THE SYNERGY BETWEEN GASTRONOMY AND ACTIVE TOURISM AS INDICATORS OF SUSTAINABLE RURAL WELLNESS AND SPA DESTINATION DEVELOPMENT - SOKOBANJA CASE STUDY

Martina Arsić¹, Aleksandra Vujko², Dragan Nedeljković³ *Corresponding author E-mail: avujko@singidunum.ac.rs

ARTICLE INFO

Review Article

Received: 13 December 2024

Accepted: 20 January 2025

doi:10.59267/ekoPolj2501357A

UDC 338.48-6:615.8(497.11

Sokobanja)

Keywords:

gastronomy, active tourism, rural destination, wellness and spa, development, Sokobanja

JEL:L83, Z32

ABSTRACT

This study investigated the relationship between recreation and gastronomy as key indicators of sustainable development in spa destinations. The research sought to answer two main questions: "What significance do recreation and active tourism hold for tourists?" and "What type of gastronomy attracts tourists to destinations?" The data from collected 243 respondents, comprising guests of the Sunce Hotel, Golden View Garni Hotel, and visitors to the Zelengora restaurant in Sokobanja, were analyzed using factor analysis. The authors conducted the research using two questionnaires. The findings of the first survey revealed a strong inclination to relaxation of both mind and body. Additionally, the results of the second survey indicated that a unique gastronomic experience is a significant motivator for tourists. Both indicators have a positive impact on tourists' overall well-being and foster loyalty to the destination. In conclusion, active, gastronomic, wellness, and spa tourism have a beneficial influence on the tourist destination of Sokobanja. The study proposes a unique model that can be applied to all rural spa destinations.

Introduction

Numerous factors, such as the quality of offered experiences and the perception of the destination, affect tourist well-being (Panić et al., 2024). Destinations that combine attributes of sensemaking (e.g., accessibility, amenities) with exploratory attributes

¹ Martina Arsić, Ph.D. student, Singidunum University, Faculty of Tourism and Hotel Management Danijelova 32, Belgrade 11000, Serbia, E-mail: martina.arsic.23@singimail.rs; ORCID ID (https://orcid.org/0009-0004-5709-1561)

² Aleksandra Vujko, Ph.D., Associate Professor, Singidunum University, Faculty of Tourism and Hotel Management, Danijelova 32, Belgrade 11000, Serbia, Phone: +381 64 138 55 66, E-mail: aleksandravujko@yahoo.com, ORCID ID (https://orcid.org/0000-0001-8684-4228)

³ Dragan Nedeljković, Ph.D., Research assistant, Institute of Agricultural Economics, Volgina 15, Belgrade, Serbia, E-mail: draganedeljkovic62@gmail.com, ORCID ID (https://orcid.org/0000-0002-8391-9703)

(e.g., attractions, activities) tend to enhance tourists' psychological well-being (Kim & Hall, 2022). This can have a positive impact on increased return intentions and positive word-of-mouth (Reitsamer et al., 2017). Spa tourism, as one of the earliest forms of travel, is particularly well-developed in Europe. Serbia recognizes the significant tourist potential of its numerous spas (Arsić et al., 2024). Spa tourism has evolved from being solely health-focused to encompass mass holidaying and relaxation (Fernández-Gámez et al., 2018).

There is a growing demand for a tourist offering that integrates traditional spa experiences, modern wellness concepts, active holidays, and gastronomic experiences. Among motives that make tourists visit a destination, gastronomy ranks third behind cultural interest and nature (Juan et al., 2019). Gastronomy plays a strategic role in tourist destinations, influencing tourist behavior, motivation, experience, and spending while contributing to the sense of place and food image (Seyitoğlu et al., 2020). Gastronomic tourism has emerged as a distinct and expanding market segment (Balderas-Cejudo et al., 2019; Milanović et al., 2023; Rangus et al., 2023; Vujko & Delić-Jović, 2024), with 15% of tourists choosing destinations specifically for their culinary offerings (Berbel-Pineda et al., 2019). Moreover, a substantial 25% of travel budgets is allocated to food and beverages (World Food Travel Association, 2023). Today, gastronomy, as the focus of the tourist experience, plays an essential role in strengthening competitiveness (Vujko et al., 2024). The hospitality industry, including tourism, has become a global phenomenon, intertwining food consumption with other services and experiences valued by postmodern consumers (Hjalager & Richards, 2003). The relationship between food and identity is strong, and any attempt to change eating habits feels like an offense to national and individual identity (Bastenegar, 2019). Serbian cuisine, with its rich history and diverse influences from Greek, Byzantine, Oriental, Austro-Hungarian, Russian, and French cultures, reflects this complex heritage (Djordjevic-Milosevic & Milovanovic, 2012; Pantović et al., 2023).

Outdoor adventure tourism can foster sustainability and well-being by encouraging connections with nature, which can lead to pro-environmental attitudes and behaviors (Hanna et al., 2019). Winter et al. (2019) highlight the sustainability benefits of outdoor recreation and nature-based tourism, emphasizing the need for adaptable service delivery, cultural shifts, and inclusive management strategies to address evolving social, economic, and environmental conditions. According to Bojović et al. (2024), recreational tourism is categorized as a sustainable form of tourism that contributes to human health. Destinations that offer a blend of activities and natural environments are particularly popular due to their positive impact on the body in general (Alexander et al., 2021; Krunić et al., 2023; Miletić et al., 2023). Such destinations, with their diverse amenities, have sustainable development potential and can achieve a competitive advantage through effective tourism market positioning (Bjelić et al., 2024; Vučićević et al., 2024). Given the prevalence of stressors in modern life, destinations that offer preventive and immunity-enhancing health benefits are increasingly valued (Fernández-Gámez et al., 2024; Pantović et al., 2025). European demand for recreational and nature-based tourism is increasing due to

demographic shifts, evolving consumer preferences, and increasingly mobile lifestyles, posing challenges for planners and managers (Weber, 2001; Pyo, 2005; Bell et al., 2007). Serbia's abundant natural resources, including mountains, rural destinations, and spas, offer significant potential for recreational tourism development. Recreational activities not only enhance tourist well-being but also support therapeutic outcomes by having a positive impact on emotions (Gyasi et al., 2023).

Environmental protection is one of the most pressing challenges of the 21st century. Therefore, further tourism development must strike a balance between tourism development and ecosystem preservation as a solution to sustainability issues. The concept of wellness and spa (Arsić et al., 2024) has transcended the boundaries of mere luxury, emerging as a vital aspect of contemporary life. In today's fast-paced world filled with mounting stressors, the wellness and spa industry offers a sanctuary for individuals seeking refuge and rejuvenation (Colas et al., 2024). The benefits of wellness and spa services extend beyond mere indulgence; they play a crucial role in enhancing physical health and overall quality of life (Dimitrovski & Todorović, 2015). One of the most significant physical health benefits derived from these services is the promotion of relaxation, which can lead to reduced levels of cortisol, a hormone associated with stress (Ladkin et al., 2021, Milojević et al., 2020; Lakićević et al., 2024). In rural wellness and spa destinations, recreational and gastronomic activities are pivotal to sustainable development. The long-term viability and market competitiveness of these destinations depend on sustainable tourism practices (Zhu & Xu, 2022). Only when businesses operating in these destinations are viable can there be a competitive edge in the market. The starting hypothesis (H) posits that inbound tourism, driven by rich gastronomy and ample opportunities for sports and recreation, can enrich the offerings of wellness and rural spa destinations, positioning them as indicators of sustainable development. It is crucial to distinguish between treatment programs and wellness services in order to effectively cater to both patients and healthy guests (Arsić et al., 2024). Evidently, spa destinations that embrace these changes will gain a competitive edge in the tourism market.

The authors conclude that tourists readily engage in recreational tourism, recognizing its therapeutic benefits for general physical health. This aligns with the core principles of fitness, wellness, and spa methodologies. Additionally, they emphasize the value of locally sourced, traditionally prepared food as a significant complement to the overall tourism experience.

Case Studies

The local development of a tourist destination or region is impacted by cultural values, identity, and specific resources such as collective history and heritage (Santiago et al., 2024). Many destinations have recognized the potential of reviving tourism by empowering local communities to promote their skills and culinary heritage (Vujko et al., 2024). The Istrian region and Opatija in Croatia, Pirot in Serbia, and the Haut Plateau de l'Aubrac in France are good examples of the strong connection between

gastronomy and active recreation. These destinations leverage this connection to drive sustainable rural development (Vujko & Delić-Jović, 2024).

Istria, the most developed rural area in Croatia, has successfully developed both coastal and inland tourism. Its tourist offerings are renowned for olive oil, asparagus, truffles, and wine. The region offers family-friendly accommodations, agricultural holdings, and various active holiday options like horseback riding, cycling, and wine tours (Jurišić, 2024). Istrian wellness centers provide year-round relaxation through diverse packages.

Opatija, a coastal city in Croatia, has been identified by Vodeb et al. as possessing four key attributes: attractions, cultural heritage, local gastronomy, and accessibility of the destination. The city's appeal extends beyond seaside tourism, as its surrounding hills attract hikers and mountaineers. In addition to its rich cultural and historical heritage, including villas from the Habsburg era, Opatija's gastronomic offerings are a major draw for visitors. As one of the oldest destinations on the Adriatic coast, the city boasts restaurants serving authentic historical dishes. Opatija's medicinal climate and spa hotels contribute to physical well-being and stress reduction.

Pirot is renowned for its sheep's cheese and ironed sausages. Local restaurants offer a variety of regional specialties, and the town has seen a growth in gastronomic tourism through numerous events. Beyond its culinary delights, Pirot attracts foreign tourists with its rich cultural heritage and the nearby Stara Planina Nature Park, which offers opportunities for outdoor activities like waterfall and canyon exploration. The Stara Planina Hotel houses a wellness center. In the 2022 Gastro Tourism Handbook, Pirot was highlighted as a model for gastronomic tourism, earning the nickname "Little Jerusalem."

The Haut Plateau region's local development strategy combines heritage preservation and culinary promotion. The local population initiated a movement to highlight the region's heritage, particularly its culinary specialties (Bessière, 1998). Laguiola cheese, Aligot traditional dish, and La Fouace local dessert are some of the gastronomic delights for which the region is renowned. In addition to its rich culinary heritage, the French province boasts numerous castles, churches, and nature reserves, attracting tourists seeking cultural experiences and outdoor activities. Les Sources du Haut Plateau is a well-known wellness center with a traditional aesthetic. Bessière emphasizes the role of traditional food and cuisine in rural French areas as markers of identity and drivers of local tourism, promoting a balance between conservation and innovation in local development.

Research Methodology

The paper's initial hypothesis (H) posited that tourist motivations, driven by a rich gastronomic offer and diverse sports and recreational opportunities, contribute to the richness of wellness and spa rural destinations, making them indicators of sustainable development. Given the rural nature of these destinations, it is crucial to leverage both natural and human-made resources to transform potential into tourist attractions and enhance the wellness and spa tourism offerings.

The paper presents findings from two surveys, analyzed using factor analysis. The first survey, focusing on active and sports-recreational tourism, involved 243 respondents, who were the Sunce Hotel and Golden View Garni Hotel guests. The second survey, centered on gastronomy, included 287 guests of the Zelengora restaurant in Sokobanja. The researchers conducted both surveys during the summer months of June to September 2024, making multiple visits to Sokobanja.

To address the research questions "What significance do recreation and active tourism hold for tourists?" and "What type of gastronomy attracts tourists to destinations?", we established the following sub-hypotheses: Recreation and active tourism positively impact tourists' psychological and physical well-being. (h1) and Gastronomic offerings based on local products and traditional preparation methods can foster loyalty to tourist destinations. (h2)

The initial factor analysis yielded a model comprising two factors that categorized the respondents' responses into two dimensions:

- factor analysis 1 identified eight variables associated with the factor "relaxation of body and mind"

Relaxing the mind and body

Enjoying natural environment

Improving personal health/fitness

Staying physically active

Escaping from daily routine to be more productive

Increasing the level of self-confidence

Being with people of similar interests

Spending time with friends

- factor analysis 2 identified 11 variables associated with the factor "unique gastronomic experience"

Portions are generous

I like the quality of the served meat

The organoleptic properties of food satisfy all my senses

The food is real homemade

You can feel the spirit of the space and tradition

The food is traditional, prepared by the recipe that was once used, and you can feel it

Excellent dishes with local ingredients

The food fits the ambiance

The natural materials of the dishes in which the food is prepared and served contribute to the taste

Local music fits into the ambiance

Everything we eat can be traced from "field to table." It is priceless

Sokobanja (Serbia) is a prime example of a spa destination that prioritizes sustainable tourism development. Nestled along the Moravica River, between the mountains of Rtanj, Ozren, and Devica, Sokobanja has a rich history of therapeutic use, dating back to Roman and Turkish times. The first recorded instance of tourism dates to 1837. The town's significant anthropogenic attractions include Sokograd, the Trebič archaeological site, the Amam bath, the monastery of St. Archangel, Knez Miloš Inn, Latin City, and Seselac cave. The abundance of thermal mineral springs, favorable climate, mountainous terrain of Rtanj and Ozren, and strategic location within a valley have contributed to Sokobanja's development as a tourist destination. The region's natural assets, including canyons, caves, Bovan Lake, Vrmdža Lake, and the Moravica River, form the foundation of its tourism industry.

Zelengora restaurant, which has been operating since 2011, has a rich history dating back to 1967. The restaurant specializes in traditional dishes from the 20th century, including kačamak, ajvar, sač dishes, pies, sarma, and beans. A key aspect of Zelengora's approach is its commitment to sourcing ingredients from local producers. Trout is sourced from the Moravica River, dairy products come from a local dairy, and meat products are supplied by a 160-year-old butcher shop. Homemade rakija, crafted from locally sourced fruit, is a significant brand when it comes to spirits served in the restaurant. By prioritizing local food, Zelengora enhances the overall gastronomic experience for tourists.

The Sunce Hotel, initially opened in 1977, underwent renovation and reopened in 2020 following a challenging period of privatization. It boasts the largest accommodation capacity in Sokobanja and offers guests a range of wellness and spa treatments within its 1,300-square-meter wellness center. The Golden View, a high-category accommodation, opened its doors in 2023 and offers a more intimate setting.

Results and Discussion

Of the 243 respondents who participated in the research on active tourism, 144 (59.3%) were male, and 99 (40.7%) were female. The majority of respondents, 177 (72.8%), were from Serbia. Additionally, 30 respondents were from China (12.3%), 18 from Croatia (7.4%), nine from Slovenia (3.7%), and nine from Austria (3.7%). All respondents were guests of the Sunce and Golden View hotels in Sokobanja.

The first factor analysis (see Table 1) yielded a single factor model, explaining 55.165% of the variance. The variables with the highest factor loadings represent two distinct groups of respondent responses regarding the importance of recreation and active tourism.

Table 1. Total Variance Explained

Factor	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	6.620	55.165	55.165	6.370	53.081	53.081	4.266	35.552	35.552
2	1.637	13.643	68.808	.468	3.903	56.984	2.572	21.432	56.984
3	.807	6.726	75.535						
4	.664	5.531	81.066						
5	.622	5.183	86.249						
6	.496	4.132	90.381						
7	.457	3.807	94.188						
8	.210	1.747	95.935						
9	.154	1.287	97.222						
10	.127	1.058	98.281						
11	.116	.970	99.251						
12	.090	.749	100						

Source: Autor's research

Table 2 reveals strong loadings for eight variables, indicating a strong association with the "relaxation of body and mind" factor. Relaxation is a fundamental practice for stress reduction, achieving life harmony, improved sleep, and overall well-being. Knobloch et al. note that tourism experiences, beyond mere pleasure, have significant implications for well-being and quality of life, necessitating a deeper understanding. The results in Table 2 suggest that key motivations for visiting a destination include escaping routine for the sake of own productivity, socializing with friends, improving health and fitness, and boosting self-confidence. These motivations highlight tourists' desire for vacations that enhance their overall well-being. Consequently, the future of spa tourism lies in developing offerings that integrate wellness, spa, and recreational activities.

Table 2. Factor Matrix

	Factor			
	1	2		
V1	.765	283		
V2	.882	.297		
V3	.915	.128		
V4	.710	001		
V5	.928	155		
V6	.907	214		
V7	.824	.360		
V8	.918	118		
V9	629	.124		
V10	188	.227		
V11	.097	.022		
V12	136	.055		

Source: Autor's research

Today, tourists seek destinations offering diverse recreational experiences. Sokobanja is well-positioned to cater to these desires. The surrounding areas are ideal for both recreational and professional cycling. Adventure enthusiasts can indulge in adrenaline-pumping activities such as scuba diving, mountain biking, free-climbing, orienteering, diving, paragliding, sailing on Bovan Lake, kayaking, and exploring Rtanjska Lednica. The surrounding mountains present challenges for recreational and professional alpinists alike. These activities align with the motivations of tourists seeking to improve their health and fitness. Additionally, Sokobanja offers wellness and spa treatments, as well as an aqua park during the summer months, catering to those seeking relaxation and stress relief. In recent years, rural tourism has gained momentum in Sokobanja. Villages like Vrmdža, Resnik, Trubarevac, Mužinac, Žučkovac, Šarbanovac, and Jošanica have revitalized old accommodations and built new ones to provide comfortable stays. These villages preserve traditions, crafts, and culinary heritage, offering tourists the opportunity to participate in daily life and enjoy the tranquility of the countryside. This type of tourism appeals to those seeking social interaction and immersion in nature, as indicated in Table 3.

Table 3. Descriptive Statistics

	N	Minimum	Maximum	Mean		Std. Deviation	Variance
	Statistic	Statistic	Statistic	Statistic	Std. Error	Statistic	Statistic
Relaxing the mind and body	243	1	5	4.25	.059	.922	.850
Enjoying natural environment	243	1	5	4.33	.052	.816	.667
Improve personal health/fitness	243	1	5	4.28	.058	.906	.820
Staying physically active	243	1	5	4.30	.053	.820	.672
Escaping from daily routine to be more productive	243	1	5	4.30	.056	.871	.758
Increasing the level of self- confidence	243	1	5	4.27	.059	.917	.841
Being with people of similar interests	243	1	5	4.37	.048	.741	.549
Spending time with friends	243	1	5	4.28	.058	.903	.816
Valid N (listwise)	243						

Source: Autor's research

Of the 287 respondents who participated in the research on gastronomy, 147 (51.2%) were male, and 140 (48.8%) were female. The majority of respondents, 217 (75.6%), were from Serbia. Additionally, 25 respondents were from Slovenia (8.7%), 17 from Italy (5.9%), and 12 from the Czech Republic (4.2%). All respondents were guests of the Zelengora restaurant in Sokobanja.

The second factor analysis (see Table 4) also yielded a single-factor model, explaining 80.099% of the variance. The variables with the highest factor loadings were related to the question of whether gastronomy is a primary motivator for visiting the destination.

Table 4. Total Variance Explained

Factor	Initial Eigenvalues			Extr	action Sums Loading		Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	9.612	80.099	80.099	9.404	78.367	78.367	9.156	76.301	76.301
2	1.018	8.486	88.586	.481	4.006	82.374	.729	6.073	82.374
3	.646	5.382	93.967			ĺ			
4	.269	2.239	96.207						
5	.111	.921	97.128			Ì			
6	.110	.916	98.044			Ì			ĺ
7	.086	.715	98.759			Ì			
8	.061	.505	99.264			Ì			
9	.034	.280	99.544						
10	.025	.207	99.751			İ			
11	.020	.169	99.920			İ			
12	.010	.080	100						

Source: Autor's research

Table 5 reveals strong loadings for 11 variables, indicating a strong association with the "unique gastronomic experience" factor. The variables with the highest factor loadings represent distinct groups of respondents' responses related to the survey.

Table 5. Factor Matrix

	Factor			
	1	2		
V1	.983	142		
V2	.924	094		
V3	.873	096		
V4	.913	.302		
V5	.882	078		
V6	.931	.303		
V7	.952	157		
V8	.870	110		
V9	.899	.306		
V10	.981	164		
V11	.954	.271		
V12	011	151		

Source: Autor's research

Based on the ratings for all 11 variables, we can conclude that respondents associate unique gastronomic experiences with destinations that preserve tradition and local

culture and utilize local products, offering a full experience. Sokobanja, with its rich history, offers a glimpse into its past. The region's Roman and Turkish influences are reflected in its culinary traditions. Tourists can savor dishes like "Turkish coffee" and "baklava," with names referring to past periods, but prepared according to local methods and customs. Today, Sokobanja distinguishes itself from similar destinations by offering a diverse range of gastronomic specialties across various local restaurants. Nikolić and Stanković highlight the historical significance of taverns in the region, dating back to 1837. Modern-day restaurants cater to tourists' desires for large portions, high-quality, organic, and homemade food prepared using traditional recipes (Table 6). The preserved historical ambiance and ethnic culture of Sokobanja, combined with its proximity to rural areas, contribute to the authenticity of its culinary offerings. Local sourcing of ingredients enables restaurants to provide genuine homemade dishes while also promoting rural development and generating income for agriculture. This synergy between urban and rural elements fosters a sustainable tourism model.

Table 6. Descriptive Statistics

	N	Minimum	Maximum	Mean	Std. Deviation	Variance
Portions are generous	287	3	5	3,97	,775	,601
I like the quality of the served meat	287	3	5	4,02	,773	,597
The organoleptic properties of food satisfy all my senses	287	3	5	4,06	,777	,604
The food is homemade	287	3	5	4,08	,791	,626
You can feel the spirit of the space and tradition	287	3	5	4,06	,775	,601
The food is traditional, prepared by the recipe that was once used, and you can feel it	287	3	5	4,06	,786	,618
Excellent dishes with local ingredients	287	3	5	4,01	,789	,622
The food fits the ambiance	287	3	5	4,06	,773	,597
The natural materials of the dishes in which the food is prepared and served contribute to the taste	287	3	5	4,10	,796	,634
Local music fits into the ambiance	287	3	5	3,99	,766	,587
Everything we eat can be traced from "field to table". It is priceless	287	3	5	4,05	,785	,616
Valid N (listwise)	287					

Source: Autor's research

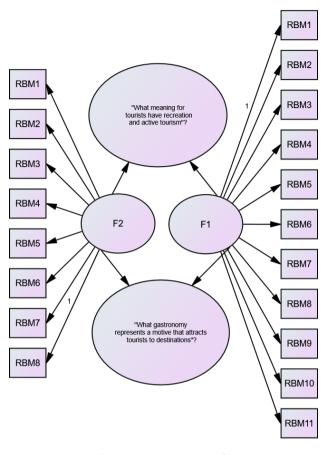


Figure 1. Interdependence of variables. Source: prepared by the authors (2024).

Source: Autor's research

The Figure 1 indicate that recreation and active tourism are significant for tourists primarily due to their association with relaxation of body and mind, as evidenced by strong correlations with eight specific variables (F2). Additionally, unique gastronomic experiences attract tourists to destinations, highlighted by strong associations with eleven distinct variables (F1). This indicates that both relaxation and culinary offerings play crucial roles in enhancing the tourist experience.

Gastronomic experiences significantly impact tourist satisfaction and loyalty, serving as a key motivator for travel decisions (Mora et al., 2021). The integration of food, culture, history, and environment in gastronomic tourism experiences influences consumer choices and contributes to sustainable rural development in wellness and spa tourism. Research suggests that unique gastronomic experiences, offering authentic, unforgettable, and culturally immersive food encounters, significantly impact destination choice, satisfaction, and loyalty. The interconnectedness of recreation and gastronomy positively impacts tourists' physical and mental well-being, fostering

loyalty to the destination. The research findings highlight the numerous benefits of active, gastronomic, wellness, and spa tourism in Sokobanja. However, to remain competitive in the tourism industry, Sokobanja must adapt to emerging trends by prioritizing recreation and gastronomy as key indicators of sustainable development.

Conclusion

The paper discusses the impact of various factors on tourist well-being, particularly in the context of spa tourism in Serbia, which has evolved to include modern wellness concepts and gastronomic experiences. It highlights the growing demand for destinations that offer a blend of traditional spa services, outdoor activities, and local culinary delights, emphasizing the importance of gastronomy in attracting tourists and enhancing their overall experience. Case studies from regions like Istria, Opatija, and Pirot illustrate how local communities can leverage their culinary heritage and natural resources to promote sustainable tourism development, ultimately contributing to the psychological and physical well-being of visitors.

The research on active tourism in Sokobanja involved 243 respondents, predominantly from Serbia, and revealed that relaxation and well-being are key motivations for visiting the area. The findings indicate that tourists are increasingly seeking diverse recreational experiences, such as cycling, adventure sports, and wellness treatments, which align with their desire for improved health and fitness. Additionally, a separate study on gastronomy highlighted the importance of unique culinary experiences tied to local culture and tradition, suggesting that Sokobanja's rich gastronomic offerings significantly enhance tourist satisfaction and loyalty, ultimately contributing to sustainable tourism development in the region.

Sustainable tourism seeks to preserve natural and cultural heritage while fostering local economic growth. While other forms of tourism exist in modern spa centers, the rise of gastronomic and active tourism offers a sustainable approach. These types of tourism contribute to destination development without negatively impacting the environment. Sokobanja's Tourism Development Program (2023-2027) reflects this shift, emphasizing a pristine environment suitable for relaxation through wellness treatments and specific gastronomic experiences (Tomić et al., 2020). This study examines the potential synergy between gastronomic and active tourism, hypothesizing that these two types of tourism can complement each other to create a more attractive offering for a wider range of tourists. Our findings confirm this hypothesis. Tourists engaging in sports and recreational activities also prioritize local dining experiences, highlighting the importance of a robust gastronomic offering in such destinations.

Our findings indicate that recreation and active tourism positively impact visitors' physical and mental well-being. Moreover, a gastronomic offering centered around local products and traditional preparation methods attracts a larger tourist base. This combination of tourism types fosters a sense of loyalty among visitors. The research underscores several key tourist elements of Sokobanja, including its rich wellness

and spa programs. In addition to relaxation, the destination offers opportunities for adrenaline sports, nature walks, and visits to waterfalls, rivers, and lakes. To capitalize on these strengths, the local population should continue to preserve their cultural identity through gastronomic specialties, sourcing local ingredients, and maintaining traditional preparation and serving methods. Sokobanja possesses significant anthropogenic and natural resources, making it well-suited for sustainable tourism development.

Active and gastronomic tourism can drive sustainable development. Sustainable food tourism supports local agriculture and economic growth while offering tourists opportunities to connect with local culture and traditions. Sustainable active tourism promotes healthier lifestyles and active aging for tourists while enabling local communities to develop tourism aligned with their values and aspirations. The synergy between these two forms of tourism benefits both visitors and residents. Future research should involve surveying residents to gauge their perspectives on the importance of gastronomy and recreational tourism. Educating the local population about the benefits of this type of development is crucial. The ultimate goal of developing this kind of tourism is to foster a healthy environment and cultivate loyalty among tourists.

Acknowledgements

Paper is a part of research financed by the MSTDI RS, agreed in decision no. 451-03-136/2025-03/200009 from 4.2.2025.

Conflict of interests

The authors declare no conflict of interest.

References

- Alexander, R.R., Aragón, R.O., Bookwala, J., Cherbuin, N., Gatt, M.J., Kahrilas, I.J., Kästner, N., Lawrence, A., Lowe, L., Morrison, G.R., Mueller, C.S., Nusslock, Rr., Papadelis, C., Kelly L., Polnaszek, S., Richter, H., Silton, L.R. & Styliadis, C. (2021). The neuroscience of positive emotions and affect: Implications for cultivating happiness and well-being. *Neuroscience & Biobehavioral Reviews*, 121, 220-249, https://doi.org/10.1016/j.neubiorev.2020.12.002.
- 2. Arsić, M., Vujko, A., & Knežević, M. (2024). Development Perspectives on Wellness and Spa Tourism in the Context of Tourism Business Sustainability. *Sustainability*, 16, 8760. https://doi.org/10.3390/su16208760.
- 3. Balderas-Cejudo, I., Patterson, G., Leeson, W. (2019). Senior Foodies: A developing niche market in gastronomic tourism. *International Journal of Gastronomy and Food Science*, 16, 100152, https://doi.org/10.1016/j.ijgfs.2019.100152.
- 4. Bastenegar, M. (2019). From Gastronomy Tourism to Creative and Sustainable Tourism of Gastronomy Case Study: 30 Tir Street Food in Tehran. *MANZAR*. *the Scientific Journal of landscape*, 11(49), 26-37. https://doi.org/10.22034/manzar.2019.199092.1993

- 5. Bell, S., Tyrväinen, L., Sievänen, T., Pröbstl, U., & Simpson, M. (2007). Outdoor Recreation and Nature Tourism: A European Perspective. *Living Reviews in Landscape Research*, 1. https://doi.org/10.12942/LRLR-2007-2.
- 6. Bessière, J. (1998). Local Development and Heritage: Traditional Food and Cuisine as Tourist Attractions in Rural Areas. *Sociologia Ruralis*, 38, 21-34. https://doi.org/10.1111/1467-9523.00061.
- 7. Bjelić, K., Vujko, A., & Panić, A. (2024). Comparative analysis of the tourist destinations competitiveness in function to improve the tourist offer Kranjska Gora and Zlatibor case study. *The European Journal of Applied Economics*, 21(2), 88 106, https://10.5937/EJAE21-50045,
- 8. Bojović, P., Vujko, A., Knežević, M., & Bojović, R. (2024). Sustainable approach to the development of the tourism sector in the conditions of global challenges. *Sustainability*, 16(5), 2098. https://doi.org/10.3390/su16052098,
- 9. Colas, C., Hodaj, E., Pichot, V., Roche, F., & Cracowski, C. (2024). Impact of spa therapy on physical activity, sleep and heart rate variability among individuals with fibromyalgia: Results of an ancillary study. *Complementary Therapies in Clinical Practice*, 57, 101879, https://doi.org/10.1016/j.ctcp.2024.101879.
- 10. Dimitrovski, D., & Todorović, A. (2015). Clustering wellness tourists in spa environment. *Tourism Management Perspectives*, 16, 259-265, https://doi.org/10.1016/j.tmp.2015.09.004.
- 11. Djordjevic-Milosevic, S., & Milovanovic, J. (2012). *Održivi turizam u funkciji ruralnog razvoja: Mala poljoprivredna gazdinstva i ruralni turizam u Srbiji*. Izdavač: Fakultet za primenjenu ekologiju Futura, Univerzitet Singidunum, Beograd; Agroznanje, Vršac; FAO, Budimpešta. https://doi.org/10.13140/2.1.4392.8326.
- 12. Fernández-Gámez, A.M., Rosales-Pérez, A., Molina-Gómez, J. & Mora-Lucena, L. (2018). The effects of outdoor training on the development of emotional intelligence among undergraduate tourism students. *Journal of Hospitality, Leisure, Sport & Tourism Education*, 23, 39-49, https://doi.org/10.1016/j.jhlste.2018.06.001.
- 13. Gyasi, M.R., Accam, T.B., Forkuor, D., Marfo, O.C., Adjakloe, D.A.Y., Abass, K., Donne, A., Boampong, S.M. & Adam, M.A. (2023). Emotional and physical-related experiences as potential mechanisms linking physical activity and happiness: Evidence from the Ghana Aging, Health, Psychological Well-being, and Health-seeking Behavior Study. *Archives of Psychiatric Nursing*, 42, 113-121, https://doi.org/10.1016/j.apnu.2022.12.023.
- 14. Hanna, P., Wijesinghe, S., Paliatsos, I., Walker, C., Adams, M., & Kimbu, A. (2019). Active engagement with nature: outdoor adventure tourism, sustainability and well-being. *Journal of Sustainable Tourism*, 27, 1355 1373. https://www.tandfonline.com/doi/full/10.1080/09669582.2019.1621883
- 15. Hjalager, A. M. & Richards, G. (Eds.). (2003). *Tourism and gastronomy*. London: Routledge. https://mint.gov.hr/UserDocsImages/2023_dokumenti/230614_prirucnik_gastro_t.pdf

- 16. https://sokobanja.rs/aktivnosti/eko-turizam/ (pristup: 15.08.2024)
- 17. Juan, M., Berbel-Pineda, B., Palacios-Florencio, J., Ramírez-Hurtado, M., Santos-Roldán, L. (2019). Gastronomic experience as a factor of motivation in the tourist movements. *International Journal of Gastronomy and Food Science*, 18, 100171, https://doi.org/10.1016/j.ijgfs.2019.100171.
- 18. Jurišić, M. (2024). *Specifičnosti ruralnog turizma u Republici Hrvatskoj i komparacija s određenim turističkim odredištima*. Zbornik radova 4. međunarodna znanstveno-stručna konferencija za razvoj ruralnog turizma "Holistički pristup razvoju studijskih programa menadžmenta i turizma", Zagreb: Vimal Akademija, str. 44-56.
- 19. Kim, J.M. & Hall, M.C. (2022). Does active transport create a win-win situation for environmental and human health? The moderating effect of leisure and tourism activity. *Journal of Hospitality and Tourism Management*, 52, 487-498, https://doi.org/10.1016/j.jhtm.2022.08.007.
- 20. Knobloch, U., Robertson, K., & Aitken, R., (2017). Experience, Emotion, and Eudaimonia: A Consideration of Tourist Experiences and Well-being. *Journal of Travel Research*, 56, 651 662. https://doi.org/10.1177/0047287516650937.
- 21. Koščak, M., & O'Rourke, T. (Eds.). (2023). *Ethical and Responsible Tourism: Managing Sustainability in Local Tourism Destinations* (2nd ed.). Routledge. https://doi.org/10.4324/9781003358688
- 22. Krunić, N., Stojmenović, G., & Kukolj, S. (2023). The role and significance of audit sampling in the modern enterprise. *Oditor*, 9(1), 1-16. https://doi.org/10.5937/Oditor2301001K
- 23. Ladkin, A., Hemingway, A. & Crossen-White, H. (2021). Health, active ageing and tourism. *Annals of Tourism Research Empirical Insights*, 2(2), 100030, https://doi.org/10.1016/j.annale.2021.100030.
- 24. Lakićević, M., Pantović, D., & Fedajev, A. (2024). Investigating Factors of Customer Loyalty Formation for Wellness Spa. *Management:Journal of Sustainable Business and Management Solutions in Emerging Economies*, 29(1), 53–62. https://doi.org/10.7595/management.fon.2021.0031
- 25. Miletić, R., Pantović, D., & Veliverronena, L. (2023). Dark tourism in Serbia: Case study of the Kragujevački oktobar Memorial Park. *Hotel and Tourism Management*, 11(1), 127–144. https://doi.org/10.5937/menhottur2301127M
- 26. Milanović, V., Bučalina Matić, A., & Jurčić, A. (2023). The internal green marketing dimensions, employees' satisfaction, and employees' organizational identification. *Oditor*, *9*(1), 47-70. https://doi.org/10.5937/Oditor2301047M
- 27. Milojević, I., Mihajlović, M., & Pantić, N. (2020). Collection and documentation of audit evidence. *Oditor*, 6(2), 77-90. https://doi.org/10.5937/Oditor2002077M

- 28. Mora, D., Solano-Sánchez, M., López-Guzmán, T., & Moral-Cuadra, S., (2021). Gastronomic experiences as a key element in the development of a tourist destination. *International Journal of Gastronomy and Food Science*, 25, 100405. https://doi.org/10.1016/J.IJGFS.2021.100405.
- 29. Nikolic, Lj., & Stankovic, S. (2008). *Sokobanja 1837-2007*, Soko Banja: Organization for Tourism, Culture and Sport.
- 30. Pyo, S. (2005). Knowledge map for tourist destinations needs and implications. *Tourism Management*, 26(4), 583-594, https://doi.org/10.1016/j. tourman.2004.03.001.
- 31. Panić, A., Vujko, A., & Knežević, M. (2024): Rural tourism impact on the life quality of the local community: a case study of Western Serbia. Economic of Agriculture, 71(3), 733–753. https://doi.org/10.59267/ekoPolj2403733P
- 32. Pantovic, D. ., Parausic, V. ., Radosavljevic, K. ., & Mihailovic, B. . (2025). Rural tourism and local authority satisfaction: Social, economic, and environmental effects . *Journal of Tourism Management Research*, 12(1), 17–26. https://doi.org/10.18488/31.v12i1.4088
- 33. Pantović, D., Vasović, N., & Mura, L. (2023). Bibliometric analysis of contemporary trends in cultural tourism. *Anali Ekonomskog fakulteta u Subotici*, 59(49), 85-97.
- 34. Rangus, M., Petek, V., & Gačnik, A. (2023). Sustainable gastronomy tourism as a tool of local development—the case of the Posavje region. InM. Koščak & T. O'Rourke (Eds.), Ethical and Responsible Tourism (pp. 472-484). Routledge. https://doi.org/10.4324/9781003358688
- 35. Reitsamer, B., & Brunner-Sperdin, A. (2017). Tourist destination perception and well-being. Journal of Vacation Marketing, 23, 55 72. https://doi.org/10.1177/1356766715615914.
- 36. Seyitoğlu, F., & Ivanov, S., (2020). A conceptual study of the strategic role of gastronomy in tourism destinations. *International Journal of Gastronomy and Food Science*. https://doi.org/10.31235/osf.io/e9za6.
- 37. Santiago, K., Yanes, A., & Mercado-Caruso, N. (2024). Analyzing Correlations in Sustainable Tourism Perception: Statistical Insights from Diverse Caribbean Colombian Tourist Sites. *Procedia Computer Science*, 231, 490-495, https://doi.org/10.1016/j.procs.2023.12.239.
- 38. Tomić N., & Košić K., (2020). Developing the Spa Assessment Model (SAM) and its application on the Kopaonik-Jastrebac spa zone (Serbia), *Tourism Management Perspectives*, 36, 100753, https://doi.org/10.1016/j.tmp.2020.100753.
- 39. Vodeb, K., & Nemec Rudež, H. (2017). Which attributes are important to tourists in a mature seaside destination? A case of Opatija in Croatia. *Tourism: An international Interdisciplinary Journal*, 65, 267-269.

- 40. Vujko, A., Cvijanović, D., & Berjan, S. (2024). *Gastronomija kao indikator održivog razvoja ruralnog turizma*. Fakultet za turizam i hotelijerstvo u Vrnjačkoj banji, Univerzitet u Kragujevcu, ISBN: 978-86-89949-84-1, UDK: 338.48-44(1-22):502.131.1641.5, COBISS.SR-ID: 153656329, Str. 280.
- 41. Vujko, A., & Delić Jović, M. (2024). *Posebni oblici turizma u funkciji održivog razvoja ruralnih destinacija*. Fakultet za turistički i hotelijerski menadžment, Univerzitet za poslovne studije, Banja Luka. Naučna monografija. ISBN 978-99955-95-36-4, COBISS.SR-ID 140204289, str. 176.
- 42. Vučićević, S., Vujko, A., & Knežević, M. (2024). The role of cycling tourism in the function of sustainable development of Arilje. *BizInfo*, 15(2), 1-10 https://bizinfo.edu.rs/index.php/bizinfo/article/view/346/284
- 43. Weber, K. (2001). Outdoor adventure tourism a review of research approaches. *Annals of Tourism Research*, 28(2), 360–377.
- 44. Winter, P., Selin, S., Cerveny, L., & Bricker, K. (2019). Outdoor Recreation, Nature Based Tourism, and Sustainability. *Sustainability*. 12(1), 81; https://doi.org/10.3390/su12010081
- 45. Zhu, D., & Xu, H. (2022). Novice tourists' play experience in commercial outdoor adventure tourism: The perspective of reversal theory. *Journal of Outdoor Recreation and Tourism*, 39, 100529, https://doi.org/10.1016/j.jort.2022.100529.