A global perspective is needed to protect environmental defenders

Recently publicized killings of environmental defenders are the latest iteration of a long and tragic history of violent conflict over access to land and resources. To bring about effective change, we must first understand the drivers and conditions that lead to violence in the sphere of environmental and land conflict.

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The non-governmental organization Global Witness reported that 197 people were killed in 2017 while defending their land and environment[1]; 201 were killed in 2016 and 185 in 2015. Raising awareness is a necessary step towards resolving such conflicts, but it is also essential to recognize that current conflicts are the latest iteration of a tragically long history of violence over land use and resource exploitation[2–4], and that today's market-centred development agendas still give little credence to local or indigenous management systems or land and use rights. Violence against environmental defenders transcends local conflicts, and lasting solutions must take account of the broader historical, social and political contexts[5].

Defenders of land and resources

Global Witness defines environmental defenders as 'people who take peaceful action to protect land or environmental rights, whether in their own personal capacity or professionally'. Yet not all disenfranchised people defending land and resource rights are protectors of the environment. In Borneo, Brazil and the Congo Basin, for example, local communities clear forests to secure rights over land or resources, and community-based forest management has led to overexploitation and internal conflict[6–9] (see Box 1). That said, many examples exist of rural communities that resist the exploitation of lands and resources by external agents. Often in conjunction with non-governmental organizations, these communities have adopted land practices that sustain local economies while maintaining tree cover and biodiversity[10,11].

Moreover, the extent and intensity of land use by resident rural communities is dwarfed by large mining, logging and agricultural interests. These are the proximate drivers of landscape transformation, and of the conflicts that arise from such change. The resistance of rural communities to these powerful interests can be viewed as a defence of more environmentally benign land-use practices, even if environmental issues are secondary to social concerns. The work of environmental defenders should be seen as a struggle over control of land and resources, which is often, but not necessarily, coincident with environmental protection.

Fig. 1 | A mural in Panama celebrating the life of environmental activist Berta Cáceres. Credit: hanohikirf/Alamy Stock Photo.

Historical contexts

Violence and forced displacement preceded the enclosure and privatization of land in Europe that began in the sixteenth century. Concurrent European colonialism dehumanized, displaced and decimated indigenous peoples worldwide. In the centuries since, governmental failures to recognize traditional rights when allocating concessions and development permits have continued to fuel conflicts over land and resources (see Box 1). Such failures may reflect a lack of capacity to manage peripheral areas, but more often relate to the alignment of government interests with those of large-scale development. The struggle of marginalized communities to have their rights and values acknowledged highlights the destructive social and environmental impacts of poorly regulated development.

The history of conservation is also besmirched by the dislocation of indigenous peoples and local communities[12,13], often involving violence[14,15]. The establishment of many national parks and reserves, such as the Omo and Mago parks in Ethiopia and the Mkomazi Game Reserve in Tanzania, led to evictions, internal dislocation and loss

Box 1 | Conflict hotspots

Brazil. Indigenous and immigrant local communities in the Brazilian Amazon have struggled for recognition of their traditional lands and livelihoods since European arrival. By the mid-nineteenth century, smallholder rubber tappers were pitted against powerful consortia of rubber barons, and bonded labour was maintained by the threat or practice of violence. Following the collapse of the price of Amazonian rubber after the Second World War, rubber tappers were evicted and land titles were allocated to ranchers and speculators. In the late 1970s, the tapper Chico Mendes led a movement against the ranchers that culminated in the protection of millions of hectares of forest, but only after violence against thousands of rubber tappers and some ranchers[4]; Mendes himself was assassinated on 22 December 1988. Since then, political and social justice movements have emerged in response to agrarian conflicts and tenure insecurity. In 2009, the Xingu Vivo Movement established representation in Belém to spearhead the struggle against the Belo Monte dam, by raising awareness among the metropolitan population and by networking partner organizations[33]. But local activism continues to incur great human and social cost, and Brazil remains the most dangerous place to be an environmental defender[34].

Borneo. Since the 1950s, the Penan and other Dayak groups living in Borneo's forest have been subject to government-facilitated 'development programmes', ostensibly to alleviate poverty. Although wellbeing has improved for many local people, there has also been widespread social transformation and loss of identity. This can be attributed to the alignment of the interests of the programmes with those of transnational corporations, which have exploited and expropriated the region's forests and resources with little regard for communal management systems. In 1987, the Penan lodged complaints with the Malaysian government, but a lack of government response prompted direct action, including blockades of logging roads. The blockades were declared illegal, and several hundred Penan were imprisoned in the succeeding years. Logging, conversion and flooding of Penan forest lands continues today, as does conflict.

Democratic Republic of the Congo. In Africa, the most publicized cases of environmental conflict are of violence against park rangers, working to prevent poaching and other illegal activities. The Virunga National Park, in the Democratic Republic of the Congo, is famed as the home of a substantial number of the critically endangered mountain gorilla. The surrounding region, both densely populated and rich in mineral resources, has seen decades of fighting, stemming in part from perceptions of historic injustices relating to the creation of the park[15,35]. Local people who illegally exploit resources within the park are protected by local militias in conflict with park rangers and the Congolese army[15,35]. The Virunga Alliance, a public–private initiative financed by the park and international donors, seeks to create employment opportunities through development projects, which it is hoped will deflect people from illegal activities. Such an approach does not, however, fully acknowledge the historical context[15]. In April 2018, five Virunga rangers were reportedly killed by local militia, followed by two more killings in May, raising the total toll of killed rangers in Virunga alone to 175 over the past 20 years[34]. The number of people killed by rangers has not been reported.

of livelihood for thousands of people[15–18]. Still today, many local people face arrest, dislocation and death as they try to maintain ancestral homes and traditional livelihoods in areas of conservation attention. Conservation has generally been framed by ecological perspectives, and the prevailing focus on conserving intactness frequently neglects the history of peoples' stewardship of land, and denies the cultural values embodied in landscapes[16]. Conservation has, however, begun to embrace participatory decision-making[17], and the value of traditional ecological knowledge and community-based conservation is gaining wider currency[18–20].

The role of good governance

The concerns of rural communities and indigenous peoples regarding land use have only recently received greater visibility and support, and these groups still need better representation in international decision-making on this issue. The United Nations (UN) General Assembly's adoption of the Declaration of the Rights of Indigenous Peoples in 2007 gave indigenous peoples an international foundation to defend their territories, resources and cultures[21]. In March 2018, the UN Environment Programme launched its defenders policy to promote solutions for the protection of environmental defenders[22]. Implementation of the 2007 declaration principles has been limited[23], and it is too early to assess the impact of the defenders policy. However, there are some examples of traction, such as the Permanent Indigenous People's Committee of the Forest Stewardship Council (FSC), a voluntary accreditation scheme. In addition to standards that ensure rights of workers and local communities, holders of FSC certificates must commit to honouring indigenous peoples' legal and customary rights of ownership and management of land. The participatory process of FSC decision-making and the inclusion of free prior and informed consent of indigenous peoples and local communities aims to reduce conflict (although there has been no evaluation of its effectiveness in doing so). To realize the UN defenders policy, such initiatives need to be mainstreamed across business sectors.

The Cameroonian philosopher Achille Mbembe argues that global financial agencies are a root cause of land conflicts by creating conditions for the "privatization of [political] sovereignty"[24]. Within this framework, international financial institutions and companies might risk being linked to development-related violence. International companies must bear shared responsibility for the actions of their local contractual partners, and must invest in due-diligence processes to ensure that their investments do not drive local conflicts. Transparency and public scrutiny of such partnerships provide leverage to concerned citizens to improve business practices towards more-benign development cultures. Indeed, Global Witness and others have noted that recent divestment by investment banks from land development contracts has followed media exposure of alleged uncompensated forced land grabs and human rights abuses by partner companies[25].

Market-based approaches to reduce climate change are creating new commodities in the form of carbon and biofuels, as well as renewed impetus for forest protection and restoration. These 'green' markets are, however, mostly maintained by the same political and industrial complexes that typify current exploitative land uses[26], and they risk repeating past histories of rural exclusion and dispossession[27,28].

In many countries, the legal system is often inaccessible to environmental

defenders, or is corrupt and weak in bringing individuals and companies to justice. Crimes against environmental activists may be reframed as being unconnected to their environmental ideals to divert attention. The criminal justice system has also been used to silence activists. For example, the conviction in October 2017 of Raleva, a Madagascan farmer, for 'use of false title' was denounced by civil society groups who claimed that Raleva was being silenced for exposing non-compliance of a gold mining company[29]. The Environmental Defender Law Center, based in the United States, provides legal advice to environmental defenders around the world, and has secured thousands of hours of pro bono legal representation in environmental defence cases. But one single such organization can only reach so far.

Exposing environmental conflict

Investigative journalism plays a crucial role in showing governments and companies that human rights violations linked to environmental defence will be exposed before the international community. *The Guardian* newspaper's current collaboration with Global Witness to expose violence against environmental defenders is one such example. Yet reported cases are a fraction of the violence occurring around the world that is attributable to struggles for recognition of environmental rights, and international publicity is all too often only generated after the death of an environmental defender. For example, action against the Agua Zarca dam in Honduras by the Lenca people, led by Berta Cáceres, succeeded in persuading the Chinese hydro engineering firm Sinohydro to withdraw from the project in 2013, but only after Tomas Garcia, a Lenca protestor, was killed by the Honduran military during a protest. In March 2016, Berta Cáceres was murdered by unidentified gunmen in an assassination that her family linked to her activities against the dam[30], but her lifetime's work in galvanizing local and global environmental movements has continued after her death (Fig. 1). It must also be recognized that reporting on these issues is itself risky, not least to reporters themselves, as has been tragically shown by the recent murders of journalists Soe Moe Tun in Myanmar, Ricardo Monlui Cabrera in Mexico, and Karun Mishra and Sandeep Kothari in India.

The international community, including the conservation sector, has moved a long way towards recognizing the legitimacy and morality of more equitable socio-environmentalism focused on regional strategies to assure livelihoods and recognize historical claims. Companies increasingly accept social and environmental responsibilities, to which they are more easily and readily held accountable through national and international laws. Yet there are still ample grounds for improvement. Government and legislative branches need to ensure that principles of free prior and informed consent are appropriately and transparently implemented when land use affects indigenous and other local communities. Companies that have inappropriately secured access to resources or land should be sanctioned. Platforms are needed to express social concerns without fear of retribution, and where solutions to conflicts can be negotiated with due regard to the law, and under the oversight of a fair judicial system. Marginalized communities need to be provided with real representation in national political arenas and global programmes. It is important also to recognize that in some cases it is also the aggressors, not only the victims, who are poor and marginalized.

The interconnectedness of our globalized world means that development projects in remote regions are often dependent on partnerships with companies and financial institutions in less remote regions. Public pressure can be brought to bear on these companies, but this depends on public awareness of the multifaceted causes of environment-related violence. Scientists are able to provide the relevant evidence base, and researchers should take the impetus from environmental defenders to pursue a deeper understanding of these issues for more informed and equitable decision-making. By uncovering the causes, processes and contexts of environmental violence, science, media and community activism can together change expectations of political, social and business responsibilities. The resulting change in social norms can, ultimately, deliver substantial shifts in behaviour[31,32]. Environmental defenders who bring attention to these issues are not only local heroes, but also potent agents of the social transformation that contemporary society needs to effect lasting environmental change. ❐

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References

1. *Environmental Activists* (Global Witness, 2018); https://www.globalwitness.org/en/campaigns/environmental-activists/
2. Klubock, T. M. *La Frontera: Forests and Ecological Conflict in Chile's Frontier Territory* (Duke Univ. Press, Durham, 2014).
3. Boyer, C. R. *Political Landscapes: Forests, Conservation, and Community in Mexico* (Duke Univ. Press, Durham, 2015).
4. Hecht, S. & Cockburn, A. *The Fate of the Forest: Developers, Destroyers, and Defenders of the Amazon* (Univ. Chicago Press, Chicago, 2010).
5. Peluso, N. L. & Lund, C. *J. Peasant Stud.* **38**, 667–681 (2011).
6. de Blas, D. E., Ruiz-Perez, M. & Vermeulen, C. *Ecol. Soc.* **16**, 8 (2011).
7. Lescuyer, G., Cerutti, P. O. & Robiglio, V. *Forest Policy Econ.* **32**, 68–77 (2013).
8. Calfucura, E. *Ecol. Econ.* **145**, 18–26 (2018).
9. Terborgh, J. & Peres, C. A. *Land* **6**, 22 (2017).
10. Nepstad, D. et al. *Conserv. Biol.* **20**, 65–73 (2006).
11. Berkes, F. *Proc. Natl Acad. Sci. USA* **104**, 15188–15193 (2007).
12. West, P., Igoe, J. & Brockington, D. *Annu. Rev. Anthropol.* **35**, 251–277 (2006).
13. Agrawal, A. & Redford, K. *Conserv. Soc.* **7**, 1–10 (2009).
14. Neumann, R. P. *Polit. Geogr.* **23**, 813–837 (2004).
15. Verweijen, J. & Marijnen, E. *J. Peasant Stud.* **45**, 300–320 (2018).
16. Sarkar, S. & Montoya, M. *Biol. Conserv.* **144**, 979–988 (2011).
17. Redpath, S. M. et al. *Trends Ecol. Evol.* **28**, 100–109 (2013).
18. Chapin, F. S. et al. *Trends Ecol. Evol.* **25**, 241–249 (2010).
19. Berkes, F., Colding, J. & Folke, C. *Ecol. Appl.* **10**, 1251–1262 (2000).
20. Hunsberger, C. et al. *Can. J. Dev. Stud.* **38**, 305–324 (2017).
21. Bodley, J. H. *Victims of Progress* 6th edn (Rowman and Littlefield, London, 2015).
22. *Promoting Greater Protection for Environmental Defenders* (United Nations Environment Programme, Nairobi, 2018).
23. Ornelas, R. T. *Int. Indigen. Policy J.* **5**, 4 (2014).
24. Mbembe, A. *On the Postcolony* (Univ. California Press, Oakland, 2001).
25. *Deutsche Bank Divests from Vietnamese Land Grabber HAGL Following Global Witness' Expose* (Global Witness, 2013); https://www.globalwitness.org/en/archive/deutsche-bank-divests-vietnamese-land-grabber-hagl-following-global-witness-expose/
26. Dunlap, A. & Fairhead, J. *Geopolitics* **19**, 937–961 (2014).
27. Scheba, A. & Rakotonarivo, O. S. *Land Use Policy* **57**, 625–637 (2016).
28. Work, C. *Forests* **8**, 47 (2017).
29. Carver, E. *Madagascar Environmental Activist Convicted, Sentenced — and Paroled* (Mongabay, 2017); https://news.mongabay.com/2017/11/madagascar-environmental-activist-convicted-sentenced-and-paroled/
30. Watts, J. Berta Cáceres, Honduran human rights and environment activist, murdered. *The Guardian* (4 March 2016).
31. Young, H. P. *Annu. Rev. Econ.* **7**, 359–387 (2015).
32. Nyborg, K. et al. *Science* **354**, 42–43 (2016).
33. Peters, I. *Cohesion and Fragmentation in Social Movements: How Frames and Identities Shape the Belo Monte Conflict* (Springer, Wiesbaden, 2017).
34. *Deadly Environment: The Dramatic Rise in Killings of Environmental and Land Defenders* (Global Witness, 2014).
35. Marijnen, E. & Verweijen, J. *Geoforum* **75**, 274–285 (2016).

Competing interests

The authors declare no competing interests.