

# Paramedics and public health emergencies: Is there a 'duty to respond' in Australia?

Smith, Burkle Jr, Woodd, Jensen, and Archer examine the concept of 'duty to respond' in the Australian SARS context.

## ABSTRACT

As evidenced by Toronto's experience with Severe Acute Respiratory Syndrome (SARS), paramedics provide an integral 'frontline' role during a public health emergency. During normal operating procedures paramedics understand their 'duty of care' to individual patients. However, is there a 'duty to respond' when the point of care moves from the individual patient to the greater population during a public health emergency? An extensive search of publicly available state and national legislation and regulations was conducted to examine the concept of 'duty to respond' in the Australian context. Relevant Emergency Management Acts, Health Acts, and ambulance service regulations lacked a clear focus on 'duty to respond' and failed to address the ramifications of paramedic refusal to work. As Australia is a Common Law Country the issue of duty to respond could be managed through paramedics' individual employment contracts with their respective ambulance services, and failing to respond could potentially be addressed using pre-existing standard terms and conditions for employment. This issue is particularly topical in light of the current public health challenge posed by the Swine

and psychological effects such as anxiety, neuroses and depression (Hooke 2001). These health risks were highlighted by the exposure, infection, illness, and death of paramedics and emergency health care staff during the Severe Acute Respiratory Syndrome (SARS) outbreak in 2003 (Maunder 2004). SARS exposed the vulnerabilities of our health care systems, where health care workers (HCWs) bore the brunt of the outbreak and were the most at risk population for SARS, accounting for 21% of all cases worldwide (WHO 2003).

Public health emergencies place unprecedented demands on the health care system regarding surge capacity and test HCWs' personal commitment to the health care profession. Despite this challenge, professional codes of ethics and health services management guidelines are largely silent on the issue of duty to respond during public health emergencies, thus providing no guidance on what is expected of HCWs, or how they ought to approach their duty to care and respond in the face of risk (Ruderman 2006). In the context of the current pandemic of Swine Influenza it is imperative that health care agencies, including ambulance services, consider the responsibilities and 'duty to respond' of their employees, and give a clear indication of what standard of care is expected in the event of a public health emergency.

## Methods

A comprehensive literature search was conducted for all publicly available information relating to paramedic responsibility to work in Australia. The electronic databases MEDLINE (1950 to February 2009) and CINAHL (1982 - February 2009) were searched using variations of the search terms 'duty to work', 'duty to respond', 'responsibility to work', 'obligation to work' and 'professional responsibility' in combination with variations of the search terms 'public health', 'public health emergency', 'public health disaster' and 'public health crisis'. Findings were limited to studies of paramedics in the Australian context. The Google, Google Scholar, and Yahoo Search Engines were also searched, along with the Emergency Management Australia (EMA) website, individual Australian ambulance service websites, national and state government and affiliated websites, and the Australian College of Ambulance Professionals (ACAP) website.

The continuing threat of both naturally emerging and man-made public health emergencies has brought the issue of emergency health care workers' responsibilities and duty to respond into question. These questions are complicated by the potential risk that emergency health care workers face during the frontline response to such health disasters. As a core component of the frontline response, paramedics are at high risk for a variety of health and injury risks, including physical injury, death, communicable disease, contamination,

## Results

The literature search of MEDLINE and CINAHL identified no relevant publications addressing Australian paramedic duty to respond during public health emergencies. Individual agency websites provided the most useful resources relevant to the issue of health care worker duty to respond, including Emergency Management Acts, Health Acts, and ambulance service guidelines. A national and state-by-state summary of findings is provided below.

### National

At a national level, legislation and regulations governing and outlining paramedic responsibility and 'duty to respond' during disasters are lacking. The role and responsibilities of paramedics are not outlined in the National Health Act (1953), and no national ambulance guidelines exist to outline the responsibility of paramedics during a disaster, or the ramifications of failing to respond to work. The National Health Security Act (2007) specifically addresses communicable disease outbreaks however the role of Ambulance Services is not outlined. The Australian Health Management Plan for Pandemic Influenza (2006) outlines the role of the ambulance services during a pandemic, but fails to specifically address paramedic responsibilities or obligations. The Quarantine Act of 1908 states that the Commonwealth has pre-eminent powers over all matters of human quarantine, in which case national health responses would be dictated by the Commonwealth. Finally, the Australian College of Ambulance Professionals (ACAP) have a "Code of Professional Conduct" which outlines how Australian paramedics are required to conduct themselves in relation to integrity, respect, responsibility (no specific guidance as to professional obligation), competence, gaining consent for patient care, confidentiality, research, and ethical review.

### Victoria

Ambulance Victoria (AV) is the only ambulance service within Australia that is a separate statutory body from the state government. The Victorian Ambulance Service Act 1986 details AV's 'duty to care' through the services' day-to-day functions, objectives and responsibilities. Despite not being a governmental agency, AV still complies with directions given by, and reports directly to, the Minister for Health (s34B). There appears to be no specific area that addresses the consequences of a paramedic refusing to work, whether disaster-related or not. Furthermore, there is no reference of additional responsibilities that may be placed upon the service in the event of a state disaster.

Within AV, the Metropolitan Ambulance Service (MAS) has developed the MAS Emergency Response Plan (2007) with the aim of coordinating the effective management of emergency health situations. While this plan does not specifically cover the issue of responsibility to work, it does outline response and recovery activities, which appear similar to those of general 'core business' ambulance response activities in the Ambulance Service Act (Victoria). It also aims to

ensure AV plays an integral role in the management of a health incident by providing leadership, and command to the other health agencies, and is consistent with the State Health Emergency Response Plan (SHERP). SHERP is the umbrella plan which encompasses all other health and medical plans in Victoria.

The Victorian Emergency Management Act 1986 operates in conjunction with SHERP and the Emergency Management Manual Victoria 2008 (EMMV) to provide an effective state-wide health response framework. These Acts and plans focus on the coordination of prehospital emergency service agencies specific roles and responsibilities in the event of an emergency. In Victoria, the Department of Human Services (DHS) is primarily responsible for incident control and the overall coordination of these plans. The ambulance services, in addition to maintaining normal business continuity, will assume prehospital leadership and coordinate patient triage, treatment and transport. Additionally the ambulance services will partnership with DHS to communicate with medical specialist teams, notify hospitals and other emergency teams. Paramedic responsibility to work is not explicitly covered in any of these plans.

Victoria's Health Management Plan for Pandemic Influenza (2007) aims to minimise the morbidity and mortality associated with a pandemic and includes strategies such as preparedness, containment and maintenance of social function. The plan outlines that ambulance services will liaise with the DHS in an effort to reduce to spread of infection. The safety of ambulance officers is considered paramount, with immunisation strategies, staff education and personal protection equipment (PPE) procedures outlined. The protection of staff in this document is consistent with the Health Act 1958 (Victoria) which instructs that all persons at risk of contracting or spreading infectious diseases must take all possible precautions to prevent the risk to others (s119). However, again, paramedic responsibility to work is not covered in this plan.

### Australian Capital Territory

Ambulance services in the Australian Capital Territory (ACT) are provided by the ACT Emergency Services Agency, a division of the Department of Justice and Community Safety. The ACT Ambulance Service Union Collective Agreement (2007 – 2010), provides the terms and conditions of employment for employees. This agreement recognises an employee's commitment to family, the community, and general health and wellbeing (s53.2) and is committed to providing employees with a balance that recognises the family and personal commitments of employees (s53.4). This is one of the few plans identified that explicitly states that the ACTAS reserves the right to deny an employee leave where there are operational reasons for doing so (s53.5).

The ACT Health Management Plan for Pandemic Influenza (2007) stipulates the responsibilities of the ACT Government and relevant agencies in the management of a pandemic emergency. The roles and responsibilities outlined in this plan are guided by the ACT Emergencies Act 2004 and the ACT Public

Heath Act 1997. In response to a health emergency, the plan stipulates that the ACT Emergency Services Agency will coordinate the ACTAS to assist in operations where necessary. Of note, the pandemic plan and all legislation in the ACT comes under the umbrella of the Human Rights Act 2004 (ACT). Therefore, providing patient care must not unnecessarily infringe on the fundamental human rights of the paramedic.

The ACT Emergency Act 2004 is linked with the ACT Emergency Management Plan and gives directive to the Ambulance Commissioner for the legislative power to access inter-jurisdictional and national resources (s147-149). A specific role of the ACTAS is not clearly defined and is at the directive of the Chief Ambulance Officer. However, it is expected that ambulance services will continue to provide provision of medical treatment and prehospital patient care, and includes the transport of a patient by ambulance or medical rescue aircraft (s 41). The general consensus of this Act is that during a pandemic emergency, compliance to Ambulance Service directives is expected, however legislative powers and penalties may apply if paramedics fail to comply.

### **New South Wales**

The Ambulance Service of New South Wales (ASNSW) is a Government-run organisation through the NSW Department of Health. The NSW Ambulance Services Act 1990 details the operational responsibilities of the ASNSW which governs the core business of paramedics. Disciplinary action upon paramedics who fail to comply with contractual obligations is at the directive of the ASNSW and state Governor. Actions of the ASNSW beyond those described within this Act are guided by Acts such as the Health Services Act 1997 (NSW) and the State Emergency and Rescue Management (SERM) Act 1989. Additionally, the Service is also subject to the NSW Disaster Plan (DISPLAN), NSW Healthplan, and the NSW Health Interim Influenza Pandemic Action Plan (November 2005).

The State Emergency and Rescue Management (SERM) Act 1989 is the principle planning instrument for all emergency management within NSW. However, the SERM Act fails to outline a specific role for ambulance services during a declared state emergency. Nevertheless, the NSW Healthplan, DISPLAN, and Pandemic Action Plan are all prepared in accordance to this Act, and each Emergency Service agency maintains similar roles and responsibilities in terms of emergency and disaster preparedness, response and recovery.

In the event of a large scale infectious disease emergency the NSW Healthplan is activated along with the NSW Health Interim Influenza Pandemic Action Plan (November 2005). Within these plans, the State Ambulance Controller is responsible for the coordination of ambulance services to provide emergency response, recovery and maintenance of core ambulance services. These plans do not document the legal ramifications of paramedics failing to work. Disciplinary action resulting from paramedics refusing to comply or act in the event of declared emergency appears to be limited to the decision of internal processes or at the decree of the State Governor.

### **Queensland**

The Queensland Ambulance Service (QAS) is a division of the Department of Emergency Services within the Queensland Government. According to the Ambulance Service Act (Queensland) of 1991, the role of the QAS in the event of an emergency or disaster is to participate with other emergency services in counter-disaster planning, coordinate volunteer first-aid groups, and maintain normal duties and functions. The Ambulance Commissioner has the power to discipline paramedics upon the failure to comply with the QAS code of practice, which may result in disciplinary action (s41). However, paramedics may also take any reasonable measure to protect themselves from potential danger from other persons (s38).

The Queensland Public Health Act (2005) binds all professional health care workers to protect and promote the health of the Queensland public. Emergency officers are instructed to respond to all public health emergencies (s314-315) and must take all reasonable precautions to minimise the risk of infection to others (s151). Furthermore, this Act may give paramedic legislative power to use quarantine measures to prevent the further spread of disease in an effort to contain a public health risk (s345). The Queensland Disaster Management Act 2003 established to manage, respond and recover from a national disaster or emergency situation, can be used by the state to provide a response framework for the State Emergency Services. Paramedics are governed by this Act under the Ambulance Service Act 1991 (Queensland).

The Queensland Health Disaster Plan (2008) is to be activated in the event of exceeded operational capacity in response to a health event, in response to legislative activation, or by special consequence (s3). The QAS is required to provide a coordinated response to triage, treat and transport patients, and maintain core ambulance services throughout the state, which may also include the coordination and deployment of volunteer services (s9.2). Paramedic responsibility to work during a health disaster is not outlined in this plan.

### **South Australia**

The South Australian Ambulance Service (SAAS) is an incorporated association established under the state's Minister for Health. The South Australian Ambulance Services Act of 1992 does not explicitly provide information on paramedic duty to respond or responsibility to work. The Act outlines the operation of ambulance services in the state and the existing penalties for operating a service without a licence allocated to them by the minister. The South Australian Emergency Management Act of 2004 outlines that roles of the state emergency management committee and the state coordinator and describes the powers each position holds. The Act also outlines the punishable offences in regards to emergency situations, such as the failure to comply with directions without a reasonable excuse and obstructing operations during a major emergency. Both of these offences could be committed if a paramedic refuses to respond during a disaster.

The State Emergency Services Act of 1987 outlines the state emergency service (SES) board of management and response obligations in certain emergency situations. The Act does not include any information in regards to the duty to respond for emergency officers or paramedics. The South Australian Health Care Act 2008 provided a substantial amount of information on private and public hospitals and the administration, management and operation of them. The Health Care Act also included a large section on the SAAS and explains the management, function and powers of SAAS. However, again there is no information on the duty of a SAAS employee to respond in a disaster situation.

### **Tasmania**

The Tasmanian Ambulance Services (TAS) is a statutory service of the Acute Services Group of the Department of Health and Human Services; however ambulance services in the state are largely voluntary based. The Ambulance Services Act of 1982 outlines the administration and management of ambulance services in the state. The Act does not explicitly outline the roles of paramedics in disaster situations or the consequences if specific roles are refused. The Tasmanian Emergency Management Act of 2006 outlines the administration processes for emergencies at both state and regional levels. The act explains how the emergency management plans of each area are instigated and when and how a state of emergency is declared. In regards to paramedic's responsibility to work, and duty to respond during emergencies and disasters, there is no information or explanation of penalties. The Tasmanian Health Act of 1997 also fails to provide information regarding the duty of ambulance personnel to respond.

Tasmanian Ambulance Service officers are subject to the provisions of the State Service Act of 2000 (Tasmania) in which disciplinary actions, up to termination of employment, may be imposed upon inability to perform duties of upon a breach of the Code of Conduct (s10). The Tasmanian Action Plan for Human Influenza Pandemic (2008) does not specifically mention the role of TAS however the Department of Health and Human Services is expected to coordinate a pandemic response and it can be assumed that TAS role would be incorporated here.

### **Western Australia**

Ambulance services in Western Australia are provided by St John Ambulance and are a not-for-profit organisation under contract by the Western Australian Government. The Western Australian Emergency Management Act of 2005 in which the ambulance service is classified as a combat agency, defines the State Emergency Management Committee functions and powers as well as the administrative side of the committee. While the Act addresses the roles of key health care personnel it fails to specifically describe the roles of the ambulance paramedic and the ramifications of failure to respond to work. However the Act does explain the offences which are punishable in a state of emergency such as failure to comply with direction of a management officer or obstruction of a management officer. A paramedic failing to respond to work could possibly be included here under 'failure to comply'.

The Western Australia Health Act of 1911 outlines information on the administration and management of the public health system, however, it does not discuss the role of paramedics or any penalties associated with failure to respond. The Fire and Emergency Services Authority Act of 1998 is somewhat ambiguous in the classification of 'paramedic'. It is unclear whether a paramedic is incorporated within the Fire and Emergency Service Authority (FESA) unit, which defines a FESA unit as being trusted with the protection and saving of life endangered by incidents. There is no specific definition of the roles of each emergency service in an emergency or disaster and nothing is outlined in regards to the duty to respond for paramedics or any emergency service employee.

### **Northern Territory**

The Northern Territory Government has adopted a similar approach to WA, wherein ambulance services are provided by under contract to the NT Government by St Johns Ambulance Services. The Northern Territory do not have an ambulance services Act, however they do have a Disasters Act. The Northern Territory Disasters Act of 2008 explains the administration and powers that the counter disaster council has, and when these powers can be used. The Act also outlines the role of the disaster controller and director of emergency services in the Northern Territory. This Act also outlines the penalties involved with failing to comply with, or obstructing an officer working under the Act. Under this Act, paramedics may potentially be liable to prosecution for failing to comply with orders if they refuse to report to work. The Emergency Management Plan for Northern Territory defines specific operations in which the ambulance services will be involved in and their objective as part of these operations. However, again there is no mention of paramedic responsibility, or ramifications of failure to respond to duty. Finally, the Northern Territory Notifiable Diseases Act of 1999 fails to address the issue of paramedics and their duty to respond during an outbreak disease.

### **Discussion**

Responding to public health emergencies has historically threatened the health and safety of emergency health care workers. The SARS outbreak of 2003 demonstrated the risk to health care workers of naturally occurring outbreaks (Bradsher 2003, Reilley 2003), and more than one third of treating health care workers were contaminated and became ill during the response to the Sarin gas attack in Tokyo (Department of Health and Human Services 1996). Health care workers are common second-wave victims of Ebola outbreaks (Sepkowitz 1996), and many health care professionals have become exposed to infections such as Human Immunodeficiency Virus (HIV), Hepatitis B or C, and drug-resistant tuberculosis (Centers for Disease Control 2001). It is clear that public health emergencies will continue to occur and that being a health care worker can sometimes directly impact on health and well being (Huber 2004).

## What did we learn from SARS?

During the SARS outbreak of 2003, the infectiousness of SARS was substantially higher among health care workers than the general population, especially those working in hospitals and prehospital care (Maunder 2004). Indeed, during the SARS outbreak, Toronto, which had 224 confirmed SARS patients, suffered significant personnel and logistical problems in providing prehospital services to patients during the outbreak (Maguire 2007), with approximately half of Toronto's prehospital personnel exposed to the disease, and many workers needed to be quarantined (Silverman 2004). During the first phase of the SARS outbreak (officially declared over by the World Health Organisation on May 14, 2003), 234 paramedics were placed on home quarantine. During the five peak days of the SARS outbreak, paramedics spent a total of 664 days in home quarantine (Verbeek 2004). Based on the number of paramedics unavailable due to home quarantine during the first phase of the SARS outbreak, when the second phase of the outbreak occurred (reported on May 23, 2003), a work-based quarantine program was developed to optimise paramedic availability to work (Verbeek 2004).

Following the SARS outbreak, staff involved in the medical care of SARS patients reported being fatigued, concerned about their own health and the health of their family, and developed a fear of social contact (Chua 2003, Koh 2005). Health care workers believed that they were at high risk of becoming infected, with some refusing to care for the ill and imposing self-quarantine on themselves to protect family members from potential exposure (Stein 2004). These behaviours are reminiscent of the psychosocial reactions witnessed during the beginning of the AIDS epidemic, where healthcare workers refused to treat patients, avoided physical contact with potential AIDS patients, and self-imposed isolation and quarantine measures to prevent 'spreading' the disease to loved ones (McCann 1997, Stein 2004).

## Ethical considerations and professionalism

The ethical foundations of "duty to care" and "duty to respond" are grounded in several longstanding ethical principles. Foremost among these is the principle of beneficence, which recognises and defines the moral obligation on the part of health care workers to further the welfare of patients and to advance patients wellbeing (Ruderman 2006). Beneficence is commonly accepted in modern health care and constitutes a foundational principle of the patient-professional relationship (Entralgo 1995). This is where the issue of professionalism comes into play. Are paramedics considered to be health care professionals in Australia if they are not a registered health care body? And if not, are they exempt from the ethical issues associated with beneficence?

The issue of professionalism is also relevant to the discussion of codes of ethics. One of the characteristics of a regulated health care profession is the development of regulations and standards which are developed on the basis of fundamental ethical principles and values of that profession. As Ruderman et al (1996) highlight, "the code of ethics has a long

and respected tradition in the health professions and today, most, if not all, the various health and social care professions have codes of ethics in place to provide guidance to their members". However, Campbell et al (2000) argue that the existence of codes of ethics equals nothing more than "soft laws", owing to the non-legislative and non-enforceable nature of the code.

It is also of concern that many current professional codes of ethics fail to provide explicit guidance regarding professional responsibilities during public health emergencies. The Canadian Medical Association (CMA) released a revised Code of Ethics one year after the SARS outbreak in 2004 (CMA 2004). The Code is largely silent on the issue of "duty to respond" despite their direct experience with managing the SARS outbreak. One key revision of the 2004 code was the inclusion of a "Fundamental Responsibilities" section. This section fails however to substantively address the issue of "duty to respond" during public health emergencies and lacks clear guidance to health care workers regarding their rights and responsibilities.

The American Medical Association (AMA) reviewed their professional code of ethics in the wake of the September 11th terrorist attacks. The AMA included several new ethical policies in their code that focus specifically on the medical profession's responsibilities and obligations in the context of a public health emergency. Under "Physician Obligation in Disaster Response" the AMA code directs "because of their commitment to care for the sick and injured, individual physicians have an obligation to provide urgent medical care during disasters. This ethical obligation holds even in the face of greater than usual risks to their own safety, health or life" (American Medical Association). While the AMA has moved in the right direction by outlining professional obligation, it fails to transparently detail how failure to comply with these obligations will be managed.

So where does this leave Australian paramedics? Are they a profession? Are they health care professionals? Should they be registered? Are they covered by ethical principles and codes of ethics that govern the patient-professional relationship existing within other professional, registered health care bodies? What are their responsibilities and obligations? It is hoped that this paper will promote a social dialogue of these issues.

## Can we ethically enforce "duty to respond"?

There is no current consensus as to how explicit requirements for "duty to respond" should be (Singer 2003). Enforcing "duty to respond" would echo previously discarded policies from codes of ethics which clearly stipulated that physicians have a duty to care even in the face of risk to their own life. Is this reasonable? Furthermore, is this ethical? This type of policy would likely be viewed as unacceptable in current thinking as it infringes on personal liberties. Clark (2005) suggests that forcing professional obligations such as "duty to respond" on health care workers is akin to requiring them to behave like "supreme Samaritans". The ever-present threat of emerging public health disasters demands a transparent discourse regarding the

acceptable standard of professional engagement, whether that be at the level of “supreme”, “good”, or “merely decent” Samaritans (Clark 2005, Ruderman 2006).

### The registration debate

At present, Australian paramedics are not registered health care professionals. Ignited by the Australian Federal Government's moves to develop a unified national registration scheme for health professionals (COAG 2008), the issue of paramedics being registered as a professional body is now being debated. O'Meara (2009) suggests that a number of key issues regarding paramedic professionalism and registration require exploration, for example, social and technological changes have contributed to the increasing complexity of paramedic practice, requiring the development of enhanced professional knowledge and skills. Furthermore, the utilisation of these advanced skill sets in the pre-hospital environment potentially exposes paramedics to a much broader range of environmental and occupational risks. Paramedic practice has changed from “... a relatively simple response based, non invasive series of activities that ended at the hospital door to a much more complex practice based upon judgement and problem solving” (Sheather 2009). Within this context, questions surrounding paramedic responsibilities and obligations need to be discussed amongst policy makers, employers and the profession, so that any expected “duty to care” and “duty to respond” is transparent.

### Conclusion

In light of what we learned from the SARS outbreak of 2003, and in the present reality of a Swine Influenza Pandemic, it is imperative for ambulance services to consider the professional responsibilities of paramedics in regards to responding to public health emergencies, particularly when that response can result in exposure, infection, illness, and death. It is of critical importance that ambulance services give paramedics clear guidance relating to what standard of care is expected of their employees in the event of a public health emergency, and what the ramifications of failure to respond will be.

This literature review identified little or no clear guidance addressing Australian paramedic duty to respond during public health emergencies, or the ramifications of failing to respond. As Australia is a Common Law Country, the issue of paramedic responsibility and duty to respond would presumably be managed through individual paramedic employment contracts with their respective ambulance services, and failing to respond could be managed using pre-existing standard terms and conditions for employment. Under such circumstances, the ambulance services would need to demonstrate that the direction to respond was appropriate. A critical examination of the role and responsibilities of paramedics during public health emergencies is needed in order to provide guidelines detailing professional obligations and responsibilities, as well as rights of the paramedic to decline to respond.

## References

- ACT Ambulance Service Union Collective Agreement** (2007 – 2010). Department of Justice and Community Safety, Canberra, Australian Capital Territory. Available from: <http://www.sharedservices.act.gov.au/docs/agreements/>
- 
- ACT Health Management Plan for Pandemic Influenza** (2007), Department of Health, Australian Capital Territory Government, Canberra, ACT. Available from: <http://www.health.act.gov.au/c/health?a=da&did=10106839>
- 
- Ambulance Services Act**, 1990, NSW [Amended 2006 March 17]. Available from <http://www.austlii.edu.au/>
- 
- Ambulance Service Act**, 1991. QLD [Amended 2008, March 20]. Available from <http://www.austlii.edu.au/>
- 
- Ambulance Service Act**, 1992. SA [Amended 2005, July 14]. Available from: <http://www.austlii.edu.au/>
- 
- Ambulance Service Act**, 1982. TAS [Amended 1997, February 1]. Available from <http://www.austlii.edu.au/>
- 
- American Medical Association: Physician Obligation in Disaster Preparedness and Response.** [http://www.ama-assn.org/apps/pf\\_new/pf\\_online?fn=browse&doc=policyfiles/HnE/E-9.067.HTM](http://www.ama-assn.org/apps/pf_new/pf_online?fn=browse&doc=policyfiles/HnE/E-9.067.HTM)
- 
- Australian Health Management Plan for Pandemic Influenza** (2006), Department of Health and Ageing, Australian Government. Available from: <http://www.health.gov.au>
- 
- Bradsher K.** *The SARS Epidemic: The Patient; Hong Kong Doctor's Ordeal as Patient with New Disease.* The New York Times 2003;26 April:A1
- 
- Canadian Medical Association (CMA): CMA Code of Ethics,** Ottawa 2004
- 
- Centers for Disease Control (CDC).** *Update: US Public Health Service Guidelines for the Management of Occupational Exposures to HBV, HCV and HIV and Recommendations for Postexposure Prophylaxis.* MMWR 2001;50(RR11):1-42
- 
- Chua S, Cheung V, Cheung C.** *Stress and psychological impact on SARS patients and high-risk health care workers during SARS outbreak.* Hong Kong: Department of Psychiatry, University of Hong Kong, 2004. Available at: <http://www.web.hku.hk:8400/facmed/press/-07-20/presentation.pdf> Accessed 3 May, 2010
- 
- Council of Ambulance Authorities.** *CAA Position Statement: Council of Ambulance Authorities views on the regulation of pre-hospital care providers.* Adelaide: Council of Ambulance Authorities Inc.; 2008.
- 
- Department of Health and Human Services.** *Planning Considerations for Health and Medical Services Response to Nuclear/Biological/Chemical Terrorism.* Washington DC, US 1996
- 
- Disasters Act**, 2008, NT [amended 2008 July 1]. Available from: <http://www.austlii.edu.au/>

**Disaster Management Act**, 2003, QLD [amended 2008 March 1]. Available from: <http://www.austlii.edu.au/>

**Emergencies Act**, 2004. ACT [Amended 2008, August 26]. Available from: <http://www.austlii.edu.au/>

**Emergency Management Act**, 2004. SA [Amended 2004, November 25]. Available from: <http://www.austlii.edu.au/>

**Emergency Management Act**, 2006. TAS [Amended 2006, September 20]. Available from: <http://www.austlii.edu.au/>

**Emergency Management Act**, 2005. WA [Amended 2007, February 1]. Available from: <http://www.austlii.edu.au/>

**Emergency Management Manual Victoria**, 2008. Offices of the Emergency Services Commissioner, Melbourne, Victoria. Available from: <http://www.oesc.vic.gov.au/wps/wcm/connect/OESC/>

**Entralgo P, Bloom S, Purtilo R.** Professional-Patient Relationship. In: Reich W (Ed) *Encyclopaedia of Bioethics*. New York: Simon and Schuster 1995

**Fire and Emergency Services Act**, 2005. SA [Amended 2008, April 17]. Available from: <http://www.austlii.edu.au/>

**Fire and Emergency Services Authority Act**, 1998. WA [Amended 2009, May 22]. Available from: <http://www.austlii.edu.au/>

**Health Services Act**, 1997. NSW [Amended 2009, May 13]. Available from: <http://www.austlii.edu.au/>

**Health Act**, 1958. VIC [Amended 2009, January 1]. Available from: <http://www.austlii.edu.au/>

**Health Act**, 1911. WA [Amended 2009, May 22]. Available from: <http://www.austlii.edu.au/>

**Health Act**, 1997. TAS [Amended 1997 June 19]. Available from: <http://www.austlii.edu.au/>

**Health Care Act**, 2008. SA [Amended 2008, July 1]. Available from: <http://www.austlii.edu.au/>

**Hooke WH (Ed).** *Public Health Risks of Disasters: Communication, Infrastructure and Preparedness: Workshop Summary*. The National Academy Press, Washington DC, 2001

**Huber SJ, Wynia MK.** When Pestilence Prevails...Physician Responsibilities in Epidemics. *The American Journal of Bioethics* 2004;4(1):W5-W11

**Human Rights Act**, 2004, ACT [amended 2009 February 2]. Available from: <http://www.austlii.edu.au/>

**Koh, D, Lim MK, Chia SE et al.** Risk perception and impact of SARS on work and personal lives of healthcare workers in Singapore – what care we learn? *Medical Care* 2005;43:676-682

**Maguire BJ, Dean S, Bissell RA et al.** Epidemic and bioterrorism preparation among emergency medical services systems. *Prehospital and Disaster Medicine* 2007;22(3):237-242

**Maunder R.** *The Experience of the 2003 SARS Outbreak as a Traumatic Stress among Frontline Healthcare Workers in Toronto: Lessons Learned*. *Phil Trans R Soc London* 2004;359:1117-1125

**McCann TV.** Willingness to provide care and treatment for patients with HIV/AIDS.

**Journal of Advanced Nursing**. 1997;25:1033-1039

**Metropolitan Ambulance Emergency Response Plan Overview**, 2007 [amended 2007 March]. *Ambulance Victoria*. Available from [www.ambulance.vic.gov.au/](http://www.ambulance.vic.gov.au/)

**National Health Act 1953**. 2009 [amended 2009 May 26]. Available from: <http://www.austlii.edu.au/>

**National Health Security Act**, 2007, Commonwealth of Australia [2007 September 28]. Available from: <http://www.comlaw.gov.au/>

**New South Wales State Disaster Plan (Displan)**, 2006, *Emergency Management*, NSW Government. Available from <http://www.emergency.nsw.gov.au/plans/displan> [accessed 2009 June 19].

**Notifiable Disease Act**, 1999, NT [amended 1999 April 7]. Available from: <http://www.austlii.edu.au/>

**NSW Healthplan**, 2008 (version 3.4), *NSW Health Counter Disaster Uni*, NSW Government. Available from: <http://www.emergency.nsw.gov.au/home.html> [accessed 2009 June 19].

**NSW Health Interim Influenza Pandemic Action Plan**, 2005, *Department of Health*, NSW Government. Available from: <http://www.health.nsw.gov.au/> [accessed 2009 February 4].

**O'Meara P.** Paramedics Marching Toward Professionalism (Guest Editorial). *Journal of Emergency Primary Health Care (JEPHC)* 2009;7(10):Article Number 990339

**Public Health Act**, 2005, QLD [amended 2008 July 1]. Available from: <http://www.austlii.edu.au/>

**Public Health Act**, 1997, ACT [amended 2009 February 14]. Available from: <http://www.austlii.edu.au/>

**Quarantine Act**, 1908, Commonwealth of Australia [Amended 2008 September 28]. Available from: <http://www.austlii.edu.au/>

**Queensland Health Disaster Plan**, 2008. *Queensland Health*, QLD Government. Available from: <http://www.health.qld.gov.au/emergtrans/> [accessed on 2009 June 18]

**Reilly B, Herp MV.** SARS and Carlos Urbani. *New England Journal of Medicine* 2003;348(20):1951-1952

**Ruderman C, Tracy CS, Bensimon CM et al.** On Pandemics and the Duty to Care: Whose Duty? Who Cares? *BMC Medical Ethics* 2006;7(5)

**Sepkowitz K.** *Occupationally Acquired Infections in Health Care Workers Part II*. *Annals of Internal Medicine* 1996;120(1):71-79

**Sheather R.** *Professionalisation.* In: O'Meara P, Gribich C, eds. *Paramedics in Australia: Contemporary challenges of practice.* First ed. Sydney: Pearson Education Australia; 2009:62-83.

**Silverman A, Simor A, Loufty MR.** *Toronto emergency medical services and SARS.*

**Emerging Infectious Diseases,** 2004;10(9):1688-1689

**Singer PA, Benatar Sr, Bernstein M et al.** *Ethics and SARS: Lessons from Toronto.* *BMJ* 2003;327:1342-1344

**State Emergency and Rescue Management Act,** 1989. NSW [amended 2007 January 3].

**State Emergency Services Act,** 1987. SA [Repealed by Sch 6 cl 13(c) of Fire and Emergency Services Act 2005 on 2005 October 1]. Available from <http://www.legislation.sa.gov.au/>

**State Health Emergency Response Plan (SHERP),** Health Displan Victoria, 2006, Department of Human Services, Melbourne Victoria. Available from: [http://www.dhs.vic.gov.au/emergency/health\\_displan](http://www.dhs.vic.gov.au/emergency/health_displan)

**State Service Act,** 2000, TAS [2000 December 20]. Available from: <http://www.austlii.edu.au/>

**Stein BD, Tanielian TL, Eisenman DP et al.** *Emotional and behavioural consequences of bioterrorism: Planning a public health response.* *Milbank Q* 2004;82(3):413-455

**Tasmanian Health Action Plan for Pandemic Influenza** (2008), Department of Premier and Cabinet, State Government of Tasmania, Hobart. Available from: <http://www.pandemic.tas.gov.au>

**Verbeek PR, McClelland IW, Silverman AC, Burgess RJ.** *Loss of paramedic availability in an urban emergency medical services system during a severe acute respiratory syndrome outbreak.* *Academic Emergency Medicine* 2004;11(9):973-97

**Victorian Ambulance Service Act,** 1986, VIC. [amended 2007 September 7]. Available from: <http://www.austlii.edu.au/>

**Victorian Emergency Management Act,** 1986, VIC. [amended 2008 May 1]. Available from: <http://www.austlii.edu.au/>

**Victorian Health Management Plan for Pandemic Influenza,** 2007. Department of Human Services, Melbourne, Victoria. Available from: [http://www.health.vic.gov.au/ideas/regulations/vic\\_influenza](http://www.health.vic.gov.au/ideas/regulations/vic_influenza)

**World Health Organisation.** *WHO Consensus Document on the Epidemiology of Severe Acute Respiratory Syndrome (SARS).* Geneva: WHO; October 17, 2003

## About the authors

**Dr Erin Smith** is a Senior Lecturer in the Department of Community Emergency Health and Paramedic Practice at Monash University and Course Coordinator for the Master of Emergency Health (Disaster Health and Emergency Preparedness Stream).

**Carly Woodd** and **Simon Jensen** are Paramedics with Ambulance Victoria.

**Frederick 'Skip' Burkle Jr** is a Professor at the Department of Community Emergency Health and Paramedic Practice at Monash University, and member of the Harvard Humanitarian Initiative, and Vice President of the World Association for Disaster and Emergency Medicine.

**Frank Archer** is a Professor, Head of the Department of Community Emergency Health and Paramedic Practice at Monash University, and Vice President of the World Association for Disaster and Emergency Medicine.

