**AUSTRALIAN EMERGENCY
MANUALS SERIES**

Manual 2

SAFE AND HEALTHY MASS GATHERINGS

A Health, Medical and Safety Planning Manual for Public Events

EMERGENCY MANAGEMENT AUSTRALIA

FOREWORD

Public safety should be a central consideration for any person or organisation involved with staging a mass gathering event in Australia.

The purpose of this Manual is to provide guidance in the management of public safety risks associated with organising, planning and conducting events which will involve mass gatherings of people. It is intended to assist conference planners, event organisers, promoters, publicity managers and other service providers to help make events safe and successful.

Advice given in this Manual should be considered in conjunction with any specific locality advice provided by a first responder agency in your state or territory or by the relevant local government authority.

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The manual was comprehensively reviewed in 2005/06 by a multi-agency working group with further specialist input from various agencies. The draft was disseminated for wider comment and feedback and the revised version was published in 2006.

PREFACE

Throughout Australia on any given day events are conducted which attract crowds large and small, at varying types and styles of venue. The quality and amount of planning for health and safety aspects of these events varies considerably. This may be due to many factors such as the number of spectators, the nature of the event, and the promoter's experience. Inadequate planning can increase risks associated with insufficient or ineffective spectator management or service provision. The evidence lies in the large number of public events where multiple injuries, illness and deaths have occurred.

Furthermore, in planning events, organisers may fail to consider 'what if a major emergency situation should occur during the event?'. Event organisers should follow a risk management approach to planning for the event. Various risks pose a threat to the successful staging of events, and therefore need to be managed with appropriate planning and preparation. A Risk Management approach is outlined in the *AS/NZS4360 Risk Management* and further focus on emergency risk management in *Emergency Risk Management Applications Guide* published by Emergency Management Australia.

Planning for public events requires cooperation and communication between event organisers and relevant government, private and community organisations. The decisions of one party can have an impact on another, so a sharing of knowledge and information is imperative through all stages of the event.

While event organisers or managers have primary responsibility for planning, preparation and the conduct of an event, the involvement of health professionals and emergency managers in the pre-event planning phase can contribute to a safer, and therefore more successful, event.

Against this background, and as an initiative of the Australian Government Department of Health and Ageing, a representative group of Australian health professionals was originally convened under the aegis of Emergency Management Australia to prepare a manual for health personnel in planning and preparing for mass gathering events. Following the preparation of a draft paper, a number of multi-agency workshops were convened at the Emergency Management Australia Institute, Mount Macedon, in 1997. The outcomes of this process included a comprehensive emergency management approach for mass gatherings and a manual published as part of the Australian Emergency Manuals series in June 1999.

The manual was comprehensively reviewed in 2005/06 by a multi-agency working group with further specialist input from various agencies. The draft was disseminated for wider comment and feedback and the revised version was published in 2006.

INTRODUCTION

This Manual has been prepared for guidance in conducting successful, enjoyable, incident-free mass-gathering events. In using the Manual personnel need to be aware of the reasons behind the conduct of the event and understand that whatever the event there will be some risks just as there are in life. This Manual will assist in the understanding and management of these risks.

The aim of this Manual is the prevention of injury, suffering or death that may occur as a result of poor planning or preventable misadventure at public events. It is a guide for planning and managing such events in the future and is applicable to a wide range of mass-gathering events.

Certain types of events have, by their nature, an inherent capacity for special management problems. While the general guidance given in this document remains applicable to these events, additional considerations are identified in Chapter 3 in the sections covering higher risk activities.

In certain situations, such as visits by high-profile political figures or controversial activists, intensive security arrangements are necessary. Such specific procedures are outside the scope of this Manual, and it would be inappropriate and counter-productive to provide details herein, given the wide and unrestricted distribution of this document. Where such events are planned, liaison between police, emergency service personnel, health professionals and appropriate security personnel is required to ensure health and safety and security issues are addressed in planning for the event.

In recent years the security environment in Australia has been heightened by the global threat of terrorism and terrorist attacks where the aim has been to inflict maximum casualties. Unfortunately mass gathering events pose some potential for terrorists to achieve their aims. Hence in conducting risk assessments for such large scale public events, organisers have to include these risks into their planning considerations. Under this approach counter-terrorism strategies can be integrated into existing security and risk management arrangements, rather than assessing terrorism-related risks in isolation. This is consistent with an all hazards approach.

The manual has been prepared for use by event organisers, promoters and managers as well as the many organisations and agencies in the emergency management and health sectors. It is hoped that emergency managers and health personnel (including environmental health officers, first aiders, ambulance officers, nurses and medical officers) will become proactive in the planning of public events to ensure that adequate measures and systems are in place to prevent, respond to and reduce the impact of any emergencies.

There are many people who contribute significantly to healthy outcomes at public events. It is anticipated therefore that this manual will be distributed to event organisers, promoters, managers, police, emergency service personnel, government bodies and any organisation or individual who contributes to the organisation of events.

It is not intended that the document override any existing legislation, local emergency management procedure or Australian Standard. The manual does not seek to address

the preparation of emergency management plans, but rather identifies the elements which should be considered by those responsible for planning and conducting events which attract large numbers of people.

Local government, police and emergency services should be approached for more detailed advice on planning and for the necessary permits and licences required.

EVENT PLANNING

CHAPTER 1

PRE-EVENT PLANNING

INTRODUCTION

1. Any public event begins as a concept proposed by an individual or organisation. The concept may not be more than the type of event, when and where it will be held. During the planning process many issues will need to be considered and explored by organisers and authorities before an event proceeds. An extensive checklist of these elements is at Annex J.

2. Event organisers/promoters should be encouraged to form an event organising committee made up of stakeholders, including members of the police, emergency services, local government and health services. Sub-committees may also be required to provide planning for particular aspects of the event. The following are some of the key issues that should be addressed from a health and safety perspective.

LEGAL ISSUES AND APPROVAL FOR EVENT

3. There is usually some form of legislation which governs or restricts public events or aspects thereof. In some cases, particularly for extremely large or high impact events, special State or local legislation for the event may be required.

4. Event organisers may be required to gain approval from local, and sometimes state, authorities to hold public events. This may involve obtaining a formal permit to conduct the event which could include further guidance/requirements or conditions for the event. In addition to advice from local governments, it is advisable to consult the local workplace or other regulatory bodies to ensure all required formal licences and permits are identified. Information on the approval process should be obtained early in the planning, including:

- details of the approving authority and any other authorities actively involved in the approval process;
- information required to support their application; and
- timetable including relevant deadlines for lodging of applications as lead time will be required for applications to be processed.

5.   Organisers should consider obtaining legal advice prior to the event. Items which warrant consideration include:

- liability for injuries;
- liability for acts or omissions;
- liability for financial obligations incurred in responding to major emergencies occasioned by the event;
- possible liability for the resultant effects of the event on normal emergency operations; and
- responsibility/liability for boundaries outside the event and the venue.

6.   Organisers need to provide legal liability insurance and documented indemnity for staff, performers, volunteers and patrons who are involved in the event. This protection is important for the normal activities that are part of the event.

There is a greater significance in providing legal liability cover and indemnity for people involved in an event where an emergency or incident may or does occur.   Staff, performers, volunteers and patrons need assurance that if they act in good faith to deal with accidents or injuries that they will be exempt from civil or personal prosecution.

People are more willing to respond to and assist in an emergency or incident if they are informed of, and provided with, indemnity in performing any remedial or mitigation action in response to an accident or injury.

Insurance policies require checking to ascertain that comprehensive cover for an event exists. Indemnity statement and disclaimers can be generic or may necessitate advice from legal experts to ensure such statements are valid and accurate.

7.   If licences or permits are required, they will usually carry a set of conditions (in addition to legal requirements) that must be met, and may require follow up inspections by regulatory authorities or local governments to ensure compliance.   Some examples of areas that may require permits or licences could include:
- dangerous goods storage and handling
- fireworks
- animal housing
- temporary structures and facilities
- food handling and service
- alcohol sale and consumption
- closure of certain adjacent or peripheral roads or streets.

8.   Some public sector agencies have adopted a "User Pays" policy for services provided at sporting and entertainment events. The aim of this policy is to improve the allocation of statute resources in the general community, by providing a system of charging for services deployed to plan for, and

respond to, sporting and entertainment events. Event organisers should consult local and state authorities for relevant fee structures and to determine any charges for services provided.

9. Organisers may be required to post a bond or provide liability insurance cover to meet costs of response to emergencies, subsequent venue clean-up, traffic, crowd, and other policing functions.

10. As a condition of approval being granted, organisers may be required to provide feedback on the approval process and an evaluation of the event. This post-event requirement might be done in the form of a debrief or a report to relevant authorities.

STAKEHOLDERS

11. It is essential to identify at the earliest possible stage all authorities/organisations, government and non-government agencies, and even key individuals, who may have an interest, role or contribution to make to the success of the event. It is better to err on the inclusive approach if there is doubt as to whether an organisation or agency would have any interest in the planned event. Omission of a key stakeholder in early discussions may affect the timing and other critical aspects of the event when or if they eventually hear of the event. Some possible stakeholders are:

- Event manager and assistants including bar and catering manager
- Promoter
- District police officer and/or police contact
- Liquor licensing officer
- Local government environmental health officer and/or safety officer
- Ambulance service
- First Aid Service provider
- Fire brigade
- Other emergency services
- Principal of security firm
- Local hoteliers and business representatives
- Transport operators
- Parking supervisor
- Site manager
- Waste disposal contractor.

12. The local government approval processes for some events outline the various agencies that need to be consulted but, as a minimum, it is suggested that police, emergency services and public health agencies should always be included in the early planning stage of any event. . Their subsequent input often alerts organisers to other key organisations to be consulted and also they can generally provide advice on the type of risks that have been faced by organisers of previous events. However, there is

no one set list of stakeholders as it will very much depend on the nature of the event. In working through the risk management approach, if it becomes apparent that a key stakeholder has been overlooked, then that omission should be rectified as soon as possible in the pre–event planning.

EVENT ORGANISING COMMITTEE

13. To spread the workload in the management of the event it is suggested that an organising committee be formed to work through the stages of the event. However, it should be clear who has the final authority in the committee structure for the sign-off for the event and for the management of the event during its progress. Again the composition of such an event organising committee will depend on the nature of the event.

14. For large-scale events it may be necessary for sub-committees to be formed to address particular aspects of the event, such as a medical sub-committee. There may also be a need to engage or co-opt technical expertise where the nature of the event has particular high risks. There could also be a need to form an emergency coordination committee if there are particular safety aspects surrounding the nature of the event (eg car races). One of the key roles of such a committee would be the close liaison with police and emergency services.

RISK MANAGEMENT

15. Managing risks associated with conducting mass gathering events is essential in the planning. Event organisers should identify the hazards associated with conducting the event and then plan to remove the risk, mitigate the likely impacts or provide arrangements to deal with the residual risk. The risk management approach should be developed using the *Australian Risk Management* Standard *AS/NZS4360.* Emergency Management Australia has also published an *Emergency Risk Management Applications Guide* based on AS4360 for use in determining risk management in emergency planning. These guidelines can be accessed through the Emergency Management Australia website at www.ema.gov.au. Emergency Risk Management (ERM) is a process which involves dealing with risks to the community arising from emergencies. It is a systematic method for identifying, analysing, evaluating and treating emergency risks. Risk treatments include prevention and preparedness as well as provision for response and recovery should an emergency occur. The ERM process can improve outcomes by:

- establishing a decision-making process
- focusing on the opportunities to reduce or manage the risk,rather than on the response to emergencies that may result from the risk
- engaging a wide range of individuals and communities
- promoting partnerships and enhancement of relationships
- fostering resource sharing and mutual aid arrangements
- providing auditable and credible means of reducing risk

- using a language that is common to decision-making in both the public and private sectors.

16. ERM is a structured continuous process with well-defined activities, leading to implementation of effective risk-treatment strategies. The five major activities of the process: establishing context, identifying risks, analysing risks, evaluating risks and treating risks are supported by two enabling activities, a) communicating and consulting, and b) monitoring and reviewing. These apply to each of the major activities of the process, ensuring relevance of outcomes and decisions. In addition, documentation occurs throughout the process resulting in a Risk Management Plan (RMP). Even with the involvement of police and emergency services to assist, **the risk management plan remains the responsibility of the event organiser**. Checklists are often good aide-memoires for comprehensive planning and a number are provided in the annexes.

VENUE

General

17. It may be necessary to consider a number of alternative venues for the event. Emergency managers may be able to recommend appropriate venues based on health and safety considerations and past successful similar type events.

18. Answers to the following questions will assist in selecting a suitable venue:

- What legislative requirements are there?
- What are local government planning/approval requirements?
- What types of activities are expected to be conducted?
- Will multiple venues be required to stage the event?
- What adjacent events are likely to have an impact on venue selection?
- Is the event normally conducted at a fixed facility?
- Is it planned to use a fixed facility in other than its normal use?
- Is the event regularly conducted at a temporary venue?
- Is the event a 'one off' at a temporary venue?
- What services/utilities are available at the venue?
- Is there a suitable scale map of the venue that could be used as a common reference map for all participating agencies including police and emergency services?
- What additional services and utilities will be required at the venue?
- Is there a need for backup services?
- What shelter facilities are available at the following:
  - Transport pick up and set down areas
  - Spectator and official viewing areas
  - Seated eating areas
  - Pedestrian thoroughfares
  - First aid and medical centres
  - Competitor and officials marshalling areas.

- What will be the duration of the event and will it go into the hours of darkness?
- Have the needs of people with disabilities been provided for?
- Does the date of the event clash with other events to be conducted in the area?
- Will the weather require any special considerations?
- What parking is available?
- Is public transport available and accessible?
- Are there any existing security arrangements/services?
- How accessible is the proposed venue for police and emergency services?
- Are there risks external to the venue that may impact on the location or event?

Crowd Movement

19. Aspects of managing crowd movement where there may be health and safety implications include the following:

- Public transport – congestion at road, rail, and water transport nodes and, in some cases, at airports
- Use of coaches and buses to reduce private vehicle usage and any potential problems which large vehicles may present; for example, access difficulties, parking requirements, potential road blockages
- Alterations to normal traffic arrangements and different patterns of road usage
- Traffic control
- The surrounding road network will need to be managed to handle the anticipated spectator vehicular traffic, before, during and after the event
- Public parking arrangements, overflow parking arrangements, signposting, segregation of pedestrian and vehicular traffic. If spectator parking areas overflow, will it cause congestion on surrounding roads? Are shuttle buses desirable, feasible, or necessary?
- Parking control
- Communication between traffic management groups and other services
- Access and egress routes including:
  - arrangements for people with disabilities;
  - pedestrian access including consideration of distance, terrain, surface and lighting;
  - footbridges/overpasses considerations;
  - pedestrian impact on vehicle traffic; and
  - designated pick up/set down points.
- Signposting, including gate numbering, inside and outside of the venue.
- Communications inside and outside the venue to provide public announcements, marshalling instructions and evacuation orders.
- Systems to monitor crowd flow, for example the use of spotters.
- Police and emergency services access.

- Outdoor events, sometimes spread over large areas, require some further considerations such as:
  - toilet facilities outside gates and between disembarkation points and the venue;
  - shelter; and
  - telephone facilities.

20. The venue should allow adequate regulation of crowd movement, for example: existing ticketed seating areas, sectoring and flow barriers including separation of vehicles from pedestrians.

21. Spectator overflow areas should be available to prevent crushing. Contingency plans are required in case spectator turnout significantly exceeds expectations. This phenomenon is common at rock concerts.

SPECTATORS

22. Different kinds of events may attract certain types of spectators which require special considerations such as:

- rock concerts may have a higher incidence of problems with drug and alcohol abuse, underage drinking and possession of weapons;
- religious/'faith healing' events may attract a significant number of ill and infirm people, which may increase the need for on-site medical care;
- events for senior citizens may also require higher levels of health services;
- certain sports events may attract over-reactive and violent supporters; and
- cultural events may require special arrangements, including the provision of interpreter services, special food services and multilingual signposting, brochures and announcements.

23. Where possible, spectators should be informed prior to the event, through advertisements or in leaflets accompanying tickets, of any special conditions or arrangements for the event such as public transport, traffic and parking and alcohol restrictions. Health information concerning health protective behaviours such as clothing, food and drink, sunscreen, shelter and personal medications should also be included as these can significantly reduce the workload on health care providers by reducing the minor injury and minor illness workload and contribute to the enjoyment of the event by patrons.

VOLUNTEERS

24. Trained, accredited volunteer staff can assist in many ways with crowd movement and spectator satisfaction. Suitably uniformed/identified volunteers with programs, who have knowledge of the venue layout and locations of emergency facilities, should circulate through the crowd to provide spectators/visitors with information and basic assistance. These

volunteers can assist in fostering positive crowd attitudes and reduce frustrations leading to well-behaved crowds.

25. For further information on spectator management, please see Chapter 5.

PUBLIC HEALTH

26. Relevant health services must be consulted on:

- safe and adequate water supply;
- food safety;
- sanitation requirements and waste management;
- water and swimming pool safety;
- pest/vermin control;
- infectious diseases prevention and investigation;
- standards for activities involving skin penetration, such as tattooing and body piercing;
- building safety;
- animal control;
- noise and other nuisance issues; and
- public health emergency management/planning.

27. Environmental Health Officers may need to be available on-site during the event to deal with any public health issue and to monitor public health aspects of the event.

28. Health services need to have legal authority to enforce 'cease operation' orders upon any on-site food providers who are found to be in contravention of food safety standards or otherwise operating contrary to the public interest.

29. For further information on public health, please see Chapter 6.

FIRST AID & MEDICAL SERVICES

General

30. General medical issues to be considered include the following:

- What level of on-site medical and first aid care may be required given the nature of the event?
- What number and mix of medical personnel will be required on-site, for example, first aiders, paramedics, nurses, medical practitioners?
- Will the health service provided aim to reduce the number of presentations to local emergency departments or hospitals. What form of minor injury care will be provided?
- Will event health services be provided to a crowd that may gather outside of the event or in the near vicinity – e.g. concerts/fireworks.

- What benchmarks for emergency health care response will be expected – e.g. response time in minutes for Basic Life Support (BLS), Advanced Life Support (ALS) and evacuation?
- Who will provide the personnel? How will they be funded?
- Are they the health service providers for the local area? If not, how will their services be integrated with the local services?
- Are the selected personnel appropriately skilled for the event?
- Will there be a need for any special credentials to allow medical personnel and/or vehicles access to all parts of the venue, especially to any restricted areas?
- How will medical supplies be supplied and replenished? Who will do this?
- How will pharmaceuticals be stored securely on-site?

31. Refer Chapter 7 for more information on planning for First Aid and Medical Services.

Facilities

32. Suitably provisioned medical facilities, such as a first aid room, tent, or vehicle, should be on-site. Certain events may require specialised treatment facilities. All facilities and vehicles should be clearly visible and easily accessible. Washroom and toileting facilities should be provided.

Ambulances

33. The relevant ambulance service must be consulted to determine any ambulance requirements for the event. Some considerations are as follows:

- Will ambulances be pre-positioned on-site, or will they be called to the venue on an as-required basis?
- If ambulances are on-site for participants, (for example at sporting events) are these ambulances exclusively for participants, or will they be available for injured spectators?
- Ambulance services should be advised about the emergency contact numbers that will be used for the event manager and the on-site first aid service. Frequently calls for assistance from the public are made by mobile phone direct to 000 and the ambulance service may know about an emergency before services at the event are aware.

Logistics

34. There are many health logistic issues to be considered in the planning of an event including:

- Will health staff operate in a facility to which the injured must make their way, or will clearly identified teams patrol spectator areas?
- Will there be vehicles to transport spectators to the health facility? What legislation, if any, governs such transport?

- Will vehicles be appropriate for the terrain? For example, four-wheel-drive vehicles may be required for off-road areas, and golf carts or similar vehicles for high-density spectator areas.
- Where an ambulance is not required, will a 'chauffeur system' be provided to transport persons from the health facility to their own transport?
- How will health staff be notified of, or summoned to, spectators requiring assistance in widespread spectator areas?
- What means of communication will be available for attending health personnel to communicate with off-site health staff, event organisers, security and other support staff?
- Are there any sponsorship conflicts between the event sponsor and any health service sponsors?
- Will mobility of health staff be restricted by crowd numbers and site layout?
- Where will health facilities be located? Will they be easy to find, clearly marked and have good access for ambulances?

Access and Egress for Health, Police and Emergency Services

35. The needs of health, police and emergency services for access to, and egress from, the venue, as well as movement around and within the site, must be taken into account in planning for the event. Dedicated official parking should also be made available for attending health, police and emergency services personnel.

36. Planning should ensure that health, police and emergency services personnel have access to all sub-sections of the venue, including performance, spectator and parking areas.

37. Transport management is essentially the domain of police, venue security, and transport and local government authorities. Planning should ensure that the venue has adequate access and egress for police and emergency service vehicles. Dedicated perimeter roads may be required for police and emergency services. In order to provide access and a buffer zone, adjacent streets on all sides of a venue may need to be closed, and parking banned, with access restricted to emergency service and residents' vehicles. Police and emergency services need to be informed of any traffic alterations from the norm, such as the blocking off of public streets. Roadways and access routes should be clearly distinguished, signposted and kept clear.

38. The venue needs to have an adequate access and marshalling area for emergency vehicles. Considerations should include the following:

- Is there adequate access to and within the venue? Is there a road network, or would responders have to walk significant distances to the spectator or performer areas?
- Is the venue served by a road which could be closed to the public and used only for access and egress of police and emergency service vehicles?

- If access roads are unpaved, would emergency or service vehicles become bogged if heavy rains occurred during, or just prior to, the event?
- Once on-site, is there sufficient room for marshalling, manoeuvring, repositioning or redeployment of emergency vehicles?
- Would departing vehicles be prevented from leaving by congestion produced by other arriving vehicles?
- Are adequate access and marshalling areas available for large numbers of emergency vehicles should a major incident occur?
- Is there a suitable site available for aeromedical evacuation?
- In the event of a mass casualty situation, does the venue layout provide, space for an on-site treatment area to permit triage and stabilisation of patients prior to removal? To eliminate the need to carry casualties and equipment over long distances, is such an area easily accessible?
- Are evacuation points established and clearly marked – do health services providers have a plan to service evacuation points in the event of a major emergency

39.   For further information on first aid and health services, please see Chapter 7.

POLICE AND SECURITY

General

40. The provision of security services is vital to public safety, particularly within the venue. There are essentially two types of security that can be provided at large public events. These are:

- private security guards; and
- police officers.

41. The composition of security services will vary according to the event, with different events better served by one or a combination of the two categories.

42. Roles and responsibilities of security personnel must be clearly established prior to the event. Decisions and actions taken by security personnel may impact upon the way in which police, emergency services and health personnel respond to a given situation. In planning and throughout all stages of the event a close working relationship should be maintained between:

- security personnel;
- health and medical services;
- other police and emergency services; and
- other security services, for example, those responsible for the performers.

Responsibilities and Functions

43. The responsibilities and roles of security personnel should be clearly defined before the event. These may include:

   - crowd management, including measures to prevent crushing;
   - control of access to stage or performance areas;
   - security control at entrances and exits;
   - minimising risk of fire by patrolling area;
   - control of vehicle traffic and marshalling;
   - searches for alcohol, drugs, weapons;
   - security of large sums of money and confiscated goods;
   - assisting police and emergency services if necessary including in the provision of immediate life-saving first aid.

44. Key security considerations are as follows:

   - Will the event organiser/promoter use police officers for on-site security, or will private security officers be engaged?
   - How will all security personnel be identified (eg uniforms, IDs, tabards)?
   - If private security officers are to be used, what will their role and function be, and how will their services integrate with the police? Are they permitted to work outside the venue?
   - What policies will be enforced in relation to minor offences on-site, so that discretion is exercised consistently during the event?
   - Will there be areas on-site for the collection and storage of significant sums of money, and what security will be in place to protect these areas and off-site transfer/banking? Are these areas positioned near road access to avoid carriage of large sums of money on foot through spectator areas?
   - What arrangements have been made for VIPs if applicable (your local police should be able to provide appropriate contacts for considerations in this respect)?
   - What arrangements have been made for the movement of high profile persons through crowded areas?
   - What arrangements have been made for lost or stolen property including the securing of any found property?
   - What arrangements have been made for lost children?
   - What arrangements have been made for detection of forged credentials?

Recruitment of Security Personnel

45. Private security personnel are required to be licensed under jurisdiction arrangements. They are generally well suited to events that are likely to attract large crowds.

46.   Care needs to be taken to ensure that private security staff are recruited from reputable sources with competent, suitably trained and licensed personnel. Special requirements for the event should be carefully addressed.

47.   In certain circumstances, private security can lead to problems. A uniform gives an authoritative appearance that is often not supported either by adequate training or authority in law.

Pre-event Briefing of Security Personnel

48.   To enable security personnel to perform these duties effectively, it is vital that they be appropriately briefed prior to the event. This briefing should provide security personnel with:

- clarity of management lines
- attendance of VIPs and any special security arrangements proposed;
- details of the venue layout, including entrances, exits, first-aid points and any potential hazards;
- clear direction on the management of unacceptable behaviour;
- details of emergency and evacuation plans, such as raising alarms, protocols for requesting assistance and evacuation procedures;
- what communications systems are to be used and any working arrangements to overcome possible inter-agency issues; and
- instructions for the operation, deactivation and isolation of any on-site machinery and utility supply in case of emergency.
- physical needs, food, refreshment and sleep, rostered hours of work
- mobilisation and step-down protocols
- occupational health and safety issues including working in isolation, support or back up arrangements.

     Refer Chapter 8 for broader pre-event briefings.

49.   The attitude of security personnel is a major factor in crowd compliance. Security personnel are charged with not only controlling a crowd, but also with making them feel welcome. Every individual staff member who comes into contact with the spectators plays a role in crowd controller. The dress, demeanour, and actions of staff may set behavioural expectation levels, and these factors should be considered in planning and pre-event briefing of staff.

Deployment

50.   It is important that strategic deployment of security staff be considered. All venues will have areas particularly suited to crowd monitoring and problem areas where particular attention is required. Deployment considerations include:

- identification of key points such as entrances and exits, barriers, and general thoroughfares;
- identification of high concentration areas, such as vendor stalls, bars and toilets; and
- establishment of strategic observation points to monitor crowd movements and behaviour. (A central control room with video surveillance may be required).

Police

51. Like their broader role in the general community, police officers perform many law and order and community policing functions. The requirements for a police presence inside private venues and/or roles at mass gathering events need to be discussed between event organisers and local police commanders. Organisers need to be aware that the cost of police presence may need to be factored into the budgets for the event and these can be established through the liaison with the local police commanders.

EVENT BRIEFING

52. A briefing meeting with all key stakeholders, particularly police, well in advance to the event is a critical part of the event planning process. The purpose of the briefing meeting is to inform stakeholders of the event details and emergency management plans. Concerns and issues relating to the event can be raised, discussed, and where necessary, changes made to the event plan.

A briefing agenda will ensure that everyone is aware of what issues will be discussed and who is participating in the briefing. The meeting agenda should allow time for discussion and, if necessary, be reconvened prior to the event if major changes to the event are required. The meeting is an opportune time for the distribution of relevant documentation including operational orders, emergency evacuation procedures, insurance details, electrical and structural certification, event personnel list and contact numbers.

KEY ISSUES

53. The briefing meeting should address the following key issues:

- Overall event details and logistics.
- Event venue plan.
- Communication equipment and process including contact numbers and radio frequencies/channels to be used during the event.
- Staffing arrangements.
- Clarity of management lines

- Security plan including procedures for patron eviction.
- Conditions which will cause the event to be cancelled or postponed including excessive wind, rain or lightning, insufficient ticket sales, and performer cancellations.
- Likely terrorism and civil disturbance potential
- The authority and process for cancelling or postponing the event must be agreed to and documented.
- Emergency management plans for larger than expected crowds, adverse weather and emergencies.
- Access route and venue facilities for police and emergency service personnel, vehicles and equipment.
- Command, control and coordination arrangements.
- First Aid post and any on-site medical centre details including time, location, predicted workload and personnel.
  - Safety audit of the venue and entertainment.
  - Mobilisation and step-down protocols
  - Physical needs, food, refreshment and sleep
- Time, date and location of the post-event debriefing meeting.

54. A written record of the meeting, noting decisions, discussions and detail changes should be circulated to attendees and then should be kept for review at the debriefing meeting or to resolve points of contention.

CIVIL DISTURBANCE and TERRORISM CONSIDERATIONS

55. Places of mass gathering are an attractive target for terrorism and activist organisations. The nature of an event and access for the general public, often with minimum security controls, posses potential risks. Activists and terrorists are presented with various potential opportunities for mass casualties, symbolism, high impact imagery and economic loss.

    Terrorists, activists and protest groups have a 'captive' audience and media presence to publicise their cause. Events often provide an agenda related to specific groups or lobbies whereby activists can disturb the gathering for political, industrial, environmental and social agendas.

    Event managers need to identify if their event or venue can be characterised as a place of mass gathering vulnerable to terrorism or acts of civil disturbance. Event managers are encouraged to conduct a risk assessment and proceed with the implementation of control measures according to the level and type of risk identified in relation to terrorism and civil disturbance.

    All events of mass gathering may not fall into an identified terrorism or public threat environment. This is best analysed using appropriate tools to assist in the risk assessments. The Attorney-General's Department has compiled a "A place of Mass Gathering Self Assessment Guide" that can be accessed via: **www…*to be inserted*……..** The tool is supported by further resources

available on this website to enable people to prepare a Counter Terrorism strategy.

A risk analysis may reveal that a terrorism threat is not significant but a potential for protest or civil disturbance is of greater significance. Event managers are advised to consult their State or Territory Police for direction in providing controls to reduce such a risk.

56.   Below is a quick guide as to the type of questions you may consider:

- Does the event or venue host significant high-profile dignitaries, politicians or groups that could interest terrorists or activists?
- Is the nature of the event such that it is possible to predict the time and place that high profile dignitaries, politicians, or VIPs who could be of particular interest to terrorists or activists, will gather?
- Will the event or venue attract significant or international media interest as part of the core business?
- Does the location, venue or event attract large numbers of overseas visitors or attract a significant amount of national/international exposure?
- Is the event, venue or location identified as having a close affiliation with interests or organisations based in countries at higher risk of terrorism or civil disturbance (eg USA, United Kingdom, Israel etc)?
- Is any part of the event, venue or location situated close to a potential high risk target?
- Does any part of the event, venue or location attract significant numbers of people that gather in a confined space?
- Is the nature of the event/business such that it is possible to predict the same time and place where large numbers of people will gather?

These questions are not exhaustive. Event managers should seek further guidance in completing this element of their risk assessment relating to an event.

57. Security is a primary consideration for any mass gathering, The absence of a terrorism or civil threat does not reduce the potential for disruptive behaviour by patrons or the public. Security risks are increased when alcohol or drugs are or may be available in and around an event or mass gathering. More detailed local security considerations are mentioned later in this manual.

It can be seen that public safety relating to terrorism, civil disturbance or personal threat can fall into three levels requiring a range of treatments to reduce the likelihood and consequences of such occurrences. Terrorism requires assistance up to and including National support, civil disturbance requires support at a State or Territory level while personal threat may be adequately handled at a local level.

DEFENCE ASSISTANCE

58.. While it is unlikely that the Australian Defence Force (ADF) would be involved in normal event planning and provision of service, it should be understood that, particularly at very large events, ADF assistance could be provided to the civilian services if an emergency were to occur. Under Defence Assistance to the Civil Community (DACC) policy, the ADF may provide assistance to the police and emergency services if an emergency were to occur at mass gathering events. Emergency assistance may be provided if immediate action is necessary to save human life, to alleviate suffering, to prevent extensive loss of animal life, or to prevent widespread loss of or damage to property.

EVENT EMERGENCY MANAGEMENT PLANS

59. The development of a formal, written emergency management plans requires a comprehensive risk assessment and consultation between all parties that may be required to respond should an emergency situation develop during the event.

At a minimum the emergency management plan should:

- comply with local/state legislation;
- be based on a risk analysis of the likely scenarios creating hazards;
- identify how the event will be interrupted;
- provide a grid plan of the venue and all services;
- identify access and evacuation routes;
- identify evacuation areas for performers, employees and the audience;
- detail arrangements for on-site emergencies not requiring outside help;
- provide details of coded messages to alert and stand down health, police, emergency service and security personnel;
- establish an incident control centre, which should have back up power and lighting;
- specify arrangements to request further health, police and emergency services assistance;
- Identify responsibilities in accordance with emergency management arrangements;
- identify the role event staff will take in supporting civilian services
- identify meeting points for health, police and emergency services;
- Identify communications systems and inter-agency communications (reliance on mobile telephone systems in times of emergencies is risky and alternate means should be considered);
- specify arrangements to hand over control to police and emergency services as required;
- identify personnel who can authorise evacuation;
- identify triage and ambulance loading areas;
- provide for treatment of potentially large numbers of minor injury and illness casualties in a location nearby
- include details of hospitals prepared for a major incident
- identify access and egress routes and the security of these routes; and

- provide details of a temporary mortuary facility.

Note: In any major incident, for the purposes of the law, the venue is considered a crime scene and thus under total control of the police.

60. Police, emergency services and other public authorities that are required by law to maintain their own coordinated plans for any contingency should contribute to the development of the organiser's plans and therefore, be consulted about any implications for their agency.

Some important matters to address in the emergency management plan are:

- Are there additional security personnel, including police, on stand-by or available for call-up should the event require immediate increase in these services?
- Are there any special security arrangements necessary for VIPs attending?
- Have ambulance services and local hospitals been advised of the nature of the event, expected spectator profile, and possible medical problems?
- Have fire and rescue services been notified as to the nature of the event, and what services might be required?
- What are the communications systems to be used and are there any inter-operability issues to address?
- Have the necessary types of heavy equipment that could be required in a emergency (for example, grandstand collapse) been identified? Have plans been made to obtain that equipment at any time, including out of business hours?
- If there were an emergency and large numbers killed are there provisions for temporary morgue facilities?
- Have counselling services been advised of the nature of the event, and what services might be required?
- If the event is particularly dangerous, and deaths are a real possibility (for example, automobile or power boat races, airshows), has a framework been laid for any required coronial investigation?
- In order that the exact location of an emergency can be identified quickly; the following questions need to be addressed:
  - Will a grid-type venue plan, common to all services, including access roads, pathways, major landmarks, spectator, performer and vendor areas, and health facilities be available?
  - Will vendor locations or booths be numbered and included on the venue plan?
- Where helicopter flights are contemplated for spectators or media to view the event from the air; the following questions need to be addressed:
  - Will flights be prohibited directly over the event and spectators, or confined to circular paths around the perimeter?
  - Will staging areas or helipads be confined to areas away from spectators?

- Does the proposed staging area or helipad comply with Civil Aviation Safety Authority requirements governing such usage?
- Will the helicopters be available for medical evacuation should a major incident occur?

EVENT COORDINATION

61. This chapter briefly outlines the need to establish an Emergency Coordination Centre (ECC) or Emergency Operations Centre (EOC). Terminology will depend on which State or Territory your event is being held.

An ECC/EOC is not to be confused with the Event Management Centre or other location where the event activities are controlled in normal circumstances. It is also a distinct location from an operations centre, control point or forward command where a particular emergency incident is being managed.

An ECC/EOC is a facility established in a remote location from the event venue for the purpose of coordinating emergency response to significant incidents that may occur and which involve a range of emergency response and recovery agencies and authorities.

The number of people on duty at an ECC/EOC and the complexity of this facility will depend on the size of the event being conducted, the expected attendance and the type of event. The complexity of the ECC/EOC will also depend on the level of risk associated with the event as per the results of any risk assessment conducted to establish the overall risk rating of the event.

EMERGENCY COORDINATION CENTRE (ECC) AND EMERGENCY OPERATIONS CENTRES (EOC)

62. Complex emergency events are likely to require enhanced management processes that are only available from an interactive multi-agency coordination centre. The purpose of an ECC/EOC is to ensure that these enhanced management processes can be applied.

To achieve this, an ECC/EOC should:

- act as a centre for acquiring and deploying support resources
- manage information collection and dissemination
- develop intelligence and strategic planning capability

- develop and maintain an overall record of the event.

63. An ECC/EOC exists to ensure that emergency response and recovery processes are managed in the most appropriate ways. There is no standard ECC/EOC format for all emergency management circumstances. However, there are a number of principles and concepts that should be observed in planning for, setting up and managing an ECC/EOC.

As with many facets of emergency management the circumstances under which an ECC/EOC would be established will vary. The exact point where an ECC/EOC becomes necessary is therefore difficult to specify. However, the following aspects should be considered:

- An ECC/EOC should always be set up when the conditions specified in the relevant emergency plan have been satisfied.
- An ECC/EOC is more likely to be needed when more agencies are involved than usual, when the scale of the event is outside 'normal' parameters, or when an unusual aspect of the emergency is causing or may cause difficulties or the consequences of an event may be extreme, for example during a mass- gathering event.
- Where broad geographical areas are involved, or where operations are very complex, more than one ECC/EOC may be established, reporting hierarchically to a higher-level ECC/EOC.
- Efficient and effective management of the event can only be achieved with the active cooperation and assistance of all the organisations responding. Those managing cannot make effective strategic decisions in isolation.

Event Cancellation or Postponement

64. From time to time, events may need to be cancelled, postponed or interrupted. This action has the potential to create dangerous situations, especially when a crowd has already gathered. Plans should be in place to appropriately manage such a situation and should address the possible readmission of patrons to the venue.

EVACUATION REQUIREMENTS

65. Evacuation planning needs to be addressed at two levels and the procedures and safe congregation areas will be different. There is a requirement for organisers to consider:
- Evacuations from areas within the event venue for low level incidents eg evacuation of sick or injured individuals to a first aid post, the on-site medical facility or local hospital; and,
- Evacuations on a large scale eg the evacuation of the whole event site due to a major incident.

66. Evacuation procedures should be contained in the event emergency management plan and form part of the initial information provided to

attendees at the event. More detail on evacuation planning can be obtained from the Australian Emergency Management Manual series available from the Emergency Management Australia website www.ema.gov.au under Publications. Also, AS*3745* sets out the requirements for the development of procedures for the controlled evacuation of buildings, structures and workplaces during emergencies. These standards would also prove useful for organisers of outdoor events where there are access/egress bottlenecks. Evacuation procedures should also be an essential component of pre-event and daily briefings for staff and volunteers.

Operations Management Plans

67. Police and emergency services should develop a Operations Management Plan/Operations Order for each major public event or adapt existing plans/orders for more routine events. Those Operations Management Plans/Operations Orders should be formally submitted to the appropriate senior officer to whom authority has been delegated for approval and signature. The Plans/Orders should:

- be based on a risk management approach which provides a means of identifying and managing safety risks associated with the event;
- detail the overall objective, roles, responsibilities/tasks and procedures for managing emergencies at the event;
- convey promoter's, police and emergency services commander's intentions in relation to the event;
- enable subordinate personnel to identify the overall objective and evaluate the contribution of their own particular tasks;
- be clear and concise, and free from ambiguity;
- follow a consistent format;
- be set out in a logical sequence;
- cover elements including:
  - situation;
  - mission;
  - execution;
  - administration and logistics; and
  - communications including any inter-operability issues and work-around arrangements;
- be numbered consecutively with the progressive number of the Plan/Order and the year of issue identifying:
  - the authority which issued the Plan/Order;
  - the date of issue;
  - the distribution list; and
- be issued in sufficient time to allow subordinate personnel to frame and issue their own plans/orders, and carry out the action required of them.

PRE-EVENT EXERCISES

68. Depending on the scale of the event there is a need to conduct exercises at various levels before the event to ensure that systems are in place and

arrangements, including emergency operations plans and orders are appropriate. Such exercises can be from a low scale discussion exercise for a small community event to multi–agency desk-top/ field exercises through to "whole-of- government/all agency" simulation or even field exercises for a state/city type mass public event. For more information refer to the Australian Emergency Manual on Exercise Management.

SPECIAL FEATURES OF EVENTS

69. Some events, for example motor racing, may have specific health and safety requirements stipulated by governing body regulations, which must be addressed. These can include the qualifications of personnel, the numbers required to officiate at the event, or physical safety measures. It is therefore necessary for discussions to take place as early as possible in the planning phase to ensure the requirements can be met.

70. Events occurring in remote areas, such as the Outback Opera, demand additional planning as the resources normally available in those areas are well below those that will be required for the event. Special considerations include temporary accommodation for personnel, different clothing requirements, special communication facilities (for example, satellite), support resources (for example, Royal Flying Doctor Service aircraft and rescue helicopters if casualties require special evacuation) and additional costs likely to be incurred due to the remote location.

71. Events involving animals, or at which animals are permitted, have their own special requirements. There have been numerous incidents where a frightened animal has broken loose and created havoc and injuries. Whilst owners and handlers say they are able to keep their animals under control, arrangements should be in place to respond to any loss of control.

72. Multi-cultural events may also have special requirements, especially in respect to communication. To overcome communication difficulties, internationally recognised symbols rather than numerous language signs should be used, and interpreters for service providers, spectators and emergency personnel, should be provided.

73. Please see Chapter 3 for further information regarding additional considerations for specific events involving higher risk activities.

EVENT DEVELOPMENT

CHAPTER 2

SAFETY ISSUES

INTRODUCTION

1. Safety issues are an integral component of staging mass gathering events. This chapter is concerned with the key safety considerations. Effective management of safety is a process that begins well before an event, it continues through the staging and culminates in the debriefs. Most importantly, safety is an exercise in continuous improvement, and the greatest benefits will be gained by ensuring that lessons taken from previous events and exercises, and the experience of others, are incorporated in the design and execution of any event.

RISK MANAGEMENT

2. Managing risks associated with conducting mass gathering events is essential to ensuring safety issues are addressed. Event organisers should have been developing a Risk Management Plan in the event planning phase, as outlined in Chapter 1 to identify the hazards associated with conducting the event and then plan to remove the risk, mitigate the likely impacts or provide arrangements to deal with the residual risk. This chapter assists event organisers to ensure that their risk management approach encompasses some of these specific hazards and considerations in developing the actual event.

STAGES, PLATFORMS, AND OTHER PERFORMANCE FACILITIES

3. One of the factors determining stage configuration will be the expected behaviour of the crowd. While classical music and ballet performances usually attract a mature and reserved audience, teenage and pre-teen fans at rock concerts have been known to storm the stage in order to touch their idols. Such incidents, apart from being disruptive, have caused injuries. It is therefore necessary for event planners to obtain a 'feel' for the audience that a particular performance will attract.

4. There are two principal ways in which this intelligence about the crowd can be gathered. These are:

    - by a review of press reports from, and contact with officials at, previous performances; and
    - with respect to adolescent entertainment (for example, rock concerts) by speaking with spectators. (In the past, they have provided valuable insights into what behaviour authorities might expect from audiences for different entertainers).

5. Stages are usually elevated above the floor or ground, to provide a better view of the performance, especially for spectators farther back. This, in itself, impedes those who would rush the stage in an attempt to touch a performer. However, a stage or a platform alone is usually insufficient to deter determined and agile spectators, and an additional physical deterrent is needed.

6. In addition, this increased height can create an area free of spectators at the base of the stage. The audience will position themselves back from the stage, as anyone too close will not be able to see all the performers as their line of sight will be impeded.

7. At some venues First Aid personnel are located adjacent to the stage to accept injuries occasioned at the front of the spectator area.

Indoor Events

8. During indoor concerts, an effective practice is to erect a 'D' shaped barrier in front of the stage to deflect patrons to the outside of the stage should any surge come from behind. It also provides an additional barrier to prevent spectators from reaching the stage. Security staff can be positioned in this spectator-free zone. Alternatively staff should be able to gain access to this area quickly from either end.

9. Barrier posts must be securely anchored to the floor, not merely mounted to free-standing bases. They should also have some padded protection. A fence construction should provide a certain amount of 'give' upon impact, reducing the potential for crush injuries.

Outdoor Events

10. A fence similar to that described for indoor concerts can be utilised in an outdoor setting and an effective practice is to erect a 'D' shaped barrier in front of the stage to deflect patrons to the outside of the stage should any surge come from behind. However, board fences are often erected instead. Board fences have the added benefit of providing a walk space on the spectator side of the fence as well as behind. As most outdoor concerts do not have seating, spectators in the front rows seated on the ground have to take a position several metres back from the fence, to allow for a sight-line over the top of the fence to the stage. This area permits emergency access to the front rows of spectators.

11. Any stage protection barrier must be capable of a certain amount of flex in order to prevent the crushing of spectators in the front by a crowd surge from behind. At the same time it must be sufficiently solid to prevent collapse and the associated injuries. Fences installed often fail to address this two-fold requirement.

Break-Away Stage Skirts

12.	The front skirt around the base of a stage can be constructed so as to break-away under the pressure of a crowd surge, thus allowing spectators to be pushed under the stage rather than being crushed against its base. It is important to note that this idea is not practical where there is less than two metres clearance beneath the stage, due to the potential for head injuries should a spectator collide with the stage.

13.	It should be stressed that use of a break-away stage skirt does not remove the requirement for a barrier in front of the stage, and should be seen only as a back-up should the barriers fail.

TEMPORARY STRUCTURES

14.	Due to their transitory nature, many events require easily-constructed temporary structures. This includes the stage platform itself, as well as towers to house speakers and floodlights, temporary seating (i.e. bleachers), dance platforms, rooves, towers and masts, viewing platforms, marquees and large tents, and artistic or decorative items such as archways, overhead signage and even sideshows.

15.	It is essential that all such temporary structures be designed and erected with a margin for safety and a view to potential hazards. This should be done under the supervision of a local government inspector, and must conform to local government building and/or engineering specifications.

16.	Temporary structures are often hurriedly erected as access to the venue may only be permitted for a short time before opening, and they are usually designed for rapid removal at the conclusion of the event. In addition, these temporary structures are rarely designed or erected to withstand other than intended use, therefore little or no safety margin is incorporated. High winds or spectators climbing for a better vantage point can overstress the structure. A number of accidents have occurred in the past when such structures have been poorly designed or constructed.

17.	Temporary structures should also be inspected periodically during events of longer duration. Any that may be used for other than their intended purpose should be signposted and/or secured to prevent inappropriate use or access. This may require additional security staff.

Load Capacity

18.	There is a limit to the load capacity of any structure, and precautions should be in place to prevent overloading. Any viewing platform or vantage point, such as a building verandah or balcony, can be the source of a major incident if spectator numbers are not properly controlled. Planning in this aspect should include consideration of controlled access to verandahs/balconies of buildings surrounding the venue that would provide vantage points and hence vulnerable to overloading – this may require liaison with those building owners.

19. The bases of temporary structures must be protected from damage by vehicular traffic and have buffer zones designated around them.

SEATING ANCHORAGE

20. Seating in a community centre, arena, or similar location often combines the standard fixed perimeter seating, with additional foldable or stackable seating on the central floor.

Temporary Seating

21. Temporary seats are often not secured to the floor or to one another. While this may not present any problems with sedate audiences, more enthusiastic spectators may pose the following difficulties:

    • Persons standing on the seats for a better view are prone to injury if balance is lost or they are jostled. In such instances, other spectators can be affected, sometimes caused by a 'domino effect' in closely spaced chairs. There is potential for a significant number of injuries; and
    • If an audience becomes hostile, portable chairs can be used as dangerous missiles. At a concert in August 1980, 18 people were injured, including five police officers, when fans, angered at a performer's last minute cancellation, turned aggressive.

22. Portable, folding, or stacking chairs should be secured to the floor. Where this is not possible, attachment of the legs of each row of chairs to two long planks, one running under the front legs, and one running under the back, is an alternative solution.

GAS CYLINDER ANCHORAGE

23. At many public events, portable pressurised gas cylinders are used to inflate children's balloons, carbonate beverages, provide cooking fuel, etc. Frequently, such cylinders are not secured, or are merely fastened to a two-wheeled hand trolley used to move them, which itself is not independently secured.

24. If such cylinders fall over and the cylinder neck or valve is cracked, the uncontrolled release of the stored pressurised gas can turn the cylinder into a deadly projectile. For this reason, all portable gas cylinders must be secured both top and bottom, by ropes or chains to a structural post, wall, or similar anchor point.

LIGHTING AND POWER REQUIREMENTS

25. Even in venues darkened for the performance, lighting should always be adequate to identify exits as well as corridors and aisles leading to them.

26. Auxiliary battery power or generators should be installed to provide light in a power outage and to power the public address system. The latter may permit directions to be given to spectators in a power failure, thereby alleviating panic.

27. As many concerts are performed with only stage lighting, access to the main lighting or house lights is essential in case of an emergency. The location of the controls for these lights, and the operation of the controls, must be known to those on-site responsible for emergencies.

FIRE SAFETY

28. All states and territories have legislation governing fire safety. The local fire authority should monitor fire prevention and preparedness measures to ensure relevant standards are met. Organisers and health personnel should consider potential fire hazards in the planning process and discuss any concerns they may have with the fire authority. Organisers should also consider safety requirements and specific approvals if fireworks are intended to be used.

EMERGENCY TOOLS

29. There have been incidents that, in hindsight, could have been reduced in severity if only basic forcible entry tools had been available. It is strongly recommended that, at strategic locations in the venue, forcible entry kits are available for use in an emergency (with a break glass type of entry). These kits should contain a:

- fire axe with prong;
- pry or crow bar; and
- pair of heavy duty bolt cutters.

COMMUNICATION SYSTEMS

30. Communications systems are an essential tool in managing crowds in the normal course of an event. The bigger the event, the more complex the communication system needs to be in order to manage the volume, diversity and spread of the event patrons.

31. Communications systems provided for crowd management and information should be independent from performers' sound systems and emergency service communications. That is, the communication system should be distinct from any system that has been dedicated for emergency use. This will enable the event communications used for crowd management to support any parallel system established by event organisers or emergency services for response to a significant emergency incident.

32. The communication system will need to be able to be incorporated with, and communicate to, any emergency communication system established. For example, where an Emergency Coordination/Operations Centre is convened remotely from the event venue the ECC/EOC will need to be linked to the system. Event organisers will need to include and be part of communications planning conducted by the emergency services involved in their event. While it goes without saying that the police, emergency services and health must be able to

communicate with their own staff, experience has shown that different services must be able to:

- communicate with each other;
- communicate between staff outside and inside the venue to get a proper overview of the total situation; and
- communicate with senior event organisers, including security who may be the first to identify an incipient problem.

33. A central communications area (room, trailer, etc.) with a representative from each major agency may facilitate the provision of vital information by centralised monitoring of relevant radio communications. External emergency service communications centres must be provided with contact details for this facility as many calls for assistance by patrons will be made via mobile phone through the established 000 emergency call number. These calls will be taken externally and must be referred to the on-site emergency service providers.

34. The communication system should be multi-modal and not rely on one single system. It should also have its own backup power supply. It should be recognised that in a major emergency the mobile telephone networks are likely to become jammed and so reliance should not be made of these systems for vital communications.

35. A means of communicating with the crowd is essential at all events. Ideally, multiple systems should be established to enable messages to be directed at different sections of the crowd including crowds massed outside the venue.

36. If a separate sound system is to be utilised, some means of muting or silencing the stage sound system is required.

37. As public announcements are an important element of the safety plan for an event, consideration should be given to the style and content of announcements:

- What volume is required for announcements to be heard over spectator noise?
- Will announcements be easily understood by the audience?
- Are multilingual announcements required?
- What wording will lend credibility to the instructions?
- What pre-planned messages are needed?

38. Organisers should consider options available to provide visual information to the public such as closed circuit televisions and large screens.

OCCUPATIONAL HEALTH AND SAFETY

39. The organiser/promoter and authorities should be familiar with their respective State or Territory occupational health and safety legislation, as there is an obligation to provide for the safety of the audience, and appropriate care, safety and training of all personnel working at the event.

40.   Personal protective equipment and safe handling facilities will need to be provided appropriate to tasks or activities to mitigate risk.

41.   At events where noise levels are high, such as rock concerts, air shows and motor racing, employees who will be exposed to high noise levels for prolonged periods must be provided with adequate ear protection. The audience should also be warned of the dangers posed and advised of measures to protect their hearing.

42.   Noise pollution from events probably cause the majority of complaints to authorities from the surrounding community, and some means of monitoring and reducing noise levels should, if possible, be implemented.

43.   Air quality may be adversely affected at certain types of events or within particular venues. Therefore arrangements need to be made to reduce impact of dust and fumes.

SAFETY OFFICERS

44.   An event should have a variety of personnel who have safety responsibilities as part of their role. Wherever possible, there should be one or more personnel who have a dedicated safety role at the event. Their role should be responsible for, amongst other things:

- Reporting and recording
- Audits and inspections
- Incident investigations
- Hazard identification and response
- Risk management plan monitoring
- Liaison between event organisers, police and emergency services
- Liaison with regulatory authorities

These personnel must be given the authority to make decisions and instigate changes when necessary. Ideally these people will have some experience or qualifications in safety, but can also operate within strict guidelines under the management of such a person.

CHAPTER 3

ADDITIONAL CONSIDERATIONS

INTRODUCTION

1.   There are other aspects of public event planning that may have health and safety implications and may need consideration by event organisers as part of their risk management approach to the event.

INDUSTRIAL ISSUES

2.   Industrial issues can cause major problems for the successful conduct of an event. In planning for an event, consideration needs to be given to the possible impact of any industrial actions on the ability of a service to meet their obligations. External industrial actions may also effect event plans.

3.   Any threatened industrial unrest or suspected actions should be addressed by the organisation prior to the event and plans put in place to appropriately handle any such situation, should it arise during the event, so that no one is placed at risk.

4.   Any possible actions that could be taken by external industrial bodies should be addressed during the risk analysis process.

PROTESTORS

5.   It should be anticipated that some events may attract protestors both prior to and during an event. Event organisers should identify as part of the risk management process the potential for protestors associated with the event. If there is that likelihood then discussions with the police are essential to ensure that any protest remains peaceful and the organisers have contingencies to manage the protest. While the protestors' actions are generally not the concern of the health personnel, it is possible that the protest can result in injuries to both the protestors and the public. It is therefore preferable that prior warning is given to the health care providers if any protests are expected so that suitable preparation can be made.

INFORMATION CENTRE

6.   A well-identified, appropriately located, well-publicised information centre on-site, staffed with knowledgeable personnel, can reduce pressures on security, health, and other event workers, by providing a full range of information services to patrons. Reduction of uncertainty in spectators diminishes the tension that can lead to behavioural problems.

7.   Any large event needs to provide for lost children and property, making suitable provisions for such eventualities.

MAINTENANCE STAFF

8. The immediate availability, preferably on-site, of maintenance staff, can reduce the possibility of a problem escalating to a level that may effect public health and safety.

BRIEFINGS

9. It is essential that briefings be conducted for all personnel prior to and during the event on at least a daily basis. In addition, it is important that event organisers/managers conduct a familiarisation briefing for all on-site health, police and emergency services liaison staff to ensure full cooperation and coordination between event personnel and external supporting services. Further details on Event Briefing appear in Annex P and more specific information in Chapter 1 refers to "Pre-event Briefing of Security Personnel".

SPECIFIC EVENTS INVOLVING HIGHER RISK ACTIVITIES

10. Some events pose a greater risk because of the nature of the activity and/or their patronage. The following sections provide examples of higher-risk events and a guide to some treatment options.

POWER BOAT RACES AND SIMILAR ON-WATER EVENTS

Health Support for Participants

11. Water events, particularly those involving motorised water craft, require careful planning. A rescue boat should be in attendance. Experienced divers with scuba gear, and trained to effect inverted, below-surface releases and under-water extractions should be available

12. A dedicated health response boat should be available in the water with appropriately trained personnel and equipment (including spinal board and resuscitation equipment). The health boat should be linked by two-way radio to the rescue boats and ambulance/first aid services. For off-shore boat racing there may be a need for a helicopter with rescue capabilities.

13. Landing locations appropriate for the transfer of stretcher patients from boats to land ambulances must be identified.

Spectator Areas

14. Appropriate buffer walls or 'run off' areas should be in place to prevent out-of-control vessels from entering spectator and pit areas.

15.   Where spectators are permitted to line piers and breakwaters along areas of deep water, the following is suggested:

- In the absence of provision of some physical barrier, a line should be marked to warn spectators away from the edges fronting deep water.
- A dedicated boat should be in attendance to constantly patrol the area and be equipped with a loud-hailer to direct spectators who venture too close to the edge. The vessel should also be suitably equipped to provide water rescue and resuscitation of casualties. This vessel should be in addition to any vessel committed to the event participants.

16.   All boats intended for rescue or health roles should be clearly marked and have some form of hazard lighting to warn other vessels. Any vessels used for participant or spectator control should be staffed with personnel with appropriate lifesaving and emergency medicalor first responder training, including Cardio-Pulmonary Resuscitation (CPR).

17.   Any vessel intended for health assistance and/or water rescue should contain sufficient clear space to resuscitate the prone human form, and be equipped, as a minimum, with the following:

- A spinal board for full body immobilisation, including necessary cervical collars and restraint strips.
- Resuscitation equipment, which should as a minimum include a bag-valve-mask unit, preferably with an oxygen assist. Oropharyngeal airways and suction should also be included.
- A supply of large pressure dressings.
- Personnel trained and experienced in the use of the equipment identified above.
- Personnel trained and attired to enter the water to effect a rescue and removal.

Adequate coverage by first aid, security and communications for spectators should be provided especially if they are dispersed through a wide and remote event site.

AUTOMOBILE AND SIMILAR RACES

18.   Organised auto races conducted by professional racing bodies at permanent facilities normally meet the guidance on safety of participants as outlined in this document. Similarly, professional racing bodies using temporary facilities follow strict guidelines for the conduct of races. However, these race safety guidelines do not necessarily cover the health and safety of the general public. Rallies conducted on public roads are a source of concern due to the very limited control over spectators although, fortunately, the incidence of spectator injury is very low to date. Spectators may position themselves in remote, almost inaccessible, areas where the action is spectacular. The entire track should be monitored and a suitable communication system should be in place.

Health Support

19. The ambulance service should be consulted in the planning phase to ensure that an appropriate and timely ambulance response to any incident is possible Training for these personnel must include knowledge of the racing rules and the various flags used by race marshals and often health personnel will need to be accredited by the racing association before working on the track

20. At smaller club events the financial arrangements may prohibit the cost of having an ambulance on stand-by, therefore other suitable arrangements must be made. Ambulance services and first aid service providers can assist event managers in determining how an appropriate form of cover can be made available.

21. The ambulance should be positioned for controlled, rapid access to the track. An appropriate communications system and procedures should be in place to activate an immediate ambulance response to a track emergency; while racing is controlled by track marshals.

22. Guidelines should be established in advance to determine whether:

- the race will continue if ambulance service is reduced ie leaves to transport a patient; and
- the ambulance will be dedicated strictly to the participants, and if so, what means are available to assist with medical emergencies among the spectators.

23. While some races continue to run under caution and other flags when an ambulance or other emergency vehicle is on the track, it is preferable that the race be stopped if at all possible.

24. Suitable 'first attack' fire fighting and rescue equipment should be available at the event for rapid fire and rescue service response.

25. The provision of a site medical centre or first aid facility should be considered in view of risk of injury to participants and spectators, the expected number of spectators, distance to the nearest hospital, etc.

Refer to Chapter 7 for more general medical support.

Spectator Areas

26. Barriers should be in place to isolate spectators from out-of-control vehicles. Safety should be further enhanced by a compulsory 'no mans land' to keep spectators away from the barrier fence. Experience has shown that these barriers can be moved or broken by vehicles, resulting in injuries to spectators leaning against the barriers.

27. The design of barrier height and strength should take into account all possibilities such as one vehicle mounting another, somersaulting or multiple impacts.

28. In addition, parts of automobiles involved in collisions can become projectiles, and wheels can come loose and bounce into spectator areas. A strong wire mesh debris fence may be fixed to barrier fencing and the top of retaining walls as an

additional protective mechanism, permitting spectator visibility while serving as a deflection for projectiles.

29. Spectator access to the track and pit areas at any time, including after the race has concluded, should be carefully monitored if permitted at all. Participants often test vehicles after the event, with neither drivers nor spectators anticipating each other's presence on the track.

30. Track invasion by spectators after the winner has passed the finish line and while other competitors are still racing has caused major problems and injury at a number of events. All officials should be briefed on ways to control this behaviour and how to respond should those control measures fail.

Pit Areas

31. In-race refuelling of cars in pit areas creates a potential for fire if fuel inadvertently contacts hot parts or is ignited by a spark. To combat this threat, appropriate and sufficiently-rated fire extinguishers and other means of extinguishment and containment, must be available to be used by trained personnel. Personnel should be reminded that some racing fuels burn with an invisible flame. Spill facilities, ventilation and ignition controls are primary considerations for refuelling arrangements.

32. The combination of vehicles entering the pit lane at high speed and the drivers' vision possibly being impeded by trackside barriers increases the risk to both drivers and personnel in the pits. Organisers should consider introducing speed limits in pit lanes, and enforce suitable penalties for transgressions by drivers. Ideally, a system of notifying pit personnel of vehicles entering the pits, such as a siren, horn, warning lights and signage should also be implemented.

33. As spectators are generally unfamiliar with pit environs and procedures, access to the pits should be restricted to officials and members of the race crews. If spectators are to be permitted in the pit area, they must be properly controlled, taking into consideration protection from moving vehicles, hot engine parts, sharp metal, and other pit hazards.

34. Spectators should not be allowed to cross the race track if at all possible. If this cannot be done then all spectator crossings should be at designated crossing points which are strictly controlled by race officials. Officials should be equipped with an efficient communication system to the race control area, which can provide information on upcoming race traffic.

AIR SHOWS AND DISPLAYS

35. Air shows are staged in accordance with aviation standards. Certain factors to reduce the risk of a serious incident should be considered by event organisers, emergency managers and health personnel.

Aerobatic Areas

36. Aerobatic manoeuvres should not take place over built-up areas, but over fields, water, airstrips, or other uninhabited areas. Aircraft should not fly over spectator areas. Where aircraft exit a manoeuvre laterally (parallel to the ground) the direction of exit should be away from, or parallel to, the spectators, not towards or over them.

Safety

37. On-site fire services must comply with standards and guidelines and should be capable of delivering foam onto a crashed or burning aircraft. Should the air show not take place at an airport with foam-equipped trucks, alternate arrangements for their provision should be considered, as water-delivering fire apparatus will be unsatisfactory.

38. In the event of a mishap, organisers should have a clear idea as to the requirements of the coroner and air crash investigators.

Parachute Jumps

39. Parachute jumps should have landing zones safely away from spectators, or hazards to the jumpers. There are a number of recorded cases where parachutists have been blown off course and suffered injury or death as a result. Spectators can also be injured in the scramble to avoid a descending jumper.

FIREWORKS/PYROTECHNICS

40. Whenever public displays of fireworks are going to take place the local authorities, including police, fire and ambulance services, should be notified, and consulted, prior to the event. Organisers should check with local authorities for any permit requirements for fireworks or pyrotechnics.

A qualified pyrotechnician must be engaged for any firework display.

41. Displays need to comply with AS 2187.3   Fireworks need to:
    - Be transported to sites according to the Australian Dangerous Goods Code
    - Be operated by a licensed shotfirer or operator
    - Have consideration of special permit conditions when near airports or adjacent to aircraft flight paths
    - Include consultation with fire services, in particular for approval and/or cancellation on days of high fire danger or Total Fire Ban.

Placement/Launch Site

42. Most major incidents involving fireworks can be avoided through careful planning of the launch site.

43. In establishing a launch site, close attention should be paid to the anticipated wind direction and strength, both of which may affect the flight path of fireworks and the area in which debris may fall. In addition, the possibility of having to abandon the display should be a consideration in site placement and design.

44. Where possible the launch site should be on water, for example on a barge or pier as they can be readily abandoned should an accident occur and the supply ignites.

45. There must be a barrier between the crowd and the launch site, in order to protect the crowd in the event of a tip over after ignition resulting in a lateral, rather than vertical, projection.

46. Fireworks must not be projected over the heads of spectators, as debris, often hot, from overhead fireworks can fall into spectators eyes, onto their heads, etc.

47. Fireworks should not be projected over flammables, trees, bush areas, buildings, or boats (if the fireworks are to be launched over water).

48. Unused fireworks should be stored in covered metal containers to prevent inadvertent ignition, either by staff, or by descending hot particles from previously deployed overhead fireworks.

49. Firefighting equipment, commensurate with location, should be on immediate stand-by including fire extinguishers and trained firefighters at the launch site.

50. Protective clothing, including face shields, helmets and heavy gloves should be worn by those deploying and igniting fireworks in case of explosion, premature or delayed ignition.

51. The launch site and surrounding area should be carefully inspected after the event to ensure no incipient or rekindled fires are possible. All used fireworks should be soaked in water and removed from the site, along with any securing spikes, wires or other potentially hazardous objects.

Lasers

52. Laser light shows are now frequently included as a form of entertainment at many special events. Health care personnel on duty at such events need to be aware of any potential hazards in the use of lasers or accidents that can occur involving laser light equipment.

53. Lasers should only be operated by properly licensed personnel. The National Health and Medical Research Council Code of Practice to be followed for safety at laser light shows, together with compliance with Australian Standard 2211-1991 Laser Safety, should obviate any problems occurring. Local authorities requested to authorise the use of laser lights should be aware that laser operators are required to maintain a "Display Safety Record" log book for their particular equipment. This log includes internationally recognised design features and

safety calculations and will provide valuable information in making the decision on permitting the display and, if permitted, some warning of potential problems.

EVENTS INVOLVING PRE-TEEN AND EARLY TEEN AUDIENCES

54.   Concerts that attract younger audiences (for example, pre- and early teens) can create a number of difficulties, including individuals who become lost or separated from friends, miss scheduled return transportation, or lack sufficient funds for alternate transportation.

55.   Parents will often take young spectators to the event, but have difficulty in finding them at the conclusion. If parents are using their cars to pick up children, traffic jams may prevent close access to the venue. Prior to entering the venue, parents and their children should identify a specific place to meet at the conclusion of the event.

56.   One concept to alleviate difficulties is to implement a 'Parents' Oasis' adjacent to the venue to provide parents with a waiting area during the concert. Coffee, soft drinks, nibbles and newspapers can be provided to pass any time spent waiting.

57.   The concept of a 'Parents' Oasis' is one that is particularly suited to concert-type events aimed at younger audiences, where parents would not want, nor be wanted by their children, to be in attendance at the actual performance. The efforts in providing such a facility are more than offset by the reduction in effort needed to deal with the young audiences at the conclusion of the event.

58.   Information booths with access to the public address system and clearly identified event staff can assist lost children and their parents.

59.   Consideration should also be given to the effects created by a major incident which may be compounded by the problems of parents attempting to gain access to the area to be re-united with their children or, in the worse case scenario, trying to find out where their child has been taken to if injured.

CHAPTER 5

SPECTATOR MANAGEMENT AND CROWD CONTROL

INTRODUCTION

1.   The aim of spectator management and crowd control is to maintain order, prevent deviation from desired behaviour, and re-establish order should it break down, thereby ensuring maximum enjoyment and value for the assembled gathering. In the first instance this is the responsibility of event organisers. Organisers should not commit police and emergency services without first seeking approvals from the relevant agencies. Such involvement may have a cost associated with it that would need to be borne by the event. However, law and order is a matter for police when the situation is beyond the resources and capability of the organisers to manage. Emergency management plans need to address the process for seeking such assistance.

2.   Spectator management refers to planning and preparation issues such as ticket sales and collection, ushering, seating, public transport, parking, public announcements, toilets, washrooms, dispersal (post event), catering etc.

3.   Crowd control refers to mechanisms used to maintain or reinstate order, such as limited access control, admission control, and arrests.

4.   A crowd is defined as any number of people coming together in any place for any reason. Crowds occur in shopping centres, railway stations and stadiums on a daily basis, and occasionally in places not designed specifically for large numbers of people.

5.   In the planning process it is important to have an understanding of both individual and crowd dynamics and how these factors interrelate. The following is in no way the complete detail required, rather it is a guide to issues most frequently encountered. The issues need expansion for each particular crowd and venue. Additional information can be sought from other literature, press reports, the promoter, private security organisations, police, fire, and ambulance authorities, and, for visiting dignitaries, from personal security services. All this information will assist in predicting potential problems that can then be addressed in the planning process.

GENERAL ISSUES FOR CONSIDERATION

6.   Key crowd issues to be addressed are as follows:

- *Human behaviour*
- *Size* – Maximum numbers permitted are often established by regulations for safety reasons.

- ***Demographics*** - Composition of the audience, including age and gender mix. If it is identified in advance that a high proportion of the audience will be young children, additional facilities such as child minding, feeding rooms and prams can be considered. For medical staff, audiences of young children or elderly people tend to require additional medical facilities and children are more susceptible to crush injury.
- ***Ethnic, cultural and other groupings*** - Considerations need to be made about potential for clashes or other crowd tensions due to rival ethnic, cultural or other sensitive groupings.. This may particularly be the case at some sporting events.
- ***Densities*** (see Annex G)
- ***Throughput capacities and metering*** - Control procedures used to prevent critical crowd densities from developing in specific areas. Especially useful in managing potential "bottlenecks" (see Annex H).
- ***Additional considerations for outdoor events****:*
  - Control and distribution of spectators in the field brought about by providing space and barriers;
  - Minimum space allocation on grounds with no seats; and
  - Some form of sectoring and barrier management by security.

ENTRANCES AND EXITS

7. Important considerations for the entry and exit of spectators are as follows:

- ***Entrances*** - These provide:
  - for supervision, marshalling and directing crowds;
  - for bag searches if necessary;
  - access for police and emergency services; and
  - egress and evacuation routes.

  Entrances should:
  - be clearly sign posted;
  - be in working order;
  - have access for wheelchairs; and
  - have separation of pedestrian and vehicular traffic.
- ***Entrance Management*** - This should:
  - allow flexible opening and closing times, however advertised times are preferred;
  - stagger entry times by providing supporting activities;
  - keep entrances clear of all other activities;
  - keep queues away from entrances;
  - ensure there are sufficient numbers of suitable barriers, fences, gates and turnstiles;
  - locate ticket sales and pick-up points in line with, but separate from entrances;
  - arrange to have a public address system or alternative system to provide information to the crowd;
  - provide sufficient staff that are appropriately trained.

- ensure that control points for searches to detect prohibited items, such as alcohol, social drugs, glass, metal containers and weapons, are in place and do not affect movement;
- provide a secure area for the storage of legally confiscated goods;
- provide toilets, if queues are expected to be long; and
- apply metering techniques as appropriate.

- *Exit Management* (Refer AS/NZS Exiting Buildings) —This should:
  - ensure fire/exit doors are not locked. If there are concerns about illegal entry then doors could be fitted with alarms;
  - ensure exit doors open in the direction of escape and are confirmed operational;
  - check placement, function and signposting of exits;
  - ensure that doors that do not lead to an exit are so marked to prevent 'dead end' entrapment and the potential for panic;
  - ensure all exit corridors are free of all impediments to crowd movement;
  - ensure turnstiles are freewheeling or can operate in reverse; and
  - ensure exit corridors are not crossed by cables which can create trip hazards. (If this is unavoidable, the cord should be marked and insulated to prevent damage and potential electrical risks, refer AS/NZ Electrical Safety).
- *Escalator Management* —This should provide for:
  - staff control at top and bottom, including an emergency stop button; and
  - metering of flow at both ends.
- *Stairway/Corridor Management* —This should provide for:
  - control of both ends if crowd is large; and
  - metering may again be required.

8. Temporary venues provide their own unique challenges for entrances and exits. Where possible consider aligning exit widths, number of exits and distance of travel with the regulations applied to permanent structures as per the Building Codes of Australia.

TICKETING

9. Ticketing can be seen as the first measure in achieving crowd control. The following issues need to be considered:

- Is advanced ticketing possible? Advanced ticketing is preferred as it allows organisers to anticipate audience numbers and plan accordingly, and enables information about services and their location to be passed on to ticket-holders before the event, for example, first aid, water sources, toilets and personal needs.
- Are there multiple entrances to the venue? Directing spectators to arrive via specific entrances can reduce congestion at entrances.
- Is it feasible to stagger crowd arrival by specifying entry times? Again, this allows for reduced congestion at entrances.

BARRIER TYPES

10. Effective use of barriers can avoid many problems, including congestion in thoroughfares. Issues to be considered in the planning phase include the following:

- What types of barriers are required? Is a solid physical barrier required, or would a psychological barrier such as barrier tape suffice? The use of psychological barriers is only suitable for orderly crowds. Any physical barrier must be able to withstand crowd surges.
- What will be the response if the barrier is breached?
- Can barriers be used to section the crowd and create passages for emergency personnel to evacuate ill or injured spectators?
- Will there be barriers to create a 'pit' between crowd and stage which can be used to facilitate the evacuation of injured spectators?

SEATING

11. Ideally, all seating should be reserved, however this may be difficult at outdoor events.

12. If the crowd is predominantly less than around 16 years of age, seating should be provided as a form of control of surges and crushing at the front of the stage. A security presence to ensure no standing on seats is another recommendation. Seating should be adequately secured to prevent movement. If there is a likelihood of potential clashes between rival crowd groupings then considerations should be given to attempt to separate the rival groups by seating allocations in pre-ticketing

RESTRICTED VIEWING LOCATIONS

13. Clear lines of vision for spectators is important to reduce the likelihood of crowds moving to get a better view of the stage. Also, a wide angle of view helps to reduce crowd densities in front of the stage.

SIGNAGE

14. Emergency exit signage and other public safety signage requirements should be checked with local authorities. However, in the absence of specific regulations or for other types of signage it generally should be:
- above head height;
- bold and distinctive;
- able to be read from a reasonable distance; and
- contain internationally recognised symbols in addition to wording.

VIDEO SCREENS

15. Video or projection screens aid in management as they can provide:

- entertainment before and between acts;
- information regarding facilities and important messages; and

- close-up vision of on-stage action for spectators as a means of reducing crowd movement toward the stage.

ALCOHOL, DRUGS, AND WEAPONS

16. Alcohol and drugs can be a catalyst for, and can exacerbate, unruly behaviour and hooliganism in a crowd. In addition, it is known that the presence and or sale of alcohol within a venue will significantly increase the number of patients presenting to on-site medical and first aid services.

17. There are a number of strategies listed below that have been implemented with varying degrees of success in reducing the problem:

- The prohibition of the sale of alcoholic beverages at events where unruly audiences are expected, or where a significant number of the patrons will be under the legal drinking age.
- If alcohol is to be sold, then a low alcohol content beverage can be made available. Alcohol sale times can be controlled and beverages dispensed only in disposable cups, in limited quantities per patron.
- If lawful within the State, advance tickets and display advertising should contain the message that alcohol, drugs, weapons and fireworks will not be permitted into the event, and that purchase of tickets is deemed as consent to a search of persons and property for prohibited material prior to admission.
- Searches of personal belongings (jackets, purses, bags, etc.) and confiscation of any alcohol, drugs and weapons, further reduces related problems.
- Signs in event parking areas and at admission gates should also display the same warning as above, to discourage patrons from bringing alcohol or drugs into the event. There are, however, possible negative consequences to such signage. Some patrons may attempt to consume a quantity of alcohol intended for the entire event prior to admission, ultimately causing problems for the event medical or first aid staff. Alternatively, it could also have the effect of spectators leaving the alcohol in their car, only to be consumed in the parking lot at the end of the event prior to departure. The most desirable approach is to discourage patrons from bringing alcohol to the event in the first place.

18. If it has been decided to confiscate prohibited goods, arrangements for the storage and disposal of these goods are required. Different approaches to seized alcohol have been used. In some cases the alcohol has been opened by security personnel and dumped into large drums in front of the patron. This has created a hostile audience and conflict with security and event management before the event has commenced.

19. Two strategies that can be applied to all prohibited material (not just alcohol) are as follows:
- Giving the spectator the option of returning it to his/her car, with a subsequent loss of place in line.

- Tagging it with "peel and stick" numbered stickers for return after the event. Such an approach can also be applied to any potential weapons found, if confiscation, for whatever reason, is deemed inappropriate.

CHAPTER 6

PUBLIC HEALTH

INTRODUCTION

1. Public health interventions are designed to prevent or minimise injury or ill health. Mass gathering events present particular challenges for prevention and harm minimisation, especially when the event is held at a temporary venue. Familiarity of the stakeholders with each other's roles and responsibilities, and knowledge of the potential and actual public health issues, present a common challenge. Public and environmental health practitioners should be invited to participate in planning for the event and may identify and act upon potential hazards before they can result in injury or illness. For example, often, local authorities or venue owners are unaware of the potential impact of simple activities such as mowing grass within the venue immediately prior to the event. This has resulted in significant increase in respiratory problems among patrons in the past.

2. This chapter provides guidance on the main public health issues likely to arise in the organisation of a mass gathering event.

PRE-EVENT RISK ASSESSMENT

3. The risk management approach during event planning should include assessments of the public health risks associated with any venue intended for a mass gathering event.

4. Checklists for organisers and approving bodies are found in Annexes I, J and K. Using a public health context the risk assessment should be used to identify the risks resulting from the following:

- *Environmental Hazards*—These include:
    - rodents;
    - insects - ants, caterpillars, wasps, bees, mosquitoes;
    - snakes;
    - spiders;
    - dogs;
    - noxious weeds;
    - marshes;
    - water courses, depth of water, water currents, water temperature, water clarity;
    - pollution, dust, noise;
    - weather, extremes of temperature, wind;
    - water quality (bacteriological), blue green algae;
    - darkness;
    - chemicals;
    - neighbouring land use; and,
    - animal control.

- ***Physical and Technological Hazards***—These include:
  - quarries, pits;
  - scrap piles;
  - swamps;
  - cliffs and steep inclines;
  - old underground tanks;
  - ex-council tips;
  - alcohol, drugs, potential weapons, broken glass;
  - use of lasers; and
  - UV radiation.
- ***Sources, Locations, Backup and Maintenance***—These must be considered regarding:
  - potable water;
  - waste water disposal;
  - toilet facilities;
  - collection, storage, and disposal of garbage, particularly scrap foodstuffs; and
  - maintenance and servicing of essential services.
- ***Accommodation***—If overnight camping is to be permitted, proposed camping areas should be surveyed to ascertain their safety with particular attention to:
  - fire risks;
  - low lying areas/flooding;
  - areas adjacent to creeks or rivers;
  - areas near power lines; and
  - trees that may drop branches.
- ***Vehicle Access and Egress Routes***—These should be considered for:
  - portable toilet pump-out;
  - garbage removal;
  - water tankers;
  - public transport;
  - car parking, particular issues may arise with spectator parking at geographically dispersed events;
  - ambulances; and
  - other essential service vehicles.
- ***Pedestrian Access*** —This should:
  - preferably be separate to that of vehicles; and
  - allow for the needs of the physically impaired.
- ***Infectious Diseases and Other Health Issues***

5. Following the risk management approach, the risks should be prioritised and treatments should be developed to deal with each hazard.

MONITORING OF HEALTH RISKS

6. First aid posts, medical centres and security personnel can provide information to help assess health and safety risks as follows.

- First aid and medical personnel can provide data through their triage and presenting problem surveillance activities and, specifically, by collecting

gastrointestinal illness surveillance questionnaires (see Annex N) or maintaining records of injuries, incidents involving water courses, alcohol and drug issues, sun exposure, dehydration and other health concerns.

- Security agencies can provide information on safety hazards and alcohol and drug issues.
- An effective system of liaison between health, workplace safety and event staff can provide the basis for immediate treatment of hazards that are causing injury or illness.

FOOD SAFETY

7. Food safety is a vital aspect of public health planning for public events. Unless proper sanitary measures are applied to food storage, preparation and distribution at mass gathering events, food may become contaminated and present a danger to public health. Special one-off outdoor events in warm weather pose additional risks as they tend to have less than ideal circumstances for food handling, transport and storage.

8. All organisations/businesses providing food at mass gathering events should comply with the requirements of the Australian and New Zealand Food Standards Code (ASNZFSC).

9. Each State and Territory and many individual local governments have included requirements in relation to approvals, licensing and food safety for public events. To ensure adequate standards are met, an environmental health officer should initially assess food service proposals, including the proper authorisation of vendors, as part of the pre-event planning outlined in Chapter 1. Any proposal assessment should be based on current food hygiene legislation and food safety codes. This assessment should be followed up with a pre-event audit as well as periodical monitoring of food safety throughout the event.

10. Risk assessment should form part of an overall food safety plan for the event. The following could possibly be sources of risk:

- quantities and types of food;
- lines of supply;
- premises;
- preparation techniques;
- means of distribution;
- licensing/permit process and authorisation of vendors; and
- food safety documentation, including the Hazard Analysis Critical Control Point (HACCP) approach and surveillance.

11. A sample Food Vendor Information Sheet appears at Annex M.

FOOD PREMISES

12. Fit out and construction of the premises must be in accordance with ASNZFSC, State and Territory legislation, local government laws and identified Codes of Practice. The premises or area to be used for food storage, preparation and

service must be easily cleaned, have adequate ventilation and lighting, be designed to prevent the harbouring and entrance of pests, and prevent the build up of dirt and food scraps.

Equipment

13.   Equipment must be in a safe working order and easily cleaned.

Safety

14.   The safety of both staff and the public is an important consideration, and occupational health and safety standards must be met. Some of the hazards to be avoided include loose power leads, trip hazards, inadequate refuse disposal, inappropriate positioning of equipment (especially hot equipment), poor ventilation and extreme temperature in the work environment, badly stacked supplies and unguarded equipment.

Refuse Disposal

15.   A regular disposal system should be put in place. Putrescible refuse, in particular, can cause problems from odour, insects, rodents or animals. Adequate disposal facilities must be easily accessible to food handlers as well as waste contractors.

16.   A separate refuse collection should be organised for food premises and should be continually monitored to ensure the frequency of collection is appropriate.

17.   Refuse facilities should enclose waste and be constructed so they are easily cleaned.   Where possible the separation of refuse into recyclable and non-recyclable, dry, wet and hazardous disposal units should be encouraged. (For more information on refuse disposal refer to Waste Management).

Water Supply

18.   Provision of a supply of potable water for sinks and hand basins is essential. Those operators using water stored in their own tanks must have access to facilities to refill diminished supplies. It is important to ensure this access is organised before the event. (For more specific details on water supply refer to Water).

Hand Washing

19.   Hand washing facilities for the exclusive use of food handlers must be provided and should be easily accessible or provided within areas where food handlers work if their hands are likely to be a source of contamination of food. Potable water must be used for hand washing, the water must be running and, where possible, hot water should be available. Soap and disposable handtowels should be provided in the hand washing area.

Sinks

20. Potable water must be supplied to all sink areas. Hot water should be used where possible. An appropriate detergent and sanitiser should be used to adequately clean all sinks and hand basins.

Food Supplies

21. Those organisations/businesses providing food must take all practicable measures to ensure they only accept food that is correctly prepared, protected from contamination and that has been under correct temperature control. Those food outlets should keep a record, for each food received, of the name and address details of the food vendor or manufacturer.

Transporting Food

22. The length of time food is transported should be kept to a minimum. Temperature requirements should be maintained and the food should be protected from contamination at all times.

23. Food transport vehicles should be clearly identified and subject to surveillance and monitoring.

Food—Handling

24. Vital aspects are as follows:

   - ***Cross-Contamination***—The following points apply:
     - Every effort should be made to minimise the risk of cross-contamination during the food handling process. Food utensils and surfaces used for the preparation of raw and ready-to-eat food should be clearly distinguished. In cramped circumstances this becomes more difficult.
     - Frequent hand washing should be encouraged. Separate utensils and gloves should be used in between handling raw and ready-to-eat foods.
     - Appropriate food storage is critical to ensure there is no contamination between raw and cooked or ready-to-eat foods. Raw foods should be stored separately if possible, or at a minimum, stored below cooked or ready to eat foods.
     - Equipment must be adequately cleaned and sanitised between each separate process. This is particularly critical where equipment is used for preparing different food types.
   - ***Thawing, Cooking, Heating and Cooling***—The goal in temperature control is to minimise the time potentially hazardous foods are in the danger zone of 5°C to 60°C. Key points to remember are as follows:
     - Thaw food under refrigeration or cold running water.
     - Cook food thoroughly to achieve a core temperature of 70°C.
     - Reheating of food should be minimised. Where reheating is required the food should be heated thoroughly and stored above 60°C.
     - Cooling of food should be carried out quickly under refrigeration.
     - Food should be portioned into trays not more than 100 mm deep.

- *Cleaning and Sanitising*—The following points apply:
  - Regardless of the type of facility in which the food is prepared, all food contact surfaces must be regularly cleaned and sanitised using an appropriate sanitiser (sodium hypochlorite (100 - 200 ppm) is considered to be appropriate).
  - All other surfaces should be cleaned to minimise the risk of contamination to food products. Pest infestation and occupational hazards such as slippery floor surfaces should also be considered.
  - Consider the provision of a designated washup area for food outlets to reduce sullage waste storage and pump out at each food outlet.
- *Chemical Storage*—Chemicals must be stored in separate areas to foods and all chemical storage containers must be clearly marked as to their contents. Food containers must never be used for the storage of chemicals.

Food Storage

25. Essential matters to be addressed include:
    - *Storage Facilities* —Facilities of adequate size and appropriate for the purpose must be provided to enable food to be stored so it is protected from contamination.
    - *Temperature Control*—The following points apply:
      - Refrigerated or heated storage areas require continuous power supply. Potentially hazardous food must be stored at temperatures below 5°C or above 60°C at all times. A temperature measuring device should be available to check the temperature of those potentially hazardous foods.
      - Refrigeration can become a problem in particularly hot weather when refrigeration units struggle to cope. All proprietors should indicate alternative refrigeration suppliers or the organiser or authority could identify alternative suppliers in the public health emergency management plan in case of refrigeration failure.
    - *Cross-Contamination*—The following problems must be overcome:
      - The less than ideal conditions for instance working in temporary facilities may lead to a compromise in food-handling.
      - Space is often a major problem. Ensure that, at a minimum, raw and cooked or ready-to-eat-foods are stored appropriately. Food handling staff must be aware of the requirements for strict hand washing and cleaning and sanitising of equipment between handling raw and ready to eat foods.
    - *Dry Goods*—There should be sufficient storage conditions available to ensure adequate protection of food from the elements and pests.
    - *Food Protection*—Exposed food available on display must be protected from insect pests, dust and human contact.

Food Handling Staff Considerations

26. Standard 3.2.2 Division 4 'Health and Hygiene Requirements' from the Food Standards Code specifies requirements for food handlers and food businesses which may be useful for organisers and promoters. Important matters to be addressed include the following:

- *Training* — Proprietors and supervisors of food handlers should have skills and knowledge in relation to food hygiene and food safety matters.
- *Personal Hygiene* — Food handlers employed by organisations /businesses providing food should have high personal hygiene standards and ensure those personal hygiene habits are appropriate to prevent the contamination of foods. Food proprietors should ensure a non-smoking policy is implemented in the workplace.
- *Infectious Diseases*
  - Organisations/business proprietors should ensure that food handlers should not work whilst they are in an acute stage of any gastrointestinal illness or cold/influenza.
  - Food handlers who have open wounds should ensure all wounds are appropriately dressed with a waterproof dressing and the dressing changed regularly.
- *Communications* — Proprietors should be able to demonstrate that they have a good reporting and communication system so that issues can be identified and dealt with promptly.
- *Supervision* — Proprietors should be encouraged to provide appropriate supervision to ensure a good team approach to the provision of a safe food supply.

Other Considerations

27. These include the following:

- Food handlers dress should be appropriate to the task they are performing, and include some form of hair covering.
- Separate toilet facilities should be provided for food handlers.
- Facilities should be monitored for any signs of pest or rodent infestation.
- Food proprietors should be encouraged to keep a register of any complaints that they may receive.

28. A sample 'Checklist for Food Vendors' appears at Annex L.

WATER

29. An adequate supply of safe drinking water must be available. One guideline is 20 litres of potable water per person per day, of which 4 litres is the drinking water component. Event duration and location and the expected ambient temperature should be considered in deciding the quantity of drinking water required.

30. In areas where non-reticulated water is the only source then consideration should be given to the clarification and disinfection of the water supply to achieve greater than 1 ppm residual chlorine.

31. An appropriate means of access to drinking water for spectators must be considered in a field or outdoor venue or events such as 'raves' where the activity produces an extreme heat environment.

32. Water pressure must be adequate to provide for all uses and peak demands. Alternate water supplies should be available should existing supplies fail to meet demand or be rendered unsafe or unusable.

33. Food premises must have a sewage and waste disposal system that will effectively dispose of all sewage and waste water and be constructed so there is no likelihood of sewage or waste water contaminating food.

TOILETS

33. Where existing toilet facilities are judged inadequate, additional portable units must be made available. Important matters to consider include:

- Toilet locations should be:
  - well-marked;
  - well-lit (including surrounding area) if night usage is expected;
  - serviced (including pump-out of portables) on a 24-hour basis during the event (vehicle access is obviously necessary); and
  - located away from food storage and food service areas.

- Other considerations in the provision of toilets are:
  - provision for the safe disposal of needles, syringes and other sharps away from the reach of children; and
  - if appropriate, provision of condoms at some events.

34. In determining the number of toilets to be provided for particular events, the following criteria should be considered:

- The duration of the event.
- The type of crowd.
- Whether the event is pre-ticketed and numbers known or unticketed.
- Staggering finishing times where there are multi functions.
- The weather.
- Whether alcohol will be consumed.
- Local and State regulations.

35. Calculating the number of toilets required for an event is a matter for conjecture and there is no uniform Australian Standard. Where local laws or regulations do exist these must be applied. Better management of events can be achieved by providing additional facilities. Assume 50/50 male/female split unless otherwise advised. The following tables should only be taken as an approximate guide.

Planning Toilet facilities for events

Patrons	Males			Females	
	WC	Urinals	Hand	WC	Hand

			Basins		Basins
A Where alcohol is NOT available					
<500	1	2	2	6	2
<1000	2	4	4	9	4
<2000	4	8	6	12	6
<3000	6	15	10	18	10
<5000	8	25	17	30	17
B. Where alcohol is available					
<500	3	8	2	13	2
<1000	5	10	4	16	4
<2000	9	15	7	18	7
<3000	10	20	14	22	14
<5000	12	30	20	40	20

36.   The above figures may be reduced for shorter duration events as follows:

Duration of event	Quantity required
8 hrs plus	100%
6-8 hrs	80%
4-6 hrs	75%
Less than 4 hrs	70%

Toilets for the Disabled

37.   At least one unisex toilet for the disabled is required.

Food Vendors' Toilets

38.   Separate toilet and hand washing facilities should be made available for food handlers.

General Considerations

39.   In an outdoor setting, it is a relatively simple matter to provide additional toilets by hiring temporary, portable toilets. This solution may not be suitable for indoor settings, for which provision of additional toilets may be more difficult. One possible solution is to convert some men's washrooms to women's for events where a predominantly female audience is anticipated or vice versa.

40.   As a means to overcome long line-ups, particularly at female toilets, some organisers have provided additional, unisex toilets to be used by either males or females.

41.   Maintenance and cleaning schedule for toilets and hand-basins should ensure:

- an adequate supply of toilet paper and soap;
- cleaning of toilets to a suitable timetable;
- provision for disposal and removal of sanitary napkins; and

- availability of plumber or appropriate maintenance person to repair or remove blockages.

42. Organisers should ensure that adequate cleaning supplies are available for cleaning staff.

WASTE MANAGEMENT

43. Major considerations are as follows:

- ***Food Waste***
  - Food waste should be deposited in covered containers placed strategically around the venue. Covers are essential, especially in outdoor settings or if high temperatures are expected.
  - Spectator density may prohibit access by garbage removal vehicles. To prevent containers from overflowing, containers should be emptied regularly, and waste moved to a temporary, properly prepared holding area, until bulk removal at designated times or after the event.
- ***Empty Containers***
  - Arrangements should be made for the appropriate storage or disposal of empty containers, for example cardboard boxes.
- ***Hazardous Wastes***
  - Special arrangements must be in place for the collection and disposal of various forms of hazardous waste, including waste from food preparation areas, 'sharps' and other hazardous materials.
- ***Clinical Waste***
  - Ensure there is provision for the storage, collection and disposal of clinical waste generated from on-site medical and first aid facilities.
- ***Sewage and Sullage***
  - Adequate facilities should be provided and maintained for the ongoing storage and disposal of sewage and sullage.
- ***Recycling***
  - Where possible, specific containers for recyclable materials should be considered.

ANIMALS, RODENTS AND VEGETATION

44. In outdoor settings, control of rodents, snakes, spiders, mosquitoes, and insects of significance to public health must be addressed. If particular hazardous species are known to inhabit the area, or if vectors of particular diseases are endemic in the area, the attending first aid and medical personnel should be alerted.

45. Medical and first aid personnel should also be alerted to the presence of potentially poisonous and noxious plants and trees.

46. A decision needs to be made about the control of domestic animals if they are to be permitted into the venue.

47. Consideration needs to be given to the potential effect of the event on nearby domestic or farm animals and native fauna.

SWIMMING AND WATER AREAS

48. Purpose-built swimming areas must comply with State requirements for water quality and other regulations such as fencing. Other water courses in the vicinity of the venue which may be used for water recreation or washing should be assessed for suitability against the National Health and Medical Research Council's Australian Guidelines for Recreational Use of Water or the State standard where available. Where these water courses are considered unsuitable they should be fenced off and warning signs should be erected.

49. Water quality must be addressed in both designated swimming areas and water that could be utilised for swimming in hot weather. Experience has shown that where audiences attend an outdoor concert in hot weather, particularly in overnight situations without washing facilities, any nearby water area will be employed as a makeshift swimming/bathing/washing area. Consideration should be given to controlled use of soaps and detergents in natural water courses.

50. Some form of trained supervision should be considered for:

   • families with small children;
   • spectator groups where alcohol is consumed; and
   • water that has additional hazards such as steep, slippery sides, submerged snags or unusually variable depths.

INFECTION CONTROL AND PERSONAL HYGIENE ISSUES

51. Infectious disease transmission through unsafe sexual practices or drug use may be a health risk at some events, particularly those that involve spectators camping at the venue overnight. As a means of reducing these risks, consideration should be given to provision or availability of condoms and a properly licensed needle exchange/disposal mechanism. While these are sensitive and controversial issues, they are nevertheless important public health concerns in contemporary society and must be addressed.

52. At events where the duration is overnight or longer, hygienic washing facilities should be provided. Suggested minimum requirements for facilities for camp grounds based on 2 - 3 nights camping are as follows:

Sex	WC	Urinal	Hand Basins	Shower
M	1 per 50	1 per 100	1 per 75	1 per 100
F	1 per 25	N/A	1 per 75	1 per 100

TATTOOING AND BODY PIERCING

53. With a return in popularity of tattoos, body piercing and branding, mobile operators have begun to appear at certain types of public gatherings, such as

carnivals, motorcycle races and auto swap meets. Where this is likely to occur, checks should be made as to the need for proper licensing or registration of such service providers and their compliance with any health legislation.

54. Due to the potential of cross-infection, particularly of blood-borne diseases, any such operations should be inspected to ensure (as a minimum):

- disposable, single-use items are utilised;
- proper sterilisation equipment and techniques are employed; and
- clinical sharps containers are utilised for used needle disposal, and these containers are located safely away from children.

55. No skin penetration procedures should be allowed to occur if the minimum infection control procedures are not followed.

HEALTH PROMOTION

56. It is important to consider the opportunities to promote health messages at public events and to encourage event organisers and service providers, such as food vendors, to participate. Examples include:

- *Sunsmart*—Encourage provision and use of shade areas. Encourage the use of sunscreen creams, hats etc. and make them available for purchase by spectators.
- *No Smoking*—Encourage the provision of non-smoking areas and a ban on sale of cigarettes at the event.
- *Hydration*- Encourage patrons to maintain an adequate intake of fluids and make water and other drinks readily available.
- *Nutrition*—Encourage food proprietors to participate in the provision of nutritious foods. Encourage event organisers to select food vendors that provide nutritious food varieties.
- *Safe Sex*—At certain events promotion of safe sex messages can be conveyed and provision of free condoms should be considered.
- *Alcohol*—Consider the designation of alcohol-free areas and/or restrictions on the sale of alcohol. Glass-free policies should also be considered.
- *Drugs*—Consider opportunities to spread harm minimisation messages.
- *Hearing Protection*—Consider providing advice about hearing protection, and possibly free ear plugs, to spectators and participants. This is applicable to venues such as rock concerts and car races.

MAINTAINING COMPLIANCE

57. To ensure compliance with public health requirements, a public health audit should be carried out just prior to the commencement of the event. Subsequent periodic surveillance should be undertaken at appropriate times during the event. These are particularly important for outdoor events in hot weather with transient food vendors who may not have sufficient sanitary or refrigeration mechanisms available.

58. It is preferable that environmental health officers should have pre-event access to resources to assist in overcoming any problem noted (for example, toilet servicing, unsafe areas, fencing repairs, water testing) rather than using their powers to stop the event or particular operation.

POST- EVENT SITE SURVEY

59. A post-event survey should be conducted to ensure a proper clean up has been undertaken, particularly from a public health perspective (for example, all scrap foodstuffs and discarded needles are properly disposed of). The venue should be returned to its pre-event condition.

60. When fireworks have been used, a diligent search should be carried out for any unexploded fireworks. They should be safely collected and removed before the public is allowed access to the area.

61. As an additional precaution, appropriate records should be retained of all service providers at the event so that they may be traced should some subsequent outbreak of a notifiable disease occur, or a claim be made for an injury or illness.

62. Health personnel should also be conscious of the need to introduce a monitoring/surveillance system for an event. Both real time presenting problem surveillance and post event review of data provide the opportunity to identify potential and actual problems.

63. There should be a formal public health debrief following the event, and a public health representative should participate in the all agency debrief.

PUBLIC HEALTH CONTINGENCY ARRANGEMENTS

64. The arrangements outlined in this chapter are designed to prevent or minimise the risk of an adverse event occurring. However, there is always a risk of unforeseen circumstances potentially or actually creating a public health risk. It is important that some basic thought is given to contingency arrangements and these should be documented in the public health emergency management sub-plan.

65. The sub-plan should include the following details as a minimum:

- Contact details, including after hours details, for key event personnel (eg event organisers, environmental health officers, trades persons, police, emergency services including health services).
- Contact details for additional staff.
- 24 hour contact details of the food proprietors.
- Arrangements for alternative suppliers of equipment in event of a failure or loss of water or power.
- Arrangements for food handlers who become ill.
- Alternative water suppliers.
- Arrangements in case of product recall.
- Procedures for the handling of complaints.

- A debriefing process.

CHAPTER 7

FIRST AID & MEDICAL SERVICES

INTRODUCTION

1. Experience shows that a proportion of the patrons of an event will require some type of first aid or medical care. Of those around 10% will need ongoing care on site and some will require transport to hospital by ambulance. The incidence of illness and injury may be greater than that expected to occur naturally in a population of comparable size even though mass gatherings are usually collections of 'well persons'.

    Several of the features of mass gatherings are recognised as important influences on the demand for health care. These key characteristics include the weather (temperature and humidity), duration of the event, whether the event is predominantly an outdoor or indoor event, whether the crowd is predominantly seated or mobile within the venue, if the event is bounded (fenced or contained) or unbounded, the type of event, the crowd mood, availability of alcohol and drugs, the crowd density, the geography of the event (or terrain/locale), and the average age of the crowd.

    For health service providers a mass gathering can be defined as a situation (event) during which crowds gather and where there is the potential for a delayed response to emergencies because of limited access or other features of the environment and location. This potential delay requires planning and preparation to limit (or mitigate) the hazards of the mass gathering and ensure timely and appropriate health care is available.

2. The profile of casualty types and range of severity or acuity of presentations is highly consistent when the key features influencing rate and type of presentation have been taken into account.

    Respiratory illnesses, heat related problems minor injuries and minor problems (headache, blisters, sunburn) make up 80% of casualties. In Australia, for example, of patients requiring acute intervention, asthma (on average 3% of presentations) is the most common complaint. Outdoor events produce more environmentally related injuries such as lacerations and sunburn. Events attracting young people, such as rock concerts, produce more alcohol and drug abuse related problems. Cardiac arrests occur infrequently (1:500 000 at Australian Rules football events) though on site resuscitation and early defibrillation is important and can improve patient survival rates. These presentation types are, broadly speaking, similar across countries and commonly reported in the international literature. Differences that do occur appear to be more closely associated with key features of events such as weather and the nature of the activity.

3.

    The most significant contributor to the patient care workload of on site medical and first aid services is crowd size. Patient presentation rates (patients

presenting to first aid services at the event per thousand spectators – PPR) vary significantly ranging from 0.14 to 90 though most reported events have ranged between 0.5 and 2. Recent national data shows an average PPR of 0.992. Rates of transportation to hospital for further care (number of patients transported to hospital per thousand in attendance - TTHR) vary from 0.01 to 0.55. The average TTHR for Australian events is 0.027. Medical and first aid services can estimate the potential workload for an event and the requirement for ambulances using existing predictive models and historical data for the event.

HEALTH CARE PROVISION

4. Planning for the provision of medical and first aid care for both spectators and participants is essential, for both humanitarian and legal reasons. The principal goals of mass gathering medical and first aid services are to ensure; rapid access and provide triage to the injured or ill patient; effective and timely stabilisation and transport of seriously injured or acutely ill patients; and, provision of on site minor injury and illness care. The decision to provide on site care for minor problems is complex. The service should reflect the needs of patrons and the desires of event sponsors. Confounding factors include those events with large geographic spread, with captive audience or events where the local hospital system could be overloaded. For example, the provision of on-site first aid or medical care may significantly reduce the demand on the emergency departments at local hospitals in the area of the event.

5. Event organisers may choose to contract a specialist medical or first aid service provider. Checks should be made to ensure that the service provider meets the local requirements and laws, provides sufficient staffing to meet desired response times throughout the venue and is adequately insured. They must liaise with the local medical, police and emergency services to plan their response to any emergency or significant medical problems requiring further assistance. Local health authorities including hospitals will need to be notified of details of the event and consulted about emergency management plans for a major incident.

Key Issues

6. Nine elements of patient care planning at mass gatherings are essential: intelligence about the event and especially the anticipated crowd (crowd size, crowd motivation and other demographic information), health care personnel and skill mix, medical triage strategy and facilities, communications, transportation, medical record management, public information and education, mutual aid, supply and data collection. Additional elements to be considered include public access to health care facilities and visibility/signage, response strategy and benchmarks for response time, disaster planning and the expected operating environment (eg. weather, terrain and duration). Additionally, local hospitals need to consider the potential impact of an event and plan for additional patients.

- *Management and Planning* (see Chapter 1 and Annexes I and J for checklists):
  - For events where several agencies will be providing medical or first aid care the lead organisation should be identified and manage a medical sub-committee who will address the following:
    - Consider information about the event that may impact on the number and type of patients who will be seen and other aspects of the event that may influence service provision.
    - Determine the roles of each organisation involved in the provision of care.
    - Determine levels of care that will be required,
    - Determine facilities and equipment required. The responsibility for assembling resources to support the event will need to be specified in the operational plan. Most problems that arise during an event centre around resource management issues, and relate to coordinating what is available or to a lack of resources.
    - Determine rules for command and control of the health response. The responsibility for overall control of the service and for the command of each organisational element involved will need to be clearly specified in an event operational plan. Decisions on these issues should not be left until an event has begun.
    - Establish liaison with local health services, police and emergency services.
    - Establish communications, including protocol, and links to other services.
    - Liaise with other emergency services to ensure access and egress routes for patient evacuation.
    - Determine what staff accreditation will be required and strategies for health service access to all areas of the event.
    - Check liability insurance and indemnities are appropriate
    - Manage security of medical stations and safety of staff.
- *Planning Information*
  - Medical and first aid service specialists involved in planning for mass gatherings should consult the available medical literature. A search of the key words 'mass gathering medicine' will elicit the most relevant information.
  - Planners for the provision of medical and first aid care at mass gatherings have access to methods that can estimate the number of patient presentations. Predictive models are particularly useful for events where there is no or limited information about previous medical work (e.g., one-time, special events) and provide a broad prediction based on the combination of information gathered from a range of events. These predictions have proven to be accurate over the entirety of the event, but are limited in their ability to predict inter-day variability. Retrospective (historical) review of data generated from a specific event considers the unique and individual variability that can occur from event-to-event and is more accurate for predicting patient presentations when the data are available. The two methods can be considered complementary in determining medical work during public events. While the methods do not incorporate the level of medical or first aid assistance required (i.e., skill levels of personnel), both can be used to support planning for

events. A thorough risk assessment is required considering factors that may increase the number of patients in total or the incidence of a particular form of injury or illness and applying the principles of risk treatment to mitigate or prevent the problem. First aid service providers should be able to assist in this stage of the planning process.

Planners should consider:
·   Will vulnerable populations be present – including the aged, children and those where risk of harm is associated with the location of the mass gathering?
·   How will proactive prevention and/or mitigation efforts be used to reduce the minor injury or illness workload - with flow on effect of workload reduction for on-site health services?
·   What data will be collected to facilitate comparison and improvement of the service for future events
·   The potential for disaster or catastrophic emergency - Usually at mass gatherings emergency medical and first aid services are required to manage a relatively predictable patient load. However, health care services and other public safety agencies also need to be prepared for an unexpected and catastrophic event. Catastrophic emergencies during mass gatherings have included the collapse of stadium seating, crowd crush incidents and fire within stadiums causing multiple injuries. The Bradford Stadium fire (1985) and the London underground fire (1987) are among the most well known mass gathering disasters. Disaster planning must also form part of the planning process for these large public gatherings.

- *Event Details*
    Planners should carefully consider features of the event that may affect the requirement for medical and first aid care including:
    - Event duration.
    - Venue and its layout (see Chapter 6 Public Health, Pre-Event Risk Assessment).
    - Number and type of attendees including expected demographics of the crowd (eg. age and sex).
    - Any special requirements, for example, visits from heads of state, VIPs, attendance by people with disabilities, requirements mandated by sports governing bodies.
    - Predictions of possible crowd behaviour ie likelihood of alcohol/drug problems (rock concert), violence (political protests, rival crowd groupings, riots). Refer Chapter 5.
    - Will the crowd be seated or not (the latter may produce more minor injury problems).
    - Availability of food and beverages, especially access to water.
    - Is the event 'bounded'. Events where access is controlled may result in less leakage of patrons who require care to surrounding health services/hospitals and a higher presentation rate within the event.
- *Venue Access*
    Characteristics of the venue or event may need to be considered in planning including:

- It is important that medical teams can easily locate individuals in need of attention. A common reference map or grid system should be used and provided to all event personnel and participating organisations.
- Some events will present special challenges for access and rescue. For example in modern stadiums access and extrication from fixed seating areas may require special equipment.
- How will patients be transported on-site?
- What access routes exist for rapid evacuation of patients from the venue?
- Will the event itself pose a barrier, for example, 'extended' events such as community runs or a parade?
- Will there be a need for aeromedical services and, if so, what are the associated regulations regarding their operation?
- The resources, location and physical area allocated to first aid and medical services will depend on the answers to many of these planning questions and organisers should seek the professional advice of health and medical organisations, ambulance services, and first aid providers for guidance on areas needed and layout.

- *Types of Problems*

  The type of problems presenting are influenced by key features of the event. Consider the biomedical, psychosocial and environmental factors that might influence the number and type of patients.
  - Consult local authorities and medical literature for information on risks and types of injury sustained at the event or similar events in the past.
  - Consider the effects of weather conditions eg. hypothermia, heat stroke and utilise long and medium range weather forecasts to modify your plan.
  - Consider specific risks associated with the venue or the type of activity.

- *Numbers of Patients*
  - Consult medical literature (as above) and predictive models for information on the numbers and type of casualties from similar events in the past.
  - Consider variables that affect numbers, for example, crowd size, weather, crowd mobility, alcohol consumption, psychosocial behaviour and type of event.

- *Medical Requirements*
  - Injuries, varying from minor to life threatening, should be anticipated when any large crowd gathers. The consequences of these injuries can be lessened with forward planning.
  - Prepare for the most critical injury/illness foreseeable (for example cardiac arrest).
  - Establish mobile team(s), and a tiered response strategy providing ready access to all parts of the 'Chain of Survival' including early basic life support and defibrillation, advanced life support and evacuation. Basic first aid care

> will be the largest component of the workload and should be available throughout the venue.
> - Define the geographical boundaries of the service in liaison with the local ambulance service , eg. inside venue or parking areas.

- ***Level of Care***

  This will vary depending on the organisation providing the care, the anticipated crowd and the distance to, and accessibility of, the nearest hospital and its capability. There has been a shift away from the idea that physician involvement (on site) is essential and the capacity of nurses, paramedics and those with advanced first aid skills to manage and stabilise patients has grown. Still skill mix and workload modelling lacks a strong research evidence foundation. Ability to meet evidence-based response time targets (operational modelling) should be a goal. The average health care staffing at Australian events is approximately 0.5 staff/1,000 spectators and consists of basic first aiders (45%), advanced first aiders (44%), nurses (7%), ambulance officers (3%) and medical officers (1%). There is great variation in these proportions from event to event and this variation is based on the risk assessment undertaken for the event. In any case it is advisable for first aiders to work in teams of at least 2 persons. It is important to establish staffing and response strategies so that basic first aid is widely and readily available and a tiered response to life threatening problems is available throughout the venue through rapid access to basic life support (BLS) (within minutes) and early access to advanced life support and evacuation. BLS is usually provided through a widespread network of first aiders/responders and ALS through a combination of advanced first aid/paramedic and medical practitioners.

  The Scope of Practice and purpose of the medical and first aid service should be clearly defined for all staff. Is the service focussed on assessment, treatment and referral of emergency cases or extended to provide general medical care for less urgent cases? How will the professional qualifications and skill sets of health care professionals be endorsed and what indemnity is provided by the health care service provider? Will health care professionals registered in other jurisdictions or visiting from other countries be involved in providing patient care and how will they be accredited?

  Medical and first aid service providers should consider how health status is challenged during mass gathering events and apply some effort to the treatment of causation (to prevention or mitigation).

7. Further guidance on the establishment of medical and first aid care facilities and their equipment requirements is available from specialist medical and first aid service providers and ambulance services.

FIRST AID POSTS

8. Important considerations in the establishment of first aid posts are as follows:

- First aid posts should be clearly sign-posted from all directions

- They should be clearly marked on maps of the event site;
- The position should be known by security and other event personnel;
- They should be stocked and staffed for the duration of the event and for spectator arrival and departure periods ;
- Facilities should be provided for injured or sick patients to lie down;
- Privacy in clinical areas must be ensured;
- There should be some means of communication with the primary medical and first aid control point, venue control, and with mobile first aid teams at the venue;
- Hand washing and toilet facilities may be co-located with the first aid post.
- Facility for the disposal of clinical waste including sharps should be provided.

ON-SITE MEDICAL CENTRE

9. Depending on the nature of the event a site medical centre may be required to provide medical care for the number or type of casualties anticipated. Contingency plans should also be made in case of a major incident, for which the resources of the on-site medical centre may not be sufficient. Failure to plan for large numbers of, or severely injured, casualties can result in long delays in providing medical treatment. It is important to provide a communication link between the on-site medical centre and the local ambulance service or hospital. Medical teams should understand the command structure, their role within it and the emergency activation system.

10. Site medical centres should meet all of the requirements for a first aid post and in addition will require:

- clean flowing water;
- electricity for medical appliances lighting, heat, cooling or refrigeration .This should, if possible, include a back-up power system;
- washroom/toilet facilities and rest area
- clear access roads for emergency vehicle usage;
- appropriate patient transport to the medical centre from outlying first aid posts or other locations;
- ready access to security staff or police assistance

MOBILE TEAMS

12. In large crowds First Aiders on foot provide an effective response. Experience has shown that readily visible static first aid posts throughout the venue are accessed by spectators requiring first aid care. For more urgent or serious cases uniformed First Responders can be dispatched from these locations. A sound communications system and protocols are required to support a tiered response to urgent cases. First Aiders on foot circulating in dense spectator areas are quite effective, and will be readily summoned by patrons requiring

care. However, in emergencies patrons will often use their mobile telephone and call the 000 emergency number or contact a nearby member of event or security staff. As a result, mobile first aid teams must always have communication with the medical and first aid control point and be available for dispatch to the scene of an emergency. In addition, the medical and first aid control point must have a communications link to the ambulance service so that 000 calls can be referred directly to the event medical and first service.

DOCUMENTATION

14. Documentation of treatments undertaken should meet the requirements of privacy legislation, maintain the confidentiality of patient information and be in duplicate; suitable for handover to paramedics and the receiving hospital with a record kept by the provider. Confidential patient information may not be available to the event promoter, venue owner or other party unless permission is granted by the patient. Medical and first aid service documentation may be used for:

    • post-event review of activities;
    • tracking of biological, chemical and infectious disease exposures should they occur; and,
    • police or coronial investigations.

    Specialist first aid and medical service providers and ambulance services have experience and systems established to manage patient information in accordance with legislation and regulations and can advise on these matters.
.   The medico-legal issues that should be addressed include, for example:

    • Who has access to records?
    • Who keeps the data and for how long? and,
    • Who can give consent to treatment?

AMBULANCE VEHICLES

16. While conventional ambulances are appropriate for patient transfers to off-site medical facilities over good roads, such vehicles may be unsuitable for off-road usage. Ad hoc roadways and cross-country terrain may require four-wheel drive vehicles, particularly if grounds are saturated by recent rainfall.

17. In denser spectator areas, any vehicle can have access problems. Consideration should be given to utilising golf carts, either designed or modified to accept stretcher cases from these areas.

18. For these reasons the ambulance network may have to consist of a mix of First Aiders on foot, golf-carts, four-wheel drive vehicles, and conventional ambulances, to best facilitate the patient transport requirement. A magnetic-based beacon, portable radio, and appropriate marking for these vehicles should be provided.

    A communication network, to provide a coordinated response to requests for assistance, is essential. This may be based on existing service networks or may need to be provided by event organisers There should however be a

robust connection between ambulance communications, the on site medical and first aid control and event management communication networks.

MEDICAL EQUIPMENT

20. Equipment requirements will vary depending on the risk assessment which includes the type and number of spectators expected, the site for the event, the distance to the nearest hospital/medical facility. Where private medical and first aid service providers are used it is important to consult with local ambulance authorities to ensure that equipment such as stretchers and cervical collars are interchangeable.

21. Further considerations include:

    • likely proportions of patients for basic and advanced medical treatment;
    • mobile versus fixed requirements;
    • vulnerable populations attending the event
    • arrangements to resupply aid posts as required
    • availability and storage of medications; and,
    • security of equipment and medical supplies

MEDICAL SERVICES COMMUNICATIONS

22. Communications for medical and first aid services need to be included in the overall communications plan for the event. A contact number for event patrons should be made available and be advertised. Refer Chapter 4 "Communications Systems".

CHAPTER 8

PSYCHOLOGICAL AND BEHAVIOURAL ASPECTS

INTRODUCTION

1. The potential for psychological factors to contribute to difficulties in the management of mass gathering events will depend on a number of factors. Many factors will influence crowd behaviour, including density, purpose of gathering, entry and exit issues, the presence of a threat to personal safety or the occurrence of an unanticipated incident at the event. Refer Chapter 5 for more detail.

2. Crowd and group behaviour at mass gathering events will be particularly sensitive to security requirements and threats. Threats to personal safety could include terrorism. If psychological and behavioural factors lead to conflict, violence, or other uncontrolled behaviours then additional psychological impacts may occur as a result.

3. Managing the public health implications of mass gathering events requires a wide range of psychological issues to be considered. Issues that may have psychological dimensions include the following:

    - Purpose of the mass gathering - Distress or conflict can occur when, for example, competing football fans become drawn into threatening group behaviours or even overt threats and violence. It may also occur if a charismatic leader argues for active response to his or her proposals and individuals, groups, or the crowd, becomes "fired up" to action.
    - Access to alcohol and illicit drugs. Alcohol and or drugs may be consumed by those who have brought them to the gathering, leading to intoxication and resulting in aberrant behaviour, including aggression.
    - Excessive "crowding". In such circumstances the "crush" of humanity may mean that people intrude into each other's personal space. This can lead to rising anxiety, aggression, fear and attempts to move which prove unsuccessful. The subsequent effects can cause mounting fear with potentially dangerous behaviours and circumstances.
    - Entrapment fears. Such fears arise when people wish to leave and cannot, or when a threat is felt to be present and individuals are unable to move away from it. In such situations more aggressive, anxious or demanding behaviours may arise and escalate.

- <u>Abandonment and deprivation.</u> In some mass gathering events people may come to feel that their survival, or that or their children or loved ones, is threatened. They may be crowded, entrapped, separated from companions, lack water, food or access to necessities. These feelings of abandonment, deprivation, or threat to survival may "bring out" both altruistic and aggressive responses in those who are threatened.

- <u>Separation from loved ones.</u> Parents who become separated from young children within a mass gathering context may become very fearful for their safety and fearful that their children will be injured, lost to them, or even have their lives placed at risk. This may result in aggressive, demanding or searching behaviours.

- <u>Contagious behaviours.</u> These behaviours may be happy, aggressive, euphoric, or depressive. The process of contagion in such settings is not well understood but may be evoked for behaviours such as religious or other commitment or for more aggressive outcomes (eg riot).

PSYCHOLOGICAL ISSUES IN THE MANAGEMENT OF HEALTH RELATED OUTCOMES

4. These are relevant to several groups: staff, performers and participants, spectators, with a special focus also on those who may present for medical care.

STAFF

5. Staff training needs to encompass the relevant issues in understanding mass gathering events and potential behaviours, the management of aberrant behaviours and the role of staff in responding to any major incident that may arise. Anticipation of likely tension situations and quick response when an incident occurs are critical issues to lessen the impacts of the emergency. If possible, employing staff with experience of effective management of emergencies will instill confidence in all staff and greatly assist in coping with incidents. Conducting exercises prior to the event also will also assist staff in understanding the risks and preparing for response actions.   Refer Chapter 2.

6. Specialist consultation is required for a more detailed analysis of the many factors involved in some of these areas, as well as for the most suitable training and response options.

7. The following elements are likely to protect staff from adverse mental health impacts and to improve their capacity to detect, respond to and appropriately manage others.

- *Staff Selection*—Staff selected for an event should, where possible, have experience with similar events. Staff previously exposed to similar situations and conditions are more likely to respond appropriately in emergency situations.
- *Training*—Training can provide staff with skills necessary to cope in an emergency situation as well as in their normal functions. This training may include:
  - drills, exercises and simulations to familiarise staff with emergency plans;
  - de-escalation strategies and crisis management; and
  - dealing with personal stress including stress management strategies.
- *Staff Support*—Organisers should promote the development of peer, team, supervisor and other supports among their staff, including the use of buddy systems.
- *Setting Performance Standards*—Organisers should maintain adequate staff numbers, make sure that staff know what is expected of them and have realistic expectations of task performance.
  - *Pre-event Briefings-* When there is the likelihood of having to respond in emergencies, staff will benefit from pre-event briefings. Refer Chapter 1 for specific pre-event briefing for security personnel and Annex P.

8. **Responding in an emergency.** As noted above, clear response guidelines, with identification of expectations are important. Sources of support for staff, including security, back-up and protection in roles will be important. Staff should also be supported by:

- Regular update briefings;
- Identifying priorities for action;
- Ensuring necessary resources to fulfil roles;
- Providing for sustenance, relief and rotation; and,
- Recognition of roles, actions and contribution.

9. If major incidents occur that involve deaths, violence or other profound negative impacts then the following components may be required:

- Psychological First Aid for individuals who are distressed, including linking to systems of workplace and home support.
- Follow-up contact from Employee Assistance Program (EAP) providers or other support systems to:
  - assess the need for ongoing psychological support;
  - provide assistance with formal procedures, eg support for coronial inquests or inquiries; and
  - assess risk status for subsequent follow up and potential counselling (higher risk is likely to be associated with gruesome or mutilating deaths, threat to life, fatalities, injuries, or ongoing threat).

- Follow-up, if necessary, in weeks following the incident. This may include families. Positive expectations and support should be utilised throughout any follow up period with the aim of a rapid return to work or to related roles wherever possible.

PERFORMERS AND PARTICIPANTS

10. Performers and participants require special consideration as their vulnerability may be increased by features of the mass gathering. Their security, their performance or both may be adversely affected by situations such as uncontrolled crowd behaviour.

12. There are many psychological issues and strategies involved in performers and participants being able to overcome performance anxiety, avoid 'choking' under pressure, and in improving their results. These are outside the scope of this Manual, however directors, coaches, managers and sports psychologists may prove a valuable resource in addressing the psychological needs of performers and participants.

13. Any major incident involving deaths, violence and threats to personal safety may impact on performers and participants so that they also require psychological support including psychological first aid, follow-up support and possibly counselling.

SPECTATORS

14. The psychological impact for spectators as well as participants and staff will depend on the nature of the incident which occurs, as well as background psychological issues. Thus if an incident involves injury, violence or death, fear, and subsequent guilt, regret, or legal processes, such issues may all complicate outcomes for those who have been involved. Shared experience of an external threat or a group going through an incident together may unite people affected so that they provide mutual support.

15. Psychological issues that are relevant considerations in relation to spectators include:

- The effects on individuals of event hazards, crowding, moshing and physical stressors.
- Crowd behaviour, before, during and after an event. This includes the prediction, prevention and management of potentially hazardous behaviours.
- The psychological environment, expectations of conflict, delays, confusion, or vulnerability, for example, at memorial services.
- Crowd and individual behaviour in emergency situations, for example, a fire. Considerations include best methods of giving directions, predicting and responding to hazardous behaviours eg. re-entry or disorderly evacuation.

- The nature of the incident including whether there are deaths, injuries, threats to personal safety, exposure to violence and personal loss.
- The longer term effects of an emergency on the spectators - group and individual approaches to assisting the psychological recovery.(Not sure what is meant by previous sentence?) This includes means of identifying, contacting and providing services for those affected.

ADVICE

16. For further advice on possible psychological aspects associated with conducting mass gathering events, event organisers should approach local public health professionals for guidance.

POST-EVENT

CHAPTER 9

POST EVENT CONSIDERATIONS

SITE RESTORATION

Refer P.56 for public health perspective???

RECOVERY

Psychological Recovery Aspects

1. The need for psychological recovery considerations will depend on whether there has been a major incident during the event and the capacity to identify and register those who may have been exposed to stressors. Emergency management plans should identify the local agency responsible for emergency recovery services coordination and provide their contact details for both business hours and after-hours.

2. The purpose of any psychological service intervention in affected communities is to enable affected people to maintain and retrieve their biological, psychological and social selves and to emerge with existentially meaningful lives. Types of interventions could range from psychological first aid and support, to long term clinical treatment of affected persons, as well as secondary consultation to services dealing with affected persons.

3. If there have been deaths, large numbers of severe injuries or other major incident impacts at the event, then local services will need to respond and provide psychological first aid for those acutely distressed or otherwise impacted by the incident. Subsequently, specialised mental health counselling services may be needed to deal with trauma and grief in the ensuing weeks if the incident has been highly traumatic or resulted in deaths. Any follow-up would be difficult if people and processes for contacting them have not been identified. In such instances it may be possible to initiate generic follow up through representative groups, eg. through sporting associations for a sports related event.

4. Positive expectations should also be conveyed for staff outcomes after any incident involving them. At the same time there should be clear protocols for follow up services if an incident occurs with impacts such as deaths, major

emergencies, violence, threat to life, inability to protect or save others, or other profound negative outcomes.

5.   The event organisers and venue managers should assist in the identification of those affected by any emergency, in the provision of necessary services, and in any subsequent activities related to the emergency that occurred.

6.   Key elements of support for recovery include the following:

- Positive expectations for recovery and the support to achieve this outcome

- Psychological first aid

- A means of identifying and registering those affected including staff, performers, responders, audience, passers-by, and communications and administration personnel.

- Follow-up contact to assess risk, needs and to provide ongoing psychological support. It is also important to assess the need for formal counselling. This should include support to access practical assistance if required or for formal procedures. It should identify those at high risk or with high levels of need and link them to formal counselling expertise at the appropriate time.

- Services appropriate to the needs of those affected, accessible both physically and by culture and language. Such support must be appropriate to the age, gender, religion and other aspects of those affected.

7.   Outreach follow-up may be provided through and alongside information nights, support groups, help-lines, schools, clubs, workplaces or other institutions. Assistance should also be available for Coroner's inquests, incident anniversaries, inquiries, and memorial services and other events that may be distressing for those affected by any emergency at the event.

8.   Support for social ceremonies, such as anniversaries and memorial dedications, as well as active contribution to strategies for preventing similar future incidents may be further important components of recovery. Constructive reviews and reports can be both helpful to future response and assist the psychological meaning to those who have been involved and affected.

DEBRIEFING

9.   A debrief is a meeting held to determine the effectiveness of an event and emergency management plan. A debrief is the forum to discuss what occurred during the event in order to identify both good practices and areas for improvement. A debrief should always be conducted at the conclusion of an event.

In some circumstances they may also be conducted as a series of debriefs, such as for long term, large-scale events. This would be done as part of the event management committee's self-monitoring process.

It is vital to understand that debriefing is an objective management assessment strategy designed to improve future performance. It should never be allowed to become a 'blaming exercise' or to degenerate into personal attack or criticism. The convenor of the debrief must ensure it stays focussed and that the 'rules' of debriefing are followed.

10.   Debriefs can be carried out in the following ways:
  ➢ hot debrief - usually carried out immediately at the end of a shift or phase of an event and/or incident. This involves those present during the shift or phase of event or response.

  ➢ agency debrief - each agency involved in the event or incident should conduct their own debrief at the conclusion of their involvement.

  ➢ cold debrief - held after an event has concluded, and when enough time has elapsed for records and findings to be analysed and collated. This involves all relevant staff from the event and agencies. The debrief brings together the findings of the hot debrief/s, the agency debriefs and any other reviews or reporting on the event.

11. Care should be taken to 'set the stage' for the debriefing. Good preparation will produce better debrief results.

Items for a debrief.

12.   The main issues to be covered in an event debrief include evaluating:
  ➢ the adequacy and appropriateness of planning - responsibilities, suitability of documentation, training

  ➢ the coordination arrangements - involvement of relevant agencies, assigning of tasks to organisations, decision-making and priority setting, forward planning

  ➢ internal operations and processes - adequacy of facilities, location, size, accessibility

  ➢ information management - information systems, records, dissemination of decisions and information

  ➢ media and public information - success in distributing key messages, public and media satisfaction with information

➢ resource management - activation and mobilisation, safety, return of and accounting for resources.

Actions from a debrief.

13. Care should be taken to ensure that debrief findings are acted upon. Reports should be distributed widely, with actions and responsibilities for actions clearly identified. If debrief recommendations are not treated seriously or followed up properly then knowledge of good practices will not be disseminated and mistakes could be repeated in future events.

It is vital that the debrief produce recommendations and assign responsibility for action to an individual or agency. The worst possible outcome from a debrief is that the mistakes made recur in a future event due to inaction on recommendations.

14. The actions resulting from a debrief may include:
   ➢ amending or revising plans

   ➢ changing event emergency management structure and procedures

   ➢ training needs for future events

   ➢ changing equipment or buying new equipment

   ➢ changing policy

   ➢ analysing problems.

15. There is sometimes a reluctance to hold a debrief. Reasons for this include:
   ➢ pressure of other work - people are sometimes too busy or too pre-occupied to conduct a debrief once the event is over

   ➢ concern about criticism - not holding a debrief is sometimes seen as a way of avoiding criticism

   ➢ administrative delays - the arrangements for holding a debrief can sometimes just get 'lost in the system', or simply get delayed for so long that the debrief is seen as irrelevant

   ➢ a general feeling that 'we all know what to do' - this is a dangerous perception and should be resisted wherever possible. It can prevent a debrief being held at all, or can destroy the effectiveness of a debrief should it be held.

16. A debrief is an essential part of every event and emergency incident. However, their effectiveness is often limited by a lack of care in preparation, conduct and follow-up. Despite this, the work involved in planning and organising an effective debrief will be rewarded many times over when the effectiveness of existing arrangements are confirmed, or when improved systems and practices are identified and implemented.

ANNEX G

CRITICAL CROWD DENSITIES

The objective should be to prevent the build-up of large accumulations of patrons particularly within short time periods in confined spaces especially if they are frustrated by the inability to see what is happening.

A study by Fruin (1981) identified critical crowd densities as a common characteristic of crowd disasters. Critical crowd densities are approached when the floor space per standing person is reduced to about 0.5 sq.m.

Considering the various movements or positions spectators will occupy, approximate minimal mobility requirements have been empirically identified by Fruin (1981) as follows:

- Pedestrians moving in a stream require average areas of 2.3 sq.m per person to attain normal walking speed, and to pass and avoid others.
- At 0.93 sq.m per person, walking becomes significantly restricted, and speeds noticeably reduced.
- At 0.46 sq.m per person, the maximum capacity of a corridor or walkway is attained with movement at a shuffling gait and movement possible only as a group. This would be characteristic of a group exiting a stadium or theatre.
- At less than 0.46 sq.m per person average, individual pedestrian mobility becomes increasingly restricted.
- At approximately 0.28 sq.m per person, involuntary contact and brushing against others occurs. This is a behavioural threshold generally avoided by the public, except in crowded elevators and buses.
- Below 0.19 sq.m per person, potentially dangerous crowd forces and psychological pressures begin to develop.

Fruin (1981) contended that "The combined pressure of massed pedestrians and shock-wave effects that run through crowds at critical density levels produce forces which are impossible for individuals, even small groups of individuals, to resist".

It can be seen from the above that it may be necessary for the provision of a monitoring system such as closed circuit television monitoring of crowd movements that will provide the services with warning that some action is necessary to prevent a major incident.

ANNEX H

CROWD THROUGHPUT CAPACITIES

In his writings on crowd disasters, Fruin (1981) identifies several areas regarding spectator throughput in entry to a performance. For planning purposes, he suggests:

1.Ticket Collectors

- Ticket-collectors faced with a constant line can throughput a maximum of one patron per second per portal in a simple pass-through situation.
- Two seconds per patron if the ticket must be torn and stub handed to patron; and
- More complicated ticketing procedures (and/or answering the occasional question) will protract time per patron.

2. Doorways
Free-swinging door, open portal, or gate can accommodate up to one person per second with a constant queue.

Revolving doors and turnstiles would be half this rate of throughput, or less.

3. Corridors, Walkways, Ramps

Have a maximum pedestrian traffic capacity of approximately 25 persons per minute per 0.3 metre of clear width, in dense crowds.

4. Stairs

Have a maximum practical traffic capacity of approximately 16 persons per minute in the upward direction. Narrow stairs (less than 1.53m) will lower the maximum flow.

5. Escalators and Moving Walkways

A standard 1.2m wide escalator or moving walkway, operating at 36 metres per minute can carry 100 persons per minute under a constant queue.

ANNEX I

PLANNING CHECKLIST FOR SAFE AND HEALTHY MASS GATHERINGS

Management of the safety and health aspects of mass gathering events involves the integration of a variety of responsibilities and activities performed by various statutory and private organisations.

The following list has been prepared as a guide to the vast number of elements which need to be addressed in the preparation for an event and for which in the most part require documentation based on local rules, regulations and approvals.

PLANNING CHECKLIST

1. Preface
    1.1. Who is the Plan For?
            1.1.1. Executive Summary
            1.1.2. Historical Perspective
            1.1.3. Possible Users
            1.1.4. Sources of Assistance (Network List)
    1.2. What is it About?
            1.2.1. Set the Context.
    1.3. How to Use It?
            1.3.1. Educational Section
            1.3.2. Operational Section

2. Concept of the Event
    2.1. Aim
            2.1.1. Why? (viability and marketability)
            2.1.2. How?
    2.2. Scope
            2.2.1. What Type?
            2.2.2. When?
            2.2.3. Where?
    2.3. Parameters
            2.3.1. Duration
            2.3.2. Crowd Size
            2.3.3. Crowd Type
            2.3.4. Day/Night
            2.3.5. Alcohol/Drugs
            2.3.6. Pyrotechnics
            2.3.7. Sound Amplification
            2.3.8. Traffic/Road Closures
            2.3.9. Boundaries of Site (if any)
            2.3.10. Others
    2.4. Promoter/Organisation's curricular vitae
    2.5. Financial
            2.5.1. Ticketing
            2.5.2. Budget Guidelines/Classification

3.6. Permits
3.7. Relevant Legislation
3.8. Acceptance
    3.8.1. Formal Document
    3.8.2. Attached or Part of Risk Assessment
3.9. Working Committees
    3.9.1. Police/Fire/Ambulance/First Aid
    3.9.2. Community/Council Local Traders
    3.9.3. Consumer Representative
    3.9.4. Event Management
    3.9.5. Crowd Management
3.10. Modifications
3.11. Consultative Structure
3.12. Outcomes - Plans
3.13. Acceptance in Principle
    3.13.1. Subject to Satisfying Permits
    3.13.2. Documents to be Prepared for Sign Off

4. Detailed Planning
4.1. Planning Team
    4.1.1. Identify Stakeholders
    4.1.2. Identify Legislation and Permits Required
    4.1.3. Building Codes & Health Regulations
    4.1.4. Opposition to Venue
    4.1.5. Public Services/Utilities Coordinator
4.2. Venue Suitability
    4.2.1. Essential Services
        4.2.1.1. Fire Fighting Equipment
        4.2.1.2. Smoke Hazard Management
        4.2.1.3. Lift Installations
        4.2.1.4. Emergency Lighting, Exit Signs & Warning Systems
        4.2.1.5. Provision for Escape
        4.2.1.6. Construction of Exits
        4.2.1.7. Access for People with Disabilities
        4.2.1.8. Fire Resistance and Stability
        4.2.1.9. Fire Protection of Theatres, Stages and Public Halls
    4.2.2. Maintenance of Essential Services
    4.2.3. Objections
    4.2.4. Alternatives
    4.2.5. Staffing
    4.2.6. Noise
    4.2.7. Crowd Size & Type
    4.2.8. Facilities Required
    4.2.9. Access/Egress
    4.2.10. Seating Design
    4.2.11. Fencing & Barricades
    4.2.12. Site Plan
        4.2.12.1. Common Zonation for All Agencies
        4.2.12.2. Grid Overlay
4.3. Administration
    4.3.1. Budget
    4.3.2. Finance

4.3.3. Contracts
4.3.4. Insurance/Liability
4.3.5. Time Line
4.3.6. Roles & Responsibilities
4.3.7. Contingency Planning
4.3.8. Cash Management
4.3.9. Asset Management
4.4. Publicity
 4.4.1. Media
  4.4.1.1. Direct or Delayed
  4.4.1.2. Build and Dismantle
  4.4.1.3. Liaison
  4.4.1.4. Accreditation
  4.4.1.5. Advertising & Promotion
  4.4.1.6. Public Relations
  4.4.1.7. Community Consultation
  4.4.1.8. Complaints Procedures
  4.4.1.9. Promotional Samples
Media management in the event of an incident
4.5. Ticketing
 4.5.1. Will it be a Ticketed Event?
 4.5.2. Will it be Reserved Seats or General Admission?
 4.5.3. Conditions of Entry
 4.5.4. Integrated Ticketing
 4.5.5. Price Structure
 4.5.6. VIPs
 4.5.7. Pass-Outs
 4.5.8. Accreditation
4.6. Operational
 4.6.1. Transport
  4.6.1.1. What Type will be Used? Public or Private.
  4.6.1.2. Parking
  4.6.1.3. Disabled/VIP/Staff/Contractor
  4.6.1.4. Emergency
  4.6.1.5. Service Vehicles
  4.6.1.6. Road Closures
  4.6.1.7. Traffic Management
  4.6.1.8. How to Get To & From
 4.6.2. Security
  4.6.2.1. Type of Security
  4.6.2.2. Electronic surveillance
  4.6.2.3. Perimeter
  4.6.2.4. Searches
  4.6.2.5. Apprehension
  (is there a pt 4.6.2.6.?)
  4.6.2.7. Intelligence
  4.6.2.8. Lock Up & Patrol
  4.6.2.9. Asset Register
   4.6.2.9.1. Pre & Post-Event Stock Take
 4.6.3. Staffing
  4.6.3.1. Paid/Volunteer, Career or Casual
  4.6.3.2. Training

4.6.10.2. Social/Cultural
4.6.10.3. Trends
4.6.10.4. Searches/Property
4.6.10.5. Pedestrian Flow

4.6.10.7. Devices
4.6.10.8. Apprehension
4.6.10.9. Access & Assembly
Dispersal
    4.6.11. Food & Beverage
        4.6.11.1. Management of Alcohol
        4.6.11.2. Staff & Training
        4.6.11.3. Legislation
    4.6.12. Merchandising
    4.6.13. Exercising
    4.6.14. Pre event site inspection

5. Event
  5.1. Preamble: Prior to the commencement of the event, there will be a variable time period of preparation and construction of the site facilities.
  5.2. Review
    5.2.1. Daily (AM/PM) Briefing
    5.2.2. Inter/Intra Agency
    5.2.3. Review Running Sheet
    5.2.4. Response
    5.2.5. Site Inspection
        5.2.5.1. Damage
        5.2.5.2. Cleanliness
        5.2.5.3. Barriers
        5.2.5.4. Report Back
        5.2.5.5. Integrity
        5.2.5.6. Complete Check List
        5.2.5.7. Emergency Services/Police/Fire/Ambulance
        5.2.5.8. First Aid/Medical Facilities
        5.2.5.9. Security Issues
        5.2.5.10. Utilities
        5.2.5.11. Event
            5.2.5.11.1. Lighting
            5.2.5.11.2. Generators
            5.2.5.11.3. Light Temporary Structures
        5.2.5.12. Signs
        5.2.5.13. Ticket Facilities
        5.2.5.14. Staff Amenities
        5.2.5.15. Other
        5.2.5.16. Test Equipment
        5.2.5.17. First Aid/Medical
            5.2.5.17.1. Personnel
            5.2.5.17.2. Vehicles
            5.2.5.17.3. Mobile/Fixed Services
    5.2.6. Event Coordination Centre
        5.2.6.1. Staff from each Agency Involved
        5.2.6.2. Resources to Function

     5.2.6.3. Communications
       5.2.6.3.1. Issue of Equipment
       5.2.6.3.2. Systems
     5.2.6.4. Problem Resolution & Communication (between agencies)
     5.2.6.5. Event Log
     5.2.6.6. Emergency Access/Egress Routes
     5.2.6.7. Monitor Need for Activation of Contingency Plans
     5.2.6.8. Staff Issues
       5.2.6.8.1. Rostering/Relief/Sign On
       5.2.6.8.2. Unions
       5.2.6.8.3. Absentees
       5.2.6.8.4. Employment Agreements
       5.2.6.8.5. Issue & Maintenance of Uniform & Equipment
       5.2.6.8.6. Duty Statements
       5.2.6.8.7. Reporting Mechanisms
       5.2.6.8.8. Amenities
       5.2.6.8.9. Credentials
       (number?) Insurance and indemnities

6. Execute Plan
 6.1. Entertainment
   6.1.1. Schedules
   6.1.2. Back Stage
     6.1.2.1. Artist Management
     6.1.2.2. Performer Rest Area
       6.1.2.2.1. Secure Areas
       6.1.2.2.2. Support Staff
 6.2. Merchandising
   6.2.1. Stock Take
   6.2.2. Vendors
 6.3. Media
   6.3.1. Facilities
   6.3.2. Liaison
   6.3.3. Press Releases
 6.4. Cash Management Plan
 6.5. Sponsor Management
   6.5.1. Courtesy Facility
   6.5.2. Public Relations
   6.5.3. Signage
   6.5.4. Promotions
 6.6. Maintenance
   6.6.1. Clean Up Site
   6.6.2. Roving Repair Crews
 6.7. Secure Compound
   6.7.1. Contraband
 6.8. Hazardous Material Management
 6.9. On-Site Transport
   6.9.1. Motorcycles
   6.9.2. Bicycles
   6.9.3. Golf Buggies
   6.9.4. Cars/etc
 6.10.Off-Site Transport Coordination
   6.10.1. VIPs

ANNEX J

ORGANISER CHECKLIST PROFORMA

EVENT DETAILS

Name of event: _____

Day(s) of event   From: /_____/_____   to: _____/_____/

Event time: Start:_____   Finish: _____

Site: _____

Site address: _____

Promoter: _____

Event manager: _____

Address: _____

_____

Contact: Phone: _____   Fax: _____

A/Hours: _____

Site preparation start date: _____/_____/_____ Site vacated date: __/_____/_____

Brief details of function (including entertainment and main attractions):

_____

_____

_____

_____

_____

Sponsorship details (including any restrictions) _____

_____

_____

WHAT LEGISLATIVE, REGULATIVE AND LEGAL ISSUES NEED TO BE ADDRESSED?

State legislative/regulative requirements: _____

_____

_____

Local legislative/regulative requirements: _____

_____

_____

Permits required: (for example, liquor, pyrotechnics, fire, laser, food, etc) _

_____

_____

_____

Engineering approvals: _____

_____

Insurance required: _____

_____

_____

_____

_____

(NOTE: It is recommended that $5 million is the minimum acceptable public liability cover).

SITE DETAILS

Note: Include detail such as - indoor/outdoor, normal use, permanent structure, temporary site, multiple sites, site boundaries, temporary structures, natural features, likely hazards [including weather], historic sites, environmental issues, parking arrangements, access and egress, and facilities, for example, water, toilets, food preparation, waste removal

_____

_____

_____

_____

_____

_____

_____

_____

Estimated total attendance: _____

Estimated age composition of audience:

0 - 12 years: _____ % of total audience

12 - 18 years: _____ % of total audience

18 - 25 years: _____ % of total audience

25 - 40 years: _____ % of total audience

40 - 55 years: _____ % of total audience

55 years and above _____ % of total audience

Admission will be by: pre-sold ticket   free   other: (Please specify)

_____

Has this event been conducted previously?   YES / NO

If yes, when ? _____

Where ? _____

Event Manager:

Contact phone: Fax: _____

Is the proposed event to be the same?   YES / NO

If no, please detail the changes. _____

_____

What effects will the changes have? _____

_____

Will alcohol be served/consumed?   YES / NO

KEY STAKEHOLDERS

	NAME	PHONE
State Government Dept(s):	_____	_____
Local Government(s):	_____	_____
	_____	_____
	_____	_____
Neighbouring Councils:	_____	_____
	_____	_____
Police:	_____	_____
Ambulance Service:	_____	_____
First Aid Service:	_____	_____
Fire Service:	_____	_____
Hospital/Medical Services:	_____	_____
State Emergency Service:	_____	_____
Security Personnel:	_____	_____
Liquor Licensing:	_____	_____
Local Hotel and Businesses:	_____	_____
	_____	_____
Accommodation:		
Catering:		
Transport Authority:	_____	_____
Neighbours:	_____	_____
	_____	_____
Other:	_____	_____
Other:	_____	_____

Time frame necessary for contact with stakeholders

_____

A full briefing of all the above stakeholders is planned for _____ (date)

at _____ (venue)

EVENT COMMUNICATIONS

During the event what form of communication systems will be available/provided/ required for

Event management: _____

Public address (internal): _____

Public address (external):
Police and emergency
services: _____

Coordination requirements: _____

EVENT PROMOTION AND MEDIA MANAGEMENT

Can the promotion ticketing and publicity for the event include messages that clarify the focus of the event (for example, family fun, sporting contest, musical entertainment)?

The focus of the event is _____

The event promotion and publicity will promote:

Safe drinking practices	YES / NO
Don't drink and drive	YES / NO
Intoxicated and underage persons will not be served alcohol	YES / NO
Bags and eskies may be searched or restricted	YES / NO
Glass containers are not permitted	YES / NO
Water will be freely available	YES / NO
Availability of 'wet' and 'dry' areas	YES / NO
Location of facilities included on ticketing	YES / NO
Health care advice included on ticketing	YES / NO
Smoke free environment	YES / NO

SECURITY

Which type of security will be appropriate for the event?_____

Who will be the appropriate security firm to be contracted?_____

Event security would commence on __/__/__ and conclude on _____/___/___

What will be the role of security?_____

What counter terrorism or civil disturbance considerations are necessary?

Has a terrorism threat assessment been undertaken? (Consult with Police)YES/NO
Have Police been contacted in relation to security?   YES / NO

If yes, what will be required of the Police _____

_____

When would a briefing/debriefing be held involving Police, Security, Bar Staff and Licensing personnel?

_____(Date before Event) _____(Date after Event)

Will a briefing of all staff and officials be provided regarding helping patrons with amenities and services?   YES / NO

SIGNAGE

What signage including those required under the provisions of the Liquor Act, will need to be developed and obtained?

_____

_____

_____

_____

Will there be signage in languages other than English?   YES / NO

TRANSPORT

Does a transport strategy need to be developed?   YES / NO

List the departments, councils and/or agencies that are likely to be involved in developing this strategy.

Name: _____   Organisation: _____

Name: _____   Organisation: _____

Name: _____   Organisation: _____

Name: _____   Organisation: _____

ACCESS AND EGRESS FOR PATRONS

What provisions can be made for patrons to access, move around and leave the event venue without excessive queuing, or crushes (for example, gate control, pathways, free space)

_____

_____

_____

_____

_____

Will patrons be able to access toilets, food and bar areas, and entertainment sites without difficulty?   YES / NO

In an emergency, will patrons be able to leave the venue or move to other areas within the venue in reasonable safety?   YES / NO

Comment: _____

_____

_____

_____

_____

ACCESS FOR PERSONS WITH DISABILITY

What provisions need to be made for persons with a disability to access and move around the event venue?

_____

_____

Will persons with a disability be able to access toilets, food and bar areas, and entertainment sites without difficulty?   YES / NO

In an emergency, will persons with a disability be able to leave the venue without significantly impeding the movement of other patrons?   YES / NO
Comment: _____

_____

_____

_____

_____

_____

_____

_____

NOISE

What provisions can be made to minimise the level of noise at and around the event?

a) _____

b) _____

c) _____

d) _____

e) _____

AIR QUALITY

What provisions need to be or can be made to ensure acceptable air quality for the event site?

a) _____

b) _____

c) _____

d) _____

e) _____

MANAGEMENT OF ALCOHOL

Are there any standard conditions of the Licensing permit?   YES / NO

If YES, what are they?

_____

How will event personnel, specifically bar and security staff, be trained and informed of the Responsible Service of Alcohol legislation and made aware of the responsibilities and penalties?

_____

_____

What types of alcohol (ie. light/mid/heavy beer, wine and spirits) and other drinks will be available at the event?

_____

_____

In what type of containers will alcohol and other drinks be available? For example, glass, can or plastic containers?

_____

_____

What provisions will be made for the collection of drink containers during and after the event?

_____

_____

What will be the pricing structure for heavy alcohol, low alcohol and non-alcoholic drinks?

_____

_____

Is it anticipated that the pricing structure will discourage patrons from becoming unduly intoxicated?   YES / NO

Can the event publicity, ticketing and signage for the event inform patrons of the restrictions on alcohol including that alcohol will not be served to minors and intoxicated people?   YES / NO

Can some, if not all, bars be shut prior to the end of the entertainment?
                                                                          YES / NO

If the event **is BYO**, what provisions can be made to prevent glass related injuries, underage drinking and excessive intoxication?

_____

_____

If the event **is not BYO**, what provisions can be made to prevent alcohol from being brought into the venue?

_____

_____

If there are to be designated drinking areas will they be adequate in size and number and supported by toilet facilities to cope with the expected size of the crowd?   YES / NO

Will there be dry areas for families, entertainment and food?   YES / NO

Will the event provide the following facilities to encourage responsible drinking by patrons?

    Free drinking water   YES / NO

    Cheap non-alcoholic drinks   YES / NO

    Range of quality food   YES / NO

    Shade or cover   YES / NO

    Safe drinking information   YES / NO

    Quality entertainment   YES / NO

    'Wet' and 'Dry' areas   YES / NO

OTHER DRUG USE

Is it possible that drugs including marijuana and amphetamines may be available and used at this event?   YES / NO

List any drugs and related information known from previous experience:

_____

_____

What provisions can be made to address this drug use?

_____

_____

MEDICAL

What level of medical service is considered necessary and for what duration?

Who can provide this service? _____

What will be the cost of the service?_____

If it is not a local provider, what arrangements have been made to liaise with the local Ambulance Service?

What facilities will the medical service require (including helipad)?_____

How can these be provided?_____

ANIMALS

If the event involves animals, what arrangements will be necessary for their management, care and well being?

If the event may affect animals, what arrangements will be necessary for their management, care and well being?

BRIEFING/DEBRIEFING

A final briefing of stakeholders is planned for _____weeks prior to the event.

A debriefing will be conducted with all stakeholders within_____days of the event.

ANNEX K

AUTHORISING BODY CHECKLIST

EVENT DETAILS

Name of event: _____

Requested date(s) of event: _____/_____/_____   _____/_____/_____

Requested event time: Start: _____ Finish: _____

Requested site: _____

Site address: _____

Promoter: _____

Event manager: _____

Address: _____

_____

Contact: Phone:_____Fax: _____

A/Hours:_____

Requested site preparation start date _____/_____/_____

Suggested site vacated date _____/_____/_____

Brief details of function (including entertainment and main attractions):

_____

_____

_____

_____

_____

_____

_____

_____

_____

LEGAL REQUIREMENTS

Does the application:

Comply with State and Local legislation/regulations?	YES / NO
Provide for adequate general public liability insurance?	YES / NO
Provide for adequate liability insurance for a major incident?	YES / NO
Need to post a bond to cover contingencies?	YES / NO

LICENCES/PERMITS

Does the application require:

Liquor licensing?	YES / NO
Road closures/restrictions?	YES / NO
Food outlet licences?	YES / NO
Fire permits?	YES / NO
Any other _____	

_____

SITE

Is it appropriate for the type of event?	YES / NO
Are there multiple sites involved in the event?	YES / NO

Comment _____

_____

_____

Indoor/outdoor _____

Permanent structure or temporary site _____

Normally used for this type of event?	YES / NO
Normally used for large crowds?	YES / NO

Topography _____

_____

_____

_____

_____

_____

_____

Any affect on neighbouring councils?   YES / NO

Suitability for camping facilities?   YES / NO

List any environmental issues (green, flora, fauna, historic site) _____

_____

_____

List any natural features likely to be hazardous (river, dam, long grass, forest)

_____

_____

Anticipated crowd number _____

Is site large enough for expected crowd?   YES / NO

Tickets being pre-sold?   YES / NO   _____% OF ATTENDANCE

Tickets sold at the gate?   YES / NO   _____% OF ATTENDANCE

Other means of limiting crowd _____

_____

_____

Type of crowd expected (Young, Old, Family, Unruly, etc) _____

_____

Is water available at site?   YES / NO

Quality of water _____

Quantity of water_____

Probability of sabotage of water   YES / NO

Comment:_____

_____

Fixed sewerage?   YES / NO

Adequate sewerage capacity?   YES / NO

Comment _____

Accessibility for people with disabilities /impaired vision   YES/NO

Comment _____

_____

Other utility supplies (power, gas and mobile phones) _____

_____

_____

Will they be adequate?_____

Will emergency water supplies be required?   YES / NO

Will emergency water supplies be supplied?   YES / NO

Will emergency water supplies be available?   YES / NO

Comment_____

_____

_____

_____

Will emergency electricity supplies be required?   YES / NO

Will emergency electricity supplies be supplied?   YES / NO

Will emergency electricity supplies be available?   YES / NO

Comment _____

_____

_____

_____

Will emergency gas supplies be required?   YES / NO

Will emergency gas supplies be supplied?   YES / NO

Will emergency gas supplies be available?   YES / NO

Comment _____

_____

_____

POLICE AND EMERGENCY SERVICES/KEY STAKEHOLDERS

Has applicant consulted and gained support/approval from:

    State/Local Government Departments   YES / NO

    If yes, list by abbreviation

    Police   YES / NO

    Ambulance   YES / NO

    First Aid Service   YES / NO

    Fire   YES / NO

    Medical/Hospital   YES / NO

    State Emergency Service   YES / NO

    Transport Authorities   YES / NO

    Liquor Licensing Court   YES / NO

    Neighbouring Councils   YES / NO

    Neighbours/Community Association   YES / NO

Other _____

Other _____

_____

Have emergency management plans been prepared?   YES / NO

Have contingency plans been prepared?   YES / NO

If no, are they necessary?   YES / NO

If they are necessary, who will co-ordinate the preparation?_____

SECURITY

Has a terrorism and civil disturbance threat assessment been undertaken?
YES/NO
Is special security being provided?   YES / NO

If YES who is providing it?_____

_____

If NO is it considered necessary?   YES / NO

Is the provider licensed to provide the service?   YES / NO

EVENT SAFETY ISSUES

Natural

Weather (rain, wind, heat, cold)   _____

_____

Terrain (cliffs, creeks, reclaimed land)   _____

_____

Environmental

Animals, forests, pollens, pests, flora, fauna, historical _____

_____

_____

Technological

Power lines, noise, lighting, access and egress _____

_____

_____

Human

Alcohol, hysteria, nuisance, neighbours, fire, lost children and lost property facilities

Event

Pyrotechnics, lasers

ACCESS - EGRESS – PUBLIC TRANSPORT - PARKING

Is road access and egress suitable?	YES / NO
Is road access and egress suitable in all weather?	YES / NO
Is road access and egress adequate?	YES / NO
Are road closures required?	YES/NO
Will special traffic control be required?	YES / NO

Is public transport liaison required?
YES/NO

Are special public transport services required?
YES/NO

Has consideration been given to access/egress for people with physical disabilities and impaired vision?
YES/NO

Is sufficient suitable off road parking available?	YES / NO
Will police and emergency services have continual access and egress?	YES / NO
In the event of a major emergency, does access and egress allow for police and emergency services?	YES / NO

FOOD

Refer to Annexes L and M.

TOILETS

What is the anticipated crowd mix of male and female attendees?

_____MALE   _____FEMALE

What is the fixed toilet facility numbers?   _____MALE WCs

_____URINALS

_____MALE WHB

_____MALE SHOWERS

_____FEMALE WCs

_____FEMALE WHB

_____FEMALE SHOWERS

_____DISABLED

Will toilets be accessible for people with disabilities or vision impairment?
YES/NO

Will separate toilet facilities be available for food vendors?   YES / NO

Will separate toilet facilities be available for medical attendants?   YES / NO

Are there sufficient toilet facilities?   YES / NO

If no, what additional requirements?   _____MALE WCs

_____URINALS

_____MALE WHB

_____MALE SHOWERS

_____FEMALE WCs

_____FEMALE WHB

_____FEMALE SHOWERS

_____DISABLED

Will current sewerage system cope with the extra demand?   YES / NO

If no, what additional requirements will there be?

_____

_____

_____

_____

Where additional requirements are unsewered, can service trucks gain
easy access?   YES / NO

What servicing and cleaning of toilets will be provided during the event? _____

_____

_____

_____

_____

What, if any, plumbing maintenance will be available on-site? _____

_____

_____

GARBAGE WASTE REMOVAL

Number of rubbish bins available   _____ PUBLIC USE

                                          _____ FOOD OUTLET USE

                                          _____ MEDICAL FACILITY USE

Type of rubbish bins (including for sharps, wet, dry, hazardous) _____

_____

_____

_____

Program for emptying rubbish bins _____

_____

_____

_____

Program for removal of site rubbish _____

_____

_____

RESTORATION AFTER EVENT

Arrangements for site clean up _____

_____

_____

Arrangements for clean up of surrounds (including access and egress roads)

_____

_____

_____

Arrangements for refund of bond money if applicable _____

_____

CAMPING AREAS (where applicable)

What is the proximity to property boundaries?

NORTH_____METRES   SOUTH_____METRES

EAST_____METRES   WEST_____METRES

What is the requested population density of the camp?_____PERSONS PER HECTARE

What is the requested maximum site population for each site?
                              MAXIMUM_____PERSONS PER SITE

What separation is planned between sites?
                              MINIMUM_____METRES BETWEEN ROWS

What emergency access and egress will be available? _____

_____

_____

What toilet and ablution facilities will be available within camp site?

_____MALE WCs   _____FEMALE WCs

_____URINALS

_____MALE WHB   _____FEMALE WHB

_____MALE SHOWERS _____FEMALE SHOWERS

_____DISABLED TOILETS_____DISABLED SHOWERS

What water supply is available? _____

Can you estimate whether this is sufficient?   YES / NO

Comments _____

_____

_____

What rubbish bins are available? _____

_____

Can you estimate whether this is sufficient?   YES / NO

What waste disposal arrangements are being made? (including wet, dry, sharps, sewage)

_____

_____

_____

_____

_____

SITE PLAN

Camp site plan available (including access and egress for emergency vehicles, access and egress for service vehicles, parking areas camping areas, numbered camp sites, toilet and ablution facilities, water points, rubbish bins, food venues, First Aid/Medical facilities, any other related facilities)   YES / NO

PRE-EVENT SITE INSPECTION

Has the event organising committee undertaken a pre-event site inspection? YES/NO

SUPPORTING DOCUMENTATION

(Attach any supporting documentation)

Please forward a copy to the local police and emergency services

ANNEX L

CATERING - A CHECKLIST FOR FOOD VENDORS

The establishment of a temporary catering facility can mean working in less than ideal conditions. The following checklist will provide guidance on minimum requirements for this type of event catering.

SETTING UP

Food service operation is licensed or registered in accordance with
 State requirements

YES / NO

The appropriate permit has been obtained from the local government where the event is to be held

YES / NO

The area for which the permit is valid is clear, ie where can I set up?

YES / NO

STAFF TRAINING

Staff are trained in food handling and food safety   YES / NO

Staff have been instructed on machinery operation, food preparation
routines and occupational health and safety matters   YES / NO

There are clear Guidelines for staff about what to do if problems occur,
 ie who to contact and appropriate contact numbers   YES / NO

FOOD HANDLING

Hand washing is carried out thoroughly and regularly by all food handlers, particularly:

    Before commencing work and after every break   YES / NO

    After visiting the toilet   YES / NO

    After handling raw food   YES / NO

    After using a handkerchief or tissue or touching nose, hair or mouth

YES / NO

    After handling rubbish   YES / NO

    After smoking   YES / NO

Correct food temperatures can be, and are, maintained   YES / NO

Food is cooled rapidly under refrigeration in trays not more than 100 mm deep	YES / NO
Tongs are provided and used where possible for food handling	YES / NO
Gloves, if used, are changed regularly	YES / NO
Food is thoroughly cooked	YES / NO
Food is protected from dust, insect pests and other contaminating matter	YES / NO
Staff wear suitable clean clothing and have long hair tied back	YES / NO
Food on display on counters is protected from contamination from the public by use of covers or guards	YES / NO
Condiment area is checked and cleaned regularly	YES / NO

FOOD STORAGE

Sufficient refrigeration space is provided to cope with peak demand	YES / NO
Refrigerated storage temperatures are able to be maintained during peak loads	YES / NO
Raw foods are stored below cooked or ready to eat foods	YES / NO
Food containers are covered	YES / NO
Frozen food is thawed on the bottom shelf in the refrigerator or under cold running water	YES / NO
Dry food storage space is adequate for peak loads	YES / NO
Dry foods are protected from dust and insect pests and rodents at all times	YES / NO
Hot food storage is above 60ºC	YES / NO
Cold food storage is below 5ºC	YES / NO

FOOD TRANSPORT

Transport times are kept to a minimum	YES / NO
Food temperatures are met at all times during transport	YES / NO
All foods are protected from dust, pests, chemicals and other contaminating matter	YES / NO

CLEANING AND SANITISING

Cleaning cloths are replaced frequently   YES / NO

Equipment and surfaces used for the preparation of raw foods are
cleaned and sanitised before further use   YES / NO

Sanitisers are appropriate for use in the food industry and are used in accordance
with the manufacturer's directions   YES / NO

PACKAGING AND LABELING

All prepacked foods are labeled in accordance with Australian and
New Zealand Food Standards Code   YES / NO

WASTE MANAGEMENT

Waste is removed regularly from food preparation areas   YES / NO

Putrescible waste removed from food preparation areas is placed in
bins with tight fitting lids   YES / NO

Capacity to store sullage waste is adequate or connection to the sewer
is maintained without leakage

                                                                                 YES / NO

INFECTIOUS DISEASES

All staff are required to report any gastrointestinal type illness to the
supervisor   YES / NO

A register of staff illness is kept by the supervisor   YES / NO

Staff are not permitted to work whilst they have symptoms of
gastrointestinal illness or in the acute stage of a cold or flu-like illness   YES / NO

SAFETY

The workplace is safe, i.e. no trip hazards, no unprotected hot zones or
unguarded equipment   YES / NO

Fire precautions are followed and fire safety devices are to the
satisfaction of the fire authority   YES / NO

EMERGENCY MANAGEMENT

Food handlers have contact details for all necessary personnel in case
of problems occurring   YES / NO

A list of appropriate contact details is maintained and accessible   YES / NO

For example,

Event organiser	YES / NO
Environmental health officer	YES / NO
Plumber	YES / NO
Electrician	YES / NO
Refrigeration mechanic	YES / NO
Alternative refrigeration suppliers	YES / NO

ANNEX M

FOOD VENDOR INFORMATION SHEET

(To be provided to the local health authority)

Name of Operator:_____

Address: _____

Phone: _____ Fax: _____ Mobile:_____

Trading as:_____

Business address: _____

Main purpose of business: _____

Is a menu attached, indicating the full range of food to be provided?   YES / NO

Indicate which of the following foods you sell directly or will be using as ingredients:

Milk/milk products	YES / NO
Poultry	YES / NO
Salads/rice dishes	YES / NO
Egg products	YES / NO
Fish/fish products	YES / NO
Raw meat	YES / NO
Ice cream	YES / NO
Shellfish	YES / NO
Cooked meat	YES / NO

Type of operation:

Stall	YES / NO
Mobile unit	YES / NO
Stand	YES / NO
Tent/marquee	YES / NO
Other (specify)_____	

Indicate the type of facilities to be provided on site:

    Refrigeration   YES / NO

    Freezer   YES / NO

    Oven   YES / NO

    Deep fryer   YES / NO

    Microwave oven   YES / NO

    Sink   YES / NO

    Wash hand basin   YES / NO

    Other (specify)_____

Indicate power sources:

    LPG   YES / NO

    Electrical generator   YES / NO

    Other (specify)_____

Is the food to be prepared or stored in premises other than the temporary food premises or vehicle?   YES / NO

If yes, please state the address_____

_____

Will food be delivered to the site by a separate supplier   YES / NO

If yes, what arrangements will be made for receipt of those goods? _____

_____

Have you or any staff completed a food handler hygiene course?   YES / NO

If yes, when and where_____

_____

Vendor's Name: _____

Date: _____

Venue: _____

ANNEX N

GASTROINTESTINAL ILLNESS QUESTIONNAIRE

(For use at first aid post during mass gathering events)

Date ___/___/___   Interviewed by_____

Name_____

Address_____

Phone Number _____

Symptoms: What symptoms have you had?

Diarrhoea	YES / NO
Nausea	YES / NO
Vomiting	YES / NO
Abdominal cramps	YES / NO
Headache	YES / NO
Fever	YES / NO
Blood in faeces	YES / NO
Joint or muscle aches	YES / NO

Other_____

When did the symptoms first start?

Date ___/___/___

Time ____ am/pm

Do you know of others who have been ill with similar symptoms?   YES / NO

(Include names and contact details for others for further follow-up on reverse side of form)

What have you eaten since being at this event and where was it purchased or obtained from?

(List the food history reverse side of the form, include all food, drinks, confectionery and any other snacks. It is important to list where the food was obtained from).

Have you been swimming since being at this event?

    Pool   YES / NO

    Spa   YES / NO

    River   YES / NO

    Lake   YES / NO

Other _____

Do you suspect anything which may have caused your illness?   YES / NO
(explain)

NOTE: Keep this form for review or collection by the supervisor or public health official. Report anything suspicious or, if several cases, similar illness within a short period of time.