

Urban and peri-urban biosecurity guidelines

These guidelines were initially developed by Res Eng (Australia) Limited in 2006 as a project commissioned by the Department of Agriculture. These guidelines were designed to encourage the enhancement pest response in urban and peri-urban areas and were included as an Appendix in previous versions of PLANTPLAN.

Revision history

Version	Date issued	Amendment Details	
		Section(s)	Details
1.0	5 Dec 2013	All	Reformatted from Appendix 19 of PLANTPLAN (V1 Nov 2011). SPCHQ/LPCC changed to SCC/LCC, and Internal references to Appendices in PLANTPLAN removed. "Communications" changed to "Public Information"

Urban / Peri-urban Issues to consider within the Control Function throughout the phases of a response

Control in the Investigation and Alert Phase:

- An initial examination of the Control function is required to ensure that workload and skill-set are appropriate for an urban or peri-urban response. Although it may be difficult, it is imperative that the functions within PLANTPLAN are properly assigned. Initially it is likely that an individual will be undertaking each function, and it is important to recognize that escalation will require delegation and transition to formal arrangements during establishment. In this case, the Rapid Response Team (RRT) is a valuable resource and should be considered for any urban or peri-urban response.
- The Investigation Phase for urban and peri-urban response will be initially characterised by potentially large rates of change, rapid escalation, and bulk enquiry from the community and industry.
- This Phase will be influenced by political activities, media, and community. Community interest groups may become a focal point and must be properly considered.
- PLANTPLAN requires that a SCC Director be appointed at the beginning of the Investigation Phase. In appointing the Director for an urban or peri-urban response, the candidate's knowledge of the community and local issues should be considered.
- Depending upon pest, scale, and rate of escalation, the Director may be changed at different times within the response. This concept should be understood at the outset to ensure that change of Controller is not seen as lack of confidence in the leadership team, but rather a strategy to recognize that skill needs change. For example, the individual responsible for establishment of the campaign (Investigation) may be different from the individual responsible for the Operations Phase.
- Strategy for disease investigation must be developed with particular reference to urban and peri-urban access issues, number and types of properties to be visited, information needs, privacy considerations, as well as consideration of issues of impact on land value and discovery of illegal activities during surveillance.

- Movement controls must consider long-term impact on other commercial activities not directly associated with the campaign or the primary industry activity directly associated with the response.
- PLANTPLAN requires stakeholders to be briefed at various stages. During the Alert Phase, the Control function has a specific leadership role. In an urban or peri-urban campaign this includes engagement of property owners as well as occupiers. A specific strategy must be established. This may include using specific cultural based media, real-estate agents, local government, religious conduits, or other appropriate mechanisms.
- During this time, media enquiries may outpace technical knowledge and a "Holding Statement" may be required to ensure that expectations for media information are met.
- It is appropriate that the Controller places SCC staff, and at least 2 LCC controllers, on standby during any Alert Phase within an urban or peri-urban area.
- A range of technical advisories and briefings must occur. For urban and peri-urban response, this must include Local Government Areas (LGA's) and local representatives, as well as the specific identification of local/active community groups and potentially impacted industries and businesses. In this case, businesses may simply represent a vector for the pest, rather than be directly impacted. Examples may include excavation contractors, earth-moving equipment transport, nursery, and allied industry in the case of a soil resident pest.
- The Control function must establish and then liaise with the Planning Manager, Logistics Manager, Communications Manager and Industry Liaison Manager to assess personnel and resources required should the response be elevated to the Operational Phase. This should then be handed to the Logistics Manager.

Control in the Operational Phase:

- In the case that planning has been comprehensive and anticipated most risks, the Controller's role in the Operational Phase is one of oversight and approval. Initially this requires the direction to enter the Operational Phase of PLANTPLAN.
- In terms of oversight, a process must be established to provide ongoing consultative and reporting arrangements between SCC and the LCC(s). In the case of urban and peri-urban response, it is likely that multiple LCC(s) will be established, increasing this management activity.
- As urban and peri-urban areas are likely to involve a large number of locally elected representatives, it is imperative that the control function provides advice to the relevant stakeholders, including mayors, ministers, departmental and industry executives.
- The Control function must also initiate emergency response by liaising with other states/territories as necessary, including the provision of briefings associated with the Operational Phase.
- Leadership must be maintained by way of active encouragement of communications strategies including media releases, technical information, press conferences, and potentially novel approaches to encourage the interest of urban and peri-urban dwellers. In some cases joint media releases may need to be issued or "local identities" employed.

Control in the Stand-Down Phase:

- Significant complications may arise with respect to the Stand-Down Phase. In particular, decommissioning of significant resources and definitional issues associated with eradication requires strict control.

- It may be useful to acknowledge the possibility of re-infestation and non-detection to prepare urban or peri-urban communities of future incursions or limit any misunderstandings in relation to the declaration of "area freedom".
- Prior experience with urban and peri-urban programmes has highlighted the potential for vandalism and tampering of traps and or surveillance equipment. Asset protection strategies may need to be considered.
- Useful tools include debriefing of all participants as well as appropriate transfer or integration of on-going activities to responsible agencies. This is particularly the case in relation to on-going health monitoring requirements in the case that such monitoring was a requirement of the application of chemical controls.
- In relation to the increased potential for litigation, it is also imperative that all records relating to the EPP response are held securely so they are available for future retrieval in accordance with the relevant archival regulations and any statutes of limitations.

Urban / Peri-urban Issues to consider within the Planning Function throughout the phases of a response

Planning in the Investigation and Alert Phase:

- Taking into consideration the potential for extended durations and large resource numbers in an urban and peri-urban response, locations and timing of planning meetings must be properly addressed.
- Situation and resource briefings will be complicated by the possibility of a range of latent planning risks. In particular, these relate to increased movement control activities, interference with normal day-to-day business practices of remotely or non-affected individuals or enterprises, as well as increased opportunities for conflict at many levels.
- It may be difficult to properly establish resource estimates, particularly during the initial period of the Investigation Phase. For urban and peri-urban response it is appropriate to seek information of resource availability from appropriate agencies at the earliest time.
- Definition of the operational period will bring a range of complications associated with resource acquisition and deployment. Issues such as travel times, seasonal considerations, infrastructure interdependencies may need to be considered when establishing operational periods. In extended responses, the Planning function must consider the back-filling of positions and the strain placed on those agencies from where resources have been obtained.
- Collection and submission of samples must consider potential volume of volunteered samples or samples not directly collected by diagnostic teams. Use of "enthusiasts" such as topic specific associations or clubs may be considered.
- Incident definition must consider boundary conditions such as Local Government Areas (LGAs), State/Territory borders, and/or catchments for example. In particular, delineation, quarantine or potential movement controls should use land-marks or boundaries able to be recognised by community members.
- Allocation of resources must assume multiple visits to each property (as urban and peri-urban dwellers are generally not on the property during working hours) and property numbers. An initial indication may be 10 persons per 1000 residents.
- Information and management systems dealing with community contact information must be activated immediately to support establishment and assume significant data (both spatial and textual) volumes.

- A review of legislative, regulatory and contractual obligations must occur. In particular, this must include access and treatment rights (this is particularly important in relation to multiple consolidated dwellings) as well as liability issues.
- A review of local or significant social or cultural events should also be undertaken to examine coincident issues.
- Planning should consider that political and social reaction may overtake epidemiological modelling in terms of timing, forcing decisions to be made using less than perfect information. In particular, Planning must be prepared to provide summary diagnostics and what additional tests are required, summary of survey information and quarantine action, potential movement controls on a large scale, and using boundaries based on parameters other than pest biology.
- That being said, details of the biology of the pest including its host range, economic impact and opportunities for eradication or containment (included in the Incursion Incident Report) must also be developed, including whether the pest has been identified in IBPs or Categorised as part of the EPPRD.
- Examination of affected industries must be extended to industries other than those directly associated with the pest.
- Examination of information and effectiveness of controls, and availability of pesticides/chemicals/other control methods in Australia and overseas, should be undertaken with a focus on community reaction in urban and peri-urban areas. This extends to "regional" quarantine measures and movement control issues.
- It will be imperative to develop a rationale for the size of the quarantine zones surrounding affected sites and what movement controls should be applied to intra- and interstate trade, including interstate trade restrictions. Such restrictions must consider the right to free trade between states, particularly from those industries that may not at first directly appreciate their connection with the campaign or the impact of the pest.
- The human population density associated with an urban or peri-urban biosecurity emergency will magnify any issues associated with the existing emergency management protocols and any issues associated with administrative or managerial processes.
- A declared emergency does not automatically remove the obligations of existing legislative instruments and regulation, requiring emergency management staff to meet all occupational health and safety requirements, for example.
- There is an increased need to formally engage and liaise with emergency services to ensure access to required resources and up-to-date urban or peri-urban survey and response information (such as occupier information).
- Examination of applicable science and the development of a needs profile for laboratory resources will be essential. In particular, specialists who have gained urban and peri-urban operational experience should be sought.
- In addition to privately owned and occupied land, Planning must also develop an approach for Government landholders to ensure that timely access to public lands is possible during the Operational Phase. Pre-prepared protocols should also be developed for sensitive facilities (such as military installations and consulates etc) to ensure timely access, or assessments by their own teams.
- As general rule, compensation schemes should be avoided in urban and peri-urban situations, as it is considered that the management effort, the maintenance of equity, and the temptation for abuse of compensation, far outweighs any advantage or incentive such a scheme may create.
- Specific multi-jurisdictional planning and associated protocols for the urban and peri-urban centres of Tweed Heads/Coolangatta, Albury/Wodonga, and Canberra/Queanbeyan should be established prior to an outbreak in these centres.

- An exit strategy must be planned as a component of the Alert Phase. Such a strategy must consider the process of “Area Freedom” declaration and the possibility of coincident or recurrent infestation, independent of the eradication campaign. This is imperative with respect to the development of expectations within the urban and peri-urban communities.
- At the commencement of the Alert Phase, it should be anticipated that a range of reports will need to be kept up-to-date. The information demand will be great, and this particularly relates to situation reports (SITREPS).
- Proclamation of quarantine areas will require detailed planning of movement and security controls. Planning must consider these controls in the context of a large population base needing to undertake day-to-day activities.

Planning in the Operations Phase:

- As discussed previously, an urban or peri-urban response will magnify resource requirements. In particular, Planning must consider issues such as the availability of approved valuers, resources with appropriate approvals or appropriate licences for the application of chemicals or administration of drugs etc. In this regards, Planning's role during Operations will be pest or host specific.
- Planning must also be aware that destruction techniques may come under significant scrutiny and be different for the operational response in urban and peri-urban area.
- Links with the Local Government(s) must also be properly considered by Planning to ensure appropriate local regulations are met (for example, use of local waste transfer stations, working times within in urban and peri-urban areas, and traffic management issues associated with works and movement controls. This also extends to issues such as the compatibility of plant and equipment for local areas.

Planning in the Stand-Down Phase:

- Depending on the scale of the response, Planning will be required to maintain situation reports during the Stand-Down Phase as well as provide decommissioning and de-escalation plans. Within the context of urban and peri-urban response, these will be pest or host specific.

Urban / Peri-urban Issues to consider within the Operations Function throughout the phases of a response

Operations in the Investigation and Alert Phase:

- Peri-urban areas dominated by “hobby farms” or similar present a major challenge as property owners or occupiers may not be connected with the established primary industry extension frameworks or may sell produce through less defined processes than established market environments. In addition, sales may not be recorded.
- Collection of initial details and any urgent tracing (backwards or forwards) may be frustrated by either lack of records or simply the number of small producers that may need to be visited.
- Pests that require “real-time” observation (such as European Wasps) present an even greater operational challenge during the Investigation Phase in an urban area. Immediate access rights to land or ability to access lands may be severely restricted, effectively limiting traceability.
- Although immediate steps to limit spread of the pest may be taken by imposing quarantine to stop the movement of material, people, machinery and equipment into, and out of, the suspect property or area, a large and dense population will present

difficulties. In particular, communities from some ethnic backgrounds may attach specific stigmas to being involved in such activities and their cooperation may be very limited.

- When there is a significant probability that an EPP incursion has occurred, the CPHM or SCC Director will arrange for a diagnostic team to be dispatched to the Suspect Premises (SP). The diagnostic team must consist of at least two officers for legal and Occupational Health and Safety (OH&S) reasons. The collection of samples must also be handled with sensitivity, as cultural and other prejudices may create issues for the occupiers or owners (for example in the case where an occupier is looking for an excuse to break a lease). Such samples should be managed and forwarded to an appropriate laboratory that meets the required standards to handle quarantine samples and within a process that maintains the forensic chain of evidence. In the case where a technical expert accompanies the team to ensure the sampling protocol, and that all details associated with the incident are recorded, it is imperative that appropriate identification be provided and that the personnel have been trained in relation to dealing with the public. Initial advice from Operational managers from past events indicates that the least said by the diagnostic team(s) the better.
- Tracing (backwards and forwards) may prove a difficult exercise in urban and peri-urban areas. In particular, registers of animals and plant activities are minimal, although enthusiast associations and clubs may be able to assist.
- Trace forward and trace back must also acknowledge the high degree of movement within an urban or peri-urban community. Rent and lease rotations are frequent (rental churn rate), and real-estate agents or removalist companies may be an effective information gathering and dissemination source relating to tracing.
- Pest or disease specific processes may be best understood by liaising with affected local people. Although industry bodies represent a range of members, effective tracing relies upon detailed knowledge of movements, normally beyond the scope of industry representative bodies.
- All information must be treated as confidential, and the initial diagnostic team must be aware of the need for confidentiality.
- The timeframe for a biosecurity emergency may extend into years. Generally, emergencies may be understood by the staff and community to be short events. As a result, the focus of staff and the community may reduce overtime, and any eradication campaign must acknowledge the need to maintain urgency in response – particularly during the Alert Phase.
- Urgency may be best maintained through effective leadership, and overt senior management commitment. The establishment of defined milestones, or sub-objectives may be advantageous during the Alert Phase.

Operations in the Operations Phase:

- Ensure an incident action plan is developed for field operations (both short term and longer term) considering the complexity of the urban or peri-urban environment involved. These complexities range from occupier or owner availability, security systems, savage dogs, access rights, conflict with land-holders, dealing with diverse societies, and many aspects of logistical planning.
- Although action plans may be best based on moving through areas in “fronts”, such an approach in an urban or peri-urban environment will require a process of addressing the premises which could not be accessed or where access was denied.
- Eradication is the objective of an eradication campaign. Although the role of research and science will be significant, an eradication program must focus on the primary objective. Research and science provides the tools to aid eradication, and is not an objective in its own right.

- As the eradication campaign may continue for years, it is imperative that the campaign resists pressures to conduct itself as an on-going programme of events. Although a programme approach may fit well with existing lead agency protocols and budget cycles, the structure and span of control elements of an emergency response are deliberately based along functional lines to ensure objectives are set and achieved. An eradication campaign has a distinct end point. The operational need is to keep a focus on the eradication of the pest.
- Local knowledge and expertise must be sourced for operational tasks and supported by robust administrative and management systems. Biosecurity emergencies have a tendency to escalate, particularly during the Investigation Phase, as a result of the discovery of further infestations, beyond that which are already known. This process of escalation is accompanied by an increase in human and other resources. This increase in resources requires robust administrative and management systems. Any flaws in such systems will create significant rework and divert operational resources from the eradication objective.
- Resources will be required on a temporary basis for specific functions and to meet specific objectives. These resources are best acquired in a manner that allows effective disposal at the required time. That being said, operational focus will be difficult to maintain towards the end of the campaign, when the discovery of infestations is rare or non-existent and team members begin seeking other employment. Indeed training of new staff may prove difficult, as it may not be possible to provide field examples of the pest or disease towards the end of the campaign.
- Operational security is paramount, including security of examples of the pest or disease. Security of samples is required to avoid deliberate and fraudulent/criminal reinfection.
- Unlike rural biosecurity emergencies, urban and peri-urban survey and eradication may need to be conducted over more than 100,000 properties, with a range of owners and usage. Information must be current, requiring significant resources and technology to maintain data accuracy. There is a need to align processes with existing information sources used by other emergency services, to reduce the need for customised data collection and entry process.
- Movement control and permits work when those required to use them understand the reason for their use and understand how to use the administrative process that has been established.
- Surveillance or urban and peri-urban environments may also uncover illegal plantings or activities. The eradication campaign must have a very clear policy on the appropriate actions to take with respect to such discoveries.
- Laboratory resources may become overwhelmed if large numbers of samples continually require identification or confirmation. A range of contingency and support plans should be developed for laboratory support.
- Spatial information will be critical to support operational decision-making. Map production, quality and accuracy will impact the effectiveness and efficiency of operations. If in-house systems must be developed, these should complement and be compatible with the lead agencies existing systems.
- Urban and peri-urban response requires cooperation between agencies for surveillance, prevention, preparedness, response and recovery. Resources, data in particular, owned by Government must be made readily available to contribute to any eradication campaign. This need is more pronounced where complex internal transfer pricing and funding arrangements are established. The community expectation is that resources owned by the Crown (in whatever administrative or custodial framework), be available as and when required during emergency response.
- The use and impact of volunteers may also be considered. Like other resources, volunteers range in skill, levels of training, knowledge, as well as motivation. They

may be engaged to undertake a range of roles, including information dissemination at local shopping centres, or surveillance of parks or other public lands. In an operational context, it is important to understand the motivation of volunteers to ensure that their input is recognised and their energies used in appropriate ways. Disgruntled volunteers can present both operational and communications issues.

- In the area of logistics, these guidelines do highlight that in-kind support may be limited or non-existent in urban and peri-urban campaigns, and as a result there is a need to assume that the campaign will need to be self-sufficient. However, it may be the case that the campaign does receive donations. These donations may include time (such as volunteers), or resources such as use of car parking, or supplies, or free advertising. From an operational context, these donations may prove of considerable value and their use must be recognised and handled with appropriate sensitivities associated with the motivations of those providing the donations. Once again, disgruntled givers can present both operational and communications issues.

Operations in the Stand-Down Phase:

- On-going surveillance will be required. This will be particularly difficult with respect to the declaration of area freedoms and the lifting of movement controls. This aspect of campaign will be heavily dependent upon operational considerations being taken into account during the Investigations Phase and the development of the exit strategy.
- In terms of on-going surveillance, and in the context of operations, it is important to recognise the potential for vandalism and the potential need for security in urban and peri-urban areas.
- Stand-Down of volunteers and dealing with the disposal of donations will also require specific operational considerations.

Urban / Peri-urban Issues to consider within the logistics Function throughout the phases of a response

Logistics in the Investigation an Alert Phase:

- As an urban or peri-urban eradication campaign escalates, the need to appropriate SCC facilities may become great. Large office space, or facilities for parking many vehicles etc., may not be easily acquired in an urban area (this is particularly the case with respect to marshalling of a large number of vehicles).
- Jurisdictions may consider pre-determination of a Pest Control Headquarters in major urban centres, before an outbreak occurs. This process may be mapped to the jurisdiction's emergency management framework, and the activities of other emergency services.
- Administration and management requires particular attention for an eradication campaign. Poor administration will hinder any campaign, and lead to the inefficient and ineffective use of resources. The administrative structure of the campaign should be an initial priority upon activation of the Pest Control Head Quarters.
- Administrative processes for financial delegations and payments should be prearranged, critical resources should be pre-identified, and personnel issues dealt with using professional Human Resources expertise. The role of the administrative function must also include insurance reviews as well as the establishment of file and archive systems complimentary with the lead agencies existing systems.
- Logistics should become aware of "out of jurisdiction" resources. This particularly includes personnel and laboratory resources. A formal and active biosecurity peer-networking programme would support such a need.

- A significant role for Logistics during the Alert is to also coordinate the identification of likely LCC sites. This is particularly difficult for urban and peri-urban response due to the potentially large number of vehicles and personnel. In some case, a large influx of personnel can impact the economics of an urban community during the Stand Down Phase. Such issues should be anticipated.
- Occupational health and safety (OH&S) requirements cannot be underestimated. Specific training will be required for all team members and must be appropriate for the duties undertaken (including personal protection and dealing with issues that may be faced when interacting with the community including public relations and assault).

Logistics in the Operations Phase:

- Provide treatment resources applicable to urban and peri-urban areas. In particular, these may be novel or at least different than those generally used in rural environments.
- Unlike rural responses, where land holders may be willing to provide basic resources or plant or equipment, it must be assumed that there will be little or no “in-kind” support from urban and peri-urban communities. That is, the campaign should be fully self-supporting.
- Although it is often assumed that communications networks in urban areas may be better than rural areas, response campaigns do create communication issues, particularly if large numbers of GSM mobile telephones are used simultaneously, or large amounts of data consume available band-width. Logistics must be fully aware of communications short-falls.
- Due to the complexity of urban and peri-urban response, and the potential for novel approaches to eradication, Logistics should be aware that Personal Protective Equipment (PPE) requirements, and associated training, may differ from a purely rural response.
- Logistics should be aware that the male / female mix of the response workforce may guide logistical issues including such issues as PPE, washing and decontamination facilities and the like.
- Due to the complexity of urban and peri-urban response, particular attention must be paid to ensure employment conditions are satisfied. This includes the need to provide a safe and secure environment, as well as acknowledging the variety of premises that staff may visit and any particular requirements that may result. For example, this may include security checks for correctional centres, or gender restrictions to certain facilities such as women’s refuges.
- Appropriate records and processes must exist in relation to work place incidents. It must be remembered that the declaration of an emergency does not remove the OH&S obligations of an employer, including such activities as site risk assessments and first aid training and appropriate supervision.
- Human resources management and robust supporting systems must be used. Team members should be appropriately scrutinised before engagement (via whatever process), including appropriate reference and police checks. In the case where legislation requires, this should also include “working with minors” requirements.
- It is imperative for a rapid response in the Operational Phase that links are established with existing systems and structures, and that reinventing systems is kept to a minimum. These links can be maintained by effective peer group networking, scenario training and the use of campaign establishment teams, who carry with them experience and knowledge of biosecurity emergency response functions, and who can aid and coach local staff during the establishment period.
- The role of technical and administrative audit and quality assurance is essential. Particularly peer group audit of technical and scientific activities, which provides opportunities for improved eradication campaigns.

Logistics in the Stand-Down Phase:

- Logistics must anticipate the need to terminate personnel, dispose of assets and resources, and reinstate or transfer resources to their point of origin. In urban or peri-urban environments this may create unusual behaviour during Stand-Down, which should be anticipated. Unusual behaviour may include deliberate re-infestations in an effort to remain employed, or misappropriation of campaign resources for example.
- Stand-Down of volunteers and dealing with the disposal of donations will also require specific logistical considerations to ensure that expectations of the “givers” are met, and to limit any potential for back-lash through inappropriate Stand-Down or disposal.

Urban / Peri-urban Issues to consider within the public information Function throughout the phases of a response

Public information in the Investigation and Alert Phase:

- In accordance with PLANTPLAN, the CPHM assumes sole responsibility as spokesperson during the Investigation Phase.
- In urban and peri-urban environments, it would also be wise to assume that other information conduits may be created which would need to be addressed as a component of the Communications function. In this case, the CPHM may be playing both a pro-active and reactive role, requiring specific engagement strategies and a degree of flexibility. This must be considered on a case-by-case basis.
- PLANTPLAN highlights that if symptoms or the diagnosis indicate the presence of an EPP the CPHM will advise the property owner or manager [occupier]:
- That diagnostic tests have identified a possible EPP that may require quarantine controls;
- That all staff working on the incident have been instructed to maintain strict confidentiality regarding the event;
- Of the need for cooperation in applying voluntary movement control on plants, plant products, personnel. If cooperation is not offered the CPHM should explain that a quarantine order can be placed on the property which imposes mandatory control on the movement of people, plants and equipment;
- Of what will happen in respect of national recommendations on eradication and containment;
- Of any financial arrangements;
- That counselling services can be made available to assist with social, economic or other issues; and
- That they will be advised of the outcome of final diagnostic tests.
- At this point, the Controller must anticipate communications initiatives that deal with the owner or manager [occupier] approaching the media, their legal advisors, or local political representatives in the case that they feel aggrieved, threatened, or disadvantaged. A crisis communications strategy may be an advantage in this regard.
- Appointment of appropriate media spokesperson(s) considering the demographics of the urban and peri-urban areas. This could include language or cultural based decision criteria.

- A range of specific urban or peri-urban focused briefings should be conducted. These include briefings to directly impacted industry, police, emergency services and local governments as well as those listed in the Investigation Phase, to inform them that PLANTPLAN has entered the Alert Phase. It is possible that many of the attendees at such briefings may never have heard of PLANTPLAN and its objectives.
- Specific media kits should be developed at this stage, recognizing the variety of media outlets and information conduits available within urban and peri-urban areas. In this instance, it may be valid to assume that initial contacts from the community will be via the local government authorities, requiring sophisticated liaison between the campaign and local government. The establishment of a dedicated local government communication or liaison function should be considered.

Public information in the Operations Phase:

- There is a need to identify alternative information conduits as established, or "normal" industry based approaches such as agricultural extension officers, these may not exist or be limited within urban and peri-urban areas.
- Eradication campaigns in urban and peri-urban situations rely upon community support. Campaigns must be in constant contact with the community, as well as the affected industry(s), and all levels of Government.
- Briefings must recognise the diversity of the audience and their potential "separation" or different perspectives or belief systems on issues of pest response, such as the use of agricultural chemical in urban areas.
- Activities must include listening to concerns, providing information, and acting upon the information needs as they arise. These activities must recognise the diversity of cultural and educational backgrounds. It is also important to understand that a community is not homogenous, and that a mixture of broad spectrum and individual specific communication activities may be required.
- There will be a need to prepare a range of communications materials, including technical information, interpretive materials, materials in different languages or for the vision or hearing impaired, press conference materials, electronic media etc. In addition, joint state/territory and Australian Government media releases, or industry, or local government, communications materials may be needed.
- Urban and peri-urban communities may also present a broader range of interests and experiences. This will likely include individuals with specific technical and legal training, those with high computer literacy skills, others with political and social connections. These individuals provide both an extensive resource if properly engaged, but also a source of conflict for the eradication campaign.
- Importantly, urban and peri-urban areas combine a range of land uses, population density, demographic (in terms of the elderly, infant and cultural diversity), and complications of day-to-day living. These characteristics present an environment where mass media alone will not suffice.
- Added to these complications will also be a range of existing social and community issues, which may take resources and energy away from an eradication program. It is also considered that whereas a rural community may be more understanding of the need for pest or disease eradication, urban and peri-urban dwellers may not be as understanding and require specific education relating to the impacts of the pest or disease, particularly as it relates to them as individuals.
- Local political representatives have specific community links and also offer a range of existing resources, such as meeting rooms, which may be used to the advantage of an eradication campaign.
- Whatever communications and engagement strategies are employed, on-going evaluation of the effectiveness of the strategies is required, to enable fine-tuning of messages and feed-back to the stakeholders.

- If volunteers have been utilised, then it is imperative that specific communications strategies be developed to recognise the contributions of the volunteers.

Public information in the Stand-Down Phase:

- Communications during the Stand-Down Phase will largely depend on the exit strategy. In particular, Communications must acknowledge issues that may arise from the differences between control, eradication and elimination. Understanding the stakeholders expectations in terms of the performance criteria will be paramount with respect to a successful closure of the campaign.

Urban / Peri-urban Issues to consider within the industry liaison Function throughout the phases of a response

Industry Liaison in the Investigation Phase:

- In the context of urban and peri-urban response, Industry Liaison during the Alert Phase includes educational and engagement activities associated with movement controls and other control techniques, which may be deployed during the Operational Phase.
- Industry participants may have access to a variety of resources and cooperative engagement may create a range of opportunities with respect to novel or innovative approaches to control.

Industry Liaison in the Operations Phase:

- An informed and active industry may be able to assist in addressing community concerns and provide motivation for individual sacrifices. If the community is made aware of the potential personal and industry impacts, a higher degree of acceptance and cooperation may be created for the Operational Phase.
- Taking into consideration the potential range of industry types, industry may also be able to make contributions other than financial support, but expertise, product or other resources. These are issues that may be addressed through effective and comprehensive Industry Liaison.

Industry Liaison in the Stand-Down Phase:

- Effective Industry Liaison during the Stand-Down Phase will be critical to minimising potential negative feedback. This is particularly the case where the industry mix may be significantly varied.
- An effective exit strategy will be enhanced by engagement of industry and management of their expectations, particularly in relation to lifting of movement controls.
- Disadvantages to other industries may occur as a result of Stand-Down. That is, if it has been an extended campaign in a regional urban area, then local businesses such as accommodation suppliers may have come to rely on the income generated by the response activities.