Megaport Initiative at Port of Colombo

Background

Megaport Initiative has initiated by the United States Government with the help of U.S. Department of Energy (DOE) , National Nuclear Security Administration (NNSA) and Office of Second Line of Defense (SLD). The SLD has deployed radiation detection equipment to foreign countries in support of law enforcement since 1997 in response to (1) concerns about the amount of nuclear materials in the former Soviet Union, (2) the vulnerability of those nuclear materials to diversion and (3) the demonstrated interest of terrorist organizations and rogue nations in acquiring such materials. The megaport initiative provides radiation detection equipment, training and support to a prioritized list of world's largest and busiest ports (Megaports) to enhance the port's capability to screen container cargo specifically for nuclear and other radioactive materials . According to USA Officials, 20 Megaports will be established all over the world near future.

Objective

The principal objective of this program is to reduce the risk of illicit trafficking of Special Nuclear Materials (SNM) and other radioactive isotopes that might be used in weapon of mass destruction (WMD) or radiological dispersal device (RDD) before they reach the borders of the United States. However it is the fact that US Government has decided to direct all their imports through the Megaports located in worldwide. Therefore there will be economic advantages to Sri Lanka since more cargo will be go through the Colombo port.

Operations at Colombo Port

The Colombo port is to be equipped with radiation detectors to detect radioactive materials in all incoming and out going containers to and from Colombo port and transitional containers. For the implementation of this a team of officers participated in training programme which was held in Pacific Northwest National Laboratory, Hammer training site of Department of Energy, Richland, USA. The other officers regard to this project are trained by Mahapola Training Center of SLPA.

Responsible Parties

1. Sri Lanka Customs Department
2. Sri Lanka Ports Authority
3. South Asia Gateway Terminal
4. Sri Lanka Atomic Energy Authority
5. Sri Lanka Navy

Three types of stations have been established to carry out screening of containers for radioactive materials.

They are;

1. Local alarm stations – at in and out gates/container terminals (LAS)
2. Central alarm station (CAS)
3. Secondary inspection station (SIS)

Under this project there are 18 nos of portal monitor sensors fixed at gates and main pires in side the Colombo port area identified as Local Alarm Station (LAS). All these sensors connected to the main system and it is

controlled by the Central Alarm Station (CAS) is located near the NCT gate. All suspicious containers will be examined at Secondary Inspection Station(SIS) are located close to NCT Gate and at Kochchikada area.

Local Alarm Station

This point is manned by the SLPA officers and once a container or a vehicle passes through radiation detectors (Portal Monitors) emission of radiation is measured by portal monitor sensors and if the radiation level exceeds the threshold limit, it will set off an alarm in all three stations (LAS/CAS/SIS). Then LAS operator (SLPA/SAGT security personnel) takes action to stop the container/vehicle or the person and await for CAS operators decision. If necessary, CAS calls some more information from LAS about the vehicle or vehicle driver prior to take a decision. If CAS instructs to release the container or vehicle, LAS operator will take action to release same. If CAS decides to detain consignment for further verification, LAS makes arrangements to transfer consignment to secondary inspection site (SIS).

Central Alarm Station

This station is manned by Chief Assistant Preventive Officers(CAPOO) and it will function as the command and control of the entire system. Once LAS reports of radiation alarm, CAS operator studies the relevant manifests, cusdecs and all other documents of the consignment. Then CAS takes decisions to detain or release the consignment. In case of a vehicle or a person causing alarms, CAS operator communicates with LAS operator for more details since these details are not available with on line systems or documents. All these communications pass through the system. If CAS

decides to detain a consignment LAS (SLPA/SAGT security) takes action to transfer consignment to SIS.

After arrival of consignment to SIS, CAS starts to work with SIS and instruct SIS to identify the radiation material by using equipments provided with. On the report of SIS, CAS will decide whether to investigate further or to release the consignment. If the radiation level is very high CAS will take necessary action to inform Sri Lanka Atomic Energy Authority and other relevant authorities concerned.

The CAS operator has to work with CAS monitor, the information obtained from manifest and other documents, shipping agents, wharf representatives, examination reports, relevant authorities and other on line systems (ASYCUDA++, SLPA and SAGT Container Control Systems) and has to visit SIS and LAS when necessary.

Secondary Inspection Station

This station is manned by Assistant Preventive Officers(APOO) and the main function of SIS is locating the source of radiation, identifying, Investigation and reporting to CAS. The container has to be screened by a hand held detector by keeping the detector all around the container and taking down the readings of the detector. The point which gives the maximum reading would be the place where the radiation source is available. Then the identification device is brought to the location for identification. The officers attached to SIS must be able to use the hand held instruments and other techniques to inspect containers or vehicles to identify the sources of radiation quickly.