COMMENTARY



Pedagogy in Perspective: Ethical Erosion and Effects on Empathy Levels in Healthcare Education

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In a recent article by Piumatti et al., differences in personality and motives of students were attributed to their changes observed in their level of empathy [1]. Empathy is a core tenet of patient-centred care. Empathy significantly influences patient satisfaction, clinical outcomes, and professional satisfaction. Traditionally, empathy has been considered an inherent trait, which could not be learned. However, a body of research in educational psychology and pedagogy has demonstrated aptitude for this fundamental attribute can be taught to healthcare providers [1, 2]. At present, empathy is a required component education for medical professions. Yet, existing trends in literature suggest conflicting evidence regarding medical training associated with diminishments in empathy, which suggests its effect may be contrary to its intended goal [3, 4].

Ethical Erosion

Stratta et al. defines "the phenomenon of ethical erosion, where empathy and sympathy declines with increasing clinical experience" particularly during the transition period from pre-clinical to clinical training, and onwards from specialization to independent practice [5]. In particular, ethical erosion has been attributed to higher levels of clinical experience, secondary workplace fatigue from taking on higher clinical responsibility, and technical specialities such as surgery.

Several models of empathy even propose this process of ethical erosion is normal during medical training and that

³ School of Public Health, University of Alberta, Edmonton, AB, Canada there is no way to prevent this. In a study conducted by Chen et al., it was posited this decline in empathy could be a protective defence mechanism amidst emotionally challenging and difficult situations faced by medical students [6]. This decay in empathy can be roused by a number of factors including clinical efficiency, entitlement, desensitization, and technological dependence.

Risk Factors for Ethical Erosion

As patient interactions are repeated, we have a propensity, as healthcare professionals, to depend on scripts, schemas, and heuristics. Moreover, as trainees go through the medical education system, they are exposed to higher levels of professionalism—in some cases, a "clinical" professionalism. The connotation is that certain mannerisms in the patientphysician interplay can come across as detached [7]. Often times, we begin to rely extensively on this practice in an effort to save time and achieve a greater level of convenience when dealing with patients. Perhaps even unknowingly, we teach and incorporate these strategies into our medical curricula and practical training. Such productivity-centred practices in education may be injurious, especially when coupled with a mentality of entitlement.

For medical students, a sense of entitlement that is consistently reinforced by senior faculty and role models can feed narcissism [8, 9]. This culture of entitlement is pervasive in medical education and fostered by social attitudes and perceptions. Educators, who are often renowned professionals themselves, may play a role in propagating and even normalizing entitled attitudes in prospective healthcare leaders such as physicians. Entitled physicians are placed in an environment, which emphasizes personal welfare and competence, as opposed to patient needs hampering empathy. Perhaps it is inevitable, considering the price, prestige, and pride society places on medical students, physicians, and other healthcare professionals.

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Nevertheless, such mindsets can be more deleterious to genuine empathy, understanding, and engagement with and for the patient. Dubovsky describes a solution: "placing emphasis on the more selfless aspects of the physician's identity." [9] This is what ought to be taught: a nonsuperficial form of empathy that excludes egoism, status, and pride during patient interaction. Unfortunately, we have no available methods to measure the success of such pedagogy, nor has it been implemented.

Intuitively perhaps, the repetitive nature, desensitization, distance set by professional interactions, and apathy over time may all be the driving forces of ethical erosion. In a high-stress work environment with time pressures, patients are classified as "easy" and "difficult" [10]. Education must be deliberate to promote empathy. Some factors identified by medical students that promote or hinder empathy are prejudices, patient contact, practical skills, patient characteristics, physician-patient-relationship, working conditions, and time pressure [11]. The development of empathy could be promoted by increasing handson-experiences, possibilities to experience the patient's point of view, and offering patient contact early in the curriculum. However, this is a priority area not emphasized enough in current medical curricula. One example in medical pedagogy that may not provide students sufficient empathic development is cadaver labs. While cadavers are a valuable educational tool for learning anatomy, systems physiology, and surgical approaches, there is little discussion about the moral considerations around the context of the cadaver as a person that once lived. Disregarding these considerations can propagate ethical erosion as students retain a detached, mechanistic view of the human body that obscures them from grasping a holistic picture of the patient.

Another modern element that may contribute to the decline in empathy is technological dependence [12]. While selfreported empathy for patients is critical in empathy training in the medical education system, students preferring technologyoriented medical specialities had shown lower empathy scores [6]. In the new era of advanced technology and science, modern medicine relies heavily on health technology for diagnosis and illness treatment, and this may play a part in such decline in empathy among medical students. For instance, subtle cues in mannerisms and body language become much harder to detect and communicate in telemedicine visits. The emotional challenges and difficulties in practice also cannot be neglected. The lack of or decline in empathy may be blamed to absence of student role models, technological dependence, and insufficient education with an emphasis on communication, observation, and culture [6, 11]. Direct patient and bedside contact may be key to training and the development of curricula, which is aimed at reducing ethical erosion for medical students.

Strategies to Reduce Ethical Erosion in Students

Although an effective pedagogical approach has yet been identified to reduce ethical erosion in students, one should remain optimistic in the flourishing field of medical education research. While much research has focused on the implementation of empathy training in medical education, the actual process of empathy growth may be aided by improving communication skills [4]. The conveyance of the feelings between a patient and physician results in a better understanding of behavioural and emotional factors; these emotional factors can refine and hone one's capacity for empathetic response. One method Hirsch suggests is self-reflective writing [11]. Self-reflective writing is renowned as a teaching-learning strategy to enable personal growth and increase in situation awareness. The structure of combined learning with selfreflection is suggested to help students decrease stress and ease anxiety. Given the decline in empathy in the face of emotionally challenging and difficult situations, the implications of stress in a high-work environment may be eased through self-reflection, thus flourishing medical students' empathy. In addition to self-reflective writing, other suggested methods are observation skills and "deep acting" technique [11, 13]. An empathic response may be even more likely in the presence of cultural education as this provides physicians a greater frame of reference in understanding a wide range of interests of a patient.

According to Piumatti et al., there are multiple internal factors suggested to be associated with stable levels of empathy longitudinally as well [1]. In their study performed at the University of Geneva in Switzerland, two cohorts of individuals consisting of those whose empathy and motives were "higher and stable" that made up the majority and those whose empathy and motives were classified as "lower and decreasing" [1]. Furthermore, it was determined that higher openness scores on the NEO Five Factor Inventory in Year 1 alongside patients-oriented motives were associated with membership in the former cohort [1]. But how do we encourage the development of openness and fostering patients-oriented motives? In this case, educational systems can be constructed under one of two premises: (i) personality and motives are inherent or (ii) personality and motives can evolve. Under the first premise, individuals with personalities and motives resistant to empathy erosion must systematically be selected during the admissions process. The second premise is forward-looking and offers to utilize educational interventions to teach these behaviours and values in students that may be more susceptible to empathy erosion.

Conclusion

Ethical erosion or a decline in empathy in healthcare practitioners is a pattern that can negatively affect primary care, turning away patients from seeking and receiving care. A lack of empathy from healthcare providers can negatively affect the rapport built with patients and in turn, negatively impact other aspects of the patient experience including patient compliance, stress levels, and even prognosis of disease. Understanding the aetiology and risk factors for ethical erosion can improve cognizance of ethical erosion during our own practices and implement strategies to promote empathic attitudes. Risk factors include trading off empathic bandwidth for clinical efficiency, perceptions and cultures of entitlement, desensitization from hyper-immersion in procedural/technical skills, and increased technological dependence that introduce distance to the equation. The authors believe there is untapped potential to reverse these trends through educational reform and increased emphasis around activities that exercise empathy.

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