## ORGANISING YOUR IDEAL EMERGENCY RESPONSE TEAM

## by Ramli Bahari

Think of the ease and grueling speed in which fire can consume your entire facility. Imagine the immense heat and intensity of the eye piercing black smoke that turns the room into pitch-black inferno. You have two and a half minutes to evacuate all employees out of the building and within the critical six minutes you have to fight and contain the fire before the arrival of professional emergency services.

The next thing that comes to your mind is how soon the fire fighting department team can attend to your distress call, considering the distance and the city peak hour traffic congestions. This dreadful scenario is the pressing factor for management to need trained and qualified volunteers who can respond to any emergency in order to eliminate or minimize loss of lives and property.

The successful formation of an emergency response team (ERT) is the result of a participative process involving senior management, departmental heads and all employees. The crisis management plan contains the policy and the generalized descriptions of department's responsibilities and other outside agency assistance that together respond to a crisis situation. The emergency response team is established as an important and integral component of the crisis management team.

It is not surprising that being a voluntary body; many organizations do not have documented operational guidelines for this team. The reason is simply that we are not too comfortable in imposing or creating restrictions to volunteers and as a result there are only assumptions to suit any rising need. The guideline is not meant to be binding but with the intent to foster unity amongst the team members moving together towards a common direction. The idea behind this article is to provide an insight for those who have to organize an acceptable standard of emergency response team in support of the welldesigned crisis management plan.

We need to be pretty clear on the underlying issues in creating this response team. It is difficult to comprehend as to what makes the members tick to feel responsible and demonstrate their willingness to invest their time as well as energy for a virtuous cause. My personal observation is that they belong to a category of people who have that extra concern, to take risk and constantly feel empowered to be the savior of their workplace. These positive attributes are the driving force in the creation of a superior and effective emergency response team. The Penang based Komag USA (M) Sdn, Environmental & Safety Manager KB Khor, and a veteran

Safety practitioner who has an outstanding track record of organizing successful emergency response teams describes the prerequisites of the best-in-class emergency response team as

`The answer is obvious and it underlines the principles of good organizational excellence. To start with, the ERT must be a veritable source of pride to its members and the organization it serve. It must be a success model of employee involvement, community service and volunteerism. Next, its members must be motivated and effective with a real sense of responsibility, discipline and care. Respect and admiration from both the internal and external communities would then be rightfully earned. Support and due recognition for members from the management are assured and enthusiastic. Finally, the administration systems and structures that are necessary to sustain the functions and operations of the ERT must be fully installed and operating on a continuous improvement basis, total quality platform. To achieve this status would require full commitment from the management in particular. Such commitment could be easily cultured with a clear apprehension and a conscience that the risk is out there'

In many multinational companies, the formation of the emergency response team is a corporate driven program. It is usually chartered as the organization's first line of trained responders to coordinate, contain and control in an emergency situation. The mission is to organize and train a group of volunteer employees who can be called upon to respond promptly to any emergency without endangering their own lives. The ultimate goal is to totally eliminate and minimize the loss of lives and property in any emergency situation.

Being competent, the question of authority invariably becomes their secondary concern since they have to exercise good judgment, such as to stop production and order evacuation, and in executing whatever needs to be done to prevent loss of lives and property. During an emergency, members automatically cease to function as part of their normal department and assume their emergency response team's role. Until such emergency situation is concluded, they are solely responsible to the emergency response team's chain of command.

However, the authority assumed by the emergency response team members neither replaces nor diminishes the authority or responsibility of the balance of management. The saving of lives and the protection of property prevails in the event this authority conflicts with any other plan, policy or procedure. On an encouraging note, this is a classical example of a highly empowered team in action.

Having realized the objective and acknowledging the wide span of authority, we should first formulate at the operational guidelines in order to remain within the scope of activities recognized by the company. The operational guidelines are the preferred reference as to the company's Standard Operating Procedure in order to maintain the status quo of its voluntary concept. Thereafter it will be the guiding principle for its operational functions and essential key activities. The operational guidelines amongst others should encompass the following.

Designing the structure and its span of control. The key player will be the shift emergency response team commander supported by the auxiliary teams. An example of an emergency response team organization is as fig 1. The commanders in particular need wide exposure to skills relating to command and control, report writing, investigations and communication techniques.



Fig. 1 – ERT Organization Chart

The responsibilities and the roles of the commanders, leaders and members should be clearly determined and categorized into non-emergency and emergency situation. The non-emergency will include the fortnightly training schedule, equipment maintenance, and physical fitness workout program and fire watch functions during shutdowns.

In the emergency situation, the role will be guided by the written plan designated to the specific crisis need. The fire fighters apart from their normal functions should be familiar with the chemistry of fire and fire language. The first aiders should ideally upgrade their knowledge to paramedic status. The rescue team should expand their capabilities to deal with high-rise building challenges. The evacuation team must be familiar with the building structures, evacuation routes and assembly points.

Roles and functions of the auxiliary team should be clearly defined in order to remain focused. The security personnel need to be efficiently trained in handling the emergency tree i.e. alerting the relevant authority and senior management on the impending need to activate the crisis management team.

Besides that, security has an important role in access and crowd control duties. The `Facilities' back up group will coordinate the power supplies cut-off effectively. The Medical group should be ready to reorganize an alternative injury bay and pre-alert the hospital to the likelihood of medical evacuations.

The emergency response team committee should be well represented by senior members from all departments. This is to reflect its leadership and commitment in this important program. It should include the internal consultants such as the safety; environmental, designated fire officer and employee relation staff.

The roles of the committee will be strictly administrative which will take care of planning, training needs, logistics and organizing creative activities throughout the year round.

Security personnel, safety staff and selected key facility staff have automatic membership to the emergency response team by nature of their job functions and the roles they play in the event of an emergency.

The rules and regulations should be clearly emphasized in order to maintain the expected standard. This will include health requirements, dress code, training attendance, special insurance coverage, hospitalization benefits, other incentives, safety requirements and compliance to company standard practices.

Well written plans should exist for the identified potential crisis; such as fire, chemical spillage, flood, mass food poisoning, violence at workplace, confine space rescue operation, bomb threats, utility failures or any others that can pose potential threat to the organization. It is common knowledge that certain types of organizations have different kinds and degree of risks than others.

The evacuation program should be complemented by an efficient alarm and public address systems. Special care and considerations needed to assist the handicaps, visitors, and contractors, known cardiac and asthmatic cases. Each department should have a luminous evacuation plan and arrow signs displayed at the entry/exit points of each department to assist movement during complete darkness.

Display board indicating members on duty for every shift will create the atmosphere to the general population that they are in a safe environment. In time of emergency, the members will instantly put on their luminous vest to seize control of the situation. During the non-emergency, they will proudly and conspicuously display their special emergency response team badges and remain to be part of the workforce. With the operational guideline, we have to look at the membership status. If the response is not very encouraging particularly in the initial stage then we have work on an aggressive membership drive program. Dynacraft Penang Security Manager, LC Tan stressed that

`We should first identify the group of volunteers who will be our actual strength and amongst them will emerge the inspiring leaders that we look for. We need this type of leadership to influence the rest'

Having recruited the required members, we should plan a training program that focuses to strengthen their skills and competencies. We should design a training package bearing in mind to create them into a competent workforce that is capable of responding to any crisis situation. The training, for short term will cover the essential needs as the following.

- Basic First Aid
- Hands on application of fire extinguishers
- Evacuation techniques and drills.
- Handy Talkie communications
- Cardiopulmonary Resuscitation

The long-term training strategy will incorporate certification program that prepares the team to adopt a pro-active role in crisis management. Concerted approach in educating members on environmental issues and safety awareness will help develop their skills on tactical preventive measures that will become an added value to the company. The principle of perfect practice makes perfect should be the basis of training requirements. Therefore, the initial certification program will include training on cardiopulmonary resuscitation, self-contained breathing apparatus and fire fighting. Other forms of additional training enhancements will include the following.

- Protective Personal Equipment
- Bomb Threats and Search
- Civil Defense
- Multiple Casualties (triage)
- Blood Borne Pathogen
- Chemical Response
- Fire Systems
- Computerized Alarm System
- Confined Space Management
- Ergonomics
- Hearing Conservation
- Ionizing Radiation
- Toxicology
- Environmental Hazards

The basic emergency equipment that the team should have can be divided into five major categories as shown below.

General Equipment

- Handy talkies
- Loud Hailers
- Whistles
- Torch-lights
- Vest
- Safety shoes

Fire Fighting Equipment

- AFFF Foam Concentration 6%
- Foam Branch Pipe
- Fire Helmet
- Fire Extinguisher CO2 and dry powder
- Fireman axe
- Fireman suit-aluminized
- Thermal glove Kevlar
- Hose nozzles spray and jet type
- Hydrant hose reels
- Compressor (Refill cylinder)
- Self-contained breathing apparatus (SCBA)
- Generator
- Exhaust Fan
- Halogen spotlight

Chemical Emergency Equipment

- Air-purifying respirator (APR) full mask and half mask
- Material Safety Data Sheet (MSDS)
- APR cartridge acid and solvent
- Drager Pump and tubes
- Chemical apron
- Chemical Coverall level A and B
- Chemical Overall Tyvek
- Chemical Goggles
- Chemical Safety Boots
- Chemical Spill Cart
- Chemical Spill Station
- Face Shield
- Chemical Gloves
- Respirator cleaning kit
- Respirator wipes

- Sorbent pillow 3M-M300 and P300
- Tape fabric
- pH indicator paper

First Aid Equipment

- BP Gauge
- CPR Mouthpiece Lateral and Micro shield
- CPR Mannequin Ambu and Resusci Anne
- First Aid Kit
- Burn Kit
- Cervical Collar
- Surgical Glove
- Resuscitator Oxy-Viva3
- Spider strap
- Stretcher 2 fold, 4 fold and spinal board

Search And Rescue Equipment

- Crowbar
- Hydraulic Jack 0.5 and 1 tonne
- Insulation rod
- Rescue Harness, hoist and tripod
- Rope (Manila and Nylon)
- Steel bar cutter
- Triage tag

The level of the team's efficiency can be further improved with additional equipment, mechanical and communication support. Management should seriously consider to support the program with the following.

Emergency response vehicle which is well equipped with fire fighting equipment and other basic emergency amenities. The vehicle will provide speed and mobility in transporting members together with emergency kits. At the same time, this vehicle can function as a mobile control center within hazard areas.

A motorcycle, which can be used by security personnel to receive the professional emergency, service at identified junctions and pilot them directly to the hazard area.

An ambulance vehicle for immediate evacuation of stretcher cases. This is important in terms of time factor and to prevent further aggravation to cases related to spinal and head injuries.

Fire fighting equipment known as `Foam Mobile Unit ' a specially designed to fight fire is a valuable asset to have.

The in-house paging system can be programmed to transmit predetermined numeric messages notifying all the emergency response team members of the nature of hazards, its locations and assigning tasks directly to group members without having to regroup for instructions. The application of this system permits us to localize evacuation needs that will minimize production loss. The Motorola People's Finder is a good system to start with.

Air-conditioned storage room will increase the life span of the team's equipment. This room should be strategically located for easy access. The equipment is to be inventoried and audited on the regular basis to maintain its serviceability.

With everything in place, these teams of volunteers are not only an asset to the company but on a personal basis, team members can use their acquired expertise to attend to injuries or mishaps in their own family and neighborhood. It is an honor when the authority recognizes the team's strength and its potential to place it as their priority back up group when dealing with potential national disaster. In this regard, it will also help to contribute to the company's social responsibility in the nation's development of a caring society.

This team needs to enrich itself through continuous learning, mutual inter-company training sessions and be sensitive to new ideas in this area. All ERT members should be psychologically attuned to be in a state of constant preparedness. National Semiconductor Penang Safety Manager, EC Low, who has vast experience as the ERT instructor, strongly recommended that

`The ERT members must go through frequent exercises and training drills under simulated disaster conditions to polish their skills in order to retain their effectiveness'.

They have to maintain good rapport and close liaison with various government departments and other agencies, such as the Fire Department, Civil Defense Corp, Red Crescent Societies and the Department of Environment, that can assist them in evaluating the training development programs and providing a concomitant critique to increase the level of performance to an expected standard.

At this juncture, it is appropriate to mention that the emergency response team's role has been designed to specifically handle crisis relating to the physical aspects of employee safety and its facility. Thus, other potential major crisis related to products, competition, regulations and customers would remain within the realm of the crisis management team. Finally, it is crucial that the management should take cognizance of the members' tireless effort, commitment, spirit of ownership and their intense desire to ensure business continuity. The program must be innovative in order to continuously motivate and encourage the team to achieve the status of a force to be reckoned with. We have to be prepared to make the difference between tragedy, saving lives and preventing unnecessary loss. In this context, make sure that your emergency response team works before it's too late!

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