Paediatric Major Incident Preparedness: The Royal London Hospital

H. Smith, R. Cheema, and B. O’Neill
Paediatric Anaesthetic Department, The Royal London, Barts Health

A major incident (MI) is an event or situation, with a range of serious consequences, which requires special arrangements to be implemented by one or more emergency responder agencies.

Triggered by the recent events in Paris, the London Bombings, 9/11, Bali and the plots that are successfully foiled, the terrorism threat level in the United Kingdom currently stands at 'severe', stating an attack is highly likely. This, alongside such incidents as the 7/7 bombings in London and natural events such as those associated with extreme weather, it is becoming ever more pertinent that we are prepared to respond and manage a MI.

A health related MI is described as any occurrence providing a serious threat to health of the community. It is likely to involve disruption of services and require the implementation of special arrangements by hospitals, ambulance and primary care trusts (PCTs). It may be adult, paediatric or mixed. With children being common victims and the recent failed bombing of a nursery in Paris, the existence and provision for paediatric MI is also essential.

The Civil Contingencies Act (2004) places a legal obligation upon hospitals to compile adequate planning for a MI event. Carley and Blackshaw-Jones (1999) showed that only 1% of hospitals had a specific plan for care of children involved in MI. Following the 2001 London Bombings, Wong et al. demonstrated that whilst there was some improvement in training, many middle grade staff were deficient in knowledge.

London's Major Trauma System, formed in 2010 and made up of 4 Major Trauma Networks. The Royal London Hospital serves as one of the Major Trauma Centres (MTCs) within London. It receives in excess of 3000 traumas per annum, via ambulance and helicopter emergency medical service (HEMS). It has been involved in the management of various major incidents, including the London bombings in 2005, the nail bombing attack in Soho in 1999, and the terrorist bombings in Bishops gate in 1993.

A recent audit carried out this year by a medical student on special study module at the Royal London Hospital, addressed level of preparedness for paediatric major incident. The aim was to identify the Paediatric MI policy at 3 major trauma centres, evaluate the response at each centre and compare them. Here at the Royal London Hospital (MTC1 on survey) we reviewed the issues and deficiencies highlighted by this survey and have taken subsequent action.

At the Royal London there is a Paediatric Major Incident plan (revised in 2014)\(^\text{1}\). It contains a step by step process to follow, action cards, contact information, sign-in information and location and contents of Paediatric MI bags. The action points, highlighted by the recent audit\(^\text{2}\) and subsequent response are:

- **Safe location**
- Looked after by Paediatric recovery staff and checked routinely daily
- Easy to stock up if out of date/used as close to paediatric theatre stores
- Copies adult protocol of MI Boxes located on 4th Floor
- Bag would accompany a patient with their team throughout care

Location of Paediatric Major Incidence bags – Paediatric recovery area on 6th Floor

**Paediatric Aide Memoire**
- Each Bag contains an aide memoire for paediatric anaesthesia
- Each bag contains a pen and blank laminated sheet for calculations

**Paediatric Resus Equipment**
- Dedicated 2 bays in resus with appropriate paediatric equipment
- The 6 Paediatric MI bags can be relocated to the remaining 6 adult bays in resus to adequately equip these bays for paediatric resuscitation

Information distributed by:
- Writing and distributing of Paediatric Major Incident Bulletin
- Access to Information Document
- Paediatric Audit Day
- Departmental teaching
- Essential element of Induction Training
- Concurrent development of
  - Paediatric Major Haemorrhage Protocol
  - Paediatric 'Code Black' (head injury) Protocol
  - Development of Trauma Anaesthetic Group (TAG)
- During weekday daylight hours consultant anaesthetist attends all trauma calls, supporting and educating whole trauma team
- Fortnightly trauma educational meetings
- Fortnightly TAG newsletters

Location and access to policy:
Online at: Local policies, Surgery, Anaesthesia, Paediatric Major Incident Plan Final 2015
Hard Copy: Paediatric recovery area, Paediatric theatre reception, all Paediatric wards and Adult Theatre reception on 4th Floor

**Future actions:**
- Live exercise
- Simulation
- Repeat the Survey to see if there is actual improvement in staff awareness
- Run survey Pan-London Trauma Network
- Place Paediatric MI policy on intranet alongside adult MI

References
1. NHS emergency planning
7. Local Response to Paediatric Major Incident. RLH. 2014. O'Neill et al