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The Genocide-Ecocide Nexus in Sudan: Violent “Development” and the Racial-Spatial Dynamics of (Neo)Colonial-Capitalist Extraction

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ABSTRACT

This article works with and develops the framework of the genocide-ecocide nexus to examine the relationship between environmental destruction, capitalist expansion, and genocide in Sudan. Arguing that they are more fundamentally interconnected than has tended to be recognized, it discusses how multiple rural, primarily subsistence and place-based communities on Sudan’s exploited peripheral regions have been affected by these dynamics over several decades, especially from the 1970s. To demonstrate this, three domains of ecologically destructive extraction are examined: large-scale mechanized agriculture, exploitation of water resources, and oil extraction. These cases, the article contends, show how genocide in Sudan is constitutively intertwined with racialized and class-based “development”-driven ecological destruction in ways that are direct and indirect, short-term and long-term – but always systemically related to (neo)colonial-capitalist extraction. Theoretically, the article builds on existing frameworks on the genocide-ecocide nexus. It also expands these frameworks by emphasizing, firstly, the inherently racialized dynamics of these processes in Sudan, and secondly, the devastating fragmentation of socioecological worlds brought about by the expanding frontier of violent development. The analysis highlights blind-spots and limitations with a number of other accounts of genocide in Sudan, including those which frame it as an issue of ideology or identity-based intercommunal tensions, and those which explain it as a form of counterinsurgency.

KEYWORDS

Sudan; genocide; ecological harms; genocide-ecocide nexus; colonialism; capitalism; race; extractive development

Introduction

What is the relationship between genocide and ecological issues in Sudan? Prominent recent accounts have tended to address this question by focussing, to the exclusion of the rest of Sudan, on the specific case of Darfur, 2003–5. A huge region in western Sudan, Darfur became the subject of substantial international attention from 2003 in the context of a brutal state-militia “counterinsurgency” campaign against local civilian communities

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following an attack by Darfuri rebel groups¹ on government garrisons in central Darfur. Some traced the ultimate roots of conflict in the region to ecological factors and in particular to global climate change. It was declared the “first modern climate-change conflict,”² and has been argued to provide “paradigm-defining evidence of our looming future of climate change-induced conflicts.”³ Jeffrey Sachs declared that Darfur “at its core, is a conflict of insufficient rainfall”⁴; and Ban Ki-Moon stated in 2007 that the crisis in Darfur originated in an “ecological crisis” produced by a combination of climate change and drought.⁵

Commentators making these kinds of arguments were evidently not troubled by the fact that the Government of Sudan – the central architect of what many deemed extreme genocidal violence in Darfur – has itself promoted similar “environment-conflict” narratives, claiming that conflict there was primarily a product of environmental problems precipitating local inter-tribal struggles over land and water resources. Moreover, as a number of more critical and nuanced accounts have argued, the relationship between conflict and environmental issues in Sudan is far from straightforward.⁶ This article contributes to these more critical perspectives by similarly problematizing simplistic and apolitical eco-reductive forms of explanation. It takes a different approach by working with the political economy-attuned conceptual lens of the “genocide-ecocide nexus.” Moving beyond the tendency to focus narrowly on the case of Darfur (2003–5), it situates the intersections of ecological issues and genocide in Sudan in a deeper historical and wider geographical frame. In doing so, the article seeks to shed new light on long-term systemic relationships between ecological harms, capitalist development, and genocide across multiple sites on Sudan’s exploited peripheral regions – regions I suggest we can collectively see as internal colonial “commodity frontiers.”⁷ As Arturo Escobar has powerfully argued, violence is not simply endemic to but “constitutive” of development.⁸ This article illustrates how development is also constitutive of ecocide and genocide. It works with Raphael Lemkin’s original formulation of genocide as a form of broad socio-cultural destruction which obliterates a group’s “pattern” of life⁹ – a form of harm which goes beyond physical destruction and biological death and which I have elsewhere argued is compellingly captured through the idea of “social death.”¹⁰

In the next section, I discuss the central concepts, insights and literatures which inform the analysis and the specific way it works with the idea of a genocide-ecocide nexus to

¹ The Sudan Liberation Army/Movement (SLA/M) and the Justice and Equality Movement (JEM).

² John Ashton, then UK Special Representative for Climate Change, quoted in Jeffrey Mazo, “Darfur: The First Modern Climate-Change Conflict,” *Adelphi Papers* 49, no. 409 (2010): 73–86.

³ Jan Selby and Clemens Hoffman, “Beyond Scarcity: Rethinking Water, Climate Change and Conflict in the Sudans,” *Global Environmental Change* 29 (2014): 360–70, 367.

⁴ Cited in Michael Kevane and Leslie Gray, “Darfur: Rainfall and Conflict,” *Environment Research Letters* 3, no. 3 (2008): 1–10, 1.

⁵ Ban Ki Moon, “A Climate Culprit in Darfur,” *Washington Post*, 16 June 2007.

⁶ Notably, Harry Verhoeven, “Climate Change, Conflict and Development in Sudan: Global Neo-Malthusian Narratives and Local Power Struggles,” *Development and Change* 42, no. 3 (2011): 679–707; Selby and Hoffman, “Beyond Scarcity”; Kevane and Gray, “Darfur: Rainfall and Conflict.”

⁷ Jason W. Moore, “Sugar and the Expansion of the Early Modern World-Economy: Commodity Frontiers, Ecological Transformation, and Industrialisation,” *Review (Fernand Braudel Center)* 23, no. 3 (2000): 409–33. The spatial dimension of this argument is consistent with the claim by some scholars that the main geographical dynamic of conflict in Sudan is not North-South, but rather core-periphery. For example: Alex De Waal, “Sudan: The Turbulent State” in *War in Darfur and the Search for Peace*, ed. Alex de Waal (Cambridge, MA: Harvard University Press, 2007).

⁸ Arturo Escobar, “Development, Violence and the New Imperial Order,” *Development* 47, no. 1 (2004): 15–21, 15–16.

⁹ Raphael Lemkin, *Axis Rule in Occupied Europe* (Washington DC: Carnegie Council, 1944), 79.

¹⁰ Claudia Card, “Genocide and Social Death,” *Hypatia* 18, no. 1 (2003): 63–79; Orlando Patterson, *Slavery and Social Death: A Comparative Study* (Cambridge, MA: Harvard University Press, 1982); Louise Wise, “Social death and the loss of a world: an anatomy of genocidal harm in Sudan,” *International Journal of Human Rights* 21, no. 7 (2017): 838–65.

highlight underexplored aspects of genocide in Sudan. Neglected in the existing scholarship in this area, I argue it is essential for any discussion of such a “nexus” in Sudan to also make conceptual and empirical space for the ways in which spaces, bodies, groups of persons, and the environment itself are rendered expropriable through racist civilizational discourses, racialized class relations, and forms of environmental racism. Additionally, supplementing current theorizations based on the concept of the “metabolic rift,” I emphasise the violent and ecologically harmful processes by which rural, direct-producing, place-based communities across Sudan have been fragmented and incorporated into (or expelled to make way for) market relations, including through processes of enclosure and “accumulation by dispossession.”¹¹ These processes have led to the destruction and “profound reconstitution” of the complex socioecological worlds of multiple groups on Sudan’s internal frontiers.¹² They are genocidal in ways that are both immediate and direct, and also in ways that are long-term and indirect.

In the rest of the article, I survey how these dynamics have played out in Sudan in the specific domains of mechanized agriculture, the exploitation of water resources, and oil extraction. Whilst highlighting important precursors and roots constitutive of the historical genealogy of a protracted system of genocidal social death (to be located in Sudan’s “hybrid” imperial formation¹³ which fused Ottoman Egyptian and British colonialisms), it is the period from the 1970s when I argue the nexus between genocide and ecocide emerges most clearly. In developing these claims, I challenge as reductive and short-termist accounts which focus only on Darfur, accounts which explain genocide primarily through identity, inter-communal tensions and/or ideology,¹⁴ and accounts which privilege the lens of counter-insurgency.¹⁵ Whilst these approaches have explanatory value, what they all tend to miss or too quickly pass over is the deeper historical and structural political-economic and political-ecological context within which each of these dimensions is in the first place situated. Overall, therefore, the article draws attention to how mainstream policy and academic debates about genocide in Sudan have tended to neglect both the history and dynamics of (neo)colonial-capitalist expansion and (associated) long-term patterns of ecological harm.

The Genocide-Ecocide Nexus in Sudan: The Racialized Class Relations of “Development” and the Spatial Dynamics of Extraction

First emerging in the 1970s¹⁶, the concept of ecocide has gained renewed traction in recent years as the spectre of human-induced climate change and ruptures in the

¹¹ David Harvey, “The ‘New’ Imperialism: Accumulation by Dispossession,” *Socialist Register* 40, no. 1 (2004): 63–87.

¹² Faoud Makki, “Development by Dispossession: *Terra Nullius* and the Social-Ecology of New Enclosures in Ethiopia,” *Rural Sociology* 79, no. 1 (2014): 79–103, 81.

¹³ Alex De Waal, “Genocidal Warfare in North-East Africa,” in *The Oxford Handbook of Genocide Studies*, eds. Donald Bloxham and Dirk Moses, (Oxford: OUP, 2010).

¹⁴ John Hagan and Wenona Rymond-Richmond, “The Collective Dynamics of Racial Dehumanization and Genocidal Victimization in Darfur,” *American Sociological Review* 72 (2008): 875–902.

¹⁵ United Nations, *Report of the International Commission of Inquiry on Darfur to the United Nations Secretary-General* (25 January 2005); Alex de Waal, “Genocide by Force of Habit?” African Arguments Blog, 23 March 2009: <https://africanarguments.org/2009/03/23/genocide-by-force-of-habit/> [Accessed 12 October 2020]; Martin Shaw, “Darfur: Counter-Insurgency, Forced Displacement and Genocide,” *British Journal of Sociology* 62, no. 1 (2011): 56–61.

¹⁶ David Zierler, *The Invention of Ecocide: Agent Orange, Vietnam, and the Scientists who Changed the Way we Think about the Environment* (Athens, G.A.: University of Georgia Press, 2011).

planet's multiple complex ecological systems loom into tangible reality. Spearheading important legal activism around the concept, in 2010, the late lawyer and environmental campaigner Polly Higgins submitted to the International Law Commission a proposal which pushed for the Rome Statute to include ecocide as an international crime. In this submission she defined ecocide as "... loss, damage or destruction of ecosystem(s) of a given territory(ies) ... such that peaceful enjoyment by the inhabitants has been or will be severely diminished."¹⁷ Ecocide, then, is primarily a crime against the Earth, its "land, sea and river systems, the flora and fauna within the affected ecosystems, as well as the resultant impact on the climate." But the harms produced by ecocide are multi-layered and not only simply environmental; they can also be "cultural and emotional" and can "affect communities at a deep level, especially when a way of life is profoundly and/or practically connected to the affected ecosystem."¹⁸

It is this aspect, the illumination of deep, inseparable interconnections between group harms and ecological harms which is at the heart of recent work positing a "nexus" between ecocide and genocide,¹⁹ and which I will contend is central to a deeper understanding of genocide in Sudan. This work builds on a longer trajectory of thought connecting these phenomena in a legal and institutional context.²⁰ For example, within the UN, the idea of ecocide was at various points considered a "missing method of genocide that could be written into the Genocide Convention."²¹ The effort to recover and theoretically deepen our understanding of this "missing method" has been a major contribution of recent research in this area.

Crook and Short²² develop a Marxist political economy framework to integrate the concept of ecocide into theoretical and empirical analyses of genocide. They find new conceptual resources in reinvigorated understandings of Marx that highlight his underappreciated and underexplored ecological thought.²³ They argue that drawing on this recovered ecological Marxism, and particularly Foster's analysis of the concept of "metabolic rift," helps us explain the structural underpinnings of "ecological destruction as a genocidal technique."²⁴ Marx used the idea of a metabolic rift to capture the inherent

¹⁷ Definition submitted by Polly Higgins to the UN Law Commission (2010). As quoted online: <https://ecocidelaw.com/ecocide-law-2/>.

¹⁸ Ibid.

¹⁹ Notably, Jennifer Huseman and Damien Short, "A Slow Industrial Genocide: Tar Sands and the Indigenous Peoples of Northern Alberta," *The International Journal of Human Rights* 16, no. 1 (2012): 216–37; Martin Crook and Damien Short, "Marx, Lemkin and the Genocide-Ecocide Nexus," *International Journal of Human Rights* 18, no. 3 (2014), 298–319; Martin Crook, Damien Short, Nigel South, "Ecocide, Genocide, Capitalism and Colonialism," *Theoretical Criminology* 22, no. 3 (2018), 298–317; Damien Short, *Redefining Genocide: Settler Colonialism, Social Death, and Ecocide* (London: Zed Books, 2016).

²⁰ Richard Falk, "Ecocide, Genocide and the Nuremberg Tradition of Individual Responsibility," in *Philosophy, Morality and International Affairs*, eds. Virginia Held, Sidney Morgenbesser, and Thomas Nagel (Oxford: Oxford University Press, 1974): 123–37; Richard Falk, "Environmental Warfare and Ecocide—Facts, Appraisal, and Proposals," *Security Dialogue* 4 (1973): 80–96; Ward Churchill, *Struggle for the Land: Native North American Resistance to Genocide, Ecocide, and Colonization* (San Francisco: City Lights Books, 2002).

²¹ Short, *Redefining Genocide*, 7.

²² Crook and Short, "Marx, Lemkin."

²³ Some key works, in no particular order, include, Paul Burkett, *Marx and Nature: A Red and Green Perspective* (New York: St Martin's Press, 1999); John Bellamy Foster, *Marx's Ecology: Materialism and Nature* (New York: Monthly Review Press, 2000); John Bellamy Foster, Brett Clark, and Richard York, *The Ecological Rift: Capitalism's War on the Earth* (New York: Monthly Review Press, 2010); James O'Connor, *Natural Causes: Essays in Ecological Marxism* (New York: Guildford, 1998); Ted Benton, ed., *The Greening of Marxism* (London: The Guildford Press, 1996); Alfred Schmidt, *The Concept of Nature in Marx* (London: New Left, 1971); Kohei Saito, *Karl Marx's Ecosocialism: Capital, Nature, and the Unfinished Critique of Political Economy* (New York, N.Y.: Monthly Review Press, 2017).

²⁴ Crook and Short, "Marx, Lemkin," 299.

tendency of capitalism to violate ecologically sustainable limits. Ecocide is thus understood as a:

...function of capital, with its remorseless drive to accumulate damaging and collapsing natural cycles and turning them into 'broken linear processes,' exceeding the constraints and boundaries of nature and causing what Marx described as a 'metabolic rift' between humankind and nature.²⁵

Crook and Short's articulation of a genocide-ecocide nexus emphasizes that ecological destruction can lead to genocide when it produces "conditions of life that fundamentally threaten a group's cultural and/or physical existence."²⁶ As they note, and also important for the present article, this is particularly pertinent for indigenous and place-based peoples for whom, as Wolfe writes, "land is life – or, at least, land is necessary for life. Thus, contests for land can be – indeed, often are – contests for life [...]. So far as Indigenous people are concerned, where they are *is* who they are."²⁷

Central to all this are some influential strands of the critical genocide scholarship which move beyond the legal definition of the UN Genocide Convention (1948) and instead return to Raphael Lemkin's broader original sociological formulation of genocide. This work emphasizes the breadth of Lemkin's conceptualization of genocidal destruction and in particular his emphasis on multiple forms of socio-cultural destruction and processes of non-murderous anti-group violence.²⁸ Also important for this article is scholarship drawing attention to Lemkin's description of genocide as inherently colonial and imperial in nature, involving displacement, occupation and settlement.²⁹ I have elsewhere sought to contribute to this scholarship by exploring genocide in Sudan through the lens of multiple forms of intersecting colonialism.³⁰

The new attention to ecological destruction opened up by the emerging literature on the genocide-ecocide nexus usefully expands this more critical sociological work on the meaning of genocide. It focusses our attention on how certain groups and patterns of group life can be inextricably tied to particular territories, environments and ecological systems, such that the destruction of the latter can lead to the genocidal fragmentation, or "social death,"³¹ of the former. For rural, place-based, direct-producing or subsistence societies, including many of those groups discussed in this article, specific territories and ecologies are a vital constitutive dimension of culture and identity.³²

²⁵ Martin Crook and Damien Short, "Marx, Lemkin," 299.

²⁶ Crook and Short, "Marx, Lemkin and the Genocide-Ecocide Nexus," 298.

²⁷ Patrick Wolfe, "Settler Colonialism and the Elimination of the Native," *Journal of Genocide Research* 8, no. 4 (2006): 387–409, 387.

²⁸ Martin Shaw, *What is Genocide?* (London: Polity Press, 2007); Ann Curthoys and John Docker, "Defining Genocide," in *The Historiography of Genocide*, ed. Dan Stone (Basingstoke: Macmillan Publishers Limited, 2008); Dirk Moses, "Raphael Lemkin, Culture, and the Concept of Genocide," in *The Oxford Handbook of Genocide Studies*, eds. Donald Bloxham and Dirk Moses (Oxford: Oxford University Press, 2010).

²⁹ Moses "Raphael Lemkin, Culture," 26; Lemkin, *Axis Rule*, 79; Michael A. McDonnell and A. Dirk Moses, "Raphael Lemkin as Historian of Genocide in the Americas," *Journal of Genocide Research* 7, no. 4 (2005): 501–29.

³⁰ Louise Wise, "Genocide in Sudan as Colonial Ecology," *International Political Sociology* 14, no. 2 (2020): 129–55.

³¹ Claudia Card, *Confronting Evils: Terrorism, Torture, Genocide* (Cambridge: Cambridge University Press, 2010); Card, "Genocide and Social Death"; Wise, "Social Death and the Loss of a World."

³² Here I also draw on Abed's notion of a "territorially-bounded culture" and Komey's discussion of the concept of "region" in Sudan. Mohamed Abed, "Clarifying the Concept of Genocide," *Metaphilosophy* 37, no. 3–4 (2006): 308–30, 312, 326; Guma K. Komey, "The Denied Land Rights of the Indigenous Peoples and their Endangered Livelihood and Survival: The Case of the Nuba of Sudan," *Ethnic and Racial Studies* 31, no. 5 (2008): 991–1008, 992–3.

Throughout the following discussion I make reference to multiple rural groups as victims of a long-term and country-wide system of ecocidal developmental expansion in the south, north, west, and east of Sudan. Whilst it is important to recognize the heterogeneous and culturally distinctive nature of these various groups, they are also united by several important features such that it is also possible to consider them in a more collective sense too. For example, these groups occupy similar positions within the context of the Sudanese state: all are situated as racialized, marginalized and exploited communities on the edges of state power, occupying resource rich peripheral lands progressively (and violently) incorporated into an expanding internal colonial state-capital-development nexus. Further, the socio-economic and livelihood structures of these groups depend upon direct relationships with, and generationally embedded and transmitted knowledge about, specific regions of land. Distinctive and specific ecologies, ancestral landscapes and associated livelihood practices are integral to the cultural identities, cosmologies, and societal cohesion of these communities, such that the destruction of (or forced removal from) these distinctive and specific lands would be tantamount to cultural collapse, and thus genocidal social death. Finally, all of these communities have also in different ways and at different times resisted these processes, developing strategies of communal response and survival in the context of state violence and existential precarity; although this is not the focus of this particular article, the long history of genocide, ecocide and violent development across Sudan is also a complex history of oppositional political mobilization and resistance.

Working with these ideas, the article builds on Crook and Short's conceptualization of a genocide-ecocide nexus discussed above. However, it also expands it by developing a novel conceptual synthesis and, in turn, working with this synthesis as a lens to pursue a distinctive account of the long-term relationship between genocide and ecocide throughout Sudan. Specifically, it interweaves two additional strands into the analysis. Firstly, greater attention to processes of racialization, and secondly, emphasis on the socioecological fragmentation caused by the violent incorporation of peripheral rural communities underpinning capitalist expansion. Existing Marxian-inspired frameworks on the political economy of the genocide-ecocide nexus have tended to neglect the structuring power and constitutive logic of racial categories, racism and processes of racialization. What is often left out of (but not inconsistent with) existing approaches is deeper conceptual and empirical attention to the ways in which spaces, bodies, groups of persons, and the environment itself are rendered expropriable through racial hierarchies and power relations, and racial modes of thinking that map onto legacies of colonial practices, discourses, and geographical patterns of subjugation and dispossession.³³

³³ Paula Chakravartty and Denise Ferreira da Silva, "Accumulation, Dispossession, and Debt: The Racial Logic of Global Capitalism – An Introduction," *American Quarterly* 64, no. 3 (2012): 361–85; C. L. R. James, *The Black Jacobins* (New York: Vintage Books, 1989); Frantz Fanon, *The Wretched of the Earth* (New York: Penguin Classics, 2001); Cedric Robinson, *Black Marxism: The Making of the Black Radical Tradition* (London: Zed Books, 1983); Ashley J. Bohrer, "Intersectionality and Marxism: A Critical Historiography," *Historical Materialism* 26, no. 2 (2018): 46–74; Lisa Tilley, Ashok Kumar, Thomas Cowan, "Introduction: Enclosures and discontents: Primitive accumulation and resistance under globalised capital," *City: Analysis of Urban Trends, Culture, Theory, Policy, Action* 21, no. 3–4 (2017): 420–7. Dr Rochelle Johnston has developed a distinctive theorization of the relationship between "race" and genocide in Sudan as relational and deeply connected to the facilitation of "standing by" to ongoing genocide. Rochelle Johnston, "Standing by and Doing Nothing About Genocide in Sudan and Canada," (Unpublished PhD thesis, University of Toronto, 2019).

Indeed, a rich literature has demonstrated the dependence of capitalism on colonialism and its constitutive systems of racial domination and control. As Chakravartty and Ferreira da Silva write, “classic anticolonial, racial, and global interrogations of historical materialism” – texts such as C. L. R. James’s *Black Jacobins*, Cedric Robinson’s *Black Marxism*, and Frantz Fanon’s *The Wretched of the Earth* – remind us that central categories of Marxist thought such as class struggle and exploitation of labour, on their own, “cannot account for the ways in which capitalism has lived off – always backed by the colonial and national state’s means of death – of colonial/racial expropriation.”³⁴ Racial capitalism, as Lowe writes, “captures the sense that actually existing capitalism exploits through culturally and socially constructed differences such as race, gender, region and nationality and is lived through those uneven formations.”³⁵ These perspectives are highly pertinent to understanding the relationship between genocide and environmental degradation in Sudan, drawing into focus the racialized class relations and processes of accumulation and dispossession underpinning ecocidal development in the country. As will be further discussed, successive fundamentalist Arab-Islamic governments and ruling elites have pursued “civilizational” projects of forced Arabization and Islamization across Sudan’s marginalized peripheries, seeking to impose a narrow vision of the nation’s legitimate identity and eradicate the country’s multiple African tribal identities.³⁶ The latter have long been viewed as expendable and lacking “real” culture, facilitating their exploitation, slavery and exposure to harm and death.³⁷

Moreover, the core–periphery spatialization of genocide and ecocide in Sudan also demonstrates how, as McIntyre and Nast write, “Geographical dynamics of accumulation” are deeply racialized.³⁸ Laura Pulido, invoking Cedric Robinson, has pointed to how the devaluation of Black and other non-white lives has been central to centuries of global capitalism through its production of “landscapes of differential value” which uphold processes of accumulation.³⁹ Environmental racism is a constitutive aspect of these processes. It captures the idea that environmental problems and injustices – such as pollution, land overuse, hazardous land use, or reduced access to benefits of the environment – disproportionately impact people of colour and racialized spaces.⁴⁰ A common thread connecting the three areas of ecocidal extraction analysed in this article is their spatial location on racialized and colonially constituted peripheral regions, collectively

³⁴ Chakravartty and Ferreira da Silva, “Accumulation, Dispossession,” 368.

³⁵ Lisa Lowe, *The Intimacies of Four Continents* (Durham, NC: Duke University Press, 2015), 149–50.

³⁶ Francis Deng, *War of Visions: Conflict of Identities in the Sudan* (Washington D.C.: Brookings Institution, 1995); Heather J. Sharkey, “Arab Identity and Ideology in Sudan: The Politics of Language, Ethnicity, and Race,” *African Affairs* 107/426 (2007); Jok Madut Jok, *Sudan: Race, Religion and Violence* (Oxford: Oneworld, 2007).

³⁷ Amir H. Idris, *Sudan’s Civil War: Slavery, Race, and Formational Identities* (New York: The Edwin Mellen Press, 2001); Ahmed Alawad Sikainga, *Slaves into Workers: Emancipation and Labor in Colonial Sudan*, (Austin, T.X.: University of Texas Press, 1996); Jok Madut Jok, *War and Slavery in Sudan* (Philadelphia, P. A.: University of Pennsylvania Press, 2001).

³⁸ Michael McIntyre and Heidi J. Nast, “Bio(necro)polis: Marx, Surplus Populations, and the Spatial Dialectics of Reproduction and ‘Race,’” *Antipode* 43, no. 5 (2011): 1465–88, 1466.

³⁹ Laura Pulido, “Flint, Environmental Racism, and Racial Capitalism,” *Capitalism Nature Socialism* 27, no. 3 (2016): 1–16, 1.

⁴⁰ The concept of “environmental racism” emerged particularly in the US in the 1980s. See: Robert D. Bullard, “The Threat of Environmental Racism,” *Natural Resources and Environment* 7, no. 3 (1993): 23–6; Robert D. Bullard, “Environmental Justice in the 21st Century: Race Still Matters,” *Phylon* 49, no. 3–4 (2001): 151–71; Laura Pulido, “Environmental Racism,” *International Encyclopedia of Geography: People, the Earth, Environment and Technology* (Wiley, 2017): 1–13; Laura Pulido, “Geographies of Race and Ethnicity II: Environmental Racism, Racial Capitalism and State-Sanctioned Violence,” *Progress in Human Geography* 41, no. 4 (2016): 524–33.

conceptualized as resource or “commodity frontiers.”⁴¹ These ideas provide important but neglected conceptual resources for expanding the explanatory potential of the genocide-ecocide nexus paradigm, and for deepening understanding of the history and contemporary dynamics of this nexus in the case of Sudan.

To provide some brief historical context, the racial-spatial geography of what I posit here as an emerging “nexus” between genocide and ecocide in Sudan has roots prior to and including the Ottoman Egyptian (or *Turkiyya*, 1821–1885) and Anglo-Egyptian colonial periods (1898–1956). In the precolonial period and during the *Turkiyya*, slaves and resources were extracted from the south and transported to the north, Egypt, and other parts of the Ottoman Empire, entrenching a centralizing and fundamentalist Arab-Islamist core in an exploitative racist relationship with its peripheries. In the “popular mind,” according to Douglas Johnson, “slaves and ‘blacks’ were synonymous.”⁴² Slave labour in Sudan has been fundamental to agricultural development in central river-ain regions and was tolerated after the British formally banned it in 1899.⁴³ But even as the institution of slavery receded, demand for both land and cheap wage labour grew under the industrialization of the Anglo-Egyptian condominium and into the postcolonial period. The need for cheap labour was largely filled by those same peoples from the peripheral regions previously targeted by slave-raiding, who were now increasingly displaced by expanding mechanized agricultural and irrigation schemes. Thus, compounding and extending the legacy of slavery, exploitation, domination and racism against what were seen as “uncivilized African” peripheries and peoples continued to saturate economic, political and cultural relations.⁴⁴ The derogatory epithet ‘*abid*, Arabic for “slave,” has long been abusively directed at darker-skinned peoples across Sudan and has been widely reported during episodes of extreme genocidal violence by militias and state forces.⁴⁵ In short, Sudan’s peripheries have historically been seen by dominant elites as, on the one hand, bountiful natural spaces able to provide a seemingly unlimited supply of human and material resources that only some, i.e. the northern colonially constituted elite (which from the postcolonial period notably saw themselves as the colonial heirs and “vanguards of modernity”)⁴⁶ are entitled to extract; and on the other, pejoratively as “uncivilized” and “wild” landscapes waiting for development.

In the context of the expanding reach of global neoliberalism, the need for labour and especially for land escalated from the 1970s, with the massive expansion of agriculture from this decade. Whilst it is certainly significant to note the historical relationships and continuities between slavery, labour exploitation and later forms of displacement and violence (in terms of the production of genocidal social death, and an evolving systemic relationship to colonial capitalism), because this article is particularly interested in elucidating connections between genocide and ecological harms, the emphasis, whilst noting colonial precursors, is primarily on the period from the 1970s when the soils, landscapes, and ecologies of Sudan’s peripheries began to be most rapidly transformed.

⁴¹ Moore, “Sugar and the Expansion of the Early Modern World-Economy.”

⁴² Douglas Johnson, *The Root Causes of Sudan’s Civil Wars* (Oxford: James Currey, 2003), xviii, 60.

⁴³ Jok, *War and Slavery*.

⁴⁴ Sharkey, “Arab Identity”; Sikainga, *Slaves into Workers*.

⁴⁵ For example, Emily Wax, “We Want to Make a Light Baby,” *Washington Post*, 20 June 2004.

⁴⁶ El-Tom “Darfur Peoples,” 8–9; Sharkey, “Arab Identity”.

It is here that the second additional strand I want to emphasize becomes important. This strand highlights the violent process of (sometimes halting or incomplete) incorporation of predominantly rural direct-producer communities into systems of market relations. Alongside the concepts of “accumulation by dispossession” and land grabbing/enclosure, attention to these processes brings into focus what Faoud Makki has referred to as the “profound reconstitution” of “socioecological relations” caused by the violence of capitalist expansion; indeed, it is this profound (I would add catastrophic) reconstitution he suggests we can see “at the source of the metabolic rift.”⁴⁷ In Sudan, I suggest we can see these processes as not only genocidal in a direct sense through violence, forced displacement, and the (sometimes attritional) destruction of whole ways of life in order to gain access to land, but also in an indirect sense by embedding the structural conditions for future evolving and intensifying genocidal dynamics. In particular, as has been well-documented by numerous historians and anthropologists of Sudan, these socially and ecologically destructive processes disrupted longstanding conflict resolution mechanisms, land tenure systems, and redistribution practices between various tribal communities. Alongside loss of lands, this led to polarizing identities, increasing armed resistance, and escalating intercommunal tensions between formerly, on the whole, symbiotically co-existing neighbours. Moreover, in destroying indigenous food systems and severing the direct (productive, cultural, spiritual) relationship of communities with their lands, expanding “modernization” and “development” rendered rural populations increasingly vulnerable to climate shifts and food shortages, at the same time as they precipitated and exacerbated the latter.⁴⁸ This precipitated common patterns of structural precarity across Sudan’s peripheries central to the long-term emergence of a protracted system of genocide. In this context, some groups became more susceptible to the state’s exploitative tribalism, its racist divide and rule tactics, and to recruitment into state-supported militias. The latter in turn, mobilized by the racist currents described above, became central tools of genocide and displacement.

Two final brief points are required regarding the article’s analytical method. Firstly, whilst much work in this area has tended to proceed by analysing single examples or cases of environmental destruction as illustrations of a nexus between genocide and ecocide, here I analyse three ecologically destructive processes (i.e. agricultural expansion, water exploitation, and oil extraction), framing them as a structural pattern of genocide and ecocide. Despite their differences, these three processes are not seen as separate but rather as unified in their relation to a broader Sudanese-wide agenda of (colonially constituted, class-based and racialized) development. Dynamics of development-induced ecological destruction have also changed in certain ways over time in relation to shifting political events and contexts. This article does not attempt to address the political nuances of these shifts. Instead, the aim is to trace continuities and to draw into focus the strikingly consistent genocidal logics exhibited over several decades. Secondly, rather than simply “adding” environmental destruction as a “method” or “technique” of genocide that the originator of the concept, Raphael Lemkin, overlooked, the interpretation here instead argues we must acknowledge the constitutive character of ecological destruction to a long-term system of genocide. In other words, ecocide is understood not

⁴⁷ Makki, “Development by Dispossession,” 81.

⁴⁸ Michael Watts, *Silent Violence: Food, Famine, and Peasantry in Northern Nigeria* (University of California Press, 1983).

simply as one of a range of “tools” of population destruction, deployed rational-actor style as a kind of tactical decision. Rather, it is inherent to the underlying trajectory and logic of a (neo)colonial-capitalist system of genocidal social death.

Agricultural Colonization and Mechanized Desertification

According to Mohamed Suliman, the “mechanized touch” of large-scale agriculture in Sudan turned “everything to dust.”⁴⁹ Mechanized farming has been one of the most significant causes of ecological degradation across the country. Spreading most rapidly from the 1970s, patterns of agricultural expansion in Sudan have roots in the colonial era. In both contexts it depended upon massive land seizures and violent displacement. The large schemes caused major ecological problems, including soil erosion, land degradation, deforestation, clearance of vegetation and resultant desertification. Politically and economically, this process was primarily driven by the post-independence northern elite – a class of local primary resource-extractors formed under the British, integrated into the global circuits of capital. This new ruling class was seen by the south and the peripheries of the country as representing a new form of (internal) colonialism, continuing the process of plunder, violence and exploitation set in motion by the British. Far from celebrating independence in 1956, the process of de-colonization was seen by many as nothing more than a transfer of power from one colonial elite to another.⁵⁰ In Suliman’s view:

Sudan offers a prime example of how Third World ruling elites, driven to specialise in resource utilisation, have degraded the resource base to such an extent that its expansion becomes a necessity for them, justifying aggression against their own people or their neighbours.⁵¹

Complicating mainstream narratives about desertification which appeal to global climate change, some have linked local climatic changes and reduced regional rainfall to the human-induced land degradation associated with mechanized agriculture.⁵² Over several decades, the drive for more and more fertile land in order to increase cash crop production for profit on the international market (rather than for local use needs) led to the unrestrained expansion of “modern” agricultural schemes into southern, eastern and western peripheries. This process has violently displaced whole communities, severing groups from their lands, and thus from the foundation of their practices of livelihood production and identities. As Makki puts it:

⁴⁹ Mohamed Suliman, “Civil War in Sudan: The Impact of Ecological Degradation,” *Contributions in Black Studies: A Journal of African and Afro-American Studies* 17, Article 7 (1997): 99–121, 119.

⁵⁰ Suliman, “Civil War in Sudan,” 103; Francis Deng, *War of Visions: Conflict of Identities in the Sudan*, (Washington, DC: The Brookings Institution, 1995), 135–6.

⁵¹ Suliman, “Civil War in Sudan,” 119.

⁵² Elagib and Mansell have linked anthropogenic degradation of natural vegetation cover in Sudan to shifts in climatic patterns over several decades. They argue that human activities are responsible for most of the land degradation experienced in Sudan, and they document “quite striking” findings indicating that human-induced land degradation (such as large-scale clearance of land, overcropping, overgrazing, and the exploitation of natural resources) could result in various climatic modifications including higher temperatures and less rainfall. They write: “Human interventions leading to changes in natural surface characteristics are believed to directly induce serious climatic changes.” They thus introduce a complicating factor to common assumptions about Sahelian desertification by highlighting the central role of land degradation. Nadir Ahmed Elagib and Martin G. Mansell, “Climate Impacts of Environmental Degradation in Sudan,” *GeoJournal* 50 (2000): 311–27.

By dismantling the village commons and deracinating the commoner, enclosures disenfranchised the historically sedimented cultural practices, collective memories, customary entitlements and modes of social reproduction that had once informed the particular relationship of communities to land and nature.⁵³

Cash crops were first introduced during the Turko-Egyptian colonial period (1821–1885), notably cotton in Kassala.⁵⁴ After their occupation of Sudan in 1898, the British launched what Carole Collins has described as a “classic campaign of primitive accumulation.”⁵⁵ From the mid-1920s this went hand in hand with the significant expansion of the industrialized agricultural sector, which was from the 1940s increasingly dependent upon force to “evict traditional cultivators and pastoralists from their farms, animal routes, grazing lands and water points in favour of the expansion of large-scale mechanised farms.”⁵⁶ Small producers increasingly had their lands expropriated, and were progressively incorporated into market relations as wage labourers on large schemes producing cash crops (such as cotton, sesame, ground nuts and gum Arabic).⁵⁷ But this general process of agricultural expansion remained limited during the colonial period. It was not until the post-independence context that it became particularly destructive, transforming socio-ecological relations across broad swathes of the country.

In both the colonial and postcolonial periods, agricultural expansion depended upon a deeply racist mentality and colonial outlook.⁵⁸ Relevant here is work which highlights how the taming, control and exploitation of nature developed as a “standard of civilization” in the nineteenth century in order to “constitute membership in a civilized European international society.”⁵⁹ Civilizational discourses about nature were of course also bound up with deeply racist depictions of “primitive” peoples and ways of life. Ideas about the “scientific” control and productive “rational” use of nature as synonymous with modern civilization became powerful ideological and discursive legacies which shaped the agendas and practices of political and economic elites in the post-independence period, during which mechanized agricultural schemes continued to expand. These organizing ideas and discourses were a significant continuity from the colonial to the postcolonial periods; it was not only economic interest but also “master narratives of civilisation, development, modernisation and globalization” that have shaped the “visions of Sudan’s ruling elites.”⁶⁰

A notable early colonial example that exemplifies much of this was the Gezira Scheme, a huge irrigated cotton plantation located between the Blue and White Nile which began

⁵³ Makki, “Development by Dispossession,” 81.

⁵⁴ M. A. Mohamed Salih, “Ecological Stress and Political Coercion in the Sudan,” *Disasters* 14, no. 2 (1990): 123–31, 124.

⁵⁵ Carole Collins, “Colonialism and Class Struggle in Sudan,” *MERIP* 46 (1976): 3–20, 10.

⁵⁶ Salih, “Ecological Stress,” 124–5. See also Tothill, J.D., *Agriculture in the Sudan: A Handbook of Agriculture as Practised in the Anglo-Egyptian Sudan* (London: Oxford University Press, 1948); M. Shazali Osman and H. E. El Haj, “Irrigation Practices and Development in the Sudan,” *Sudan Notes and Records*, 55 (1974): 96–110.

⁵⁷ Salih, “Ecological Stress,” 125.

⁵⁸ John Burton, “Development and Cultural Genocide in the Sudan,” *The Journal of Modern African Studies* 29, no. 3 (1991): 511–20.

⁵⁹ Joanne Yao, “‘Conquest from barbarism’: The Danube Commission, International Order and the Control of Nature as a Standard of Civilization,” *European Journal of International Relations* 25, no. 2 (2018): 335–59.

⁶⁰ J. Gertel, R. Rottenburg, S. Calkins, “Disrupting Territories: Commodification and its Consequences,” in *Disrupting Territories: Land, Commodification and Conflict*, eds. J. Gertel, R. Rottenburg, S. Calkins (Suffolk: James Currey, 2014), 7–8; Mahmood Mamdani, *Saviours or Survivors: Darfur, Politics, and the War on Terror* (New York: Doubleday, 2009), 79; El-Tom, A. O., “Darfur People; Too Black for the Arab-Islamic Project of Sudan, Part I,” *Irish Journal of Anthropology* 9, no. 1 (2006), 8.

cultivation in 1925.⁶¹ The Gezira Scheme, Saeed writes, was a key moment in the beginning of the “alienation of a large number of Sudanese peasants (cultivators and herdsman) from the means of production they hitherto owned.”⁶² Tony Barnett has argued that the project was paternalistic and authoritarian, and based on British efforts to create dependency and control racialized labour.⁶³ In a similar vein, Victoria Bernal’s conceptually rich analysis emphasizes the powerful racialized cultural dynamics that in addition to any “rational” economic calculus (which was according to her in any case highly spurious), underpinned the administrative structure and policies of the Gezira Scheme. As she writes, these were “not so much governed by some pure economic rationality as they were governed by a different *moral* principle: that of British supremacy over the Sudanese.”⁶⁴ The Scheme represented the “triumph of modern civilization over nature and ignorant tradition,” which in practice meant “the imposition of colonial order on the Sudanese landscape and society.”⁶⁵ It claimed vast areas of land previously inhabited by Sudanese peasants and pastoralists. Local communities lost control of their territories and received only tenancies in return. The appropriation of land and coercive transformation of the agrarian system destroyed longstanding indigenous farming practices and disrupted pastoral systems.⁶⁶

The Gezira Scheme might be considered a prelude to, or harbinger of, patterns of ecologically and socially destructive agricultural development that continued after the British left in 1956. Especially from the neoliberal 1970s under Nimeiri (1969–85), the Arab-sponsored “breadbasket” model for Sudanese development, in conjunction with Western partners and international lenders (known as the *infitah* or “open door” policy), drove an unprecedented expansion of large mechanized schemes.⁶⁷ During the fifteen years of Nimeiri’s rule, a class of merchants, traders, and commission men, “took almost exclusive control of social and political power, and thus of the state, for its own ends.”⁶⁸ Tim Niblock has argued the Sudanese state during the 1970s “falls clearly” into the category of a “bourgeois-bureaucratic” state: “the state bureaucracy, now transformed into a state bourgeoisie, provides a dynamic link between the interests of the commercial bourgeoisie and those of the state.”⁶⁹ Moreover, under Nimeiri, the Sudanese state developed a “directly dependent relationship between the state and international capital.”⁷⁰ According to Salih, the total area under mechanized rain-fed schemes increased from around two million hectares in 1968, to about eight million in 1985–86.⁷¹ When lands and soils were exhausted and denuded of fertility, landowners in search of profit would simply move

⁶¹ Tony Barnett, *The Gezira Scheme: An Illusion of Development* (London: Routledge: 2019 [1977]); Tony Barnett and Abbas Abdelkarim, *Sudan: The Gezira Scheme and Agricultural Transition* (London: Routledge, 2013 [1991]).

⁶² Cited in Victoria Bernal, “Colonial Moral Economy and the Discipline of Development: The Gezira Scheme and ‘Modern’ Sudan,” *Cultural Anthropology* 12, no. 4 (1997): 447–79, 454.

⁶³ Barnett, *The Gezira Scheme*.

⁶⁴ Bernal, “Colonial Moral Economy,” 458.

⁶⁵ *Ibid.*, 451.

⁶⁶ Bernal, “Colonial Moral Economy,” 453.

⁶⁷ Tim Niblock, *Class and Power in Sudan: The Dynamics of Sudanese Politics, 1898–1985*, (London: Macmillan, 1987), 291; Gaim Kibreab, *State Intervention and the Environment in Sudan, 1889–1989: The Demise of Communal Resource Management* (New York: The Edwin Mellen Press, 2002); John Voll, *Sudan: The State and Society in Crisis* (Bloomington: Indiana University Press, 1991), 137.

⁶⁸ Barnett and Abdelkarim, *Sudan*, 3.

⁶⁹ Tim Niblock, “The Background to the Change of Government in 1985,” in *Sudan after Nimeiri*, ed. Peter Woodward (London: Routledge, 1991), 34–6.

⁷⁰ Niblock, *Class and Power in Sudan*, xix.

⁷¹ Salih, “Ecological Stress and Political Coercion,” 126.

on, repeating the ecologically exploitative process on new land, leaving wage-labourers and disfigured ecologies in their wake.

In the Nuba Mountains, appropriation of cultivable lands for development is at the root of decades of genocidal displacement and violence. In the mid-1960s the primarily northern merchant class that had emerged in the post-independence period⁷² began taking large areas of land in the region. From 1968, funded by loans by the World Bank sponsored Mechanized Farming Corporation (MFC), this process intensified. Large, privately owned mechanized schemes expanded across the region throughout the 1970s and 1980s, with discontent and resistance increasing amongst the Nuba as they were pushed from their lands. Vast areas of land have also been appropriated in Darfur; in one public announcement in 1993, the government distributed some 7 million hectares in southern Darfur.⁷³ Similar patterns unfolded in the east of Sudan,⁷⁴ which has seen drastic forest clearances.⁷⁵

A significant consequence of all this was that communities across the different regions whose livelihoods, identities, lives and ways of life were imperilled began to join emerging regional popular resistance movements. This resistance, a response to looming ecological and existential devastation, was met by brutally violent crack downs from Khartoum. For example, as resistance amongst the Nuba grew, there were mass arrests of political and social leadership, including members of the Nuba Mountains General Union. In the mid-1980s, the Nuba peoples increasingly took up arms with the SPLA in the context of the second civil war, which had officially broken out in 1983. Significantly, however, attacks on encroaching mechanized farms preceded war's outbreak. By the end of the 1980s and in to the 1990s there were full-blown attacks on Nuba villages by the Sudanese army and their Baggara militias, with escalating levels of force and brutality. In the 1990s, with Khartoum declaring a *jihad* against the Nuba, thousands were forcibly deported to concentration camps, where they suffered forced labour, starvation, torture, sexual violence, forced conversion to Islam, "re-education" and the destruction of their identities.⁷⁶ Property was stolen, and able-bodied men were taken into slavery to work on the very farms appropriated from their parents.⁷⁷ Like Salih, I suggest we should see the persecution of the Nuba peoples as a continuation of colonialism through the ongoing "internal colonial" structure of the Sudanese state. Likewise

⁷² Also referred to as the *Jellaba*. As Alison Ayers summarizes, the *Jellaba* consisted of "northern riverine Arab(ized) Muslim religious leaders, merchants, 'tribal' notables, and latterly higher civil servants and politicians." They were perceived by the British as the "better class of native" to be co-opted, and through which the colonists sought to influence the rest of the population. Alison Ayers, "Sudan's Uncivil War: The Global-Historical Constitution of Political Violence," *Review of African Political Economy* 37, no. 124 (2010): 153–171, 157.

⁷³ Mohamed Suliman, "Eighteen years of civil war in the Sudan," (London: Institute For African Alternatives, 2001); Mohamed Suliman, "The War in Darfur: The Resource Dimension," in *Respect: Sudanese Journal for Human Rights Culture and Issues of Cultural Diversity*, 8 (August 2008); Ayers, "Sudan's Uncivil War," 166.

⁷⁴ Gaim Kibreab, *People on the Edge in the Horn: Displacement, Land Use and the Environment in the Gedaref Region, Sudan* (Oxford: James Currey, 1996).

⁷⁵ Hussein M. Sulieman and N. A. Elagib, "Implications of climate, land-use and land-cover changes for pastoralism in eastern Sudan," *Journal of Arid Environments* 85 (2012): 132–41; Hussein M. Sulieman and A.G.M. Ahmed, "Mapping the pastoral migratory patterns under land appropriation in East Sudan: the case of the Lahaween Ethnic Group," *The Geographical Journal* 183 (2017): 386–99; Suliman, "Civil War in Sudan."

⁷⁶ Totten, *Genocide by Attrition*; African Rights, *Facing Genocide*; Alex De Waal, "Not Forgetting the Nuba War," *African Arguments*, 9 August 2008, <http://africanarguments.org/2008/08/09/truth-telling-nuba/>.

⁷⁷ Salih M. A. Mohamed, "Land Alienation and Genocide in the Nuba Mountains, Sudan," *Cultural Survival Quarterly Magazine* (December 1998), <https://www.culturalsurvival.org/publications/cultural-survival-quarterly/land-alienation-and-genocide-nuba-mountains-sudan>.

affecting the other regions of Sudan discussed here, this internal colonialism was justified through claims of “development.”⁷⁸

Violent class-based processes of accumulation and dispossession to make way for agricultural expansion were not only genocidal on their own terms and in an immediate sense through scorched earth displacement. They were also genocidal because in some areas they contributed to the embedding of conditions for future forms of genocide. In Darfur, for example, these processes and the associated ecological degradation reduced access to land and means of survival, thereby increasing vulnerability to drought and food shortages. This, in conjunction with the breakdown of local smallholder agricultural practices, land-tenure systems and conflict resolution mechanisms, engendered the structural conditions of precarity under which the identities of nomadic and pastoralist groups became more sharply differentiated and competitive. Many groups lost their land, watering points and animal routes, and were thus forced to adapt their grazing routes and search for new areas of cultivable and grazing land. Some were forced onto areas of land historically owned by other groups, provoking small-scale conflicts. This volatile context was fertile ground for already circulating racist anti-Black ideologies of Arab supremacism⁷⁹ to take root, and made certain nomadic groups, such as the Baggara, more susceptible to the exploitative divide-and-rule tactics of the government as it armed and co-opted them into “tribal” militias. The latter, in turn, often received material rewards as they became a central tool of violence in the government’s broader strategy of accumulation and the crushing of inevitable resistance. In these ways, accumulation by dispossession and mechanized agricultural expansion contributed to the emergence of an intractable system of genocide.

From the early 2000s, areas designated for agricultural development have continued to multiply, with huge areas handed over to foreign companies.⁸⁰ This is related to the recent further consolidation of relations between the Sudanese state and Arab capital in the agricultural sector.⁸¹ In 2013, violence in South Darfur forced native inhabitants from some of the most productive (gum-arabic producing) land in the region. And in Central Darfur in the same year, the forces of a former *Janjaweed* commander embarked on a land-grabbing campaign, seizing fertile land (primarily from the Salamat, Fur, and Zaghawa tribes), and expanding the territory of favoured Arab groups. Sixteen villages were burned to the ground.⁸² One refugee from the region explained, “They want to take the land and get rid of the people.”⁸³ The aim of the state-supported (primarily

⁷⁸ Ibid.

⁷⁹ Sharkey, “Arab Identity and Ideology”; Jok Madut Jok, *Sudan: Race, Religion, and Violence* (Oxford: One World, 2007); Johnson, *The Root Causes*, 4; El-Tom Abdullahi, “Darfur People: Too Black for the Arab-Islamic Project of Sudan, Part I” *Irish Journal of Anthropology* 9, no. 1 (2006): 5–11; Amir Idris, *Civil War: Slavery, Race and Formational Identities* (Lewis-ton, N.Y.: Edwin Mellen Press, 2001).

⁸⁰ Marina Bertoncin, Andrea Pase, Daria Quatrada, and Stefano Turrini, “At the Junction Between State, Nature and Capital: Irrigation Mega-Projects in Sudan” *Geoforum* 106 (2019): 24–37, 24; see also Hussein Sulieman, “Grabbing of Communal Rangelands in Sudan: The Case of Large-Scaled Mechanized Rain-Fed Agriculture,” *Land Use Policy* 47 (2015): 439–47; David Deng, “The New Frontier: A Baseline Survey of Large-Scale Investment in Southern-Sudan,” (Oslo: Norwegian People’s Aid, 2011), https://reliefweb.int/sites/reliefweb.int/files/resources/6F0B144DA275260B8525785C0069DB6A-Full_Report.pdf.

⁸¹ Bertoncin et al., “At The Junction,” 26.

⁸² John Prendergast, Omer Ismail, and Akshaya Kumar, “The Economics of Ethnic Cleansing in Darfur,” (Enough Project, 2013), 8–9.

⁸³ Cited Ibid., 3–4.

Misseriya) militia groups now occupying this appropriated land was to “secure it for possible sale or lease by the government to investors from Persian Gulf countries.”⁸⁴

In 2008, the United Nations Environment Programme (UNEP) called for a moratorium on the expansion of large mechanized farms in Sudan’s central semi-arid regions, warning it was a flashpoint for conflict between farmers and pastoralists.⁸⁵ And yet, the long-term class-based, state-led political economic relations underlying this expansion (and the webs of international implication it should compel us to confront) are too often left out of the tediously unsearching but surprisingly resilient mainstream accounts of genocide and conflict in the region which continue reduce it to identity and local “intercommunal” tensions.

“Civilizational” Dam Construction and Drowned Socioecological Worlds

The exploitation of water resources can be situated within similar ecologically destructive, class-based predatory patterns. In the context of the increasingly hegemonic neoliberal policies of the last few decades, according to Casciarri, water resources in Sudan have been targeted as part of a more general “great transformation” seeking to turn common spaces, goods, and rooted local forms of communal ownership and management into marketized commodities.⁸⁶ Ambitious hydro-engineering projects have radically carved up landscapes, violently disrupting ecosystems and the life patterns of groups living in intimate relation with them. Here I discuss in particular the Jonglei Canal and Sudan’s Dam Program led by the (recently dissolved) Dam Implementation Unit (DIU). The former has particularly affected the Nilotic-speaking peoples, the latter has had devastating impacts on the Nubian peoples. The Beja in the east have also been badly affected.

Like the expansion of mechanized agriculture, patterns of water exploitation in Sudan have roots in the British colonial period.⁸⁷ Similarly facilitated by discourses of modernization and development, these projects have again met with resistance. The Jonglei Canal was one of the earliest colonial grand schemes to develop Sudan’s water resources. Traversing the Sudd, one of the world’s largest freshwater wetlands, the aim of the Canal was to reduce evapotranspiration loss, consolidate control of the Nile, and provide water resources for irrigation to the North and Egypt.⁸⁸ According to Burton, during the colonial period the Canal became a physical symbol of the British colonialists’ “civilising mission.”⁸⁹ It was seen as a “second gezira.”⁹⁰ Yet it was also known that the Canal would have potentially devastating impacts on both the environment and the Nilotic communities living in

⁸⁴ Ibid., 9.

⁸⁵ IRIN, “Sudan: Rich Farms, Conflict and Climate Change,” 22 May 2008, <https://www.refworld.org/docid/4836929b26.html>.

⁸⁶ Casciarri, “Water Management among Sudanese Pastoralists: End of the Commons or ‘Silent Resistance’ to Commoditization?” in *Multidimensional Change in Sudan (1989-2011)*, Barbara Casciarri, Munzoul A. M. Assal, Francois Ireton eds. (Oxford: Bergahn Books, 2015): 140–160, 140–1; Anne-Sophie Beckedorf, *Political Waters: Governmental Water Management and Neoliberal Reforms in Khartoum/Sudan* (Forum Politische Geographie, 2012).

⁸⁷ And also, to some extent the Turko-Egyptian colonial period (1821–1885) when a large irrigation canal was constructed to support cotton production in Kassala.

⁸⁸ Historically, there has been much cooperation between Sudan and Egypt over use and allocation of water resources. See Harry Verhoeven, “Black Gold for Blue Gold? Sudan’s Oil, Ethiopia’s Water and Regional Integration,” Chatham House Briefing Paper (June 2011), 19.

⁸⁹ Burton, “Development and Cultural Genocide,” 516.

⁹⁰ George Tombe Lako, “The Jonglei Scheme: The Contrast Between Government and Dinka Views on Development,” in *Sudan: State, Capital and Transformation*, eds. Tony Barnett and Abbas Abdelkarim (London: Routledge, 2017 [1988]), 87.

and depending on the region, in particular the Dinka, Nuer, Shilluk, and Atuot. The Nilotic groups are semi-nomadic and predominantly agro-pastoral. They rely on seasonal cattle herding during the dry season and grain growing in the rainy season. Livestock, especially cattle, are central to their culture and worldview and have great economic, social, symbolic, and even religious importance. The largest groups are the Dinka and the Nuer. What is particularly important to emphasize here is that these groups' distinctive socio-cultural organizations, identities and economic formations have developed in relation with the specific lands and ecologies of the Sudd, which shape and sustain them.

The prospect of the Jonglei Canal and its inevitable impacts on the environment stirred deep fear and resentment. These included water loss, an increase in diseases such as malaria and bilharzia, barriers to the free movement of people and their herds, loss of game animals, and flooding of local habitats.⁹¹ Other adverse environmental consequences of the project included the depletion of fish supplies and desertification of the area due to reduction in convectional rainfall caused by the large wetlands.⁹² Work towards completion of the canal during the colonial period was limited and halting. The project was subsequently taken over by the post-independence northern Sudanese elite with the help of a French company which owned the world's biggest excavator.⁹³ It was again pushed forward despite awareness of the deep and potentially irrevocable damage that would be caused to the local ecology, in addition to the damage to the "ways of life and modes of livelihood, of the peoples whose territory it will traverse."⁹⁴ Like many of the other ecologically destructive projects discussed so far, it was under Nimieri in the 1970s – Sudan's "boom" years – when intensive excavation and dredging of the canal project began.⁹⁵

The crisis of pastoralism precipitated by construction of the canal displaced increasing numbers of southerners. Pushed into northern regions of the country, they fell under control of the central government and became "property-less peasants" in the irrigation schemes around the Nile.⁹⁶ From the perspective of Khartoum, the "problem" of the peoples of the south thus "evaporate[d] along with the ecology that once sustained their livelihood."⁹⁷ Many in the south saw the canal as just another way in which the country's elites were plundering and transferring resources from their homelands in the south to the north. They feared the canal would "suck all the water from other tributaries and the sudd, destroying their ability to water their cattle in all seasons."⁹⁸

Echoing dynamics highlighted above in the context of mechanized agriculture, those affected also anticipated how these ecologically-disruptive processes would lead to increased vulnerability to food and water shortages, and escalate local conflicts over grazing and water resources as herders would be forced into crowded areas along the edges of the canal.⁹⁹ Government disregard towards the affected Nilotic communities was revealed in their support for the "radical transformation" that the Canal would

⁹¹ As summarized in Burton, "Development and Cultural Genocide," 517.

⁹² Lako, "The Jonglei Scheme," 93.

⁹³ Burton, "Development and Cultural Genocide," 515.

⁹⁴ Ibid.

⁹⁵ Ibid., 516; Lako, "The Jonglei Scheme," 85.

⁹⁶ Burton, "Development and Cultural Genocide," 516.

⁹⁷ Ibid., 517.

⁹⁸ Human Rights Watch, *Sudan, Oil, and Human Rights*, 376.

⁹⁹ Lako, "The Jonglei Scheme."

entail for the physical/ecological and socio-economic foundations of these groups.¹⁰⁰ If communities resisted or rejected the wholesale transformation of their rural semi-nomadic ways of life, for officials associated with Khartoum's development networks and agenda, this could only be because they did not "know what was best for them."¹⁰¹ Development and modernization were non-negotiable, even if they were synonymous with forced relocation and the complete fragmentation of existing modes of life and social organization. As Sudan's Southern Regional President said during an Assembly discussion of the Jonglei Canal: "If we have to drive our people to paradise with sticks, we will do so for their good and the good of those who come after us."¹⁰² It is therefore not surprising that strong resistance to the Jonglei Canal developed from the late 1970s. The outbreak of open conflict in 1983, which marked the beginning of the second civil war between the north and southern forces of the Sudan People's Liberation Army (SPLA), stopped work on the canal temporarily. In fact, the digger at the canal was one of the first targets of southern rebels at the outbreak of the conflict, and SPLA leader John Garang wrote his PhD thesis on Jonglei Canal, describing development planning in the region as "misery management."¹⁰³

Abandoned for two decades, plans by Sudan and Egypt to resume the old colonial project of digging the Jonglei Canal were revived in 2008. Concerned voices continued to warn of how interference with the vast marshlands could "trigger abrupt and far-reaching ecological changes."¹⁰⁴ By draining large parts of the wetlands and increasing the flow of the Nile waters northwards, Sudan and Egypt both stand to reap substantial benefits, whilst the south (which became independent South Sudan from 2011) would experience multiple ecological and social harms. Some have compared the Jonglei Canal to the assault on the Marsh Arabs on southern Iraq.¹⁰⁵ Although the future of the project for now remains uncertain, there is ongoing pressure from the north and Egypt to push it forward.¹⁰⁶

Discourse around construction of a network of dams across Sudan mirrored the civilizational rhetoric that emerged around the construction of the Jonglei Canal. Indeed, the Dam Implementation Unit (DIU) has long extolled the benevolent "modernizing" influence of dam constructions. However, dam building and management has overwhelmingly benefited the northern Arabized riverain elite that has been politically, culturally, and economically dominant since independence. Dam constructions have destroyed ecosystems and caused massive forced displacements. Homelands and villages, and the long

¹⁰⁰ Lako, "The Jonglei Scheme"; George Tombe Lako, "The Impact of the Jonglei Scheme on the Economy of the Dinka," *African Affairs* 84, no. 334 (1985): 15–38.

¹⁰¹ To quote an official of the Executive Organ. Cited in Lako "The Jonglei Scheme," 86.

¹⁰² Quoted *Ibid.* See also Lako on the "enlightenment campaign" launched to convince local inhabitants around the canal zone of its benefits, Lako, "The Jonglei Scheme," 87.

¹⁰³ Cited in Douglas Johnson, *The Root Causes of Sudan's Civil Wars* (Kindle Edition: James Currey, 2016), location 1821.

¹⁰⁴ Adil Mustafa Ahmad, "Post-Jonglei Planning in Southern Sudan: Combining Environment with Development," *Environment and Urbanization* 20, no. 2 (2008): 575–86, 575; Jacob K. Lupai, "Jonglei Project in Southern Sudan: For Whose Benefit is it?" *The Sudan Tribune*, 28 May 2007; Charlie Furniss, "Draining Africa's Eden: As Humanity's Thirst Grows, Natural Ecosystems are Coming under Increasing Pressure," *Geographical* 82, no. 4 (2010); Koang Tut Jing, "Jonglei Canal Project is a Looming Catastrophe," *Gurtong*, 8 September 2006.

¹⁰⁵ Ahmad, "Post-Jonglei Planning," 583. See also the contribution by Cara Priestley in this issue.

¹⁰⁶ Discussions around the Jonglei Canal are also now shaped by the regional politics around the Grand Ethiopian Renaissance Dam (GERD). Whilst South Sudan remains opposed to the former, Sudan and especially Egypt are pushing for it to be resumed; the GERD threatens Egypt's water supply from the Nile. Local communities and researchers continue to sound the alarm about damaging ecological consequences.

histories and distinctive cultural identities embedded within them have been forcibly and often violently submerged. For example, in the 1960s, around 80,000 were displaced by construction of the Roseires Dam on the Blue Nile. The Aswan High Dam in the same decade displaced some 50,000–70,000 Nubians. Their villages were completely flooded, threatening “cultural disintegration.”¹⁰⁷ Archaeologists have speculated the project destroyed many ancient relics.¹⁰⁸

More recently, in 2008–9, the Merowe Hydropower Dam project led to the forced “relocation” of around 60,000 Nubians from the Shaiqiyya of Hamdab (eight per cent), Shaiqiyya of Amri (twenty-five per cent) and Manasir (sixty-seven per cent) communities.¹⁰⁹ The Manasir community, which relies on fertile areas along the bank of the Nile, has been particularly affected. Their traditional, self-sufficient methods of cultivation and distinctive cultural life are “inseparably connected to the rocky riverine landscape of the Fourth Cataract. [...] [M]uch traditional knowledge and many skills will be lost forever.”¹¹⁰ The cultivation of date palms, which are well adapted to the arid climate, is particularly important; in addition to the edible fruits, the whole of the tree is used in different ways for its raw materials. Date palms are also the main cash crops, and a source of nutrition. Moreover, as reflected in many local traditions and saying, the date trees are important sources of “pride and belonging” – they are status symbols and a special point of connection between the tree owner and his ancestral lands.¹¹¹

With the complicity of the German company, Lahmeyer, tens of thousands of people were “forcibly flushed out” from their villages with no warning while they were still living in the reservoir area.¹¹² The forced displacement, flooding, and loss of livelihoods and lands has led to “economic dislocation and impoverishment”; but more than this, it has precipitated a “profound existential crisis.”¹¹³ Calls for compensation have been ignored, as have the communities’ efforts to have a say on resettlement location. But in any case, the deep cultural and social significance of the palm trees for the Manasir make it “inconceivable to receive monetary compensation in exchange” – in ordinary circumstances selling land or date trees was considered a “disgrace.”¹¹⁴ Community activists have argued that relocation sites for the Merowe dam “are nothing but villages in the desert far away from their homelands” in which older generations will struggle to adapt, and younger generations have “no future.”¹¹⁵ According to a man from Manasir-land: “It is like a war, the flooding. First the date trees die, then the livestock, and then the people have nothing left to eat.”¹¹⁶ Thousands of those displaced by flooding have

¹⁰⁷ Ange Asanzi, “Fighting for Nubia’s Rich Culture,” *International Rivers* 19 (November 2015); Selby and Hoffman, “Beyond Scarcity,” 366.

¹⁰⁸ Yosra Akasha, “Sudan’s Anti-Dam Movement Fights the Flooding of Nubian Culture,” *The Guardian*, 12 December 2014.

¹⁰⁹ Valerie Hänsch and Miriam Saage-Maaß, “Responsibility Overseas and Accountability at Home: A New Kind of Legal Case in Germany Against Dam-Caused Displacement in Sudan” in *Challenging the Prevailing Paradigm of Displacement and Resettlement: Risks, Impoverishment, Legacies, Solutions*, eds. Michael M. Cernea and Julie K. Maldonado, (London: Routledge, 2018).

¹¹⁰ David Haberlah, “Cultural landscape of Dar al-Manasir,” in Claudia Naser and Mathias Lange, eds., *Proceedings of the Second International Conference on the Archaeology of the Fourth Nile Cataract*, Berlin, August 4–6 2005. *Meroitica* 23 (Wiesbaden: Harrosswitz Verlag, 2007): 159–78, 159.

¹¹¹ Haberlah, “Cultural landscape of Dar al-Manasir,” 162.

¹¹² Hänsch and Saage-Maaß, “Responsibility Overseas.”

¹¹³ Ibid.

¹¹⁴ Haberlah, “Cultural Landscape of Dar al-Manasir,” 163.

¹¹⁵ Verhoeven, *Water, Civilisation and Power*, 233.

¹¹⁶ Cited in Hänsch and Saage-Maaß, “Responsibility Overseas.”

migrated to the north for gold digging. According to one author, "The flooding of the Fourth Cataract has caused immense pain and sorrow for the affected people. Their world has been drowned, and the past has been wiped out."¹¹⁷

Government officials have declared people from these communities "backward."¹¹⁸ It has even been claimed the Dam Program offers opportunities for communities to evolve from "stone age conditions to modern accommodation."¹¹⁹ But such claims of benevolence and legality, Verhoeven asserts, are "certainly falsehoods."¹²⁰ Recently dissolved, the DIU was a powerful player in Sudan. It had its own militia and communities reportedly viewed it as a "state within a state."¹²¹ It has employed divide and rule tactics to deliberately fuel tensions and conflicts within communities.¹²²

The Nubians are threatened again by proposals to build the Dal and Kajbar dams. Both could displace up to 15,000 people. The reservoirs will submerge villages, fertile land, and hundreds of sites of cultural significance. As one NGO put it, the projects "profoundly threaten the cultural and social fabric of the Nubian people. Nubia's traditional spirits are centred on the Nile: the river is believed to hold the power of life and death."¹²³ "By flooding the last remaining Nubian land," writes one individual displaced by the Aswan Dam tragedy and now anticipating the consequences of the Kajbar dam, "the Nubians are reduced to a group of people with no sense of memory, no past and no future to look for."¹²⁴ The dispersal of communities threatens to undermine their collective integrity and foundations.

Government forces have opened fire on residents protesting the dams. Community leaders have been imprisoned and a number of military camps established close to Manasir villages.¹²⁵ In the context of such intimidation and brutal displacement, Masanir communities have expressed fears of experiencing a "second Darfur."¹²⁶ There have also been attacks on the date palms in Kajbar with reports of some 200,000 trees destroyed.¹²⁷ Some see this as an attempt to displace these communities by depriving them of their wealth and resource base. For activists and residents opposing the dams, therefore, the fight is about much more than environmental destruction. It is also about the continued existence of Nubian cultural fabric and heritage. Sudan's expanding dam programme is seen as an attack on peripheral communities and their irreplaceable livelihoods. Some see it as a "de facto genocide, a plot by the Awlad al-Bahr elite to annihilate Nubian culture," in the same way that the Jonglei Canal was seen as a genocidal assault on Nilotic peoples.¹²⁸ A member of the Anti-Kajbar committee commented that the dams were being used to "flood Nubian culture."¹²⁹ The Nubians of the region fear

¹¹⁷ Henriette Hafsaas-Tsakos, "Ethical Implications of Salvage Archaeology and Dam Building: The Clash Between Archaeologists and Local People in Dar al-Manasir, Sudan," *Journal of Social Archaeology* 11, no. 1 (2011): 49–76, 70.

¹¹⁸ Hänsch and Saage-Maaß, "Responsibility Overseas."

¹¹⁹ Verhoeven, *Water, Civilisation and Power*, 232–3.

¹²⁰ Ibid.

¹²¹ Hänsch and Saage-Maaß, "Responsibility Overseas."

¹²² Ibid.

¹²³ Asanzi, "Fighting for Nubia's Rich Culture."

¹²⁴ Arif Gamal, cited in Peter Bosshard, "New Chinese Dam Project Fuels Ethnic Conflict in Sudan," *International Rivers*, 20 January 2011.

¹²⁵ Hänsch and Saage-Maaß, "Responsibility Overseas."

¹²⁶ Ibid.

¹²⁷ Akasha, "Sudan's Anti-Dam Movement".

¹²⁸ Verhoeven, *Water, Civilisation and Power*, 234.

¹²⁹ Quoted Ibid.

the dam will “drown” their history and “disperse a group of people whose identity is tied to this land.”¹³⁰

Oil-induced Devastation and Displacement

Throughout the 1970s, rural, semi-nomadic and subsistence communities in southern Sudan increasingly became victims of state and militia violence, degradation of their environments, and forced displacement due to oil exploration, notably by the US company Chevron. This continued for several decades, supported by successive Sudanese governments and leaders in coalition with several multinational corporations. To “clear” the land of inhabitants in the initial exploration areas, such as Upper Nile, the government employed methods highly similar to those used to depopulate land for agricultural schemes. “Scorched earth” tactics were adopted, involving joint attacks by government troops and Arab(ized) militias. “Tribal” militias were often recruited by the security personnel of local landowners and oil companies.¹³¹ Given the long history of oil exploration, it is sobering to read the observations of a 2007 UNEP environmental assessment for Sudan. This report noted that the exploration process, despite being unsuccessful in over 90 percent of cases, can have the “greatest impact on the environment of all the phases of oil production” and create destructive ecological legacies that can “last for generations.”¹³²

In the late 1970s, Chevron found oil in Bentiu. With this, the internal colonial resource extracting bourgeoisie class started to exploit a “new form of wealth in the South to add to those of land and water.”¹³³ Into the 1980s, southern populations became victims of a “two-pronged strategy” of “division and displacement” by the Nimeiri government in order to clear areas to control the production of oil.¹³⁴ As detailed by Human Rights Watch, the tactic was to “conceal the hand of the government by encouraging proxies – land-hungry neighbours – to attack the agro-pastoralists of the oilfields.” Having “thinned out” the population, the government would erect a “cordon sanitaire” around oil producing areas for foreign oil companies “to exploit in peace and security – while those who had lived for generations on the land were robbed of their peace, security, homes, animals, crops, families, and often their lives.”¹³⁵

At the outbreak of the second civil war in 1983, some of the first attacks by the Sudan People’s Liberation Army (SPLA) targeted the operations and infrastructure of the oil companies. Subsequently, oil operations in the south largely halted for a number of years. They resumed under al-Bashir in the 1990s with massive depopulations occurring again, notably in the oil concession areas around Bentiu in Unity State.¹³⁶ Multinational oil companies, notably the China National Petroleum Company (CNPC), Petronas of Malaysia, and Talisman Energy of Canada (collectively known as the Greater Nile

¹³⁰ Reem Abbas, “Sudan Nile Dam Threatens to Drown Nubian Villages,” *Al-Monitor*, 14 May 2013.

¹³¹ Suliman, “Eighteen Years.”

¹³² United Nations Environment Programme (UNEP), “Sudan: Post-Conflict Environmental Assessment” (Nairobi: UNEP, 2007), 149–50.

¹³³ Suliman, “The Impact of Ecological Degradation,” 20.

¹³⁴ Human Rights Watch, *Sudan, Oil, and Human Rights*, 50–1.

¹³⁵ Ibid.

¹³⁶ Luke Patey, *The New Kings of Crude: China, India, and the Global Struggle for Oil in Sudan and South Sudan* (London: C. Hurst and Co. Ltd., 2014).

Consortium), secured lucrative contracts with Khartoum. Oil money provided a new source of economic strength that enabled the al-Bashir regime to remain in power and to expand its militarized machinery of ecological plunder and violence. As Alison Ayers puts it, with the advent of oil exports in 1999, the ruling elite in Sudan has essentially acted as the “agent of foreign corporate interests” in the country, reaping the benefits “for its own class interests through rentier activities parasitic on Western and Asian capital.”¹³⁷

De Waal has highlighted an episode of militia-driven massacre and mass displacement (1997–2000) to clear the southern oilfields and Bahr el Ghazal as genocidal in nature.¹³⁸ In these attacks the Sudanese army again operated in concert with militias. These operations involved “extreme violence and scorched earth tactics.” Islamist slogans and racist discourses often accompanied government mobilization for these oilfields campaigns. The objective of the campaigns, as De Waal writes, was “straightforward”: the exploitation of resources. These campaigns were also supported by Chinese and other foreign oil companies. Their “success”, De Waal argues, was in large part due to the government’s willingness to take such extreme violent action in removing whole civilian population from key areas; as the “transport, security, and oil infrastructure went in, the population was cleared out. It was the largest scale of successfully forced relocation of the entire war.”¹³⁹

In 1999, when oil production rapidly expanded, Sudanese environmentalists warned that CNPC’s methods of extraction were causing water contamination which would leak back into underground waters. The Sudanese Environmental Conservation Society (SECS) also complained their warnings of ecological hazards caused by the project were completely ignored.¹⁴⁰ The oil industry was criticized by ecologists for failing to carry out analyses of environmental impacts. They highlighted the potential negative effects of the pipeline on the ability of wildlife to access water, the potential for the Nile to be contaminated by overspills, and the pollution threat caused by dumping of oil waste.¹⁴¹ Evidence of the damaging health and environmental impacts of oil industry activity has continued to mount. The absence of adequate environmental regulations has facilitated a situation in which wastewater is not properly processed, and chemicals used for drilling were disposed of in unprotected areas.¹⁴² A German NGO reported in 2009 that oil operations in southern Sudan were contaminating water supplies, affecting at least 300,000 people in Unity State. Following complaints from local villagers that the water had made them ill and tasted unusual, the report found evidence of life-threatening metals in water wells near major oil fields, warning the potential effects on health could be “devastating.”¹⁴³ The report also sounded the alarm over the broader environmental implications for the Sudd swampland region. More recently, the ongoing legal action against the Swedish oil company, Lundin, for its role in the commission of war

¹³⁷ Ayers, “Sudan’s uncivil war,” 165.

¹³⁸ De Waal, “Genocidal Warfare.”

¹³⁹ Ibid, 545.

¹⁴⁰ As summarised in Human Rights Watch, “Sudan, Oil, and Human Rights,” 377.

¹⁴¹ Ibid, 378.

¹⁴² Wim Zwijnenburg, “South Sudan’s Broken Oil Industry Increasingly Becoming a Hazard,” *New Security Beat*, May 2 2016, <https://www.newsecuritybeat.org/2016/05/south-sudans-broken-oil-industry-hazard/>; Human Rights Watch, “Sudan, Oil, and Human Rights,” 379; European Coalition on Oil in Sudan (ECOS), “Unpaid Debt: The Legacy of Lundin, Petronas and OMV in Block 5A, Sudan 1997-2003,” (Utrecht: ECOS, 2010).

¹⁴³ Peter Greste, *BBC News*, “Oil ‘polluting South Sudan water,’” 16 November 2009: <http://news.bbc.co.uk/1/hi/world/africa/8363024.stm>.

crimes and crimes against humanity in Unity State during the period 1997–2003 is of great significance. The report by the European Coalition on Oil in Sudan (ECOS) makes a strong and detailed case for criminal prosecutions and compensation for victims. Although environment damage is not a substantial part of the listed damages, this case could have far-reaching implications.¹⁴⁴

Conclusion

From large-scale mechanized agriculture, to dam constructions, irrigation schemes, and oil exploitation, violently transformative projects of development involving the commoditization and extraction of natural resources have been synonymous with human, socio-cultural and ecological devastation in Sudan. This article has mobilized a particular interpretation of the genocide-ecocide nexus framework in order to illuminate these neglected dynamics, arguing that the emergence of such a nexus can be seen most strikingly from the 1970s. Moving beyond a focus on single types or discrete episodes of ecological destruction, it sought to stretch the framework over a broader historical and geographical canvas, situating multiple intersecting processes of ecocide and genocide as fundamentally connected to a common, evolving (although sometimes uneven), long-term process of (neo)colonial-capitalist expansion. Throughout the discussion, the article highlighted neglected threads of interconnection between environmental harms, genocide, capitalist encroachment and the structuring force of anti-Black racism and Arab supremacist civilizational discourses.

The overall picture of genocide that emerges from the analysis is not one of a “simple pattern of violence by a single ‘perpetrator’-state or -regime against a single ‘victim’ population group.”¹⁴⁵ Rather, perpetrators and victims are multiple and structurally constituted, and “genocide” cannot be analytically contained in punctuated temporal or isolated geographical locations. Neither can it be reduced to ideology, counterinsurgency campaigns or communal “ethnic tensions” (although all of these come into play in different ways). Instead, this article has conceptualized genocide as a long-term systemic phenomenon inherently connected to racialized class-based development-driven ecological destruction in ways that are direct and immediate as well as indirect and attritional. It drew attention to how ecological destruction in Sudan not only violently fragmented discinctive socioecological worlds, but also how it contributed to the structural conditions for protracted and evolving forms of genocide over several decades.

The aim of the article has certainly not been to endorse a simplistic reduction of genocide in Sudan to a single narrative centred on ecological destruction, nor to gloss over the multiple layers, complexities and regional specificities of political conflict and violence in the country. Such complexities and contextual specificities have largely been beyond the scope of the present argument, which has focussed on drawing out long-term patterns and continuities. Nevertheless, what emerges more sharply when we view events in Sudan specifically through the lens of the genocide-ecocide nexus and its attendant

¹⁴⁴ ECOS, “Unpaid Debt.”

¹⁴⁵ Martin Shaw, “From comparative to international genocide studies: The international production of genocide in 20th-century Europe,” *European Journal of International Relations* 18, no. 4 (2011): 645–68.

racial-spatial dynamics, is a clearer sense of the constitutive character of development-driven ecological destruction to a systemic pattern of genocidal social death across the whole country. Environmental destruction and degradation are not simply “techniques” to implement a pre-existing genocidal plan, or additional “methods” of destruction overlooked by Lemkin. Rather, ecocide and its genocidal corollaries are structurally rooted in the underlying logic of a (neo)colonial-capitalist system of extraction.

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