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**Title:** Assembling Multi-Temporal Resilience on the Eastern Coast of India

**Year:** 2024

**Version:** Published version

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**Please cite the original version:**

Tenhunen, S., & Roy, D. (2024). Assembling Multi-Temporal Resilience on the Eastern Coast of India. *Ethnos*, Early online. <https://doi.org/10.1080/00141844.2024.2393574>



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To cite this article: Sirpa Tenhunen & Dayabati Roy (21 Aug 2024): Assembling Multi-Temporal Resilience on the Eastern Coast of India, *Ethnos*, DOI: [10.1080/00141844.2024.2393574](https://doi.org/10.1080/00141844.2024.2393574)

To link to this article: <https://doi.org/10.1080/00141844.2024.2393574>



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Published online: 21 Aug 2024.



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# Assembling Multi-Temporal Resilience on the Eastern Coast of India

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## ABSTRACT


This article explores how the Sundarbans residents and migrants on the eastern coast of India build multitemporal resilience. While extreme weather events have different rhythms, local governance, including climate change mitigation policies and state initiatives to manage the aftermaths of extreme weather events, also create temporalities. We analyse how people assemble these temporalities in their quest for more secure livelihoods and housing. By examining two interrelated practices – waiting and establishing patronage relationships – we argue, first, that resilience is not built by isolated individuals or communities; instead, it is relational and multitemporal. Second, we contribute to the questioning of climate reductionism and climate reductionist understandings of resilience by showing that people not only build resilience to climate change impacts and environmental changes but also policies and power structures. Third, we contend that lived resilience is not merely about coping but also encompasses the ability to develop critical discourses and influence governance.

**ARTICLE HISTORY** Received 9 March 2023; Accepted 13 August 2024

**KEYWORDS** Resilience; temporality; climate change; Sundarbans

Tapas<sup>1</sup> had just finished a makeshift hut on a piece of land (*char*), which had emerged from a river near a village in the coastal region of Sundarbans, eastern India, when I (Roy) met him. He had not yet managed to get official documents for the land, but he was waiting – any benefits accruing from the local government could legitimise his new address. While trying to establish a new place in this rural setting, he was simultaneously seeking to maintain a toehold in an urban area. Having worked as a day labourer in Kolkata for a decade, he had acquired a room in an informal neighbourhood beside a major road on the east side of Kolkata, adjacent to a construction site of high-rise buildings. Since his health no longer permitted him to do hard work, he hoped to become a labour contractor and use the room for housing labourers from his village. He was waiting for a reasonable offer and spared no effort in communicating with urban construction companies who might be hiring.

The *char* on which he constructed the house is a product of time as well as geo-morphological and social processes. The Sundarbans, the world's largest mangrove delta, which spreads through West Bengal, an eastern Indian state, and its neighbouring country Bangladesh, is a transitional zone between the freshwater originating from the Ganges River and the saline water of the Bay of Bengal. Chars consist of silt brought down by the Ganges and are part land and part water, mobile and temporary: 'sedimentary moments' in the flows of tidal rivers (Bhattacharyya 2018) in a hybrid environment (Lahiri-Dutt and Samanta 2013). Human settlement in the Sundarbans

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started to grow due to the colonial authorities who sought to increase their revenues by turning the low-lying mangrove forests into agricultural fields (Cosgrove and Petts 1990; Lahiri-Dutt and Samanta 2013). Now around five million people live in this coastal region, known as a climate change hotspot. The ecology of the Sundarbans is also endangered by the diversion of the river water caused by hydropower and irrigation systems as well as the rapid increase in shrimp farming, which has led to the conversion of agricultural land into saltwater ponds, exacerbating the salinisation of adjacent agricultural lands and residences (Sen 2019). Answering Keitel's (2023) call to explore the socio-cultural construction of resilience, this article<sup>2</sup> examines how Sundarbans residents and migrants from the Sundarbans build multitemporal resilience to environmental changes in the context of local governance.

One extreme weather event epitomises the effects of climate change in the Sundarbans and the adjacent regions – cyclone Aila – which displaced millions of people in 2009, including our interlocutors. However, except for such extreme weather events, climate change impacts and temporalities merge and coincide with the dynamic char landscape and the momentary temporality of silt. Sundarbans residents have always lived with fluctuating weather and an unsettled environment, which helps to explain why they do not associate the changing environment foremost with climate change. Moreover, apart from a few NGO activists and college-educated persons, climate change discourses did not circulate in their communities. The popular local television news focused on local issues without addressing them on global scales, which reporting about climate change would have required.

Nevertheless, our interlocutors often had direct experience of climate change-related challenges. For instance, a woman who worked as a domestic helper in Kolkata declined to comment on the effects of climate change (*abhauar poribarton*). Nevertheless, as we continued talking, she told me (Tenhunen) how her family had become impoverished. Somebody had tricked her father into buying land, which proved worthless because it was too salty for farming. Later, they lost their house when cyclone Aila hit the region. Most people would not discuss climate change, but we could elicit talk about the changing weather when we asked them direct questions about different types of extreme weather they had experienced. Conversations about the weather tended to turn into discussions about human activity – how they managed the aftermath of a cyclone and how they coordinated their engagement with rural and urban state policies and economies. Resilience, as the ability to recover and move on after both sudden and slow disasters, emerged as a central theme of their narratives, although they did not use the term resilience. They often used a Bengali term *jogajog kora* for making connections and communicating, which, resonating with Bear's (2015) findings, was about creating linkages between public and private economies. They understood climate change-related weather events through evolving practices whereby they could combine political, economic, and social systems as well as fluctuating weather and the environment.

Resilience is often understood as the ability to bounce back after a catastrophe, although this cross-disciplinary notion has many meanings in different contexts (Bollig 2014). While the concept has become ubiquitous in development industries and climate change mitigation, it is also widely criticised. Critics argue that resilience often focuses on coping with or maintaining the status quo; yet, change towards more sustainable pathways would require attention to inequalities, structures, and the conditions of possibility for transformation (Hornborg 2013). Reflecting the dominant understanding of resilience as a systemic quality, many development interventions seeking to increase people's resilience start from the assumption that resilience is practised in delimited, disaster-affected localities, even though people do not live in closed systems and mobility has often proved crucial for resilience (e.g. Greiner and Sakdapolrak 2013). Nevertheless, the concept has potential to cast light on how people cope with adversities. Hornborg (2013) envisions that a radical redefinition of resilience could reveal the capitalist world system as the root cause of environmental degradation, thus aiding in designing sustainable economic alternatives. Stockholm Environment Institute has demonstrated that the concept can be applied to foster the integration of

situated knowledge into resilience strategies (Eitel 2023). These policy endeavours reflect newer definitions of resilience as an ongoing transformative process of building engaged communities through fluid connections and interrelations (Chandler and Coaffee 2017). Anthropological research has also captured the fluid and contextual nature of resilience (e.g. Leslie and McCabe 2013, Cons 2018), demonstrating it as an element of agency and a process of reorientation within the framework of expectations and power dynamics (Hastrup 2009).

In this article, we contribute to the anthropological understanding of resilience by exploring how people build it by assembling human and non-human temporalities.<sup>3</sup> Much like Khan's (2023) work on char dwellers in Bangladesh, which illustrates the intricate intertwining of daily life with the fluidity of chars, we highlight the relational interplay between human and non-human agency amidst the chars in Sundarbans, India. By demonstrating that climate change impacts are inter-linked with various human actions, we contribute to the questioning of reductionist understandings of climate change and resilience (Dewan 2021; Hulme 2011; Hulme 2023; Paprocki 2021).

We view space as interconnected with temporalities and we analyse our interlocutors' interactions and encounters with the temporalities of local-level governance and hierarchies as they coordinate their urban/rural lives, exploring them as assemblages of socio-material forces. Hence, we follow anthropological assemblage scholarship (e.g. Ong and Collier 2005; Li 2007) – inspired, as Bialecki (2018) points out, by the formulation of the concept as temporary and emergent arrangements of heterogeneous entities – without adapting Deleuze and Guattari's (1987) classifications of assemblages as determinate relations between cognitive/linguistic or physical arrangements. Similarly to anthropologists who have revealed that such assembling often requires hard work (e.g. Li 2007; Koster and van Leynseele 2018), our focus is on the agency of the social actor and the work of assembling: people's efforts to combine different temporalities through the strategies of waiting and establishing patronage relationships.

Climate change concerns the future and the consequences of present actions for the future. Consequently, temporality has emerged as a key issue in scholarship on climate change, with studies exploring the different time scales of climate change mitigation policies and discourses (Brace and Geoghegan 2011; Arnall and Kothari 2015). Authoritative scientific organisations such as the Intergovernmental Panel on Climate Change (IPCC) have demonstrated changes in the climate over time and made predictions using linear clock time (Doyle 2016). Great Acceleration graphs measure the deteriorating condition of the earth system's socio-economic and biophysical spheres using timelines; hence, climate change is communicated as measurable, quantifiable, and predictable (Brace and Geoghegan 2011; Arnall and Kothari 2015). As extended temporality has emerged as a key feature of climate change debates, solutions to climate change are being addressed via long-term global governance strategies, such as multidecadal decarbonisation scenarios, which tend to isolate climatic conditions from local social, political, cultural, economic, and ecological systems, resulting in top-down perspectives on resilience (Aykut and Maertens 2021; Hulme 2023). As scales, Great Acceleration graphs are political claims that reveal and hide certain aspects (Hecht 2018). Resonating with Hecht's work, which highlights scales as outcomes of social, cultural, and technopolitical processes (ibid.), we found that our interlocutors' activities and livelihoods have been rendered informal and illegal through policies which generate temporalities, waiting, and patronage relationships.

## Waiting and Patronage

Waiting has emerged as a fruitful notion when analysing the interplay between structure, agency, and temporalities; instead of merely occurring in time, practices are temporalisations that make human time (Bourdieu 2000). Bourdieu emphasised that human time is embedded in power structures; thus, for him, waiting implied submission, in contrast to the active time of the acting subject. Indeed, those who wait tend to represent subaltern groups; the growing reach of the state into people's everyday lives compels people to wait (Jeffrey 2008; Jeffrey 2010; Auyero 2011), with

unemployment and waiting for work current features of neoliberalism and globalisation worldwide (Jeffrey 2008; Jeffrey 2010). Yet the types of waiting are shaped not only by those who make others wait but also by those who wait (Hage 2009). Waiting keeps what is anticipated open and, therefore, entails hope, understood as generative of action (Marcel 1967). Waiting situations have the potential to create novel forms of socialities, rituals, and gendered sociabilities (Janeja and Bandak 2018), but waiting is also influenced by its social contexts (Ansell 2021). Resonating with Ansell's research in Brazil, we found that the most common contexts of waiting among our interlocutors were different types of patronage relationships – people waited as part of transactions with various kinds of intermediaries who facilitated the combining of assets across rural and urban economies.

Anthropologists have long paid attention to the relationality of South Asian politics as patronage,<sup>4</sup> often defined as involving an asymmetry of status and power, reciprocity, and intimate face-to-face relations. Scholarly works reflect different aspects of patronage relationships: from patronal munificence and the client's service (*seva*) as selfless acts that affirm social relations, connectedness, and society as ultimate values (Piliavsky 2014) to corruption and systematic forms of oppression which prevent poor people from accessing benefits but also enable critical discourses and understandings of the state (Gupta 2012). Our interlocutors did not usually experience patron-client relationships as beneficial patronage, although they sometimes described them as being helped. We focus on patronage – and corruption – as mediating practices that take diverse meanings, including critical discourses, and facilitate assemblages as connections between different contexts and assets.

## Methods

The article is based on the authors' ethnographic fieldwork (2018–2019), which included observation and loosely structured interviews with people living in the Sundarbans and migrants from the Sundarbans in Kolkata. We speak Bengali fluently but were, for the most part, accompanied by local assistants. Our cooperation has been crucial for understanding the connections between rural and urban communities in the following fieldwork locations: five villages in the Kultali block, South 24 Parganas – a district which stretches from the Sundarbans to the urban outskirts in West Bengal – and among migrants from South 24 Parganas district who lived in more or less informal settlements in Kolkata. We visited the same communities daily during the fieldwork periods, so we could meet many interlocutors repeatedly and interact with them, in addition to encountering them during interviews; however, our urban interlocutors were more constrained in terms of time than the rural ones. The migrants worked long hours in informal sector jobs, and we could meet them only during their afternoon breaks from work.

Our interlocutors were Hindus who belong to Scheduled Caste (SC) categories, reflecting the high proportion of scheduled caste people in the Kultali block. Tenhunen conducted fieldwork for three months in 2018, interviewing 51 women and 25 men in an informal neighbourhood of approximately 200 households in Kolkata among people whom cyclone Aila had displaced. She also made three visits to three villages in the Kultali block. Roy conducted fieldwork for ten months in rural and urban areas. In Kolkata, she studied a settlement of over a thousand households. There, she interviewed 72 women and 80 men. She then conducted fieldwork in two riverside villages adjacent to the forest in the Kultali block from where her urban interlocutors had migrated. The two villages comprised 275 households belonging to SC categories. She interviewed 51 women and 46 men representing a cross-section of the different SC titles in the two villages. She also met and talked with panchayat (local governing organ) and NGO representatives, governmental officials, and political activists in these villages.

In what follows, we describe how the Sundarbans residents assemble various temporalities. We start by exploring our interlocutors' encounters with the temporalities of climate change mitigation and conservation policies, followed by how they combined their encounters with weather events and governance. We then examine how migrants displaced in the aftermath of a cyclone integrated

their encounters with rural and urban governance and the economy. To conclude, we summarise how our analysis contributes to the anthropological understanding of resilience and climate change.

## The Temporalities of Forest Conservation

The Government of India has responded to the threat of climate change in coastal areas with regulation (Haaris and Stellina 2023). The Ministry of Environment and Forests declared the Sundarbans a Critically Vulnerable Coastal Area in 2011 to ensure conservation and the fulfilment of local people's needs (Sánchez-Triana, Paul, Ortolano and Ruitenebeek 2014, 63). The climate change threat now dominates discourses about the delta, yet nature conservation and forestry practices that disregard local people's concerns have colonial roots (Chakraverti 2014). In independent India, various governmental initiatives, established mainly to protect the threatened tiger population, have curtailed rural people's access to the Sundarbans Reserve Forests (STR). Indeed, climate change mitigation in the region has focused on protecting the forests from small-scale resource extraction by regulating fishing in the core areas of the STR and restricting the local people's entry to the forests to collect forest products, which has negatively affected local livelihoods (Ghosh 2013). The local authorities, for instance, blame landless crab fishers in the Sundarbans for their supposed endangerment of the entire ecosystem, ignoring bigger actors such as companies that pose much greater threats to the forests and wildlife; consequently, resources intended for combating climate change and other environmental threats are distorted (Mehtta 2021).

The way forest-dependent people use the char lands exemplifies how people's livelihoods depend on their ability to assemble the emergence of chars with the temporalities of local governance through waiting and establishing patronage relationships. The chars randomly emerging from rivers and forests belong to the government; moreover, conservation legislation prohibits their use in the Sundarbans. People often complained that other villagers had misappropriated government-owned land; nevertheless, many were waiting for a perfect moment to cultivate their political networks to occupy char lands. Occupying chars in this way is not limited to the Sundarbans; those along other rivers across West Bengal, Assam, and neighbouring Bangladesh have also been captured by landless people and migrants who have been able to carve out new livelihoods and rights through their social networks and connections to local-level leadership (Lahiri-Dutt and Samanta 2013; Chowdhury 2021; Khan 2021; Khan 2023).

Tapas (introduced in the opening vignette of the article), who had constructed a hut on a piece of newly emerged char land, was politically well-connected; his brother was one of the TMC (Trinamul Congress Party) leaders of his village. He had started a fish farm with his brother on land they had captured after cyclone Aila. Paresh, another villager, relates how he moved to the village to work as a daily labourer but managed to build a house and start shrimp farming thanks to having been able to occupy char land with the help of a local leader. The granting of a permit to use char lands is a form of political patronage, as exemplified by the following comment by Rahul, a long-serving head of the local panchayat: 'Every political regime has allowed villagers to try out a local livelihood.' According to this elderly ex-SUCI party leader and a current employee of a panchayat office, people began to construct *bheries* (fisheries) on large tracts of char land with the help of the erstwhile ruling party, the Communist Party of India (Marxist) (CPI[M]), in 1995, although the forest department prohibited their construction. The villagers have continued to construct *bheries* with the help of local leaders, although on a smaller scale. Rahul explained that capturing land for fisheries depends on maintaining good relationships with the local leaders. Forest guards, who usually live in the same area they patrol, allow land grabs because local leaders also influence their lives and the possibility of their getting benefits.

Legalising the illegal occupancy of char lands is a complicated task that requires the government's acknowledgement of the occupant as a beneficiary of some governmental scheme. Coordinating the temporality of the emerging chars with those of local governance involves waiting. The occupants must invest time in applying for government benefits using their residence on the char



land as their address. They must also get involved in party activities, building mutual relationships with local leaders to obtain their support since the ruling political party can influence and even expedite the legitimising of informal occupancy by local government. It is easier for landowners to occupy char land than for the landless; however, it is also possible for the latter, provided they can gain the support of the ruling party, demonstrating the productive aspect of patronage relationships from the viewpoint of the landless.

## Fluctuating Weather and Environment

Like the erratic emergence of chars, each weather phenomenon the coastal people encounter has its temporality. The temporalities of the fluctuating environment and weather vary from gradual to sudden and from regular to erratic. Weather patterns are increasingly experienced as irregular; for instance, unseasonal rains have become common. People said that six seasons – summer, rainy season, autumn, late autumn, winter, and spring – have merged into two: hot and cold. Although gradual and much less unacknowledged by the media and public attention than cyclones, changes in the seasons are having devastating effects on agriculture not only in the Sundarbans but in much of rural India (Amarnath, Alahacoon, Smakhtin and Aggarwal 2017). As a 30-year-old male construction worker who migrated to Kolkata explained, ‘The rains do not happen as they should. Therefore, farming has become difficult, and people cannot feed themselves.’ An older woman who has observed the rise in both temperature and ground salinity in Kultali block was not familiar with the climate change narrative; nevertheless, she saw a connection between the two gradual phenomena, the increase in temperatures and salt levels, suspecting that the rise in salt levels had caused the increase in temperatures.

Despite the seaward flow of freshwater, most rivers in the West Bengal Sundarbans are perennially saline since they are also fed by tidal seawater (Dhar 2011). The salinity of the deltaic region has not only been exacerbated by sea-level rise and extreme weather events but also, crucially, by the diversion of river water due to human efforts upstream and downstream (Sen 2019). In the villages in the Kultali block where we carried out fieldwork, silted, dried-up canals and rivers could no longer effectively clear out the surges of saline water caused by cyclones and the sea-level rise. While most of our interlocutors emphasised the critical role of embankments in protecting against seawater surges, some also pointed out that they worsen the waterlogging and prevent the flushing out the saline water. Moreover, rapidly expanding shrimp farming is causing salt inundation and job loss on both the Indian and Bangladeshi sides of the Sundarbans (Dewan 2021; Paprocki 2021; Tenhunen, Uddin and Roy 2023; Sen 2019) although this was not the leading cause of salinisation in the Kultali block as in many other parts of Sundarbans.

Major cyclones that cause sudden surges in the ground salinity stand out from the gradual saltwater inundation, and the Sundarbans region has been hard hit by, among others, Amphan in 2020 and Yaas in 2021. Cyclone Aila occurred at high tide, displacing millions of people in India and Bangladesh in 2009. For our interlocutors, Aila represented a break with the past; people perceived time as divided into before and after Aila. It was experienced as a rupture due to the total destruction it caused, the resulting mass migration, and, eventually, investment in the region during the post-Aila period, which changed rural communities. Landowners prospered as a significant part of the state investments was channelled to them. Local political leaders, in turn, gained power as mediators and distributors of the benefits. Small farmers and the landless who have migrated to work in urban areas treat their rural governmental benefits as assets while earning a precarious living in the urban areas. A young man in his thirties, who migrated to Andaman and then to Kolkata to work as a construction labourer, replied to my (Tenhunen) question about post-Aila conditions:

There was development after Aila. Before, people had to face food scarcity. At least because of Aila, they can now eat and are doing much better. Moreover, at least young men from my neighbourhood have migrated



abroad [to different states of India], and they are still doing that. It was after Aila that everyone started going abroad.

He had lived with his parents on a small farm that suffered from gradual salt inundation. When Aila raised the ground salt to a record level, he finally decided to migrate and find a new livelihood; thus, he and his neighbours experienced Aila's suddenness and force as a new beginning. The rhythms of the fluctuating weather influenced people's migration decisions. We were told that in the immediate aftermath of Aila, everyone had to leave regardless of their class and land ownership. However, in the long-term aftermath, large landowners found themselves able to continue to make a living in the Sundarbans.<sup>5</sup> As Oliver-Smith (2009) has argued, climate displacement is a convoluted and multi-faceted phenomenon shaped by social, economic, and political factors.<sup>6</sup>

### Waiting During the Post-Aila Period

Like many sites of major disasters, the Sundarbans experienced a significant transformation during the post-Aila period. States and private players often respond to disasters by furthering their interests, be it Hindu nationalism in Bhuj, India, after a devastating earthquake (Simpson 2013) or state building through increased marginalisation of the Tamil minority in the aftermath of the tsunami in Sri Lanka (Choi 2015). The timing of Aila largely explains the large aid volumes, which have continued for over a decade. Aila hit in the middle of an intense fight for power between two regional parties: the CPI(M), which had ruled the state since 1977, and its rival party, the TMC. After Aila, the West Bengal government built storm shelters, created warning systems, and improved the infrastructure (Sánchez-Triana, Paul, and Leonard 2014). Roads and embankments were fixed and built. Even the remotest parts of the region were provided with electricity. In addition to subsidised food grains under the NESAP (National Food Security Act 2013), Aila-affected villagers are still – more than ten years after the cyclone – entitled to free food grains. South 24 Parganas district, one of the areas most strongly affected by Aila, has emerged as one of India's highest-level recipients of the central government house funding scheme (Sharma and Das 2018). The housing programme provides a major incentive for people who have migrated to Kolkata to maintain connections with their native villages. A man who works as a construction labourer in Kolkata explained:

There are more possibilities for getting benefits in the village. Everyone says that they give houses. I thought about this and kept my cards [identity papers, ration cards, and voting cards] there. Here, they do not offer a house or anything. There, one can survive with very little.

The timing of the execution of the housing programme centres around how assessment teams prepare waiting lists of the people entitled to receive the funding. This process is often slow and unpredictable. As a 20-year-old woman, a domestic worker in Kolkata, related:

Nowadays, the government gives houses and bathrooms. Some people have received them, and some have not. They have included our names on the waiting list. We will get it later, one day. Destiny determines when it happens. My in-laws are in the village, so they can constantly communicate about the house with the administration. We will see what happens. We may get it, or we may not.

Most benefits were administered by local authorities dominated by the local ruling party elites. I (Tenhunen) was told that it was not enough to fulfil the criteria to get the direct cash transfer for house building meant for poor people. To get one's name on the beneficiary list, one had to be close to the party leaders and have time to attend the meetings. To get the house funding, migrants must anticipate the administration's rhythms and establish relationships with the local leaders – just like rural residents waiting to take possession of char land.

One day, I (Tenhunen) visited a household in Kolkata where a migrant woman was living with her daughter-in-law, which was an unusual arrangement: why would a young woman and a wife live with her mother-in-law instead of her husband and children? It turned out that the rest of her family members – her father-in-law, husband, and children – had remained in their village in the Sundarbans; meanwhile, the two women worked as domestic helpers in Kolkata to finance

the building of a concrete house in the village. The state had provided a lump sum for the construction, but additional funds were needed to complete it. The two women were waiting to rejoin their family eventually in the village, although it was unclear how the family would make ends meet should they cease working in Kolkata and stop sending money to the village. Nevertheless, the concrete house being built provided security – after all, the women were also waiting to get evicted from the squatter settlement that offered them low-cost housing in an expensive part of Kolkata. Yet the looming eviction came with a glimmer of hope. As the present, or for that matter, any future ruling party of the state, needed the votes of the informal residents, there was a reasonable likelihood that they would be offered a rehousing arrangement in Kolkata if they were evicted. If the state were to bulldoze the squatter settlement houses and build a park there, as the city administration had planned, they might be offered a flat in Kolkata. However, the city had postponed its plans indefinitely.

While Aila's effects were sudden and unpredictable, ensuing state investments in the welfare of the affected people have not been much more predictable, but they have been slower and more gradual than the cyclone. The benefits for Aila-affected people have their temporality, which is embedded in local social relationships and places; it is, for example, possible to influence the rhythms of benefit distribution through one's social presence or 'cut money', as bribes are often called. Giving bribes is usually not an absolute necessity to get most government benefits or licenses. Still, people can expedite matters by paying – and sometimes local elites demand bribes in return for mediating government benefits. While bribes help access benefits, people considered demands for bribes immoral, voicing strong criticism of the ruling party. Large-scale distribution of benefits has led to a new sense of entitlement, which is manifested as an ability to imagine new types of political relationships and demands for change, reflected in the protests against 'cut money' demands – and attempts by the ruling Trinamul party to curb irregularities in benefit distribution (Editorial 2023).

### Active Waiting in the City

People's encounters with post-Aila policies in rural areas are complicated by the migration of most landless and small landowners to work in Kolkata. Hence, they must assemble the temporalities of rural governance with those of the urban informal sector. The temporalities of urban informal work and housing motivate migrants to maintain their rural connections. Whereas the city offers precarious work and housing opportunities, the village acts as a somewhat stable support structure on which one can fall back in case of inability to work and live in the city. As a man whom I (Tenhunen) met in an informal settlement by a busy road in a posh Kolkata neighbourhood (construction worker, 42 years old) explains:

I keep everything in the village: ration card, *adhar* card, and voting card.

T: Why do you keep them there?

It is not possible to keep them in two places. If they start to develop this area, then there will be trouble again, and we will return to the village.

A woman, 35, who lives in the same informal settlement describes her housing situation:

T: What kind of plans do you have?

What will I do in the future? I do not know what will happen here. There is the threat of eviction. If that occurs, we will have to return to the village. Maybe they are making some arrangements for rehousing, but there is no guarantee of what they will do and when. Perhaps the government will give us some place. This is a *basti* [informal slum]. Mamata Banerjee provided housing there for people evicted from a *basti* near Siemens. We worry a lot about where we will go when we are evicted. Renting a place is very expensive. If we received a house, it would be a small one. It is not worth fixing this house. The roof is leaking, but fixing it does not make sense because we do not know when we will be evicted.

T: So, you are waiting to see what the government will do?

Yes, otherwise we would not live in a house like this.

The peri-urban spaces of Kolkata to which our interlocutors have migrated have emerged as lucrative fields for unbridled speculation and investment in housing, roads, and commercial developments (Sangameswaran 2018). The newly built high-rise buildings that characterise the area as the new Kolkata have been constructed and are serviced by migrants from the Sundarbans. Men have found work mainly on construction sites, while women have been employed predominantly as domestic workers in middle – and upper-class households. We carried out fieldwork in two adjacent informal communities along the major road on the east side of Kolkata, one of which had been legalised. The houses of the legalised neighbourhood were mostly of cement; in contrast, the unlegalised, informal community looked more temporary, with houses made of mud, bamboo, and plastic sheets. The residents of this neighbourhood had little incentive to improve their dwellings as they were aware that the city had zoned the area as a park. Yet the interiors of these houses were usually neatly furnished and could include such expensive items as flatscreen televisions and large refrigerators.

Both neighbourhoods were formed by people simply taking possession of vacant land. The first inhabitants settled without paying, but those who arrived later usually related how they had bought the land or the house, although the land still belonged to the city. So, buying could refer to paying the local police and the party office of the ruling party for their protection. If the newcomers bought an old house, they might also have paid the earlier residents. Initially, when the first people settled in the informal community, police used to come to evict them. Many residents resisted the evictions by protesting collectively at the city office and establishing a relationship with the local councillor. They have also successfully defended their right to free drinking water from the excess flow of a nearby water pipe when the city threatened to close it down. Much as Aila victims were able to develop critical consciousness regarding benefit distribution, active waiting in the city has entailed becoming conscious of one's rights and making successful demands even without the formal right to work and live there.

As the informal community grew, along with its social connections, eviction drives ceased. People have continued to settle in the neighbourhood by paying bribes to the police and the local party office. Informers maintained strict surveillance over the buildings to ensure the residents paid informal taxes as bribes for home improvements. Contesting the city authorities' zoning plans, the police and local political leaders have created a housing market where, instead of paying for house ownership or rental, the residents, in effect, pay to turn temporary housing into a more permanent arrangement. Some people have evaded the police individually simply by fleeing their houses during a raid and returning to repair them after the police depart, thereby avoiding demands for protection money and refusing to build a mutual relationship with the police and local party representatives. I (Tenhunen) also met people who had established such close relationships with local politicians that they did not need to pay bribes; however, most informal residents pay according to rates negotiated as part of the patronage relationship with the local party office and police. People said that ten years earlier, they had to pay Rs. 5,000–6,000 as a one-off payment, but those who had bought the right to stay during our fieldwork reported having paid Rs. 30,000–50,000.

The following narrative of a woman who works as a domestic help in Kolkata exemplifies how the rates are negotiated depending on circumstances and relationships. Her husband and brother were arrested while building their house. She then went to the police station with her mother-in-law and small crying children to demand their release, refusing to leave until the police let them go. When her mother-in-law asked the police if they expected money, the police asked for Rs. 500,000. Her mother-in-law replied that they would not be living in a basti if they had so much money. The daughter-in-law said, 'We will not give you any money; just let them go. Can't you see that we are poor people?' The police then asked for Rs. 300 for each arrested person and

took a mobile phone, cigarettes, and 50 rupees from one of them. The two men were released in the evening. Despite having paid such a small sum, they never had to pay again, thanks to having been able to get support from a local councillor.

The migrants seek to procure documents to strengthen their claims to live in the city as legitimate citizens. Eviction offers one way to have one's identity documented, as the eviction document granted by the police provides a declaration of one's status as an illegal settler in the city; hence, these notices exercise important material agency. The residents of one informal neighbourhood had managed to end their waiting for permanent housing by procuring such documents once the government began to serve them eviction notices on behalf of the Kolkata Municipal Corporation (KMC).

As an elderly resident of this settlement related:

The government then began to enumerate and prepare a list of probable evictees with the aim of providing resettlement packages. My name was also included in the list. However, like some other residents, I resisted the eviction and the resettlement packages since the area where the government was trying to rehouse us was far away. We have lived here for generations and managed to earn our subsistence. Some people accepted the government offer but simultaneously managed to retain their old space by settling their relatives here. We all benefitted from the government eviction and resettlement by obtaining certificates that give us the legal right to stay here.

Transactions of land in exchange for money and the construction of new houses are prohibited in this settlement. Nonetheless, houses are sold and rented out at exorbitant prices. For example, a recent migrant family found a tiny room to rent at Rs. 1,600 per month. A couple of families living in rented rooms within the settlement have waited for a long time to purchase a small portion of land for Rs. 160,000 to build their 'own' house. Money is exchanged for informal, permanent housing rights without legal documents. The local informal neighbourhood club facilitates the transaction and mainly decides its price. The settlers do not hesitate to give money to the club for these transactions since they expect the club to protect them. The local police has entered the scene in the name of curbing illegal property transactions; however, instead of banning or curtailing construction, they have legitimatised the housing deals in exchange for money. Like the Sundarbans residents who depend on local leaders for benefits and are waiting for the right moment, migrants in Kolkata are waiting and interacting with the police and the party leaders to secure more permanent housing.

Combining rural and urban political economies as well as environmental changes requires networking, as well as waiting for the right timing and social presence in two locations. Our interlocutors could influence temporalities by establishing relationships with the elites or giving bribes. This focus on waiting and patronage reveals the possession of assets as fluid. Whereas waiting for rural housing could be expedited by cultivating relationships with the local party leadership, mutual personal relationships with local leaders tended to play a lesser role in securing the right to stay in Kolkata. People paid bribes in rural and urban areas to access benefits or expedite their granting, but money was more significant in Kolkata.

## **Gendered Temporalities of Informal Work**

The rhythms of the informal labour market in Kolkata reveal the gender dimension of its temporalities. A key temporality of women's domestic work is manifested in the possibility of sudden dismissal. As one woman explained, finding long-term employment as a domestic worker is difficult.

I used to work in those houses, but they all moved away to Delhi, Shillong, Bombay, and Gujarat. I was not well-paid, but I was treated well. They paid attention to my well-being and helped me. Now it isn't easy to get new work. If I get a new job, they will fire me if I fall ill and take days off. If I am absent one day, they will tell me I need not come again since they have found someone else.

Another woman recounts how she was dismissed after working for a year because the employer did not want to give her a *puja* (religious festival) bonus. Yet, despite the temporary and informal nature of contracts, most women find that work as a domestic helper is more consistently available than any other option. As the middle-class neighbourhoods expand, so do the domestic chores and the maidservants' jobs, and the income is more stable than from a small-scale business. As one woman explained:

My family owns a tea shop, but I work as a domestic helper in Kolkata. Income from domestic work is mine. This income makes my standing good both in my family and society. Although running a tea shop is considered respectable, domestic work provides a stable income. With this money, I have been able to take care of my elderly parents.

Women's work as domestic helpers often provides a meagre source of livelihood not only for migrant families in Kolkata but also for family members who have stayed in the village. It is easier for women to find domestic work than for men to find work in the informal sector of the economy, so men often have to wait longer to find work than women. I (Roy) observed young men waiting for jobs as drivers, engineers, and clerks, while few young women were waiting for parlour's, nursing or tailoring jobs. Men often enjoyed the luxury of waiting for better jobs if their wives or mothers were domestic workers. I (Tenhunen) asked a woman who worked as a domestic helper and ran a small shop in her neighbourhood whether she expected her three sons to take up the responsibility of running the household now that they were adults. She had long been the family's primary breadwinner as her husband could not work. One son was going to college, while the other two were looking for opportunities and waiting. The woman laughed and said that without her contribution, the men of her family would not survive. The gendered temporalities reveal resilience as relational; the relatively easy availability of women's domestic work allows men to wait for more lucrative job opportunities.

## Conclusion

Anthropologists have provided a crucial complementary perspective to development-oriented, top-down views by demonstrating that resilience is a situated and translocal practice intertwined with power structures (Hastrup 2009; Cons 2018; Greiner and Sakdapolrak 2013). Focusing on the temporal aspect of lived resilience, we have furthered this understanding by analysing how resilience requires interaction with human and non-human forces and rhythms. We showed that isolated individuals or communities do not construct resilience; instead, it is relational and multitemporal. Like many resilience-building development projects, local governance in the Sundarbans operates under the assumption that people must belong to bounded localities to qualify for benefits. Moreover, most resilience-building initiatives and ideas designed for the Sundarbans focus either on developing sustainable rural livelihoods or relocating vulnerable populations (Sánchez-Triana, Paul, Ortolano and Ruitenebeek 2014). However, the era of climate change exacerbates uncertainty; hence, as Scoones and Stirlings (2020) argue, policies must embrace uncertainty. Sundarbans, too, is influenced by a myriad of unpredictable factors. In addition to global warming and sea level rise, the fluctuations in the upstream river flows contribute to silt movement and salinity downstream. While the urban informal sector provides income-generating opportunities, these jobs do not provide long-term security. Farming, fishing, and collecting forest produce offer complementary livelihoods and safe havens in crises. The Sundarbans residents' multi-temporal resilience-building strategies could show the way forward in flexible resilience thinking and building. Local policies could enable this flexibility by providing adaptable safety nets.

We contribute to the questioning of climate reductionism and climate reductionist understandings of resilience (Dewan 2023; Hulme 2011; Hulme 2023, Paprocki 2021) by showing that people not only build resilience to climate change impacts and environmental changes but also policies, power structures, and human action. The future of the Sundarbans is often depicted as determined solely by climate change impacts (Harms 2018), although salinisation is caused by both the rise of

the sea level and human action. In contrast to public visions of climate change hotspots like the Sundarbans as places of spatial collapse and extreme acceleration of environmental degradation (Harms 2018), we discovered multiple temporalities that people encounter through waiting and establishing patronage relationships. In addition to the rhythms of the fluctuating environment, local governance, climate change mitigation policies, and state initiatives to manage the aftermaths of recurrent extreme weather events also create temporalities, rendering certain livelihoods and housing arrangements illegal. However, vulnerable people are able to develop critical discourses influencing governance through their active waiting. In Kolkata, active waiting could involve developing relationships with local leaders as well as public protests and legal measures enabling residents to legalise their informal dwellings or qualify for rehousing in Kolkata. Thus, like Hastrup (2009), we demonstrate that lived resilience is not merely about seeking to strengthen the status quo but also about agency and the ability to influence power structures. It attests to the informal residents' negotiating power that they have been able to remain and wait in an area zoned as a park, thereby forcing the city administration in its turn to wait instead of going ahead with their plans for city beautification.

## Notes

1. All informant names are pseudonyms.
2. This work was supported by the Academy of Finland under grant number 318782.
3. Our analysis draws inspiration from Bear's (2015) work on the temporalities people navigated under austerity capitalism.
4. Whereas patronage can be defined as a patron distributing his/ her resources to clients, brokerage is usually used to refer to the mediation of resources the broker does not own (Abercrombie and Hill 1976). As is common in South Asian scholarship, we use the term patronage to refer to both forms of clientelism, because the term patronage is better able to capture the local meanings of these relationships.
5. Since our interlocutors were displaced by Aila we are not able to analyse migration from Sundarbans in all its complexity as Dewan (2023) has done in her article criticising climate reductionist understandings of migration in Bangladesh.
6. Climate reductionistic discourses which present migration as a climate change adaptation are advocated on both sides of the Sundarbans but they are more prominent in Bangladesh where Paprocki (2021) has called the neglect of coastal infrastructure and livelihoods the politics of retreat. Recent comparison between government policy in the Bangladeshi and Indian sides of the Sundarbans shows that West Bengal government advocates the 'build back better' approach more than the Bangladeshi government (Tenhunen, Uddin and Roy 2023).

## Disclosure Statement

No potential conflict of interest was reported by the author(s).

## Funding

This work was supported by Academy of Finland: [grant no 318782].

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