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ORIGINAL ARTICLE

Moral injury and the COVID-19 pandemic: A philosophical viewpoint



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KEYWORDS

COVID-19;
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Summary

Introduction. — Much has changed in healthcare during the coronavirus disease (COVID)-19 pandemic. Medicine, a profession of traditional principles and virtues, has faced unprecedented challenges in the light of scarce and unequal distribution of ventilators, testing, and personal protective equipment. Healthcare workers have been- and are increasingly likely to be- forced into situations that require difficult decision making under life-and-death conditions. Concepts of “medical necessity” and “maximum benefit” challenge healthcare systems that already struggle to manage unequal treatment and access to services, giving rise to moral distress and moral injury on the front lines.

Methods. — This article focuses on moral injury in the context of coronavirus disease (COVID)-19 pandemic. I review recent literature to highlight the psychological impact of many morally-injurious events that have been reported during the COVID-19 pandemic. With the help of a clinical vignette, I point out how healthcare systems adopt many utilitarian policies in times of excessive healthcare burden. A viewpoint is offered that many morally injurious events happen when healthcare workers, traditionally practicing Kantian and virtue ethics, are forced to follow utilitarian policies of healthcare system.

Conclusion. — One form of moral injury may arise from inherent conflicts between individual deontological moral judgments and organizational utilitarian moral judgments. More research is needed to validate the philosophical viewpoint as well as to explore whether increased awareness and education of key principles within moral philosophy can better equip healthcare workers in situations when public health takes precedence over individual health.

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Introduction

The concept of moral distress was introduced by public health ethicist Andrew Jameton in 1984, when he classified moral problems of healthcare into three categories: moral uncertainty, moral dilemmas, and moral distress [1]. In so doing, he defined moral distress as the psychological distress of a situation in which one is constrained from acting on what one knows to be right. A great deal of work has been done in refining the concept since then [2–8]. Most prominently, moral distress has been refined to distinguish it from related concepts of moral residue and moral injury [9]. Some commentators have argued that repeated episodes of moral distress lead to unresolved emotional and psychological conflicts (moral residue) [10] that may erode the moral framework of individuals and cause symptoms of frustration, low mood, anger, shame, guilt, low motivation, loss of ambition, and character deterioration [11,12]. As Shay has correctly pointed out that this constellation of symptoms is not accurately captured by any official psychiatric disorder, including the post-traumatic stress disorder (PTSD) [12]. Instead, the term “moral injury” has been introduced in healthcare to characterize the syndrome resulting from witnessing, failing to prevent, carrying out, or learning about acts in healthcare that transgress deeply held moral beliefs and expectations [11,13].

Healthcare workers have faced unprecedented challenges during the COVID-19 pandemic in the light of scarce and unequal distribution of medical equipment, ventilators, testing, and personal protective equipment (PPE). Working in an environment with increased risk to personal health has drawn similarities with war. Describing healthcare workers as serving on the front lines is a wartime analogy that is not merely theoretical: 100,570 COVID infections and 641 deaths were reported among healthcare personnel during February 12–July 16, 2020 in the USA alone [14]. According to the Pan-American Office of the World Health Organization (WHO), there were 570,000 healthcare worker infections and 2,500 deaths in the Americas by September 2, 2020 [15]. In addition, healthcare workers have been forced in situations requiring difficult decision making under life and death circumstances. Northern Italy, for example, struggled with the allocation of ventilators when the number of cases exceeded their capacity [16,17]. In Spain, healthcare workers had to digest the fact that there were up to 400 patients waiting in the emergency room for an inpatient bed [18]. In the United Kingdom, physicians and nurses were warned not to raise concerns publicly about the shortage of PPE [19]. Some healthcare workers had to witness their patients dying alone in the intensive care unit due to COVID-related “no visitor allowed” policies [20,21]. In the USA, on-site medical training was stopped at many locations; trainees and medical students felt an ethical and moral inclination to help while they were being considered non-essential by the hospitals [21,22]. Such circumstances highlight that the excessive healthcare burden of COVID-19 not only poses a risk to the physical well-being but also to the mental and moral well-being of healthcare workers.

A limited number of studies have shown the impact of COVID-19 on the mental well-being of healthcare workers. For example, a cross-sectional survey of healthcare

workers conducted in New York City during spring 2020, found that 57% of healthcare workers reported acute stress, 48% reported depressive symptoms, while 33% healthcare workers reported anxiety symptoms [23]. Concerns about access to personal protection was one of eight sources of anxiety found during listening sessions with groups of physicians, nurses, advanced practice clinicians, residents and fellows [24]. Similarly, surveys conducted among healthcare workers in China, Italy, Singapore, and Spain have reported high levels of vicarious traumatization, burnout, depression, and anxiety symptoms [25–28]. Although many factors such as witnessing deaths, excessive workload, and risk to personal health can cause psychological distress and psychiatric symptoms among healthcare workers, empirical evidence from prior pandemics, military and disaster research supports a significant contribution of moral injury to psychopathology [29–32]. One study from China reported that the prevalence of moral injury, measured by the Moral Injury Symptoms Scale-Health Professional (MISS-HP), was 41.3% among clinicians during the COVID-19 pandemic and strongly correlated with depression, anxiety, low well-being, and burnout symptoms [33]. In another survey done in the USA, self-reported moral injury severity among clinicians during the COVID-19 pandemic was similar to that observed in military service members exposed to 7-month war zone deployments [34].

As we look to the future of the COVID-19 pandemic, there is a dire need to assess the impact of moral injury on healthcare workers’ well-being. Analogous to the life-threatening trauma leading to PTSD, moral injury is an aftermath of morally injurious events where individuals experience or participate in acts that transgress deeply held moral beliefs. This article is not focused on frankly “immoral” acts in healthcare but draws attention to the subjective nature of morality; what appears moral to many may be perceived as immoral by others. Nevertheless, there is a risk of potential morally injurious events in such circumstances. Moral injury resulting from these circumstances is not a COVID-specific phenomenon; in fact, it has been well-observed in healthcare prior to COVID and attributed to the providers’ highly conflicted allegiances – to patients, to self, and to employers” [35]. As Huddle points out: *“The bread and butter of morality in medicine is not in the «hard cases», where the right way forward is difficult to see; it is in acting rightly when the right path is clear before us but other pressing needs and desires pull us away from that path in the midst of day-to-day medical routine, under the often burdensome stresses of contemporary medical practice”* [36]. Healthcare workers must answer and satisfy the goals of their supervisors, employers, and patients. And they are doing so during the long hours of work, being exhausted, and away from families during the COVID pandemic. This article focuses on the double binds of healthcare physicians (to healthcare administration and patients) from a philosophical perspective of morality. A viewpoint is offered that many morally injurious events happen when healthcare workers, traditionally practicing Kantian and virtue ethics, are forced to follow utilitarian policies of healthcare system, especially during healthcare crisis. The following clinical vignette illustrates how healthcare workers may experience a morally injurious event when policies turn utilitarian in excessive healthcare burden of pandemics:

Clinical Vignette: John, a 64-year-old married male, was admitted to the medical unit for the management of COVID-19 disease. He was under care of Dr. Andrew, a dedicated hospitalist, whose patient caseload had tripled due to increased pandemic-related admissions and COVID infections among several doctors in the hospital. On many occasions, Dr. Andrew questioned the hospital administration's decision to decrease in-person staff and ration the personal protective equipment (PPE) to establish a backup system, leaving the on-duty staff overburdened and at risk of COVID infection. Having self-isolated himself from his family to prevent COVID infection, Dr. Andrew could empathize with the patient when he was not allowed to visit his family due to the hospital's "no visitor" policy during the COVID pandemic. On day three, patient's medical condition worsened to the point that would typically warrant a transfer to the intensive care unit (ICU) under pre-pandemic circumstances. However, Dr. Andrew's request for ICU transfer was declined because of the hospital's newly implemented COVID policy to ration the ventilators to optimize allocation of resources for those most likely to survive. The patient died on day 4 and Dr. Andrew was left questioning whether it was the right action on part of hospital administration to favour the survival of fittest and leave behind the most vulnerable.

Discussion

This clinical vignette highlights a substantial change in usual healthcare operations during times of acute healthcare crises. Specifically, the focus of healthcare shifts from individual to population level. A closer analysis of the clinical vignette would further reveal that in many difficult circumstances faced by Dr. Andrew, there was no clear, unambiguous wrong. In fact, decisions such as rationing of ventilators or minimizing hospital visitors are generally made after careful scientific and ethical deliberations. Perhaps, the problem that led Dr. Andrew to question the rightness of hospital administration's policies is a philosophical one. It is important to note that a fundamental shift in philosophy of healthcare happens during acute healthcare crises. Unlike normal circumstances, the "four principles approach" (autonomy, beneficence, non-maleficence, and justice) of ethics has limited value in acute healthcare crisis where many decisions are made based on resource scarcity and keeping in mind the whole population. Instead, the principle of utility is often needed in ethical deliberations to account for the whole population. For example, the moral principle behind the hospital's policies to ration ventilators and PPE despite immediate need is the principle of utility which lies at the core of utilitarian ethics [37]. Utilitarianism emphasizes on the maximization of benefit, lays weight on consequences rather than rules and places the concepts of good and bad before the ideas of right and wrong [38]. According to the utilitarian view, right actions that lead to good outcomes are intrinsically right, while wrong actions that lead to good outcomes are instrumentally right [38]. Therefore, the act of declining an ICU admission to a patient becomes instrumentally right in the light of maximizing the utilization of resources that will produce maximum possible survival of population.

Indeed, a utilitarian doctor would find the hospital administration's policy to be most ethical; but what if Dr. Andrew were a Kantian doctor who had been practicing Kantian and virtue ethics throughout his career? Kant's moral theory rejects the consequentialist approach to moral problems [39,40]. By subjecting actions to the categorical imperative (or universalizability test), Kant's moral theory claims that there are kinds of action which are always wrong because the maxims of those actions cannot be adopted by all rational beings as moral law. Therefore, Dr. Andrew, a believer in Kant's moral theory, would consider declining ICU admission a wrong act in all circumstances. For him, the death of his patient could be perceived as a morally injurious event because he was witness to an act (based on hospital administration's moral judgment) that was against his own moral framework.

Historically, the standoff between the two perspectives has been demonstrated by the well-known trolley problem [41], in which a person has to choose between the two available actions: (a) allow a runaway trolley to run over and kill five people, or (b) save five people by pushing (thus killing) a different person off of a footbridge into the trolley's path, thereby stopping the trolley. For relevance to healthcare and this case example, let's introduce a person in this dilemma: the treating doctor who has a therapeutic relationship with the patient and strives to abide by the Hippocratic Oath, a principle that strives to maximize net utility for the individual patient and not for the whole population [42]. How will it impact the psychological wellbeing of treating doctor whose patient is pushed into the trolley's path to save five people? Such modification adds a relationship-affective dimension to the trolley problem. Teper et al. suggested that affect plays a significant role in moral decision making and often leads to a dissociation between moral judgment and actual moral behaviour in the real-world setting [43]. For example, the hospital administration, who is not in a direct relationship with the patient, may find it easy to be agent neutral and impartial to maximize the overall benefit (ideal for utilitarian moral judgments) by declining the ICU transfer. On the other hand, healthcare worker is in a special relationship with the individual and cannot be agent neutral or impartial. One could argue that duties of special relationship apply to the physician-patient relationship and that not only are we permitted to do more for those close to us, but we are often required to put their interests first. In fact, a deontologist may claim that we are sometimes required not to maximize good of many at the expense of the good of one [44]. Under normal healthcare circumstances, these deontological principles are highly emphasized in ethical teachings and contribute significantly to the individual and professional integrity of healthcare workers. Therefore, as Thomas and McCullough have pointed out, when interests of individual patient are sacrificed to favour the provision of care to certain groups of patients in a utility driven system, healthcare workers often perceive this as a threat to professional and individual integrity [5]. I contend that the conflict between the utilitarian nature of healthcare delivery systems and deontological nature of physician-patient relationship may very well be the reason of many morally injurious events in healthcare. This is particularly relevant to the current COVID-19 pandemic as an example of how public health takes precedence in pandemics and introduces

many policies which are utilitarian in nature. Such utilitarian decisions then conflict with the individual decisions based upon Kantian and Aristotelian (virtue) ethics. Unfortunately, moral distress and moral injury are inevitable as utilitarian policies become a norm in medical crises such as COVID-19.

Implications for moral education

Like many psychiatric disorders, a time lapse is expected between the morally injurious events and its harmful sequela. This provides an opportunity to adopt a preparatory framework for prevention, early recognition, and effective management of moral injury. The foregoing discussion suggests philosophical roots of at least one form of moral distress and moral injury. Although, the question concerning how ought to act, the summum bonum i.e. "the greatest good" or, what constitutes "a moral act", will likely continue to be an issue of debate and controversy, it remains to be seen whether education of key principles and inherent conflicts within moral philosophy, for example, between deontology and utilitarianism, can equip healthcare workers in situations when public health takes precedence over individual health. Traditionally, moral education is considered a component of medical professionalism and ethics is taught as a skill in dealing with moral dilemmas. This approach of viewing morality as an expertise that can be learned to "see" the moral reasoning behind utilitarian decisions may be of value to healthcare workers suffering from moral injury. This can also be viewed as a method of intellectualization, i.e. the use of increased cognitive activity for its inherent affect-inhibiting potential to reduce the affective symptoms of moral distress and moral injury. The dual process model, proposed by Greene and colleagues, posits two competing moral processes in an individual challenged with a moral dilemma: (a) primarily cognitive function that engages in cost-benefit analysis of outcomes, thereby supporting a utilitarian solution; (b) unconscious affect-laden intuitions that are triggered in response to anticipated direct harm and fostered by empathy, supporting a deontological solution [45–48]. Research has shown that manipulation of either of these two pathways, i.e. reduced empathic concern or enhanced cognitive engagement of individuals in cost-benefit analysis, can help individuals endorse utilitarian judgments [49,50]. While empathy remains the cornerstone of medicine, I propose that cognitive approaches to understand outcome-based utilitarian judgments may help clinicians in balancing their empathy driven deontological judgments. Awareness and education of moral theories may serve as a preventative therapeutic modality by providing resources for enhanced cognitive processing of moral dilemmas and a medium for intellectualization of the emotional experience related to potential morally injurious events. Concurrently, there is a need for utility-driven healthcare systems to keep in mind the deontological nature of physician-patient relationship and the role it plays in affective processing of morally difficult situations during the utility-based decision making. More empirical research, early engagement and interdisciplinary interactions among healthcare workers, policy makers, moral philosophers, psychologists, ethicists, and academic physicians will be

essential for effective strategies against moral injury as healthcare emerges from the crisis of COVID-19.

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Human and animal rights

The authors declare that the work described has not involved experimentation on humans or animals.

Informed consent and patient details

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Author contributions

All authors attest that they meet the current International Committee of Medical Journal Editors (ICMJE) criteria for Authorship.

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