#### MONSOON FOLIO

Ananda Jaganathan

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#### MONSOONAL ENCOUNTERS

"The Languages and Imagi nations of Monsoon Rains below the Eastern Himalaya." Australian Himalaya Research Network, October 29, 2020.

2. Ibid.

- 3. Government of Assam Water Resources. Brahma putra River System | Water Resources | Government O Assam, India. (n.d.).
- 4. Rahman, "The Languages and Imaginations of Monsoon Rains below the Eastern Himalaya."

dom internet searches.

- 5. Lahiri-Dutt, Kuntala, and Gopa Samanta. Dancing with the river: People and life on the chars of south asia. New Haven, CT: Yale University Press, 2013, 1
- 6. Bremner, Lindsay. Mon soon as method: Assembling monsoonal multiplicities. New York: ACTAR, 2022, 15-16.

7. Ibid., 19-20

8. Ibid., 16-17

Monsoon has its way of transforming urban settlements. I have seen metropolis, such as Mumbai, in disarray with water-logged drains unable to capacitate the likes of *baarish*; large tracts of landscape cultivated into lush farmlands with malia in villages in Southern India; And in riverine settlements, such as the one cited and situated in this essay, a wetness that seeps into the most intimate crevices of the home. I must confess that in doing this research, I never once experienced the rain in Assam first-hand. I had only been aware of it through the stories told to me by acquaintances, dramatic news reports from the Northeast, and photos that surfaced through ran-

Yet, monsoon came to be central in this research because of its elusive occurrences during my fieldwork. It materialised in the remains of destroyed houses, permanently bent palm trees, and rusting corrugated sheets. It spoke not only in pitter-patters but through the clamour of inflated prices in the damp fish markets. It transpired in the imaginations of the riverine communities as memories of displacement and missing land taken by floods, folk songs to the angry river, and the myriad of names given to rain. From sagoli kheda borokhun meaning goat-chasing-rain, goru kheda borokhun a cow chasing rain, mid-intensity rainfall as manuh kheda borokhun the one that chased people, to intense rainfall as gor kheda borokhun, the rain that chases away even the one-horned rhinos.1

I took note of these recurring monsoonal encounters during my journeys across the Brahmaputra, during the dry, foggy winter in the northeastern borderlands of Assam, India. They became a constant reminder of monsoon's presence in the everyday and its propensity to take root and rupture riverine lives. A discursivity that expands the consideration of the monsoon in the making and unsettling of landscapes and architectures. Such experiences provoke

a revisitation to the fundamentals of the hows and whens of monsoon, and, most important, what is monsoon?

"After all, it is the rain that gives life to us and the river," said Ali as he prepared to leave his home to gather the harvest for the day. Ali, a resident of Montrichar I met during my fieldwork, concluded that despite uncertainties set forth by the yearly floods, they were essential to farmers like himself, who depended on the water to sustain a

In the northeast of India, communities prepare for the monsoon rain in June, July, August, and early September. Around this period, monsoon currents drag rain from the Indian Ocean and move from the easternmost fringes of the Himalayas to North-East India. As the monsoon clouds bounce between the Patkai ranges and the eastern Himalayan ranges, the ensuing rains nourish the various communities and shape the landscape through flows and floods.

The Brahmaputra, now swollen and darkened, meanders through the Tibetan plateau, almost turning on its head before entering Arunachal Pradesh in India, rampaging through the Eastern Himalayas, gushing and braiding through the plains of Assam and Bangladesh.<sup>3</sup> Before emptying into the Bay of Bengal, the frontier river is joined by tributaries from Nagaland, Meghalaya, Arunachal Pradesh, and Bhutan. All the while the hydrological forces continue to animate the riverine islands, locally known as char-choporis or charbhumi.4

Kuntala Lahiri, in Dancing with the River, asks whether chars, riverine islands formed and unformed as vast quantities of sediments dislodge into the streams of Brahmaputra, are part of fluvial dynamics or, simply, units of land; more concisely, are they solid or liquid.<sup>5</sup>

Along the descent, while certain parts of the river-scapes are subject to depositions of sand and silt, forming chars, others are subject to erosion and weathering, reshaping the landscape and urban settlements. This microscopic composition of the chars, part water and sediments, throws robust challenges in territorialising the macro formations and intermediate urban forms.

This research situates itself within this vast planetary system as I follow the interactions of the char dwellers with the monsoonal cycles in the Assamese borderlands. While in modern writings of cities, the domains of the social and natural have been understood in isolation, cities as human-made and separate from nature, I try to foreground urban developments as a more-than-human assemblage.<sup>6</sup> Here, far from an urban backdrop, monsoon plays the role of an agent that shapes socio-spatial arrangements.<sup>7</sup>

This work looks, specifically, at these developments through borderland economies traced during the fieldwork whose extraction, production, mobilities, and exchange depend on the materialities of the monsoon's hydrological and fluvial phenomena. Manifesting and spatializing through the varying timescales of the seasons, market economies not only gauge the constitutive dynamics of monsoon but also socially ground it in everyday experience.

I try to think of this monsoonal-market relatedness in terms of the feminist theorist and physicist Karen Barad's "performative metaphysics," as cited by the research group Monsoonal Assemblages in their publication Monsoon as Method.<sup>8</sup> Barad developed this theory as a way to understand the politics, ethics, and agencies involved in practices of observation and knowledge production. And by extension understand the role of human and non-human, natural and cultural factors in scientific and other social and material practices. The concept of entanglement is crucial to this theory. For, "to be entangled is not simply to be intertwined with another, as in the joining of separate entities, but to lack an independent, self-contained existence." 10 As suggested by the scholar and architect Lindsay Bremner, in her introduction to Monsoon as Method, it allows us to shift our conception of the monsoon from a thing or idea to the life-world or process in which this research takes place. 11 "Matter comes to matter through intra-actions between material-discursive components of phenomena."12 A processual definition of monsoon and market allows entries at different angles and intersections of the entangled world.

Through this manner, markets become more than economic in-

frastructures for goods in exchange for money. Sango Mahanty, human geographer, points out, although price, money and the act of bargain are essential to such forums, they are also social and environmental infrastructures whose embeddedness in the natural and social worlds enhances their transformative powers. <sup>13</sup> Markets, their architectural transformations, both physical and chemical, and economic volatility reciprocate ecological forces. I see markets as monsoonal infrastructures where architecture, ecology, and socio-economic relations coalesce around the monsoon's agency and negotiate it to societal priorities. Rather than thinking of monsoon as science, this monsoonal method involves thinking of the weather as an ethnographic subject, a subject that authors and narrates histories and, by extension, a maker of spaces.<sup>14</sup>

By viewing nature as a historical actor, I hope to challenge notions of a nature typically seen as an object of human contemplation (further explored in Chapter 2). Therefore, embodying the statement to the effect that "no landscape is completely cultural, all landscapes are the result of interactions between nature and culture."15

In grappling with the stickiness of monsoon, I ask what are the intra-actions between the dynamic monsoon and market systems in the borderland chars of Assam. What are the forces at play in this assembly? What is assembled? And what is disassembled?

I trace these questions through specific commodities I encountered during my fieldwork in the borderland chars. This includes rice grown on the international borders, jute carried by traders on their weekly journeys to the port, sediments that were mined and marketed on the side of the road, and the elusive cattle markets that called

ways in which the monsoon assembles these economies, I draw on varied sources, from global weather data to news reports, government records, interviews, and photographs. I gather, layer, map, and narrate as a way to intimate and relate these otherwise seemingly

Chapter 1 will set the structure and tone of this investigation by establishing the problem statement and delving deeper into the methods of drawing the monsoon, translating fieldwork into cartographical representations and experimenting with different modes of narrating monsoon. In this chapter, I introduce a narrative that, while unfolding in the latter parts, will not only draw on the research material but also frame it.

The story I write is that of Bordoisila, named after the Assamese storm spirit. Considering, for instance, the various climate change induced disasters and constant clamour of monsoon patterns becoming unpredictable, Bordoisila's world, from an unknown time in the future, allows us to speculate a world that has convulsed. Pegged to this narrative in the question of how we design with the volatile monsoonal ecology.

Chapter 2 sets up a historical framework that ties the monsoon

to the socio-economic, political, and ecological landscape of the region. In highlighting the geographical remoteness of char communities and their access to economic and political centres. This overview should give insight into the urgency of focusing on the margins. And how making monsoon the forefront of the research can attempt to rethink the colonial binaries of landscapes and the people who inhabit them. To this, I draw on works of anthropologists focusing on borderland research in Northeast India, such as Malini Sur, and environmental historians, such as Debjani Battacha-

Chapter 4 will introduce the monsoonal markets traced during the fieldwork through thick socio-spatial descriptions. The sub-chapters combined will attempt to bring back the historical dimension to the context of the shifting landscape, and place the material practices of people central to ideas of place-making and identity.

These materials journeys, often long and laborious but at times short and stealthy, recalibrate time - imbuing mundane economic activities with ecological salience. Small-scale traders and transporters operate according to the logics of the monsoon, formulating

for precarious border crossings. In an attempt to trace the emergent distinctive regimes of mobility and systems of production. These market transformations occurring at varied temporal and spatial scales make material transformations of air, land, and water legible The stories of these elements combine to tell polyvocal narratives of 10. Ibid. monsoonal worldings in flux.

11. Bremner, Monsoon as method: Assembling monsoonal multiplicities, 24-25.

9. Barnard Center for Re-

search on Women. Karen

Barad: Undoing the Future. YouTube. YouTube, 2018.

12. Ibid., 16-17.

- 13. Mahanty, Sango. Unsettled frontiers: Market formation in the Cambodia-vietnam borderlands. Ithaca New York: Southeast Asia Program Publications, an imprint of Cornell University Press, 2022, 2-3.
- 14. Bremner, Monsoon as method: Assembling monsoonal multiplicities, 2022, 25-26.
- 15. Lahiri-Dutt and Gopa, Dancing with the river: People and life on the chars of south asia, 6.



# RESEARCH QUESTIONS

What are the intra-actions between the dynamic monsoon and market systems in the borderland chars of Assam?

What constitutes a Monsoonal Method?

How do we design with the volatile monsoonal ecology?



#### BRIEF NOTE ON STRUCTURE AND WRITING

Are Being Threatened by El Were Disrupted by the War in Ukraine." Arab News, July 14, 2023.

17. Ibid.

18. Ibid.

19. Bremner, Lindsay, and Harshavardhan Bhat. "The Air of the Monsoon: It Myth, Pause and Story." Es say. In Monsoon as Method: Assembling Monsoonal Multiplicities. New York: Actar Publishing, 2022, 238.

20. Ibid.

21. Ibid., 238-239

22. Kirksey, Eben, and Don na J. Haraway. "SPECULA-TIVE FABULATIONS FOR TECHNOCULTURE'S GENERATIONS: TAKING CARE OF UNEXPECT-ED COUNTRY." Essay. In The Multispecies Salon.

23. Ibid.

Press, 2014, 243-245

24. Ibid.

25. Frichot, Hélène, and Naomi Stead. Writing architectures: FICTO-critical approaches. London: Bloomsbury Publishing PLC, 2022,

26. Ibid.

27. LOENHART, KLAUS Breathe: Investigations on Our Atmospherically Entangled Future. BIRKHAUSER, 2017.

16. Person. "Rice Crops In June, the National Oceanic and Atmospheric Administration Nino after Grain Supplies (NOAA) stated that El Nino, as opposed to La Nina (the cooler pattern) dominant over the past three years, was underway. 16 El Nino is a climate pattern caused by warming surface water in the eastern Pacific Ocean, resulting in heavy rainfall and droughts.<sup>17</sup> Climate experts say anthropogenic traces (such as aerosols) have contributed to making El Nino and monsoonal patterns erratic.<sup>18</sup>

> n the throes of the changing patterns, the Indian government declared an effective ban on non-basmati white rice, an attempt to lower rice prices and secure its availability at the onset of El Nino. Already in the last few years, the planting of summer-sown rice had reduced by 26 per cent with monsoon-induced dry spells followed by intense floods. All of this makes me wonder what it would mean to the already volatile char economies, the farmers, cattle traders, and sand miners who patiently wait for monsoon rain. I approach this inquiry with speculation - one where I use "what ifs," "what wills," and "maybes" to imagine spatial transformation.

Durham: Duke University In The air of the monsoon: in myth, pause and story, Harshavardhan Bhat articulates how anthropogenic matter, through "atmospheric cultivation," produces ambiguities in the transformation of monsoon and our understanding of it.<sup>19</sup> Despite the logic of science and statistics that form conventions designed to forecast monsoon, the ontological fictions they create for people and life forms attributes to their myth-making capacity.<sup>20</sup> In Bhat's words, "The monsoon was and is writing its own stories and we are writing myths."21 This is not to problematize the forecast but rather to recognise that myth-making is inherent. Both fiction and facts can exist in the same space and frame of time.

Feminist theorist, Donna Haraway, calls this approach of imagining

a world that is radically different from ours as Speculative Fabulation.<sup>22</sup> Within these worlds inhabit wild facts, creatures of the imagination, humans, and non-humans.<sup>23</sup> Essentially, details extruded from reality that endows it the possibility to exist in another reality or future world.<sup>24</sup> In a similar vein, Naomi Stead and Hélène Frichot, in their book Writing Architectures, ask "what happens when fiction, experimental writing, and criticism are combined and applied to architectural projects and problems?"25

This crossover in genres of writing and disciplines is what Stead and Frichot call ficto-criticism, an experimental and often feminist mode of writing, that when extended to the architectural practice is able to challenge assumptions about our contemporary social, economic, ecological, and political realities.<sup>26</sup> I propose that it also allows us to venture into worlds in making, where architecture transforms in contact with environments framed by cultural studies, literary theory, and ethnography. It allows us to test the elastic capacity of our designs.

Let me allow the philosopher and anthropologist Bruno Latour to

illustrate this thought of elasticity with what he calls matter of concern. He states: "[a matter of concern] is what happens to a matter of fact when you add it to a scenography, which much like you do by Here is a story about remembering the monsoon and rediscovering shifting your attention from the stage to the whole machinery of a theatre."27 Thinking of design in these terms, architecture begins to "render a different sound, they start to move in different directions, they overflow their boundaries, they include new sets of actors, they reveal the fragile envelopes in which they are housed."28 In a sense, it demystifies a picture-perfect image of progress and the politics of folktale that was never told to her, much like the memories of the improvement, in favour of perpetual construction. Just like the river once monsoon. bed, nothing shall settle.

All of this to explain why I write. On the one hand, I write because I love storytelling and the act of putting words on paper seems to be the only way I can get clarity and, in this case, make sense of the vastness of monsoon. But, on the other, as a designer, I write to take into consideration a world I otherwise couldn't. Take this story that I am briefly about to outline how you like: a design brief, a piece of nonfiction, an extension of this research, or just another tangent. This is a story that is set in the landscapes I have studied but in a distant future where things have convulsed. In a time where dreaded anxieties of ecology, economies, and societies have been realised...

One day Bordoisila, whose name when broken down into bor, doi, and sila adds up to wind, water, and girl, is met by spectral voices living in the structures that make up her little community.<sup>29</sup> With the ensuing conversations, she learns of a place that she never imagined before. One that her elders vaguely remember but never told her about, in hopes of sheltering the child from their distant memories of the monsoon that belonged to another world. They knew telling her would mean having to recall the subtle joys that it brought. Why disappoint, they thought? Why remember what is no more?

a ravaged home in the post-Anthropocene, where terms like floods, climate refugees, and illegal immigrants are indited into the vocabulary of the everyday. In looking back and within the spaces that make her world, Bordoisila rediscovers the only place she has ever known and the meaning behind her name - a storm spirit from a

The bones of this story attempts to weave the gatherings from this

research, some central other facts subdued into the background. The journey into Bordoisila's world reveals an architecture that transforms in ways that Latour describes as "move," "overflow," "reveal," etc.<sup>30</sup> Composed through these ecologies of salvage, the architectural assemblage begins to act in ways that are different from the initial design. The assemblage at the end of the story gives insight into the prior lives of the design, while also revealing how objects live on

despite not resembling their initial thought much like the Ship of

28. Ibid.

29. Rahman, "The Languages and Imaginations of Monsoon Rains below the Eastern Himalaya."

30. LOENHART, Breathe. BIRKHAUSER.

#### PROLOGUE: A POST-ANTHROPOCENE SETTING

after Weeks at Sea." The Guardian, May 3, 2020.

32. Uddin, Jasim. You've set me adrift. Bengal, 1904.

33. Sen, Sudipta. "Of Holy Rivers and Human Rights: ends had unravelled. Protecting the Ganges by Law." Yale University Press, April 12, 2022.

lfigur, and Edward Kieran Boyle. "Infrastructure as Archive: Recording the State's Materiality along the Brahmaputra." Roadsides 005 (April 17, 2021): 61.

35. Ratcliffe, "Rohingya Refugees Sent to Remote Bangladeshi Island after Weeks

31. Ratcliffe, Rebecca. "Ro- Before the storm arrives, let me give you a glimpse of this land that Remote Bangladeshi Island is no more, the one swallowed up by the Brahmaputra in a single gulp and then churned into territories for "warehousing" migrants. and seasons that centred livelihoods. In their place were the floods, Much like the floating population, ground came and went with the monsoon, growing slightly more destructive with every passing year out of the magician's cloak. until, at some point, it was impossible to tell how or when the loose

As the monsoon-fed river grew wider and currents stronger, the 34. Rahman , Mirza Zu- weary inhabitants sang in hopes of soothing the water spirits.

> amay bhasaili rey amay dubaili rey akul dariyar bujhi kul nairey...

You've set me adrift You've sunk me The endless waters have no shore... 32

First, retorted Ganga and Yamuna in the Uttarakhand High Court, arguing against the muddied water that flowed in from the upper states.33 Then, when held guilty for the devastating flood, Brahmaputra voiced that someone had to pay the price for altering its course with bridges, dams, and embankments.<sup>34</sup>

Nature's pleas, drowned by the clamours of the country's infrastructural aspiration, fell on deaf ears. India dreamed of roads that ran across the sea and houses marketed as the abode of the clouds; they dug deeper to build higher and competed with one another who could be the tallest and stretch the farthest.

And so, like a magician performing their much-awaited finale,

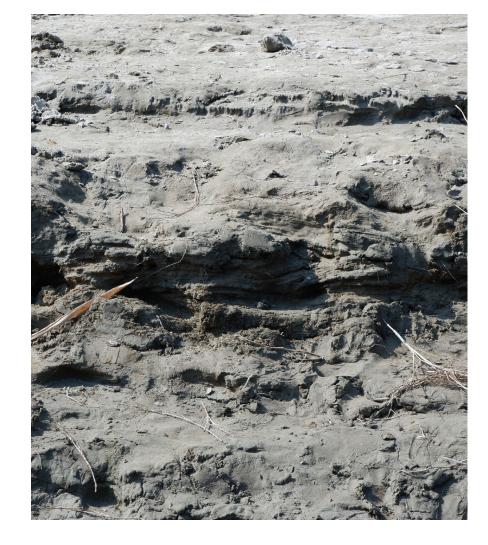
nature drew its cloak over the riverine islands. Phutt! In a disappearing act, optimism vanished along with ground that held homes droughts, earthquakes, melting glaciers, and a white dove that flew

All of a sudden, food became a matter to be securitised by nations. Price wars on food were inevitable as farmers struggled to cope with extreme weather. The banning of exports of monsoonal produce made their possession as valuable as gold. Elsewhere on the riverine islands, several resorted to moving cattle across the border and mining river beds. Those displaced by climate and unclaimed by a nation slowly became permanent residents of the lands that were no longer land.35

\*Clap\*

Wait, did you hear that?... I think the storm is approaching. Quick, we must go take shelter.





#### CHAPTER 1: THE STORMS ARRIVAL

Flood Fury Leaves High Untouched." Village Square, August 14, 2017.

37. Shagun. "Assam to Reto Counter Effects of Erratic Monsoon." Down To Earth, August 16, 2022.

guages and Imaginations of Monsoon Rains below the Eastern Himalaya."

36. Gani, Abdul. "Assam Descending from the cumulus clouds, you might notice the little Houses on River Islands shacks and bridges that sprawl over the river. This is where the storm, Bordoisila, lives. However, for now, she is unaware of the story behind her name. So we must stick with what she knows, which vist Kharif Crop Calendar is wind, water, girl. Enter wind, water, girl.

"I hate rice," Bordoisila mumbled to herself. You might say 38. Rahman, "The Lan- that this is a petty argument, but for Bordoisila this matter needed serious attention. She was not ready to hear another "You should be like music. Her ability to see the monsoon gave her a peak of the grateful for what you get beta," or "You know, at least you are not going hungry like we did" from the elders.

> At the tender age of twelve, having worked in the paddy fields and rice mills her entire life, Bordoisila could easily dissect the anatomy of rice, scientific name Oryza Sativa, distinguish its different species and get into the minute details of processing paddy. Her most valuable asset, however, was her ability to sense the monsoon. She could smell the rain days before its arrival and hear the monsoon departing as winds blew over the Western front. Her innate talent for predicting the monsoon came handy when no one seemed to understand the whims of monsoon anymore.<sup>36</sup> When rice calendars became obsolete, with a single sniff, Bordisila was able to tell the exact windows of growing rice.<sup>37</sup>

This is how Bordoisila's life came to be inextricably tied to rice for better or for worse. She felt its presence whether on the wet fields or Was Bordoisila going insane? in her courtyard with large tarps laid out for drying; to some extent, she worried she had eaten so much rice by now that the grains pulsated through her veins. Another morsel of patta or rayas, she thought, and she would transform into a sticky white ball. And now that her mother had asked her to fetch a large bag of milled rice, she knew that the only way to escape the clutches of the grain was to

She marches to the rice fortress, the dusty attic in the rice mill. As an expert in all things rice, she knows no one would be here for a while, at least not until the start of the harvest season next week. Despite all the talk of a rice insurgency still brewing in her head, the mill was one of her favourite places. She thought it was magic the way the individual parts worked together in a rhythm that sounded invisible hands working the instruments, pounding the rice to flour with the same intensity as the rain, pithaguri borokhun as they usually called it here on the chars.<sup>38</sup>

However, at the moment, having to be surrounded by her enemy number one, the towering bag of milled rice, her revolutionary vision came to a slow flicker. Now an almost failed revolutionary, she looks for the rice her mother asked for stored in the attic shelves. The final flickers of insurgency were extinguished by the whispers, not the soft and eerie sound of the wind or the gentle hum of the rain, a more husky timbre that reminded Bordoisila of her grandfather or the grinding of rice.

The words I, THE SPIRIT OF THE MILL, WANT TO TALK TO YOU BORDOISILA, reverberated through the structure.



#### CHAPTER 2: THE SPIRIT OF THE MILL

"Whoever you are, show yourself," Bordoisila asked in the stygian hollow of the corridor.

"Girl, I am right here, all around you," the raspy voice responded. "So, you are the stubborn girl who refuses to eat rice."

Bewildered, the terrified girl scans her surroundings for any miscreants fooling with her. Empty. Where is this voice coming Bordoisila's mind. "Hearing your laments about my precious rice, I from, she thought.

Bordoisila's encounter with a spectral voice may seem improbable. But to understand this farce we must go back to when the ground ded. was broken, foundations were set, bamboo skeletons were erected and later cladded. Or maybe further back to when the design of the structure was conceived, set on paper, or when the first lines were etched. That is when the spirits began to settle in the scaffoldings, the folds of the facade, and in any conceivable corner. With time they cemented their place as silent inhibitors of the mill, the ghat, the stage, and so on. As with any other sentient being, external forces set in motion the internal landscapes of the spirits. Their mercurial temperaments were only matched by the equally fluid vessels they lenge, having always coveted history. On the chars of the Brahmapuinhabited, that morphed, shifted, grew, and shrunk.

or crooked. Seasons aged them, tarnished and sagged their skin, and broke their bones. And even when time accelerated the calculus of decay the spirits stayed. You see, though the char dwellers were oblivious of their genii residents, they took care of them, they restored the collapsing structures, and maintained them in the wild \*Sniff\* \*Sniff\*... the storm has arrived. The corrugated panelling of throes of nature. In return, the spirits were the bearers: of life, death, the mills closes in. The rain has once again set Bordoisila's home in stories, and memories.

However, this moment with Bordoisila and the spirit of the mill is peculiar. After decades of silence, the spirit of the mill has decided to make itself known. For, in the distressed child, he saw a friend, a And so, the spirit read: fellow spirit of the monsoon, someone worthy to pass on the stories of the monsoon.

"I am the spirit of the rice mill," the voice responds, reading couldn't help but interrupt. You know long back this place started with rice. At least, that is what the architect imagined."

"Old spirit, go trouble someone else," the stunned child chid-

"Bordoisila, aren't you curious?" The spirit asks.

"Curious of what? What more can be said about rice?" Bordoisila asked, infuriated.

"Can be anything, the past, present, or future... Why not?"

"How far back can I go?" Bordoisila said, still not convinced. "As far back memory can take us," the spirit replied.

"Then let's start at the beginning," Bordoisila said as a chaltra, the watery past seemed to slip through the cracks, unable to be retained in porous structures. She reasoned, surely, if the spirit can Time made them bulkier, sometimes leaner, but often a bit hunched fill in the gaps of the sparse knowledge of the past, she might be able to deduce what and who to believe.

> "Well, let me think. Ahh! I know! Unruly histories, let us begin here." the spirit of the mill responded accepting the challenge.

"Well, go on," Bordoisila said.



#### CHAPTER 3: UNRULY HISTORIES

39. Samo, A., & Fatima, A.. Weather wisdom in Sindhi literature: Exploring human-nature interactions in Shah Jo Risalo. DAWN. Au-

40. Ibid. 41. Ibid.

42. Dilip Da Cunha, 'The Invention of Rivers." Harvard Graduate School of Design, February19, 2019.

43. Chowdhury, D. Lands The Chars in the Ganga-Brahmaputra Deltaic Region. In Arnold, M., Duboin, C., & Misrahi-Barak, tones in the Indian Ocean: Cultural and Literary Perspectives. Montpellier: Presses universitaires de la Méditerranée. 2022

44. Ibid., 152 -155. 45. Ibid., 152 -155

46. Chakraborty, Gorky. As sam's hinterland society and New Delhi: Akansha Publishing House, 2017, 6-9

47. Ibid.,

48. Ibid.

50. Sur, Malini. Jungle passports: Fences, mobility, and India-bangladesh border. Pennsylvania Press, 2021,

Among all the novelties experienced by the British as they colonised the Indian subcontinent, the ferocity and sheer strangeness of the monsoonal variabilities stood out as a particular concern. 39 The capricious river, flowing only seasonally, growing "abhorrent," "violent," and "hellish" with the rain, shifting its courses at a whim, seemed quite different from their conception of nature. 40 This complexity of monsoon, over time, not only began to define aspects of the tropics but also became a way of emphasising the ecological differences between South Asia and Europe. 41

and Communities in Flux: The colonists argued these conditions, acting as profound obstacles civil administration, trade, agriculture, and social life, needed control and, therefore, called for engineered tools (in the form of J. (Eds.), Borders and Eco- dams, embankments, maps, and policies) to domesticate monsoonal forces and, by extension, the unruly chars. As most things mapped or constructed, the char landscape came to be a by-product of human interventions and imaginary land-water binaries. The assertiveness of the separating line consigned an illusion of a stable surface despite the subterranean processes constantly shifting the soil composing it. Architects Anuradha Mathur and Dilip da Chuna East Bengal counterparts.<sup>50</sup> aptly put it, "Separating land and water is not just an act of division; economy in the char area. it is also an act of creation. It creates land and water from ubiquitous wetness, defining them on either side of a line."42 In spite of their geological histories and complex ecological formation, the chars as a construct, a construction, only came to exist in the 19th-century colonial archives through acts of policy making and mapping.<sup>43</sup>

citizenship at the Northeast Following John Locke's argument, only those lands which were Philadelphia: University of individually enclosed and cultivated were of value; the remaining unenclosed and uncultivated grounds were deemed wastelands.44 Binaries of wastelands and valuable lands, based on the zoning of ground resources, circumscribed new-found land under control in

British India. Enclosing these spaces for cultivation was seen as the foundation for the transition from a state of nature to nationhood and civilization. 45 The fluidity and obsolescence of the chars in Assam placed them in the problematic category of waste.

In the last decade of the 19th century, Locke's theories influenced the transfer of Muslim peasants from the neighbouring chars of East Bengal, who were said to be technically superior and hardworking, to the uncultivated wastelands in the Brahmaputra Valley in Lower Assam. 46 With their input, in exchange for meagre benefits, communication corridors, subsidised rates for travel, and revenue-free land Beyond defining productive and unproductive territories, the landgrants, the colonial administrators gradually flipped settlements in the wastelands into the granaries of the state.<sup>47</sup> Though initially, in 1891, the process of moving peasants from East Bengal was unsuccessful, in 1905, it garnered traction with the amalgamation of Assam and East Bengal into a single province. 48 In the flood-prone area, the production of cash crops, such as rice and jute, contributed to the increase in annual yield and revenue.<sup>49</sup> Phrases like "Assam Cholo," Bengali for "Let's go to Assam," became commonplace in the

The stream of landless peasants pouring from East Bengal reshaped the demographic profile of the state. Muslim as a percentage of the total population in Brahmaputra valley increased from 9.50 per cent in 1901 to 22.64 per cent in 1941.<sup>51</sup> By the late 1930s, legislative debates branded Bengali migrants as encroachers displacing indigenous Assamese citizens and existing local food producers. This period of migration constituted various pushes and pulls that either facilitated or prevented the movement of Muslim individuals from East Bengal.<sup>52</sup> For example, the Muslim League's "Grow More Food" scheme, led by Muhammad Saadulla, allowed for the largescale distribution of wastelands and the de-reservation of grazing

reserves for settling immigrants from East Bengal. Later, the scheme was criticised as the "Grow more Muslim Scheme" by indigenous communities in Assam and, in the following years, the assimilation of Muslim migrants would lead to a new category of exclusion in Assam: *natum asomia musalmans* (new Assamese Muslim).<sup>53</sup> The state and groups, such as the All Assam Student Union (AASU) in post-independent India, would come to relate the idiosyncrasies of this group to the unruliness and fluidity of the monsoonal landscape

use and ownership policies (the zamindari settlement, ryotwari settlement, and forest laws) also divided these landscapes into 'settled and savage, states of culture and states of nature, and the propertied and the propertyless.'54 Whitehead shows how the inhabitants of the wilde wastelands became subliminal "others," inheriting the precarity that defined their environment, as opposed to the superior private land and their owners.55

Sociologist Gorky Chakraborty explains that the history of chars as revenue-generating spaces is essential in understanding current politics and borderland disputes in Assam. Today, most chars along the riverine borderlands are housed by Bengali-speaking Muslims seen by mainlanders as illegal immigrants, whose presence arouses suspicion.<sup>56</sup> Furthermore, in the post-colonial landscape, smeared in saffron politics, narratives surrounding dangerous zones and illegality have resurfaced to promote a right-wing political agenda. Despite their enormous contributions to the economy, char communities and their development continue to be marginalised. This dichotomous relationship results in another fluid contingency in this context: generative-dangerous.

However, looking closer at the spatial and temporal paradoxes, the chars illuminate a horizon imbued with potential. As a subculture to the larger 'border culture', chars, as environmental borderlands, are characterised by uncertainty, vulnerability, and stealth - a grey area of legitimacy that defies fixed socio-political categories of state control. Though these classifications may exist, they are never succumbed to.<sup>57</sup> Political scientist and anthropologist James C. Scott describes this condition of liminality as the art of not being governed in a non-state space. Lives in chars demand both inclusion and recognition simultaneously, the ability to evade the gaze of control mechanisms.<sup>58</sup>

These subversive/vulnerable undercurrents make chars fracture

points in the state-making process, one evident in the omnipresence of militarised infrastructure and state surveillance. Living in these geographical peripheries, both environmental and political borderlands, the identities of char residents are constantly put into question, usually being labelled as D-voters (doubtful voters) or illegal immigrants. Moreover, as Kuntala Lahiri-Dutt and Gopa Samanta identify, the 'convoluted legalistic language of the land documents, the difficulty of proving ownership of char lands by its residents and acquiring such documents, continuation of rent payment for a lost land/eroded char, difficulty in accessing the land document officials, and, finally, establishing rights over resurfacing chars, that show how the claims over a piece of land could complicate one's claim of citizenship and nationality.<sup>59</sup> The constant flux and anxiety over the imminent loss of land make them 'some of the most desperate people in the country.'60

Over time, certain chars may gradually turn into permanent human settlements along some river courses depending on the soil properties and river currents. However, it is a permanence that can come happens if history repeats itself? undone instantly. The fluidity and uncertainty associated with char life aptly translate into a term that the choruas use themselves - the land of Allah Jaane (land of 'God knows what')—a 'no man's land' by all means.61

Bordoisila was oblivious to this identity she possessed and that, potentially, somewhere past the metal fence, she might have longlost relatives. Now that she thought about it, there was always a sense that things were left unsaid; there was always a gaping hole in the stories her grandparents recalled. Sure, they processed a slight ly different accent than hers and spoke a mixture of Assamese and Bengali, but that was common amongst the older folks. The oddest part was they never mentioned their life before 1970 - a collective amnesia, and she wondered what was the cause.

What she had heard from them were their struggles to settle in the valley, that they had moved homes often on accounts of the river submerging their land or eroding it, that they did not always have the security of food, and that it took time and labour to turn soil into paddy, then grain and, finally, a bowl of rice. But she never could have imagined that there was a time before that - when they did not move from one char to another but across countries altogether. She struggled to understand why no one told her all the times she asked them for a story from their past. She always assumed she was just Assamese, but would it make a difference to be a Bengali Muslim immigrant?

The thing is, Bordiosila's grandparents, having lived through the Assam agitation and the mass exodus, were afraid of what knowing her identity could do to her. Not to mention, her parents had struggled through the passing of the NRC. Having to scramble to prove their identity and ownership of lost land, they dismissed the idea of sharing or remembering the past. They decided their children would live in a world where they were always citizens of the country.

Perhaps the spirit of the mill, the oldest resident, was acutely aware of the anxieties that transpired in the structures, absorbing what it glimpsed and heard in passing as goods and materials were bartered and exchanged. Through the years, the records of history had been stacked high in the rice mills. However, memory had its weakness, and with every passing storm, the tower quivered and its papers frayed. If the spirit were to forget, then who is to remember what

"Would you like to know more?" the spirit asked.

"Yes," Bordoisila said, undeterred.

"Let me see what else I can remember. How about the *Monsoon Markets*?" the spirit asked.

"Now you are just speaking gibberish," Bordoisila struck back. "Ohh.. Well, let us have an open mind about what is possible and impossible." the spirit assured.

And so continued the conversation between the spirit and the

49. Chowdhury, Lands and Communities in Flux: The Chars in the Ganga-Brahmaputra Deltaic Region,

51. Chakraborty, Assam's hinterland society and economy in the char areas Gorky Chakraborty, 9

52. Ibid

53. Sur, Jungle passports: Fences, mobility, and citizenship at the Northeast India-bangladesh border, 59.

54. Whitehead, Judy. 'John Locke and the Governance of India's Landscape: The Category of Wasteland in Colonial Revenue and Forest Legislation', Economic and Political Weekly December 11, 2010, XLV (50):

55. Ibid

56. Chakraborty, Assam's hinterland society and economy in the char areas Gorky Chakraborty, 1-9.

57. Chowdhury, Lands and Communities in Flux: The Chars in the Ganga-Brahmaputra Deltaic Region, 159-162.

58. Scott, J. C. (2011). The art of not being governed: An anarchist history of upland southeast asia. Yale University Press.

59. Chowdhury, Lands and Communities in Flux: The Chars in the Ganga-Brahmaputra Deltaic Region,

60. Chowdhury, Lands and Communities in Flux: The Chars in the Ganga-Brahmaputra Deltaic Region, 40.

61. Ibid.

#### CHAPTER 4: MONSOON MARKETS

Monsoon and Markets, Brodoisila thought, were a contradiction, a mistake even on the writer's part. How could monsoon, which tore communities apart, be placed next to the market, the heart of every char, as her grandfather often said? They were opposite forces, the market and monsoon. It was common knowledge that monsoonal showers and floods rendered markets desolate. All of this made her curious about what this clearly insane spirit was about to say.

"My memory is a bit rusty. Here is what I know. The rest will be known in no time," the spirit said. And so the spirit of the mill continued...

What brought me to the markets? Well, it begins with the journeys, some by boat (baish), others by foot and road. Along their paths were the markets, or haats, where diverse groups - humans and more-than-humans, of varying genders, religions, and classes of wealth - and their things gathered to converge in myriad ways. At certain points, flows of capital and spaces of commerce simultaneously intersect with those of respite. It was here, within the small tea shops, that I conducted most of my interviews. In exchange for a cup of tea, a few potatoes, and a bit of rice or pulses, I got a glimpse into the lives of char dwellers, their everyday spatial practices resulting from socio-economic and ecological intra-actions and the contentment and anxieties of living on volatile ground. The monsoon, a silent interlocutor, a resident even, made an appearance every now and then. Interrupting mid-conversation, making itself known, and I took note of it.

The markets and the material mobilities they entail were all unique. Spatially, the objects in question occupied different market infrastructures, from machines to storage and building units. All the while, stages of the process dispersed across the river, from the banks and tributaries to the char islands, moved along through di-

vergent means and paths. Temporarily, these objects altered at every instance - some grew, aggregated and built, others degraded, reduced, and dismantled in proportions to, what I imagined, resemble monsoonal forces. While architectures of market spaces did share a clouds, Bordoisila read: material similarity that evoked frailty, they were programmed to fit the monsoonal market exchanges that flowed through them. Moving forward, I explore these spatiotemporal dimensions through three of these exchanges, with thick descriptions of four commodities, namely, jute, rice, sand, and cattle, crucial to the socio-economics of the char inhabitants.

In Jute Journeys and Rice Routines, rice and jute, described as kharif and rabi crops in agricultural calendars, make monsoonal rain and floods intelligible. Similarly, Building Sand Castles deals with the competing narratives accompanying sand mining economies - the desire for extraction and the need to prevent erosion. While extraction of sediments from the river bed fuels the growing economies of construction industries in the nearby districts and large cities, they simultaneously disrupt the hydro-geomorphological makings of the chars. In trailing the illegal cattle trades that use fog, rain and turbulence as cover, Chor, Police, and Cattle presents atmospheres as regenerating forms of architectures co-constructed by the monsoon and the affective conditioning of an aether - religious, social, political and financial. This anthology of co-created economies, both ecological and human, combine to tell polyvocal narratives of monsoonal worldings in flux.

Brodiosila was intrigued by all of this. She spent a lot of her time in the bustling markets, whenever she wasn't helping her mother on the farm. Her grandfather, too old for manual labour, was a patron of Abdul's tea shop. He spent most of his time there exchanging local gossip or daily *khabar* with the other retired folks.

Lost in thought, Bordoisila only noticed the clouds in their northward journey were carrying a message for her. Gazing at the bulbous

Ask about the journeys I enabled and the courses that I set into motion and disrupted. Ask about the jute, sand, cattle, and rice. Find out how mighty monsoon is.

And so she contended.

"The clouds tell me there is more to the *Monsoon Market*." Bordoisila demanded.

"Let the boatsman who haunts the harbour tell you all about the Jute Journeys along the Brahmaputra." the spirit replied.



## CHAPTER 5: JUTE JOURNEYS

Weather wisdom in Sindhi literature: Exploring human-nature interactions in Shah Jo Risalo. DAWN. Au-

40. Ibid. 41. Ibid.

42. Dilip Da Cunha, 'The In-Graduate School of Design, February19, 2019.

43. Chowdhury, D. Lands The Chars in the Ganga-Brahmaputra Deltaic boin, C., & Misrahi-Barak, tones in the Indian Ocean: Cultural and Literary Perspectives. Montpellier: Presses universitaires de la Méditerranée. 2022

44. Ibid., 152 -155.

46. Chakraborty, Gorky. As-

45. Ibid., 152 -155

sam's hinterland society and economy in the char area. New Delhi: Akansha Publishing House, 2017, 6-9

47. Ibid.,

48. Ibid.

50. Sur, Malini. Jungle passports: Fences, mobility, and India-bangladesh border. Pennsylvania Press, 2021,

The boatsman was once a skilled rower, a young man who had traversed the Brahmaputra in its most turbulent form. Unlike his kins, he hated unchanging ground, calm waters, and fair winds. Even the char, that tended to occupy this ambiguous state, was too still, too calm, for him. And with that, choosing a life of turbulent adventures, aboard a ship he sailed.

vention of Rivers." Harvard But now the boatsman craft, the harbour he haunted, looked much lifferent from the life he imagined. He missed the uncertainty of sailing intrepid water, in stretches that felt never-ending, where and Communities in Flux: there was a blurring of the horizon that separated the water and sky. Growing up on the char, his inclination for the water was given. Region. In Arnold, M., Du-But what was unusual, was his predisposition to navigate the trep-J. (Eds.), Borders and Eco- id waters of the Brahmaputra. Unlike Bordoisila, whose ability to sense the monsoon was a god-given gift, his internal gauge had to be trained and calibrated to the monsoon. However, it was the failure of this internal metre that made him falter during his usual midnight escapade one dry summer night when a monsoonal storm was least expected. The journey ended with a capsized boat swallowed whole by the river and articles that announced the death of an lapsing edges of the char, traders boarded and deboarded the boat

What used to be a case of the monsoon season became an everyday hazard. The legacy of the skilled boatsman of the char became a cautionary tale that mothers masked as bedtime stories to instil fear in their children who might veer into uncertain waters. As cautionary tales went, the boatman, whose prowess was taken as conceit citizenship at the Northeast (for effects of storytelling, of course), at the end was no match to the Philadelphia: University of mighty river. Bordoisila always took this message lightly.

> Though the ghost continued to put his skills into transforming the bamboo structures, all he desired was to reclaim his legacy. To set

enveloped by the Sunderban, where the unknown persisted at its extreme, he would finally restore himself as the greatest boatsman in

But now in front of him stood a girl asking about the Jute Journeys. And so he took his turn to recall pages from a long-lost memory:

One early Thursday morning, I accompanied jute traders from the edge-most chars, one cut by the fences of the India-Bangladesh border, to the weekly *haat* in the mainland. Still dark and foggy, we wait for the baishal, the boatsman, at the ghat where the boats have docked. I am told by those I accompanied that this is a weekly journey taken by many living on the chars to their goods (rice, jute, vegetables, or services) but also buy provisions for the household. For most dwellers, this is the only interaction with the mainland

Along the journey, at each ghat, situated somewhere along the colplastic chappals in one hand, along with their plies of jute, bags of rice, and chickens and goats, secured with ropes, in the other. The other passengers included daily labourers, women, children, and the boatsman who navigated the convoy through the braiding water. At every junction, the wooden boat seemed to grow more flushed, sinking a bit closer to water, inching along slowly. The precarity of the journey was only reinforced by Saleem's account of the deaths resulting from a capsized boat in the monsoon months that year. While he assures me that would not be the case around this time, it is only likely that we might get stranded in the middle of the river, which in the drier months was lower in level. But again, he assures me that it likely would not be the case since the boatsman in charge

sail downstream, across the border to the mouth of the river. Finally, is extremely skilled at traversing the waters. While for mainlanders this might be risky, for locals, like the man navigating, the course of the river was familiar territory. I am not sure how such aptitudes take shape or are tested, but rest assured.

> The Brahmaputra and its tributaries, though not always reliable as accounted by Saleem, are key features of the transportation for the char people and their goods. Boats have even become a bone of contention for the Inland Water Transport Department (IWT). Safety measures are put in place, usually involving the suspension of these farriers around periods when water levels reach above a danger level. These regulations, though necessary, restrict mobility, inadvertently resulting in landlocked chars.

BSF (Border Security Force) checkpoint, signified by an unwavering Indian flag on a five-metre bamboo pole. 'This is Indian Territory,' it signifies for those lost in the river, such as fishermen from Bangladesh (as suggested by many, illegal immigrants) who might have accidentally (as suggested by many, not so accidentally) rowed to the other side (as suggested by many, for a better quality of living). Under the make-shift corrugated shed, the security officer quickly notes the number plate of the boat. As certain passengers are inspected and have their identity cards checked, vendors selling betel nuts and peanuts make their way to the docked boats. Such are the daily practices in the borderlands where mundane movements are mixed with the question of security.

The boat, now teeming with people and goods, makes its way to the

The hour-long journey is filled with conversation, laughter and an expansive horizon accompanied by the mechanical hum of the motor as it lugs through the water. Paan, betel leaves wrapped around dry tobacco, gets distributed, chewing, red mouths, and red saliva

making the "land of the red river and blue mountains" even redder. 62 are sensitised to this shifting landscape.

Past the *ghats*, checkpoints, construction site of the bridge that will connect the north to the south bank, dredging machines and vast stretches of the river, we arrive at the port on the northern bank. The river has configured the floodplain with new silt deposits. This weekly haat takes place on these elastic boundaries, with spaces claimed for large piles of jute and hay, goat and chicken stalls, and a line of shacks leading to the inner gullies of the mainland. This vacant space, especially along the riverbanks of the Brahmaputra, will eventually disappear with the drastic expansion of the river's surface Within moments of arrival, the jute traders made their way to the during the monsoon season. These markets will no longer exist then, only to bear semblance to the lack of jute stockpiles available on the chars.

On landing, you are first and foremost met with the chaos of boats and bamboo rafts cramped in the docking area. Planks are drawn from one boat to another, to construct a makeshift bridge, until they finally touch the sandbank the market sits on. People, with their goods secured, skip from boat to boat or lung their way through the water. They move with ease and familiarity around here. They seem to have taken this route so many times that, if anything, it seems like a perfected choreography. I, on the other hand, new to this dance, struggle to make my way through the crowd - frequently sinking into mucky ground and slowed down by the sand or the occasional run-ins with loose chickens. In moments I lose sight of some of the people I was travelling with.

The market is a riot of noises and smells. It is a mixture of manure, the musty scent of jute, hot oil, and black tea - a medley that becomes more prominent with the heat of the day. Meanwhile, the clucking chickens and bleating goats compete with the vendor selling traditional medicine who is armed with a microphone. It is busy, and as people and animals hurtle around the dunes, sand is thick in the air, gradually collecting on my clothes, shoes, and hair. I must add that sand is the marker of a day spent well on the field.

However, at the moment the vendors are still setting up shop. Each vendor constructs their enclosure with the repetition and recombination of a basic module and simple interconnections. Bamboo sticks, approximately two metres long, are usually combined with laminar material, such as corrugated metal sheets and fabric. Their aggregation generates diverse yet temporal market structures that

Architect and researcher Rahul Mehrotra would add that the simplicity of this building system not only facilitates assembly, reconfiguration and disassembly on site but also a logistic channel for distributing each component.<sup>63</sup> The bamboo rafts, which are rowed like boats across the river only to be taken apart for building material, suggest architectural modulation that can be handled in the absence of heavy machinery.

sandbar with jute bundles on their heads. They skittle their way past the docked boats until they find an open space to stack their goods. The market is set up in no time and by dawn, the deconstruction is conducted with equal ease. This efficiency is reiterated in the reabsorption of the structures into the various ecologies and geographies of the region.<sup>64</sup> Eventually, the traders will return home, making the same journey back home on boat, bringing back weekly supplies and any unsold material.

Saleem says that they will continue going to the port, taking a slight- However, now alone, as Bordoisila listened carefully, she realised ly altered route depending on the river's mood, until the monsoon arrives and there will be no more market or supply. Instead, they will spend their time cultivating the fields, securing their harvest for the year to come.

Bordoisila was once again returned. The bustling *haats*, traders, and piles of jute pulverise at her feet and, as monsoonal matter often did, was washed away by the river. As the water pulled away, dragging particles of sand, the river did not have its usual convulsion that eroded land, snapped trees, and tore down houses. Up close, planetary forces appeared harmless. Yet, these casual tendencies elude us home," the cryer said, who Bordoisila suspected to be the nymph. for the larger part until at some point, in a moment of flood, when the rhythms of life are interrupted, that we lament the unsolicited presence of monsoon.

In the gradual slipping away, Bordosila took notice of the lack of control over the present. Looking down at traces around her feet, she thought that if the only way to hold time and space still was by physically trying to prevent the objects around her from moving world's incessant movement, to welcome the monsoonal forces that drew earth or mounds of sediments, or the occasional washed-up

glass bottles and the singular *chappal* that became precious artefacts 62. Assam is referred to as of the outside world, to ponder their long journeys. Ask, what drew them in? Where would they go? Say, where would I go if I were to be sucked in by these monsoonal forces?

"What happens to the sand that gets washed away?" Bordoisila asked, as her feet slowly sank into the sultry grounds.

"Might be something to ask the water nymph." the grumpy boatsman replied, awakened from what seemed like a daydream.

"Where can I find the nymph?"

"You will find her crying at the foot of the washers ghat."

Following the ghostly instruction, Bordoisila made her way towards the ghat whose structure, come early morning, would teem with the women of the chars. Carrying cloth bundles of garments and vessels that needed cleaning, they would flock to the steps and claim their space next to the water.

the storm-fed river crashing against the shore sounded much like weeping. In the sorrowful reverberations of whooshing or weeping it was hard to tell - Bordoisila was reminded of funeral moans where one heaved with passion for the loss of a loved one. She sensed, here too, a loss to be reckoned with, though she remained uncertain whether they wept for the loss of a loved one or lost land.

"Why are you crying?" Bordoisila asked, in a spur of the moment though not expecting a reply from the unknown.

"Sniff. . . Sniff. . . I am waiting for my family to come back

"Aai said she would return on the night of the Bihu." "But that is today."

"Yes. Aai said she would come home just like Bordoisila did on the night of *Bihu*."

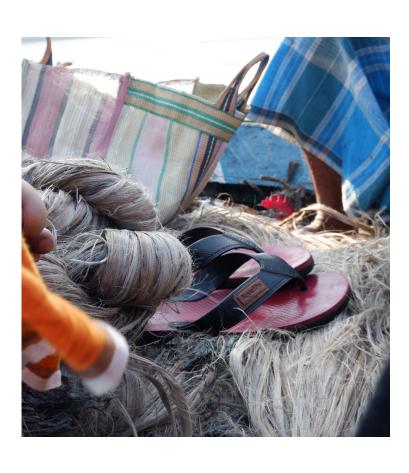
"Bordoisila?? But that's me," Bordoisila said curiously.

"Well, I mean the Bordoisila, the storm spirit. Didn't you know you were named after her?"

"No, I didn't. I hate that I don't," Bordoisila said, frustrated there was nothing to be done. The only way to live is to be lost in the as it dawned on her how little she knew about her world. One might think that there would be too little to discover or unearth in a small world like the char, that revelation requires an odyssey to a far-off

the 'land of the red river and blue mountains' because of its unique topography. The red river refers to the river Brahmaputra, and the blue hills refers to the mountains that create a mirage of blue

63. Mehrotra, R., & Vera, F. Function of Reversibility London: FunctionLab, 2013.















land, in search of a glimmer, for days, months, or years. But on this afternoon of the Bihu, Bordoisila was beginning to assemble fragments that made up this home of hers. How wonderful yet sad.

"I am not surprised children your age know much about the tales of the storm spirit."

"Can you tell me more? Who is this storm spirit?"

"Aai would tell me this story when I was younger. She said that, on the day of *Boghagali Bihu*, as Bordoisila rushed home she would bring with her wild winds and rainfall. I remember thinking how amazing it was that this young girl had the power to make leave." monsoon. Here, around the valley, she is called Bordoisila. But, you know, across the fence we call her Kalbaisakhi," Then taking a moment, the nymph rephrased "I guess, called her. No one speaks of 2019, it excluded a hundred thousand inhabitants. Amongst the the spirit that brought the monsoon anymore."

doisila pondered. "If so, what an awful name to have!"

when her grandparents looked at the newborn for the first time that in camps, leaving her all alone on this char she was supposed to call monsoon day when the rain, after months of waiting, had finally quenched the parched earth. At the stroke of monsoon, when the child's arrival was certain, they thought back to the story they were told long ago of the storm spirit. And so, as a harbinger of monsoon, on the other hand prove that we belong here," the weeping nymph Bordoisila's grandparents bestowed the child the mythical name, unbeknownst to the fact that names not only held meaning but also the mainlands use our soil to build their sand castles." conferred on their figurative powers. Many might wonder if Bordoisila, our protagonist, was simply living up to her name or if the name chose her for who she truly was. But that is a story for another day. This momentary pause is once again punctured by the whooshing of the crying river. Bordoisila, no longer just a girl, water, wind, Castles. turns to the nymph.

"Nymph, where is your family? I know everyone living here. I might know them" Bordoisila asks

"I am not too sure. They were taken away when the NRC was released in 2019. They might be here stuck in a detention camp still waiting to hear their plea from the foreign tribunal or they might have been sent back across the fence"

"Have you tried looking for them?"

"If I leave, they won't be able to find our home."

"I don't understand. Why does it all matter?"

"You see this spot over here. My home used to be here. It wasn't much but enough space for a family of four and three cows. Then the land started to erode in the 1980s, and by 1996, the whole

char had disappeared. Many families had shifted to Bongaigaon, Kokrajhar, and Darrang district and a few families went further away after losing more than ten bighas of farmland."

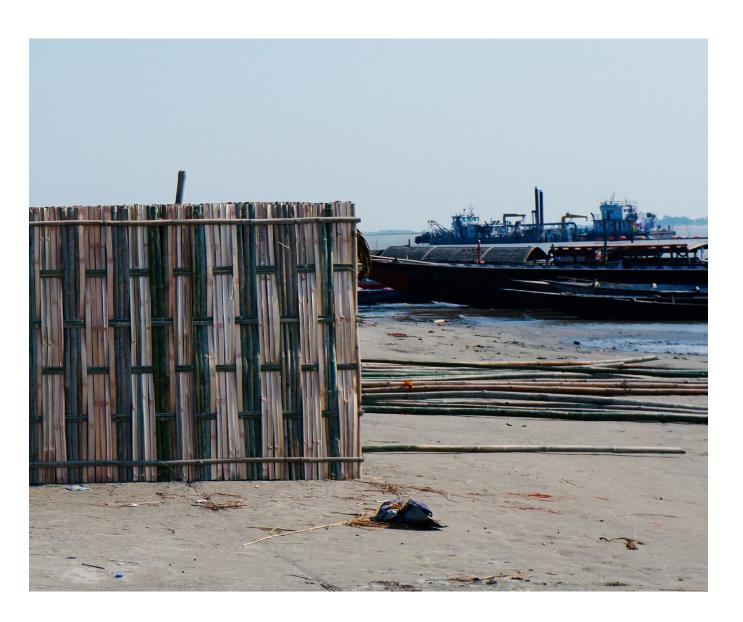
"For 30 years, even though we weren't able to grow a single grain on our land, we kept paying the khajna as the land documents and the updated tax receipts are the most important proof of our Indian citizenship. I guess I haven't left all this time so that there will be something there to prove that we belong to this land. I cannot

When the final list of the NRC was published on the 31st of July excluded, uncounted in the Indian census, was the nymph's fam-"Do I remind my family of a storm? Or the monsoon?" Bor- ily who could not prove their legacy without the land *patta*. The only recognisable name on the list was the nymph's own. Soon her "Not sure," the spirit replied. To answer this, we wind back to family had been scattered around, some deported, others detained

> "On the one hand we had to deal with the erosion banks and said. "How were we supposed to do both? All the while people in

"Can you tell me more about these sand castles?" Bordoisila

And so the nymph began to tell her about Building Sand



Jaganathan, Ananda, Weekly market on sand dunes, 2022, photograph

#### CHAPTER 6: BUILDING SAND CASTLES

"Cursed by the Rain Gods? Assam's Climate Challenge."

Animal intimacies: Intercentral Himalayas. Chicago: The University of Chicago Press, 2019, 4.

67. Ibid.

68. Jain, Rishabh. "Tradi tional Building Techniques Could Mitigate Flood Damage in Assam." Dialogue ments that will follow them. Earth, April 12, 2023.

69. THE ASSAM GA-ZETTE. Assam Minor Mineral Concession Rules, 2013. Dispur. March 16, 2013.

70. Ibid.

71. Gupta, J., & Bhimwal, K. Dams and embankmer worsen floods in Assam. The Third Pole. January 29,

72. Ibid.

The Third Pole. April 12

74. Ibid.

Allow me to set the scene with a series of images. First, interspersed between eroding shorelines are industrial dredging machines, wooden embankments, and sites of construction. Elsewhere along 66. Govindrajan, Radhika. the Brahmaputra, aggregates of sand, gravel, rocks, and boulders species relatedness in India's mined from the river make their way in trucks to nearby towns. Emptied on pavements, next to vendors selling peanuts and stuffed toys, construction brokers stock various concrete aggregates in front of signs that advertise "A CONCRETE CEMENT FOR CONCRETE CONSTRUCTION." All the while on the chars, I continue my interviews as people dwell on the disappearing terrains and the displace-

> There is an irony to these dispersed events: the construction of the urban mainlands parallels the destruction of the marginal char settlement. These are links that often go unnoticed, untraced rather, because of the extent of their dispersal and physical transformation over time. Taking this juxtaposition into consideration, this description is informed by the additions and subtractions of earthly particles into land and matter that erase and create regimes of sand economies.

73. Jain, R. Indigenous tra- It is difficult to miss the boats rowing along streams, between the to flood damage in Assam. patches of sand bars, transporting piles of soil. From afar, these activities look innocent, like an army of ants building anthills. However, on closer look, the dunes are inhabited by haulers, trucks, and separators. The lethality of the extractive infrastructure, while bearing semblance to large-scale mining machinery, is masked by their make-shift configuration and the material temporality of bamboo, wood, and fabric. Here, riverbeds and banks are mined eight months of the year, from October to May.

From decreasing extractive processes in the approaching monsoon

months as the silting of the river diminishes to complete seizure from June to September, mining permits highlight that territories of extraction and construction abide by the law of monsoonal times. As the monsoon cycle comes to a crescendo and the edge of the rivbe going. er retreats, stockpiles of sediments are shifted to godown on higher ground. It is only after the rain and floods that replenish river beds that mining activities will commence once again.

The construction sector, moreover, pervious to the sedimentary market flows, is disrupted by the slew of monsoonal challenges. Waterlogging, poor ground conditions, and safety concerns frequently interrupt building timetables, disincentivising the buying of sediments and monsoonal constructions. Meanwhile, stock brokers fall back on the stored material from the previous season, and miners, who work around the monsoonal clock, look for jobs on nearby

Given the intra-action between markets, ecology and infrastructure, the unpredictability of climate-induced rainfall and flash floods looms over sedimentary economies. 65 Escalating demands for construction have not only driven shortages and sand inequality but have also adversely affected the riverbed and water flow regime, driving human displacement and tempering with the biodiversity critical to soil structure and fertility.

It may seem frivolous and complicated to relate sediments and the infrastructures that enable their movement, that they evade, and those they, in turn, build. To this, Donna Haraway would argue if "two is too many" to describe an entity made through relations with others, then "one is also too few." 66 The multispecies ethnographer Radhika Govindrajan also reminds us that to be related to another is to be imbricated in their making even when one is indifferent to,

disgusted by, or hostile to them.<sup>67</sup> This is how I came to relate random mounds of sediments spotted along the routes of my fieldwork; I pondered where they might have come from and where they might

One such spotting, Ali and I, walking along the dirt path on a char, passed a house being assembled. Kids on their knees dug and pushed the sand into what looked like a sand castle. This was when Ali recalled how when he was younger, like the kids on their knees, he would build mounds known as kaso pithiya for his home to sit on, which the women of the family would then paint with clay from the river. When the land was inundated, the mound, like a floating hippopotamus emerging above the surface, would protect them from rising water.

Building houses on top of kaso pithiya would prevent a water-saturated soil that would weaken the foundation. Ali remembered how the receding water would create levee-like structures, enriching it with dirt and silt, making a bed ideal for gardens.<sup>68</sup> Communities sometimes build these platforms for animals to take refuge from water. The changing seasons would prompt a new coating of clay on the floor. Despite all notions of ahistoricity characterising chars, I see this continual maintenance of ground, like the layering of paint, as a relic of the flood.

Spotting sand castles, appearing as sand stacked along the mining sites, chars, and markets, quickly became a recurring activity during my excursion. They were curious lumps that would, eventually, morph into architectural elements such as kaso pithiya, floors, walls, bridges, and foundations. They suggest the transformation prowess of sediments, a geomorphic agent. Cast from mountains, dislodged into rivers and oceans, settled on floodplains, mined excessively, and transformed into spatial objects, as Lindsay Bremer describes, the passages of sediments draw attention to the dynamic entanglements between the monsoon, earthly matter, and infrastructure.

Extracted sediments from the river come under the Mines and Minerals (Development & Regulation) Act of 1957. This act gives States the power to frame rules for preventing illegal mining, transportation, and storage, the objective being to maintain a sustainable, affordable, and transparent practice.<sup>70</sup> Despite these measures, Assam's Brahmaputra Board highlights the massive imbalance in the fluvial process of the river as a result of human interventions.<sup>71</sup> Documents from 1988 to 2015 show the erosion of 798 sq. km of land, in contrast to the deposition of 208 sq. km.<sup>72</sup>

Though these imbalances can be accounted for by ambiguous mounds across mining sites, the embankments aligning such sites also prevent flows from washing away the valuable sediments. Social Scientist Mirza Zulfiqur Rahman repeatedly argues that traditional knowledge systems of flood management should have scaled up as a solution to Assam's floods from the onset.<sup>73</sup> However, nowadays, given the irreversible ecological damage done by dams and embankments, Rahman notes that the long-standing traditional methods will prove inadequate.74

The thought that sat with me since these interactions with sand was that as architects we are also producers of territorial landscapes and not just objects. Embankments, roads, bridges, and hydropower dams that layer up along the river's course, serving as macro and micro-interventions, have broader effects on the riverscapes. It resonates with the idea from the introduction that landscapes are both formations of natural and human forces.

My final note brings me back to the construction of the L&T bridge that lurked in the background of the jute journeys. In Dhubri, the construction of the L&T bridge, India's second-longest bridge, has been in progress since 2017.<sup>75</sup> In connecting the north and south bank of the Brahmaputra is another one of the macro structures that will disrupt the natural silting of the river. What are we to expect when this bridge is constructed?

Once again the dust began to settle. This time it was the river that spoke to Bordoisila:

Now, it is time to find out about the cattle that disappeared in the

"And what about the cattle?" Bordoisila asked, complying ith the river's request.

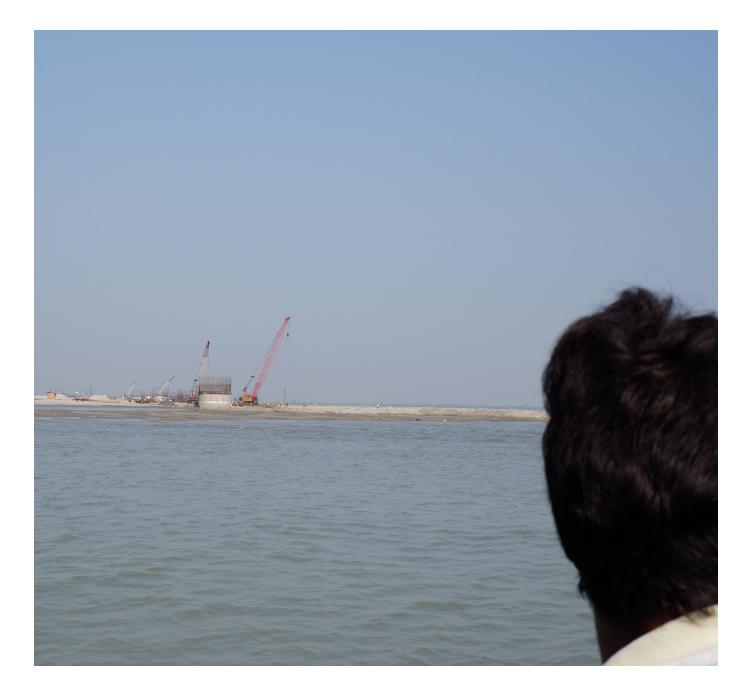
"That, the magician would know best." the nymph replied "And where do I find him?"

"I believe he still hides in the fringes of the market, only to resurface under the monsoon cover. When none is around, he takes his spectacle to the street for absolutely nobody to see. If you find him, you must beware of his trickery." the spirit warned.

As Bordoisila walked away from the ghat, she could make out the nymph had gone back to her weeping.

75. L&T bags contract to construct country's longest river bridge across Brahmaputra between dhubri & phulbari. The Economic Times. (2020, November







Jaganathan, Ananda, Constructing the river, 2022, photograph



























### CHAPTER 7: CHOR, POLICE, AND CATTLE

The Assam Cattle Preserva-Gazette. July 12, 2021

Syndicate fears over cow bill dia. July 15, 2021

78. Ghosh, Sahana. "Chor, Police and Cattle: The Political Economies of Bovine Value in the India-Bangladesh Borderlands." South Studies 42, no. 6 (November 2, 2019): 1108

79. India: Vigilante "cov protection" groups attack minorities. Human Rights Watch. (2020, October 28).

80. Ghosh, "Chor, Police and Cattle: The Political Economies of Bovine Value in the India-Bangladesh Borderlands," 1109

81. Sur, Malini. Jungle passports: Fences, mobility, and India-bangladesh border. Philadelphia: University of

82. Sur, Malini. "Time at Its Margins: Cattle Smuggling across the India-Bangladesh Border." Cultural Anthro pology 35, no. 4 (November 5, 2020).

Fences, mobility, and cit-India-bangladesh border, 70

76. Government of Assam. Long back, when the magicians' trade began to lose appeal amongst of movement and thermal sensors hidden in paddy fields, to curb tion Bill, 2021. The Assam people enchanted by fabulous contortionists and speaking monkeys, clandestine cattle movements. To quote from the social anthropolothe magic man was forced to take his tricks elsewhere. With a sleight gist Sahana Ghosh's fieldwork: "Hum BSF nahin, CSF hain! We are 77. Zaman, R. Lynching, of hand, he would vanish the cattle under a cape of monsoon clouds not the BSF, we are the CSF! Cattle—Security—Force."78 in assam. The Times of In- or cast shapeshifting spells, transforming cows into goats, until they safely crossed the metal fence.

Then one day, when the vigilantes and border patrols caught wind of the vanishing cattle, the magic man came to be known as a want-Asia: Journal of South Asian ed man. Now a fugitive, he withdrew from the world. When there were no signs of him and the monsoon, an accomplice who swept all traces of his crimes, the only logical answer was that the magic man had performed a vanishing act. However, here he was all along, ensconced in the bamboo structures he controlled with that very sleight of hand that worked the cattle circuit.

> "Please tell me what happened to the cattle market magic man!," Bordoisila asked the magic man.

"It will require a bit of magic to show you the Chor, Police citizenship at the Northeast and Cattle." the man replied.

Pennsylvania Press, 2021, In 2021, the Assam Cattle Preservation Bill set "to provide for the preservation of cattle by regulating their slaughter, consumption, illegal transportation," making the export of live cows and bulls and beef consumption a politically volatile issue.<sup>76</sup> Months following the bill, several of the cattle markets for slaughter were either permanently closed or moved underground.<sup>77</sup> The elusive markets, which made their way in whispered discussions and bashful news reports izenship at the Northeast of seizures, came to my attention during my fieldwork in the borderland chars on two occasions. Firstly, news on the shooting of an inhabitant by the BSF for cattle smuggling circulated the char. Secondly, the BSF parading the efforts taken, with vague explanations

Since 2014, under the Bharatiya Janata Party (BJP), a Hindu nationalist government, cow protection policies preventing cattle trade have amplified the anxious orchestration of cattle movement across the borderland chars. 79 Despite the shocking rise of cow vigilantes and caste violence, these flows are not foreclosed, allowing India to continue as a leading exporter of carabeef, buffalo meat.80

Like most in India, I had been acutely aware of gaumata, mother cow, in the Hindu religion, with the symbol proliferating in promoting Hindu nationalism in recent years. Conversely, in the case of Bangladesh, with a Muslim majority, cattle is viewed as a valuable economic material.<sup>81</sup> Ageing bovines from India have formed part of a steady flow of cattle into Bangladesh to meet market demands. Cattle primarily from the northern Indian states - Haryana, Punjab, Uttar Pradesh, Rajasthan, and Uttarakhand - are transported across state borders to cattle *haats* in borderland regions. Highly organised networks that are rich in both political and financial capital arrange such journeys across the country, circumventing the legal fabric of

The chars became important nodes in these bovine movements across the border, shifting cattle from legally immobile commodities to highly mobile ones.<sup>82</sup> Ecologically, the border chars in Assam and Bangladesh make for slippery territories. Residents laboriously reclaim the wetlands for cultivation and settlement, however, the returns from both agriculture and wages from seasonal employment prove meagre. Malini Sur introduces us to the alternative, an illicit but legal economy, commonly invoked as fang-fung on borderland chars. This expression of *fang-fung* is rooted in the local patronage of riverine terrains, their cycles, times, spaces, and the insularity of the border, justifying a crossing otherwise considered illegal. Anthropologist Janet Roitman foregrounds how cross-border commerce are claim of economic citizenship from the margins of states, where people innovatively reorder geographic and economic boundaries. Thereby, blurring the lines between legality and illegal-

Fang-fung reframes the ecological fragmentation of the chars from a debilitating condition to a geographical fuzziness that is economically productive. The slipperiness of these terrains allows villagers to smuggle goods across the border while evading state gaze. In these areas, Indians and Bangladeshis share a predicament of being *nodi* bhanga manush, people whose lives and struggles are formed with the mercurial river.84

Smugglers crossing the borders operate through the distinct registers of the monsoon. In another section, Ghosh writes of a conversation with a BSF officer:

Even now, every night that it rains, these smugglers try all kinds of ways to send the cattle floating down this stream and then get them across the fence. When it is raining so hard you can hardly keep your eyes open—we have to be out on nights like these running after cattle.85

Indian bovines "flowing into Bangladesh" across the border imbue fang-fung economies with a monsoonal lexicon. Similar to debates on illegal immigrants to India, the language evident in police and news reports bears images of flows and floods, attributing influxes

in cattle movement to monsoon times, as traders enforce the volumetric capacity of the monsoon rain, river and clouds as covers to navigate the securitised paths. Monsoonal time is a resource that cattle smugglers closely follow in disjuncture with the timescale of the nation-state.

I think back to the jute traders and how the rushed, stealthy movements of the smugglers compare to the mundaneness of transporting jute. What binds these two market flows is their familiarity with the local landscape and monsoonal registers equivalent to a guide or divinatory tactician. Spatial anthropologist Les Roberts calls these two performative roles, standing at two ends of the spectrum, the master of ceremonies and trickster. 86 On the one hand, the master of ceremonies acts as a kind of 'ritual elder', guiding and shepherding the initiates safely through the liminal zone.<sup>87</sup> On the other hand, the trickster is a figure who exploits the vagueness of the region, interpreting loopholes in ways that may be beneficial but also evaded altogether.88

As a way of introspection, the storm clouds listened in on spirits speaking, marvelling at their grip on society. At any moment, they would depart, and the floods would subside, leaving behind a dry spell for some season to come. But there was one last chapter, referred to as *Rice Routines*, to be told. Being the subject and drive ing force of these narratives, the clouds were fully aware of how this chapter went.

However, Bordoisila, slowly released from the suspension of storytelling, notices it is already dawn, long past when her mother expected a bag of rice. Riceless, what was she to tell her furious mother? That unexpected circumstance had led her to the spirits inhabiting the bamboo structures? Or more absurd, that talking architecture revealed to her a past that she had not lived? All explanations were doomed to fail against a mother with no rice to offer the deities or serve delicacies during the Bihu festivities.

On the char, they had to contend with what Bihu meant as it fell out of sync with the monsoonal clock. The growing of rice and Bihu, which fell at different periods of transition, once represented the cyclical rhythms of rural life, where time never seemed to be heading anywhere but was always circling, returning, and repeating. Were these still to be considered a marker of time and date? Could the synchronisation of time, season, everyday ritual, and event still

be conceivable? Since rewinding the monsoonal clock was unimaginable, routines and rituals were reset according to the odd fluctuations of rain and river. Despite the festivals being some of Bordoisila's favourite moments, they tended to slip notice or fumble her grasp on time.

"Much like the foolish dragonfly that never left the pond," the magic man said, reading Bordoisila's thoughts.

"I have never heard of the dragonfly," Bordoisila said. The dragonflies were exothermic beings, scientific name Pantala flavescens, but more aptly called globe skimmers, that had slowly disappeared with the erratic monsoon. It came to the spirit as no surprise that Bordoisila was unaware that this species that flew grew great distances chasing the monsoon winds from East Africa to Southeast Asia.

ularly the farmers, the disappearance of the dwindling insects was a lamp lighting on the fields. sudden and intense reckoning of the climatic changes. They would observe the habits of dragonflies to know when it will rain or where there will be sunshine. People explained that an abundance of dragonflies in the month of *Asar* (mid-June to mid-August), indicates that flood will hit that year.

The dragonflies thrived in the monsoon puddles. Eventually, when the wetlands dried, they never came back to the chars. However, the foolish one who was left behind, moved into the bamboo structures, be its spirit still waiting for a sign to take flight and leave for its journey east to seek out the buoyant area over the world's oceans where the northeast and southeast trade winds converge. And so it waited and

On days of *Bihu*, when the lamps are lit, thinking the flickering flames are the gossamer wings of its kind, the foolish dragonfly calls out to ask if it is time to leave. It takes the silence from the flame as its response to stay put. When the light fades, the fool realises it has once again been abandoned by its kin and the farmers who cherished the dragonflies.

Time has flown by and by the time Bordoisila returned home, her

mother was worried and furious.

"Where have you been Bordoisila?" Bordoisila's mother

"I was going to get the rice from the mill but I lost track of time," Bordoisila replied.

"I don't see no bag of rice with you"

"About that, I might have forgotten. I am sorry Aai."

"So you're telling me that not only are you late but you also forgot to bring the rice. Bordoisila, what am I supposed to do now? We are all supposed to pitch in. It doesn't look good if we go empty-handed."

"I am sorry Aai."

"I am really disappointed in you."

"You just wouldn't believe what happened," Bordoisial said, storming off into the misty night.

For some, the disappearance went unnoticed. But for others, partic-Bordosila walks along the bridge. She can see the preparation for the

"Why are you sad?" a nimble voice says.

"Who are you?" Bordoisila asks.

"I am the Dragonfly"

"I have heard of you"

"So now why are you sad?"

"Just got into trouble with Aai."

"Today we celebrate. Not an occasion to sulk. I for one will visited by my kins today and I will finally be leaving to travel east," the Dragonfly says excitedly.

Truly, a foolish spirit, Bordoisila thinks knowing the story of the spirit. Not wanting to pry, she instead asks about the remaining chapter from the collection the spirits of the bamboo structure held.

"Do you know anything about the *Rice Routines* spirit?"

"Why, of course, I do." the spirit replied with enthusiasm. "I was once even a close friend with this paddy farmer. So let me tell you about it before it is time for me to leave."

And so the foolish dragonfly began to narrate the Rice Routines impatiently...

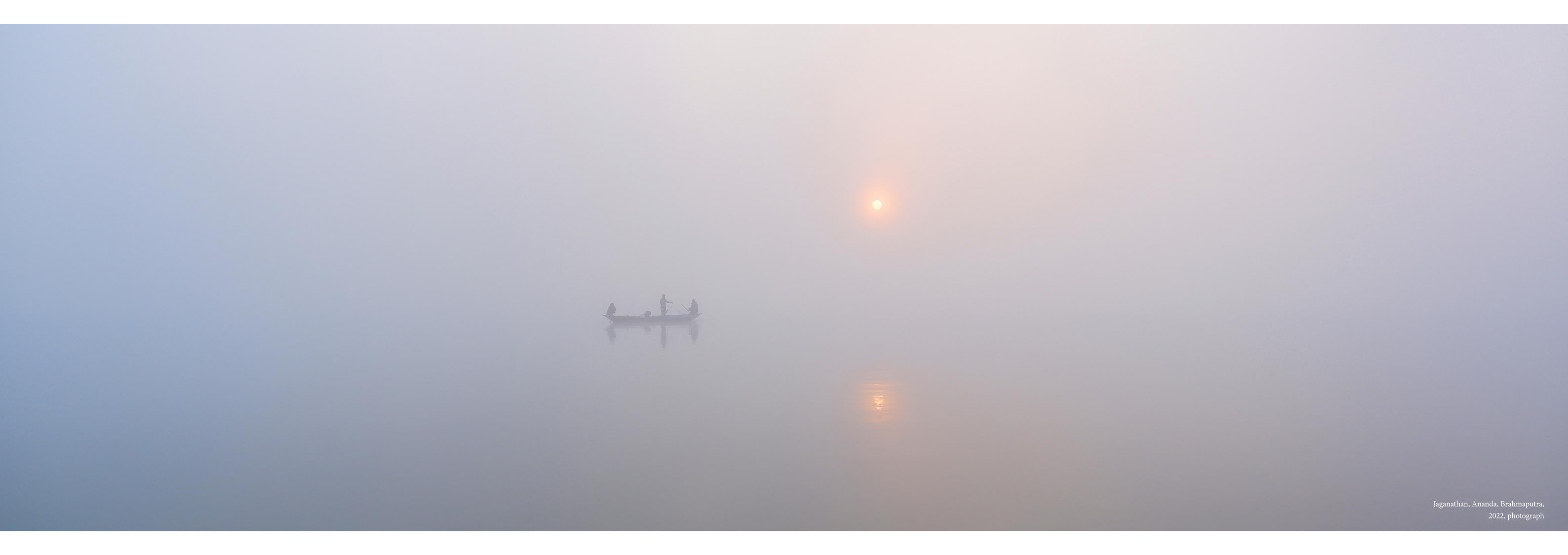
84. Sur, "Time at Its Margins: Cattle Smuggling across the India-Bangladesh

85. Ghosh, "Chor, Police and Cattle: The Political Economies of Bovine Value in the India-Bangladesh Borderlands," 1108 -1109

86. Roberts, L. Inhabiting The Edge: Tricksterism And Radical Liminality. The Double Negative. February

87. Ibid.

88. Ibid.









Jaganathan, Ananda, Fog over the Brahmaputra, 2022, photograph









#### CHAPTER 8: RICE ROUTINES

90. Ibid.

91. Ibid.

92. Ibid.

89. Assam State Portal, Fairs Out of all the photos I carried back with me, the image of rice drying on the hot tarmac along the metal fence stood out to me. That instance, as jeeps ran over the blue tarp and a bird, maybe, knocked a few grains from the pile, disrupting the raked patterns of rice, framed my understanding of the border's function. Apart from separating, securitising, and demarcating, borders are negotiated into daily spatial practices.

> This link between border and rice was evident in literature studies that associated cultivating rice at different historical junctures with acts of territorialising a shifting landscape. Between 1930 and 1970, anti-colonial politics and early postcolonial border dynamics transformed the shifting marshes of British provincial Bengal and Assam into nationalised military zones. In the separatist climate, peasants from East Pakistan and India battled over rice fields, raiding each other's granaries to claim the other's territories. All the while, ephemeral landscapes and agrarian extractions escalated the demand for rice as food.

And so, I start at the fence, where barbed wires stretch north and south of the Brahmaputra, harbouring histories of rice. Beyond them are the paddy fields shared by both nations. In 2017, the government of India began the construction of a multi-layered fence as questions of illegal migration across the border became even more pervasive. The new fence sought to replace the earlier boundary that bamboo or cane slips, are used for preserving paddy. This reserve comprised old fence-like structures. Other editions in some stretches included bamboo signposts with plastic flags marking the international boundary.

However, the ma(r)king of the borderline, the Radcliffe line, came long before the physical structure. More precisely, it was drawn in 1947 with the partition of the Indian subcontinent into India and

Pakistan. This official international border exists within this in-between zone, demarcated by concrete pillars (more like stubs) placed 1km away from each other in patchy grassland that people nonchalantly work around. Amidst monsoonal forces, a flowing river that is impossible to quell, and changing tides that toppled demarcations outposts, and frayed fences, the border remains a staggered object under perennial construction. This porosity of this incomplete border, on one hand, is cloaked in fear and, on the other, renders a fleeting quality, a sense of instability.

I followed Shareea, a char dweller in Montrichar, and her family of six (husband, three kids, and two cows) one morning. Usually, her daily chores would prompt her to cross the border, where she would work on the family fields. The gates of the fences would open every day from 7 a.m. to 5 p.m. Passing through would call for a series of inspections, frisking, and documentation of who and what is crossing the fence by the BSF.

Shareea explained how in November, either winter rice, sali, (more commonly known in India as rabi) is sown and summer rice, boro, (more commonly known in India as kharif) is harvested. In the intermediate months, the family resorts to the surplus of the last harvest, stored in large baskets called *duli* or *dukula* in their homes. The duli or tali, containers made by weaving together flat and flexible stockpile not only feeds the family over the monsoon months but also provides a small income from selling in the local markets and to mainland brokers.

For now, the paddy had just been harvested, dried on the tarmac and brought back home to be separated and dehusked. Women from the vicinity gather under the tree outside Shareea's home in the served with *chira* or flattened rice, *akhoi* or puffed rice highlight the

afternoon to help with the cleaning.

Under the shade, the rice is tossed in a *kula*, a bamboo plate, to loosen the outer cover around the grain. As the women engage in conversation around the rice spread on the bamboo mat, dhari, and blue tarp, they sort the husk from the grain. Such interactions are causal occurrences on the chars. To think of the production of rice in the borderlands is also to think about making everyday networks and seasonal interactions.

Perhaps the most distinctive of these interactions is the *Bihu* festival. The religious rituals and processions that coincide with the idiosyncratic phases in the farming calendar are instances where social and religious rituals overlap with the growing of rice. Bihu occurs at three different times of the year, each referring to a specific moment in the making of rice. The first of these celebrations, in the month of Bohag (Baisakh, the middle of April), called Bohag Bihu marks the New Year at the advent of seeding time. In the month of *Kati* (Kartik, the middle of October), the Kati Bihu marks the completion of sowing the paddy fields.89 Finally, there is the Magh Bihu, in the month of Magh (the middle of January), marking the end of the harvesting season.<sup>90</sup> Even the songs and dances of Bihu closely link ideas of agricultural prosperity, the transition of seasons, and the mode of living in a rice-growing society in tropical floodplains.<sup>91</sup>

The Magh Bihu, or Bhogali Bihu, is quintessentially the festival of food. Temporary structures accommodate the expanding program of the festival. 92 Feasts around a bonfire on the eve of the festival are followed by bathing rituals and the burning of the Meji, a large bamboo structure. The burning *Meji*, symbolic of the Holy Fire, is prayed to by offering maah khorai and pithas. The traditional feasts *Kati Bihu*, unlike the other *Bihu*, is not a festival of merriment. It is also called *Kongali Bihu*, where kongal translates to poor, signifying a period of limited agricultural output. 94 To safeguard the future crop, in the *Kati* month, farmers light akash bantis or sky lamps in the paddy fields.95 The earthen lamps lifted on bamboo poles attract

insects and pests, keeping the crops healthy. While the tulsi bantis,

around basil plants, are offered prayers for a bountiful harvest.<sup>96</sup>

native rice, Bora Saul and Kumol Saul.93

While Shareea's family was fortunate with their harvest for the year, several farmers experienced extreme losses resulting from the monsoon floods or eroding land. Some farmers, who also cultivated kharif crops (summer crops), recount fields washed away by flash floods from July to September. In most cases, the jute and paddy carried away left no surplus for sale or barely enough for daily consumption. Other labourers blame the untimely monsoon rain, either fore leaving she said, "I need to tell you something." extended or delayed over long periods, preventing proper preparation or drying of soil.

Situations, as noted, have resulted in many old varieties of rice disappearing - as farmers replace older ones (Ahu and Eri Dhan) with hybrid varieties. 97 Additionally, the unreliable monsoon puts pressure on the rabi crops, resulting in speculative rice markets. The loss of rice can not only be measured in terms of capital but also in the social repercussions, in the negated communal interactions.

The disappearing cultivable land ("productive land" as deemed in an earlier chapter) also impinges on the identity of the char dwellers, which has historically been rooted in agrarian culture. As Shalim Hussain puts it, "The idea of identity for the Miyah [another name for migrant Bengali Muslims, usually under a derogatory context] is more attached to the land you can farm, not the land where you have a house. If the cultivable land is eroded or goes underwater, weather, manifested as market-oriented transformations of the agrarian economies, has led to various kinds of ethnic fissures and political violence around the question of land in the Brahmaputra

By the time the dragonfly was done narrating the *Rice Routines*, it was nightfall and the lights were being raised in the paddy fields. The clouds had departed leaving behind the sultry scent of parched

earth. As Bordoisila sensing the mood of the monsoon air knew that the prayers of the night would be answered. There lingered in the air the uncanny scent of goodbye, the clouds' way of saying that they won't be back for a while. The crops would survive and they wouldn't have hungry life for another year. They had managed to survive another year of uncertainty.

"Look there, you can see the other dragonflies. This time I will leave. I can feel it." the spirit said excitedly, noticing the lights that fled the sky. As the two, the tangible and the intangible, waited in the silence, Bordoisila contended if she should tell the spirit the truth. She felt that with all that she had learned today, the least she could do was foolish dragonfly the truth. The lamps continued to shine light but there was no sign of any creature calling.

It was time for Bordoisila to head back and join her family. But be-

"Yes, what is it?" the foolish dragonfly asked. Bordoisila waited for a second before saying "Thank you."

When she read the words, the letters and images leapt from the page, spun her around, and transported her to another world. From the very beginning, as she made her way to the ports that early winter morning, she realised she had morphed into the eyes of the

At first, she was no more than a tourist, a child peering through the peepholes of a time machine. But as she moved through space and time, the connections to her homeland were inevitable; she picked up on the paved roads built by the BSF that were still there and the buildings that had disappeared. She took note of the bridge under construction, which in her time would be a bone of contention amongst the char communities. It will go on to become one of how do you survive?" Over the years, it has been noted how extreme the perpetrators of the eroding banks. Turning over the pages, she cruised in summer, winter, and monsoon landscapes, indulging in the steady transformation that would eventually cease to exist.

> Despite all the excitement, she saw this world with reticent eyes, not to give away envy for what was there or sadness for what was to come. Unaware of what her home used to be, she sensed at some point myth had turned into reality and reality into myth.

93. Ibid.

94. Ibid.

95. Barua, M. (2009). Ecological basis of the bihu festival of assam. Folklore, 120(2), 213-223.

96. Ibid.

97. Torgalkar , V. (2021, March 5). Climate change turned residents of Assam's char villages solely dependent on summer crop.















#### BIBLIOGRAPHY

Assam State Portal. Fairs and festivals: Assam State Portal. Assam State Portal. https://assam.gov.in/about-us/399

Barnard Center for Research on Women. "Karen Barad: Undoing the Future." YouTube, July 20, 2018. https://www.youtube.com/ watch?v=bMVkg5UiRog.

Barua, Maan. "Ecological Basis of the Bihu Festival of Assam." Folklore 120, no. 2 (August 2009): 213–23. https://doi. org/10.1080/00155870902969400.

Bremner, Lindsay, and Harshavardhan Bhat. "The Air of the Monsoon: In Myth, Pause and Story." Essay. In Monsoon as Method: Assembling Monsoonal Multiplicities. New York: Actar Publishing,

Bremner, Lindsay. Monsoon as method: Assembling monsoonal multiplicities. New York: ACTAR, 2022.

Chakraborty, Gorky. Assam's hinterland society and economy in the char areas Gorky Chakraborty. New Delhi: Akansha Publishing House, 2017.

Chowdhury, D. 2020. Lands and Communities in Flux: The Chars in the Ganga-Brahmaputra Deltaic Region. In Arnold, M., Duboin, C., & Misrahi-Barak, J. (Eds.), Borders and Ecotones in the Indian Ocean: Cultural and Literary Perspectives. Montpellier: Presses universitaires de la Méditerranée. doi:10.4000/books.pulm.6812

Frichot, Hélène, and Naomi Stead. Writing architectures: FIC-TO-critical approaches. London: Bloomsbury Publishing PLC, 2022. norities

Gani, Abdul. "Assam Flood Fury Leaves High Houses on River Islands Untouched." Village Square, August 14, 2017. https://www. villagesquare.in/assam-flood-fury-leaves-high-houses-river-islandsuntouched/.

Ghosh, Sahana. "Chor, Police and Cattle: The Political Economies of Bovine Value in the India-Bangladesh Borderlands." South Asia: Journal of South Asian Studies 42, no. 6 (November 2, 2019): 1108-24. https://doi.org/10.1080/00856401.2019.1672926.

| Water Resources | Government Of Assam, India. (n.d.). https:// waterresources.assam.gov.in/portlet-innerpage/brahmaputra-riv-

Government of Assam. The Assam Cattle Preservation Bill, 2021 The Assam Gazette. July 12, 2021 https://ghconline.gov.in/General/ Notification-12-07-2021-1.pdf

Govindrajan, Radhika. Animal intimacies: Interspecies relatedness in India's central Himalayas. Chicago: The University of Chicago Press, 2019.

Gupta, J., & Bhimwal, K. Dams and embankments worsen floods in Assam. The Third Pole. January 29, 2021 https://www.thethirdpole. net/en/climate/dams-and-embankments-worsen-floods-in-assam/

India: Vigilante "cow protection" groups attack minorities. Human Rights Watch. February 18, 2019. https://www.hrw.org/ news/2019/02/19/india-vigilante-cow-protection-groups-attack-miJain, R. Indigenous traditions could offer solutions to flood damage in Assam. The Third Pole. April 12, 2023. https://www. thethirdpole.net/en/livelihoods/indigenous-traditions-offer-solutions-flood-damage-assam/

Jain, Rishabh. "Traditional Building Techniques Could Mitigate Flood Damage in Assam." Dialogue Earth, April 12, 2023. https:// www.thethirdpole.net/en/livelihoods/indigenous-traditions-offer-solutions-flood-damage-assam/.

Government of Assam Water Resources. Brahmaputra River System Kirksey, Eben, and Donna J. Haraway. "SPECULATIVE FABULA-TIONS FOR TECHNOCULTURE'S GENERATIONS: TAKING CARE OF UNEXPECTED COUNTRY." Essay. In The Multispecies Salon. Durham: Duke University Press, 2014.

> L&T bags contract to construct country's longest river bridge across Brahmaputra between dhubri & phulbari. The Economic Times. November 25, 2020 https://economictimes.indiatimes.com/industry/indl-goods/svs/construction/lt-bags-contract-to-constructcountrys-longest-river-bridge-across-brahmaputra-between-dhubri-phulbari/articleshow/79407282.cms?from=mdr

> Lahiri-Dutt, Kuntala, and Gopa Samanta. Dancing with the river: People and life on the chars of south asia. New Haven, CT: Yale University Press, 2013.

LOENHART, KLAUS. Breathe. BIRKHAUSER, 2017.

Mahanty, Sango. Unsettled frontiers: Market formation in the Cambodia-vietnam borderlands. Ithaca New York: Southeast Asia Program Publications, an imprint of Cornell University Press, 2022. Mehrotra, R., & Vera, F. Function of Reversibility. London: FunctionLab, 2013. https://www.farshidmoussavi.com/wp-content/uploads/2014/06/720\_Reversibility.pdf

Person. "Rice Crops Are Being Threatened by El Nino after Grain Supplies Were Disrupted by the War in Ukraine." Arab News, July 14, 2023. https://arab.news/vps7n.

Rahman, Mirza Zulfiqur, and Edward Kieran Boyle. "Infrastructure as Archive: Recording the State's Materiality along the Brahmaputra." Roadsides 005 (April 17, 2021): 61. https://doi.org/10.26034/ roadsides-202100509.

Rahman, Mirza Zulfiqur. "The Languages and Imaginations of Monsoon Rains below the Eastern Himalaya." Australian Himalaya Research Network, October 29, 2020. https://aushimalaya.net/2020/10/29/the-languages-and-imaginations-of-monsoon-rains-below-the-eastern-himalaya/.

Ratcliffe, Rebecca. "Rohingya Refugees Sent to Remote Bangladeshi Island after Weeks at Sea." The Guardian, May 3, 2020. https://www. theguardian.com/world/2020/may/03/rohingya-refugees-sent-remote-bangladesh-island-after-weeks-at-sea.

Ratcliffe, Rebecca. "Rohingya Refugees Sent to Remote Bangladeshi Island after Weeks at Sea." The Guardian, May 3, 2020. https://www. theguardian.com/world/2020/may/03/rohingya-refugees-sent-remote-bangladesh-island-after-weeks-at-sea.

Roberts, L. (2016, February 17). Inhabiting The Edge: Tricksterism And Radical Liminality. The Double Negative. February 17, 2016. http://www.thedoublenegative.co.uk/2016/02/inhabiting-the-edge-tricksterism-and-radical-liminality/

Samo, A., & Fatima, A., Weather wisdom in Sindhi literature: Exploring human-nature interactions in Shah Jo Risalo. DAWN August 5, 2022. https://www.dawn.com/news/1700675

Sarma, Anirban. "Cursed by the Rain Gods? Assam's Climate Challenge." ORF. Accessed October 7, 2023. https://www.orfonline.org/ expert-speak/cursed-by-the-rain-gods-assams-climate-challenge/

Scott, James C. The art of not being governed: An anarchist history

of upland southeast asia. New Haven, Conn: Yale University Press,

Sen, Sudipta. "Of Holy Rivers and Human Rights: Protecting the Ganges by Law." Yale University Press, April 12, 2022. https://yalebooks.yale.edu/2019/04/25/of-holy-rivers-and-human-rights-protecting-the-ganges-by-law/.

Shagun. "Assam to Revist Kharif Crop Calendar to Counter Effects of Erratic Monsoon." Down To Earth, August 16, 2022. https://www. downtoearth.org.in/news/agriculture/assam-to-revist-kharif-cropcalendar-to-counter-effects-of-erratic-monsoon-84335.

Siddiqi, Anooradha Iyer. Architecture of migration the Dadaab refugee camps and Humanitarian Settlement, October 10, 2022. https:// wiser.wits.ac.za/system/files/seminar/Siddiqi2022.pdf.

Sur, Malini. Jungle passports: Fences, mobility, and citizenship at the Northeast India-bangladesh border. Philadelphia: University of Pennsylvania Press, 2021.

Sur, Malini. "Time at Its Margins: Cattle Smuggling across the India-Bangladesh Border." Cultural Anthropology 35, no. 4 (November 5, 2020). https://doi.org/10.14506/ca35.4.03.

THE ASSAM GAZETTE. Assam Minor Mineral Concession Rules. 2013. Dispur. March 16, 2013. chrome-extension://efaidnbmnnnibpcajpcglclefindmkaj/https://dgm.assam.gov.in/sites/default/files/ swf\_utility\_folder/departments/dgm\_medhassu\_in\_oid\_4/portlet/ level\_1/files/assam\_minor\_mineral\_concession\_rules.\_2013\_ammcr\_2013.pdf

Torgalkar, V.. Climate change turned residents of Assam's char villages solely dependent on summer crop. NewsClick. March 5,2021 https://www.newsclick.in/Climate-Change-Turned-Residents-Assam-Char-Villages-Solely-Dependent-Summer-Crop

Uddin, Jasim. You've set me adrift. Bengal, 1904.

WHITEHEAD, JUDY. "John Locke and the Governance of India's Landscape: The Category of Wasteland in Colonial Revenue and Forest Legislation." Economic and Political Weekly 45, no. 50 (2010): 83–93. http://www.jstor.org/stable/25764218.

Zaman, R. Lynching, Syndicate fears over cow bill in assam. The Times of India. July 15, 2021 https://timesofindia.indiatimes.com/ city/guwahati/lynching-syndicate-fears-over-cow-bill-in-assam/articleshow/84433781.cms

