

THE ROLE OF LOCAL RESOURCES IN SHAPING ECONOMIC DEVELOPMENT: MOUNTAIN AREA OF BIHOR COUNTY

Rebeca Claudia CHIRILA ¹, Ramona Vasilica BACTER ², Iulia Cristina MUREȘAN ¹

¹ University of Agricultural Sciences and Veterinary Medicine Cluj-Napoca, Mănăstur St. no 3-5, 400372, Cluj-Napoca, Cluj, Romania

² University of Oradea, Faculty of Environmental Protection, Street b-dul Gen Magheru, no.26, Oradea, Romania

RESEARCH ARTICLE

Abstract

Local resources play a fundamental role in the economic development of mountain regions, providing opportunities for sustainable growth, employment creation, and territorial competitiveness. The mountain area of Bihor County, located within the Apuseni Mountains, possesses a rich diversity of natural, agricultural, forestry, mineral, tourism, and cultural resources. These endogenous assets have historically shaped local economic activities and continue to influence development prospects. This paper examines the contribution of local resources to economic development in the mountain area of Bihor County. Based on statistical information, development strategies, and recent scientific literature, the study analyzes the economic importance of forestry, agriculture, tourism, mineral resources, renewable energy potential, and human capital.

Keywords: local resources, economic development, mountain area, Bihor County, rural economy

#Corresponding author: Chirilă Rebeca-Claudia

INTRODUCTION

Mountain regions throughout Europe are characterized by significant natural and cultural resources, but also by structural disadvantages related to accessibility, demographic decline, and limited economic diversification (Masot & Gascon, 2021). Despite these constraints, local resources represent important development assets capable of generating economic growth, employment opportunities, and improved living conditions when managed sustainably (OECD, 2020).

The mountain area of Bihor County is located in the western part of Romania, within the Apuseni Mountains, and comprises numerous rural communities characterized by rich natural landscapes, forests, agricultural land, mineral deposits, and valuable cultural heritage. These resources have historically influenced local economic activities, particularly forestry, livestock farming, mining, and traditional craftsmanship (Sima, 2020).

In recent decades, significant socio-economic transformations have affected mountain communities throughout Romania. Population ageing, migration of young people toward urban centers, and the decline of traditional industries have reduced economic dynamism in many rural areas (Shucksmith, 2018). At the same time, increasing interest in sustainable tourism, renewable energy, local food production, and environmental

conservation has created new opportunities for mountain economies (European Commission, 2021).

The concept of endogenous development emphasizes the importance of utilizing local resources and territorial specificities as drivers of economic growth (OECD, 2019). Rather than relying solely on external investments, local development strategies seek to capitalize on existing natural, human, and cultural capital to generate sustainable economic benefits. This approach is particularly relevant for mountain areas, where local resources often constitute the main comparative advantage (Perlik, 2019).

Bihor County's mountain area possesses considerable economic potential due to its extensive forests, traditional agricultural systems, protected natural areas, caves, waterfalls, mineral resources, and cultural heritage. Tourism destinations such as Padiș, Stâna de Vale, Vadu Crișului, and the Apuseni Natural Park attract increasing numbers of visitors each year and contribute to local income generation (Popescu et al., 2024). Furthermore, traditional products, forestry activities, and renewable energy resources offer additional opportunities for economic diversification.

The objective of this study is to analyze the role of local resources in shaping economic development in the mountain area of Bihor

County and to identify opportunities for their sustainable valorization.

MATERIALS AND METHODS

Bihor County is located in north-western Romania, on the border with Hungary, and has a total area of 7,544 km². Approximately 40% of its territory lies in the Apuseni Mountains, forming the rural mountain area analyzed in this paper. This area includes 36 communes with predominantly rural character, dispersed settlements and significant forest and pasture land.

The population of Bihor County was about 565,000 in 2022, with an urbanization rate of roughly 51%. The mountain communes concentrate an estimated 100,000 inhabitants (around 18% of the county population), but they account for a much larger share of the land area.

The research focuses on the mountain communes located predominantly within the Apuseni Mountains. Data were collected from the National Institute of Statistics (INSSE), county development strategies, reports issued by the Ministry of Agriculture and Rural Development, and relevant scientific literature concerning rural and mountain development.

The analysis examines several categories of local resources:

- Forest resources;
- Agricultural and pastoral resources;
- Mineral resources;
- Tourism resources;
- Renewable energy resources;
- Human and cultural resources.

The methodological approach is descriptive and comparative, combining statistical analysis with the interpretation of secondary data obtained from official documents and academic studies. The study period covers approximately 2014–2024, depending on data availability.

RESULTS AND DISCUSSIONS

Forests represent one of the most important natural resources of the mountain area of Bihor County. Forested land covers a substantial proportion of the territory, particularly in communes situated near the Apuseni Natural Park. Forestry activities contribute significantly to local employment through timber harvesting, wood processing,

furniture production, and the commercialization of non-timber forest products (Perlik, 2019).

In addition to economic benefits, forests provide ecosystem services such as biodiversity conservation, carbon sequestration, soil protection, and water regulation. Sustainable forest management is therefore essential for balancing economic development with environmental protection (Masot & Gascon, 2021).

Agriculture remains an important component of the mountain economy. The predominance of grasslands and mountain meadows favors livestock farming, particularly cattle and sheep breeding. Traditional agricultural systems contribute not only to food production but also to landscape conservation and biodiversity maintenance (Sima, 2020).

Local products such as mountain cheese, honey, meat products, medicinal plants, and berries possess considerable market potential. The growing demand for organic and traditional foods creates opportunities for the development of short supply chains and regional branding initiatives (OECD, 2019).

Tourism has become one of the most dynamic sectors in the mountain area of Bihor County. The region benefits from exceptional natural attractions, including caves, waterfalls, gorges, forests, and protected areas. Destinations such as Padiș Plateau, Bear Cave, Meziad Cave, and Stâna de Vale attract domestic and international visitors annually (Popescu et al., 2024).

Tourism generates income through accommodation services, restaurants, transportation, guiding activities, and the sale of local products. Furthermore, tourism contributes to the preservation of local traditions and cultural heritage while stimulating investments in infrastructure and public services (Hoha & Simeanu, 2025).

Historically, mining represented an important economic activity in several mountain communities. Deposits of bauxite, limestone, and other minerals contributed significantly to local employment during the twentieth century. Although mining activities have declined considerably, mineral resources continue to support construction-related industries and local economic activities (MADR & World Bank, 2023).

Table 1

Economic contribution of local resources in the mountain area of Bihor County (2024)

Resource category	Main economic activities	Estimated contribution (%)
Forestry	Timber harvesting, wood processing	28
Agriculture and livestock	Dairy production, meat production, beekeeping	24
Tourism	Accommodation, food services, recreation	22
Mineral resources	Construction materials, quarrying	8
Renewable energy	Biomass, hydropower	6
Crafts and cultural services	Traditional products and handicrafts	5
Other services	Trade and local services	7

Source: own elaboration based on local development reports and INSSE statistics.

The mountain area possesses favorable conditions for renewable energy production. Extensive forest resources provide biomass potential, while mountain rivers offer opportunities for small hydropower projects. Increasing investments in renewable energy can contribute to economic diversification and support the transition toward a green economy (European Commission, 2021).

Human capital represents an essential resource for local development. Traditional knowledge, craftsmanship, cultural events, and local entrepreneurship contribute to the preservation of regional identity and support economic activities linked to tourism and local production (Shucksmith, 2018).

However, demographic decline and population ageing remain major challenges. Many mountain communes experience out-migration of young people, reducing the availability of skilled labor and limiting entrepreneurial capacity. Investments in education, training, and digital infrastructure are therefore necessary to strengthen local human resources (OECD, 2020).

CONCLUSIONS

The mountain area of Bihor County possesses a diverse portfolio of local resources that significantly influence economic development. Forests, agricultural land, tourism attractions, mineral resources, renewable energy potential, and cultural heritage constitute valuable assets capable of supporting sustainable growth.

The analysis demonstrates that tourism and forestry currently represent the most important economic sectors, while agriculture continues to provide livelihoods for many rural

households. At the same time, renewable energy and value-added local products offer opportunities for future economic diversification.

Despite these strengths, the region faces important challenges related to demographic decline, ageing populations, limited accessibility, and insufficient economic diversification. Consequently, development strategies should focus on the integrated valorization of local resources through sustainable resource management, support for entrepreneurship, investment in infrastructure, promotion of local products, and enhancement of tourism services.

The sustainable utilization of local resources can contribute to increasing employment, improving living standards, reducing territorial disparities, and strengthening the economic resilience of mountain communities in Bihor County.

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