of expanding the already existing agritourism offer.
- Develop effective forms of marketing, especially those related to promotion through digital forms of advertising.

The implementation of these recommendations would create strategic conditions for the development of agritourism in Montenegro. Namely, recreation on rural households has recently been treated as a diversification strategy to promote a sustainable and diversified rural economy and to protect agricultural income from market fluctuations. In other words, agritourism is increasingly perceived as a promising activity for generating additional income. Therefore, households and agriculturists in Montenegro are increasingly recognized as entrepreneurs who need to develop new skills and abilities in order to be competitive. In order to achieve this, a strategic approach to this area is needed, which includes the creation of adequate policies at the state level, as well as a proactive attitude of the bearers of the tourist offer in Montenegro. The above recommendations can be extremely important for the further development of agritourism activities. Ultimately, implications for rural and agro-development policies include the need for an advisory role in households and farms, as well as a more effective training and support for agritourism providers in Montenegro.

## **5. Conclusion**

There are not enough studies in the literature that strategically investigate rural and agritourism in less developed countries, which are highly dependent on tourism, as is the case with Montenegro. There is a particular lack of studies that look at this area empirically through the

attitudes and perceptions of agritourism offer holders. Therefore, the author conducted research that tried to fill this gap. Specifically, the author, in addition to a strategic approach to the analysis of agritourism in Montenegro, developed and empirically tested a model that examined the relationship between attitudes and perceptions of agritourism providers on agritourism development, as well as the correlation of agritourism with agricultural development and tourism promotion in Montenegro.

Namely, from year to year, tourism is increasingly confirming its primacy as a strategic development branch of the Montenegrin economy. This fact is confirmed by the increase in its share in total GDP, the continuous increase in arrivals and overnight stays, as well as the increase in revenues generated by this sector. However, in the conditions of fierce global competition, where new, attractive tourist destinations appear almost every day, building a positive image of a tourist destination is a necessary precondition for its competitive advantage.

On the other hand, modern trends determine the development of a tourist destination in such a way that they must offer the market more authentic and quality experiences in relation to the competition. The existence of strong comparative advantages, which Montenegro inevitably has, does not mean that a strong competitive advantage will be built. Comparative advantages are those resources that the destination has at its disposal, and competitive advantage is the ability of the destination to use those resources in an effective and efficient way. In order to strengthen the competitive advantage, destinations should develop selective forms of tourism, including agritourism, as an integral part of rural tourism.

The paper presents an empirical research which provides a model that examined the relationship between attitudes and perceptions of agritourism providers with the development of agritourism, as well as the correlation of agritourism with the development of agriculture and the promotion of tourism in Montenegro. In the empirical part of the paper, statistical analysis was used, which included methods of descriptive statistics and exploratory factor analysis. Based on the previously conducted testing, we can conclude that the results of the evaluation using the above methods may be considered valid.

The results obtained by factor analysis confirmed the importance of agritourism in Montenegro as a factor for the development of rural economy and competitiveness, and the recognition of this form of rural tourism as a factor for preserving tradition, return and retaining the rural population in the villages. In addition, this analysis provided confirmation of the importance of placements and resources, as well as investments in agritourism education. Ultimately, the results of the research point to the conclusion that there is a positive correlation between agritourism and the development of agriculture and the promotion of the tourist offer of Montenegro. Based on the obtained results, all three hypotheses were accepted. Also, relying on the obtained results, the author gave recommendations to the bearers of agritourism offer and policy makers.

Finally, this paper has several limitations. First, the research was done in Montenegro, which belongs to the developing countries. It would be desirable to conduct research for a wider area, for example, the Western Balkans. Second, this study could be extended to analyze the impact of agritourism on different types of economic, agricultural, tourism, entrepreneurial and other performances. Ultimately, it would be of great importance, in addition to knowing the opinions of householders, i.e. holders of agritourism offer, to discover and get to know the opinions of other stakeholders on this form of tourism. In the context of the abovementioned, it would be important to conduct a research that would include both the bearers of the tourist offer and the tourists. These limitations may greatly encourage similar research in the future.

## Conflict of interest

The author declares no conflict of interest.

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