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Vandalism-Militancy Relationship: The Influence of Risk Perception and Moral Disengagement

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Risk perception and moral disengagement underpin crisis intensification and influence risk behaviours. After arguing about the crucial significance of the influence of risk perception and moral disengagement in addressing vandalism and militancy crisis, we provide conceptual clarification of moral disengagement, moral evaluation and social trust. The research clarifies the influence and implication of risk perception and moral disengagement in crisis management within the context of vandalism and militant incidents. Specifically, this study suggests that there are potential gains in crisis management if strategic options are anchored on crisis dimension, morality issues and risk perception. In fact, the study found that people are more likely to disengage from moral conducts and even become skilled at neutralising morally questionable behaviours and activities when the mechanisms of moral evaluation and disengagement routinely operate in them.

The research findings indicate that environmental risks are perceived to be more important than economic or biological risks and that individuals' susceptible to moral disengagement are not predestined to delinquency. Findings attest to environmental victimisation, moralistic punishment, and moral surveillance as active factors which risk and crisis leaders must address. The study advanced crisis management literature through analyses of moral disengagement implications in crisis situations and provides empirical evidence that errors in risk perception evaluation can lead to ineffective crisis response and application of failing strategic option when managing crisis. Furthermore, the research also establishes that conventional wisdom which suggests that vandals and militants are inhumane, and that capturing or alienating them will help prevent or reduce future crisis/disaster is ineffective and unsustainable. The implications and limitations of these findings are discussed.

Keywords: Moral disengagement, risk perception, crisis management, militancy and vandalism.

1. Introduction

Over a decade, vandalism and militancy within the Nigerian oil and gas sector have increasingly become focal areas for attention both in the national and global context (for example, Ikelegbe 2005; Inokoba and Imbua 2010; Mafimisebi and Nkwunonwo 2015; Nkwunonwo and Mafimisebi 2013; Okoli 2013). More recently, Nigerian media and researchers have devoted wide coverage to the economic, environmental and human rights implications of vandalism and militancy in the Niger Delta region, Nigeria. In clear terms, a total of 16,083 pipeline breaks were recorded within the last 10 years (vandals accounted for 97.5 percent representing 15,685 breaks and 2.5 percent about 398 cases of vandalism were due to ruptures) (Ogbeni 2012). The Nigerian government reportedly lost around N500 billion on account of restiveness and militancy in 2006 alone. The scourge became worse in 2008 with an estimated US\$6.3 billion in oil stolen and another US\$28 billion worth of oil through a deliberate decision was not produce (Duggan 2009) as well as an estimated US\$40 million revenue lost per day in 2008 (Ubhenin 2013; Ubhenin and Aiya 2010). As contained in the 2013 annual report of the Nigerian Extractive Industry Transparency Initiative (NEITI), Nigeria lost US\$10 billion to oil theft between 2009 and 2011 due to the crisis (NEITI 2013). The Nigeria National Petroleum Company (NNPC) alone lost about N165 billion to products theft and repairs of vandalised pipelines between 2009 and 2012 (Ugwuanyi 2013). Likewise, crude oil production in Nigeria decreased slightly from 2.13 million bbl/d in 2011 to 2.10 million bbl/d in 2012 (US, Energy Information Administration, 2013). Lately, on the 30th October 2014, the Nigerian federal government disclosed that 80 percent of the country's 5,120 kilometres pipelines network for petroleum product distribution have been vandalised (Eboh and Ejoh 2014). This further shows the scale of the problem and the need to pragmatically address and find sustainable solutions to the crisis.

In this research, we discuss the question whether risk perception and moral disengagement mechanisms influence vandalism and militancy (terrorism) or at least provide innovative and useful alternatives and additional strategies to manage unconventional cases of mass emergencies and disasters. These are issues or concerns less obvious (or perhaps obscure) but pertinent to the theorising of crisis and disaster management response to vandalism and militancy (terrorism) phenomena where there are reasons to understand what motivate vandals and militants (terrorists) to involve in delinquency in Nigeria. These critical issues or concerns become controversially open when we discuss them in the context of risk perception and moral disengagement. Closely linked to this discussion, our research findings indicate that environmental risks are perceived to be more important than economic or biological risks and that individuals' susceptible to moral disengagement are not predestined to delinquency.

Whereas individuals susceptible to moral delinquency may be capable of penetrating inhumane conducts and heinous acts such as vandalism and militancy, the less vulnerable

responders (leaders) tasked to manage the outcomes are equally susceptible to inhumane conducts through mechanisms of moral disengagement. With consideration of this moral disengagement theory when managing cases of crises and disasters, the unanticipated consequences of crisis intensification and unrealistic expectations that vandals and militants will behave humanely can be avoided and effectively manage. However, it should be acknowledged that the nature of hazards and disasters discuss here is relative to human-induced disasters (vandalism, militancy or terrorism, and technological disaster) but related to other types of hazards and disasters (e.g. natural hazard/climate change consequences). The behavioural involvement and engagement (or disengagement) dominant within the nature of hazards and disasters discuss in this research makes the research findings easier to be generalize to wider hazard and disaster management literature.

Another aspect that is an important consideration in this debate is that, organisations within the region were compelled to include an 'escalation factor' – called the 'Niger Delta premium' in their contract bids covering community expectations, vandalism, militancy and kidnaps, and higher insurance premiums (Ubhenin 2013). Despite the proclamation of amnesty in the Niger-Delta on 25 June 2009, intended to encourage militants in the Niger Delta to abandon violence, current literatures (for example, Mafimisebi and Nkwunonwo 2014; Mafimisebi and Thorne 2015; Okoli and Orinya 2013; Ubhenin 2013; Ubhenin and Aiya 2010; Ugwuanyi 2013) indicate vandalism and militancy are now worse than during the pre-amnesty era. Oil theft, oil bunkering, kidnapping and oil terrorism, and other criminal activities are disconcertingly continuing to be perpetuated by the same ex-militants (including other disgruntled youths and some corrupt government officials) at an exponential rate. Unsurprisingly, the amnesty has been categorised as 'unfinished business' (Ubhenin 2013) and a 'gilded pacification campaign'. In the critical context, the government amnesty in the Niger Delta could be argued to have gained very limited, if any, success. The series of militants' attacks on oil facilities and state assets have been curtailed. Nevertheless, the post-amnesty period has witnessed severe conditions of lawlessness such as abductions, murders, militancy, oil terrorism, delinquent gangs, intra-communal violence over oil disputes, and in some cases, state oppression. It is paradoxical rather than addressing the root cause; the amnesty program was designed to address a narrow problem that of militancy against oil facilities and state assets.

The International Oil Companies (IOCs) frequently declare force majeure on oil shipments because of the crisis. Although vandalism and militancy as such are not new phenomena, existing studies confirmed that the intensification of vandalism and militancy within the oil and gas sector in Nigeria represent huge national economics loss, environmental degradation, disasters and threaten public safety and sustainable development. Empirical studies (Inokoba and Imbua 2010; Mafimisebi and Ogbonna 2016; Mafimisebi and Thorne 2015; Okoli and Orinya 2013; Omeje 2004; Onuoha 2009) have usually linked the phenomenon of pipeline vandalism to another problem concerning mounting militancy in the Niger Delta region, Nigeria. Critically, practitioners and academics still contend with the scourge of militancy as to whether it is terrorism, a liberation struggle or criminality. More specifically, the Niger Delta crisis revolves around oil revenues, greater control of oil resources, environmental degradation and pollution associated with crude oil exploitation by the IOCs. In context, little is known about the risk perception and the moral disengagement role in such discourse. Therefore the case of Niger Delta region was presented in the following section to introduce the research

context. In the next sections, we review salient constructs (moral disengagement, moral evaluation, and social trust) related to delinquency, and state the research questions. Even more critical to these considerations, the relevance of these concepts (moral disengagement, moral evaluation and social trust) to crisis and disaster management involving cases of environmental risks, terrorism (militancy) and unethical responses to delinquency are imperative for sustainable crisis and disaster management practice. The pursuit of this line of inquiry is justified by the fact that, with respect to variables identified in risk and disaster research, moral psychology and risk behaviours research has both supported their potential to influence crisis intensification and decisions (Bandura 2002; Beu and Bucley 2004; Caprara et al. 2006; Carlton and Jacobson 2013; Cesarz, Morrision, and Cooke 2003; Chugh et al. 2014; Mafimisebi 2013; Mafimisebi and Thorne 2015), and identified mechanisms of moral disengagement and several risk perception variables capable of influencing this process. This provides avenues to discuss the hypothesis development and operationalization of the research concepts in the subsequent sections. Finally, we discuss the methods, findings, general discussion and conclusion.

2. The Niger Delta Region: In Perspective

The Niger Delta region (located within Southern Nigeria) with an area of about 112,000km² in landmass, is the home to over 35 million people who live in around 15,000 indigenous communities, mainly farmers and coastal fishermen belonging to over 50 ethnic groups. In clear context, the Niger Delta is an area the size of England or Portugal (Mafimisebi 2013, p. 17). The region has an estimated 40 billion barrels in oil reserves and it is home to Africa's and the world's third largest mangroves. The strategic importance of the Niger Delta to global energy equation and national economic survival is crucial. For example, Nigeria currently earns more than US\$3billion per month from oil in the Niger Delta and this account for about 95 percent of its export earnings (Inokoba and Imbua 2010). Crisis which results in reduction of oil production within the Niger Delta significantly affects the global oil price.

Why crisis in the Niger Delta? The Niger Delta suffers from environmental degradation and oil pollution caused extensively by oil exploitation and exploration activities, oil spills, vandalism of oil pipelines and gas flaring. The results include biodiversity loss, climate change, rising sea level, flooding, extreme weather conditions, and land, air, and water pollution which severely affect surrounding environment and communities. The effects manifest themselves in decreasing fish stocks and contaminated waters supplies and arable land. Poverty in the Niger Delta is chronic as over 70 percent of the population live on less than US\$1 per day, according to 2013 figures published by the Central Bank of Nigeria.

The Resident Coordinator of the United Nations system in Nigeria, Alberic Kacou calls the Niger Delta "a place of frustrated expectations and deep-rooted mistrust" (Ibanga 2008). Ikelegbe (2005) described it as a region that is generally restive, with pockets of insurrection and armed rebellion. In contrast, the Niger Delta is typically regarded as the world's environmental pollution capital. Inokoba and Imbua (2010) further revealed it is a form of warfare or green war carried out by the Nigerian state in collaboration with profit seeking oil

multinational firms to destroy the survival base of a group of minority ethnic-nationalities. In modern Nigeria, Ibeanu (2006, p. 3) captured the Niger Delta thus:

". . . available figures show that there is one doctor per 82,000 people, rising to one doctor per 132,000 people in some areas, especially the rural areas, which is more than three times the national average of 40,000 people per doctor. Only 27 percent of the people in the Niger Delta have access to safe drinking water and about 30 percent of household have access to electricity, both of which are below the national averages of 31.7% and 33.6% respectively. . . While 76 percent of Nigerian children attend primary school, in the Niger Delta the figure terribly drops to between 30 and 40 percent".

This reveals the practical conditions of the Niger Delta people and evidence over the past years have confirm that these have been the source of agitation and frustration – leading to more people engaging in delinquency in the Niger Delta.

2.1 Vandalism

Vandalism, is defined here as a deliberate action of destruction of public or private property in keeping with criminal or political intent (Okoli and Orinya 2013). In the Nigeria context, oil pipeline vandalism comprises wilful breaking of oil pipelines with the intent to steal petroleum products, disruption of petroleum productions and gained political appearement either from the IOCs or the government. In particular, vandalism in the Niger Delta occurs largely due to unemployment, inequality, frustration, depression and human rights abuses, development deficit, decay of infrastructure and marginalisation. It is expedient to question whether all these factors justify moral disengagement actions in the Niger Delta.

2.2 Militancy

Militancy could be defined as a violent and active behaviour principally for the defence and support of a cause (predominantly political) which usually lead to the point of fanaticism. Therefore, a militant could be described as a person involved in hostile (or a protest movement) in the defence of a cause. In this context, Inokoba and Imbua (2010) noted three types of militants: intellectual militant, militant mobiliser and violent militant. In this research, the focus is on violent militants in the Niger Delta who often attack oil pipelines, installations, and platforms with explosives, and the seizure of oil barges, oil wells, flow stations, support vessels, and kidnapping of oil workers for ransom, and other oil facilities including state assets to prevent the exploitation and/or distribution of crude oil or its refined products. In summary, Cesarz et al. (2003) states:

They have brought to the confrontation new assets: rocket-propelled grenades, AK-47s, machine guns, satellite phones, and speedboats. They demonstrated a willingness, and ability, to kill oil companies and Nigerian military personnel and credibly threaten oil

sector infrastructure. Quickly, they proved their dominance of Niger Delta waterways and ability to impede the passage of security agents.

To address this challenge, we offer a critical overview of research and theory on the relationship between vandalism and militancy, and influence of risk perception and moral disengagement in the analyses and discussions. We clarify the key concepts and theories concerning the underlying cognitive processes of vandalism and militancy so as to make these more accessible to academics and practitioners in the field of mass emergencies and disasters. Sometimes, the situations in the Niger Delta are comparable to individuals in a country buying more guns but expect less gun related crimes. These apparently problematic situations are explored within the risk perception and moral disengagement theories to delineate and uncover the potential outcomes and implications.

3. A Review of Salient Constructs¹

Essentially while a large number of studies have focused on the relationship between vandalism and militancy in Nigeria, these studies have shown varying and contradictory results. Scholars and analysts within the region have developed several explanations for the cause of the crisis (Dule and Nwankwo 2001; Mafimisebi and Ogbonna 2016; Mafimisebi and Nkwunonwo 2014; Ogbeni 2012; Ogbonna and Mafimisebi 2016; Okoli 2013; Okonta and Douglas 2001; Omeje 2004; Onuoha 2007; Peterside 2001; Ukeje 2001a; 2001b; Watts 2004) but these models appear fundamentally devoid of discussions regarding the influence of risk perception and moral disengagement in the crisis. Therefore, by modelling moral disengagement as a proximate cause of crisis intensification in the Niger Delta, we might expect that its underlying mechanisms would correlate to existing moral evaluation findings. We further propose that risk perception predicts both vandalism and militancy, and that abuse of moral disengagement mechanisms predicts militancy. Notions of risk perception and moral disengagement may have an influence on vandalism and militancy in the Niger Delta. Indeed, finding the appropriate tools and mechanisms to first understand the practical root cause of the crisis and collectively advocating for promotion of moral disengagement implications remains critical to sustainable crisis management in the Niger Delta. Otherwise, the crisis might continue to intensify and flow with the adoption of a classic cyclical approach that exists in crisis management methodologies. This research extends beyond 'gaps filling in literature' to the advancement of some salient concepts such as moral disengagement, moral evaluation and social trust with their consequent implications for crisis and disaster management in the context vandalism and militancy in the Niger Delta. In another perspective, the contributions from the research suggest the need to develop new theories based on the findings and in the context of moral disengagement and risk perception.

3.1 Moral Disengagement: A Conceptual Interpretation

Moral disengagement (MD) theory seeks to explain or analyse the means through which individuals rationalize their unethical or unjust actions. Although the concept of moral disengagement (as developed by Albert Bandura) is highly contentious because there is no

universality or common interpretation of what is unethical, immoral or unjust and little is known about the antecedents of moral disengagement. For instance, when participants were asked to indicate their agreement with questionnaire items on mechanisms of moral disengagement such as "people who treat militants as animals or sub-humans should be treated as such", the research findings indicate high degree of acceptance to commit more moral defiance. This explanation is more likely because when we are not aware of the moral consequences of our actions, unethical behaviour is both psychologically easier (Butterfield, Trevino, and Waever 2000; Reynolds 2006; 2008) and epistemologically palatable. However, to avoid misconception regarding the role of moral disengagement in vandalism and militancy, a conceptual clarification is necessary.

Moral disengagement is a psychological process by which individuals engage in sanctionable behaviour through eight different cognitive mechanisms without distress or self-condemnation (Bandura 1999). The eight different cognitive mechanisms of moral disengagement include moral justification, advantageous comparison, attribution of blame, euphemistic labelling, diffusion of responsibility, displacement of responsibility, distorting the consequence, and dehumanization. Employing these mechanisms reduces the cognitive dissonance individuals experience when engaging in morally questionable behaviour and enables their participation in them without the typically attendant negative cognitive or emotional consequences (Moore and Gino 2013). For example, when ex-militants in this research construe environmental pollutions through their own deliberate vandalism of oil pipelines and infrastructures as demonstration and expression of frustration and agitation, three mechanisms of MD – moral justification, diffusion of responsibly and euphemistic labelling concurrently operate to allow militants penetrate such acts and making the environmental pollution undistinguishable.

In conclusion, mechanisms of moral disengagement allow people to misbehave without feeling obliged to any kind of reparation and without carrying any need to change the moral standards they are ignoring (Caprara et al. 2009). Thus, unsurprisingly ex-militants in this research consistently maintained that 'attacking international oil companies in Nigeria is an expression of frustration and agitation in the Niger Delta' but this situation can be avoided. However, ex-militants are not particularly alone in moral disengagement because evidence and allegation of extra-judicial killings, state oppressions, brutality, rape and destructions of local communities by Nigerian security forces (often sponsored by international oil companies) in Nigeria abound. This demonstrates the complicated nature of moral disengagement and perhaps its implication when responding to cases of vandalism and militancy in Nigeria.

3.2 Moral Evaluation: Behavioural Framing

Moral evaluation is the objective appraisal of what is morally appropriate behaviours and responses, and why some actions are deemed permissible or impermissible. Past research suggests that the evaluation of moral issue often creates moral dilemma because individuals are torn between feeling that killing an innocent individual for any reason is inherently wrong (a deontological intuition) and that killing one individual to save five makes good economic (and therefore moral) sense (a consequentialist intuition) (Liu and Ditto 2012). Moral

evaluation can be ambiguous especially when it's discussed in the context of moral disengagement. Theory and research on moral reasoning and disengagement identify the evaluation of morality involving delinquency as critical to our understanding of how to mitigate and prevent future occurrence of similar cases.

Evolutionary theories of morality address why people are motivated to perform certain actions – such as wilful vandalism of oil pipelines – and to avoid certain actions – such as unwillingness to kill without a cause. These theories as discussed in previous studies (e.g. Haidt 2007) do not explain why people think that others should be punished for moral violations (DeScioli and Kurzban 2009). The complicated nature of moral reasoning and evaluation becomes most evident when we discuss them in relations to delinquency involving right and wrong (lawful and unlawful, obedience and disobedience, harms and benefits, consequences and inconsequential). Key evidence comes from militants' behaviours involving vandalism and kidnapping of expatriates in Nigeria. For examples, the surveyed ex-militants in this research consistently indicate that they regards and cherish moral values but they become independent of such values when environmental risks threaten their sources of livelihood and right to live in a sustainable community. This is classical case of moral justification in perpetuating heinous activities.

Moral evaluation can assume quite distinct dimension when there is a change in moral value of actions and activities that were previously perceived as amoral or unethical becomes not just morally palatable but moral condemnation is seen as accusation to hinder remarkable moral heroes (like ex-militants in this research). Within the wider literature, moral evaluation is similar to analysing a controversial moral issue of throwing a bomb on a person versus throwing a person on a bomb. This is basically problematical and perhaps proposes that no one can ever hold universal moral surveillance license despite the widespread concerns and desires to see transgressors penalized whether in fact or fiction. Although theories of moral evaluation and reasoning do not perceive morality as conscience-centred but rather refer to it as mechanisms for self-regulation (e.g. Fessler and Navarrete 2004; Greene 2008; Haidt and Joseph 2004), however it appears that morality is rather conscience-centred independent of third-party condemnation.

The possibility that conscience and condemnation are two different component mechanisms (DeScioli and Kurban 2009) draws attention to question such as "why militants' engagement in vandalism and kidnapping was perceived as wrong but Nigerian security forces extra-judicial killing of innocent indigenes classified as casualty or collateral damage". In fact, this suggests that moral evaluation is not cognitively simple because moral evaluation involves perpetrator, victim, and condemner — analysing the same scenario (e.g. vandalism and militancy) but each with distinct interpretations. In our case study, three players which involved militants, multinational oil companies, and Nigeria government are present, and it is extremely difficult and problematic to clearly state which one is the victim, for example. Finally, people are more likely to disengage from moral conducts and even become skilled at neutralizing morally questionable activities when the mechanisms of moral evaluation and disengagement routinely operate in them.

3.3 Defining Social Trust: Implications in Risk Perception and Moral Disengagement

The concept of trust is a complex and dynamic phenomenon with ambiguous and controversial interpretations. Trust can be the result of institutional arrangement, deep dependence and identify formation; and even can be perceive as a multidimensional construct containing both cognitive and affective contents including micro (interpersonal) and macro (inter-organisational) elements. Furthermore, trust can be a disposition, evaluation, prediction, and even expectation. It can likewise be a decision (decision to trust) and an action (act of trusting) relying or depending on another person's (party's) but linked with uncertainty and risk. In complex situations, trust is obstructed by two dominant factors – the decision to trust and the degree of trust. For example, should local people in the Niger Delta region of Nigeria that have agitate over environmental hazards and disasters trust both government representatives and oil companies for sustainably reducing or preventing such disasters? And, to what extent can government officials and oil companies judgement of the management of such hazards and disasters can be rely upon? The evaluation and prediction of the trust will significantly be influenced by risk perception because trust involves a degree of risk (placing one's interests and well-being in the hands of others).

The concept of social trust is a central and critical issue for practice and policy in mass emergencies and disasters management. This is because trust enhances cooperation, improved engagement, bridges empowerment, and reduced inappropriate motive in complex situations such as environmental disasters and terrorism. Social trust has been model as an independent variable (Gulati 1995; McAllister 1995; Smith, Carroll, and Ashford 1995), dependent variable (Doney, Cannon, and Mullen 1998; Inkpen and Curral 1997), or moderating variable (Das and Teng 1998; Mishra and Spreitzer 1998; Robinson and Rousseau 1994). Social trust is an expectation about the kind of motivations the agent is endowed with, which will be the prevailing motivations in case of vandalism, militancy (terrorism) and crisis. In clearer term, social trust is a measure of the trust that an individual has in government agencies and organisations to manage a risk (Siegrist, Cvetkovich, and Roth 2000) and is a primary influence on environmental risk perception (Carlton and Jacobson 2013). The focus of this research is social trust which means interpersonal or horizontal trust between citizens and political elites, or citizen confidence in political institutions and multinational organisations.

However, what is trust? Trust is the belief that others will not (at worst) knowingly or willingly do you harm, and will (at best) act in your interests. Trust is defined as the assured reliance on the character, ability, strength, or truth of someone or something (Webster 1991; cited in Wray et al. 2006). In most cases, trust is defined in the context of different types of relationship with different consequent implications. More relevant to environmental risks and disasters, trust involves the belief that others will perform in a way that is beneficial to us or at least not detrimental (Gambetta 1988, p. 217). For example, the question of how vandalism and militancy is influenced by social trust in others is significant for managing hazards, environmental risks, and disasters.

Two broad schools of thought about trust have emerged in wider literature. First, trust is considered as an individual property related to individual characteristics either core personality traits or individual social and demographic features (such as age, gender, income, class, and education). Second, social trust is considered as a property not of individuals but of social systems depicting a top-down approach that focuses on the emergent or systemic properties of

societies and their central institutions (Delhey and Newton 2003). Within the social context, trust refers to a situation characterised by uncertain situation where one party (trustor) is prepared to depend on the actions of another party (trustee). The degree to which people trust is influence by belief in the honesty, openness, fairness and goodwill of another party. In the context of the Niger Delta crisis, the local people have often rely on scientific experts in the past to provide information concerning severity of environmental hazards and disasters, and depend on multinational oil companies to take meaningful decisions in preventing, mitigating and addressing the "invincible" environmental harms from oil and gas activities. A breach of trust between those who take (and manage) risks and those who are (apparently) victimised by the risks others take is at crossroad. Key evidence comes from the research conducted by Douglas (2004), Duggan (2009), Dule and Nwankwo (2001), Inokoba and Imbua (2010), Mafimisebi (2013), Mafimisebi and Thorne (2015), Ogbonna and Mafimisebi (2016), Okoli (2013), and Ubhenin (2013).

Therefore, the needs to provide explicit explanation on how to reconcile the contending parties can never be overstated. Research has suggests that trust is most important where people consider that they have little personal control over the hazards they are exposed to (Glenn et al. 2011). The nature of environmental hazards and disasters in the Niger Delta require high degree of trust between experts and local people. Local people trust in knowledge of the expertise (e.g. multinational oil companies) can be significantly impacted once environmental practices of multinational oil companies compromise their safety and well-being, and right to live in a sustainable community. Hence, the theory that organisation's (multinational oil companies) is open and reliable in communicating possible environmental impacts of their activities in the Niger Delta and range of activities gear towards addressing such impacts can induce local indigenes (people) to trust such organisations. Although organisational reputation can affect social trust, the perceived honesty of organisation in environmental reporting and communication with vulnerable communities can help build and develop trust.

3.4 Research Objectives and Questions

The current research aimed at testing hypotheses connected with broader ongoing PhD research investigating impact of moral disengagement in risk and crisis management. However, as to understand the risk perception of the actors involved in the Niger Delta crisis, we chose to analyse the link between risk perception and moral disengagement in the context of crisis management. This is achieved with particular reference to ex-militants in the Niger Delta who were members of the Movement for the Emancipation of Niger Delta (MEND) and Niger Delta People's Volunteers Force (NDPVF), Port Harcourt, Nigeria. The main objective of this study is to critically analyse the influence of risk perception and moral disengagement in the context of vandalism and militancy among ex-militants in the Niger Delta, Nigeria. The research seeks to: (1) further our understanding of how risk perception and moral disengagement impact crisis management, and (2) make recommendations that might improve the management of novel crisis. To achieve these objectives, the following research questions were pragmatically addressed:

RQ1: How do militants perceive vandalism and violence perpetuated against international oil companies?

RQ2: What factors influence risk perception and moral disengagement?

4. Hypothesis Development

In this section, we discuss the salient issues of the research to derived two main hypotheses. These salient issues – risk perception and moral disengagement as previously noted are central to the research context presented here and critical for sustainable crisis and disaster management practice especially in Nigeria.

4.1 Risk Perception Predict both Vandalism and Militancy

A number of prior studies on risk perception mostly fixated on both rational-choice and experiential models of risk (Bostrom et al. 1994; Epestein 1994; Leiserowitz 2006; Lowenstein et al. 2001; Read et al. 1994; Sjoberg, 2000; Slimak and Dietz 2006; Slovic 1987; Slovic et al. 2002). However, the extent to which militants (vandals) perceive risk is crucial towards sustainable crisis management. Their perception of risk apparently results in some form of action or response (Rahm and Reddick 2011). In context, there is indisputable thesis lacking of empirical validation that both underestimation and overestimation of risk (crisis) can result in unpleasant or unwanted outcomes. Risk perception, defined as the subjective judgements that people make about the threat posed by a hazard (Leiserowitz 2006; Slovic 1987; 1999); may partially explain why people engage in vandalism and militancy. A key component of risk and crisis communication in the Niger Delta crisis is to pragmatically understand risk perceptions of the actors involved. Moreover, policymakers have a crucial role to play in understanding the risk-specific dynamics (such as risk voluntariness, risk salience, social trust, environmental attitudes, perception of risk control, public's familiarity with the risk, and the morality of the risk) that influence risk perception (Carlton and Jacobson 2013; Dunlap et al. 2000; Hawcroft and Milfont 2010; Sandman 1987; Siegrist et al. 2000) as components of sustainable crisis management in the Niger Delta.

The link between delinquent behaviour (vandals and militants) and risk perception is well established. To avoid misconceptions regarding the role of risk perception in the context of vandalism and militancy, which are causally linked, we draw on the construct that people only know things to be high risk when they are self-aware and concerned about it (or perceive it to be so). Empirical studies have confirmed that higher levels of environmental concern are associated with greater risk perceptions across a variety of environmental risks (Carlton and Jacobson, 2013; Kellstedt et al. 2008; Slimak and Dietz 2006; Stern and Dietz 1994). This correlates to the existing knowledge regarding risk perception, specifically knowledge theory, which hypothesises that individuals perceive things to be dangerous, or a threat, because they know them to be dangerous (Gerber and Neeley 2005). Albeit the understanding of the knowledge theory of risk perception is not sufficient to evaluate people's perception of risk, Wildavsky and Dake (1990) examine five theories of risk perception which include knowledge theory.

Quite quintessentially, errors in risk perception can severely hamper strategic options for managing risk/crisis. Differences in perception of risk from the Niger Delta crisis do seem to align with differences in general management and political issues (Rahm and Reddick 2011). Thus, it may not be wrong to posit that this is a fundamental source to the crisis. Nonetheless, perceptions are not facts but can be a foundation for other attitudes and behaviours. For example, studies have noted that militants within the Niger Delta perceive their activities (vandalism, violence, kidnapping, etc.) as self-determination and liberation struggles against the IOCs for environmental degradation and pollution and against the Nigerian state for resource control and oil revenue, poverty and decay infrastructural development, bad corporate governance and corruption (Cesarz et al. 2003; Inokoba and Imbua 2010; Mafimisebi 2016; Mafimisebi and Thorne 2015; Ubhenin and Aiya 2010; Ubhenin 2013). Therefore, perception issues can never be neglected and are integral to our understanding of the context presented in this research.

Following this, quite often in crisis management perception (though not reality) thus become reality. However complex and controversial that may seem, the issue of risk perception has been found to be contingent as much on context and culture as physical reality (Carlton and Jacobson 2013; Slovic 1987; Slovic et al. 1980). Since risk perceptions could be measured and the results replicated (Borodzizc 2005, p. 22), this would provide the foundation to objectively address the Niger Delta crisis. A word of caution is that risky decision making based on empirical evidence of risk perception can prove problematic when viewed in the context of practical crisis management. Notwithstanding this critique, psychometric approaches in risk perception can help balance public perceptions if at variance with, or disagreeing with, expert assessments (Lichtenstein et al. 1978; Otway and Von Winterfeldt 1982; Pidgeon et al. 1992; Slovic et al. 1980; Starr 1969) of the crisis. Therefore, in the word of Borodzizc (2005, p. 20), any risk measurement needs to be sensitive to the system of understanding in which that risk is viewed. In a more specific perspective, the risk perception of militants (including delinquent youths) in the Niger Delta affect their judgement of vandalism and militancy in Nigeria. However, we argue below that abuse of moral disengagement mechanisms may be a direct causation in crisis intensification.

4.2 Abuse of Moral Disengagement Mechanisms (MDM) Predict Militancy

Moral disengagement has been discoursed in the context of aggressive and violent conduct – war, genocide, and terrorism (Bandura 1999; Bandura et al. 1996; Paciello et al. 2008; Pelton et al. 2004; South and Wood 2006), corporate transgression and organisational corruption (Bandura, Caprara, and Zsolnai 2000; Beu and Buckley 2004; Detert et al. 2008; Moore 2008; White, Bandura, and Bero 2009), peace and conflict (Jackson and Sparr 2005; McAlister 2001), computer hacking (Rogers 2003; Young, Zhang, and Prybutok 2007), less humane conduct (Fiske 2004), more deviant behaviour (Ntayi et al. 2010), and has been shown to lead to greater aggression (Bandura et al. 1996). Moral disengagement also plays a precarious role in the processes of organisational crisis (Mafimisebi 2013). In fact, Mafimisebi (2013) demonstrate that the susceptibility to moral disengagement mechanisms leads to crisis intensification and can cause unintended consequences for organisations. However, the present research

investigates moral disengagement in the context of militancy and vandalism. To put the Niger Delta crisis in perspective, Bandura (1990, p. 43) remarked that the mechanisms of moral disengagement operate in everyday situations in which decent people routinely perform activities having injurious human effects, to further their own interests or for profit.

In the context of the Niger Delta crisis, morality analysis of crisis management (CM) broadly demands that both the challengers' – (militants) and antagonists' (international oil companies and Nigeria state) ceased acts or actions typically abuse MDM. If MDM and CM are connected then the explanation of morality in crisis will unavoidably tie to the elucidation of these phenomena. Critically, morality analyses in crisis management practice cannot escape the multiple complexities which can be characteristically described in terms of game theory. Game theoretic analyses are most useful to model and manage risks from adversarial settings. These enable analysts think more clearly and effectively about the risks of adversarial situations by clarifying what should be modelled as decision variables for different players and what should be modelled as chance or consequence variables (Cox 2009). Albeit not without limitations, the study of game theory suggests that actors (players) in crisis can significantly affect each other's outcomes.

Similarly, game theory can do much to alleviate dangerously oversimplified approaches to crisis management, such as those that ignore issues of crisis morality and moral disengagement (for example, attribution theory). At its most basic level, game theoretic analysis in crisis demands every stakeholder challenges their own assumptions with broader perspective of others and practically considers the interaction of goals which are likely to shape behaviour. Empirical studies have proved the practical usefulness of game theory in understanding the evolution of mechanisms for strategic behaviour in humans and non-human species (Kohlberg 1981; Krebs and Davies 1993; Macnamara 1991; Maynard Smith 1982). Further, given the dynamic nature of crisis and problematic definition of morality in crisis response, what can be inferred about the implications of moral disengagement abuse in crisis situations? The Niger Delta crisis principally involves three set of players (Nigerian state, International oil companies and Host communities) with asymmetric positions, each requiring different adaptations for sustainable crisis management. Therefore it is possible that moral disengagement mechanisms can predict militancy in Nigeria.

The debate of whether particular actions (such as militancy, vandalism and military oppression) are right or wrong continues to generate contemporary interests among practitioners and laypeople. Moral disengagement explains how people come to engage in detrimental conducts that are otherwise incongruent with their moral standards (Bandura 1999). We contribute morality analysis of crisis response, focusing on moral disengagement. The evolutionary justifications for why specific actions or responses are apportioned particular moral values have received substantial devotion within the body of knowledge (for example, Alexander 1987; Darwin 1871; DeScioli and Kurzban 2008; de Waal 1996; Haidt and Joseph 2004; 2008; Hauser 2006; Krebs and Janicki 2004; Lieberman, Tooby, and Cosmides 2003; 2007; Moore 1903; Ridley 1996; Wilson 1993; Wright 1994). However, why militancy is perceived as 'wrong' and military oppression to combat militants 'right' are not always clearly justify and how they are different from moral disengagement abuse in crisis is not always clear.

Bandura (1999; 2002) described eight instruments of moral disengagement (moral justification, euphemistic labelling, advantageous comparison, displacement of responsibility,

diffusion of responsibility, distortion of the consequences, attribute of blame and dehumanisation of victim) which allow people to misbehave without feeling obliged to provide any kind of reparation and self-flagellation that such behaviour usually evokes. More explicitly, these eight cognitive mechanisms serve to disinhibit an individual's ethical behaviour and makes individuals more or less inclined to morally disengage (Baker, Detert, and Trevino 2006; Bandura 1986; Bandura et al. 1996; Pelton, Gound, Forehand, and Brody 2004). Exploiting any of these mechanisms, an individual action becomes morally palatable and provide avenues to engage in unethical and inhumane behaviour without the self-censure such an act would typically provoke (Bandura 1999; Bandura et al. 2001; Detert, Trevino, and Sweitzer 2008; Mafimisebi and Thorne 2015; Moore et al. 2012). On this premise, it can be argue that abuse of moral disengagement mechanisms predict militancy and crisis intensification in the Niger Delta. Empirical studies have suggested that the mind after moral disengagement welcomes transgressions, violence, cruelty and nothing good is likely to happen (Bandura 1986; 1990; Bandura, Barbaranelli, Caprara, and Pastorelli 1996; Chugh et al. 2014; Fiske 2004; Moore 2007; Moore et al. 2012; Ntayi, Eyaa, and Ngoma 2010). It can therefore be concluded that when there are avenues to exploit moral disengagement mechanisms such avenues create rooms for inhumane conducts and activities such as vandalism and militancy.

4.3 Two Main Hypotheses

The discussion above offers a theoretical underpinning to build and develop two main hypotheses concerning the vandalism-militancy relationship under different conditions. This research presents empirical evidence gathered from the study of ex-militants in the Niger Delta to challenge established mythologies in crisis and disaster management about risk perception and moral disengagement which impinge upon sustainable crisis management. In this research, the following hypotheses were formulated: (1) risk perception predicts both vandalism (oil facilities and state assets) and militancy; (2) abuse of moral disengagement mechanisms (mechanisms) predicts militancy. The idea that vandals and militants are inhumane and that if we can manage to alienate or capture them will prevent or reduce future crisis/disaster may seem controversial from the point of view of moral disengagement. There are two reasons why this conventional wisdom appears to be invalid. First, when vandals and militants commit heinous act such as deliberate blowing up of oil pipelines and kidnapping – such acts do not make them less of human. The contention is that by dehumanizing them and then engages in their wilful destruction through the instrumentality of the law and perhaps moral disengagement mechanisms (e.g. advantageous comparison and moral justification) crisis responders similarly become morally disengaged (deontological perspective). Second, the magnitudes of the harmful consequences are what best describe vandalism and militancy; and the notion that the more militants who die, the less we care fundamentally present the same resemblance (consequentialism perspective).

5. Research Method

The survey population comprised 865 ex-militants in the Niger Delta generally members of the Movement for the Emancipation of the Niger Delta (MEND) and Niger Delta People's Volunteers Force (NDPVF). The participants are from approximately 30 communities and reside in the Niger Delta. In studying mechanisms of moral disengagement across different contexts, several methods and measures were used to meet the specific features of misconducts under analysis (Caprara et al. 2009). Specific to this study, both the 15-question New Ecological Paradigm (NEP) scale (Dunlap et al. 2000) and the Civic Moral Disengagement Scale (CMDS) (Caprara and Capnna 2005; Caprara et al. 2006; Caprara et al. 2009) were used to measure risk perception and moral disengagement in the Niger Delta crisis. In accordance with previous findings we expected risk perception and moral disengagement to be closely associated with vandalism and militancy (Bandura et al. 1996). In contrast, we expect CMDS to be the only significant predictor of crisis intensification and delinquent behaviours like vandalism and militancy. There are variables such as new ecological paradigm, effect of military oppression, social trust, group affiliation, proximity to oil company base and gender that were included in the regression models to empirically determine how they influence people's perception of risk.

5.1 Participants and Procedures

Participants were 753 Niger Delta ex-militants (89% males), ranging in age from 19 to 42 years (M=21.50, SD=8.3). Nine percent of the participants had primary education, 51% completed secondary education, 25% completed tertiary education, and 15% had a university degree. The participants were recruited by two trained conflict resolution experts in Port Harcourt, Nigeria. A survey instrument was adapted and developed from previous research (Caprara et al. 2006; Caprara et al. 2009; Carlton and Jacobson 2013; Sagone and De Caroli 2013). The survey along with a cover letter detailing the research aim was sent to the two conflict resolution experts for assessment. The initial survey was mailed out in the first week of November 2013. After three rounds of surveys, 753 participants completed the surveys by January, 2014 representing a response rate of 87.05%. The ex-militants were thoroughly briefed on the general aims of the study and instructed on how to complete the survey. The study complied with stringent ethical research procedure with participants consent sought, while letting subjects voluntarily withdraw from participating if they felt uncomfortable. Most importantly, the participants' personal data were protected and consents were sought to allow voluntary participation.

5.2 Measures

5.2.1 Risk Perception

Participants were asked to rate their level of concern about 14 environmental risks (Table 1). Three initial risks (storm surge, coastal erosion and groundwater contamination) included in the survey were dropped from the analysis due to inappropriate loading. The risks were selected based on previous findings (Carlton and Jacobson 2013; Mafimisebi 2013; Mafimisebi and Nkwunonwo 2014; Mafimisebi and Thorne 2015) and findings from in-depth interviews

with stakeholders in the Niger Delta. These risks were peculiar to the Niger Delta crisis and mostly mentioned during the interviews. The most-least rating method (McCarthy and Shrum 2000) was adopted because it has been found to efficiently avoid end-piling when rating lists of items. The list of risks was presented to participants to rate which one is least and most concern to them. Following this, participants use a 10-point rating scale to rate each of the risks. The endpoints of the scale were labelled, with 10 meaning "strongly concerned" and 1 meaning "not concerned at all". The risk questions were used to perform a factor analysis (extraction method; principal component analysis) with varimax rotation to reduce the variables into interpretable factors (Carlton and Jacobson 2013). Regression method helps to obtained factor scores which are retain for analysis.

5.2.2 Moral Disengagement

The CMDS composed of 32 items four for each mechanism, which participants must respond on a 5-point Likert scale (from 1 = strongly disagree, to 5 = strongly agree) response format. The moral disengagement scale was originally developed as a 40 item scale by Bandura et al. (1996) and Caprara et al. (2006) however, previous studies on the full 40 item version showed the scale being unidimensional with a Cronbach alpha of .94 (Caprara et al. 2009). Exmilitants rated their degree of acceptance of moral exemptions presented in 32 items covering the eight different mechanisms by which moral self-sanctions can be disengaged from militant conduct ($\alpha = .89$). A prototypical item is "It is alright to destroy oil pipelines and state assets because of environmental degradation". The scale measured the preference to use the following mechanisms of moral disengagement:

- 1. Dehumanisation (e.g., "people who treat militants as animals should be treated as such");
- 2. Advantageous comparison (e.g., "militants cannot be blamed if they vandalise and kidnap because most key government officials and security agents are also involved in such act");
- 3. Diffusion of responsibility (e.g., "militants are never responsible for the environmental risks in the Niger Delta");
- 4. Attribution of blame (e.g., "If international oil companies failed to clean up the environment it's their fault if they are attack due to that");
- 5. Distortion of consequences (e.g., "Vandalism and militancy cannot be considered reprehensible considering that government officials are insensitive to the people's demand");
- 6. Moral justification (e.g., "It is alright to attack international oil companies and Nigerian security agents because they collaborate to pollute the Niger Delta");
- 7. Euphemistic labelling (e.g., "Attacking international oil companies is the expression of frustration and agitation in the Niger Delta);
- 8. Displacement of responsibility (e.g., "People cannot be held accountable for violence committed because they are push to the wall").

Cronbach's alpha of the 32-items for this range between .73 and .89, with corrected itemscale correlations ranging from .23 to .58.

5.2.3 Participants protection

Based on the sensitivity of the Niger Delta crisis and guidelines for conducting ethically sound research which involves purpose, rigour, imagination, care for others, and economy have been complied with; the participants personal data were deliberately protected through the research design and removed from the findings. Furthermore, prior to data collection for the research, the participants have been assured of confidentiality through the two conflict resolution specialists who help facilitate and gather data for the study. Likewise, all participants were assured that the data is for research purposes only. In this case, participants were given options to opt out from the study if they felt uncomfortable. In another perspective, the research was design to understand the influence of risk perception and moral disengagement in vandalism and militancy. The essence is not to promote vandals and militants' agenda rather to understand what motivate them and how that understanding could provide useful and effective strategies to deal with environmental disasters, vandalism and militancy in the context of this research. The surveyed participants have been granted presidential amnesty by the Nigerian government in 2009 and therefore this research cannot be perceived as promoting their agenda. In fact, the policy implications of the research are clear because reduction in vandalism and militancy will lead to increase in production of crude oil and consequently increase in revenue for the Nigerian government. The global economy will further benefits because increase in crude oil production in Nigeria will lead to stability in global energy market and help address economic problems of energy disequilibrium.

5.2.4 Data analysis plan

The data analysis was conducted using SPSS 15. The statistical test carried out includes descriptive statistics, independent samples t-test, ANOVA, and regression analysis. Each of the risk factor components were used as a dependent variable and the NEP scale, the extent to which participants were affected by military oppression, social trust, participants group affiliation, proximity to oil company base, and gender of participants used as independent variables in a multiple regression analysis.

6. Results and Analysis

6.1 Rate of Response and Demographics

A total of 753 participants completed the surveys representing a response rate of 87.05%. The gender ratio using a non-response check indicates a similar pattern. The majority of the participants (89%) were male because most of the participants were recruited from male dominated communities in the Niger Delta and appear to be most willing to provide information on delinquency involving vandalism and militancy compared to their female counterparts. The mean participant identified as independent based on group affiliation, rating

themselves 4.16 (SD = 1.83) on the 5-point group scale. Most of the participants (98%) have lived in Port Harcourt for at least the last 10 years.

6.2 Research Question (RQ) 1: How do militants perceive vandalism and violence perpetuated against international oil companies?

Table 1 showed the scores for each risk item. The overall mean score for the risk items was 6.13 on a scale of 1-10. Participants were most concerned about farmland/fishing water destruction (M = 7.91, SD = 2.26); extreme weather conditions (M = 7.78, SD = 2.19); drinking water loss (M = 7.67, SD = 2.18); and property damage from oil spills (M = 7.43, SD = 2.29). In contrast, participants were least concerned about decline in animals (M = 4.97, SD = 2.18); property damage/revenue loss due to gas flare (M = 4.83, SD = 2.11); decline in plants (M =4.68, SD = 2.23); and flora, fauna and biodiversity loss (M = 4.64, SD = 2.17). In clearer term, three main factors of the risk data explaining 73.4% of the variance were retained based on the factors with eigenvalues over 1 and evaluation of visual screen plot (Ferguson and Cox 1993). Furthermore, the factors were reviewed and interpreted as physical environmental risks (M =7.33, SD = 1.85); economic risks (M = 5.72, SD = 1.73); and biological risks (M = 4.89, 1.78). In conclusion, all the three components are statistically significant and had acceptable internal consistency (Table 1). Thus, it can be deduced from the risk data that physical environmental risks were perceived higher than the other two categories (economic risks and biological risks). This was found to be the result of vandalism and militancy in the Niger Delta, Nigeria. An interesting aspect of managing vandalism and militancy, however, is that addressing environmental risks and disasters might lead to sustainable crisis management in Nigeria. This can be achieved through improvement in social trust between local communities, government representatives, and multinational oil companies. Trust has been found to enhance cooperation, improved engagement, bridges empowerment, and reduces inappropriate motive in complex situations such as environmental disasters and terrorism.

6.3 Research Question (RQ) 2: What factors influence risk perception and moral disengagement?

The social trust indicators had high internal consistency (alpha = .86) and were averaged into a social trust index. The mean social index score was 3.21 (SD = 0.82) out of 5. The 15-item New Ecological Paradigm scale also had strong internal consistency (alpha = .89). Additionally, fourteen of the 15 questions loaded highly (\geq .52) on the first unrotated factor, which is sufficient for treating the NEP as a unidimensional scale (Dunlap et al. 2000). The mean score of the NEP was 4.13 (SD = 0.67) on a 5-point scale, suggesting "little-to-moderate" environmental defiance among participants. The three regression models (biological risks, economic risks and physical environment risks) were statistically significant at the p < 0.001 level. However, the adjusted r^2 values ranged from 0.18 - 0.23. The results of the regression

are revealed in table 2. It can be interpreted that environmental victimisation and moralistic punishment affect high risk behaviours.

Table 1: Niger Delta environmental risk perceptions divided into scales based on a factor analysis

Risk Item	Mean (M)	Standard Deviation (SD)	Factor Loading (FL)	
Biological risks	4.89	1.78	$\alpha = .77$	
Reduction in fish	5.83	2.07	.58	
Reduction in animals	4.97	2.18	.83	
Decline in plants	4.68	2.23	.87	
Flora, fauna, and biodiversity loss	4.64	2.17	.61	
Physical environment risks	7.33	1.85	$\alpha = .91$	
Drinking water loss	7.67	2.18	.76	
Drought/flood/climate change	6.89	2.09	.85	
Farmland/Fishing water destruction	7.91	2.26	.89	
Sea-level rise	6.74	2.03	.82	
Extreme weather condition	7.78	2.19	.76	
Economic risks	5.72	1.73	$\alpha = .68$	
Increase in insurance premium	6.39	2.26	.79	
Loss of profit/revenue	6.81	2.19	.82	
Depreciation of property value	5.84	1.62	.61	
Property damage from oil spills	7.43	2.29	.89	
Property damage/revenue loss due to gas flare	4.83	2.11	.83	

Note: Overall mean was 6.13. Sample size varied by question from 537 - 549.

Table 2: Multiple regression models by risk categorisation of risk perception as the dependent variable. The dependent variables are the retained risk factor scores from the principal component analysis.

Independent variable	Model 1: Physical environment risk (β)	Model 2: Economic risk (β)	Model 3: Biological risk (β)
New ecological paradigm ¹	0.69***	-0.35*	0.44***
Effect of military oppression ²	0.53***	-0.15*	0.06
Social trust ³	0.47^{***}	0.06	-0.23
Group affiliation ⁴	-0.14***	0.11***	0.02
Proximity to oil company base	0.06	-0.11	-0.14
Gender ⁵	0.31^{*}	0.21^{*}	-0.069

Note: Asterisks indicate statistical significance: *=p<0.05, ***=p<0.001. Higher scores: higher environmental deviance. Higher scores: greater perceived effects of military oppression. Higher scores: perceived government distrust. Higher scores: high group influence. Dichotomous categorical variable, Man = 0, Woman = 1

The NEP score was the strongest predictor of physical environmental risk perception (β = 0.69, p < 0.001), with participants expressing greater environmental concern also perceiving greater risk. The effect of military oppression was another strongest indicator of both physical

environment risks (β = 0.53, p < 0.05) and having a strong influence on economic risks (β = -0.15, p < 0.001). In addition, participants who expressed less concerned for the environment also perceived greater mistrust by the government (β = 0.47, p < 0.001). Unlike in previous studies (Carlton and Jacobson 2013), group affiliation predict both economic risks perception (β = 0.11, p < 0.001) and physical environment risks perception (β = -0.14, p < 0.05). The three models found no statistical significance of proximity to oil company location having any influence on risk perception of the moral disengagers.

In another empirical analysis using the stepwise method, the eight mechanisms of moral disengagement were used as dependent variable and the predictor variables factors of perception were used to understand what drives the use of moral disengagement. As revealed (in Table 3) based on 2 (Gender) × 2 (Group Affiliation) × 8 (Mechanisms of Moral Disengagement) analysis of variance, gender and group affiliation have effects on the mean scores in each mechanisms of civil moral disengagement. The predictor variable factors of perception (frustration, marginalisation, resource control, collusion, poverty, and corruption, and dynamism, lack of social trust, perseverance, double standards and environmental degradation) were factors which existing findings revealed as some of the proximate cause of the Niger Delta crisis. The findings showed that frustration and marginalisation has significant impact on moral justification; perseverance, double standards and environmental degradation affected advantageous comparison; dynamism, corruption impact the displacement of responsibility; resource control and poverty affect attribution of blame; while collusion and lack of social trust affected dehumanisation of victims (Table 3).

7. General Discussion

The present study provides strong evidence that risk perception and moral disengagement affect crisis intensification. Utilising a sample of ex-militants, the study builds upon previous literature by further supporting the link between high risk behaviour (militancy, vandalism) and risk perception. However, additional evidence is provided on the implication of risk perception and moral disengagement on crisis management practice. Further, these results demonstrate errors in risk perception evaluation can cause counter-crisis response and result in applying the wrong strategic option. The results confirm existing research findings where undermining public risk perception can impede effective crisis management (Seeger 2006). Not surprisingly, there was significant high correlation between abuse of moral disengagement and militancy in the Niger Delta. When examining the overall sample, findings were consistent with previous empirical studies, confirming a link between dehumanisation and high risk behaviour (Chugh et al. 2014; Danielson et al. 2006). The research findings suggest that collusion and lack of social trust affect dehumanisation of victims. Therefore, improvement in social trust by addressing the traumatic experience of vulnerable people (ex-militants, and local communities' members) and ensure accumulation of favourable circumstances such as engagement in active economics activities and transparency in corporate governance can help mitigate the rate of vandalism and militancy in the Niger Delta.

Table 3: Mechanisms (Mechanisms) of Moral Disengagement

Mechanisms of MD	Gender	Group Affiliation	M	SD	ANOVA
WICCHAMSHIS OF WID	Man	MEND	2.63	0.64	ANOVE
Moral justification Displacement of responsibility	Iviaii	NDPVF	1.89	0.38	
	Woman				8.73*
	vv oman	MEND	1.95	0.59	0.75
		NDPVF	1.89	0.53	
	Man	MEND	2.03	0.48	
		NDPVF	2.43	0.63	
	Woman	MEND	1.96	0.57	5.13*
		NDPVF	1.92	0.60	
Euphemistic labelling	Man	MEND	2.10	0.52	
	W/	NDPVF	2.14	0.57	11 42*
	Woman	MEND	2.04	0.58	11.43*
		NDPVF	2.16	0.54	
Diffusion of responsibility	Man	MEND	1.96	0.60	
		NDPVF	1.89	0.57	
	Woman	MEND	2.04	0.49	4.26**
		NDPVF	2.04	0.49	
	Man	MEND	2.97	0.57	12.72*
	***	NDPVF	2.18	0.62	
Distorting the consequences Attribution of blame	Woman	MEND	2.17	0.68	13.73*
		NDPVF	2.04	0.52	
	Man	MEND	2.04	0.65	
	Man	NDPVF	2.43	0.12	
	Woman	MEND	1.97	0.47	4.15**
		NDPVF	1.87	0.54	
		TVD1 V1	1.07	0.51	
Dehumanisation of victim	Man	MEND	2.58	0.59	
		NDPVF	1.74	0.36	
	Woman	MEND	1.98	0.72	8.26^{*}
		NDPFV	1.69	0.72	
Advantageous comparison	Man	MEND	2.43	0.69	
	man	MEND NDPVF	2.43 1.98	0.69	
	Woman				7.43*
	vv Oman	MEND	2.16	0.57	7.73
		NDPVF	1.73	0.35	

Note: Mean scores significant statistical differences for * = p < 0.01, ** = p < 0.05.

While the research findings confirm that environmental risks are perceived more important than economic and biological risks, environmental concerns are nothing new because generations of people have expressed anxiety over local conditions in different forms. Nevertheless, what is relatively unconventional about environmental risks, disasters and militancy is the more persistent discourse of these issues and how they can impact global and local economy, people and sustainable development. The risk may have been grossly overstated but quite often perception of risk thus become reality (Mafimisebi 2013). This statement is made in reference to the Niger Delta crisis because those who take risks and those

who are victimised by risks others take may have been at crossroad. Therefore, the research concludes that what is needed is explicit theory that explains how to reconcile the parties in crisis. This can be achieved through application of game theory which play essential role in understanding how parties in crisis can balance counter-interest especially in adversarial settings. Game theoretical analyses are particularly useful in managing risks from adversarial setting because analysts can think more clearly and effectively about what should be modelled as decision variables and what should be included as consequence variables (Cox 2009). For example, the understanding of these predictor variable factors such as poverty, resource control, marginalisation, double standards, environmental degradation, and frustration of vulnerable people form key components of sustainable crisis management in the Niger Delta are imperative for policy design and implementation.

The results suggest that managing crisis using the victim perspective is fundamental to sustainable crisis management. The insights generated from the findings complement existing research (Carlton and Jacobson 2013; Dunlap et al. 2000; Leiserowitz 2006; Mafimisebi and Thorne 2015). The antecedents and consequences of vandalism and militancy in the Niger Delta represent a crucial paradigm to provide lasting solutions. In this research, we demonstrate how morality analysis of crisis management could further help to shape behaviours of actors in crisis. The focus should be clear evaluation of the moral implications of decision making affecting the environment in the Niger Delta. The Nigerian government can benefit from investment in local education aim at creating more awareness of vandalism and militancy in the Niger Delta. In the same vein, it makes more business sense for multinational oil companies like Shell and Chevron to actively engage in facilitating educational programmes that promote sustainable environmental behaviours in local communities.

Like previous research (Bandura 1990; Fiske 2004; Moore et al. 2012; Ntayi, Eyaa, and Ngoma 2010), moral disengagement abuse predicts militant behaviours in the Niger Delta. This is particularly true because distrust have been expressed by the ex-militants, as well as local people who have cited cases of military oppression and organised corporate irresponsibility. The ability to remain transparent in environmental reporting and engagement of multinational oil companies, and government initiatives such as helping vulnerable people understand how to tackle effects of environmental risks and disasters are crucial towards sustainable solutions. Perception issue must be clarified because risk perception and moral disengagement underpin crisis intensification and influence risk behaviours. The questions and efforts over the years have been how crises and disasters management theories and practices could help solve problem of environmental disasters, vandalism and militancy but now the core proposition is what happens when these theories and practices are the real problem.

The failure of government agencies (such as Nigerian National Petroleum Company, Ministry of Petroleum Resources, Niger Delta Development Commission) and multinational oil companies (e.g. Shell Nigeria, Chevron Nigeria, and Exxon-Mobil Producing Unlimited) in Nigeria to successfully prevent vandalism and militancy demonstrate the need to challenge established views and approaches to the management of such incidents. Past models including the declaration of amnesty for militants have gained relative success and both government and organisational policies offers limited hope of narrowing the frequent and incessant vandalism of oil pipelines and destruction of oil platforms and wells in Nigeria. This suggests that a different or alternative form of strategies such as changing the patterns of oil pipelines networks

in the Niger Delta, remote surveillance of oil pipelines, meeting essential needs through provision of basic infrastructures, reducing unemployment rate through policies, reducing level of illiteracy, engagement of local communities in decision making involving the environment, and community policing are required to address the vulnerable situation of the Niger Delta.

There is also need to strengthen legislations to aid effective prosecutions and addressing the morality issue through focus groups discussion with affected communities in the Niger Delta. The current Nigeria Petroleum Industry Bill which has proposed to address the communities' agitation and resource control issues require urgent implementation. Nigerian government and multinational oil companies in Nigeria could invest in engaging local communities through risk and crisis management training aimed at addressing risk perception, morality defiance, social trust, and how the Niger Delta crisis can affect sustained growth of local businesses. The possible implication is that once local people understand how the crises affect them, their businesses and the environment, there is potential for change in attitudes towards vandalism and militancy in the region. Investment in risk and crisis management training for local communities makes sense because significant reduction in vandalism and militancy can lead to increase in petroleum productions and consequently lead to more revenues for the government and the organisations concerns.

Our results have two essential implications. First, our findings suggest that individuals susceptible to moral disengagement abuses are not particularly predestined to engage in delinquent behaviours. Thus, we identify the need for policy redirection on issues of morality and risk perception in the Niger Delta. Second, continuous exploitation of moral disengagement instruments (mechanisms) would continue to intensify crisis. This further suggests the need to evaluate the current approach to risk and crisis management. Though the limitation of the study is acknowledged because the sample used might be insufficient to generalise, there are opportunities for additional research. Future research might need to focus on the mediating role of moral disengagement on crisis management. Since the present study combines risk perception and moral disengagement, there are great potential for how policymakers can maximise the range of options in dealing with crisis situations. What implications could this have on the practice of risk and crisis management? How well would morality theory in crisis management gain acceptance? It has been noted that fear of the unknown caused a large part of the human crisis and fear of the truth caused a large part of the business crisis (Fink 2002). This was posited as a general observation on the Three Mile Island crisis. However, it is argued that this is applicable in many crisis scenarios. Should this be the case here, what possible practical implications could emerge from morality theory in crisis management? Perhaps, future research could help provide useful insight.

8. Conclusion

We have drawn from the risk and moral disengagement literatures to posit that individuals susceptible to moral disengagement abuses are not predestined to engage in delinquent behaviours. This study contributes to the theoretical understanding of militant behaviour, and identified some factors such as environmental victimisation, moralistic punishment, lack of social trust, displacement of responsibility and dehumanization that intensify crisis in the

context of Niger Delta crisis. The work further deepens our knowledge of moral disengagement implications in crisis response and the mitigating circumstances – perhaps research in this area would continue to grow and shape the current approach in managing crises and disasters. The potential of morality analysis of crisis management is much needed in sustainable crisis management given the complexity and dimension issues that are present in such events. However, the nature of crisis should determine crisis management efforts in dealing with such crisis. Moral disengagement sometimes seems to threaten our very essence of humanity (Chugh et al. 2014) therefore attachment of morality and perception with practical implications are partially offered as areas to strengthen and improve risk and crisis management practice. This can be achieved through open and honest engagement in environmental issues affecting the vulnerable environment and vulnerable people in the Niger Delta region of Nigeria. In conclusion, evidence from this study indicates that artisanal local refinery, environmental victimisation, moralistic punishment, and moral surveillance are central factors which leaders must address in the Niger Delta crisis. This can be achieved through risk and crisis management training for leaders responsible for the management of the Niger Delta crisis and local communities' leaders

We did not claim to have offered a comprehensive viewpoint of how vandals and militants justified their inhumane conducts but rather provide detailed empirical evidence of how risk perception and moral disengagement influence vandalism and militancy. This is particularly true because the subject of the research context, analyses and discussions are limited to environmental disasters, militancy (terrorism) and vandalism in Nigeria. This is different from natural hazards and technological hazards. However, lessons may be learned from the research findings which can serve as precursor to the management of other types of mass emergencies and disasters (e.g. technological hazards, product recalls, sabotage, insurgency, jihadist, and suicide bombers, and terrorism) because of the behavioural components involved in them. The research revealed how vandals, militants, and crisis responders can cognitively redefine inhumane crisis responses.

What was clear from this research context is that common problems such are environmental degradation and disasters are constantly redefine in different forms, this is what is breeding alternative and opposing behaviours in their management. The nature of hazards (environmental disasters, vandalism, and militancy) addressed could help understand, for example, reactions to climate change, and natural hazards such as flooding. This is because there are clear uniformities in terms of how crisis leaders and local people respond to the debates surrounding natural hazards (and climate change consequences). Finally, the relative sample of this research and limitation to the Niger Delta region of Nigeria – thus provide insufficient argument to claim that the ideas presented are widely generalizable. Nevertheless, the implications of the research concepts and findings for crisis and disaster management practice are clear. The research models are silent on how gender disparity can complicate risk perception and moral evaluation but future research should consider this when discussing the research findings. It is also hope that research in this area will continue to grow and identify additional factors and strategies that are imperative when managing cases of disasters and mass emergencies.

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Notes

¹We thank the reviewers for pointing out the need to address the salient concepts related to this research and the editor-in-chief for alerting us to introduce these concepts to those unfamiliar with them. It is hope that these would stir the debates relating to understanding of vandalism and militancy (terrorism) in the context of risk perception and moral disengagement. These concepts are even critical to sustainable crisis and disaster management practice especially in the context of behavioural related crises and disasters such as terrorism, technological hazards, natural hazards and climate change.

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