

Homeland Security and Insurgency Management in North East Nigeria

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Abstract

Terrorism has become a global peril, and the North East Nigeria has got its own share of the insurgency by a dreaded Sect. Three states of North East Nigeria were the worst hit, leaving more than one million people comprising women and children displaced and homeless. However, on a daily basis, more people are displaced from their homes by the ruinous bombing which cause emergencies, and the emergency usually created, as a result, overwhelm the National Emergency Management Agency (NEMA) and other government agencies that take care of the Internally Displaced People (IDP). The planning and management of insurgency-related cases, though a government responsibility in Nigeria has a top-down approach which has not actually given prompt response during disasters and rescue to victims of the bomb attack. This article examines the role of a community-based Local Response Squad (LRS) when equipped with Information Technology (IT) infrastructure within the communities to assist in giving prompt responses to emergencies when it occurs. The LRS plan collaboratively for potential emergencies is also important to become more aware of local community-level values, planning, involvement and skill. This thesis also looks at the Human-Computer Interaction studies the interaction between people and computers to know how information technology affects insurgency management. The aim is to advance on emergency management resulting from insurgency through the plan of useful interfaces to technology. Conclusively, this article offers some implications for community insurgency management technology.

Introduction

The desecrated experience of insurgency and terrorist attack was new in Nigeria. A country of diverse religion and cultural differences co-existed for a century without experiencing the dreaded act of terrorism as witnessed in Middle-East. The North East States in Nigeria began to experience the act of suicide bombing and cruel butchery of innocent citizens by a dreaded sect in 2010, and it has continued till date. The women and children fall vulnerable to this bastardized act and more of them are displaced on a daily basis. The growing number of Internally Displaced People (IDP) as a result of this insurgency is overwhelming all emergency efforts made to rescue the victims.

Emergency management relating to insurgency involves the planning, reaction, resurgence, and alleviating the effects of human devastation that occur during the calamitous event. The Nigeria Emergency Management Agency (NEMA) were the actual federal government agency entrusted with the rescue and management of victims of insurgency; but other paramilitary agencies, and the Red Cross give helping hands in the exercise. The youth of the affected communities have also formed anti-terrorism and rescue squad called the 'Civilian JTF'. This community-based rescue team renders immediate assistant to victims before other governmental agency will arrive at the scene of bomb attack. The squad also engages in the search and fishing-out of suspected terrorists within the community and when caught, the suspects are handed over to the military JTF (Joint Task Force). The activities of the squad are usually neglected because the youths are not organized and they are not well trained in emergency management. Nevertheless, they give prompt response to emergencies and offer stringent security to terror prone communities.

The rationale to this article was to take a wider position on insurgency-related emergency management and look at the representation of community-based anti-terrorism groups and their use of information technology to enhance emergency work practices. This work is narrowed down to examining insurgency-related emergency management from the community perception. The idea is motivated by the understanding that the insurgency-related emergencies at the north-eastern states of Nigeria are local events, which happen in communities far from the military base. The equipping of community-based anti-terrorism squad with information technology will cushion the many of the glaring challenges and controversies in insurgency-related emergency management concerning the coordination of humanitarian relief across IDP camps and often from great distances from the scene of the emergency.

In a field study conducted to ascertain the preparedness of these anti-terrorist groups to combat the insurgency cases emanated from the activities of the dreaded sect, the youths were enthusiastic to fight the war themselves and give helping hands to their people when sudden bomb attacks occur. The youths testified that if equipped with sophisticated IT infrastructure, they can monitor and fish-out strange sect members within the community; detect and detonated locally made improvised explosive devices (IEDs) before it explodes; help in monitoring genuine internally displaced persons (IDPs) in the camp to thwart infiltration. On these trio findings, I shall base this article on the synergy between insurgency-related emergency management and the role of community-based local response squad (LRS) equipped with IT infrastructure.

Deploying information technology infrastructure to insurgency-related emergency management

Technology plays a dominating role in many aspects of insurgency-related emergency management, in particularly evident during disaster response. Nowadays we have a number of large information and communication technology infrastructure deployed to curtail larger scale disasters and manage the effects. The actual reason for deploying technology in emergency management is to detect improvised explosive devices (IEDs) before it explodes, connect, inform and finally save the lives of those impacted by disasters. Information Technology infrastructure restores connectivity to impacted areas so that governments can communicate with the affected citizens and the people can find their relations. IT infrastructure enables NEMA and other responders to coordinate rescue missions and work efficiently from the minute they arrive in a disaster zone, and helps businesses recover so communities can begin to rebuild faster. Moreover, after and in between attacks, technology helps us analyze, track and study insurgency-related disasters so that we can always be learning and developing better technological infrastructure and prepare to save more lives.

Going by the three key points deduced from the field study conducted in a North East community of Nigeria, where the youths testified that IT infrastructure would assist them in insurgency-related disaster management -: monitoring and fish-out strange sect members, detecting and detonating locally made improvised explosive device (IED), and giving a helping hand in monitoring genuine internally displaced persons, we shall elaborate the role of deploying IT infrastructure to each of the points mentioned above in emergency management.

Deploying public safety camera surveillance in insurgency-prone communities

Today, government and public agencies are taking safety measures and increasingly deploying cameras of all types to improve internal and external security. Secondly, expansion of video also reflects agencies' interest in proactive policing and using analytics to improve community safety. The use of cameras mounted at strategic places within the insurgency-prone communities will help monitor the movement of people within the areas to checkmate the sect's activities. The deployment of cameras of all types for surveillance, including body-

worn cameras, dashboard cameras, license-plate readers, fixed surveillance cameras and drones will Increased scrutiny and detect where the improvised explosive devices (IEDs) are produced locally and a halt to the production will be made by the law enforcement agencies. The deployment and use of these surveillance cameras go with enormous task of expertise, availability of power, storage and adequate security. Notwithstanding many advantages of the installation of video, the volume of files generated by more cameras pose a terrific challenge to IT departments for managing storage capacity. For instance, it takes about 600 body cameras deployed to generate 7 terabytes (TB) of video per month. In other words, it is approximated that 1 TB of data is roughly equivalent to 500 movies. Also about 11 body-worn cameras deployed generates close to 10,000 videos per month. These volumes of storage may seem high, but they are easy to reach even if body cameras only record movement at worship centres in North east states of Nigeria which is the major target of insurgency attacks in recent times.

The following points shall be noted in determining camera installation at public places.

- The type of camera to be installed at any given place shall be determined when a detailed evaluation of operational needs, community expectations and budget are considered to create a more suitable plan for which types of cameras should be used and where.
- The video files can be stored using the cloud services taking cognizance that the volume and size of body camera and other new types of video files will exceed internal storage resources of any IT department.
- The video security and integrity will be protected so that video files can be admitted as evidence during prosecution of insurgency culprits, criminals, and other civil cases. Adequate measures shall be put in place to maintain appropriate chain of custody as well as cybersecurity protection against inappropriate video access, modification, forwarding, deletion, copying or public release.
- It is very important to establish what type of access controls need to be in place so that video files can only be made available to authorized IT administrators. The video storage access method shall support external users in other agencies.

It is certain that video camera project will involve capital budgets for the initial purchase of cameras and batteries, a video management system, servers and storage systems if video files will be stored on-premises. Constant operational costs will include program management, camera replacement and increased storage capacity, whether on-premises or in the cloud. The Local Response Squad (LRS) when established within the troubled communities can be trained to use these cameras due to their familiarity with the terrain of the environment. Besides Soldiers and other law enforcement agencies within the community attract attention and therefore pose threat to terrorist who shade from their presence and commit their nefarious act taking the other way. The military will have the base station of all the cameras and monitor all activities of the LRS to checkmate nefarious tricks of infiltrators.

Detecting and detonating locally made improvised explosive devices (IEDs)

The improvised explosive devices (IEDs) which insurgents and terrorists use in North East Nigeria to attack their perceived enemies come from a coordinated activities such as financing, obtaining supplies, making IEDs, planting and detonating them. The IEDs used were usually manufactured within the community because the devices are so trigger ready to be carried to a long distance. Therefore, defeating these IED must involve a combined strategy of understanding and observing the enemy's tricks and makeup. Counter-terrorists law enforcement personnel and the LRS have to be trained to be aware of the enemy's behaviors, to look for indicators of IEDs within the terror-prone communities and to use technology to dispose or disable them. The coordinated strategy to defeat the IEDs includes the following measures:

- Gathering data concerning enemy activities that might indicate imminent IED attacks. This involve observing suspicious activities of people within the community using the

surveillance cameras mounted at strategic places to tracing or disrupting the movements of supplies of the raw materials for IED production and money.

- Detecting the IEDs using IT-based gargets.
- Disposing of or disabling the detected IED
- Protecting citizens from a detected IED

The community-based LRS should be trained to be suspicious of unattended packages along a road, fence, building or even a trash pile because IEDs are easy to hide in unsuspected places. After the training, the LRS shall be equipped with some new technologies which are capable of detecting, disrupting or disabling IEDs. These technologies are designed to place a "bubble" of protection around the community. For instance, many combat vehicles are now equipped with **radio frequency jamming devices**, which disrupt the cell phone signals often used to trigger IEDs. The Neutralizing Improvised Explosive Devices (**NIRF**) with radio frequency is another device that emits a high frequency radio pulse that deactivates IED electronics within a short distance. Another detecting device is the **Microwave-pulsing devices** which can be used to "fry" the electronics of IEDs. The **LIBS** (laser-induced breakdown spectroscopy) uses lasers to detect IED explosives within a 100-foot (30-meter) radius. The community-based LRS can be equipped with some of these devices to monitor, detect and detonate IEDs before the terrorist use them to carry out their nefarious activities.

Simple Anatomy of an IED

IEDs are homemade with five basic parts: [source: GlobalSecurity.org].

1. A power supply, often provided by car batteries or alkaline flashlight batteries
2. A trigger, switch or some other direct or indirect means of setting the device off, such as a radio signal, trip wire, timer or firing button that someone presses. A common form of remote trigger is a cell phone, cordless phone, radio or garage door opener activated by someone who is watching
3. A detonator, a small explosive charge that sets off the main charge. Detonators are usually electrical, like those used for explosions in construction.
4. A main charge, the primary explosive that's the big guns behind the blast. Unexploded landmines fit the bill.
5. A container to hold everything together. The container may be designed to force the blast in a specific direction.

Additional components packed in the device may include projectiles for shrapnel, such as ball bearings, nails and stones, as well as hazardous, toxic or fire-starting chemicals. IEDs may also be used as the explosive part of a biological or radioactive dirty bomb.

Let's look at how these parts work together: [source: GlobalSecurity.org].

1. The power source supplies electricity to the trigger or switch and to the detonator.
2. The trigger activates the detonator and initiates the explosion sequence. The trigger may sense the target, be activated by the target, be a timed trigger or be operated remotely.
3. The detonator explodes, thereby providing energy for the main explosive.
4. The main charge explodes, producing a high-pressure shock wave or blast wave, and may propel shrapnel, toxic chemicals or fire-starting chemicals.

The worrying part is that IEDs are relatively simple to make with a little research, time and training. After all, how hard is it to get batteries, cell phones and radios. Detonators and explosives such as C-4, Semtex and dynamite can be found at construction sites, oil rigs, and makeshift labs or purchased in terror-patronized black markets. Terrorist groups have been known to post recipes on their web sites which they know how to source materials. IEDs have several ways to explode which include -Package Type IED; - Vehicle-Borne IEDs (VBIEDs); - Suicide Bomb IED.

Suicide Bombs

The suicide bombing and vehicle-borne are the most widely used IEDs by terrorists in North East Nigeria due to the availability of vulnerable children that are hypnotize to carry out this barbaric acts. A suicide bomber brings a singularly difficult threat for communities. The main aim of the terrorist is not to commit suicide, but to kill or injure as many perceived enemies and innocent civilians as possible. A "person-borne" suicide bomb usually employs a high-explosive/fragmentary effect and uses a command detonation firing system, some sort of switch or button the person activates by hand. Some explosives with fragmentation can be contained in a vest, belt, or clothing that is specifically modified to carry this material concealed. The vehicle-borne suicide bombs employ the same methods and characteristics of other package or vehicle bombs using a command detonation firing system.

Response to Disasters and Monitoring Internally Displaced Persons (IDPs)

The method of our respond after a natural disaster is crucial, whether within the first few minutes of occurrence or the months of rebuilding that follow. However, the best disaster response begins before a disaster happens. As part of disaster preparedness, going by past experiences, building on solutions that worked and growing network of partnerships so that all the responders will get what they need when disasters happen. Rather than viewing disaster response as everyone trying to individually have complete of what they need ready to go for themselves, we should think of neighbors helping neighbors, sharing resources and being empowered to be first responders for each other. Highlighting community-based response is a key way to scale disaster response and preparedness to a backyard level, and communities should work together with emergency managers to jointly build resiliency before disaster strikes.

Solutions to obtaining information faster and distribute to organizations at the right point in time

The Red Cross made this statement in its World Disasters Report: "When disaster strikes, access to information is just as important as food and water and is an increasing critical need". The best solutions is the development of emergency.lu, a satellite that can be rapidly deployed to a disaster zone within hours in order to bring high-quality Internet connectivity and low-bandwidth versions of Skype and Lync to areas where regular Internet connections have been downed. This satellite has been used successfully in disaster prone areas during Typhoon Haiyan, as well as by the World Food Programme in humanitarian situations such as the food crises in Sudan and Mali. Greater volumes of data are generated and collected during disaster response and a greater opportunity for research, analysis and visionary ways to build upon key lessons learned.

Monitoring internally displaced persons (IDPs)

The LRS will increasingly be able to collect and extract more detailed assessments, which can proactively act before the next disaster when the IT infrastructure is provided. Working with the military and other emergency management agencies to build effective and collaborative ways to mine data, including social media, both during disasters and afterward is an important focus for this project. The LRS shall be in a better position to monitor the camp of internally displaced persons (IDPs) from infiltrators due to their familiarity of the terrain.

The future development of information and insurgency management

With the deployment of this technology for progressive, real-time open sharing of data during disasters, we look ahead to see a shift and rewiring of how insurgency-related disaster response is managed. Today with sophisticated camera phones, situation reports that could come a day later, can now be delivered promptly and a variety of data sources we rely upon to make critical decisions. I foresee the future of insurgency-related disaster response where

camera phone will be integrated to monitor insurgents by every Nigerian. In the same way, that there will be a transformation in the technique organizations exchange critical data in an open and real-time manner in Nigeria to make it available to people who need it to take prompt action.

Conclusion

Our aim in this research was to bring to light a synergy between the conventional disaster management agencies and a community-based local response squad (LRS) in response to insurgency-related disaster management when equipped with information technology infrastructure. Amidst what citizens in the various case studies were experiencing, the people when leveraged with IT infrastructure would checkmate insurgents and bring rapid succor to their kiths and kin whenever emergencies occur. The LRS when formed is more familiar with their environment and stand better chances to trace miscreants among them; detect and detonate improvised explosive devices (IEDs), and give a round the clock surveillance to their people because the military come to the communities only when insurgents strike. As technologies is accessible globally, their usefulness during both normal situations and disaster period will continue to increase, and it is very important that we design technologies catered to people who live in this disaster prone area of North East Nigeria.

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