La déontologie en des temps de maladies contagieuses : une perspective relationnelle

Wendy Austin

En des temps de maladies contagieuses, le personnel infirmier joue un rôle important et fait face à des peurs, des dangers et des exigences particulières. Ces défis nécessitent l'apport d'un code déontologique qui doit être élaboré puis compris. S'appuyant sur le cadre de travail de Callahan pour articuler une pensée déontologique et sur la notion de «préoccupations» inhérentes à la vie moderne articulée par Taylor, l'auteure cerne certains défis et défend le point de vue selon lequel l'approche déontologique actuelle en situation de pandémie, qui s'appuie sur le raisonnement moral, ne peut guider les infirmières et les infirmiers dans leurs actions déontologiques. Elle propose au personnel infirmier devant choisir un plan d'action la déontologie relationnelle comme solution de rechange viable. Cette approche fait de la déontologie une composante explicite des liens et de l'engagement mutuel et reconnaît le contexte comme un élément important dans le processus décisionnel déontologique.

Mots clés: déontologie, pandémie, personnel infirmier, déontologie relationnelle

Ethics in a Time of Contagion: A Relational Perspective

Wendy Austin

In times of contagion, the key role of nurses brings fears, dangers, and unique demands. The ethics of such challenges need to be explored and understood. Using Callahan's framework for thinking ethically and Taylor's "worries" of modern life, the author elucidates some of the challenges and then argues that the current approach to pandemic ethics, with its reliance on moral reasoning, is insufficient to guide nurses' ethical actions. Relational ethics, which explicitly situates ethics within relationships and our commitment to one another, and which recognizes that context matters in ethical decision–making, is offered as a viable alternative for nurses in considering how to respond.

Keywords: ethics, pandemic, nurses, relational ethics, pandemic planning

Times of contagion are extraordinary times: surreal, chaotic, transformative. This is revealed by events in both the distant and the recent past. Revealed, as well, is the fact that in such times nurses play a substantive role. Groft's (2006) claim, in the context of the 1918 pandemic, that "everything depends on good nursing" (p. 19) is not hyperbole. Nurses' key role brings fears, dangers, and demands that are particular to outbreaks of contagious or infectious disease. The ethics of these onerous times must be explored before they are upon us.

I argue in this article that our current approach to "pandemic ethics," with its reliance on moral reasoning (e.g., principlism), will be insufficient to guide nurses' actions. Relational ethics, which explicitly situates *How should I act?* within relationships and our commitment to one another, and which recognizes that context matters in decision-making, has been recommended as a more viable alternative. It is said that ethical thinking requires three qualities: perceptiveness about one's society and its values/beliefs, self-knowledge, and knowledge of the traditions of ethics (Callahan, 1999). Using these as a framework, I review the ethical concerns related to a pandemic and make the case for a relational ethics approach.

¹ A pandemic is a global epidemic. The contagious disease is usually new to humans, has dire consequences, and is spreading rapidly.

Society in Times of Contagion

Past Pandemics

History allows us to glimpse the unfolding (or unravelling) of ethical life in times of contagion. There are records of plagues dating back to 541 BC: "During this time there was a pestilence, by which the whole human race came to be nearly annihilated" (Gottfried, 1983, p. 10). Memory of such plagues can be found outside of history books, too, such as in children's playground songs: Ring around the rosy, pocket full of poesy/ Ashes, ashes, we all fall down. The bubonic plague and its deadly potency are nevertheless difficult for us to imagine. Within a span of 4 years (1347-51), the plague killed over 25% of the European population (Gottfried, 1983). Petrarch wrote, "Oh happy posterity who will not experience such abysmal woe — and who will look upon our testimony as fable" (cited in Gottfried, 1983, p. xiii). The abysmal woe of a pandemic was nevertheless experienced early in the 20th century (1918–19), when the Spanish influenza killed 20 million — with nearly as many Canadians dying of this flu as died in World War I (O'Keefe & Macdonald, 2004).

With antibiotics and new biotechnologies, however, we came to believe that the world was at last free of such risk. In the 1960s the US Surgeon General announced that infectious diseases were no longer a threat (Selgelid, 2005). Landmarks like the eradication of smallpox in 1977 supported such optimism. By 1981, however, human immunodeficiency virus (HIV) shattered it (Sontag, 1989), and to date has killed over 27 million people (Joint United Nations Programme on HIV/Aids & World Health Organization, 2007). Other new agents (like the ebola and West Nile viruses) and old, familiar ones that we thought had been conquered (e.g., staphylococcus; tuberculosis bacilli) are emerging as serious threats. Severe acute respiratory syndrome (SARS) disabused Canadians of the notion that we were safe from contagious disease, protected by science, technology, and distance.

In fact the pendulum seems to have swung in the other direction. There is currently a sharp focus on the potential for an avian flu pandemic. The media have been saturated with it. Time and resources are being focused on this particular disease. In 2006 Prime Minister Harper allocated \$460 million to prepare for a bird flu pandemic, President Bush \$7.1 billion (Alberta, 2006). Although preparing for such a threat is sensible, radically heightening fears about a disease that may never be transmittable from human to human seems questionable. Fear makes people overreact. (During the anthrax scare of 2001, worried Americans submitted 600,000 specimens of white powder, including brownies with

powdered sugar, to laboratories for testing.²) Also, if people are needlessly frightened too early, real risk may be ignored when it does occur (McNeil, 2006, March 26).

Fear and Contagion

Boccaccio (1930) describes how fear affected people during Florence's plague, noting that "one citizen avoided another," that neighbours and relatives stayed away, that "brother abandoned brother," and even that "fathers and mothers refused to see and tend their children, as if they had not been theirs" (p. 4). Fear can induce us to act in ways that would be unfathomable at other times.

Taylor (2004) labels the way in which people imagine their social existence (i.e., their lives with others) as the "social imaginary." Shared in stories, myths, and images, the social imaginary informs our sense of the moral order. In a pandemic, it will have real consequences. One possible sign of our social imaginary is the fact that "zombies" are everywhere in popular culture: in movies, books, and games. Even zombie parties are fashionable (St. John, 2006). This phenomenon is explained by our anxieties related to terrorism and natural disasters and by zombies as the "embodiments of the would-be megaviruses" that "plague" us "in the wake of SARS, West Nile and bird flu scares" (McConvey, 2008). Zombies may represent the way that others, even loved ones, can become life-threatening. In the classic zombie movie Night of the Living Dead (Romero, 1968), in which zombie-ism is spread through contact with the infected, people hide away and everyday life comes to a halt. A chilling theme of zombie tales is the untrustworthiness of authorities. Their advice to the public is either hopelessly simplistic or deliberately misleading.³ Night of the Living Dead ends with the hero being shot in error by a rescue team. Our social imaginings and our actions are influenced by what is in the media⁴ — and by what is not.

The warning by former UN Secretary-General Kofi Annan about the catastrophic potential of biotechnology (e.g., genetic manipulation; viral research) has received little attention ("UN leader," 2007). Bans against biological warfare, existing since 1925, are largely disregarded

² In Alberta during the US anthrax scare, a friend's 80-year-old mother was stripped naked (and covered with a blanket) in the post office, as a response to the appearance of a powdery substance when another customer opened a letter.

³ This theme is evident in the feature films *Outbreak* (Peterson, 1995) and *12 Monkeys* (Gilliam, 1995) and the novels *The Andromeda Strain* (Crichton, 1969) and *Contagion* (Cook, 1996), whose plots are driven by the threat of a pandemic.

⁴ It was reported that the novel *The Cobra Event* (Preston, 1997) moved President Clinton to step up protective measures against bioterrorism (Broad & Miller, 1998).

(Riedel, 2004). The US biowarfare program (defensive since 1969) is brought to the public's attention only occasionally, such as when plague-infected mice went missing in New Jersey ("Mice missing," 2005). Smallpox is a potential bioweapon (US Department of Health and Human Services [USDHHS], 2005), and the United States has implemented a vaccination plan for health workers (Centers for Disease Control and Prevention, 2002). The bioweapons program of the former Soviet Union (e.g., gene manipulation of smallpox) is viewed as insecure (USDHHS, 2005). Media silence may be a potent indication of the true prevalence of disease. Most people die from acute respiratory infections, diarrhea, measles, or malaria — all curable — in addition to malnutrition. If the 1.2 million deaths each year from malaria occurred in the industrialized world, perhaps malaria would rate as much press as bird flu.

Preparation for a Pandemic

The planning for a pandemic is also influenced by what Taylor (1991) terms the "malaises of modernity" or the common "worries" of modern life (pp. 1-2): individualism, the primacy of instrumental reason, and loss of freedom. With individualism, there is a societal expectation of a personal right to determine how we live. This freedom, however, comes at a cost — a loss of higher purpose or, as Taylor puts it, a sense of "something worth dying for" (p. 4). In a pandemic, a focus on the self will make it difficult to think in the terms necessary for societal survival — what is best for the community — or to act on the basis of duty to others. Research indicates that at least 25% of health-care workers believe it is acceptable to not show up at their workplace in a pandemic (Ehrenstein, Hanses, & Salzberger, 2006; Hogg, Huston, Martin, & Soto, 2006; Koh et al., 2005; Tzeng & Yin, 2006). As well, many health-care workers are not being assured that pandemic arrangements will provide protection and support commensurate with the demands that will be made on them (Kotalik, 2005; Tzeng & Yin, 2006). The sense of commitment between individual and community seems weak.

The primacy of instrumental reasoning is worrisome, as it can place economic rewards at the forefront of criteria for success. According to Taylor (1991), "putting dollar assessments on human lives" is "grotesque" (p. 6). Nurses who contracted SARS during the outbreak in Toronto claim that protective requirements were prematurely lifted to remove a travel advisory that hurt tourism. These nurses have filed a suit against the Crown (*Abarquez v. Ontario*, 2005). Instrumental reasoning also privileges technological knowledge. Taylor argues that such privileging undercuts

⁵ In 1979 an anthrax epidemic occurred in the Soviet Union; in 1992 the government admitted that it had been caused by the accidental release of spores (Riedel, 2004).

nurses' compassionate and caring work. An emphasis on technology shapes pandemic planning in problematic ways. In the United States it has been argued that "the most glaring example of the country's lack of readiness for a pandemic" is a shortage of ventilators (McNeil, 2006, March 12). Against a declared need for 742,000 ventilators, only 110,000 are available (McNeil, 2006, March 12). Left unaddressed is the need for nursing care for the 720,000 people on ventilators. How can this level of intensive care be possible in a true pandemic? How can it be a priority? In pandemic planning, our fascination with technology is a not a strength.

Taylor's third worry is the loss of political freedom, wherein we no longer exercise our power as citizens but leave things to those in authority. Community deliberations are vital to a society's response to contagious disease, and nurses, given their expertise and expected role, must both instigate such deliberations and participate in shaping them. One nurse describes nurses' views of decisions made during the 2003 SARS outbreak:

Most of us felt, you know, the decisions were made up there, and we could understand them. We could agree with them, but we were the ones who had to live with them. And there was nobody who really came and asked us what that was like. There was some — it wasn't like there was nothing — but there wasn't a sense of being listened to the way that we needed to be supported. (Bell, Hyland, DePellegrin, Bernstein, & Martin, 2004, p. 36)

For the sake of both the public and themselves, nurses need to exercise their right to significant input at all levels of pandemic planning. This is easier said than done. Research shows that many nurses are already overburdened by and uncertain of their responsibilities (Peter, Macfarlane, & O'Brien-Pallas, 2004) and that they find ethical activism particularly difficult in unreceptive environments — precisely where it is most needed (Dodd, Janssson, Brown-Saltzman, Shirk, & Wunch, 2004). Finding our voice seems crucial, however. Nurses' experiences during the SARS outbreak show that systemic health-care policies and funding must be addressed (Bergeron, Cameron, Armstrong-Stassen, & Paré, 2006). Nurses' knowledge and perspectives are essential to doing so.

Our past offers important clues to our future. Knowledge about our past can enable us to make the significant shifts in thinking that are required in a pandemic response. Recognition of the role of social imaginings and of the vulnerabilities of our society will allow us to better shape our response. We must also consider the ethical challenges that individual nurses will face. We can do so by looking at the recent experiences of nurses.

Self-Knowledge: Nursing in a Time of Contagion

The 2003 SARS outbreak has been described thoughtfully by the health-care workers who lived through it (Godkin & Markwell, 2003; Hall et al., 2003; Hsin & Macer, 2004; Leung & Ooi, 2003; Maunder et al., 2003). Nurses have referred to it as a "wake-up call," a reminder to be prepared for the unknown (Bergeron et al., 2006). SARS has been likened to a "dormant volcano erupting in the dead of night" (Bernstein & Hawryluck, 2003, p. 269), with health-care workers being called upon to rush towards the burning mountain in spite of any urge to run the other way. Many became ill; some died. Nurses were called heroes:

In the face of fear and isolation, nurses demonstrated incredible commitment to patients, to the healthcare system and to the profession. Even though they recognized personal risk, their duty to care took priority. (Campbell, 2006)

Although caught off-guard and unprepared by experience, nurses, like other health-care workers, rallied and responded. This involved the physical discomfort of tight-fitting masks, goggles, double gloves, and gowns. It involved the emotional discomfort of isolating patients from families and making tough decisions about resources. It required a reversal of normal responses: decreasing contact with patients and taking precautions before responding to a patient's urgent need (Bernstein et al., 2003). As SARS progressed, it meant watching colleagues succumb to the disease. "I started having more nightmares re being yelled at by clients and managers," said one nurse. "I developed aches and pains" (Bergeron et al., 2006, p. 50). A physician told the SARS Commission that she "got up each morning, shaky and nauseated." She would vomit and then leave for work. Once home again, she would avoid her family for fear of infecting them (Godkin & Markwell, 2003). Though heroes, health-care workers were stigmatized and shunned as potential carriers of SARS (Leung & Ooi, 2003).

Some professionals did abandon their duties because of the risk to themselves or their families, and were permanently dismissed. Others abandoned their profession (Ruderman et al., 2006). In a Taipei hospital, 120 nurses (8%) resigned, many at their families' insistence. Half of them changed their minds, withdrew their resignation, and returned to work (Chong et al, 2004).

Fears were exacerbated by uncertainty about the dangers of SARS and the precautions being taken (Maunder et al., 2003). Those in authority needed to be trusted, but they were facing an entirely new situation themselves. What sustained many was a sense of solidarity with others. Staff described needing contact with one another and being helped by supports such as a drop-in lounge and informal telephone and e-mail

networks. "When facing such a crisis it is crucial to feel that one is not alone" (Maunder et al., 2003, p. 1251). Connie Leroux, a nurse who contracted SARS at a Toronto hospital, was asked how she might respond to an avian flu pandemic:

My initial response when I think about [an avian influenza] is that I'd like to run away from it all and protect my family, and that's the sense I get from my colleagues. However, I also have a very strong sense of responsibility [to] our community and our patients, so I'm not sure how many of us would actually leave, including myself. (Spicer, 2006)

Professional and personal demands will compete in times of contagion. The need to protect and care for loved ones will vie with professional commitments. Can ethics theories teach nurses such as Connie Leroux how to choose, how to act?

Bioethics

Bioethics is focused on ethical action related to the scientific and technological advancements of biomedicine (Callahan, 1999). Its agenda has not included infectious disease (Tausig, Selgelid, Subedi, & Subedi, 2006). The dominant approach, principlism, is grounded in a belief that ethical reasoning should be objective (unemotional) and independent of context. Although feminist ethics and the ethics of care have challenged this view, for the most part bioethics remains "formalistic, procedural, disembodied and universalistic" (López, 2004, p. 878). This limited perspective has everyday consequences. Nurses' ethical issues that do not pertain to the principled resolution of moral dilemmas go unaddressed, and even unrecognized (Chambliss, 1996). Some nurse ethicists, such as Peter and Liaschenko (2003), find "bioethical theory to be essentially irrelevant" to their efforts as nurse ethicists (p. 259).

Sociologists have argued that bioethics lacks "a practical understanding of how moral values and ethical behaviours are embodied and lived by social agents" (López, 2004, p. 878). Individualism is its cardinal value (Tausig et al., 2006). Of the primary principles of bioethics — nonmaleficence, beneficence, respect for autonomy, and justice — autonomy trumps all others (Callahan, 1999). The notion of the autonomous person not only minimizes the influence of historical, familial, social, and cultural influences on every individual, but belies our human interdependence (Fox, 1999). Such an emphasis negates the reality that ethics is fundamentally about our collective life. In addition, delineating justice as fairness (each of us should be able to follow our dreams with equal access to health resources) diminishes the ethical import of solidarity and our shared interests and responsibilities. The consequences of such a limited perspective could be dire in the extraordinary event of a pandemic.

Currently, our ethical guides to pandemic planning, such as that of the University of Toronto's Joint Centre for Bioethics (JCB) (2005), involve the identification of guiding values. This is highly useful. However, we need an approach to ethics that will enable us to also address difficulties related to enacting such values, including contextual factors related to power and politics. For instance, the duty of health-care workers to provide care is identified as a key issue in the JCB report on pandemic planning. The JCB advises that professional colleges and associations should, through codes of ethics, outline the responsibilities of their members in terms of response to infectious disease (and that those in authority should ensure the protection of health-care workers, including through disability insurance and death benefits). For nurses, such expectations are stipulated to some degree. The first element in the International Council of Nurses (2006) code of ethics is nurses' responsibility to attend to those requiring nursing care. Also, the ICN's position on the AIDS pandemic explicitly acknowledges nurses' ethical duty to provide care (1989, 2001). The Canadian Nurses Association (2002) code of ethics addresses not only nurses' commitment to safe, competent, and ethical care but also their ability to make their own moral choices, which may be influenced by external factors. 6 The idea of duty of care is considered by some, such as the ethicist Daniel Sokol (2006), as vague, heavily influenced by context, and perhaps ethically dangerous. According to Sokol, the limits of duty should be a function of normal risk, and "exotic, highly virulent disease" challenges these limits (p. 1239). If the risk is great, refusal to respond is not a moral wrong, Sokol says, no matter how grave the consequences for patients. He believes that patients and the community should expect that professionals will have competing obligations to community and family. Although Sokol is referring specifically to physicians, this type of nuanced approach to duty of care at least opens up a discussion on the limits of responsibility in times of contagion. Paradoxically, he finds that being a nurse implicitly means consenting to a range of risks. His assumption about nurses' duty is revealing: it exemplifies how ethical issues embedded in power and systemic politics go unrecognized within bioethical principlism.

As argued by Daniels (1991), a bioethicist, the moral pressure exerted by professional organizations to affirm the duty of care must be sensitive to risk. The fear of contracting or transmitting a lethal illness is relevant to the discussion (Ehrenstein et al., 2006). "I feared exposing myself or my child to SARS," a nurse confesses. "I thought about what might happen to him if I died. Who would care for him?" (Bergeron et al.,

⁶ As part of its Ethics in Practice series, the CNA is now developing a module on nurses' ethical considerations in an emergency or pandemic.

2006, p. 49). The effect of such fear on duty of care needs to be considered — something that a strictly principled approach to ethical action does not encourage.

Relational Ethics

Relational ethics explicitly situates ethical action in relationship (Austin, Bergum, & Dossetor, 2003; Bergum & Dossetor, 2005) and calls attention to how we engage and connect with one another (professional/patient, professional/professional, professional/community). It is argued that, while codes of practice are helpful and necessary, they are not sufficient. Openness to others and their situation is crucial to ethical action. This is reflected in a core element of relational ethics, "mutual respect," in which the power dynamics that shape interpersonal and societal relationships in a given situation are considered. An individual or group may be severely disadvantaged when decisions are being made: their voice may not be heard, their needs not given priority. Relational ethics points to such vulnerability. Genuine dialogue (i.e., conversation in which a sincere effort is made to hear and appreciate the perspective of those involved) is valued as a prime means of addressing the question *How should I act?*

Called into question is the notion of the autonomous person, including the autonomous professional. As MacDonald (2002) argues, we need to acknowledge that individual professionals are not truly free to act as they wish. Professional power is conferred and shaped by social structures and relationships, including pressure by institutional authorities, other professions, and the public. Acknowledgement of the influence of accountability and shared responsibility is central to understanding the moral habitability (or inhabitability) of health-care environments (Austin, 2007), as is acknowledgement of the professional as a person with family and community ties and obligations.

Acknowledged, too, is the role of emotion in rationality and the fact that we are embodied beings. Our ethical decisions not only are informed by our emotions but affect us more than intellectually (Doka, Rushton, & Thorstenson, 1994). By framing ethical issues, including duty of care, in principled reasoning alone, we fail to give the quandaries of nurses and other health-care workers the attention they need for proper resolution. Despite protocols and international pandemic response guidelines, nurses may feel professionally and personally anxious and ill-prepared to cope with the demands that they will face. They may experience moral distress — a risk in caring work, particularly if resources are scarce. It may be wise to encourage them to discuss such concerns instead of remaining silent and alone in distress. Further, in a relational ethics approach, uncertainty is seen as inherent to ethical questioning.

The conviction that one should always know ahead of time how to act ethically is viewed with scepticism. Legitimation of such doubt can help to lessen nurses' self-doubts about moral competency.

In a time of contagion, what would a relational ethics approach look like? What would it mean to nurses like Connie Leroux, who are wondering how they might respond should a disease like avian flu strike their community? Relational ethics is primarily a means of starting to think about issues that are often ignored. For instance, Connie's recognition of her uncertainty — that she may feel compelled both to run away in order to protect her family and to act responsibly as a nurse — is a starting point for dialogue. Her acknowledgement that fear will play a role is not a weakness; it can be a means of diminishing the behavioural impact of fear. Open dialogue about such uncertainty can raise important questions: What can communities do to make it possible for nurses to stay, to make the risks endurable during an epidemic (e.g., quality equipment, life insurance, a voice in policy decisions)? What strategies (e.g., provision of accessible, coordinated child and elder care) could help nurses and other health-care workers deal with their competing relational responsibilities (to parents, spouses, children, neighbours, other nurses)? The direction of the dialogue and the decisions taken will matter. Do these involve the people who will be most affected? Are the consultation and decision-making processes transparent? Is the sense of we are in this together being supported? And perhaps most important, is the raising of difficult questions (those for which there are no answers) viewed as necessary or as troublemaking? Tough but necessary questions might include the following: Are we focused on the wrong things — are we unable to imagine new, more appropriate ways of acting? Where is our thinking most vulnerable? As difficult as it may be, nurses will have to ensure that they participate in deliberations in a way that is congruent with their expertise and with the high degree of public trust in the nursing profession.

Relational ethics cannot provide a step-by-step guide to resolving ethical issues in a time of contagion. However, with its emphasis on interdependent relationships, on emotions as well as reason, and on the influence of contextual factors, it can provide a foundation, an "attitude" from which to approach the issues. It can help us to address the realities of practice and of life from a stance of caring, compassion, and commitment.

Albert Schweitzer (1949) believed that ethics goes only as far as our consideration for others. Without this consideration, we have only pseudo-ethics. He believed that each of us should, as much as the circumstances of our lives allow, be engaged with this responsibility. During a time of contagion, nurses' knowledge and skills and their professional

fidelity to their communities will place them in circumstances that are different from those of the average citizen. We need to pursue a thoughtful understanding of the ethical demands of such a time, in order to find the wisdom to do the right thing. We need to consider, in Schweitzer's words, what the circumstances of our lives will allow. Our answers and our actions will ultimately define the moral integrity of our individual selves and our discipline (Pellegrino, 1993).

References

- Abarquez v. Ontario. (2005). Court File No. 04-CV-262264CM3.
- Alberta, S. (2006, May 4). US considers border closing if bird flu strikes. *Edmonton Journal*, p. A4.
- Austin, W. (2007). The ethics of everyday practice: Healthcare communities as moral communities. *Advances in Nursing Science*, 30(1), 81–88.
- Austin, W., Bergum, V., & Dossetor, J. (2003). Relational ethics: An action ethic as foundation for health care. In In V. Tshudin (Ed.), *Approaches to ethics* (pp. 45–52). Woburn, MA: Butterworth-Heinemann.
- Bell, J. A. H., Hyland, S., DePellegrin, T., Bernstein, R. E. G., & Martin, D. K. (2004). SARS and hospital priority setting: A qualitative case evaluation. *BMC Health Service Research*, 4(36) (no pagination).
- Bergeron, S., Cameron, S., Armstrong-Stassen, M., & Paré, K. (2006). Diverse implications of a national health crisis: A qualitative exploration of community nurses' SARS experiences. *CJNR*, *38*(2), 42–54.
- Bergum, V., & Dossetor, J. (2005). *Relational ethics: The full meaning of respect.* Hagerstown, MD: University Publishing Group.
- Bernstein, M., & Hawryluck, L. (2003). Commentary. The immediate psychological and occupational impact of the 2003 SARS outbreak in a teaching hospital. *Critical Care*, 7(4), 269–271.
- Boccaccio, G. (1930). *The Decameron* (R. Aldington, Trans.). Garden City, NY: Garden City Publishing.
- Broad, W., & Miller, J. (1998, August 7). Germ defense plan in peril as its flaws are revealed. *New York Times*. Retrieved May 7, 2007, from http://query.nytimes.com/gst/fullpage.html?sec=health&res=9804E4D6133BF934A3575BC0A96E958260.
- Callahan, C. (1999). The social sciences and the task of bioethics. *Daedalus*, 128(4), 275–294.
- Campbell, A. (2006). Spring of fear: The SARS Commission. Toronto: Government of Ontario.
- Canadian Nurses Association. (2002). Code of ethics for registered nurses. Ottawa: Author.
- Centers for Disease Control and Prevention. (2002, December 2). *Protecting Americans: Smallpox vaccination program*. Retrieved May 7, 2007, from http://www.bt.cdc.gov/agent/smallpox/vaccination/vaccination-program-statement.asp.

- Chambliss, D. (1996). Beyond caring: Hospitals, nurses and the social organization of ethics. Chicago: University of Chicago Press.
- Chong, M-Y., Wang, W-C., Hsieh, W-C., Lee, C-Y., Chiu, N-M., Yeh, W-C., et al. (2004). Psychological impact of severe acute respiratory syndrome on health workers in a tertiary hospital. *British Journal of Psychiatry*, 185, 127–133.
- Cook, R. (1996). Contagion. New York: Berkley.
- Crichton, M. (1969). The Andromeda strain. New York: Ballantine.
- Daniels, N. (1991). Duty to treat or right to refuse? *Hastings Center Report*, 21(2), 36–46.
- Dodd, S. J., Jansson, B. S., Brown-Saltzman, K., Shirk, M., & Wunch, K. (2004). Expanding nurses' participation in ethics: An empirical examination of ethical activism and ethical assertiveness. *Nursing Ethics*, 11, 15–27.
- Doka, K., Rushton, C., & Thorstenson, T., (1994). Cargiver distress: If it so ethical, why does it feel so bad? Clinical Issues in Critical Care Nursing, 5(3), 346–352.
- Ehrenstein, B., Hanses, F., & Salzberger, B. (2006). Influenza pandemic and professional duty: Family or patients first? A survey of hospital employees. *BMC Public Health*, 6, 311. Retrieved May 7, 2007, from http://www.biomed.central.com/1471-2458-6-311.
- Fox, R. C. (1999). Is medical education asking too much of bioethics? *Deadalus*, 128(4), 1–25.
- Gilliam, T. (1995). 12 monkeys. West Hollywood, CA: Atlas Entertainment.
- Godkin, D., & Markwell, H. (2003). The duty to care of healthcare professionals: Ethical issues and guidelines for policy development. Retrieved April 8, 2006, from http://www.health.gov.on.ca/english/public/pub/ministry_reports/walker0 4/ethics_duty_care04.pdf.
- Gottfried, R. (1983). The black death: Natural and human disaster in Medieval Europe. New York: Free Press.
- Groft, J. (2006). Influenza: Everything good depends on nursing. *Canadian Nurse*, 102(3), 19–22.
- Hall, L., Angus, J., Peter, E., O'Brien-Pallas, L. Wynn, F., & Donner, G. (2003). World health: Media portrayal of nurses' perspectives and concerns in the SARS crisis in Toronto. *Journal of Nursing Scholarship*, 35(3), 211–216.
- Hsin, D., & Macer, D. (2004). Heroes of SARS: Professional roles and ethics of health care workers. *Journal of Infection*, 49, 210–215.
- Hogg, W., Huston, P., Martin, C., & Soto, E. (2006). Enhancing public health response to respiratory epidemics: Are family physicians ready and willing to help? *Canadian Family Physician*, 52(10), 1254–1260.
- International Council of Nurses. (1989, 2001). Position statement: Acquired immuno-deficiency virus. Retrieved May 7, 2007, from http://www.icn.ch/psAIDS00.
- International Council of Nurses. (2006). *The ICN code of ethics for nurses.* Geneva: Author.
- Joint Centre for Bioethics. (2005). Stand on guard for thee: Ethical considerations in preparedness planning for pandemic influenza. Toronto: University of Toronto.

- Joint United Nations Programme on HIV/Aids & World Health Organization. (2007). 2007 AIDS epidemic outlook. Geneva: Author.
- Koh, D., Lim, M. K., Chia, S. E., Ko, S. M., Qian, F., Ng, V., et al. (2005). Risk perception and impact of severe acute respiratory syndrome (SARS) on work and personal lives of healthcare workers in Singapore: What can we learn? *Medical Care*, 43(7), 676–682.
- Kotalik, J. (2005). Preparing for an influenza pandemic: Ethical issues. *Bioethics*, 19(4), 422–431.
- Leung, P. C., & Ooi, E. E. (Eds.). (2003). SARS war: Combating the disease. Hackensack, NJ: World Scientific.
- López, J. (2004). How sociology can save bioethics...maybe. *Sociology of Health and Illness*, 26(7), 875–896.
- MacDonald, C. (2002). Relational professional autonomy. Cambridge Quarterly of Healthcare Ethics, 11, 282–289.
- Maunder, R., Hunter, J., Vincent, L., Bennett, J., Peladeau, N., Leszcz, M., et al. (2003). The immediate psychological and occupational impact of the 2003 SARS outbreak in a teaching hospital. *Canadian Medical Association Journal*, 168(10), 1245–1251.
- McConvey, J. (2008, February 15). You can't keep a corpse down: History of genre. *National Post* (Toronto), p. B3.
- McNeil, D. Jr. (2006, March 12). Ventilators in short supply in event of bird flu pandemic. *New Year Times*, p. 20YR.
- McNeil, D. Jr. (2006, March 26). When a disease loses its most potent ally, fear. New York Times, p. 1, 4WK.
- Mice infected with bubonic plague missing. (2005, September 15). *Breitbart.com* [online]. Retrieved November 3, 2008, from http://www.breitbart.com/article.php?id=D8CKQJFO1&show_article=1.
- O'Keefe, E., & Macdonald, I. (2004). Dr Fred and the Spanish lady: Fighting the killer flu. Surrey, BC: Heritage Home Publishing.
- Pellegrino, E. (1993). Societal duty and moral complicity: The physician's dilemma of divided loyalty. *International Journal of Law and Psychiatry*, 16(3/4), 371–391.
- Peter, E., & Liaschenko, J. (2003). Whose morality is it anyway? Thoughts on the work of Margaret Urban Walker. *Nursing Philosophy*, 4, 259–262.
- Peter, E., Macfarlane, A., & O'Brien-Pallas, L. (2004). Analysis of the moral habitability of the nursing work environment. *Journal of Advanced Nursing*, 47, 364–365.
- Peterson, W. (1995). Outbreak. Los Angeles: Punch Productions.
- Preston, R. (1997). The cobra event. Toronto: Random House.
- Riedel, S. (2004). Biological warfare and bioterrorism: A historical review. *Baylor University Medical Center Proceedings*, 17(4), 400–406.
- Romero, G. (1968). Night of the living dead. Pittsburgh: Image Ten.
- Ruderman, C., Tracy, C. S., Bensimon, C., Bernstein, M., Hawryluck, L., Shaul, R., et al. (2006). On pandemics and the duty to care: Whose duty? Who cares? *BMC Medical Ethics*, 7(5). Retrieved May 7, 2007, from http://www.biomedcentral.com/1471-2458-6-311.
- Schweitzer, A. (1949). Civilization and ethics. New York: Macmillan.

Wendy Austin

- Selgelid, M. (2005). Ethics and infectious disease. Bioethics, 19(3), 272-289.
- Sokol, D. (2006). Virulent epidemics and scope of healthcare workers: Duty of care. *Emerging Infectious Diseases*, 12(8), 1238–1241.
- Sontag, S. (1989). AIDS and its metaphors. New York: Anchor.
- Spicer, J. (2006, March 29). SARS prepares Toronto for bird flu. *redOrbit* [online]. Retrieved November 3, 2008, from http://www.redorbit.com/news/health/448453/sars_prepares_toronto_for_bird_flu/.
- St. John, W. (2006, March 26). Market for zombies? It's undead (aaaahhh!). *New York Times*, ST, p. 1.
- Tausig, M., Selgelid, M., Subedi, S., & Subedi, J. (2006). Taking sociology seriously: A new approach to the bioethical problems of infectious disease. *Sociology of Health and Illness*, 28(2), 6, 838–849.
- Taylor, C. (1991). *The ethics of authenticity.* Cambridge, MA: Harvard University Press.
- Taylor, C. (2004). Modern social imaginaries. London: Duke University Press.
- Tzeng, H-M., & Yin, C-Y. (2006). Nurses' fears and professional obligations concerning possible human-to-human avian flu. *Nursing Ethics*, 13(5), 455–470.
- UN leader urges biotech safeguards. (2007, November 18). New York Times, International section, p. 18.
- US Department of Health and Human Services. (2005). *Terrorism and other public health emergencies: A reference guide for media*. Retrieved May 7, 2007, from http://www.hhs.gov/emergency/mediaguide/PDF/.

Author's Note

Comments or queries may be directed to Wendy Austin, John Dossetor Health Ethics Centre and Faculty of Nursing, University of Alberta, 5–16 University Extension Centre, 8303–112th Street NW, Edmonton, Alberta T6G 2T4 Canada. Telephone: 780.492.5250. Fax: 780.492.0673. E-mail: waustin@ualberta.ca.

Wendy Austin, RN, MEd (Counselling), PhD, is Professor and Canada Research Chair, Relational Ethics in Health Care, John Dossetor Health Ethics Centre and Faculty of Nursing, University of Alberta, Edmonton, Canada.