



Analysis of Sources and Barriers to Livelihood in Motichoor Range- A Case Study of Raja Ji National Park in Uttarakhand

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ABSTRACT

Raja Ji National Park is a tiger reserve in the Indian state called Uttarakhand. In the middle of the lush, green expanse of this protected region, there is a human dimension that is deeply ingrained in the surroundings of the park. Communities living close to Raja Ji National Park rely on the park's natural resources for their livelihoods, which prevents a complex interaction between conservation efforts, sustainable resource use, and the difficulties experienced by locals. This study is done with primary data from 45 residents out of 106 (According to a survey in 2011) living in the Motichoor range. In this study, we will analyze sources and Barriers to Livelihood in the Motichoor Range and examine the challenges faced by the residents in this Range.

Keywords: livelihood, policies, sources, barriers, motichoor range, respondents

INTRODUCTION

Raja Ji National Park settled within the beautiful foothills of Shivalik run in Uttarakhand, India presents a one-of-a-kind embroidered artwork of biodiversity and human settlements. Understanding the complexities of jobs close to Raja Ji National Park requires a multifaceted investigation enveloping environment, socio-economic, and approach measurements. In this detailed clarification, we are going to dive into the heap angle that shaped vocations within the region of this eminent national park.

At the heart of the job, close to Raja Ji National Park lies a sensitive adjustment between preservation goals and the food needs of neighborhood communities. The park traversing over 820 square kilometers, serves as a crucial territory for differing vegetation and fauna, including grand elephants, tigers, panthers, and various avian species. Its wealthy biodiversity pulls in visitors from around the globe, contributing to the nearby economy through nature-based tourism. In any case, this deluge of guests moreover brings challenges such as territory unsettling influence and wildlife-human classes, which can affect both jobs and preservation endeavors.

In expansion to farming, ranger service plays a significant part within the vocations of communities close to Raja Ji National Park. The woodlands abutting the park give important assets such as Timber, fuelwood, and non-timber timberland items (NTFPs) like restorative herbs and wild natural products. Forest-dependent communities depend on these assets for their subsistence and salary era. In any case, unsustainable gathering homes and infringement pose dangers to the environmental keenness of the timberlands, jeopardizing both jobs and biodiversity preservation. Endeavors to advance maintainable timberland administrator and elective business alternatives are basic for tending to these challenges.

Animal raising is another significant business action within the locale encompassing Raja Ji National Park. Numerous family units claim cattle, buffaloes, goats, and sheep, which contribute to their jobs through drain generation, meat, and draft control. Be that as it

may, brushing weight can cause strain on the park's delicate biological system, driving to living space debasement and clashes with natural life. Feasible brushing and clashes with natural life. Feasible brushing hones and community-based preservation activities can help moderate these clashes while supporting the employment of peaceful communities.

Tourism speaks to a developing financial opportunity for communities close to Raja Ji National Park. The park's picturesque magnificence and different natural life and experience exercises pull in sightless looking for nature-based encounters. Nearby inhabitants capitalize on this request by advertising convenience-guided visits, and other neighborliness administration. However, the benefits of tourism are regularly unevenly disseminated, with marginalized communities missing openings and continuing uprooting due to tourism improvement ventures. Maintainable tourism hones that prioritize community inclusion and evenhanded benefit-sharing are fundamental for guaranteeing that tourism contributes emphatically to jobs and preservation.

In conclusion, business close to Raja Ji National Park is unpredictably entwined with preservation, farming, range service tourism, and socio-economic components. Adjusting the desires of neighborhood communities with biodiversity preservation objectives requires an encompassing approach that addresses human-wildlife clashes, advances economical vocation choices, and cultivates communicating cooperation in decision-making forms. By grasping standards of economic development and equitable asset administration, we can guarantee that vocations flourish while shielding the common legacy of this biologically critical scene.

REVIEW OF LITERATURE

- **MM Meilani, R Thwaites, D Race, W Andayani, L R W Faida, A Maryudi, "Finding alternatives of Livelihood sources for forest-dependent communities in protected areas: a case study of Sebangau National Park, Central Kalimantan Province, Indonesia"** This study evaluates the impacts of the establishment of Sebangau National Park in Indonesia on local people's livelihoods. This study shows that the establishment of the park changes the livelihood strategies of local communities. People shifted their livelihood sources from forest resource extractions, particularly logging, to agriculture (farming and fishing). Some strategies to maintain and improve the livelihoods of local communities within the restrictive regulations of SNP management include- 1. Regulating the collection of non—timber forest forest products so that it would not threaten the ecological balance of the forests; 2. Developing agroforestry system' 3. Involving local communities in the rehabilitation programs within the rehabilitation zone; 4. Developing ecotourism; and 5. Involving in communities in the REDD+ program prepared by SNP.
- **Mati Amano Geleto, Gerald Kapp & Elamin Sanjak (2023), "Coping with local peoples' livelihood dependence on the transboundary Dinder- Alatish National Parks in Sudan and Ethiopia from the Sudanese Perspectives"** Our study attempted to answer major questions about the main livelihood strategies, their economic and conservation implications as well as the perceptions of local people and park administration on the use and management of the park and cooperation of TBPA management. Further human activities in the area are compiled from different publications and annual reports. Agricultural expansion into the park and livestock trespassing are the major threats to Dinder and neighboring Alatish National Park. A cooperative transboundary response will be helpful to cope with these challenges.
- **Louis Nkembi, Njukend Jetro Nkengafac and Ngulefack Ernest Forghab (2022), "Assessment of livelihood activities for conservation management in the Deng Deng National Park- Belabo Council Forest Conservation Corridor, East Region of Cameroon"** This study was set out to assess the different livelihood activities carried out in communities located in the corridor between the Deng Deng National Park and the Belabo Council Forest. This assessment was a giant step towards the planning for effective conservation of biodiversity in the corridor. To achieve this, a household survey was conducted using the simple random sampling technique where each household was given an equal opportunity of being chosen to take part in the survey. Surveys on hunting and Non-Timber Forest Products (NTFP) were conducted.
- **Harish Kumar, B.W. Pandey, Subhash Anand (2019), "Analyzing the Impacts of Forest Ecosystem Services on Livelihood Security and Sustainability: A Case Study of Jim Corbett National Park in Uttarakhand"** The study covers 150 households interviewed from the different villages and town nearby the Jim Corbett National Park. The study has generated solutions for the problems of forest ecosystem services' impact on local livelihood and economic conditions of the areas where people are fully or partially dependent on forest resources for their livelihood.
- **Folusade, Catherine, Arowosafe (2017), "Livelihood Challenges of Adjacent Communities of Selected National Parks in West Africa"** The livelihood challenges of communities adjacent to Kainiji Lake and Mole National Parks in Nigeria and Ghana respectively were studied. Results obtained show that the major livelihood activities at adjacent communities of both Parks were crop and livestock farming. Some livelihood challenges encountered in the communities include the destruction of crops by wild animals reduced access to farmlands, and exclusion from the use of natural resources. The chi-squared analysis also reveals, a) A significant difference between the challenges encountered at the adjacent communities to both Parks, to reduce the adverse effects of the Parks on the communities' compensation for damages, further collaboration with NGOs to provide infrastructure and training on alternative sources of livelihood is recommended.
- **Niranjan Das, Mrinmoy K. Sarma (2015) "Assessing Ecotourism Economics for Livelihood Intervention- A Case in Nameri National Park of Assam"** states that through the paper the researcher emphasizes such possibilities based on assessment of potential ecotourism resources of the Nameri National Park during field experience gained different parts of the

study area. This paper tries to emphasize the ecotourism initiatives and their impact on livelihood intervention in the fringe of Nameri National Park in Assam.

OBJECTIVES

1. To analyze Sources of Livelihood in the Motichoor Range.
2. To examine Challenges and Barriers faced by residents in Motichoor Range.

RESEARCH METHODOLOGY

- This study is done in the Motichoor Range. It is a small Village/hamlet in Doiwala Block in the Dehradun District of Uttarakhand State, India. It comes under Motichur Range Panchayath.
- This study aims to analyze the sources and barriers faced by residents of the Motichoor Range. The data for the present study has been collected both from primary and secondary sources. Primary data are collected through discussions and interviews with local people of the Motichoor Range. The sample is collected from 45 residents. The population of Motichoor Range is 106 (According to survey 2011). Convenience sampling and Random Sampling are used to collect primary data.
- The information for the village has been gathered from Gram Pradhan (Head Village). He granted permission to interview the people in Motichoor Range.
- The study employs various quantitative and qualitative analytical tools.
- As well, secondary data sources including government regulations, websites, web portals, and Internet official document Journals, were collected and analyzed to understand the purpose of government intervention.



RESULTS AND DISCUSSION

The term "livelihood" describes how people and households make ends meet on an economic, social, and cultural level. It includes all the tools, abilities, and tactics used to obtain needs including clothing, food, housing, and other items and services. A livelihood involves more than just making money; it also involves taking advantage of many resources and chances to improve well-being and live a decent life.

Building on the work of practitioners and scholars, the UK Department of International Development (DFID) created the Sustainable Livelihoods Framework (SLF) to gain a deeper understanding of how people create and sustain livelihoods. This framework serves as an analytical tool that helps comprehend the various aspects of a person's livelihood and how they interact. The SLF sees livelihoods as a system and offers a framework for comprehending.

- A. the resources people utilize.
- B. the methods they devise to generate income.
- C. the environment in which a livelihood grows.
- D. and the elements that expose a means of subsistence to stress and shock.

Because livelihoods have an impact on social justice, economic growth, poverty alleviation, and environmental sustainability, they are essential to development processes. To improve livelihoods, development initiatives frequently concentrate on expanding access to markets, infrastructure, healthcare, education, and institutional support. To promote sustainable development outcomes, participatory approaches that involve local populations in decision-making and resource management are crucial.

To sum up, a person's livelihood includes all the various ways that they and their household meet their fundamental necessities and enhance their quality of life. It entails making use of available resources and assets, implementing livelihood plans, controlling risks and vulnerabilities, pursuing sustainability, and participating in development procedures. A thorough understanding of livelihood necessitates considering the intricate interactions between institutional, social, environmental, and economic elements that influence people's lives and means of subsistence.

OBJECTIVE 1- To Analyze the source of Livelihood in the Motichoor Range

Socio-Demographic Characteristics of Respondents (Source: Author's Fieldwork 2023)

The findings on socio-demographic characteristics in the Motichoor Range are shown in Table 1

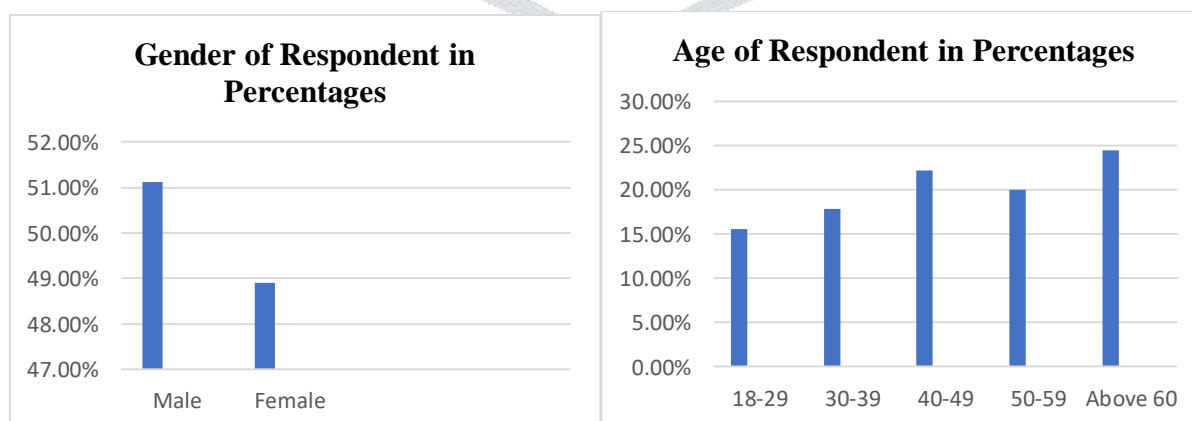
According to the personal survey in 2023, the male respondents were 51.11% and female respondents were 48.89%. According to the primary data, the highest number of respondents are above 60 years of age, ie., 24.44% of respondents at Motichoor. There are more married respondents in comparison with unmarried or Single respondents i.e., 86.67%.

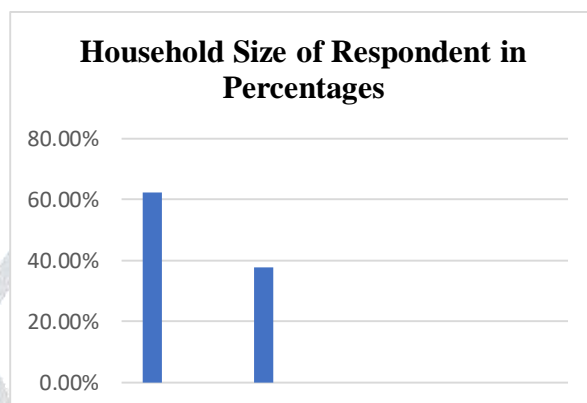
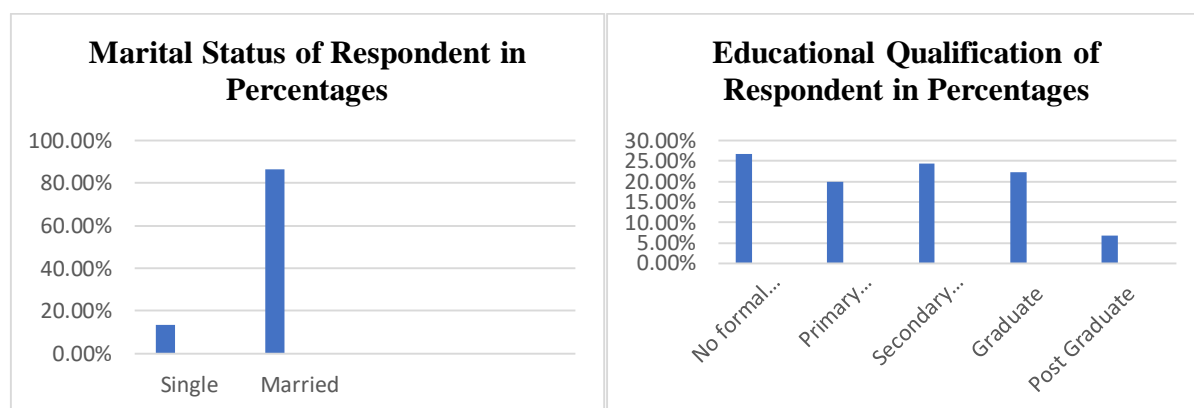
Most respondents have no formal education. The survey shows that 26.67% of respondents had no formal education, and 24.44% of respondents had secondary education. Out of 45 respondents, 9 had primary education which is 20%. 22.22% are graduate and only 6.67% are postgraduate. The largest household size is 1-5 representing 62.22%.

Table 1: Socio-Demographic Characteristics of 45 Respondents: -

Demographic Variable	No. of Respondents (in numbers)	No of Respondents (in percentage)
Gender: Male	23	51.11%
Female	22	48.89%
Age: 18-29	7	15.56%
30-39	8	17.78%
40-49	10	22.22%
50-59	9	20%
Above 60	11	24.44%
Marital Status: Single	6	13.33%
Married	39	86.67%
Educational Qualification:		
No formal Education	12	26.67%
Primary Education	9	20%
Secondary Education	11	24.44%
Graduate	10	22.22%
Postgraduate	3	6.67%
Household size:		
1-5	28	62.22%
6-10	17	37.78%

Graphical Representation of Socio-demographic Characteristics of Respondents of Motichoor Range





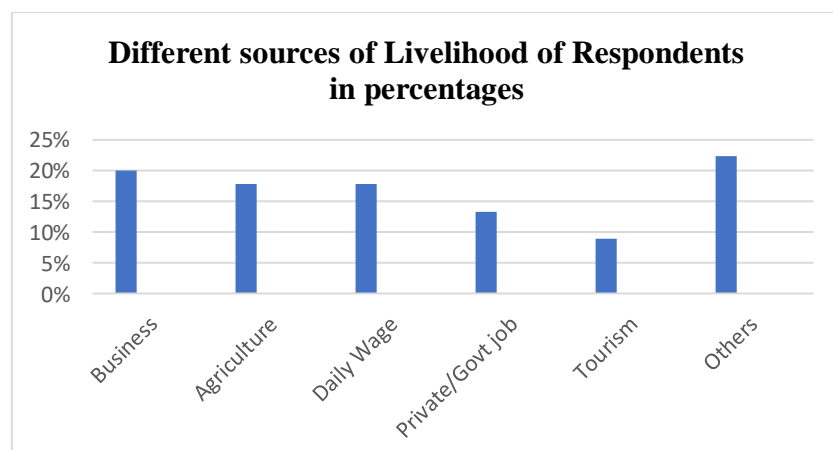
Sources of Livelihood of 45 Respondents (Survey: Author's Fieldwork 2023)

The Motichoor Range is the source of livelihood, per the 2011 study. In the studied area, business is the most successful activity. Of the 45 respondents, 9 (or 20%) are engaged in business-related activities. The second most prosperous industries are daily wage and agriculture. Eight of the 45 responders, or 17.78%, engage in both activities. The most prosperous activity after that was private or government employment. Thirteen percent, or six responders, are engaged in this activity. Out of 45 responders, or 8.89%, 4 are involved in tourism-related activities. Ten responders (a retired officer, a homemaker, a student, etc.) engage in other activities.

Table 2: Sources of Livelihood

Sources of Livelihood	Respondent (in numbers)	Respondent (in percentage)
Business	9	20%
Agriculture	8	17.78%
Daily Wage	8	17.78%
Private/Govt Job	6	13.33%
Tourism	4	8.89%
Others	10	22.22%

Graphical Representation of Sources of Livelihood of Motichoor Range: -

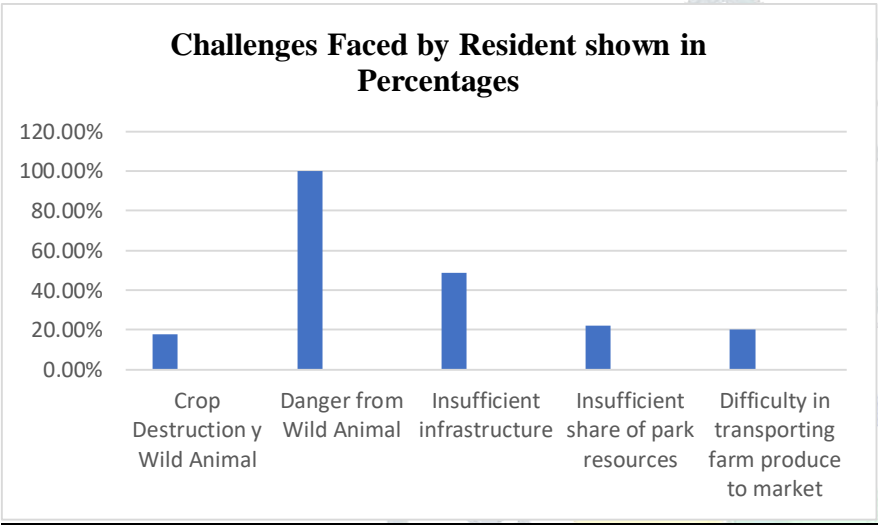


OBJECTIVE 2- To examine Challenges and Barriers faced by residents in Motichoor Range.

Table 3 displays the outcome of the livelihood difficulties that the communities' citizens faced. There is less land available for farming, farmers are barred from using resources, wild animals destroy crops, there is not enough infrastructure developed, there is not enough park resource sharing, and it is challenging to get farm products to market. Nevertheless, 17.78% of crops are destroyed by wild animals, 100% of children, livestock, etc. are at risk from wild animals, 22.22% of park resources are inadequately shared, 48.89% of the infrastructure is inadequate, and 20% of farm produce is difficult to get to markets.

Table 3: Challenges Faced by Resident (Source: Author’s Fieldwork 2023)

Challenges	No of Respondents (in numbers)	No of Respondents (in percentage)
1. Crop Destruction by Wild-Animal	8	17.78%
2. Danger from Wild-Animal	45	100%
3. Insufficient infrastructure	22	48.89%
4. Insufficient share of park resources	10	22.22%
5. Difficulty in transporting farm produce to market	9	20%



Barriers faced by residents in the Motichoor Range (Source: Author’s Fieldwork 2023)

1. Many people living in the Motichoor Range have restricted access to basic resources like water, land, and forests. Access to forest resources, such as fuelwood, lumber, and non-timber forest products—all significant sources of livelihood for many communities—is hampered by encroachment and forest degradation.
2. Human-animal conflicts may arise frequently because of the Motichoor Range's proximity to wildlife habitats. Elephant crop raiding and livestock predation can cause farmers and pastoralists to suffer financial losses. Because the fencing is not done correctly, this disagreement poses a risk to the residents and children.
3. Inadequate communication, power, and transportation infrastructure that restricts access to services and markets. Poor road connectivity increases the difficulty and cost of transportation. There are no hospitals or schools close by for the locals.
4. Traditional means of subsistence like farming, forestry, and animal rearing are still prevalent. Low productivity is the result of this. They have few options for earning a living through employment and other income-producing activities.
5. Deforestation, soil erosion, and water pollution are examples of environmental degradation that threaten the foundation of natural resources that support many people. Health risks to people because of contaminated water from agricultural runoff.
6. The government of Motichoor Range provides insufficient policy support, and most of the people there are unaware of the policies the government has implemented about the obstacles to livelihood.

These livelihood barriers in the Motichoor Range require a multi-dimensional approach. This entails promoting sustainable land and natural resources management practices, investing in infrastructure and basic services, enhancing access to education, and skill training, fostering community-based conservation initiatives, and governance mechanisms to support resilient livelihoods.

CONCLUSION AND RECOMMENDATIONS

Livelihood encompasses the diverse ways in which individuals and households secure their basic needs and improve their well-being. This study observed that livelihood activities at Motichoor are dependent on the natural resources of the National Park. Challenges to livelihood activities were discovered the destruction caused by wild animals' attack on crops, livestock children, reduced access to farmland, insufficient infrastructural development as it affects roads, electricity, potable workers, and the negative effect on people's

culture. This study helps to understand the sources of livelihood in the Motichoor Range. Through this study, we get to know what the challenges and barriers are faced by the residents of this range.

Based on the findings of this research, it is recommended that residents should get compensation for damages caused by wild animals of Raja Ji National Park, and collaboration with Non-Governmental Organizations to provide basic infrastructure and training on alternative sources of Livelihood is equally recommended. The government should make policies and raise awareness in the village so that it becomes easier for the people to make their living and contribute to society.

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REFERENCES

1. MM Meilani, R Thwaites, D Race, W Andayani, L R W Faida, A Maryudi(2005), "Finding alternatives of Livelihood sources for forest-dependent communities in protected areas: a case study of Sebangau National Park, Central Kalimantan Province, Indonesia" IOP Conf. Series: Earth and Environmental Science285 (2019) 012005 IOP Publishing doi:10.1088/1755-1315/285/1/012005
2. Niranjana Das, Mrinmoy K. Sarma (2015) "Assessing Ecotourism Economics for Livelihood Intervention- A Case in Nameri National Park of Assam" ASEAN Journal on Hospitality and Tourism, Vol 13 pp. 19-32
3. Folusade, Catherine, Arowosafe (2017), "Livelihood Challenges of Adjacent Communities of Selected National Parks in West Africa", Advances in Social Sciences Research Journal- Vol 4 No 7 DOI: [http:// dx.doi.org/10.14738/assrj.47.2929](http://dx.doi.org/10.14738/assrj.47.2929)
4. Harish Kumar, B.W. Pandey, Subhash Anand (2019) "Analyzing the Impacts of Forest Ecosystem Services on Livelihood Security and Sustainability: A Case Study of Jim Corbett National Park in Uttarakhand" International Journal of Geoheritage and Parks Volume 7, Issue, June 2019, <http://doi.org/10.1016/j.ijgeop.2019.05.003>
5. Arup Kumar Hazarika, Unmilan Kalita (2019) "Conservation and Livelihood Conflict of Kaziranga National Park: A World Heritage Site of Assam, India" Space and Culture, India, 7(3), 224-232. <https://doi.org/10.20896/saci.v7i3.656>
6. Louis Nkembi, Njukend Jetro Nkengafac and Ngulefack Ernest Forghab (2022), "Assessment of livelihood activities for conservation management in the Deng Deng National Park- Belabo Council Forest Conservation Corridor, East Region of Cameroon" International Journal of Life Science Research Archive, 2022, 02(01), 010-018, DOI: <https://doi.org/10.53771/ijlsra.2022.2.1.0025>
7. Mati Amano Geleto, Gerald Kapp & Elamin Sanjak (2023), "Coping with local peoples' livelihood dependence on the transboundary Dinder- Alaitish National Parks in Sudan and Ethiopia from the Sudanese Perspectives" Environ Dev Sustain **25**, 3099-3121 (2023). <https://doi.org/10.1007/s10668-022-02170-4>
8. Ministry of Tourism
9. Uttarakhandtourism.gov.in
10. <https://uksrlm.uk.gov.in>