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Unlocking the tapestry of conservation: Navigating ecological resettlement policies in Nepal

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HIGHLIGHTS

GRAPHICAL ABSTRACT

- Ecological resettlement (ER) policies of Nepal shifted from national to global interest after the Earth Summit
- ER policies often cause displacement of local and Indigenous people, sparking resource governance and park-people conflict
- Centralized decision-making hampers participatory approaches, constraining local empowerment and traditional rights
- Revisit global and national conservation policies for equitable and sustainable treatment of citizens amidst globalization
- Highlight community conservation and equity, and the need for caution in global decisions impacting the world's poorest.

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Implications of Conservation Policy Decisions for the Sustainable Planet

ABSTRACT

Conservation initiatives involve a complex interplay of various ecological, socio-political, and economic factors. Ecological resettlement (ER), implemented within the context of nature conservation policies, stands as one of the most contested issues worldwide. This study aims to navigate the domain of ER policy in conservation through discursive institutionalism and a policy arrangement approach. Focusing on Nepal's conservation policy pathways over the last seven decades, we critically analyze policy ideas and narratives, trends, patterns of policy development, institutional arrangements, driving factors, and responses to contemporary ER policies. Methods involved a systematic literature review (n = 271), a comprehensive review of policy documents and project reports (n > 150), and expert interviews (n = 20). Over the past 50 years, >7600 households in Nepal have been displaced in the name of ER and are still persisting despite the rhetoric of participatory conservation. With changes in political regimes, conservation policy has shifted from a hunting-focused approach to landscape-level and transboundary conservation. Initially influenced by internal factors such as economic and political

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governance, conservation policies were later shaped by international conservation discourse. Also, the operational sphere of such policy ideas and narratives – including actors, resources, discourses, and rules – along with trends, priorities, institutional arrangements, and driving factors of ER policies, has changed over time. Further, the exclusion of deprived communities and the capture of conservation benefits by elites have undermined conservation values. This research stresses the importance of a judicious balance between people's welfare and nature's integrity, emphasizing community-based natural resource management models accredited to a conservation standard. We further urge the revision of displacement-oriented conservation policies to secure the rights of Indigenous people and traditional landholders, thereby ensuring conservation and sustainable development at both national and global levels.

1. Introduction

Different conservation paradigms are evident worldwide, ranging from displacing people from nature (Haines, 1974; McNeely, 1990; Welden et al., 2021) to involving them in the establishment of protected areas (PAs) (Lam et al., 2016; Maclean and Strade, 2003; Murdock, 2021). Unlike the conventional approach to PA establishment based on Island Biogeography Theory (Hoffmann, 2021; Matthews and Triantis, 2021), recent conservation strategies involve participatory conservation and development models (Maraseni et al., 2014; Pandey and Pokhrel, 2021). Alongside these opposing models, various hybrid conservation approaches exist under the six categories of PAs' classification by the International Union for Conservation of Nature (IUCN), ranging from I to VI. Categories V (culturally modified landscapes) and VI (managed resource areas) principally allow sustainable resource use and the inclusion of human settlements in harmonious coexistence (Locke and Dearden, 2005; Shafer, 2015). In contrast, PAs in categories I to IV are more conservation-focused and expect minimal human influence on the natural system, often leading to the displacement of settlements historically residing within them (Locke and Dearden, 2005; Schmidt-Soltau and Brockington, 2007). Among these approaches, relocating people from their traditional lands for biological conservation is referred to as 'Ecological Resettlement (ER)' or 'Conservation-led Relocation (CR)'. In the modern era, the degree and type of human-nature interaction, inclusion, and exclusion are determined by countries within their sovereign jurisdictions through policies and procedures devised for ecosystems and people (Chandra and Idrisova, 2011). Thus, analyzing national policy processes is crucial for informing judicious decisionmaking in the Anthropocene to ensure the sustainability of the socioecological system on our shared planet.

Government decisions, including those related to ecosystem integrity and public welfare, must be accountable to citizens through the established governing systems of a country (Baxter, 2004; Lo, 2021; Murdock, 2021). Such decisions are pivotal for achieving both national and global targets by directing localized actions. Global communities set targets that encompass various objectives, such as the Sustainable Development Goals (SDGs) (Pascual et al., 2017; UN, 2015), the Convention on Biological Diversity (CBD) aiming to protect at least 30 % of terrestrial and marine areas (CBD, 2022; Yinuo, 2022), and climate actions addressing socio-economic, ecological, and environmental aspects (IPBES, 2019; IPCC, 2023; UN, 2015; US EPA, 2015). Balancing these ambitious targets is quite challenging. Countries devise various policy instruments and form alliances to synergize conservation efforts and social exchanges globally under the concept of one planet and one health (Redford et al., 2022), adhering to decisions made in international forums (CBD, 1992; UN, 2015). Amidst dwindling pristine ecosystems worldwide (FAO, 2022), there is a high demand for physical and social infrastructure across widespread human settlements using limited resources (Basheer et al., 2022; NPC, 2019). This dual predicament puts immense pressure on natural ecosystems, causing degradation, and transformation, and threatening biodiversity conservation, especially in terrestrial environments (Basheer et al., 2022; FAO, 2022; Kun et al., 2019). To safeguard natural ecosystems while meeting social infrastructure demands, conservation-focused actions are necessary as development-oriented

interventions escalate. Consequently, challenges arise for both local communities and nature, which must bear the cost of trade-offs. This includes degradation, deterioration, and fragmentation of natural ecosystems to meet developmental needs, as well as people facing access restrictions to natural resources, deliberate displacement, evacuation, relocation, and resettlements for conservation reasons. This is particularly true in the developing world, where people's livelihoods and biodiversity are intricately linked to natural systems (Lam et al., 2016; Maclean and Strade, 2003; Mahapatra et al., 2015). In such instances, examining past policy arrangements concerning people and ecosystem (i.e., ER) to inform future policy pathways is crucial for balancing political decisions with contemporary needs, as outlined by international policy forums (Chandra and Idrisova, 2011; Fajardo del Castillo, 2021; Schei and Johan, 2011).

Planned resettlements or deliberate displacements occur worldwide for various reasons, including resettling after warfare (Chimni, 2004; Marshall et al., 2005), reducing environmental risk after infrastructure construction (Heggelund, 2006; Warner et al., 2010), mitigating casualties from natural disasters (Juchi, 2014; Pandey et al., 2022), minimizing the impact of climate change (Kisinger and Matsui, 2021; Owley, 2020), facilitating the conservation of endangered species (Karanth, 2007; Neelakantan et al., 2019; Witter, 2013), preserving cultural heritage (Aktürk and Lerski, 2021; Su et al., 2016), managing population pressure (Connell, 2014), and promoting sustainable development (Otsuki et al., 2022; Xu et al., 2022). Given the multidisciplinary implications of ecological resettlement (ER) across social, ecological, and land- and seascape domains, as well as the long-term consequences and involvement of multiple stakeholders, there is growing scholarly attention in this field. For example, some scholars focus on the socioeconomic aspects of resettled societies (Lam et al., 2016; Maclean and Strade, 2003; Mahapatra et al., 2015; Otsuki, 2023), the ecological aspect of conservation (Peng et al., 2020a), land cover change in resettled and evacuated sites (Platt et al., 2016), and the positive and negative impacts on people and ecosystems (Lo, 2021; Xiong and Wang, 2010; Zhang et al., 2020). Other studies synthesize research on social equity in conservation (Friedman et al., 2018), managed and planned retreats (O'Donnell, 2022), typological framework on relocation (Yarina and Wescoat, 2023), protection and impoverishment (Geisler, 2003), chronological analysis of natural resource management and Indigenous communities (Mishra et al., 2021), and biodiversity offsetting and its social impacts (Tupala et al., 2022). However, in-depth analyses of the policy arrangement process of conservation strategies, particularly those focusing on ecological resettlements or conservation-led resettlements, remain sparse.

Further, the majority of the existing literature reported that past ER efforts were led by governments (Katin, 2020; Lam et al., 2016; Maclean and Strade, 2003; Sengupta and Jha, 2020). Yet, it is unclear whether those decisions were accountable to the citizens of the respective countries. Were the ER decisions publicly accountable? Were these decisions locally demanded? Were the policies in the national (local) interest? What were the ideas and narratives, trends, and patterns of policy development? How do institutional arrangements and driving factors influence ER policies? What were the lacunas and ambiguities in the past ER policies? What were the driving actors, resources, discourses, and

rules of ER policy arrangements in the past? Answering these research questions is critical for informing decision-makers and enhancing future ER policy arrangements to harmonize people's welfare and ecological integrity. Moreover, this examination aims to extract lessons that can pave more effective pathways, leading to mutually beneficial outcomes for both people and the planet, addressing a current gap in the existing body of knowledge (Miller et al., 2012; Otsuki, 2023; Pascual et al., 2017; Peng et al., 2020b).

In this paper, we endeavor to comprehend past policy arrangements and practices relevant to ecological resettlement (ER) in the Global South, with a particular focus on Nepal. Specifically, this study has three objectives: 1) to analyze the observed trends and likelihood of ecological resettlements, 2) to identify key factors influencing the ER policy process, and 3) to assess the ER policy landscape to extract lessons for future pathways. To achieve these objectives, we employed the Policy Arrangement Approach (PAA) and Discursive Institutionalism (DI) frameworks due to their robustness in the discipline (Schmidt, 2008), using Nepal's seven decades of policy pathways as a representative conservation discourse in the Global South concerning ER. By addressing these research objectives, this study offers new insights into how international conservation policies impact the livelihoods and community structures of Indigenous peoples and local communities in relation to biodiversity conservation, particularly in developing countries. Additionally, this study: 1) establishes a benchmark for conservation policies in the developing world, aiming to achieve both national and international goals while balancing social welfare and ecological concerns through judicious planning; 2) assists decision-makers with informed and accountable approaches; and 3) contributes to providing a roadmap for understanding conservation policy decisions, aligning national and international objectives, and promoting harmonious humannature coexistence through rational planning and environmental justice.

2. Theoretical framework and methods

2.1. Theoretical framework

Policies are shaped by ideas and discourses within the political system, a realm often perceived as intricate and expansive (Arts and Buizer, 2009; Schmidt, 2008). Despite this complexity, multiple approaches exist to analyze these political phenomena, with some favoring specific sectoral policy analyses. The Policy Arrangement Approach (PAA) within discursive institutionalism stands as a favorable method for policy analysis on the topic (Arts and Buizer, 2009; Wiering and Arts, 2006). This approach has found relatively wider application in the discipline due to its robustness (Arts and Buizer, 2009; Aryal et al., 2021a, 2021b; Laudari et al., 2020). It determines the access of stakeholders in the policy process, their reasonable participation, identification of policy problems, and resources utilized in the cognitive and communicative sphere to inform decision-making. Further, PAA explores the background rationale, reasons, factors, actors, discourse, and scenarios underlying the policy process (Aryal et al., 2021b; Laudari et al., 2020). This highlights its significant merits as a critical analytical tool in the policy process, especially in the discipline of natural resource management, by examining both strategic and structural factors (Arts et al., 2006, 2000; Arts and Buizer, 2009).

The PAA dissects policy analysis into four operational spheres—actors, resources, discourses, and rules. Among these, actors and discourses fall under the strategic domain, while rules and resources belong to the institutional structure. These dimensions play pivotal roles in both crafting and executing policies. Actors serve as dynamic agents shaping stakeholders' involvement in policy formulation and implementation (Arts and Buizer, 2009). Resources encompass power dynamics—such as political ideology, personal influence, position and designation, availability of resources (both human and non-human), and legal and non-legal instruments—in an institutional setup influencing policy outcomes within ideational and discursive spheres (Arts and Buizer, 2009; Schmidt, 2008). Discourses relate to how policy issues are framed and resolved (Arts and Buizer, 2009; Gasper and Apthorpe, 1996). Rules delineate existing laws, acts, and social practices that guide policy shaping or translation into practice through institutionalization (Arts et al., 2006; Olivier and Schlager, 2022).

We assess ER policies concerning wildlife and biodiversity management within designated areas through the lens of the PAA framework. Actors represent stakeholders involved in shaping and influencing ER policy, while resources encompass those with governing authority and access to institutional resources that influence policy processes both within and outside the government system. Similarly, discussions regarding policy formulation, whether within the political sphere, at ministerial and other institutional levels, or in communication beyond administrative and political domains with other stakeholders, are part of the discursive sphere, reflecting an interactive process of exchanging ideas (Schmidt, 2008). Rules within the PAA framework encompass existing practices, governmental directives, prevailing legislative standards, acts, and regulations. Through this analysis, this paper aims to contribute to the understanding of social justice (Miller, 1979; Schlosberg, 2013) and ecological and ecosystem justice (Baxter, 2004, 2000) for holistic sustainability of the socio-ecological landscape (Ostrom, 2014; Pandey et al., 2023) by examining the policy processes of conservation-led displacement in the global south.

2.2. Methods

We employed three distinct methodological approaches (Fig. 1). Firstly, we conducted a systematic chronological review of policy documents related to conservation-related resettlements spanning the period from 1950 to 2023. These documents were accessed through the online portals of relevant organizations, and we thoroughly examined the pertinent gazettes using the repository of the Department of Printing, Nepal (DoP, 2024). Additionally, we scrutinized published reports and online databases from Nepal's government, including the portals of the Department of Forests and Soil Conservation, the Department of National Park and Wildlife Conservation, the Ministry of Forest and Environment, the Human Rights Commission, and the Law Commission. Furthermore, we explored online resources from conservation partners such as the World Wildlife Fund (WWF) Nepal, the National Trust for Nature Conservation (NTNC), the Zoological Society of London (ZSL) Nepal's office, IUCN Nepal, and FAO Nepal. Through this approach, we evaluated over 150 documents, including acts, regulations, directives, reports, and policy documents (n > 50, Fig. 1), as well as ER-related Nepal Gazettes (n > 100, Fig. 3).

Secondly, we conducted a systematic literature review of peerreviewed articles using databases such as Web of Science, Scopus, and Google Scholar. Specific keywords related to the study were employed to assess empirical research globally and within the context of Nepal. At this stage, we meticulously finalized the search keywords, ensuring coverage of synonymous terms referenced in >20 existing pieces of literature on the subject (Benjaminsen and Bryceson, 2012; Schmidt-Soltau and Brockington, 2007; Vehrs and Zickel, 2023; Yarina and Wescoat, 2023). Additionally, we considered sensitivity and specificity crucial for a thorough and accurate systematic literature review (Haddaway et al., 2020). The final keywords used for searching were "Conservation" OR "Ecological" AND "Displacement" OR "Resettlement" OR "Relocation" OR "Dispossession" OR "Realignment" OR "Retreat", OR "Eviction", validated by experts (n = 3). From this search, we thoroughly reviewed peer-reviewed empirical articles at the title, abstract, and keyword levels in the first stage. Among the total records retrieved -8078 from Web of Science, 7656 from Scopus, and 977 from Google Scholar, we found 12,514 unique records initially. After the first stage of title and abstract screening, only 529 records were considered for further analysis. In the second stage, a full-text screening of these articles was conducted, and only 271 empirical studies were deemed relevant to the topic. From the list of 271 final articles, we utilized the findings and



Fig. 1. The methodological framework adopted for the study.

arguments using content analysis and thematic grouping to populate the results and discussions sections as appropriate.

Thirdly, we supplemented the information gathered from documents with interviews conducted with key stakeholders regarding ER. Ethical approval was granted by the Human Research Ethics Committee [Ethics application ETH2023-0568 (HREC)] at the University of Southern Queensland, Australia. Additionally, we obtained official permission from the Government of Nepal, the Ministry of Forests and Environment, and the Department of National Parks and Wildlife Conservation before commencing the research, in accordance with Nepal's regulations. To select experts for these interviews, we first prepared a roster of accessible experts who had worked on the topic in Nepal at the time of the interview. From this list, we selected five experts from each area, as indepth interviews with them were sufficient to gain diverse opinions and perspectives. These experts included policymakers (n = 5), policy practitioners (n = 5), members of local and Indigenous communities (n = 5), and representatives of civil society organizations (n = 5), with a particular focus on the Terai Arc Landscape (TAL) of Nepal. This region was chosen because most ERs in Nepal have occurred in the TAL area, allowing us to verify and validate responses against the ground reality. Face-to-face interviews were conducted using a pre-determined checklist (see the sample checklist in the Annex). The collected information was cross-referenced with published and unpublished documents, policies, and official reports of Nepal related to conservation-related resettlements or dispossessions. All the information, narratives, opinions, and reflections obtained were synthesized within the broad theoretical framework of the PAA and DI spheres (Schmidt, 2008).

3. Results

3.1. Major phases of ecological resettlement

The chronological development of Nepal's conservation policy can be divided into four distinct phases from the perspective of ER: 'no displacement but strict protection', 'strict protection and displacement', 'participatory conservation initiatives but displacement', and 'era of equitable conservation benefits sharing but still displacement', respectively. These phases were distinct within specific timeframes. For instance, three significant milestones were considered: in 1973, Nepal's National Parks and Wildlife Conservation Act was enforced; additionally, the year 1992 marked the Earth Summit and its conventions, while 2010 saw the initiation of global targets-based conservation initiatives like the Aichi Biodiversity Targets (CBD, 2011). These phases were characterized by significant conservation decisions at both national and international levels, as well as notable changes in the constellation of external and internal actors within the policy domain, including shifts in political regimes. These factors collectively shaped the national ER policies (Fig. 2) and influenced the outcomes periodically in policy and practice (Table 1).

3.1.1. No displacement but strict protection (before 1973)

Formal wildlife conservation initiatives began in 1958 with the implementation of the Wildlife (Protection) Act (HMG, 1958). Following this act, Nepal introduced two additional protection laws: the Aquatic Animals (Protection) Act of 1960 (HMG, 1960), and the Forest Act of 1961 (HMG, 1961). Before 1973, Nepal's conservation policies and ER were in a nascent stage, characterized by limited formal regulations primarily focused on species-level conservation,¹ particularly megawildlife.² Conservation efforts mainly aimed to protect iconic species like the Royal Bengal Tigers and One-horned Rhinos, often for hunting purposes, under the direction of ruling institutions such as the monarchy or Ranas.³ Although forest protection rules were sporadically enforced, significant instances of human displacement occurred before 1973, particularly for game species protection, driven by the directives of the Royal Palace.⁴ However, documentation of these displacements is scarce. Additionally, while there was a trend of resettlement, it was not directly linked to conservation policies but rather stemmed from a search for better livelihood and employment opportunities, particularly migration from mountainous and hilly areas to lowland regions following malaria eradication in the lowlands (Dhimal et al., 2014; Gartaula and Niehof, 2013).

3.1.2. Strict protection and displacement (1973-1991)

The enactment of the National Parks and Wildlife Conservation Act in 1973 (hereafter, the NPWC Act) signaled the beginning of establishing and upgrading protected areas, including national parks (NP) and wildlife reserves (WLR). Consequently, the displacement of residents from these protected areas commenced,⁵ with the first reported instance of ER carried out by the government in Rara NP in 1976. Subsequent resettlements occurred in Bardia NP and Koshi-Tappu WLR. During this period, most ERs in Nepal were initiated in the context of biodiversity

¹ Interviews with policy practitioners

² Interviews with policymakers and experts

³ Interviews with local and Indigenous people

⁴ Interviews with (former) policy practitioners

⁵ Interviews with civil society organizations



Fig. 2. The overall trend, prime external and internal factors shaping and making the ecological resettlement policy of Nepal.

Table 1

The fragmented data on conservation-led resettlements and displaced households from each protected area and zoological garden in Nepal from 1950 to 2023 are as follows: [Note: Nepal includes 12 national parks, 2 wildlife reserves (including one hunting reserve), 6 conservation areas (CA), and 2 zoological gardens].

Protected areas	Period of resettlement	Displaced household	Villages (sites)	Key reasons for resettlements	References	
Parsa NP	2009–2013	473	Rambhouri, Bhata, Ramauli, and Pratappur	Extension of the habitat of Gaur (<i>Bos gaurus</i> – the largest bovid in the world)	(Lamichhane et al., 2018)	
Chitwan NP	1995–1998	516	Padampur	Expanding the area of a World Heritage Site (natural)	(Maclean and Strade, 2003; HMG, 1995)	
Banke NP	2014	24	Gotheri Basti	Establishing a new NP spelling, a gift to the Earth'	(Aryal, 2020)	
Bardia NP	1982–1984	1572	Kailasi, Taratal villages, and resettlement across the Khata corridor	Protecting the key habitat of Tiger (<i>Panthera tigris</i> <i>tigris</i>) to facilitate transboundary gene flow (to India)	(BNP, 2022)	
Suklaphanta NP	1974–2002	2249	17 places (villages)	Establishing the wildlife reserve to conserve the habitat of the last remaining herd of swamp deer in Nepal	(Lam et al., 2016)	
Rara NP	1976	250	Four villages around the catchment of the Rara lake	Conserving high mountains pristine Rara Lake and associated wildlife habitats	Rara NP Management Plan 2019 (RNP, 2019)	
Koshi-Tappu WLR	1979–1982	2400 ^a	Extended the area from 65 to 175 km^2	Protecting the last resort of wild water buffalo (<i>Bubalus arnee</i>) habitat in Nepal	Koshi-Tappu WLR Management Plan 2018 (KTWR, 2018)	
Sagarmatha NP, Langtang NP, Shey-Phoksundo NP, Makalu-Barun NP	1976 - 2023	No displacement	-	Conserving high Mountains and Himalayas ecosystems and socio-cultural landscapes	Himali NP Regulations	
Shivapuri-Nagarjun NP, Khaptad NP	2004	No displacement	Realigned the boundary excluding settlements	Protecting the main water source (tower) for Kathmandu Valley	Nepal Gazette, 2004	
Dhorpatan Hunting Reserve	1987	No displacement	_	Sustainable management of wildlife through regulated hunting	National Parks and Wildlife Conservation Regulation	
Annapurna CA, Manaslu CA, Gaurisankar CA	1991 - 2019	No displacement	Managed by a quasi- governmental NGO (National Trust for Nature Conservation - NTNC)	Participatory conservation adheres to the principle of sustainable resource management and reducing the management cost of public finance	Conservation Area Regulations	
Kanchanjanga CA	1997	No displacement	Solely managed by the local community	Bordering India and China, and the part of the transboundary landscape to Bhutan (Kanchanjanga Sacred Transboundary Landscape)	Conservation Area Community Management Regulations	
Krishnasar CA, Api-Nampa CA	2009 - 2019	No displacement	Local community-state co- management	Conserving the last resort of blackbuck (<i>Antilope</i> <i>cervicapra</i>) habitat and protecting the fragile Kailash Sacred Landscape Himalayan ecosystem in Nepal respectively	Conservation Area Government Management Regulations	
National Zoological Garden, Bhaktapur	2015–2018	Resource dispossession	8 community forests in Bhaktapur area	Establishing the National Zoological Garden of Nepal	Nepal Gazettes	
Zoological Garden, Tananhu	2017- present	124	Vyash Municipality areas	Guided by the local political interest	Nepal Gazettes	

^a [Note: The average household size was taken as 5 to calculate the displaced households from the 12,000-population reported while taking the reference of the average family size of the area; CA stands for conservation areas, and other abbreviations have their usual meaning].

conservation efforts while establishing NP and WLR (see Table 1) and advancing protected area systems (Aryal et al., 2021a). Between 1973 and 1991, Nepal witnessed a significant transformation in its conservation policies (Fig. 1), influenced by both external and internal factors (Fig. 2) alongside the enactment of the NPWC Act. While literature reported the ER of the Padampur of Chitwan started in 1964 (Maclean and Strade, 2003), we found it was formally initiated in 1995⁶ when the government established a resettlement committee and outlined its responsibilities as published through the Nepal Gazette (HMG, 1995).

Upon enacting the NPWC Act (GoN, 1973) and its associated regulations, several controversial policies were adopted. For instance, these regulatory frameworks indirectly imposed strict protection measures, involving the Nepal Army in NP and WLR, and endorsed a conservation strategy that excluded human settlement from all lowland PAs and Rara NP in the Mountains region (see Table 1). As a result, Indigenous and local communities were compelled to abandon their ancestral homes without adequate consultation or compensation for their land and property⁷ (Lam and Paul, 2013; Maclean and Strade, 2003). Nevertheless, the issue of compensation remains unresolved, with grievances persisting across the country regarding the fulfillment of the resettlers' fundamental needs.⁸ In contrast, the government formulated and enacted the Himali National Parks Regulation in 1979, a distinctive regulation designed specifically for Mountain and Himalayan NPs, which allowed existing settlements within those areas (GoN, 1979). However, despite this resident-friendly regulation, residents of Rara NP had already been resettled to drastically different ecological regions in the lowlands of Nepal.⁹ By the end of the strict protection period, a total of 4222 households had been displaced from their original land and property (Fig. 2).

3.1.3. Participatory and landscapes level conservation but displacement (1992 - 2010)

Between 1992 and 2010, Nepal experienced significant shifts in its conservation policies. During this period, there was a notable emphasis on participatory conservation models aimed at involving local communities in conservation initiatives.¹⁰ Several policy frameworks were established to incorporate local and Indigenous community participation in conservation activities, such as buffer-zone programs (1996), tourism development projects,11 and community-based conservation committees (1996). However, despite these participatory approaches, the era also saw the continuation of ER, particularly from NPs and WLRs. Additionally, upgrading the protected area system, such as the conversion of WLRs (IUCN category - IV) into NPs (IUCN category-II), led to the displacement of people. Examples include the conversion of the Karnali WLR into Bardia NP and the extension of the Chitwan NP, a UNESCO World Heritage Site since 1984 (HMG, 1995). These policies reflected a dichotomy between participatory rhetoric and the ongoing execution of displacement measures,¹² shaping a complex landscape of conservation practices during this period. The total number of displaced households by the end of this period reached 6987 (Fig. 2).

3.1.4. The era of equitable conservation benefit sharing but still displacement (beyond 2010)

Post-2010, Nepal witnessed a continuation of its conservation and ecological resettlement policies, characterized by the expansion of PAs and the stabilization of the political system following the peace

transition.¹³ In 2010, efforts were made to address wildlife conflicts through the implementation of the wildlife damage relief fund (OPMCM, 2023), but ecological resettlement persisted to meet global targets of increasing PA systems (CBD, 2011). These targets were reinforced by the Sustainable Development Goals (UN, 2015), initiatives to balance climate actions and biodiversity conservation (IPBES, 2019), and the 2030 targets of the Biodiversity Framework (CBD, 2022). These global objectives, alongside Nepal's national ambition to continuously extend its proportion of protected areas to 30 % of the country's PA system, are aligned with international policy targets (DNPWC, 2022; GoN/MoFE, 2019a; GoN/MoFSC, 2016). The policy focus remained on biodiversity conservation through the establishment and expansion of NPs and the upgrading of WLRs to NPs, resulting in the displacement of local communities from their traditional dwellings (Table 1). However, there was a shift in the discourse surrounding resettlements, advocating for a more participatory conservation approach (Pandey and Pokhrel, 2021; Sunam and Paudel, 2013). Despite these intentions, substantial displacement of communities persisted, as seen in Banke NP in 2014¹⁴ (Aryal, 2020), and even with the establishment of zoological gardens (Table 1). The cumulative number of displaced households accounted for until the end of 2023 reached 7608 (Fig. 2).

In contrast, the period also saw instances where local and Indigenous residents were displaced, while investors and developers were granted permission to engage in certain activities within the PAs. This was facilitated by subsequent amendments to the NPWC Act and the implementation of directives and guidelines for operating hotels and motels, reflecting biased patterns observed in earlier conservation policies¹⁵ (GoN, 2019a, 2019b, 1973). However, basic road infrastructure for the benefit of local communities remained unresolved due to fears of delisting from the World Heritage Site status in the case of Chitwan NP (Bhattarai et al., 2017) and restrictions imposed on drinking water supply permissions from the Langtang NP.¹⁶ Further, within Chitwan NP, there are at least three private hotels where staff and guards reside to protect unauthorized hotel buildings that have operated for decades.¹⁷ The ongoing dispute over ER in the Suklaphanta NP, initiated in 1974 (Table 1), persists despite efforts to provide compensation in terms of both land and monetary support to relocated households for resettlement (HMG, 1988a). The infiltration of unfair politics into the compensation distribution system has further polarized the issues, which remain unresolved on the ground,¹⁸ despite the establishment of almost three dozen commissions to address them.¹⁹

3.2. Discursive pathways of ER policy arrangement

We found that both structural factors (resources and rules) and strategic factors (actors and discourses) played crucial roles in shaping Nepal's ER policy process (Table 2). Initially, there were limited actors, mainly centered around the Royal Palace of the King, who played key roles in shaping conservation policies. The government established relations with international counterparts through wildlife hunting, adopting species protection strategies to gain acceptance within the ruling system (Mishra, 2010). Consequently, to protect certain game species, hunting reserves were declared to regulate hunting in the lowland landscape, specifically the Terai Arc Landscape Area of Nepal (GoN/MoFSC, 2014). A similar pattern of a monolithic conservation policy process continued until 1992, with significant authority vested in the state rulers by the NPWC Act. Meanwhile, quasi-judicial

⁶ Interviews with policy practitioners, and local and indigenous people

⁷ Interviews with local and Indigenous people

⁸ Interviews with policy practitioners

⁹ Interviews with policymakers and experts

¹⁰ Interviews with policymakers and experts

¹¹ Interviews with civil society organizations

¹² Interviews with local and Indigenous people

¹³ Interviews with policymakers and experts

¹⁴ Interviews with policy practitioners, and local and Indigenous people

¹⁵ Interviews with civil society organizations

¹⁶ Interviews with local and Indigenous people

¹⁷ Interviews with policy practitioners

¹⁸ Interviews with civil society organizations, and local and Indigenous people

¹⁹ Interviews with policy practitioners and experts

Table 2

The discursive pathways of the policy arrangement concerning the ecological resettlement of Nepal.

Ideation of policy narratives	Communication of policy narratives	Actors (involvement of the stakeholders)	Resources (power interest)	Discourses (framing storylines)	Rules (existing laws and social practices)	Relationship with Ecological Resettlement
 Before 1973 – the era of Mega wildlife species (e.g., Rhino - <i>Rhinoceros unicornis</i> and Tiger - <i>Panthera</i> <i>tigris tigris</i>) protection Rhino Sanctuary and Mahendra Deer Park (in Chitwan) and in Barandabhar Corridor establishment Karnali Tiger Sanctuary in Bardia declaration 	no resettlement concerning - Coordinative approach: a very limited sphere of the bureaucrats - Communicative approach: limited policy communication to the public sphere	conservation - Royal Consultation Assembly - Democratic government but Monarchical ruling (His Majesty of Government) - Development partners - Forestry bureaucrats - USAID - Diplomatic relationships	 Sole authority of power upon resources remained to the ruling parties or Monarchial King Ministry of Forests Then Forest Divisions and the Department of Forests 	 Little concerns about conservation except for hunting purposes, followed by strict protection Demarcation of national forest Discourses on game hunting and their management Enlisted key species in the annex of the act and provision of fine and jail if hunting these 	 Wildlife (Protection) Act, 1958 Elephant Regulations, 1965 Forest Acts 1961 and Forest Act (Special) 1968 Aquatic Animals (Protection) Act, 1960 Nationalization Private Forests Act, 1957 Nepal Gazette and circulars 	 No vibes of ecological resettlement Resettlement in the Terai (lowland) areas after eradication of malaria. Declaration of the standardized strategy of communication of the government's decision through the Nepal Gazette
 Between 1973 and 1991 Establishment of the protected areas (national parks, wildlife reserves, protected watershed) Established and started the conservation and seeking technical inputs to the government expected through quasi-judicial organization Between 1992 and 2010 Mainstreaming the participatory conservation approach Management of conservation areas (CA) formally started on a contract basis with the NGO (NTNC) apart from government-managed CA 	 the era of the establishme Coordinative approach: a very limited sphere of the bureaucrats Communicative approach: limited policy communication to the public sphere Participatory conservation Coordinative approach: a very limited sphere of the bureaucrats Coordination with limited development partners, such as FAO, WWF, and IUCN Communicative approach: policy communication through gazette, publications, promotional advertisements through mass media 	ent of national parks au - Ruling government (mostly His Majesty Government – King) - Forestry bureaucrats - Local Panchayat Government - Development partners - NTNC - ADB, WWF, FINNIDA, IUCN n started by establishin - Community- based conservation organizations and committees - Local and District Development Committees - Forestry bureaucrats - INGOs/NGO workers - USAID – Park People Partnership Program (PPP) and WWF Nepal's Program - Other development partners such as IUCN, ICIMOD, and UNESCO - Users Conservation Committees	nd wildlife reserves – ther - Few powers of the government were delegated to the local development committee (the village panchayats) - Vibes of hearing public voice in policy process initiated through local-level devel- opment committees ag conservation areas and - Governments and their institutions - Donor agencies - Earth Submit and its direction - CBD and its principles - Protocols (Cartagena and Nagoya) of CBD	reby major ER seeded duri - Deploying the Nepal Army in the National Parks and Wildlife Reserve for strict protection - Liberating the resources and community support programs through NGOs and local conservation committees - Extended the list of protected species buffer zones but continue - Park-people partnership formalized for protected area management - Conservation benefits sharing to the local community between 30 and 50 % - Co-management of parks other than CA started - Recognized the local people as one of the conservation stakeholders - Landscape-level participatory conservation and benefit sharing initiated	ng this period - National Park and Wildlife Conservation Act (1973) and its regulations (1974) - National Forestry Plan, 1976 - Himali National Park Regulations, 1979, - Master Plan for Forestry Sector 1988, - Act (1982) and Regulation (1985) of the National Trust for Nature Conservation ed ER from NP and WLR - Forest Act 1993 and Regulations 1995 - Revised Forest Policy 2000 - Landscape-level conservation strategic Plan of Terai Arc Landscape Nepal (2004–2014) formulated and implemented - Species Conservation Plans formulated - Environment safeguarding initiated by the promulgation of the Environment Protection Act and Regulations - Environmental protection standards started - Environmental impact assessment initiated and continued	 Resettlements from Rara, Bardia, and Suklaphanta NP started Resettlement of Bardia and Rara NP completed Species translocation started Chitwan NP – settlement resettled The Grievance redress commissions were established several times in the Suklaphanta NP area Buffer zones around the NP and WLR started to be demarcated and declared No documented initiatives of environmental impact assessment were done during this period while establishing PAs, and even in ER.
Beyond 2010 – era of par - Community conservation (e.g., Kanchanjanga Conservation Area), joint management of CA, NP, and WLR	rticipatory landscape conse - Coordinative approach: three tiers of governments, civil society, and private sectors	 rvation and equitable of Three tiers of governments Bureaucrats Political bodies Development partners, donors, 	 conservation benefits shar Forestry bureaucrats Political bodies Lobby groups Civil advocates 	ing - Extension of PAs and upgrading of WLR to NPs - Continued conservation	 Constitution of Nepal (2015) National Biodiversity Strategy and Action Plan (2014-2020) 	 Established Banke NP and its settlement relocated The Grievance Redress Commission for Suklaphanta NP

Table 2 (continued)

Ideation of policy narratives	Communication of policy narratives	Actors (involvement of the stakeholders)	Resources (power interest)	Discourses (framing storylines)	Rules (existing laws and social practices)	Relationship with Ecological Resettlement
 Conservation benefits sharing with the local communities Started the mechanism of distributing monetary relief for wildlife damage to the people and properties 	 Field-level consultation Coordination with a wide range of partners, civil and ethnic society organizations Communicative approach: consultative workshops and mass media utilize Gazettes, publications, online portals, and other digital platforms 	 civil society, and communities NEFIN, FECOFUN, FAO, WWF, and IUCN NTNC, ZSL National Planning Commission (NPC) OPMCM (Office of Prime Minister and Council of Ministers) Nepal 	 Development partners Municipalities and local-level conser- vation committees Filed-level consultation with local people started in the policy process Parliamentary and Ministers' Council Committees Ministries and field offices, civil society, and private sector 	 benefits sharing mechanism Wildlife damage relief fund materialized Compensation of land and monetary establishment and transportation cost provisioned Landscape-level participatory conservation and benefit sharing continued Transboundary level conservation continued through participatory management of biological corridors 	 Strategic Plan of Terai Arc Landscape Nepal (2015–2025) National Forest Policy, 2015 andeRegulation 2022 Protected Area Management Strategy 2022–2030 Species conservation plans Environment Protection Act, 2019 and Regulations, (2019) CITES Act, 2016 and Regulations, 2019 Nagoya Protocol (Nepal's endorsed through the parliament and published in Nepal Gazette, 2018) 	resettlement has been reestablished – (The 32nd Commission) - Two zoological gardens declared and displaced the communities within them - Extension of the Parsa NP and Chitwan NP core area by incorporating the settlements' evacuated areas

organizations such as the National Trust for Nature Conservation (NTNC) were established to support the government in conservation activities and bridge gaps between the state and the public (GoN, 1982). In consultation with NTNC and a few other international organizations such as the World Wildlife Fund (WWF), Asian Development Bank (ADB), International Union for Nature Conservation (IUCN), and Finnish Development Agency (FINNIDA), the government formulated conservation-related policies incorporating ambitions to establish and extend protected systems (DoF/HMG, 1976; HMG, 1988b; HMG and IUCN, 1983). Discussions on the policy process primarily revolved around these actors, despite efforts to encourage broader participation (Aryal et al., 2021a; Heinen and Kattel, 1992). There were hardly any consultations reported at the grassroots level, especially within the civic domain, during the conservation policy process, including ER. Contemporary institutional resources were fully utilized, and strict rules were the outcomes of the policy arrangement in the discursive sphere until the Earth Summit.

Between the Earth Summit in 1992 and the establishment of the Aichi Biodiversity targets (2011–2020), Nepal did not declare any additional NP and WLR, despite ongoing ER efforts. The conservation paradigm shift towards participation to focus on establishing Conservation Areas (CA) and Buffer Zones (BZ) around NPs and WLRs through regulations (GoN, 1996). During this period (1992-2010), conservation strategies shifted from protected areas to landscape-level approaches, along with the initiation of participatory conservation policies and practices. These policies were supported by the implementation of buffer zone programs, park-people partnership programs, corridors, and bottleneck restoration programs, even extending beyond the public funding window (MoFE, 2021). Funding for these programs came through international donors and development actors who influenced conservation policy discourses and national resource governance. Despite formulating people-centric policies (HMG, 1988b; MoFSC/ HMG, 2000), the translation of such policies on the ground differed.²⁰ Beyond 2010, ER efforts continued, including the expansion of existing NPs (e.g., Parsa NP) and the establishment of new ones (e.g., Banke NP), although some civil society organizations opposed them (Sunam and Paudel, 2013; Sunam et al., 2015). This suggests limited civic involvement and a lack of public consent in the process. Instead, government

decisions were largely guided by the Aichi Biodiversity Targets aimed at enhancing the integrity of the ecological landscape and achieving the terrestrial target of 17 % protected systems (CBD, 2011), to which Nepal is a party (Table 2).

Current actors and resources have played significant roles in shaping ER policies within the institutional framework. Strategically, discourses evolved from a focus on hunting to the displacement of human settlements and eventually shifted to a conservation paradigm that includes people in landscape-level and transboundary conservation. These shifts are reflected in the prevailing policies and practices in Nepal (Table 2).

3.3. Policy landscape of ecological resettlement

Since the establishment of democracy in 1951, the Government of Nepal has devised various policies and regulatory instruments to protect nature and natural resources. For example, the Nationalization of Private Forest Act of 1957 limited the ownership of privately owned forests, thereby extending government control over a large portion of nature and natural resources (GoN, 1957). In 1960, the Aquatic Animals (Protection) Act was enacted, banning the use of certain aquatic animals and strictly regulating fishing practices that negatively impacted waterdependent local and Indigenous communities (HMG, 1960). The Forest Act of 1961 allowed the government to demarcate any national forests and unregistered privately owned land as national property. If someone wanted to claim the property, they had to provide evidence within seven days, otherwise, it would be considered national property (HMG, 1961). The Land-related Act of 1964 further synchronized and dispossessed local and Indigenous people by including a clause requiring mandatory land registration and tariff payments for ownership (GoN, 1964). These various rules and regulations laid the foundation for the forced displacement of local and Indigenous people from their natural resources, limiting land access, and imposing registrations and taxes on which their livelihoods were completely dependent (Fig. 3).

After the enactment of NPWC Act (GoN, 1973), there was a significant increase in the displacement of human settlements within NPs and WLRs. This legal provision was further bolstered by the National Forestry Plan of 1976, which aimed to protect wildlife by declaring protected animals and regulating wildlife hunting (DoF/HMG, 1976; GoN, 1973), granting discretionary power to the government. If NPs and WLRs were deemed necessary for the protection of wildlife habitats and their potential dispersal areas, this often resulted in the displacement of

²⁰ Interviews with local and Indigenous people

Promulgation and matchmar 07 Nayl 5 fest Widdlife (Conservation) Act 1958 (Nepal Startt, section 2, to 15, dated 31.12.1958). Is dated 31.12.1958). Each and Widdlife service of Nepal (Nepal Cazette, dated. 1959). Braionalization of the private forests by Imining the different 1961 and baraning		Declaration of then Royal Chitwan National Parks as per the provision enshrined on the National Park and Wildlife Conservation Act, 1973, Article 3 (1) (Nepal Gazette,	Declaration of She- Phoksundo NP with incorporation the 21 settlements within the park boundary and allow them to reside and farming in their existing property as usual (Nepal	Sukla-Phanta NP (then Waldiffe Reserve) extension took place displacing the villagers by providing transportation and land clearance relief money together with supplying wood for house construction at a subsidized rate (Nepal Gazette, section 37, no. 37,	The government formed a committee to resettle the Padampur village of Chitwan to extend NP (Nepal Gazette, section 45, dated: 01.05.1995). The boundary of	Resource access was restricted by declaring a national zoological garden of 245.165 hectares incorporating eight community forests (Nepal Gazette, section 64, no. 44, dated; 30.03.2015).	Declared the zoological garden (Bhanu Zoological Garden, Tanahun) encompassing an area of 425 hectares and displacing 124 households from the site (Nepal Gazette, section 67, no. 3, dated: 01.05.2017).
size of privately owing forests base of geographic regions (Nepal Gazette, 1957). Enacted the Land-related land owner and their right Gazette, section 2, number	settlement, farming, registration or selling the national forests (Nepal Gazette, dated: 1961). Act, 1964 by defining the s upon the land (Nepal r 14, dated: 16.11.1964).	section 27, dated: 20.09.1973). If Government felt dee declares any parts of th National Park (NP) or the boundary in the Ga section 22, no. 20, date	ibin 77, dated: Gazette, dated: dated 04 01.1985). 09 1973). 06 08.1984). High-level commission overmment field etern necessary, it can clares any parts of the country as a tomal Park (NP) or Reserve by declaring boundary in the Gazette (Nepal Gazette, tio 22, no 20, date1 110.31973). Greenback (Nepal Gazette, dated 08.05.1977).		Shivapuri NP was realigned by excluding the settlements that were previously included in (Nepal Gazette, section 54, no. 8, dated: 07.06.2004).	Land tenures remain to the central government of national forests and PA for their effective management (GoN/MoFE, 2019).	Extension of Chitwan NP from 932 to 952.63 sq. km incorporating settlement evacuated area (Nepal Gazette, section 66, no. 33, dated: 17.10.2016
Before 1973		Between 1973-1991			Between 1992- 2010 Beyond 2010		
To protect aquatic animals, government of Nepal (then His Morety Government – HMG) formulates and enacts the Aquatic Animal Conservation Act 1960 (Nepal Gazette, section 2, no. 18, dated 1960). Conservation Act 1960 (Nepal Gazette, section 2, no. 18, dated 1960).		Declaration of Royal Karnali	Declaration of then Parsa Wildlife Reserv	ve Conservation of ecosystems and	Revision made to the National Parks and	Declaration of Banke NP excluding	Extending the area of Parsa NP (then Parsa
Government – HMG) formulates and enacts the Aquatic Animal Conservation Act, 1960 (Nepal Gazette, section 2, no. 18, dated: 1960).	that could be used during the regulated wildlife hunting by taking the license (Nepal Gazette, section 2, no. 7, dated: 29.06.1962).	whente Reserve (present Bardia NP) by displacing the numbers of settlements existed inside the boundary (Nepal Gazette, 8.03.1976)	(Fasa (VF) incorporating the Rambhauri village inside the reserve but demarcate the bounda enclosing such village (later displaced) (Neg Gazette, section 34, n 6 dated 21 05 1984)	genetic resources within the country will be ensured by protected the sites ary through the systems of national parks and pal reserves (Master Plan 10. for Forestry Sector, Dec 1988)	Wildlife Conservation Act to incorporate local people's involvement in the PA management and benefit-sharing mechanism. For this, formulated Conservation Areas	most settlements but including one settlement (later resettled) of area of 550 sq.km as a core zone and 344 sq.km its buffer zone (Nepal Gazette, section of no. 13	Wildlife Reserve) by incorporating the area acquired from human resettlement (1.19 sq.km) and from buffer zones enlarging the park from 499 to 627.39 sq.km (Nepal Gazette section 65 pp

Fig. 3. The landscape of the major policy decisions made by the Government of Nepal concerning ecological resettlements from 1950 to 2023, adopted from Nepal Gazette and policy documents (GoN, 2017, 2016, 2015a, 2015b, 2010, 1996, 1973, 1964, 1957; GoN/MoFE, 2019a; GoN/MoFSC, 2014; HMG, 2004, 1995, 1991, 1988a, 1988b, 1984, 1977, 1976, 1973, 1969, 1967, 1962, 1961, 1960, 1959, 1958).

people from their ancestral homes (DoF/HMG, 1976). The national conservation strategy further strengthened conservation efforts by integrating development goals aimed at the sustainable use of natural resources, preserving genetic diversity, maintaining ecological and life-supporting processes, and satisfying the livelihood, spiritual, and cultural needs of people associated with nature and natural resources (HMG and IUCN, 1983). This direction towards strict conservation often led to the displacement of human settlements or limited people's access to common pool resources. Following this, the Master Plan for the Forestry Sector continued the spirit of the conservation strategy, highlighting the protection of ecosystems and genetic resources as a top priority (HMG, 1988b). The plan emphasized long-term land use and management based on ecological capability, conserving unique ecosystems for sustainable biodiversity while displacing or dispossessing people.

The period from 1992 to 2010 saw a more harmonious era for parks and people in terms of displacement. This was marked by the establishment of conservation areas (CAs) and buffer zones through amendments to the NPWC Act (GoN, 1973) and the formulation of conservation and buffer zone regulations (GoN, 1996). However, previously initiated ER plans continued. For example, people were displaced from Suklaphanta NP (HMG, 1988a), a resettlement plan was designed for Chitwan NP (HMG, 1995), and the boundary of Shivapuri NP was realigned to exclude private properties (HMG, 2004). Additionally, the government extended its control over natural resources and limited free access to essential livelihood resources by establishing CAs and buffer zones around NPs and WLRs.

After 2010, four human resettlements were planned for ecological and biodiversity conservation reasons. The first occurred in 2010 when Nepal declared the Banke National Park, covering an area of 550 km² in the western lowlands, displacing 24 households (GoN, 2010). The second was the declaration of a National Zoological Garden in Bhaktapur district, the smallest district by area in the country, which involved incorporating eight community forests and excluding the local and Indigenous people from using these resources (GoN, 2015a). The third resettlement was the extension and upgrading of Parsa National Park (formerly a Wildlife Reserve), which displaced 473 households (GoN, 2015b). The fourth involved the declaration of Bhanu Zoological Garden in Tanahun district, displacing 124 households over a 425-hectare area (GoN, 2017), making it one of the largest zoological gardens in the world (Brown, 2022). Notably, while Nepal endorsed the Nagoya Protocol – aimed at access to genetic resources and fair and equitable benefits sharing (GoN, 2018) – the continued displacement further alienates local and Indigenous people from natural and genetic resources, undermining the essence of the protocol.

4. Discussions

4.1. Shaper and makers of ecological resettlement policy

4.1.1. Before the Earth Summit

Several factors contribute to shaping Nepal's conservation strategies, including those leading to ecological resettlement (ER). Initially, conservation strategies were predominantly driven by national interests, focusing on hunting regulations (Aryal et al., 2021a; Heinen and Kattel, 1992). However, various countries' rulers worldwide were involved, with the then King often invited for recreational hunting (Mishra, 2010). Subsequently, there was a shift towards prioritizing biodiversity protection by displacing human settlements and regulating hunting activities through established national regulations (GoN, 1973). Notably, Indigenous communities in the Mountains and Himalavas Regions were not displaced during the formulation of the Himali National Parks Regulations.²¹ These regulations permitted people's residency within the National Parks, unlike in low-land areas, promoting co-management approaches and regulated resource utilization (GoN, 1979). However, pressure to protect keystone species and regulate international trade exerted significant pressure, especially in Nepal's low-land region,²² leading to strict protection measures being implemented on the ground to conserve wildlife and their habitats and gain trust in the international community.²³ Consequently, conservation efforts began without human settlements within wildlife habitats, resulting in the planning and execution of extensive ERs.

4.1.2. After the Earth Summit

Nepal revamped its conservation policies with a more participatory approach after the Earth Summit and its conventions. This includes the establishment of CAs and buffer zones incorporating the residencies of local and Indigenous people together with nature conservation adopting

²¹ Interviews with local and Indigenous people

 $^{^{\}rm 22}$ Interviews with policy makers and experts

²³ Interviews with civil society organizations

sustainable resource use principle (GoN, 1996, 1973). After the startup of landscape-level conservation initiatives in 2000, PAs tried to link through biological corridors with the principle of establishing horizontal and vertical connectivity across the socio-ecological system largely guided by the conception of international policy discourses. The paradigm of extending PAs and connecting them in a landscape further catalyzed by the international decisions and participation in bi- and multilateral environmental agreements, in turn, developing nations including Nepal compelled national policies aligned with them (Fig. 2). This is evident by the fact that when CBD drafted the 2030 biodiversity framework of ambition of 30 % global protected system (CBD, 2022), as soon as, Nepal blue-printed the same narration included in national policy documents having same amount of its' landmass under PAs by that end (DNPWC, 2022). This scenario is an exemplary case of how global policy discourse and decisions blindly impact the developing world, especially in the conservation sectors. For a country like Nepal having well below 15 % PAs excluding settlements (buffer zones and CAs) and residing majority of the population outside the urban areas, it is challenging to increase the protection size by more than double in less than a decade amidst resource governance confrontation and the likelihood of human's resettlements. This signifies the expansion of PAs in biodiversity-rich tropics likely displaced local Indigenous populations, disproportionately affecting the poorest.

The ground reality is far distant from those who come up with black and white, especially in accounting for the outcomes of conservation. Although conservation objectives are reported to be achieved through tremendous efforts, there are always the victims being the successful outcomes either limiting access to the resources in the form of dispossession or displacement from the ancestral land or both (Bhattarai et al., 2017) or even sacrifice the life and properties of humanity. For instance, evidence is that celebrating and accounting for a huge success of conservation in the international arena by protecting flagship mega carnivore (Royal Bangel Tiger - Panthera tigris tigris) for more than doubling its number (DNPWC and DFSC, 2022) on the one hand. Little concerns are shown at the ground level even sacrificing the lives of more than two dozen poorest of the poor from that single predator every year including those victims displaced from the PAs (DNPWC, 2023), on the other. Further, the poorest of the poor people, who were solely dependent on natural resources (Kates and Haarmann, 1992), most of them were displaced or dispossessed from PAs undermining their livelihood, cultural integrity, placed-based recognitions, and personal properties without considering the basic human rights principles (Ebeke and Ntsama Etoundi, 2017; Macintyre et al., 2008) and jeopardize their livelihood entitle to conservation and biodiversity protection. As a result, the blessings of natural resources turned into a curse for those people (van der Ploeg, 2011). In the globalized era, decisions in international forums must consider their direct impact on the world's poorest, often reliant on natural resources for survival. Thus, future conservation policies should align with national and local needs rather than blindly adopting global approaches. Governments must customize policies to sustain both people's welfare and nature's integrity.

4.2. Dynamics of ambiguous ER policies

We found that human displacement has been taken as an unavoidable strategy in the establishment or expansion of protected areas (PAs), particularly for NPs and WLRs in Nepal. Similar types of practices have been observed across the world (Brockington and Igoe, 2006; Rangarajan and Shahabuddin, 2006). This is more frequent in developing countries such as India (Kabra, 2009; Lasgorceix and Kothari, 2009) where at least 17,345 households have been displaced (Kabra and Das, 2022), evacuated >220,000 families from a single site from the Dongting Lake Area (Xiong and Wang, 2010) and 343 Indigenous families from park site in Shanghai in China (Zhu et al., 2022), evacuated seven villages in Tanzania (Sirima and Backman, 2013) and evicted 165 households in Mozambique (Otsuki, 2023; Spierenburg, 2013) while establishing protected systems. In Nepal, the complete exclusion of human settlements has been observed especially in the NP and WLR in the lowland area (Lam and Paul, 2013; Maclean and Strade, 2003) with >7608 households being resettled for conservation reasons. However, there are several NPs from the Hills, Mountains, and the Himalayas regions that incorporate the human settlements within them. For example, Sagarmatha NP (a World Heritage Site) and Shey-Phoksundo NP, accepted human settlements within the park boundaries.²⁴ Learning from the Himalayas' PAs, lowland parks can follow similar principles without compromising socio-cultural integrity. Harmonizing ER policies and adopting mountain NP strategies could create a win-win environment for people and nature.

4.2.1. Governance conflict over natural resources

There is an existence of serious conflicts between the state and the local and Indigenous people over the governance of the resources in NPs that accept a human settlement within their boundary due to injected regulatory clauses (Gurung, 2023; Poudyal et al., 2020; Sunam and Paudel, 2013; Sunam et al., 2015). This observation is consistent with our finding of a persisting unhealthy relationship between park people (Suklaphanta NP and re-settlers) due to ER. For the harmonious coexistence of nature and people, a conducive policy arrangement is deemed necessary to ensure the traditional resource-use rights of the local and Indigenous people in the place-based customs as enshrined by the constitution of the country (GoN, 2015c). Yet, it is also unclear in the international conservation policy whether NP (IUCN category II) and WLR (IUCN category IV) are being envisioned within the socio-cultural landscape or not. Thus, a global ecological resettlement guideline defining the boundary of protected areas systems, especially for IUCN categories I-IV could be a plausible way to bring consistency across the countries and uniformity within (sub)national level.

In contrast, the government continuously dispossessed and displaced resource-dependent poor people while including elites in the name of development. The government grants permissions for activities like hotel and motel construction, infrastructure development (e.g., roads, cable cars, hydropower dams, concrete watch towers, camping, and trekking), and operating wildlife tourism in lieu of nominal royalty (GoN, 2019b, 2019c, 2019a, 1973). For example, the government of Nepal granted permission to operate the Tiger Top Hotel inside of the Chitwan NP, and two hotels just next to the Rara Lake inside the Rara NP. In the meantime, forest dwellers (e.g., the Chepang communities) and resource-dependent poorest of the poor people have been chased, demolished, and burned down their huts (houses) even from the buffer zone area of Chitwan NP²⁵ deploying excessive state power (Nepal Army) in the border areas of Nepal and India (Sunuwar, 2020). Similar biases on restriction on the resource use to the resource-dependent communities reported across the country (Gurung, 2023; Sunam et al., 2015) and allowing permission to operate hotels across the Himalayas regions of Nepal such as the Langtang NP, Sagarmatha NP, and Makalu-Barun NP (Bhochhibhoya et al., 2020). This deliberate action of the exclusion of the poor but the inclusion of elites in the NP and WL reserves is not only unfair but also greatly regrettable for the government itself, people, donors, and civil society organizations as well.

4.2.2. Participation and conservation benefit sharing after ER

Although advocated participatory conservation approaches engage local and Indigenous communities and equitable benefit sharing (GoN, 1996), these all are deception of participation.²⁶ This is uncovered by the evidence of restricting regular access to the resources (Brown, 1998; Gurung, 2023), increased crop raiding, depredation of livestock and even compromising the life of the local and Indigenous residents by

²⁴ Interviews with policy practitioners

²⁵ Interview with local and Indigenous people

²⁶ Interviews with local and Indigenous people

wildlife (Acharva et al., 2016; DNPWC and DFSC, 2022; Sharma et al., 2021) healing with providing limited relief after fulfilling the requirement of long lists of documentation (OPMCM, 2023). For example, the ER of Chitwan NP has been done outside the PAs (buffer zones) so that neither foregone cost of the people recognized nor consulted nor shared the conservation benefits raised from the parks. Further, channeling tourism benefits the elite investors (Mascia and Claus, 2009; Sirima and Backman, 2013), no real employment generation to the local and Indigenous people but over the burden of volunteer meetings²⁷ (Chaudhary et al., 2018), and unequal and nominal benefits sharing from the limited source of revenue (DNPWC, 2023) are other evidence that the rhetoric of participation is a delusion. To get rid of these unresponsive practices of the conservation system and provide sovereignty power over resources to the local and Indigenous communities, the management model of Kanchanjanga CA of Nepal could be one of the plausible strategies (GoN, 2008), among others. The model of CA management grants sole decision-making power to the local public, with the government providing facilitation on legal, technical, and transboundary aspects if needed, but does not influence resource governance.

On top of the fake participation rhyme, the situation of implementing the Nagova Protocol on Access to Genetic Resources and the Fair and Equitable Sharing of Benefit Arising from their utilization of the Convention on Biological Diversity (GoN, 2018) is still stagnated. The revenue (benefits) generated from the PAs is quite disproportional across the PAs to address the growing demands on social and infrastructure needs of the victimized (including displaced) communities (DNPWC, 2023; GoN, 1996), this does not cover the administrative cost of PAs either²⁸ (DNPWC, 2023; MoFE, 2021). Rather than imposing the blanket approach of conservation rhetoric on all, it would be more rational if PAs could be managed with the model of the 'sister-park approach' to distribute conservation benefits to all PAs equitably to realize the conservation outcomes across all evictees. For example, Chitwan NP generates a relatively huge amount of revenue every year to share with local and victimized communities, however, the adjacent Parsa NP and its displaced people always struggle to compromise basic needs in their vicinity with nominal revenue generated from the park (DNPWC, 2023). The sister-park system reduces PA management burden, fosters stewardship among communities, including resettled locals and Indigenous people, curbs illegal activities, and fosters trust between the park and people,²⁹ among others. This will enhance the realization of conservation outcomes, in turn, easing for smooth running of the livelihoods of nature-dependent communities (Mascia and Claus, 2009), and sustain the park-people harmony.

Moreover, the imposition of strict regulations exacerbates the threat to traditional rights over local resources used by displaced local and Indigenous communities. Consequently, the new regulations posed challenges to local livelihoods, restricted resource access, and infringed upon established resource-use rights. For example, within the expanded area of Parsa NP, community-based leasehold forests, initially granted to local communities under a 40-year lease, encountered complications when the NP'Fs extension led to the imposition of the NPWC Act (GoN, 1973). Unlike the Forest Act (GoN, 2019c), the NPWC Act restricts the forest resource use rights previously granted to locals. This is an example of conflicting policies and overlapping regulations that further marginalize displaced local and Indigenous communities and limit access to resources. In addition, although policy documents envisioned the acceptance of social-cultural integrity across the ecological dynamic landscape (GoN/MoFE, 2019a; GoN/MoFSC, 2016; MoFSC/HMG, 2000; Pandey et al., 2023), the recurring practice of displacement and resource dispossession terrace the existence of disparity in the policy and practice (Fig. 2). Despite strict protection is somehow beneficial for restoration

and recovery of the landscape (Laudari et al., 2022; Pandey et al., 2022), the findings suggest a participatory, informed consent, sharedownership and stewardship conservation policies including ER would be sustainable strategy for realizing conservation outcomes for the benefits of both people and planet.

4.3. Structural and strategic factors of the ER policy landscape

Policies regarding both people and natural resources are crafted by a government, typically with the consent of the citizens through established governing systems. ER policies possess a multifaceted influence, impacting both individuals and nature. Nepal's discourse on ER policies reflects a diverse spectrum of actors, powers, discourses, and resulting regulations throughout its history.

4.3.1. Actors constellation

Before the re-establishment of democracy in 1990, the predominant actors and decision-makers of Nepal's ER policy dynamics were centralized around the Royal Palace and were high-ranking officials within the government system (Aryal et al., 2021b; Laudari et al., 2020; MoFE, 2018). While there were instances of policy consultation with foreign experts, particularly in natural resource management and wildlife conservation, the government primarily established wildlife sanctuaries and tiger parks for hunting rather than comprehensive conservation purposes (Aryal et al., 2021a; Heinen and Kattel, 1992). It was only after the international wave of conservation dynamics post-1970 that Nepal initiated formal conservation efforts (GoN, 1973; Heinen and Kattel, 1992). The NPWC Act of 1973 marked this shift introducing substantial regulations controlling hunting activities (Heinen and Kattel, 1992). Before the early 1990s, we observed a minimal influence on the policy process of civic, rather, private properties could be grabbed by the government for conservation reasons provisioning compensation equivalent to the property's assessed value as per the prevailing rules (GoN, 2019c; HMG, 1988a, 1961).

Unlike the civil resistance and political favoritism support in allegations while declaring PAs (Sunam et al., 2015), we noted that neither internal civil society stakeholders nor their federation and external actors stood against the decisions of the government before the Earth summit and its conventions. Rather, the government decided to favor external actors to gain the political trust of their external counterparts (Aryal et al., 2021b; Laudari et al., 2020). However, policies regarding the establishment and extension of protected areas through resettlement approaches were not clearly defined (GoN, 1979, 1973) but executed with ad-hoc government decisions.³⁰ Until the early1990s, international development partners such as ADB, FINNIDA, IUCN, and United Nations Food and Agriculture Organization (UNFAO) were predominant advisors whereas local actors' engagement remained minimal in shaping conservation policies (Table 2). This scenario traces the gaps between policy and actions, especially in the constellation of the right-holding actors in the conservation measures in the global south till the Rioconventions.

Further, liberalization and globalization policies have significantly impacted the involvement of stakeholders' constellations in the policy process (Lenschow et al., 2016) after the Rio-conventions. The establishment of participatory resettlement committees (HMG, 1995) and the creation of a quasi-governmental conservation organization (e.g., NTNC) by the government illustrate this participatory shift concerning ER (GoN, 1982). The involvement of local people in the policy process somehow opened the door while amending the NPWC Act and the implementation of buffer zones in NP and WLR provisioning the mandatory participation of local people concerning ER (GoN, 1996, 1973). With Nepal's federalization, future stakeholders in ER-related policies envision a diverse group, including various levels of

 $^{^{\}rm 27}$ Interviews with civil society organizations, and local and Indigenous people

²⁸ Interviews with policy practitioners

²⁹ Interviews with policy practitioners

³⁰ Interviews with former policy practitioners

government, political bodies, the private sector, civil society organizations, local communities, independent experts, planners, conservation partners, and federations representing Indigenous and local people (GoN/MoFE, 2019a, 2019b; GoN/MoFSC, 2016, 2014). Their positive roles in devising conservation policies and deliberative governance are also highlighted by past studies (Ojha et al., 2009; Sunam and Paudel, 2013; Sunam et al., 2015). These entities are expected to play coordinating, communicative, and participatory roles in executing ER policies on the ground as envisioned by the Protected Area Management Strategy 2022-2030 (DNPWC, 2022). Various interest groups and stakeholders interplay on the ground in the conservation policy process (Brown, 1998), however, in this neoliberalism, encompassing all sorts of stakeholders under the umbrella of the broader conservation framework is quite challenging. For this, a stakeholder mapping guideline could foster designing and defining the shared conservation responsibilities and benefits among the stakeholders including local and Indigenous people, and the state to achieve the national targets (DNPWC, 2022) and the international ambitions (CBD, 2022; IPCC, 2023; UN, 2015).

4.3.2. Resource factors

Framing policies are predominantly governed by the power structure of resources. Nepal's transition to a series of political transformations from Monarchial ruling to the Federal Republic governing system after 1950 significantly influenced conservation policies (Brown, 1998; GoN, 2015c; Heinen and Shrestha, 2006). However, the trend of displacing human settlements from parks continued for extension and new establishment purposes over the entire period in one or other forms.³¹ Although there were reported to be improvements in participatory management systems within protected areas in resource governance after the 1980s (Aryal et al., 2021a; Brown, 1998), there remained indirect control over the resources for free access and use rights of the local and Indigenous people (GoN, 1996) and continued the dispossession and displacement from the NP and WLR. With the globalization and internationalization of the conservation policy, the power interest in ER through extending the area of the protected system largely switches towards the external factors (Fig. 2). This is vividly evident by the fact that the adoption of blue-print narrations of international policies into national conservation strategies (DNPWC, 2022; DoF/HMG, 1976). The interest behind that sort of policy process guided by the extension of international relations, 32 signatory party of bi- and multi-lateral environmental agreements and their obligations,³³ and fear of losing credibility remains in the government and high-level bureaucrats³⁴ (Arval et al., 2021a; Bhattarai et al., 2017). Such trend has also been reported by scholars that the competition in ratifying almost all the bilateral and multilateral environmental and conservation treaties, agreements, and conventions by the global south nations (Lechner and Spilker, 2022; Roberts et al., 2004) including Nepal (MoFE, 2018). Ultimately, these international references and resources entangle the national-level conservation initiatives, in turn, national conservation priorities deviate towards the victimizing and dispossessing of the local and Indigenous resource-dependent poor on the ground, especially in the developing world.

We observed that the minimal power devolves to the local and Indigenous communities in the conservation policy process. Rather, instrumenting process-oriented national policies, and international obligations added extra administrative lingering of permissions and documentation,³⁵ overburden the workload,³⁶ and consume additional resources and time entitled to consultation and participation (Poncelet,

2001), both for service providers and service seekers.³⁷ For instance, the creation of buffer zones with share the conservation benefits ranging from 30 to 50 %-towards local development initiatives (GoN, 1973) needs a series of volunteer meetings and a consensus process (GoN, 1996). As a result, local people bear the social and economic cost entitled to consultation and participation in the series of volunteer general assemblies, community-based users' committees, and council meetings (Pandey and Pokhrel, 2021; Plummer and Arai, 2005). Further, unlike community-conserved areas (GoN, 2008) and community-based resource management systems (Pandey and Pokhrel, 2021), the final decisions power over the resources generated from the parks and compensation relief damage incurred due to wildlife remains to the state-deployed authorities (GoN, 1996; OPMCM, 2023). This authoritative deliberation further discloses the void of the participatory resource governance fantasy. Despite being a signatory party to biodiversity conventions (CBD, 1992), adhere the principle of Aichi Biodiversity Targets (CBD, 2011), and formulating country-driven biodiversity plans (DNPWC, 2022; GoN/MoFSC, 2014), Nepal's ground reality found quite far from policy documents from the lens of power devolution in conservation policy including ER process. Restructuring conservation policies by incorporating the resources and power interests of local and Indigenous communities is essential to realizing conservation benefits at the grassroots level, fostering improved outcomes and a sense of ownership for harmonious coexistence.

4.3.3. Narratives and discourses

Policy discourse determines how, why, and by whom a policy is formulated and communicated to the public sphere (Schmidt, 2008). In Nepal, while high-level bureaucrats, experts, and NGOs contribute to policy ideation, the civil society, conservation partners, and various activities shape policy problems and contexts in the national conservation policy process (Table 2). Thematic ministries and councils then conceptualize policy statements, and bureaucrats and conservation partners oversee implementation and monitoring, providing feedback for policy revision in a wide array of actor constellations in the discursive sphere.³⁸ However, we noticed that all the processes of narratives and discourses roam around the ambition of international discourses in the discipline (Fig. 2). For example, the global community set up the target of a 30 % global protected system by 2030 (CBD, 2022), as such Nepal's policy storyline goes on aiming the same proportion (30 %) of its land under protection by that end (DNPWC, 2022).

Inconsistencies and incomplete policy discourses remained prevalent throughout the entire period (1950s-2023) of conservation policy arrangement in ER discourses in Nepal, as well as across the developing world. For example, in India (Kabra, 2009; Mahapatra et al., 2015), Mozambique (Otsuki, 2023), and Tanzania (Sirima and Backman, 2013). This is largely led by the factors of force-displacement over volunteer resettlement, non-participatory decision-making, limited consultation, and lack of informed consent with the local and Indigenous people (Mahapatra et al., 2015; Rangarajan and Shahabuddin, 2006; Schmidt-Soltau and Brockington, 2007), and disparity in providing compensation (Lam and Paul, 2013; Maclean and Strade, 2003). Further, although the policy documents provoke the consultation, participation, and reflection of the voice and choice of local and Indigenous people and civil society organizations (DNPWC, 2022; GoN/ MoFE, 2019a, 2019b; GoN/MoFSC, 2016), the discourses and storylines entirely dominated related conventions' targets (CBD, 2022, 2011; UN, 2015) beyond the voice and choice of grass-root civic.³⁹ We also find that the government wants to authenticate the ideated policy statements from the local people as such but not reflecting and incorporate their interests and needs as reported by Sunam et al. (2015).

³¹ Interviews with civil society organizations

³² Interviews with policymakers and experts

³³ Interviews with civil society organizations

³⁴ Interviews with local and Indigenous people

³⁵ Interviews with local and Indigenous people

³⁶ Interviews with policy practitioners, and local and Indigenous people

³⁷ Interviews with policy practitioners

³⁸ Interviews with policymakers and experts

³⁹ Interviews with local and Indigenous people

Proper communication of policies is key for translating them into practice. Despite Nepal's well-established coordinating policy sphere,⁴⁰ the communicative aspect within the political sphere remains lacking (Laudari et al., 2020). Strategies like consultative workshops, email exchanges, and online portals have been adopted for policy coordination and communication from the grassroots level to the central forum recently (DNPWC, 2022; GoN/MoFSC, 2014). However, we observe that all the discourses from the ideation of policy statements to the communication and formulation process remain limited to certain actors and institutions. For instance, the policy of protecting biodiversity and genetic resources (MoFSC/HMG, 2000), and in-situ (onsite) conservation policy (GoN/MoFSC, 2014) remain in the domains of government authorities which ultimately impact the people and dispossess them but unknown to the real victims.⁴¹ This is not too far from the observation reported in Jasper National Park of Canada (Youdelis, 2016) and bypassing the forest rights holders reported in conservation policy discourses in India (Mahapatra et al., 2015). As we observed in most of the ER policy communication, scholars also reported the monolithic government's dominancy from a top-down policy approach in an authoritative deliberation (Ojha et al., 2009; Sunam and Paudel, 2013). To realize the stake in the conservation, the discursive spheres of ER policies should be extended to the ground level beyond coordinative and communicative institutionalism but in a trans-disciplinary approach at a multi-sectoral level both in a vertical and horizontal sphere.

4.3.4. Rules and regulations

Standardization of policy ideas and narratives results in rules, showcasing a transition from strict protection to participatory and landscape-level transboundary conservation paradigms in Nepal's ER policy dynamics (Aryal et al., 2021a). Although conducive policies and regulations were devised during the period from 1950 to 2023, the human displacement from the NP and WLR continued (Fig. 3). Despite the reporting of scholars for the period beyond the 1980s as a paradigm of participatory conservation (Aryal et al., 2021a; Khadka and Nepal, 2010), we find the same period found as a nightmare for poor communities and Indigenous people to be displaced from their original residencies and restricted access to natural resources (GoN, 1996; Gurung, 2023). This challenges the notion of participatory conservation regulations, as it led to dispossession, eviction, and cultural detachment from traditional lands, affecting livelihoods and cultural ties (Lam and Paul, 2013; Mascia and Claus, 2009). Further, although the Constitution of Nepal enshrines the fundamental rights of the citizens over their property and residencies (GoN, 2015c), by-laws still provide the discretionary power of declaring any part of the country as PAs even grabbing private properties if deemed necessary (GoN, 1973), which tends to evict the people at any time and from any place. The provision of compensation has been enshrined to the equivalent land or monetary amount to the grab properties as per the valuation system of government rules (GoN, 2019c) but there is a huge discrepancy in price between this valuation system and the contemporary market. Consequently, the citizens (property owners) always realize that their properties have been undervalued and not compensated well⁴² (Ghimire, 2017). Instrumenting the property valuation system as per the market value would be the plausible way to redress grievances in this regard.

Comparing conservation strategy (i.e., ER) with other development projects also ignites the vibes of dissatisfaction with the compensation mechanism. The resettlement issue of Suklaphanta NP of Nepal is an example, where the issue of reasonable compensation has been unsettling for >35 years back. Yet, the government of Nepal formulated the 32^{nd} commission to settle the issue but remained unresolved.⁴³ Similar reporting has been made by the scholarships that aggravated the issue of compensation disputes due to comparing conservation strategies (ecological resettlement) with devastating and spendthrift megadevelopment projects such as displacement from hydropower construction (Agrawal and Redford, 2009) and local elite-dominant politics interplay in the compensation distribution (Heinen and Shrestha, 2006). This suggests that, although there are rules and regulations in place, these always do not work on the ground. However, developing consensus, consultation, recognition, adopting volunteer processes and participatory decision-making mechanisms, promoting dialogues, and getting informed consent from local and Indigenous communities would play a vital role in finding the resolution of such ER-related issues (Dawson et al., 2018; Schmidt-Soltau and Brockington, 2007). Hence, flexible, informed, grounded, and evidence-based regulatory measures are suggested in conservation sectors.

4.4. Lessons learned and limitations

We have taken five key lessons after having discussed and analyzed the ER policies from the discursive institutionalism perspective. First, the displacement of people occurred predominantly for the establishment and extension of PAs, such as NPs and WLRs. However, examples like community forestry in Nepal suggest that conservation is possible without PA systems, emphasizing local and Indigenous ownership and stewardship (Laudari et al., 2024; Pandey and Pokhrel, 2021). This is evident by the fact that more than two-thirds of Nepal's ecosystems are reported to be functioning in the vicinity and together with the human settlements in the mid-hills and mountain regions where only <5 % of the landmass is under strictly protected through national parks and reserves (GoN/MoFSC, 2014). These regions comprise of showcase community-based natural resource management modalities (Pandey and Pokhrel, 2021) and therefore, we argue that community-based conservation areas need to be green-tagged and accredited under conservation area systems which will ensure conservation without displacing the people from their ancient land as a viable solution. This could only be possible to integrate this with a continuation of landscape and transboundary level conservation modality with the meaningful participation of local and Indigenous people which has been practiced in the country (DNPWC, 2022; GoN/MoFE, 2019a; GoN/MoFSC, 2016).

Second, the developing world adopts the blue-print policy narratives whatever outcomes are disclosed from the international forum. This is evident by the fact that while the global target of achieving a 30 % protected system by 2030 is endorsed (CBD, 2022), Nepal did in line with this. In such cases, customization of international policies to the national contexts, is crucial, and the way out could be the conservation initiatives to be continued including the people's settlements as already in practice in the Mountainous and Himalayas NPs of Nepal, are suggested. Third, policy process inconsistencies underscore the differential treatment of people and nature, calling for global ER guidelines to harmonize the nationally adopted differential conservation policies about human inclusion or exclusion under various IUCN categories of the PA system especially for categories I to IV.

Fourth, the study underscores the prevailing political and practical bias upon resource-dependent ultra-poor Indigenous and local people for conservation while favoring elites in the name of infrastructure development, economic incentives, tourism promotion, and wildlife sighting (GoN, 2019c, 2019a, 1973). This policy direction is deemed detrimental to conservation outcomes, emphasizing the need to revisit these policies for the sustainability of the socio-ecological system. Fifth, in the absence of a global ER policy framework, the different practices are observed across different regional and continental scales. Unlike a sound approach to conservation policies regarding ER in some parts of the developed countries (Macintyre et al., 2008; Youdelis, 2016), the developing world's policies have negatively affected local and Indigenous people's site-based belongingness, cultural and livelihood associations with nature and natural resources (Lam and Paul, 2013;

⁴⁰ Interviews with policy makers and experts

⁴¹ Interviews with local and Indigenous people

⁴² Interviews with local and Indigenous people

⁴³ Interviews with policy practitioners

Mahapatra et al., 2015; Peng et al., 2020b; Schmidt-Soltau and Brockington, 2007; Sirima and Backman, 2013). Therefore, if future ER feels deemed necessary, assurance of all basic standards in resettled places to be ensured by the respective government, as observed in China (Su et al., 2016; Zhu et al., 2022), unlike partially supported with compensation for land but not providing reestablishment assistance in all Nepalese cases, and similar instances in India (Kabra, 2009; Lasgorceix and Kothari, 2009) and complete displacement (but not resettlements) in African countries (Otsuki, 2023; Spierenburg, 2013). A conducive strategy will only ensure the sustainability of the socio-ecological system ensuring the win-win situation for environment conservation and community development.

Overall, this study focuses on ecological resettlement, examining the displacement of human populations for biodiversity conservation. However, it does not address displacement caused by other factors such as infrastructure projects, conflict, or natural disasters. Additionally, it offers a macro-level policy analysis of Nepal and does not delve into the implications of transnational, subnational, and local-level conservation policies, leaving room for future research. Moreover, we acknowledge that our study is primarily qualitative in nature and limited to policy analysis. Future research could explore policy-practice interfaces using statistical and quantitative analysis to capture grounded scenarios regarding ER. Nevertheless, the findings serve as a reference for reconsidering global conservation policies (CBD, 2022; CITES, 1973; UN, 2015) and national aims of building resilient protected area systems (DNPWC, 2022; Fajardo del Castillo, 2021) along with people's welfare and sustainability of the planet.

5. Conclusions

The practice of displacing residents for biodiversity conservation has been historically prevalent. This study examines Nepal's evolving conservation policies, particularly focusing on ecological resettlement (ER) strategies, revealing a complex interplay of factors shaping conservation policy. We observe a shift from early conservation strategies driven by national interests to more inclusive approaches influenced by international agreements, all advocating for the establishment and expansion of protected areas (PAs). This has resulted in the displacement of local and Indigenous communities from their ancestral lands. Distinct phases of policy paradigms related to ER are observed in Nepal, ranging from restrictive protection without displacing people to the continuation of strict protection alongside the evacuation of settlements from PA boundaries. Despite efforts towards equitable conservation benefit sharing and participatory transboundary landscape conservation, human displacement remains a significant issue, as evidenced by the displacement of over 7600 poor and Indigenous households so far. The analysis reveals ambiguities in ER policy dynamics, where human displacement is often seen as unavoidable for PA establishment, resulting in governance conflicts over resources and challenges in achieving harmony between people and nature.

The study uncovered the structural and strategic factors influencing policymaking, such as the roles of various actors, resource allocation, and prevailing discourses shaping policy pathways. Instead of adopting a blueprint conservation approach, mostly inspired by international policy decisions, we urge that ER policies be guided by national interests and reflect the voices of local and Indigenous communities. The current conservation policymaking approach is found to be ambiguous and reflects that the most economically vulnerable individuals were coerced into displacement to accommodate elites under the guise of development. This ambiguity is evident in the differential approaches to including or excluding people from the same categories of PAs in Nepal. Further, international policies lacked clarity regarding the conservation status of areas with or without human settlements, particularly for IUCN categories I to IV, which need to be well-defined and clarified due to their implications at the national level, as observed in Nepal. Further, despite attempts at participatory approaches in the ER policy process,

decision-making remains centralized, limiting local community empowerment. This study also sheds light on ER policy dynamics, offering insights and proposing pathways for more inclusive and effective conservation strategies tailored to national and local contexts, rather than adopting ad-hoc global agendas at the national level.

Drawing from the findings and discussions, we argue for a local people-friendly conservation policy, considering the potential social costs and conservation implications of ecological resettlement. This involves adopting national conservation stakeholders' mapping guidelines, promoting community-based conservation, validating existing community-based resource management models, critiquing displacement-oriented approaches, and advocating for equitable treatment of citizens regardless of social status. The study underscores the urgent need for comprehensive revisions to conservation policies, aligning ecological resettlement strategies with local and Indigenous community interests, prioritizing inclusive conservation efforts, and equitably distributing conservation benefits to foster grassroots ownership and stewardship. Recognizing the significant impact of conservation decisions on the world's poorest populations, especially amidst globalization, decision-makers and practitioners must prioritize including local and Indigenous communities in conservation planning and benefit sharing. This study has illuminated the influence of international conservation policies on local communities, especially in developing nations, through tailored approaches. Most importantly, our research has illustrated a set of standards for devising conservation policies in the developing world to effectively achieve national and international objectives while ensuring a balance between social welfare and ecological considerations through careful planning.

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Hari Prasad Pandey: Writing – review & editing, Writing – original draft, Visualization, Validation, Project administration, Methodology, Formal analysis, Data curation, Conceptualization. Tek Narayan Maraseni: Writing – review & editing, Validation, Supervision. Armando Apan: Writing – review & editing, Validation, Supervision. Kishor Aryal: Writing – review & editing, Visualization, Validation, Methodology.

Declaration of competing interest

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

Data availability

The article presents all the data, and no additional data are available.

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Annex. Checklist for stakeholder interviews

Date:	I	Address:		Time:		Name:
	(opti	onal), Age	: Year. Ed	ucation:	, Pı	rofession:
	Political	affiliation	:	(opt	ional),	religious
belief:						

Which of the following community do you advocate or belongs to?

- A. Buffer zone management committees, forest management communities, ethnic groups, religious groups (communities)
- B. Park and forest authorities, and conservation-related policy executors (staffs of Parks and DFOs)
- C. Checklist for civil society organizations (NTNC, WWF, ZSL, BCN,)
- D. Local, provincial, and central political and elected members, policymakers, and high-level bureaucrats (political bodies)

Checklists (note down in bullet points).

- 1. Do you know/heard/engaged about the ecological resettlement in your areas?
- 2. Was ER in favor of human society? How?
- 3. Was ER in favor of wildlife? How?
- 4. Was ER in favor of the whole ecosystem and environment? How?
- 5. Have you ever engaged in decision-making or any other roles of ER policy-related activities?
- 6. What were the basic elements (drivers) to make the ER decisions?
- 7. Who decided on ER?
- 8. Were these decisions publicly accountable?
- 9. What were the contemporary local to global targets (commitments to the countries) concerning ER?
- 10. Who were the primary leaders and supporters of ER?
- 11. How is the compensation fund managed if applicable?
- 12. Were the decisions rational?
- 13. Were the decisions justifiable?
- 14. Were the decisions participatory?
- 15. Were the decisions made balanced (both for human beings and non-human lives and the ecosystem)?
- 16. Why did the policymaker come to such a decision (ER)?
- 17. What are the lessons learned from the past ER?
- 18. Were the decisions reconsidered or revisited in subsequent similar decisions if happened one after another?
- 19. How to incorporate the lesson learned in similar exercises in the future?
- 20. Do you think is this a good strategy for conserving biodiversity by relocating the human population?
- 21. If not, how could be harmonized biodiversity and social welfare?
- 22. How was the situation in the forest and wildlife before the
- resettlement of human residency? 23. How was the situation of the society before and after the settlements?
- 24. What is the overall status of the forest/parks/ecosystem/environment before and after relocation?
- 25. How the co-existence possible in the future?
- 26. What could be a strategic decision to conserve biodiversity and assure human welfare?
- 27. What could be the alternative options other than ER for securing biodiversity and maintaining social welfare?
- 28. Is this a good idea to relocate the human settlement to form the park and biological corridors or is entitled to conservation? Yes / No, why?
- 29. What are the factors to be considered if yes, or no for the future in similar decision-making?
- 30. What is your degree of favoritism between people, wildlife, or both? Why?
- 31. Do you want to add any more things in regard to Ecological resettlements (ER) or conservation-led resettlements CR?

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