EDITORIAL

Hospital infection control ethics: A neglected subject

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Infection Prevention and Control (IPC) is an important key performance indicator for a hospital. In developed countries, 4-8% of patients acquire hospital-acquired infections (HAIs).[1] The transmission of drug-resistant bacteria, especially the "superbugs," can lead to HAIs, prolonging hospital stays, increasing morbidity, and raising mortality.[2,3] The treatment of these drug-resistant superbugs also places an additional financial burden on the hospital budget. The story of the "Eyam Plague" is a well-known example of infection transmission ethics, where the entire village resorted to self-quarantine.[4] Similarly, during the recent COVID-19 pandemic, many ethical issues were raised and published regarding quarantine and isolation facilities, a racist approach toward Asian and African regions, and vaccination prioritization.[5]

Medical ethics encompasses three domains: 1) Clinical ethics, 2) Research ethics, and 3) Medical education ethics. However, very little is known about ethics and ethical issues related to these three domains in our hospitals. IPC ethics belong to the clinical ethics domain. The four basic principles of ethics are autonomy, beneficence, non-maleficence, and justice.[6] On one hand, there is debate on implementing and respecting a patient's autonomy and self-respect (deontological approach), while on the other, scholars and critics argue that we should not compromise the health of others by respecting one's (patient's) autonomy (consequentialist approach).

Examples of some common ethical issues clinicians and infection control practitioners encounter in hospitals are:

1. Should a patient colonized with a multi- or extensively drug-resistant organism, such as methicillin-resistant *Staphylococcus aureus* (MRSA), colistin- or carbapenem-resistant *Klebsiella pneumoniae* (KP), or vancomycin-resistant *Enterococcus* (VRE), be placed in an isolation room?
2. Should the names of healthcare workers (HCWs) colonized with MRSA be reported to administration, thereby restricting them from active duty or sending them off duty for three to five days? This could lead to social stigma, mental distress, and sometimes pay deductions.
3. Should clinicians and family members be enforced to wear proper personal protective equipment (PPE) before entering an intensive care unit or isolation room? This could breach personal freedom. Studies have shown that strictly enforcing this practice led to a decrease in the number of visits by clinicians, thus compromising patient care.
4. Should access to broad-spectrum antibiotics be restricted for clinicians to prevent drug resistance, thus restricting their freedom of choice?

All of the above scenarios and ethical issues share a common question: does the risk of enforcing an act outweigh the benefits to patients? And second, who determines this notion of risk-benefit analysis, and on what evidence? For example, in scenario 1, strict IPC measures may effectively control the transmission of drug-resistant organisms, but studies have shown that these measures also have negative effects on the health of carriers.[7,8] Similarly, a colonized patient's planned surgery may be postponed due to colonization, thus this patient must bear extra costs for antibiotics, an additional visit for surgery, and mental distress.

There is a dire need for healthcare workers, especially those involved in IPC activities, to understand the ethics of IPC and the challenges encountered. This can only be achieved through regular awareness, training, and courses on medical ethics. There should be an ethical framework in hospitals, which can guide a fair, transparent, ethical and risk-benefit analysis-based IPC decisions. Efforts should be made to develop this ethical framework at the national level as well.

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