

CRIMINAL REDRESS IN CASES OF ENVIRONMENTAL VICTIMISATION: A DEFENCE

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ABSTRACT:

In recent years growing concern has been voiced in the environmental justice literature regarding the ability of criminal justice mechanisms to adequately address environmental harms, especially when such harms are perpetrated by large corporations. Commentators argue that criminal justice processes are often ill-suited to the particular features of environmental cases, where the chain of causation between wrongful actions/omissions and environmentally harmful consequence can be very complex and extend over the course of many years. As an alternative, many such commentators now favour the adoption of more administrative resolutions when corporate bodies breach their environmental obligations (which may or may not amount to 'crimes'). Others favour the use of civil sanction regimes, which is now the preferred approach of the UK Environment Agency. In this paper I will argue that the debate on how best to respond to environmental harm has so far neglected to factor in the perspective of the victims of those harms and, in particular, their need for redress. I will argue that by incorporating such a perspective, as opposed to focusing largely on questions of efficiency and cost-effectiveness, the criminal justice route still has much to recommend it, especially in relation to the provision of meaningful redress and/or compensation to the victims of environmental harm. Consequently, this paper will provide a victimological defence of the criminal justice process, and of criminal penalties, in their application to cases of environmental harms.

KEYWORDS:

Environmental crime; green victimology; compensation; redress

INTRODUCTION

This paper concerns an increasingly pressing issue: the response of formal justice mechanisms to the impacts of environmental crime on its (human) victims. The harms being vested on individuals and communities across the world through environmentally polluting practices – often at the hands of corporate entities – are increasingly understood and increasingly condemned by commentators within and beyond the academy. Nevertheless, the mainstream legal and criminological literatures, when they consider environmental harm at all, have tended to focus their attention on the procedural efficiency of different justice solutions or the deterrence effects on polluters (Lynch et al., 2010). Very little of this literature considers the victims of environmental harm directly and

none of it has systematically set out to compare different mechanisms of redress *from the victims' perspective*: along with how such redress might be better facilitated in all systems and what form such redress might take.

The present article seeks to remedy this extremely unsatisfactory and potentially re-victimising state of affairs. It also seeks to challenge a present trend amongst commentators of criticising and deprioritising criminal routes of responding to environmental harm (see White, 2011). In so doing, the paper will argue that whilst both administrative compensation schemes and (more recently) civil sanction regimes are now often touted as the 'best' means of responding to environmental crimes or harms, few if any of these discussions focus on the issue of facilitating redress to the victims *of* those harms. Nor have the prevailing debates encompassed the wider body of literature from the field of victimology, where arguments concerning the delivery of compensation and/or restitution to victims of crime have been developing for many years (see Miers, 1997; Zhang, 2008). In short, my argument is that much of the present literature has ignored victim redress and victim satisfaction with any justice processes as criteria against which these systems should be judged. My argument is that victimological understandings of what victims of crime require by way of redress and due process from a justice system point to the continued relevance of the *criminal* justice route to redress (or 'restitution') in cases of environmental victimisation, as well as prompting us to consider other reforms in both administrative schemes and criminal redress mechanisms.

A focus by *victimologists* on environmental crime (and the wider concept of environmental harm, to be discussed below) is one of the more recent outcomes of the broader development of 'green criminology' over the last twenty years (Hall, 2013). So far, however, there has been no systematic assessment or application of these broader victimological ideas to the question of redress for victims of environmental harm through civil, administrative or criminal justice processes. This paper sets out to correct this omission by scrutinising the options for redress open to victims of crime across a number of jurisdictions and offering the first systematic critical assessment of their suitability for use in environmental cases. In so doing the paper will critically examine the merits and demerits of civil litigation, administrative compensation schemes (both the public-funded and corporate-funded variety), civil sanctions regimes and criminal restitution mechanisms in offering redress to environmental victims. Having completed the analysis described above, the paper will then offer a framework for approaching redress in cases of environmental crime and wider environmental harm. In particular, this model will advocate the expansion of administrative compensation schemes beyond what is argued to be their current restrictive (often politically and economically-motivated) limits to embrace wider forms of environmental victimisation. Concurrently, I argue that restitution through criminal process still has a vital role to play both for its (potential) accessibility to a wider group of environmental victims, its ability to offer meaningful financial redress in cases of corporate polluters and for the symbolic impact the recognition of such harms as 'criminally wrong' can have both for victims and for society at large.

For the purpose of this discussion the term ‘compensation’ will generally be used to refer to monies paid to victims of environmental crime and harms by *states* from public funds. This will be contrasted to ‘restitution’, which will normally come from (corporate/individual) perpetrators (either as part of a criminal sanction or through an administrative scheme). I will refer to both terms collectively as ‘redress’. It should be noted that in the wider literature all these terms are used loosely and interchangeably. Furthermore, given that states may themselves be the perpetrators of (or at least contribute to) environmental harm (see Lynch et al., 2010) it cannot be assumed that all monies coming from public funds would constitute ‘compensation’ as it is understood here. Arguably it is precisely these kinds of conceptual uncertainties that have contributed to a situation where the question of redress for victims of environmental harm have not yet been the subject of detailed investigation by victimologists, criminologists or lawyers.

‘Environmental victims?’

This paper focuses attention on the avenues of redress available to individuals and communities affected by environmental degradation (perpetrated by human actions) which impacts negatively upon their health, economic, or social life. ‘Environmental victims’ will be used to encapsulate this group, although it must be acknowledged that the meaning and scope of that term is contested in the wider literature. Skinnider (2011) has highlighted the extremely broad range of impacts that environmental degradation can vest upon individuals and communities. Furthermore, the understanding adopted here might be criticised by green criminologists for its anthropocentric bias and a failure to incorporate more specifically the harm to non-human animals and the environment itself. Although questions concerning the use of redress mechanisms to ‘restore the environment’ will feature in the below analysis, the decision to focus here on *human* victims of environmental harm is largely driven by the recognition that, given this paper’s aim of adapting established victimological ideas to the ‘new’ issue of environmental harm, developing those ideas still further to encompass redress to non-human victims or to the environment itself (in its own right) would be a considerably larger undertaking beyond the limits of a single article. Such debates are however happening elsewhere in the green criminological/victimological literature (see Nurse, 2013). It is fully acknowledged however that the human victims who are the subjects of this discussion are in some ways merely symbolic of a far wider range of less anthropocentric victimisations occurring as a result of environmental crimes and harms.

In other respects, the understanding of environmental victims utilised here will be quite broad, extending beyond those affected by officially recognised environmental *crimes* to encompass wider environmental *harms*. In recent years, the new study of environmental victimisation has prompted victimologists (like criminologists) to reconsider radical arguments that social harms often derive from powerful social elites. Stretesky et al. (2014) have recently stimulated this discussion by adapting Schnaiberg’s (1980) ‘treadmill of production’ to the question of environmental offending. Their resulting ‘treadmill

of crime' theoretical model grounds environmental crimes, environmental harms and ecological destruction in general within the contemporary capitalistic imperative to increase production. It is the unimpeded pursuit of such production, the authors argue, that leads to what they refer to as 'green crimes': which they define widely as incorporating harms that are *not* officially criminalised. Consideration of victims not just of 'crime' but of what Article 18 of the 1985 UN Declaration of Basic Principles of Justice for Victims of Crime and Abuse of Power called 'abuse of power' has fallen notably behind discussions of crime victims even within the mainstream victimological literature.

As such the present discussion will recognise that many environmental harms/victimisations in fact serve the interest of corporate entities and the economic goals of the state (Lynch et al., 2010). This reflects the so-called 'social harms' approach advocated by critical criminologists who seek to problematize power relations in society influencing *which* socially harmful activities are labelled as 'criminal' (Tombs and Whyte, 2007). Key to Stretesky et al.'s (2014) thought however is that environmental harms are distinguishable from the wider ambit of 'social harms', and therefore merit particular treatment, because the former come about *as a result* of corporate and state actors prioritising capitalist interests above environmental concerns. When we speak about 'redress' for victims of environmental crime we are therefore frequently talking about redress for environmentally harmful activities perpetrated by corporations and by states themselves which are not officially 'crimes' at all. The implication of this, it is submitted, is that any theoretical approach seeking to map out routes of redress for environmental victims must incorporate redress for the kinds of activities succinctly described by Passas (2005) as 'lawful but awful' (p.1).

WHAT 'REDRESS' DO ENVIRONMENTAL VICTIMS WANT? WHAT DO THEY NEED?

There is presently a dearth of empirical research on what victims of environmental crime, or wider environmental harms, might actually want from a justice process: be it civil, criminal or administrative. In this we see the hallmarks of a much longer trend characterized by a lack of consultation with victims of crime themselves in the formation of ostensibly 'pro-victim' policies. It is a state of affairs that has long been the subject of criticism in the mainstream victimological literature across many jurisdictions. In the United Kingdom, for example, the 1964 introduction of the Criminal Injuries Compensation Scheme was largely based on a *presumption* that victims wanted it and indeed might turn to vigilantism without it (Rock, 1990). With the recent focus now on evidence-based policy-making (Lawrence, 2006) this continued lack of direct consultation with environmental victims is concerning. Hall and Shapland (2014) offer the explanation that more direct consultation by policy makers would mean confronting what victims themselves say and think, rather than 'using' them as exemplars of damaged people in line with Garland's (2001) view of 'the culture of control'. Of course, in this sense environmental victims are threats not only to lawyers and the state, but also to environmental activist groups wishing to attack states if (for example) it turns out that they desire only respectful

treatment, information, understanding and an apology as opposed to more retributive outcomes.

Given the above situation, green victimologists are at present forced to retreat to more theoretical discussion to anticipate what victims of environmental crime might need by way of redress for harms suffered. Whilst this is certainly unsatisfactory, the very lack of such a discussion in the literature so far precludes the development of empirical work and thus this paper is logical and necessary first step in a process leading to a more detailed and rounded understanding of what 'real' environmental victims actually think about justice and redress mechanisms.

On this point Lee (2009) has emphasised the importance of a holistic, welfare-based approach to environmental harms, rather than concentrating purely on financial compensation or restitution. As an alternative to simple, blanket, monetary compensation, Lee puts significant weight on the provision of long-term, tailored support and restoration packages in individual communities. Given that 'different localities inherit different cultural norms and characteristics' (p.29), Lee also emphasises the vital role of *local* government in developing and facilitating the delivery of such packages. Further indications that at least some victims of environmental harm need much more than simple monetary recompense can be found in a telling case study by Wheatley (1997), concerning the significant cultural impacts on Canadian aboriginal peoples following mercury poisoning of their traditional lands and food/water supplies. As the author observes:

Even after compensation was paid social problems persisted, especially in Whitedog, where solvents are smuggled into the community and 4 suicides were reported in the spring of 1995 (p.78).

The importance of non-monetary restitution is further underlined by the more established victimological literature which consistently holds that, in criminal justice systems, payments from *offenders* tend to carry greater symbolic value to victims of crime than monies allocated from taxation (Shapland, 2003). Malsch (1999) too has emphasised the importance of 'immaterial damages' for victims of crime and the complexities inherent in addressing these in the criminal justice context. Shapland (2003), having interviewed victims directly on the question of compensation/restitution, concluded that victims feel their pain and suffering has been duly recognised by the system when judges order offenders to pay restitution, constituting in their eyes a vindication of their 'victim status' (Miers, 1980). Indeed, emphasising so-called 'procedural justice' perspectives (Tyler, 1990; Tyler and Huo, 2002) such commentators have argued that victims' feelings of being fully *recognised* (as genuinely 'harmed') by a justice system along with the respect and courtesy afforded to them within it are the key drivers of their satisfaction with the process. Evidence of this attitude has been forthcoming both in qualitative studies like those of Shapland (2003) and in quantitative surveys of victims and witnesses in criminal proceedings (Angle et al., 2003).

Both theory and empirical evidence from the mainstream victimological literature therefore indicate that victims of (non-environmental) crime often care as much about how a justice system treats them than its instrumental outcomes, including any redress that might be forthcoming from that system. In relation to environmental victims the situation is markedly less clear due to the almost total absence of empirical research in which *these* victims have been directly questioned on what they would hope to take away from a justice system. Nevertheless, if we apply what we do know from the victimological literature it can be confidently asserted that the simple payment of money to individuals, groups or communities harmed by environmentally destructive activities (whether they be crimes or not) is likely to constitute at best a broad brush means of addressing the impacts of such activities, and at worst may fall far short of full redress.

At this point we should also acknowledge the growing body of hard law concerning victims of crime *of all descriptions* at the national and international level. In the context of England and Wales, particularly relevant to this decision is 2012 EU Directive (2012/29/EU) establishing minimum standards on the rights, support and protection of victims of crime, and replacing Council Framework Decision 2001/220/JHA. Article 16 of this Directive gives victims the 'Right to decision on compensation from the offender in the course of criminal proceeding' and in paragraph two notes: 'Member States shall promote measures to encourage offenders to provide adequate compensation to victims'. The Directive also provides victims a 'right to be heard' in criminal proceedings (Article 10). The remainder of this paper will critically assess mechanisms for providing environmental victims with redress in an effort to evaluate how they measure up to these rather difficult criteria.

MECHANISMS OF REDRESS

This part of the discussion will be ordered by first setting out the key criticisms that have been made of the criminal justice route as it relates to environmental crimes. It will then move on to consider civil litigation, and administrative compensation/restitution schemes followed by civil sanctions mechanisms. Throughout these discussions I will refer back to the basic criticisms of the criminal route to explore how the alternatives (especially administrative systems) are said to address these, as well as highlighting their limitations from a victimological perspective. I will then return to defend the criminal route at the end of this section through exploring how, in the light of the limitations of other mechanisms, its advantages *for victims* are still evident notwithstanding the previous criticisms.

I will begin this discussion on potential routes of redress for victims of environmental crime and wider harms by returning to the indication made at the start of this paper to the effect that criminal justice routes are not presently in vogue. As noted by Bell et. al (2013):

The criminal law, as a means of supporting traditional forms of regulation, is to an extent being supplemented by what are more administrative methods of

law enforcement the use of environmental civil sanctions being central here (p.265)

In fact, this trend represents something of a reversal whereby in many countries, particularly in the UK, *criminal* law has been the traditional approach to tackling environmental degradation (Bell et al., 2013). Indeed, across the European Union as a whole, EU Directive 2008/99/EC on the protection of the environment through the criminal law specifically requires EU member states to apply *criminal* sanctions to enforce EU environmental law.

The above notwithstanding, recent criticisms that have arisen around the criminal process as it applies to environmental cases focus on the apparent difficulties with achieving convictions. From the perspective of the victims of environmental harm this is clearly significant because in most jurisdictions criminal redress takes the form of court-based restitution orders imposed as part of a sentence against environmental offenders following conviction. Significantly, proving causation to the high criminal standard between a polluting act (or omission) and a given consequence (harm) is often challenging. Even when a conviction is achieved for an environmental offence O'Hear (2004) highlights the difficulty of establishing culpability for the full range of wider consequences. On this point a criminal court is arguably ill-equipped to calculate the degree of harm incurred by environmental victims and order restitution accordingly: especially given the nature of such harms could be health related, economic, social, or cultural (Skinnider, 2011). Such difficulties seem to reflect broader problems faced by criminal justice systems when confronted with environmental offenders and environmental victims. In particular, these cases are often characterised by mass victimisation, which most criminal justice systems still find difficult to assimilate, recalling of course that most such systems around the world are still struggling to integrate individual victims of more traditional crimes. Indeed, one especially pertinent issue here – again raised by Skinnider (2011) – is that not only might environmental cases involve large numbers of victims, those victims may all have different – sometimes *competing* – needs and expectations. For example, if a corporation must offer redress to victims affected by its polluting practices, those victims who happen to work for said corporation may risk losing their jobs. Bearing in mind the above basic criticisms of the criminal process, this paper will now examine the alternatives on offer for environmental victims seeking redress before returning to make the case that, from a *victim's* perspective, criminal justice mechanisms still have a vital role to play in responding to environmental harm.

Redress through civil litigation

The option of environmental victims pursuing civil litigation against individuals, corporations or states perpetrating environmental harms against them is one that can be dealt with relatively briefly. This is because the considerable finance required to pursue such civil claims often excludes this as a realistic option. This is particularly the case given that, as with victims of other kinds of crime, there is growing evidence to support the conclusion that environmental victimisation

disproportionately falls on the poor and marginalised within society: at a national and international level (see Ruggiero and South, 2010). Given that in most jurisdictions there is little to no public funding available for such litigation, these costs must be borne by the victims themselves or by victims' groups (Castle, 1996). It is chiefly for this reason that commentators in the area have become increasingly disparaging of so-called 'toxic torts' (Goldberg and Zipersky, 2011). Pursuing civil claims presents other difficulties too, which Skinnider (2011) summarises in the following terms:

Limitations for such remedies include where the perpetrator is not in the same jurisdiction as the victim; where the perpetrator is not readily identifiable; evidentiary burden of proof; and costs of litigation (p.74).

As such, although requiring a lower standard of proof than the criminal route discussed below, civil litigants must still establish culpability on the part of specified respondents which, given the nature of polluting activity, is likely to be problematic in many cases.

One potentially very important advantage of civil litigation as a means of securing restitution for environmental victims is the class action process available in many jurisdictions, allowing large groups of victims to sue polluters collectively (Johnson and Onwegbuzie, 2004). In principle such mechanisms offer an important advantage over generally individualistic criminal justice systems and the administrative compensation schemes discussed below, because they account for the element of mass victimisation that is often present in environmental cases. Nevertheless, class actions too have been criticised from the perspective of environmental harm, principally because 'these legal rules were not designed with environmental actions specifically in mind and have been noted to be notoriously difficult to get certified in environmental cases' (Skinnider, 2011: p.75). In addition, Lin (2005) has noted the alleged misuse of the class action system in a number of (US) cases of environmental damage to 'enrich attorneys rather than benefit plaintiffs' (p.1516).

Redress through administrative compensation and restitution schemes

O'Hear (2004) has argued that administrative redress systems for environmental harms (in this case brought about through climate change) carry numerous advantages over both civil and criminal court restitution procedures. His main argument is that such schemes can operate under a more comprehensive set of pre-defined rules. Lin (2005) adds to this argument the benefits of the standardized schedules of damages employed by such schemes. Of course, whilst these offer greater certainty, they often allow for very little adaptation of the rules to specific situations. Given the gaps in our knowledge concerning the full range of effects engendered by environmental degradation, an over-rigid system may thus not serve many victims of environmental harm particularly well.

Following from the last point, O'Hear argues that more diverse forms of environmental harms (impairment of 'characteristics of the landscape' and

disruption or impairment of lifestyles of indigenous communities) have 'traditionally not received nearly as sophisticated consideration in the legal system as have others' (p.162). This argument is supported by Bowman (2002) who argues that such compensation schemes that have been implemented around the world in response to environmental degradation:

have not really involved recognition of harm to the environment at all, but have been concerned with the infringement of established human interests relating to the person or property caused through the medium of the environment (pp.12-13).

This raises the important point that administrative compensation schemes are often concerned with human claimants rather than restoration of the environment as a whole, albeit monies from such funds can be channelled into more generalised efforts to repair the environment. On a more affirmative note, such schemes are usually designed to cater for large groups of victims/claimants, one of the rationales being that approaching such mass victimisation in this manner is more efficient than multiple tortious cases going through the civil courts for a protracted period, as occurred (and is still occurring) after the Bhopal gas disaster in India in 1984. Indeed, Lin (2005) has argued that a key advantage of administrative compensation schemes for cases of environmental harm is they have the potential to compensate those who are *not yet* affected by environmental damage but are at a significant risk of becoming so, extending to *future generations* of harmed persons. Of course, this can only occur if schemes award redress on an *ex post* rather than *ex ante* basis. An example of the former system is the compensation system being designed for the UK, where communities located near sites of hydraulic fracturing will receive compensation *in advance* of harm occurring (Department of Energy & Climate Change, 2014). It is of no small concern that, given the uncertainties surrounding both hydraulic fracturing itself and its medium- to longer-term impacts on local people and local environments, such payments are unlikely to cover the full range of future harms.

Farber (2007) has argued that the problem of establishing causation in cases of environmental crime can be avoided by offering victims what he calls 'proportional recovery' which would reflect the probability of their injuries having been caused by exposure to pollutants. In cases where different groups of victims have different chances of becoming subject to environmental harm, O'Hear (2007) too advocates the risk-based approach, avoiding the difficulty of proving causation in criminal (or civil) courts. For Lin (2005) the advantages of a risk-based administrative restitution systems over civil and criminal courts are very clear. He suggest that administrative systems can provide more continuous oversight and distribute compensation more fairly among a class of victims, whilst also being more politically accountable than the judicial system. Lin also argues that administrative systems typically employ specialized or expert decision makers who can conduct their own studies and consider a broad range of information. This avoids the limitations of criminal restitution discussed above, whereby courts are not equipped to quantify the full range of environmental impacts, especially in common law jurisdictions. That said, Lin

does place considerable faith in the ability of modern science to assess risk accurately. This may be over generous given the continuous development in knowledge of environmentally induced harms along with the still considerable gaps in that knowledge.

In principle then, administrative schemes as a means of redress for environmental victims have much to recommend them. The evidence points to such systems being more efficient and less time consuming than their court-based equivalents (Farber, 2007). Furthermore, the removal of the need to prove causation (to either the criminal or civil standard) should in theory facilitate more pay-outs. Significant questions do however remain as to whether such schemes are always best from the perspective of environmental victims themselves. The funding of the schemes, for example, brings a number of complex issues. Direct payments from the polluter to the victims seem the most beneficial option, both financially and symbolically. In addition, such payments might have specific and general deterrent effects on polluters. However in a scheme like this either the standard of proof (and the certainty of causation to be established) would need to be greater or such schemes must be restricted to very specific events and/or groups of people.

The main difficulty with the latter of the two options just presented is that this obviously excludes a great number of victims, which can be illustrated by examining one of the most recent high-profile administrative restitution schemes related to environmental victimisation: the \$20 billion fund constituted through talks between BP and the US government following the 2010 Deepwater Horizon Oil Spill in the Gulf of Mexico. This fund is financed by BP and administered by an 'independent claims facility' that, controversially, is managed by an employee of BP (2010). The scheme can pay monies to businesses, state departments and individuals demonstrating 'legitimate claims including natural resource damages and state and local response costs' (BP, 2010).

Given the worldwide interest in the case it might be speculated that the speed with which the US and BP brokered the deal reflects the political underpinnings to the scheme. Indeed, the argument that most victims compensation schemes are based on perceived political necessity is one frequently cited in the victimological literature (Elias, 1986; Harland, 1978; Miers, 1997). The continued high degree of interest in the workings of the Gulf of Mexico scheme by the US media in particular has maintained the disaster as a political issue. Whilst overall the scheme is a positive step in the direction of addressing the needs of *these* environmental victims, it also exemplifies the disparity between the treatment of environmental victims in newsworthy cases compared to provisions for such victims more broadly at the national and international level. Van Tassell argues (2011):

The Gulf of Mexico oil spill and British Petroleum's quick efforts to pay for clean-up and compensation for victims may lead many people to falsely conclude that national and international laws operate effectively to make the polluter pay for harm. In truth, clean-up and compensation is rarely

accomplished so efficiently, and laws operate to insulate polluters when they disaster occurs in poorer countries (unpaginated).

In this instance the author draws particular comparisons with the large number of environmental victims going uncompensated in Nigeria, following the widespread pollution caused by the oil industry. The criticism therefore is that whilst highly visible, relatively lucrative administrative schemes are available for major one-off polluting events in developed jurisdictions (with the ability to broker deals with large, multi-national corporations) this does little to address the more general absence of such compensation or restitution mechanisms internationally for more endemic, but perhaps less media-friendly, examples of environmental victimisation. This disparity also reflects the inequality of impact of environmental harm between rich and poor nations discussed by Ruggiero and South (2010).

The restrictiveness of many administrative schemes, along with their susceptibility to outside economic and political pressures can be further illustrated by an example from Japan, where an administrative pollution compensation scheme has been running in some form since 1973 (see Bronston, 1983). Implemented in the wake of growing industrialisation after the Second World War, originally the scheme paid monetary compensation to victims resident in pre-defined areas of the country who contracted specifically defined diseases. The geographical areas were initially split into 'Class I' and 'Class II' locales. Class I locations were areas where air pollution was especially prevalent. Victims falling ill to one of a number of defined respiratory illnesses could claim from a fund raised from levies and taxes placed on polluting corporations (specifically, emitters of sulphur oxides). In Class II areas a causal relationship had been established between a polluting agent and certain health effects. In these areas monies could be reclaimed directly from the polluter. Politically Class I payments proved to be the most contentious, and in the long term the government bowed to corporate pressures to cancel all the Class I area designations in 1988. Lin (2005) describes the situation in the following terms:

emitters reasonably contended that it was unfair to hold them financially responsible for illnesses caused by other polluters. From the perspective of industry, causation standards were so relaxed that the system became a no-fault compensation scheme (p.1498).

This perspective illustrates that whilst a lower threshold of causation is one of the benefits of applying administrative restitution schemes to environmental harm, as opposed to criminal or civil standards of proof, if the system becomes too open it will not be perceived as fair by those who must fund it. Indeed, in this case for both Class I and II claims victims did not have to show any but-for causation between the pollutant and their disease specifically. This is significant because such (largely corporate) actors are also likely to have the economic and political sway to lobby against such a system, as was the case in Japan. It is also of course highly likely that if, as in the Japanese system, polluting restitution schemes are funded by a blanket levy on polluting companies the

costs of such levies will simply be passed on to consumers, dampening any deterrence effect (on which, see below).

The other chief criticism of the Japanese model is its narrow focus on specific types of harm (pre-defined diseases) and even to specific areas of the country. Furthermore, the compensation remains available only to cover medical costs. This is many steps removed from a system covering the full range of environmental harms and does nothing towards repairing the environment itself. Indeed, the classification of areas in this manner seems to betray official acceptance that some areas are to be surrendered to pollution for the benefit of the greater economic good, and with them the environmental victimisation of their residents. This is the very essence of Stretesky et al.'s (2014) 'treadmill' explanation of environmental crime discussed above.

Both the Japanese and the US schemes discussed above are ultimately financed by polluting corporations. Another option is for states to fund compensation payments, on a welfare basis. In theory such schemes could be directed at a wider range of environmental harms. The majority of western jurisdictions already have developed systems of compensating victims of criminal acts from public funds. Indeed, the development of state-based compensation schemes over the last 50 years has spawned a great deal of academic debate, concerning their rationale and justifications, which can provide important insights for the application of such a scheme to cases of (criminal or non-criminal) environmental harm.

In most cases the particulars of state-based criminal compensation schemes restrict the availability of compensation to those who have suffered physical injury as a result of violent crime (see Hall, 2010 for a full review). Indeed, most state-based criminal compensation mechanisms are aimed at so-called 'ideal' (individual) victims¹ and at stereotypical notions of suffering, both of which tend to exclude environmental victims (see New Zealand Law Commission, 2008; Irish Criminal Injuries Compensation Tribunal, 2009). This is especially unfortunate in the environmental context given that a key advantage of seeking compensation through these systems is that, in most cases, a conviction does not have to be achieved and an offender need not even be identified. This avoids the problem of establishing culpability and achieving convictions highlighted previously. Furthermore, to include environmental victims within such schemes would imply recognition of environmental harms as *criminally* perpetrated, which might prove significant from the perspective of both the individual victims and that of wider society, as discussed above.

As with restitution orders in criminal justice processes, it is acknowledged in a number of jurisdictions that the payments made by criminal injuries compensation schemes are symbolic, even though the sums involved are often

¹ Famously characterized by Christie (1986) as: being weak; carrying out a 'respectable project'; being free of blame; and being a stranger to a 'big and bad' offender. To be labelled as a *bona fide* victim Christie argued that one must first conform to this ideal and then 'make your case known' to the justice system.

greater than that which can be paid by most offenders (Hall, 2013). On the other hand, it could be drawn from the more mainstream victimological literature that victims of environmental harm would find payments from the state less symbolically beneficial than payments from those responsible for this victimisation. Of course a key reason such schemes present themselves as offering *symbolic* rather than full economic compensation is to control escalating costs, which have been witnessed in almost all jurisdictions that have introduced them (Zhang, 2008).

A recurring question in these debates is whether *states* should in fact be paying anything at all to those who have suffered harm (environmental or otherwise). In relation to victims of environmental harm, we have seen that the notion of grounding an administrative compensation scheme on welfare principles has been championed by Lee (2009). Nevertheless, Miers (1997) has argued that in reality states rarely pay compensation to victims (of crime) based on welfare needs. Indeed, his argument is that these schemes are rather based on perceived political necessity, as discussed above. Of particular significance to the present discussion, the New Zealand Law Commission (2008), in arguing for a major rethink of the grounding of their own criminal injuries compensation system (the first in the world), raised questions concerning the special consideration being afforded to victims of *crime* here, as opposed to wider social harms. The Commission noted that 'it is generally difficult to justify special treatment of crime victims on grounds of social utility' (para.4.3). Given the reality that much environmentally destructive activity is in fact state-sanctioned rather than criminalised (constituting an environmental *harm* rather than an environmental *crime*) such debates are extremely pertinent in any discussion of public compensation for victims of environmental harm.

One solution to this impasse might be to distinguish environmental harms from other forms of 'social harm' by reference to the former's grounding in a capitalist imperative and the prioritisation of production, as proposed by Stretesky et al. (2014). On this basis, public compensation is based on both a welfare perspective *and* the understanding that the harm has derived at least in part from the economic prioritisation by the state of production at the expense of environment. Of course, for some this might be tantamount to the state admitting fault or at least a failure to protect the environment (and therefore its citizens) from victimisation. Such arguments are universally rejected by all jurisdictions as the basis for state compensation schemes. Nevertheless, in many cases it will be possible to demonstrate that the state, through economic growth or taxation, has benefitted from the environmentally destructive activities of corporate polluters. In this situation it becomes more difficult for the state to argue that public funds are not suitable for compensation purposes in cases of environmental harm, albeit on a no-fault basis.

The above notwithstanding, a publicly funded state-based compensation scheme would also remove any element of deterrence from the process for polluters themselves. It also ignores the so-called 'polluter pays' principle which has been a yardstick used in both national and international environmental law for many years (Tobey and Smets, 1996). On this point Bronston (1983) has

argued that a scheme seeking to marry both deterrence and victim compensation elements is unlikely to succeed:

A system stressing compensation, however, is almost a necessity in this field because an alternative system stressing both compensation and deterrence would be limited to injuries where a hazardous substance and a firm responsible for that substance could be identified. In such a mixed system, victims of injuries where substances and firms were not identified would be denied compensation. Consequently, the moral arguments for compensating innocent victims of hazardous substances quickly and inexpensively are stronger than for deterring identifiable firms from polluting by making them absorb the costs (p.516).

Thus, Bronston argues strongly against prioritising deterrence as the basis of such schemes. The difficulty however is that this clearly restricts the degree of compensation victims can expect. In this respect, the criminal redress route seems more attractive, offering the possibility of large sums in restitution payment *and* the deterrence associated with criminal prosecution.

Overall, whilst administrative compensation and restitution schemes in principle have much to recommend them, there is often a considerable gulf between the promise of such systems and the operational reality, at least from a victims' perspective. In reality such schemes appear to be largely *ad hoc*, or focused on very specific forms or instances of environmental harm, sometimes calculated based on *ex ante* projections of harm that *might* occur. There also seems to be a connection between the formation of these schemes and the mediatisation and politicisation of high profile 'pollution catastrophes' and, in addition, they are far more prevalent in developed, rich jurisdictions compared with the global south. We have also seen that such schemes can be heavily influenced by corporate and political interests. Consequently, whilst administrative compensation schemes seem particularly suited to one-off or perhaps especially serious events, it is more difficult to advocate their use as the sole means of compensating victims of environmental harm when so many of these victims would seemingly fail to qualify. In this situation, it is submitted that criminal-based restitution might constitute a vital safety net.

The rise of civil sanctions

At the beginning of this paper it was noted that criminal-based redress for environmental harm has been rebuffed in a lot of the recent legal literature. Bell et al. (2013) argue that the utilisation of civil resolutions (as opposed to civil *litigation* discussed above) in environmental cases is on the increase in many jurisdictions and markedly so in the UK, where a system of civil sanctions as alternatives to environmental prosecutions was rolled out in January 2011.

Such sanctions essentially comprise orders issued to polluting agents by a regulatory body (the Environment Agency in England and Wales) to compel them to cease or adapt their practices and, in some cases, to carry out remedial works. The extension of civil sanctions is presently a key strategy of the UK Law

Commission concerning wildlife crime, with similar approaches also in evidence in Australia (Ogus and Abbot, 2001) and New Zealand (New Zealand Law Commission, 2012). Across Europe, the development of civil sanctions for environmental harms was prompted by the introduction of the EU Environmental Liability Directive (2004/35/EC), although this instrument has itself been criticised both for a lack of precision in its mechanisms of determining the extent of injuries to natural resources (Paradissis, 2005) and because it fails to establish any genuine EU-wide civil liability regime (Bell et al, 2013).

In general terms the primary arguments in favour of civil sanctions in environmental cases are that they allow for greater flexibility and are generally thought to be cheaper to apply than criminal prosecutions (Mann, 1992). From the perspective of the present paper, the difficulty with civil sanction regimes is that few of the sanctions presently in use across the EU and beyond have built in provisions concerning the *victims* of environmental harm. Although polluters can be ordered to 'restore the environment', there is no requirement that specific individuals or groups affected by environmental harms are offered redress. Real questions therefore remain as to whether civil sanctions, whilst representing managerial and administrative benefits to the justice system, can also represent eco-centric values for the environment itself or represent the needs of environmental victims.

Faure and Svatikova (2012) offer an examination of the relative merits of criminal and administrative/civil sanctions in environmental cases based on a study of four European jurisdictions: the Flemish Region and the UK (which have traditionally favoured the criminal route) and Germany and the Netherlands (which have traditionally used civil sanctions). Their conclusion is that the most efficient system is one that combines criminal prosecutions for the most serious environmental transgressions and administrative or civil sanctions for the majority of other cases. Nevertheless, this conclusion is based on an assessment of the *deterrence* effect of the different mechanisms on would-be polluters rather than the impact on environmental victims or indeed the benefits accrued to the environment as a whole. As such, their conclusions come with an important health-label:

one has to be careful with generalising the conclusion that systems that allow for a more balanced use of the criminal law (by combining it with administrative law for minor or moderately serious violations) are more efficient than systems, which merely rely on the criminal law. After all, our data did not allow us to test the overall effectiveness of the differing approaches as far as the effect on environmental quality is concerned, nor on compliance with environmental regulation by firms. Moreover, economic literature has equally indicated that administrative law systems may have the disadvantage that enforcing agencies could enter into a collusive relationship with the regulated firms as a result of which also administrative agencies could not always impose efficient sanctions (p.33)

This conclusion also alludes to the concern that regulatory capture may skew the application and enforcement of both civil sanctions and other administrative schemes. For present purposes, the key point is that whilst civil sanctions appear to bring advantages, offering redress to victims of environmental harm or indeed (from a less anthropocentric perspective) protecting/repairing the environment itself are not amongst the proven benefits.

Criminal law and redress for environmental victims

The above analysis has demonstrated real limitations in the utilization of civil litigation as means of achieving restitution for environmental victims. Likewise, civil sanction regimes have a number of advantages but for the most part have not been designed with the goal of victim redress at the forefront. Administrative compensations and/or restitution schemes have received a great deal of attention and in many ways offer a more realistic route to redress for *some* victims. Nevertheless, these schemes are often limited in terms of the type of victims they encompass and are susceptible to political influence and undermining. Publicly funded versions of such schemes remain controversial for a number of reasons: the costs involved to the public purse; the principle of awarding money without admitting fault on the part of the state and, from a victimological perspective, such payments may lack symbolic resonance.

For all the above reasons I argue that the criminal route of redress merits greater attention from the perspective of victims of environmental harm seeking redress. Indeed, in contrast to the apparent difficulties of incorporating environmental victimisation within criminal justice processes, for *other* forms of victimisation it is clear that many countries have in recent years turned to offenders to provide monetary restitution: either directly through court-based orders or through the establishment of victims' funds maintained by offender surcharges and fines (Whitehead and Block, 2003; Canadian Department of Justice, 2012). Indeed, such restitution has become an integral and mandatory component of many of the world's criminal justice systems (see Hall, 2010). Such developments are not without their controversy, as they fundamentally call into question the *purpose* of a criminal justice system as being concerned with *public* wrongs against the state rather than *private* wrongs against individuals (see Cape, 2004). Commentators have questioned whether the increased focus on victim redress comes at the expense of fairness for defendants, the proportionality ('just desserts') of a sentence when supplemented by such restitution and even the proper adherence to defendants' rights (Ashworth, 2000). The space is lacking to go into detail on these complex (and often normative) arguments. For present purposes it might suffice to proceed on the basis that because criminal justice mechanisms in many jurisdictions now have quite well established mechanisms of offering direct redress for victims of some crimes, it is incumbent upon commentators to explore this option for victims of environmental harm as well. Below I will go further than this to argue that the criminal route offers a number of advantages for victims of environmental harm specifically.

From the victims' perspective, we have already seen that such a move is well supported by the victimological literature, which consistently holds that payments from offenders carry greater cathartic value to victims of crime than monies allocated from taxation and may increase satisfaction with the justice system. As such, criminal redress in such cases may bring the distinct advantage of providing some financial relief *as well as* having important symbolic impacts for victims themselves. Indeed, the latter point has been acknowledged by the European Commission (2001), which argued that imposing criminal sanctions in environmental cases 'demonstrates a social disapproval of qualitatively different nature compared to administrative sanctions or a compensation mechanism under civil law' (p.238). The overall effect, it is suggested, is to increase condemnation of such acts and raise awareness as to their dangerousness and the harms they engender. This also hints at the potential for criminal restitution to combine redress for victims *and* deterrence amongst environmental offenders in a way we have seen administrative systems find challenging.

When discussing other forms of criminal victimisation, the importance of the symbolic benefit to victims of receiving money directly from offenders is often used to counteract the point that individual offenders themselves are frequently unable to afford to pay much if any restitution, and therefore the sums involved cannot be said to compensate the victim in a financial sense (Nagin and Waldfogel, 1998). Herein lies one of the primary distinctions between the offenders who typically commit traditional crimes and environmental offenders, who might well be large corporations. Such corporations will often be in a position to afford much more in the way of financial restitution. Indeed, criminal-based remedies have also on occasion proven a strategically beneficial option for the recovery of monies from environmental offenders. Richardson (2010) writes how, following the 1989 Exxon oil spill off the coast of Alaska, the US federal government sought recovery of natural resource damages to Prince William Sound 'not by pursuing a civil claim against Exxon ... but by filing criminal charges' (p.4). As such, the Exxon Shipping Company was charged with criminal violations of the Migratory Bird Treaty Act and the Refuse Act. Significantly, both these crimes carried penalties that would require restitution to injured parties. In this case the injured party was deemed to be the United States itself, through damage to its natural environment. The criminal route was chosen because legislation imposed significant limitations on the amount that could be claimed from polluters under civil law (and indeed this remains limited in many jurisdictions). The outcome was that Exxon pleaded guilty and a financial settlement was reached through negotiation with the US government.

As such, criminal redress brings the advantages of being – at least in principle – open to all victims of environmental crime (albeit not environmental harms). It also can facilitate larger monetary restitution payments from environmental offenders, is much less vulnerable to political influence, offers the cathartic and symbolic benefits to victims of being recognised as 'criminally harmed' (as reported by the victimological literature) and has the deterrent effect of criminal prosecution for polluters.

Accruing the above advantages is of course contingent on achieving prosecutions in these cases in the first place, which we have seen has been problematic in many criminal justice systems. Nevertheless, this may indicate less of a fundamental incompatibility between criminal justice and environmental cases and more a need for greater understanding of environmental crime and environmental harm in general amongst both prosecution and (perhaps more significantly) police and investigative agencies, thus allowing them to build stronger cases to meet the criminal standard. Carter (1998) has argued that successful prosecutions of environmental offences in criminal courts would rise dramatically if police officers were to adopt more proactive strategies:

Law enforcement officers should carefully document their observations by making detailed written records of what they see, hear and smell. Photographing or videotaping suspicious operations or incidence is even better. The officers should patrol their communities with an increased awareness of the various methods used by environmental criminals. Frequent contact with community members and cooperation will increase the chance that environmental crime initiatives will succeed (p.181)

Carter also stresses that police officers need to be trained on the dangers of environmentally harmful practices to avoid risks to themselves and thus a core of scientific expertise within the police service needs to be instilled within its working culture. In addition, the author empathises the need to approach the detention and investigation of environmental offences from a multi-agency standpoint. Whilst it is unlikely that better policing and better investigations can entirely solve the problems of the criminal justice process in its handling of environmental cases, lack of knowledge of environmental law has been demonstrated by Lynch et al. (2010) in a number of jurisdictions amongst investigators and the judiciary.

Staying with the judiciary, in England and Wales at least, evidence suggests that the barrier to redress through restitution in the criminal court occurs not at the trial and conviction stage, but rather derives from an underutilisation of restitution orders by sentencers in these cases. On this point, the House of Commons Environmental Audit Committee (2004) received evidence from the Environmental Industries Commission suggesting:

Whilst there is statutory provision for the criminal courts to order an offender to remedy the environmental harm caused, it is not apparent that this is often used (p.63).

The guidance notes mentioned here are based on those issued at the time by the Sentencing Council, which said that if a specific victim in environmental cases is identifiable a court should consider imposing a compensation order²

² Which, somewhat confusingly, is the name for criminal court-based restitution orders in England and Wales.

against offenders. Under s.130(3) of the Powers of Criminal Courts (Sentencing) Act courts are required to give reasons why they have *not* imposed compensation orders in all cases and s.130(12) mandates that compensation orders must take precedence over fines if offenders are only able to afford one of the two. The Sentencing Council has since issued further guidelines for the imposition of fines and other penalties in environmental crime cases in an attempt to address the apparently haphazard nature of sentencing in this area, addressing the lack of knowledge amongst the judiciary (Sentencing Council, 2014).

Bell et al. (2013) argue that the explanation for the underutilisation of compensation orders in cases of environmental crime in England and Wales (compared to their increased use in most other areas of criminal sentencing, mandated by the legislation) lies mainly with the existence of many statutory powers of clean-up and cost recovery available to regulatory agencies in defined situations (for example, s.59 of the Environmental Protection Act 1990 and s.161A of the Water Resources Act 1991). In addition, the authors argue, under s.131 of the 2000 Act compensation orders are restricted to a maximum of £5,000, a sum that in fact may often be insufficient to fully restore victims or their environment to their previous state, if indeed *any* sum of money can achieve this. Skinnider (2011) has commented on the difficulty of applying restitution orders in cases of 'mass' or 'community' environmental victimisation especially where, as noted previously, not all victims have compatible needs. This point might however be countered by reference to the now quite developed systems available in most countries whereby victims of crime can offer 'impact statements' to the court to be used at the sentencing stage. In some jurisdictions these have included so-called 'community impacts statement' (Crown Prosecution Service, 2016). Nevertheless, a further problem in some jurisdictions, notably Canada, is that restitution orders are sometimes restricted to certain proscribed offences, which do not include environmental crime (see Canadian Department of Justice, 2012).

Of course, the fact that the sums involved may be insufficient to restore victims to the state they were in prior to the effect of an environmental crime is in keeping with the notion that the purpose of restitution, at least in England and Wales, is largely symbolic. Elsewhere the situation is less restricted. For example, in the South African criminal justice system criminal 'restitution' is defined as the return or repair of property by the offender 'in order to restore you [the victim] to the position you were in prior to the commission of the offence' (South African Department of Justice and Constitutional Development, 2008: pp.13-15). This was also the rationale given for the introduction of mandatory restitution orders in the Netherlands in the Terwee Act 1995 (Wemmers, 1996).

It is therefore submitted that limitations evident in the use of criminal redress in cases of environmental victimisation do not stem from some assumed incompatibility between the criminal law and environmental harms. Rather, the application of redress in such cases has been uncertain, ill-informed and subject to arbitrary restrictions which do not account for the extensive finances

available to corporate offenders to provide redress. Such an unfettered version of restitution orders as seen in South Africa and the Netherlands, if applied against large, wealthy corporations responsible for environmental harm, has the potential to be a very powerful mechanism for environmental victims – including large groups of victims – both in terms of the amount of money available and the symbolic benefit of being recognised as *criminally* harmed. What is needed is greater understanding of environmental cases and their impacts at all stages of the criminal process, and in particular at the early investigation stage.

DISCUSSION

Environmental crime and environmental harm are not ‘new problems’ (see Hall, 2013), nevertheless they are problems behind which scientific, criminological and legal developments are still lagging. It is perhaps for this reason above others that none of the systems discussed above seem particularly well adapted to offering redress mechanisms for environmental victims.

Given the extremely diverse nature of environmental harm, it is clear that any system of redress for its victims will need to address conflicting tensions between offering tailored solutions that work in particular (perhaps unique) circumstances, whilst at the same time conveying a sense of certainty, fairness and consistency between cases. In this sense an administrative-based system utilising a standard schedule of payments seems appealing, because such schemes can in principle be devised to deal with a wider range of environmental harms beyond the officially recognised environmental crimes which fall within the ambit of the criminal justice system. Thus far, however, such schemes as have been constituted for the purpose of offering compensation or restitution to environmental victims have been restricted to very specific events, very specific countries and very specific forms of harm.

There is also, as we have seen, a real concern that such schemes are often constituted for reasons of political expediency and, as such, the fear is that victims once again are being used to achieve political gain. Furthermore, given that, as we have seen, large corporations might have considerable influence over what does and does not succeed in this regulatory sphere (see Dal Bó, 2006) there is always a concern that such systems will start prioritising the needs of industry over the needs of those individuals and communities harmed by polluting activities, as has arguably occurred in Japan and as is predicted by Stretesky et al.’s (2014) ‘treadmill of crime’. This also makes the imposition of blanket levies on polluting corporations to fund the schemes problematic. Of course, in cases where a sufficient degree of causation is established, polluters might be compelled to pay restitution directly to victims through an administrative system. In this instance, however, the need to demonstrate culpability removes a key advantage of the administrative route: that it does not require so high a standard of proof as criminal or civil actions and is therefore (arguably) more efficient.

One way out of this conundrum, we have seen, is for *states* themselves to fund payments to environmental victims: just as many fund payments to (certain

descriptions of) victims of violent crime through existing administrative schemes. Conceptually we have seen that the justification for these schemes is (perhaps purposely) vague, however the suggestions made by some that ideal victims of violent crime are being unfairly singled out for special treatment compared to victims of other crimes, or indeed victims of social harms more generally, seems especially compelling in the environmental context: where the *state itself* may at least contribute to the environmental victimisation. Furthermore, in line with Stretesky's et al.'s (2014) 'treadmill of production' model, offering public compensation for environmental harms (as opposed to wider social harms) may be justified for the reason that these harms have been carried out in the name of production to the ultimate benefit of the capitalist economy. The state need not acknowledge any fault, just as it acknowledges no fault when it pays victims of violent crime. It is submitted that the real barriers to the opening up of such a system to victims of environmental harm, or even to environmental crime, are economic and political: economic because of the fear of opening the floodgates of claims and political because environmental victims do not necessarily provoke the same public empathy as (blameless) victims of violent crime.

Clearly then there are various reforms that could be made to the way administrative compensation and restitution systems operating now tend to function which would make them more suitable as tools for offering redress to environmental victims. Indeed, the reality that many environmental harms do not constitute actual crimes makes the retention of such systems (suitably developed and extended) a necessity given the limitations of both civil litigation and civil sanctions in this regard. Nevertheless, it is submitted that criminal restitution has an important role to play here too. In particular, I argue that criminal procedure brings numerous cathartic benefits to victims as well as offering the possibility of obtaining genuine economic redress. The development of restitution orders in other areas of criminal activity shows that this is possible, although at present most systems are restricted to relatively small amounts and, more importantly, there is a demonstrable lack of will and/or understanding amongst judges to provide for this kind of restitution. Whilst it might be countered that 'restitution' is not the job of the criminal court, the proliferation of criminal restitution schemes for other kinds of (perhaps more 'ideal') victims across most developed jurisdictions calls into question why environmental victims should not receive the same level of recognition. Furthermore, courts, whilst being less politically accountable, are also less prone to abuse and influence by corporate or state interests when compared with administrative schemes and, unlike those schemes, are at least in principle open to all victims of environmental crime. The criminal route also retains the power to sanction actual polluters in a fair and consistent manner, promoting deterrence and changes in social attitudes to environmental degradation in a way administrative schemes do not.

Problems clearly remain in the criminal system both with the understanding and acceptance by sentencers of environmental concerns, as well as the ability of police forces and prosecutors to build successful cases. Nevertheless, the

above discussion has argued that these issues are not insurmountable. We thus arrive at a position where both administrative and criminal routes have a role to play in offering redress to victims of environmental harm, and the resulting implication is therefore that governments need to examine ways to better develop *both* these systems in a way that offers redress to those harms falling within and beyond the criminal law. The last proviso places the emphasis on green criminologists and victimologists to continue in the critical tradition of questioning and problematizing which harmful activities remain absent from the crime lexicon and the political and economic reasons behind this.

CONCLUSION

Perhaps the most significant conclusion to be drawn from this discussion of redress mechanisms for victims of environmental harm is that at present there is a real division between the 'haves' and the 'have nots'. Those 'fortunate' enough to be subject to a media-friendly, publicly sympathised but geographically and temporally contained environmental victimisation within a developed country have been given access to generous administrative compensation, and even criminal-based restitution when the victimisation is recognised as criminal. Those resident in poorer countries, or in poorer or otherwise marginalised communities where environmental degradation is viewed as necessary for the national interest and the imperative for production have found themselves lacking such official channels and most often are not in a financial or social position to embark upon their own civil claims.

The reforms in both criminal and administrative redress mechanisms put forward above may help to ease some of these problems but alone will not solve them. It is submitted that such global inequality in the treatment of environmental victims ultimately begs the further intervention of international law and, in all likelihood, the careful application of human and environmental rights principles. This is before we even consider less anthropocentric aspects of the issues, and the wider range of non-human 'victims' which haven been specifically excluded from the above discussion. For human victims, another idea might be to pay far greater attention to the development of mediation schemes surrounding environmental harms (see Shmueli and Kaufman, 2006). As a whole the green victimology literature has begun to address such issues at a transnational level but the issue requires far more by way of research – not least of which on what victims themselves say they need – before victims of environmental harm can be said to be receiving adequate redress on a global scale.

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