**Editorial** 

## Professional identity formation of undergraduate medical students – The proposed fifth level of Miller's pyramid

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In a recent article in the Medical Teacher, Kalet *et al.* address the need to measure professional identity formation early in medical school.<sup>1</sup> Physiologists are entrusted with the care of students as they first set foot into the medical college and we need to be aware of what professional identity formation entails.

What is professional identity formation? According to Creuss *et al.*, professional identity formation is a "... representation of self, achieved in stages over time during which the characteristics, values, and norms of the medical profession are internalized." Medical students need to focus on the development of a professional identity just as they focus on gaining knowledge. The objective of teaching medical professionalism is to support medical students as they develop their own professional identity and we therefore need to develop strategies to achieve this new objective.<sup>2,3</sup>

What is professionalism? There are many definitions of professionalism. According to the "Physician Charter," which was jointly published by the American Board of Internal Medicine (ABIM), the American College of Physicians and the European Federation of Internal Medicine in 2002 (based on the rationale that professionalism is the basis of medicine's contract with society), professionalism is defined by three fundamental principles and ten professional responsibilities.<sup>4</sup> The three—fundamental principles are the principle of primacy of patient welfare, the principle of patient autonomy and the principle of social justice.<sup>4</sup> The ten professional responsibilities include commitment to professional competence; honesty with patients; patient confidentiality; maintaining appropriate relations with patients; improving quality of care; improving access to care; just distribution of finite resources; scientific knowledge; maintaining trust by managing conflicts of interest; and commitment to professional responsibilities.<sup>4</sup>

The Medical Council of India (MCI) has in 2015, released the Attitude and Communication (ATCOM) module which is a structured longitudinal program on attitudes and communication (the ATCOM competencies) that the MCI proposes to implement in the undergraduate curriculum as a forerunner to the shift to a competency-based medical curriculum; faculty have been undergoing training in preparation for the same. The graduate medical education regulations of 2012, describe the roles that an Indian medical graduate (IMG) is required to function in for attaining the MCI's goal for undergraduate medical education. He describing that the IMG needs to function as a clinician, leader and member of the health care team, communicator, lifelong learner and professional, the MCI emphasizes the need for our medical students to develop competencies related to professionalism and ethics in addition to attaining knowledge and clinical skills. The ATCOM module lists the ATCOM competencies that an undergraduate medical student must possess when they complete the course, along with suggestions regarding the teaching-learning methods and assessment methods. Faculty from different medical colleges all over India have already undergone an ATCOM sensitization programme at the MCI nodal center for faculty development and have conducted Revised Basic Course Workshops in Medical Education Technology in their own institutions; the stage is thus set for implementation. Given this increased emphasis that the MCI is placing on the teaching of attitudes and

communication skills to our undergraduate medical students, it is all the more relevant for us to briefly address in this editorial the concept of professionalism and professional identity formation.

Institutions need to ensure that the definition of professionalism is very clear and transparent for both faculty and students. Only then will it be easy to choose appropriate teaching-learning methods and assessment tools. Until recently, there were two predominant lines of thought on professionalism of medical students: professionalism was thought of as a student's trait or a personal characteristic (which was difficult to assess) and professional behavior was the actual observable behaviour that could be assessed; however now, the concept of 'Professional Identity Formation' (PIF) has been added. 9-11 There are therefore three professionalism frameworks: virtue-based professionalism, behavior-based professionalism and a framework based on Professional Identity Formation. 12 Starting from the personal identity that had formed since birth, individuals develop successively the identity of a medical student, a resident, and a physician. <sup>13</sup> The formation of students' professional identities is influenced more by the informal and hidden curricula, with faculty serving as role models for students. 13 The identity is said to be "multiple, dynamic, relational, situated, embedded in relations of power, yet negotiable," - this provides a glimpse of the complexity involved. 13 Although the entire process is complex, Creuss et al. draw a schematic representation of the steps involved and provide medical educators with a guide to help ensure that medical students come to "think, act, and feel like a physician." Such is the importance of Professional Identity Formation, that Creuss et al. 14 question whether the "Does" level of Miller's pyramid of competence <sup>15</sup> can continue to be considered the highest level that students should work towards attaining. They propose adding a fifth level called "Is" to the apex of Miller's pyramid since they believe that incorporating the values and attitudes of the professional into the identity of the aspiring physician would be a more reliable indicator of competence. 14 This fifth level "Is" reflects the presence of a professional identity. 15 In a way, such a depiction in a pyramid of clinical competence would be testament to the importance of professionalism and Professional Identity Formation of medical students.

We conclude by calling all physiologists to monitor, guide and support medical students as their identity is slowly transformed from school children who enter medical college and the department of Physiology in the first year of medical college to responsible professional doctors who leave medical college and enter society to honour their commitment to it; we also need to remember that we too play a part in this process as we serve as role models for our students. Only then would we ourselves have served our professional responsibility to society.

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