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Characterising the relationship between forest dependent peoples and state forest management institutions in the Global South

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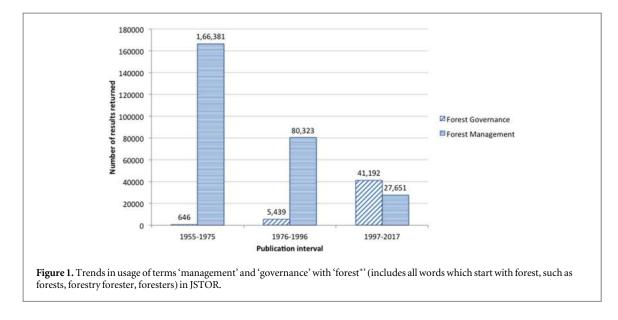
Abstract

Relationships are the elementary forms of social life that animate structures and processes between and among individuals, groups and institutions, and are in turn transformed by them. Relationships between forest dependent peoples (FP) and state forest management institutions (FD) are central to forestry practice yet seldom the focus of research studies. Whereas decentralization and participatory institutions have received much attention in research and practice, relationships that underpin them have remained largely unaddressed. This paper utilizes an adaptation of the systematic review method to synthesize findings on the nature of this relationship in the Global South. We reviewed 135 articles published between 1997 and 2017, selected following a systematic article search and selection protocol on JSTOR and Google Scholar. History, as expected, is a living referent in shaping contemporary relations, accounting for tremendous diversity across the Global South. We identified key concepts from literature across this diversity, and synthesized them using five overlapping thematic codes: (a) asymmetries of power; (b) access to and control over productive resources; (c) knowledge, perceptions and attitudes; (d) stratification and heterogeneity; and (e) external influences. Numerical analysis of article meta-data revealed that research is attentive to the FP-FD relationship primarily in the context of decentralization or community participatory policies and projects. Well-designed policies, projects, institutions and effective individuals create opportunities for partial, temporary and symbolic transformation in the FP-FD relationship. However, structural power asymmetry between FD and FP, historically established, and reproduced through social inequalities and hierarchies, sustains. The content of social relationships overflow sector specific transformations. Reflecting on the scope of systematic review as method in synthesis of qualitative research, we found that although loss of context specificity is a disadvantage, systematic review can be productively adapted to explore neglected issues as we do in our study with relationships, through analysis of empirical data in studies with other objectives.

1. Introduction

Relationships between forest dependent peoples (FP) and state forest management institutions (FD) are at the center of explicit and implicit assumptions, discourses and outcomes of forest policies and practices in the Global South. While this has been recognized widely and sets the context for many forestry interventions, an explicit research focus on the characteristics, influences and outcomes of the FP–FD relationship has been lacking. Relationships are elementary forms of social life that animate processes and practices between individuals, groups and institutions. They are influenced by rules and norms that are constantly being formed and transformed in specific historical and political contexts.

State and community forest management (CFM) institutions, both are constituted within unequal and hierarchical societies; they emerge from, are embedded in, and function as political and social actors rather than merely as formal, neutral institutions as they are often imagined, theorized or claimed. Their formal institutional structures, manifest rationales, and stated practices have measurable impacts, which are often the focus of institutional research on forestry management and governance. In this paper, while



examining the nature of relationships between FP and FD, we treat institutions themselves as social actors; they are also influenced by and composed of social actors and influenced and governed by broader social rationales in addition to forestry management and governance structures and processes.

Research on the dynamic and subtle nature of 'relationships' often requires context specific, qualitative and/or intensive methods. Much research on forestry management in the Global South has produced insights on the nature and influence of the FP–FD relationship in the context of other research objectives such as evaluation of policy or project outcomes, institutional or political economic analysis. We present here a systematic review on the character of FP–FD relationships, emerging from studies that focus on both FD and FP in whichever context.

Emerging as independent nations after World War II, many countries of the Global South inherited a colonial legacy of centralized state forest management which was soon followed by a variety of policies and projects that proposed decentralization/participation of local people, such as CFM, Joint Forest Management (JFM), participatory forest management (PFM) and community-based natural resource management (CBNRM)³. A number of critical and systematic reviews have focused on the successes and failures of these efforts⁴, even as they were replaced by governance changes across the Global South. As emphasis of research has shifted from forestry management to forestry governance⁵, researchers have developed insights into institutional relationships in the forestry sector. The relationship between the two main actors in this

process (FP and FD), as social actors only partly defined by the formal institutions that they constitute, is often only implicit. This is a research gap that we address in this paper. A systematic review allows us to cull out findings on the nature of the FP–FD relationship that is embedded in these studies.

The 1990s marked a period of transition, where focus shifted from 'management' to 'governance' of forests, as also reflected in the literature (figure 1). Our study reviews research published during and following this transition. Empirical qualitative studies on a diverse range of forestry policies, projects and practices have much to say on the FP–FD relationship, even when this does not form their primary research objective. Our study therefore innovates and extends a systematic review method to answer a research question often not directly addressed by existing research.

This study systematically identifies and characterizes the relationship between forest dependent peoples and state forest management institutions in the Global South from empirically supported research published in journals over the last 20 years.

2. Materials and methods

2.1. Systematic review of qualitative research

This article uses a systematic literature review method appropriate for the synthesis of findings of qualitative research⁶. Following a systematic review protocol, we identified a precise research question: what is the contemporary nature of the relationship between forest dependent peoples and state forest management

³ See for example Guha (1983, 1989), Peluso (1994), Sivaramakrishnan (1995), Sundar *et al* (2001), Ribot and Oyono (2006), Mathews (2008).

⁴ Pagdee *et al* (2006), Ravindranath *et al* (2006), Cox *et al* (2010), Dressler *et al* (2010), Bowler *et al* (2011), Brooks *et al* (2013).
⁵ See figure 1 for trend.

 $^{^{6}}$ Unlike a general or critical literature review that aims to extensively and critically research the literature to identify the most significant contributions in the field, a systematic review aims to systematically search the literature for what is known on a specific research question and synthesizes the research evidence available. For elaboration on the typology of reviews, see Grant and Booth (2009). Also, Harden *et al* (2004), Thomas and Harden (2008), Barnett-Page and Thomas (2009).

Box 1. Search protocol.				
The search protocol used on JSTOR bibliographic database was as				
follows:				
Search phrase:				
(('communities' OR 'community') AND ('forest department' OR				
'forest service' OR 'forest bureaucracy' OR 'foresters'))				
Content type: Journals only				
Year of publication: 1997 to 2017				
Language: English only				

institutions in the Global South? We followed a systematic search and selection protocol (see Box 1), and provide a quantitative summary of results⁷ followed by an elucidation of qualitative findings.

We provide a numerical analysis of article metadata as is common in systematic analysis of clinical data, but we do not subject the findings to statistical analysis, as this is incommensurate with the contextspecificity of qualitative research⁸. Instead, we conducted a qualitative thematic synthesis and critical review⁹ that is more appropriate to the nature of reviewed literature. We used an adaptation of reciprocal translational analysis (RTA) drawing on Lines of Argument (LOA) synthesis¹⁰; our adaptation of RTA aimed towards synthesis rather than summary.

The process of systematic review of qualitative research is distinctive in other ways that are worth highlighting¹¹. Meta-analyses using statistical methods generally attempt to be exhaustive in the search process and include all relevant studies in the area. However, for qualitative studies, a purposive sample has been described as optimal¹². The objects of synthesis in qualitative research are often 'concepts' that are themselves neither discrete nor binary. Conceptual synthesis relies on the range of concepts found in the studies, their context, and whether they are in agreement or not¹³. Following Thomas and Harden (2008), our search strategy relied on the principle of 'conceptual saturation', aiming for maximum variability of 'key concepts' while restricting the heterogeneity of contexts to empirical research on the Global South.

¹⁰ Nobliat and Hare (1988) develop 'synthesis' as a way of putting together narrative/ interpretive accounts where integration would not be appropriate. Three different methods of synthesis include (a) RTA—the 'translation' of concepts from individual studies into one another, thereby evolving overarching concepts or metaphors, (b) Refutational synthesis—exploring and explaining contradictions between individual studies; and (c) LOA synthesis—building up a picture of the whole (i.e. culture, organization, etc) from studies of its parts (Barnett-Page and Thomas 2009, p 2). Also elaborated in Dixon-Woods *et al* (2006a), Sandelowski and Barroso (2007).

¹¹ See Boyatzis (1998) and Barrosso *et al* (2003) for a discussion on some of the challenges of applying a systematic review method to qualitative research.

¹² Doyle (2003).

Quality assessment is another contentious area in synthesis of qualitative research¹⁴. We adopted a conservative approach on this matter, including only journal articles based on empirical research findings. Extracting data, and even identifying what counts as data in qualitative studies is a challenge in itself¹⁵. Similar to what Thomas and Harden (2008, p 4) report, while it is often easy to find 'data' in studies in the form of quotations from the field, it was often difficult to identify 'key concepts' succinctly summarized in the papers. We faced the additional challenge that the 'key concepts' we were searching for were not answers to the primary research question of the studies.

We followed a three-stage process to develop the 'key concepts' involving discussion and development of consensus, and reference back to the original text and context at each stage. In the first stage, each of the reviewers extracted specific 'key concepts' from individual research articles, and the exact findings including excerpts were compiled in a database. In addition, each 'key concept' was also allocated one or more thematic codes (discussed in section 2.4 below). At the second stage, the 'key concepts' were thematically organized and reorganized based on their degree of closeness or similarity. Distinctiveness of the concepts was still maintained at this stage, although similar and related concepts were grouped together. The third stage involved interpretive integration, where key concepts were integrated into each other to form 'synthetic concepts¹⁶[.] While using synthetic concepts at the third stage, we have tried to retain the context and nuance of arguments that are central to qualitative research and significant to social practice.

2.2. Identification of literature

We conducted a structured search for journal articles on the database JSTOR and search engine Google Scholar (GS) (see figure 2). The criteria we used for identification were: (i) the article should include at least one reference to both state forest institutions (forest department/forest service/forest bureaucracy/ foresters) and communities (or community); (ii) only journal articles in English were included; and (iii) the year of publication was specified as between 1997 and 2017. On JSTOR, the search was also restricted to 19 relevant humanities and social science disciplines. This resulted in the occurrence of 4724 citations on JSTOR. While JSTOR allows search on an indexed database of journals, GS is a publisher/source-agnostic search engine that relies on how often and how recently an article was cited, among other criteria. Therefore, the number of results generated using the same protocol tends to vary over time. Further, GS does not support

⁷ See Grant and Booth (2009), Singh (2017), Maxwell *et al* (2018). ⁸ see Maxwell *et al* (2018).

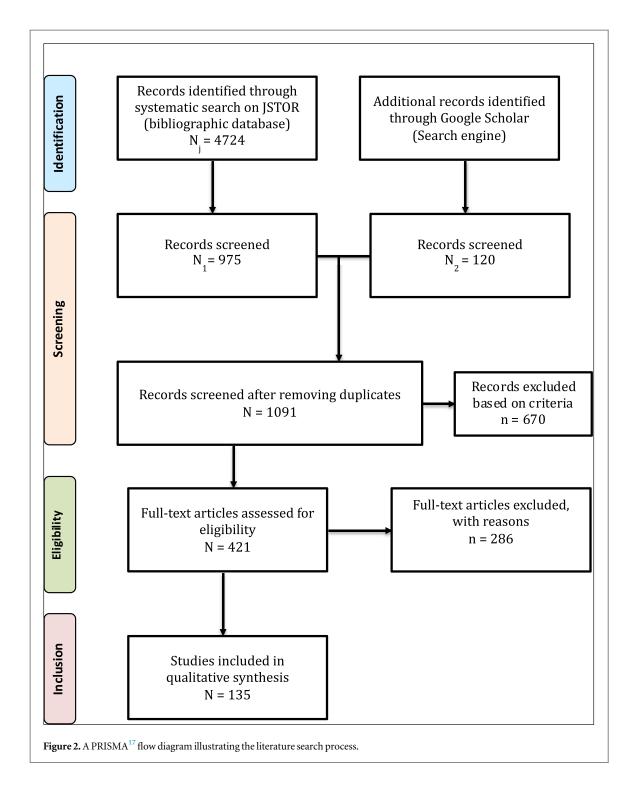
⁹ see Thomas and Harden (2008), Grant and Booth (2009).

¹³ Thomas and Harden (2008).

¹⁴ Seale (1999), Spencer *et al* (2003).

¹⁵ Sandelowski and Barroso (2002), Campbell *et al* (2003).

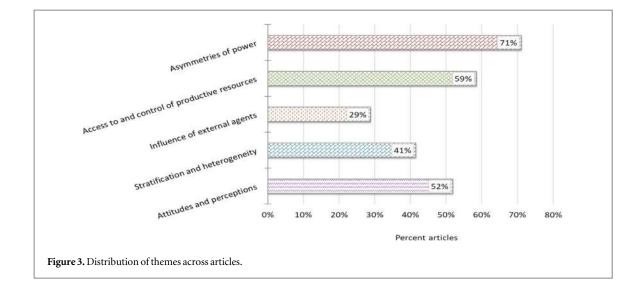
¹⁶ See Dixon-Woods *et al* (2006b), Barnett-Page and Thomas (2009).



automated screening of articles by type of publication (journal article, book, gray literature, etc) and the number of relevant articles per page was found to be minimal after the first 100 citations. Apart from this systematic search, we reviewed articles generated from a search using 'REDD*' as REDD/REDD+ is an important current forest governance initiative in the Global South. We also conducted searches using the variations 'forest agency' and 'forest agencies' along with 'community' and 'communities' and consulted other relevant and significant journal articles that did not emerge through the systematic search to enhance the robustness of our synthesis. We found that research that met our selection criteria (discussed below in section 2.3) from these additional searches reinforced our analysis based on the systematic review. These articles are not included in the numerical analysis since they did not emerge through a predefined systematic search protocol but are cited in our qualitative synthesis.

2.3. Eligibility criteria for inclusion

At the next stage, the first 975 citations generated by JSTOR and first 120 citations generated by GS sorted in order of relevance, were screened based on title,



keywords and abstract, using the following criteria for inclusion of articles:

- (i) research is at least partly based on the Global South
- (ii) article is based on empirical research findings
- (iii) there is a direct or indirect reference to the relationship between FP and FD.

We identified the reference to FP-FD relationship through a wide range of terms and phrases alluding to the existence or character and content of this relationship, which included but was not limited to: conflict, cooperation, collaboration, resistance, state-control, protest, attitudes, perception, elite, power, authority, livelihood, tenure, rights, crimes, gender, class, caste, race, and ethnicity. We conservatively excluded articles only for the following reasons: (a) they exclusively study only one institution, either FD or FP (b) are purely theoretical or normative, without empirical data (c) exclusively focus on institutional efficacy/success/sustainability/equity without research findings on relationships, (e) have assumptions and conclusions about relationships without empirical research findings on it, and (e) are exclusively historical and policy overviews.

Full articles were scanned where no abstract was available. After removing duplicates, 421 articles were found eligible for full text review. Using the same criteria, 421 full text articles were scanned, and 272 articles were excluded as they did not meet all three criteria. Finally, 135 articles from this search met all the criteria and were included for systematic review and analysis (N = 135).

2.4. Thematic coding

Five thematic codes, representing broad themes under which different dimensions of the FD-FP relationship may be described, were developed based on a preliminary reading of the literature and experience and expertise of the reviewers: (a) asymmetries of power; (b) access to and control over productive resources; (c) knowledge, perceptions and attitudes; (d) stratification and heterogeneity; and (e) influence of external factors or agents (including donors, NGOs, markets, etc). Themes were intended to be broad enough to include the range of FD-FP relationships characterized in the literature, and therefore overlapping and intertwined. The appropriateness of these themes was intermittently reassessed at every stage of the review. The codes are used primarily to group the literature and do not affect the identification or synthesis of key concepts, as key concepts themselves may be classified under multiple themes. Most (89%) articles got assigned more than one code, reflecting the overlapping and interacting nature of the themes, with 3 being the median number of themes assigned to each article in our sample. The distribution of themes across articles is shown in figure 3.

3. Results and synthesis

3.1. Lay of the Literature

3.1.1. Journal distribution

The 135 research articles we synthesized came from 62 different journals, spanning the social sciences, humanities, environmental and policy sciences and interdisciplinary journals. Journals such as Conservation and Society (22), Economic and Political Weekly (20), Human Ecology (9), Environmental Conservation (7), Forest Policy and Economics (5), Africa Development (5) generated the most number of relevant articles on the FP–FD relationship.

 $^{^{17}}$ PRISMA, the acronym for 'Preferred Reporting Items for Systematic Reviews and Meta-Analyses', is an accepted format for reporting of systematic reviews and meta-analysis. For elaboration see Moher *et al* (2009).

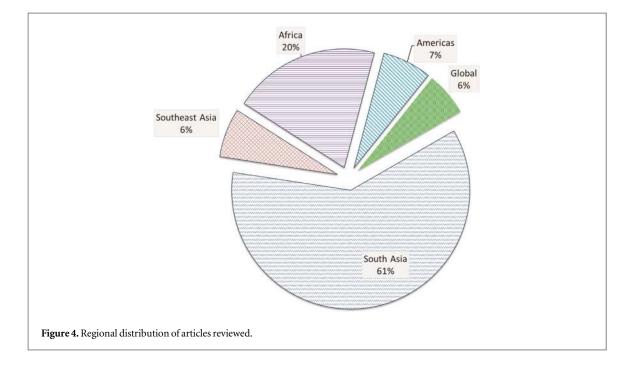


Table 1. Context of study.

Sl.	Context of study	Number of articles	Percent of sample ^a
1	Decentralization and participatory forestry (CFM, JFM, CBNRM)	67	49.6
2	Conservation/protected areas	35	25.9
3	Market-oriented forestry mechanisms (Payment for Ecosystem Services, REDD, REDD +, carbon credits and carbon sequestration)	1	0.7
4	Social forestry	3	2.2
5	Impact of law and policy	17	12.6
6	Violence and oppression	9	6.7
7	Other	23	17.0

^a Totals exceed 100 because of overlapping contexts in a few studies.

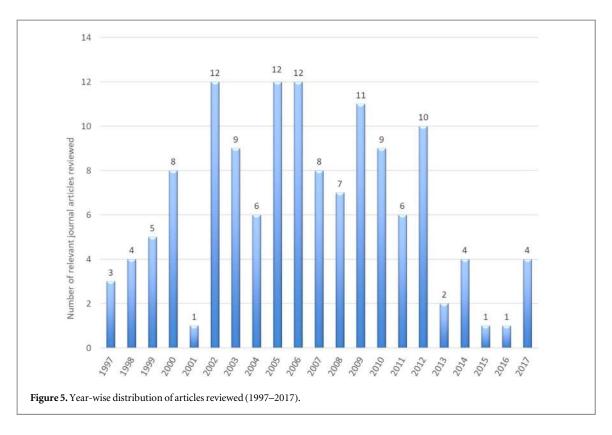
3.1.2. Regional coverage

Majority of articles (90%, 121 articles) were based on single-country studies as expected, since we selected for empirical and qualitative studies; of the rest 6% compared countries across regions (figure 4). South Asia (61%) and within that India (43%) figured prominently in the studies, although 29 different countries of the Global South were represented in single-country studies in addition to others which are multi-country and/or comparative studies. The substantial representation of India and South Asia emerged in response to our search protocol that is not region specific. Several factors contributed to this tendency; South Asia has had a continuous tradition of social movements specifically focused on FP-FD relations, Chipko being the most globally well-known of them¹⁸. This region, specifically Nepal and India, were also forerunners in experimenting with decentralization and community participatory forestry. As

¹⁸ See for instance Guha (1983, 1989), Rangarajan (1996), Mullick (2003), Vasan (2005).

already mentioned, this phase in the history of forestry generated more research on FP–FD relations.

Additionally, search engines, as part of the politics of knowledge production and dissemination, need closer examination for geographical bias since they are publisher specific. The category Global South was an appropriate choice for our study since there are no systematic reviews on the characterization of the FP-FD relationship. However, we found both institutional and terminological differences that were region-specific and affect synthesis. For instance, the colonial experience of Asia and Africa is different from other regions of the Global South. The term 'forest department' refers to state forest management institutions in much of Asia and Africa, which is replaced by 'forest service' or 'forest agency/ies' in the Americas. Similarly, the term 'foresters' refers to private forestry professionals in Mexico, but state forest department employees in Asia and most parts of Africa. 'Community forestry' is often used as an overarching term including a variety of community participatory policies, projects and programs in some research, while it



is used to refer to a specific government program in Nepal, and it is used only to refer to non-state selfinitiated community forestry in some cases. These diversities greatly limit the possibility of title and abstract based systematic analysis. Given these diversities in nomenclature and institutional structures, we still found that the FD–FP relationship is recognized as important across the Global South.

3.1.3. Temporal distribution

The year-wise distribution of reviewed articles is shown in figure 5. After 2012, we found a dip in the number of relevant journal articles that focus on FP-FD relationship. It needs to be examined more carefully if this is a trend. The peak in the distribution of our search results coincides with the period when there is a shift from PFM to market-oriented forest governance mechanisms in many parts of the Global South (discussed in next section, 3.1.4), viz., PES, REDD and REDD+. The reasons for reduced research attention to this relationship are beyond the scope of this research but deserve further attention. A potential hypothesis is that the shift towards neoliberal governance within the forestry sector, i.e. a move away from state-centered and towards market-based mechanisms, has resulted in less research attention on the FP-FD relationship.

3.2. Contexts of research on FP-FD relationship

We found that the FP–FD relationship was generally studied in the context of specific policies and projects (table 1). The relationship was therefore often examined with reference to its influence on specific goals

Table 2. Impetus of research.

Sl.	Impetus of research	Number of articles	Percent of sample ^a
1	Sustainable resource man- agement/conservation	38	28.1
2	Social justice	52	38.5
3	Development and livelihoods	18	13.3
3	Success of projects	57	42.2
4	Efficiency	5	3.7
5	Other	13	9.6

^a Totals exceed 100 because of overlapping impetus of research in a few studies.

such as sustainability or equity (discussed further in section 3.3). About half the studies (49.6%) addressed FP–FD relationship in the context of some form of decentralization or community participation projects (CFM, JFM or CBNRM). Concerns over community participation in conservation areas generated another quarter (25.9%) of the studies.

Many regions of the Global South have adopted market-oriented governance mechanisms such as Payment for Ecosystem Services (PES), Reducing Emissions from Deforestation and Forest Degradation (REDD), REDD+, in response to equity, sustainability and climate change concerns. For instance, although 45 articles on REDD/REDD+ were returned in JSTOR as a result of our search protocol, we found on closer examination that only one of them addressed the FP–FD relationship using empirical evidence. Social Forestry (SF), which aimed to meet FP needs of fodder, fuelwood, and non-timber forest produce (NTFP), without much attention to their participation¹⁹ also formed the context for only 2.2% of the studies in our sample. The influence of laws and policies and, sites where there was significant oppression and/ or violence against FP, were the other two contexts where research focused on FP–FD relationship (12.6% and 6.7% respectively).

3.3. Impetus of research

What motivated research that focused on FP–FD relationship? We examined the rationale provided in studies (table 2) and found an overwhelming 42.2% of our sample was concerned with assessing outcomes of projects and programs, which are characteristically time-bound and geographically limited interventions; an equally high number (38.5%) were driven by concerns of social justice. Environmental, sustainability and resource conservation concerns emerged as the third important driver, with 28.1% studies focusing on the matter. A small number of studies (13.3%) were concerned with community development and livelihoods, and an even smaller number focused on efficiency arguments (3.7%).

3.4. The relevance of history

History is a living presence and a continuous referent in everyday practice of using and managing forests in the Global South. Social relationships are always a process constituted historically and contextually, and the relationship between FP and FD is no exception. Given that our study was restricted to empirically based research in a discrete period (1997-2017), we still found that almost all studies considered historical context important. Since the studies focused on recent decades, arguments on influence of history appeared more often in introduction and background sections citing other historical studies²⁰. 38% studies referred to relevance of history in their empirical findings, but this under-represents the overarching and overwhelming presence of history in each of the themes we discuss in the next section.

Several studies show that the establishment of FD, its structure, attitudes, power and property vested in them has a colonial legacy, which often lacks legitimacy and contributes to forests remaining a contested domain between FP and FD²¹. Colonization, colonial concepts of nature and/or FP (for example a faulty conceptual separation of agriculture and forestry and agricultural and forest lands), and commercialization have led to the redefinition of forests solely in terms of their economic and environmental values, often in conflict with local needs and priorities²². The inheritance of antagonistic, mistrustful, authoritarian and undemocratic relations between FP and FD is identified as a persistent challenge by many studies²³.

Histories of regional and local politics including local mobilizations²⁴ play an important role in shaping the FP–FD relationship. Ideological shifts (for e.g. classifying swiddeners as ethnic minorities in South-East Asia²⁵ or legal recognition of historical injustices in India²⁶) substantially alter the tenor of the relationship. Also significant are natural calamities²⁷, memories and experiences of prior forestry projects and practices, including of external agents²⁸, and histories of FP customary practices independent of state involvement²⁹.

3.5. Thematic analysis

3.5.1. Asymmetry of power

Hierarchical power of FD over FP emerged as a central theme repeatedly in the literature we synthesized (71%), permeating every aspect of the relationship between the two, across geographical and sociopolitical contexts in the Global South. This unequal power relationship is remarkable given that a majority of studies were conducted in the context of several years or decades of decentralization or participatory policies and projects.

Decentralization has had symbolic or rhetorical significance³⁰. However, FD retains powers of decision making, implementation and policy formulation which are denied to FP. This decentralization without empowerment has been established by studies in South and Central Africa³¹, Latin America³², and South and South-East Asia³³. This centralized power structure flows both from the historical entrenchment

²³ Obua *et al* (1998), Das (2000), Robbins (2000a), Dove (2003),
Mahanty (2003), Dutt (2004), Husain and Bhattacharya (2004),
Mathews (2005), Yusuf (2009), Pravat (2010), Kashwan (2016).

²⁵ Horowitz (1998), Fox *et al* (2009).

¹⁹ For instance, see Hoskins (1982), Dove (1995).

 $^{^{20}}$ For instance, studies such as Guha (1989), Bryant (1994), Peluso (1994), Brosius *et al* (1998), Sivaramakrishnan (1998), Peluso and Vandergeest (2001), Vandergeest and Peluso (2006) were cited.

²¹ Obua *et al* (1998), Ribot (1999), Laungaramsri (2000), Rao (2002), Dove (2003), Nagendra *et al* (2005), Wittman and Geisler (2005), Anitha *et al* (2006), Kumar and Kant (2006), Bosak (2008), Mathews (2008), Cramb *et al* (2009), Fox *et al* (2009), Gooch (2009), Yusuf (2009), Pravat (2010).

²² Dwivedi (1997), Nygren (2000), Becker (2001), Rao (2002), Dove (2003), Mahanty (2003), Fay and Michon (2005), Sunseri (2005), Dorji *et al* (2006), Khan and Samadder (2012).

²⁴ Das (2000), Sunseri (2005), Kashwan (2016).

²⁶ Das (2000), Kumar (2005).

²⁷ Sunseri (2005), Yusuf (2009), Pravat (2010).

²⁸ Randeria (2003), Sunseri (2005).

²⁹ Rao (2002), Sato (2003), Beazley (2006), Cramb *et al* (2009).

³⁰ Ribot (1999), Becker (2001), Ghate and Nagendra (2005), Wittman and Geisler (2005), Bazaara (2006), Namara (2006), Charnley and Poe (2007), Gurung and Biggs (2010), Pravat (2010), Larson and Dahal (2012), Mbeche (2017).

³¹ Agrawal and Ribot (1999), Mapedza (2006), Muhereza (2006), Michon *et al* (2007), Ribot *et al* (2010), Larson and Dahal (2012).

³² Charnley and Poe (2007), Larson and Dahal (2012).

³³ Pattnaik and Dutta (1997), Dhanagare (2000), Conroy *et al* (2002), Timsina (2003), Lachapelle *et al* (2004), Kumar (2005), Kumar and Kant (2005), Kumar and Vashisht (2005), Vira (2005), Michon *et al* (2007), Nayak and Berkes (2008), Larson and Dahal (2012), Springate-Baginski *et al* (2013), Sunam *et al* (2013).

of power with state institutions³⁴, as well as new processes such as the discourse of global environmental protection, state policies and propaganda, and dominant models of conservation³⁵. Based on a study spanning three continents and ten countries in the Global South, Larson and Dahal (2012, p 86) find that '...without substantial efforts to level the playing field and improve livelihood options, communities are unlikely to see large gains from their new rights'. Some site-specific, spatial and temporal variations in this hierarchical power relation have been identified³⁶, although none have found a fundamental reversal or equalization of power.

Centralization of power in state institutions and lack of empowerment of forest peoples has resulted in misuse of this power that is discussed in three related ways in the literature: first is acts of physical violence, criminalization, destruction of property and livelihoods, and threats of punitive action by FD against FP. This is reported in Africa³⁷, Latin America³⁸, and South and South-East Asia³⁹. Studies also show that this violence is often targeted at specific social and occupational groups such as shifting cultivators (particularly in South-East Asia)⁴⁰, pastoralists⁴¹, indigenous peoples⁴² and Dalits (specific to South Asia)⁴³.

Second, studies show that continuing centralization of power in FD alienates FP (discussed in section 3.5.2) by denying them access to a respectable livelihood among other things (discussed in section 3.5.3).

Third, studies find vast differences between *de jure* and *de facto* resource use and access. Policies, regulations and penalties notwithstanding, 'the reality of resource use and access is often characterized by informal negotiations, illegal extraction, and rule-bending' Robbins *et al* (2009, p 560). This is variously identified by studies as bribery; corruption; rent-seeking; institutionalized silence, ignorance and concealment; formation or functioning of informal institutions; creation of liminal spaces between legality and illegality⁴⁴.

³⁸ Mathews (2005).

³⁹ Robbins (2000a), Vira (2005), Gooch (2009), Kabra (2009), Khan and Samadder (2012), Bandi (2014).

⁴¹ Rao (2002), Randeria (2003), Gooch (2009).

⁴⁴ Obua *et al* (1998), Robbins (2000b), Rao (2002), Mahanty (2003), Timsina and Paudel (2003), Tucker (2004), Vasan (2005), Vira (2005), Beazley (2006), Mathews (2008), Robbins *et al* (2009), Idrissou *et al* (2011), Ploeg *et al* (2011), Torri (2011), Paudel *et al* (2012), Fleischman (2016), Vedeld *et al* (2016).

Informality intersects and interweaves with inequalities within local communities, resulting in coalitions between FD and local class, caste, ethnic and gendered elite. Breach of laws by FP with respect to use of forests has been recognized in many contexts as forms of resistance⁴⁵. However, while such transgressions allow relief to FP from tough conservation laws and policies⁴⁶, studies also confirm that they strengthen the hierarchical power of FD and serve to entrench existing social power structures⁴⁷. The studies we synthesized confirm the broader understanding within social sciences that the oppositional characterization of 'virtuous peasants and vicious states' (Bernstein 1990, p 71) fails to do justice to the complexities of state-local relations and associated class structuring processes (Hart 1989, Nugent 1994, Li 2007). We elaborate this point in section 3.5.4.

3.5.2. Attitudes and perceptions

Over half (52%) of the studies found that understanding attitudes and perceptions of FP and FD towards each other was important in studying their relationship. Some studies noted positive perceptions and attitudes such as cordiality⁴⁸ and trust⁴⁹, often resulting from community forestry initiatives. However, even these studies pointed out that these positive attitudes were found only in a few instances, while tensions prevailed in most.

Barring a couple of exceptions from South Africa⁵⁰ and Bhutan⁵¹, attitudes and perceptions of local peoples were generally characterized as 'negative' towards the FD. Studies asserted that FP held FD responsible for mismanagement of forests, livelihoods deprivation and distress⁵². Communities lacked trust in the knowledge, ability, commitment, will and legitimacy of the FD to carry out its duties; predominant sentiments expressed towards the FD were those of resentment, mistrust and hostility⁵³. Reiterating the power hierarchy discussed in the previous section (3.5.1), FP

⁴⁸ Varma (2009), Badola *et al* (2012), Kobbail (2012), Ghosh and Uddhammar (2013).

⁴⁹ Naik (1997), Horowitz (1998), Gupta (2000), Agrawal (2001), D'Silva and Pai (2003), Vira (2005), Ribot *et al* (2010).

⁵⁰ Obiri and Lawes (2002).

⁵¹ Brooks and Tshering (2010).

³⁴ Ribot (1999), Becker (2001), Kumar (2005), Kumar and Kant (2005), Vira (2005), Kumar and Kant (2006), Mapedza (2006), Muhereza (2006), Ojha (2006), Metcalfe and Kepe (2008), Mukherjee (2009), Kashwan (2016).

³⁵ Dove (2003), Matthews (2005), Davies and Wismer (2007), Torri (2011), Khan and Samadder (2012), Kashwan (2016).

³⁶ Wily (1999), Cramb *et al* (2009), Beazley (2011), Paudel *et al* (2012), Mbeche (2017).

³⁷ Sunseri (2005), Vandergeest and Peluso (2006).

⁴⁰ Cramb *et al* (2009), Fox *et al* (2009).

⁴² Laungaramsri (2000), Beazley (2006).

⁴³ Anitha *et al* (2006).

⁴⁵ Dwivedi (1997), Karlsson (1999), Anitha *et al* (2006), Ribot and Oyono (2006), Kabra (2009), Mukherjee (2009), Ray (2014).

⁴⁶ Das (2000), Robbins (2000b), Mahanty (2003), Mathews (2008), Kabra (2009), Robbins *et al* (2009).

⁴⁷ Dwivedi (1997), Robbins (1998), Rao (2002), D'Silva and Pai (2003), Dove (2003), Timsina and Paudel (2003), Vasan (2005), Mathews (2008), Torri (2011), Andersen *et al* (2015).

⁵² Dwivedi (1997), Obua *et al* (1998), Bon (2000), Robbins (2000b), Conroy *et al* (2002), Buchy and Subba (2003), Mahanty (2003), Sunseri (2005), Beazley (2006), Li (2007), Shahabuddin *et al* (2007), Metcalfe and Kepe (2008), Sarker and Das (2008), Khan and Samadder (2012), Shangpliang (2012), Ogunjinmi *et al* (2014), Ray (2014).

 ⁵³ Dwivedi (1997), Obua *et al* (1998), Bon (2000), Robbins (2000a),
 Becker (2001), Beazley (2006), Ali *et al* (2007), Kabra (2009),
 Mukherjee (2009), Robbins *et al* (2009), Hayes and Persha (2010),
 Leventon *et al* (2014).

saw all forest policies and projects, including participatory, community or JFM approaches, as emanating from and run from 'above'⁵⁴.

Commenting on the attitude and behavior of FD, authors have used words such as unprofessional⁵⁵, highhanded⁵⁶, harsh⁵⁷, coercive⁵⁸ paternalistic⁵⁹, autocratic, dictatorial, authoritarian⁶⁰, negative⁶¹, intimidating and neo-dictatorial⁶², again indicating the unchanged power hierarchy we found in the previous section. As Dhanagare (2000, p 3324) puts it, 'FD still perpetuates its conventional view of forestry and its obsession of working for the people rather than with the people'. Factors underlying the observed attitudes and perceptions have been identified as emerging from historical prejudices⁶³, limitations of training⁶⁴, difference in conceptions of nature and culture⁶⁵, and lack of appreciation of traditional practices⁶⁶. A finding that stood out in many studies is the tendency of the FD to overlook and/or ignore the rights and requirements of local communities, while holding them responsible for forest degradation and destruction⁶⁷.

While acknowledging the need for wider organizational and cultural change within FD, some studies found individual officials making a difference⁶⁸. Studies found that individual FD employees subjectively and selectively interpreted or enforced regulations, for their own benefit and/or because of empathy for FP⁶⁹. This contextual specificity however has also been shown in many instances to intersect with social inequalities: the FD is inclined to interact mainly with the elite, side with the powerful within political and local circles and feel a social and economic allegiance

⁵⁴ Wily (1999), D'Silva and Pai (2003), Gupte (2004), Springate-Baginski *et al* (2013).

⁵⁵ Dwivedi (1997).

⁵⁶ Dwivedi (1997), Vira (2005).

⁵⁷ Obua *et al* (1998).

⁵⁸ Karlsson (1999), Laungaramsri (2000), Beazley (2006), Delcore (2007).

⁵⁹ Vira (2005).

⁶⁰ Beazley (2006).

⁶¹ Obua *et al* (1998), Conroy *et al* (2002), Torri (2011), Ogunjinmi *et al* (2014).

⁶² Faye (2017).

⁶³ Robbins (2000a), Dutt (2004), Aung (2007).

⁶⁴ Buchy and Subba (2003).

⁶⁵ Becker (2001), Dove (2003), Thoms (2008), Ray (2014).

⁶⁶ Mathews (2005), Michon *et al* (2007), Bosak (2008), Cramb *et al* (2009).

⁶⁷ Dwivedi (1997), Pattnaik and Dutta (1997), Horowitz (1998), Salam *et al* (1999), Robbins (2000a), D'Silva and Nagnath (2002), Rao (2002), Dove (2003), Mahanty (2003), Dutt (2004), Gokhale (2004), Kumar (2005), Sunseri (2005), Anitha *et al* (2006), Beazley (2006), Rangarajan and Shahabuddin (2006), Mathews (2008), Fox *et al* (2009), Gooch (2009), Varma (2009), Ribot *et al* (2010), Torri (2011), Ray (2014).

⁶⁸ Mahanty (2002), Vasan (2002), Mathews (2005), Vira (2005).

⁶⁹ Robbins (1998), Das (2000), Robbins (2000b), Vasan (2002), Timsina and Paudeln (2003), Beazley (2006), Vasan and Kumar (2006), Delcore (2007), Mathews (2008), Kabra (2009), Poppe (2012). to them⁷⁰. Others point out the challenge or duality that many foresters face while simultaneously playing roles of government officials and members of local community⁷¹.

It is worth noting that studies establish the importance of materially situating attitudes and perceptions. For instance, Kumar and Kant (2005) point out that positive attitudes of foresters alone cannot change relations in the absence of changes in organizational structures and processes, while Li (2007) situates attitudes and perceptions as elements of a broader assemblage of power. Our findings on attitudes and perceptions are always located in the context of and influenced by, the findings we discuss in our other themes, including broader relations of power and control over productive resources.

3.5.3. Access to and control over productive resources

Access to and control over productive resources (including forests and other economic resources) and social and cultural capital (such as access to information and social institutions) is an important factor that affects all aspects of the FP–FD relationship. A little under two-thirds (59%) of the reviewed articles have focused on access to and control over productive resources, and its influence on FP–FD relationship.

Much of the forests in Asia and Africa came under state ownership and control through often violent and illegal colonial usurpation (see section 3.4). In this context, more than half the studies found that FD often denies the legitimate rights of FP to use state-controlled forest resources that are critical to their livelihoods; this is done through both implementation of restrictive laws and outside the legal mandate⁷². FD penalizes, objects to and/or enforces laws which deter pursuance of livelihood activities of FP, such as farming⁷³, grazing⁷⁴ and collection of NTFP75. In restricting these activities and exerting political and/or regulatory control⁷⁶, FD engages in both forcible acquisition as well as use of coercive legislative measures⁷⁷. Studies have concluded that this results in loss of livelihoods and incomes for FP and their consequent dissatisfaction with FD⁷⁸.

⁷⁰ Salam *et al* (1999), Buchy and Subba (2003), Dove (2003), Timsina and Paudel (2003), Gokhale (2004), Lachapelle *et al* (2004), Thoms (2008), Vyamana (2009), Kashwan (2016).

⁷¹ Vasan (2002), Mathews (2005), Poppe (2012).

⁷² Rao (2002), Beazley (2006), Namara (2006), Nayak and Berkes (2008), Cramb *et al* (2009), Mukherjee 2009, Idrissou *et al* (2011), Thoms (2011), Torri (2011), Khan and Samadder (2012), Ray (2014), Anderson *et al* (2015).

⁷³ Sunseri (2005), Cramb *et al* (2009), Idrissou *et al* (2011).

⁷⁴ Robbins (2000a), Rao (2002), Idrissou *et al* (2011).

⁷⁵ Obua *et al* (1998).

⁷⁶ Cramb *et al* (2009).

⁷⁷ Robbins (1998), Anitha *et al* (2006), Kabra (2009).

⁷⁸ Dwivedi (1997), Sunseri (2005), Beazley (2006), Shahabuddin *et al* (2007), Sarker and Das (2008), Khan and Samadder (2012), Shangpliang (2012), Tumusiime and Vedeld (2012), Ogunjinmi *et al* (2014).

FD's control over productive resources means its priorities take precedence over those of FP. Urban⁷⁹, environmental⁸⁰, industrial, commercial⁸¹ and other⁸² interests override the subsistence needs of FP.

A finding that emerges in many studies is the lack of change in control over productive resources including forests even after introduction of decentralization policies and projects⁸³. FP's noticeable response to tenurial control by FD is found to range from everyday forms of resistance such as refusal to cooperate⁸⁴, subversion of official regulations and sanctions⁸⁵, engaging in illegal activities like setting forests afire, or hunting prohibited animals⁸⁶, to more direct contestations through legal channels⁸⁷, mass protests⁸⁸, forced encroachment, destruction of forest property and holding forest officials hostage⁸⁹.

3.5.4. Stratification and heterogeneity

Neither FD nor FP are homogenous entities, and 41% of studies identified heterogeneity and hierarchy within FD and/or FP as affecting their relationship. Wealth and gender differentiations were the focus of most studies that addressed this theme. This explained different outcomes of similar interventions⁹⁰, and/or variation in attitudes and practices of FD or its members towards different sections of FP⁹¹.

Stratification within FP affects the FD–FP relationship through its impact on forest dependence and cost/benefit sharing arrangements⁹². Therefore, the widely used term 'community' needs to be critically appropriated as it 'can be used coercively to create local resource management plans in ways that may or may not empower local people'(Brosius *et al* 1998, p 159).

Systematic marginalization of women's perspectives and priorities was addressed by 22% of studies⁹³, with the recognition that both its causes and effects relate to extant gender hierarchies and discrimination in society⁹⁴. FD staff are mostly male and/or communicate only with men in society⁹⁵, and women have to continually demonstrate their ability and capacity and demand equal wages from FD⁹⁶. Under-representation of women within the FD was identified as one of the reasons for its male and elitist bias⁹⁷. Notably, we did not find any studies that systematically examined the ethnic, racial or caste composition of FD, or its consequences. Intersectionality of gender with other power structures in society emerged in a number of contexts⁹⁸. Intersectionality of gender with class and caste was seen as benefitting some women⁹⁹. In some contexts, specific FD interventions such as Self-Help Groups (SHG) and Forest User Groups (FUG) in India and Nepal respectively, have enabled voices of women to be heard, providing them an opportunity to participate in decision-making¹⁰⁰.

FD are also heterogenous and multi-layered institutions¹⁰¹ and mutual alliances between sections of FD and FP are also widely reported¹⁰². As Vasan (2002, p 4132) says, '...while both the state and rural society are heterogeneous in themselves, they also overlap with each other. Those at the middle of this continuum such as the forest guard show loyalties to both sides.' However, as discussed in section 3.5.2, this also facilitates consolidation of existing social hierarchies and political domination.

3.5.5. Influence of external agents

29% studies have identified a significant external agent who/which influences the FP–FD relationship; these external influences include: (a) domestic or international funding and development agencies¹⁰³; (b) local,

⁹⁴ Robbins (1998), Kameswari (2002), Gupte (2004), Swaminathan (2012).

⁹⁵ Kameswari (2002), Buchy and Subba (2003), Swaminathan (2012).

⁹⁶ Swaminathan (2012).

⁹⁷ Kameswari (2002), Robbins (2000a), Lama and Buchy (2002), Buchy and Subba (2003), Swaminathan (2012).

⁹⁸ Dwivedi (1997), Robbins (1998, 2000), Lama and Buchy (2002), Vasan and Kumar (2006), Nayak and Berkes (2008), Anderson *et al* (2015).

⁹⁹ Khan and Samadder (2012), Robbins (1998).

¹⁰⁰ D'Silva and Pai (2003), Timsina (2003).

¹⁰³ Mapedza (2006), Mahanty (2002), Duffy (2005), Torri (2011).

⁷⁹ Laungaramsri (2000), Sunseri (2005), Mathews (2008).

⁸⁰ Robbins *et al* (2009).

⁸¹ Dwivedi (1997), Randeria (2003), Anitha *et al* (2006), Khan and Samadder (2012).

⁸² Rao (2002).

⁸³ Pattnaik and Dutta (1997), Agrawal and Ribot (1999), Dhanagare (2000), Nagendra (2002), Lachapelle *et al* (2004), Misra (2006), Uddhammar (2006), Shrestha and McManus (2008), Saito-Jensen and Jensen (2010), Larson and Dahal (2012), Tumusiime and Vedeld (2012).

⁸⁴ Karlsson (1999).

⁸⁵ Dwivedi (1997), Robbins et al (2009).

⁸⁶ Ribot and Oyono (2006), Mukherjee (2009).

⁸⁷ Mahanty (2003), Wittman and Geisler (2005).

⁸⁸ Kumbhar (2010), Khan and Samadder (2012).

⁸⁹ Wily (1999), Anitha *et al* (2006).

⁹⁰ Pattnaik and Dutta (1997), Cramb *et al* (2009), Kabra (2009).

⁹¹ Robbins (2000a), Vasan (2002), Poppe (2012).

⁹² Pattnaik and Dutta (1997), Robbins (1998, 2000), Bon (2000), Klooster (2000), Laungaramsri (2000), Edmonds (2002), Timsina (2003), Lachapelle *et al* (2004), Nagendra *et al* (2005), Muhereza (2006), Vasan and Kumar (2006), Delcore (2007), Mathews (2008), Metcalfe and Kepe (2008), Thoms (2008), Gooch (2009), Kabra (2009), Saito-Jensen and Jensen (2010), Beazley (2006, 2011), Torri (2011).

⁹³ Dwivedi (1997), Dhanagare (2000), Robbins (2000a), Agrawal (2005), Anitha *et al* (2006), Saito-Jensen and Jensen (2010).

¹⁰¹ Wily (1999), Malla *et al* (2003), Tucker (2004), Mathews (2008).

 $^{^{102}}$ Pattnaik and Dutta (1997), Sivaramakrishnan (1998), Robbins (2000a), Becker (2001), Vasan (2002), D'Silva and Pai (2003), Timsina and Paudel (2003), Vira (2005), Beazley (2006), Vasan and Kumar (2006), Charnley and Poe (2007), Mathews (2008), Kabra (2009), Robbins *et al* (2009), Beazley (2011), Poppe (2012), Tumusiime and Vedeld (2012).

regional or international NGOs¹⁰⁴; and (c) changes in the broader economy¹⁰⁵.

Large international agencies such as the World Bank or Wildlife Conservation Society are found to dictate terms, take over tasks of FD, and facilitate the entry of privatization¹⁰⁶. The power of external agents is sometimes responsible for the adoption of participatory rhetoric by FD¹⁰⁷; in other contexts, it can give voice to FP or less powerful sections of FP¹⁰⁸. NGOs and private MNCs also play an important role in introduction of new methods of conservation and sustainable livelihoods like REDD and PES by facilitating engagement between FP and FD¹⁰⁹.

Apart from specific contextual and organizational differences, studies have pointed out that external agencies always enter a social field marked by inequalities and power hierarchies¹¹⁰. Donor-supported participatory forestry projects and programs have been found to favor creation of institutions that replace or weaken elected local governments, thereby strengthening power of FD. Thus, 'by recognising, fabricating, and dismantling the structures of authority, forestry projects shape representation and power distribution' (Faye 2017, p 415).

4. Conclusion

'One of the most productive (and most neglected) uses of social science research in forestry development projects is to examine forester's beliefs regarding rural peoples' (Dove 1992, p 1). This comment based on data from Pakistan's nation-wide social forestry projects of the early nineties still resonates in our research. Research studies examining the efficiency and sustainability of forestry interventions, and others focused on the socio-economic, institutional, policy, and political-economic aspects of forestry and forest management acknowledge the importance of FP–FD relationships. However, our systematic review suggests that rarely has this relationship been at the center of such research studies.

We found that *relationships* between FP and FD are widely recognized as an underlying factor which influences the nature of transactions between FP and FD and are frequently described within historical contexts of current situational analyses; however, it did not

¹⁰⁹ Silva (1999), Cohen (2002).

¹¹⁰ Baker (1998), Mahanty (2002), Dewees *et al* (2010), Torri (2011).

form the central issue or question of analytical enquiry in research studies. At the same time, research results were found to attribute outcomes of projects and policies to the nature of FP-FD relationships, frequently described as static and unchanging, and therefore a constant. It is inferred from our systematic review that it is not a linear cause and effect equation; instead, FP-FD relationships, through multiple layers of hierarchy, stratification and heterogeneity between and among them, are simultaneously the cause, course and consequence of historically, politically and economically determined positions of the stakeholders. FD and FP are placed within societies which are heterogeneous, unequal and hierarchical and neither is immune to influences of wider social and power networks at national, regional or international levels and, economy and politics outside the forestry sector as well. Substantive transformation in the FP-FD relationship is located within these broader societal and economic relations.

Structural asymmetry of power between FP and FD, often historically generated, is further entrenched and reproduced through integration with existing hierarchies and inequalities in society and is a pervasive characteristic of the FP-FD relationship, though some localized and context-specific variations are also observed. Decentralization and participatory policies/ projects have, at best, been able to manifest only symbolic and/or temporary changes in the nature of this relationship. Forestry sector specific institutional reform that transforms formal institutional rules and norms has useful but limited impact on deeply entrenched social relations. Our findings posit that transformational change in FP-FD relations is contingent upon broader social change, indicating the need for all-encompassing and structural changes in forest governance (and ownership). Further, it underlines the need to understand the FP-FD relationship within historical and contemporary structures of class, gender, caste, race and ethnic power relations. This implies the need for external policy and funding interventions to be conscious that they are entering an existing and entrenched arena of asymmetrical power relations, which they will affect but not in direct, planned or simplistic ways.

Unequal power also emerges from and results in differential access to and control over productive resources, which directly influences the FP–FD relationship, and contributes to its intractability. It is in these spaces of access and control where the FP and FD engage with each other on a recurrent basis, which from the bases of their perceptions about and attitude towards the other. The attitudes and perceptions of different segments and strata of FP and FD are thus useful indicators of the tenor of their relationship. This differentiated understanding of both FD and FP as stratified and extending beyond defined formally recognized institutional boundaries emerges clearly from our review.

¹⁰⁴ Sunseri (2005), Barsimantov (2010).

 $^{^{105}}$ Fox *et al* (2009), Ghate *et al* (2009).

¹⁰⁶ Duffy (2005), Sunseri (2005), Vira (2005), Torri (2011), Shrestha and McManus (2008), Dewees *et al* (2010), Brechin and Salas (2011), Ece (2017).

¹⁰⁷ Buchy and Subba (2003), Vira (2005), Antinori and Rausser (2007), Ece *et al* (2017).

¹⁰⁸ Gupte (2004), Kumar and Kant (2006), Ojha (2006), Hayes and Persha (2010), Paudel *et al* (2012), Swaminathan (2012).

Reflecting on the scope of systematic review as a method in synthesis of qualitative research findings, we found that it may be adapted and employed as a method to answer questions not directly or specifically addressed by existing research studies, by exploring findings that emerge in the context of narrative findings on other questions. While this process sometimes results in loss of nuanced arguments, it is useful in drawing broadly agreed generalizations across different contexts and geographical regions.

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