Research article



Open Access

Professionalism in Medical Education- Perspectives of Medical Students and Faculty

Munazzah Rafique[1], Ayesha Nuzhat[2], Mushira Abdulaziz Enani[3]

Corresponding author: Dr Munazzah Rafique munazzahr1@gmail.com **Institution:** 1. King Fahad Medical City, 2. King Fahad Medical City, 3. King Fahad Medical City **Categories:** Professionalism/Ethics, Medical Education (General)

Received: 13/02/2017 Published: 03/03/2017

Abstract

Background

Addressing professionalism in medical education is challenging. Increasing attention has been focused on developing professionalism in medical school graduates. The culture of faculty and the behaviors of medical graduates are often incongruent with professionalism.

Objective

To assess awareness of medical students and faculty about professionalism and suggest strategies for developing professionalism.

Methods

Validated questionnaire about professionalism was used. Medical students (n=57) and Faculty (n=50) attending Faculty of Medicine (FOM) King Fahad Medical City Riyadh were included in study.

Results

Among personnel characteristics, the most highly ranked items were honesty (faculty: 47(94%); students: 35(61.4%) adhering to ethics (faculty: 42(84%); students: 36(63.2%), and reliability in patient care (faculty: 42(84%); students: 35(61.4%).For the interaction with patients category, in highly ranked item was respect for patient (faculty: 44(88%); students: 38(66.7%).Regarding social responsibility, for students highly ranked items was improving access to health care (student: 31(54.4%) whereas faculty designated improving access to health care (faculty 31(62%) more important. With respect to strategies to improve professionalism, the highest ranked strategy across faculty was including in evaluation 29 (58%), while in students individual mentoring 28 (49.1%) was highly ranked strategy for developing professionalism.



Conclusion

The difference in attitudes towards professionalism among students and faculty suggests unification of vision of both. Including in evaluation is better strategy for developing professionalism.

Keywords: Faculty, Medical Education, Professionalism, Undergraduate Medical students.

Professionalism in Medical Education- Perspectives of Medical Students and Faculty

INTRODUCTION

Professionalism is a concept of belief system to achieve trust between physicians and the society. Professional competence is the habitual and judicious use of communication, knowledge, technical skills, clinical reasoning, emotions, values, and reflection in daily practice for the benefit of the individual and community being served (Epstein RM & Hundert EM. 2002). Professionalism becomes an essential core competence in medical education in context to societal expectations. Medical professionals are expected to have a specified set of behaviors and attitude towards patients and society (Al-Eraky MM & Marei HF. 2015). In the year 1999, professionalism was listed as an ACGME (Accreditation Council for Graduate Medical Education) general competency, and the Medical Professionalism Project was launched by the American College of Physician Foundation, European federation of Internal Medicine and American Board of Internal Medicine (Kirk LM. 2007). According to American Board of Internal Medicine, 1994, core of professionalism is defined as "constituting those attitudes and behaviors that serve to maintain patient interest above physician self-interest" (Ludmerer KM. 1999). Professional characteristics of excellence in practice, modesty, recognition of personal limitations; professional judgment; and maintaining a fiduciary relationship with patients are expected to be exhibited in a medical professional rather than traditional qualities for improved service of patients and clinical competence Hilton S & Southgate L. 2007). Educators should assess professionalism by formative and summative evaluation. In addition, 360 degree evaluation by peers, nurses, patients and colleagues is required (Kirk LM. 2007). In a study conducted by Eraky in the year 2012 the participants identified all components of the ABIM (American Board of Internal Medicine) framework of professionalism as appropriate for the Arabian context (Al-Eraky MM & Chandratilake M. 2012). In addition, they indicated professional autonomy as an important component of professionalism. Expert knowledge, self-regulation, and trust are three basic characteristics of professionals (Al-Eraky MM & Chandratilake M. 2012). There are differences in attitudes to professionalism in under graduate and graduated students. Graduated students have more rational approach towards important professional values. Majority of students in most UK medical schools are aware of importance and rationale of teaching professionalism. Role models, the media and parents are most important influencers on developing professionalism (O'Flynn S. et al. 2014). Medical students consider confidentiality, good medical knowledge, practical skill, promptness, hygiene and appearance as important characteristics in context to professionalism (Gale-Grant O. et al. 2013). Good doctor is a palatable concept that students adapt in context to professionalism, whereas they consider professionalism in medical education as an external and forced theory. Since both traditional and professional paradigms compete with each other majority of students favor becoming a good doctor rather than a professional (Cuesta-Briand B et al. 2014). Professionalism can be taught, learned, and assessed.

Teaching professionalism might fulfill patient expectations; develop association between professional and improved clinical outcomes and help in accreditation of organization (Mueller PS. 2009). Professionalism is a key measure of the effectiveness of the medical students in future but adopting professionalism is possible by clear development of ethics and agenda and also by developing the appropriate assessment method of professionalism (Whitcomb ME. 2002). Medical students of foundation years 1 and 2 in UK consider that medical professionalism is poorly taught



and assessed and desire it to be taught and assessed it as individual entity rather that within medical ethics (Esen UI. 2013).

There is significant difference in how professionalism is taught and how graduates wish it to be taught with more effectiveness. According to the doctors and medical students in County Durham and Darlington Foundation Trust Role models and learning through experience were identified as being the most useful sources for teaching professionalism whereas lectures and online teaching were not felt by many to be valuable resources (Riley S & Kumar N. 2012). Teaching of professionalism should integrate with difficulties of medical practice to overcome the apparent strains among medical students (Cuesta-Briand B et al. 2014). Role of faculty leaders in medical schools and teaching hospitals in defining and constructing means of teaching and evaluating professionalism is important. Faculty members should be evaluated for the role in professionalism development in annual performance meeting with dean (Whitcomb ME. 2002). Institutional cultures play an important role in the development of student's attitude and behavior(Whitcomb ME. 2002). In order to have an effective system of teaching and evaluation of professionalism, there is need of refreshing the knowledge of faculty members and teachers about professionalism as well as they should be aware and skilled to evaluate professionalism effectively (Steinert Y et al. 2005). Professionalism is not a static quality, it improves with changes in accepting ethics and morality and with legislative changes both in government and within organizations (Henning MA et al. 2005).

OBJECTIVE

- 1. To assess the awareness of undergraduate medical students and faculty about professionalism in medical profession.
- 2. To recommend potential strategies for developing professionalism

MATERIAL AND METHOD

Institutional review board (IRB) approval was obtained (IRB approval no-15-178), from King Fahad Medical city. A prospective cross sectional study was designed. We have used validated questionnaire regarding attitudes towards professionalism, utilized in previous studies (Morreale MK et al. 2011). Author's permission to use questionnaire was taken prior to its use. Survey tool items were initially constructed based on review of the literature concerning the development of professionalism in medical students. The items in the questionnaire address four categories which are Personal characteristics; Interaction with patients; Social responsibility; and Interactions with the healthcare team. Rating of these criteria was done on an ascending 5-point Likert scale with rating options: Not at all important, somewhat important, neutral, important and very important.

Participants were selected by convenience sampling. Our participants were undergraduate medical students, 3rd year (males=18, females=24),4th year(males=29), 5th year (males=21), total (57) from Faculty of Medicine, King Fahad Medical city, KSAUHS and Faculty members (n=50) from basic medical sciences as well as clinical sciences were included. Voluntary participation with verbal consent was done.

Data was collected from students of Faculty of Medicine (FOM), King Fahad Medical City, King Saud Bin Abdulaziz University of Health Sciences Riyadh and faculty members. they were approached during their free time to complete paper based questionnaire. Demographic information of students regarding age, gender, grade of study, previous qualification were noted. For the faculty members, we had noted gender, specialty, academic position,



department, and country of origin.

The Likert scale data was coded where not at all important =1,and very important=5. Data analysis was done on SPSS version 22 (IBM). Descriptive statistics were calculated for each domain and item of each group separately. Independent t test was carried out to see difference in responses between students, and faculty. Statistical significance was set at p value of less than 0.05.

RESULTS

Questionnaires measuring attitudes towards professional behaviors from medical students were analyzed, with the following response rates: 3^{rd} and 4^{th} year students 62% (57/92) and faculty members 71 % (50/70).

Table 1 summarizes importance ratings for various professionalism-related categories and items across students and faculty groups. Overall, relative to students, faculty provided higher importance ratings for each of the categories Table 1.

In terms of the *personal characteristics* category, both students and faculty rated all items either important or very important (i.e. mean ratings between 4.02 and 4.92). For both groups, the most highly ranked items were honesty (faculty: 47(94%); student: 35(61.4%) and adhering to ethics (faculty: 42(84%); student: 36(63.2%), and reliability in patient care (faculty: 42(84%); student: 35(61.4%).

Faculty ranked internal motivation (P = 0.000), punctuality (P = 0.000), attendance (P = 0.000), reliability in patient care (P = 0.003), knowledge of limits(P = 0.009), response to assessment (P = 0.002), avoiding abuse of power (P = 0.027)and adhering to ethics (P = 0.007) higher than the students.

For the *interaction with patients* category, faculty rated respect for patient (P = 0.021) as significantly more important, and there was a significant trend towards increased ratings for confidentiality (P = 0.026). For both groups, the highly-ranked item was respect for patient (faculty: 44 (88%); student: 38(66.7%).

For *social responsibility*, there were no significant differences between both groups with respect to importance ratings expect for treating the underprivileged (P = 0.012). For students, the two most highly ranked items were improving access to health care (student: 31(54.4%) and manage conflict of interest, (student: 27(47.4%) whereas for the faculty the items were improving access to health care (faculty 31(62%) and justified distribution of resource (faculty: 30(60%).

For *interaction with healthcare team* category items, no significant differences in importance ratings were found between students and faculty.

With respect to *strategies to improve professionalism*, the highest ranked strategy across faculty was including in evaluation 29 (58%), followed by observing and modeling 24(48%). While in students individual mentoring 28 (49.1%) was highly ranked strategy followed by observing and modeling 26 (45.6%), for developing professionalism.

PROFESSIONALISM IN MEDICAL EDUCATION (STUDENTS & FACULTY)



Mean importance ratings (on a 1 - 5 scale, where 1=not at all important, and 5=very important; see Instruments) for four categories of professional behaviors, as well as strategies for developing professionalism, in students vs faculty.

Sr. no.	Domain	Mean/S.D (students n=57)	Mean/S.D (Faculty n= 50)	P value		
Personal characteristics						
1	Internal motivation	4.05(1.076)	4.66(0.479)	0.000*		
2	Punctuality	3.98(1.094)	4.82(0.388)	0.000*		
3	Attendance	3.77(1.180)	4.66(0.557)	0.000*		
4	Appearance	4.02(1.044)	4.34(0.688)	0.066		
5	Reliability in patient care	4.46(0.825)	4.84(0.370)	0.003*		
6	Commitment to learning	4.39(0.840)	4.66(0.519)	0.049		
7	Knowledge of limits	4.05(0.934)	4.48(0.677)	0.009*		
8	Response to assessment	4.07(0.884)	4.56(0.644)	0.002*		
9	Self-improvement	4.28(0.840)	4.62(0.830)	0.038		
10	Honesty	4.47(0.804)	4.92(0.340)	0.000*		
11	Avoiding abuse of power	4.40(0.904)	4.74(0.600)	0.027*		
12	Adhering to ethics	4.49(0.826)	4.84(0.370)	0.007*		
13	Accountability for decisions	4.40(0.842)	4.56(0.733)	0.311		
Interaction with patient						
14	Respect for patient	4.54(0.758)	4.84(0.510)	0.021*		
15	Patient involvement in decision	4.39(0.881)	4.50(0.735)	0.473		
16	Confidentiality	4.49(0.889)	4.80(0.404)	0.026*		
17	Respect for family	4.40(0.799)	4.62(0.567)	0.114		
18	Patient concern first	4.53(0.710)	4.60(0.639)	0.576		
Social responsibility						
19	Treating the underprivileged	4.05(0.875)	4.46(0.762)	0.012*		
20	Improved access to care	4.33(0.873)	4.52(0.735)	0.238		
21	Justified distribution of resource	4.25(0.851)	4.48(0.762)	0.139		
22	Teach and disseminate knowledge	4.23(0.846)	4.42(0.731)	0.215		
23	Advocate for patients	4.23(0.756)	4.40(0.782)	0.251		
24	Manage conflict of interest	4.26(0.835)	4.44(0.705)	0.243		
Interaction with team						



25	Respect other members	4.56(0.802)	4.78(0.465)	0.093			
26	Report dishonesty	4.18(1.002)	4.40(0.782)	0.204			
Strategies for developing professionalism							
27	Formal ceremony	3.98(0.876)	3.90(0.789)	0.612			
28	Awarding superior behavior	4.19(0.875)	4.08(1.027)	0.540			
29	Observing and modeling	4.30(0.731)	4.37(0.755)	0.634			
30	Formal curriculum	4.05(0.915)	4.16(0.746)	0.501			
31	Including in evaluation	4.11(0.976)	4.46(0.762)	0.040*			
32	Individual mentoring	4.26(0.835)	4.34(0.872)	0.643			

DISCUSSION

While both faculty and students generally rated each of the four professionalism category items as either "important" or "very important", faculty ratings were higher on average. Faculty attributed greater importance, relative to students, to various aspects of professionalism across the personal characteristics, interaction with patients and social responsibility categories. For both groups, the most highly ranked items were Honesty, Adhering to ethics and reliability in patient care. Additionally, in students, a significant decrease in perceived importance of the following professionalism items was evident: punctuality, attendance and appearance.

For the Personal characteristics and Interaction with patient, the difference in opinion of faculty and students can be due to prior exposure to work environments and practices. This difference may reflect greater maturity in terms of ethical orientation and intellectual/emotional maturity (James D et al. 2009). In our study the difference in opinion among students and faculty is significant in regards to internal motivation, punctuality and attendance, reliability in patient care, knowledge of limits, honesty, response to assessment, avoiding abuse of power and adhering to ethics.

Medical students consider confidentiality, good medical knowledge, practical skill, promptness, hygiene and appearance as important characteristics in context to professionalism (Gale-Grant O et al. 2013). Although in our study confidentiality constitute a statistically significant trait, appearance did not prove to be as important to professionalism.

An additional concern arising from this study is concerning students' attitudes to attendance and punctuality. Mary Morreale conducted a study in 2011, and reported that resident physician's mean scores were highest for each professionalism category when compared to medical students indicating the value of professional behavior (Morreale MK et al. 2011). In our study, almost similar results were produced showing more importance to professional behavior by faculty members when compared to medical students (Phillips SP & Clarke M. 2012).

Honesty is the highly-ranked trait that is supported by faculty members for professionalism whereas respect other members is chosen by students. Eraky, in the year 2015, reported that trust between physician and society is the cornerstone of medical professionalism (Al-Eraky MM & Marei HF. 2015).

There is a lack of agreement for teaching professionalism either by formal curricular activities or to be expressed informally between mentor and mentee in clinical environments (Phillips SP & Clarke M. 2012).



Role models and learning through experience were identified as being the most useful sources for teaching professionalism whereas lectures and online teaching were not felt by many to be valuable resource (Riley S & Kumar N. 2012). In our study students considered observing and modelling and individual mentoring as best teaching strategy while faculty considered Including in evaluation and Observing and modeling as important teaching tools for professionalism and formal teaching was not considered important by both faculty and students.

Eraky et al in the year 2012 concluded that ABIM domains are appropriate to Arabian context and thereby proposed autonomy of professionals as an additional domain (Al-Eraky MM & Chandratilake M. 2012)

Formal ceremony and Formal curriculum are least supported ways of teaching professionalism in our study. Eraky et al , 2015, also support "what to do" and "what to be" should not be the focus of teaching professionalism. Relatively "know why perspective" should develop in every physician. ² Goldstein EA in his study conducted in 2006 at university of Washington concluded that increased attention to teaching and modeling professionalism among faculty, residents, and staff help in increased awareness of students (Goldstein EA et al. 2006). Whereas in our study both students and faculty consider including professionalism in evaluation as a better strategy for developing professionalism.

CONCLUSION

This study assessed the opinions towards different domains of professionalism in students and faculty. Both students and faculty have difference in emphasis on these domains as well as both have different perspectives regarding how professionalism should be taught. There should be an agreed and unified system of quantifying professionalism keeping in account both students and faculty perspective.

Take Home Messages

- Keeping in mind the difference in the attitude to professionalism among students and faculty, we should design a compatible teaching system of professionalism that is well accepted and be motivational for students as well as practicable for faculty for effective teaching.
- There is need to unify the concept of professionalism among trainer(faculty) and trainee (students).

Based on our study we suggest that faculty should evaluate professionalism periodically and at the same time students should be individually mentored for improving their behavior.

Notes On Contributors

Munazzah Rafique is a Pakistani physician working as a Medical data Manager in the HIM department of KFMC. She is specialized in Public health and Medical Education.

Dr Ayesha Nuzhat is an Indian Anatomist working in basic medical science department Faculty of medicine, KFMC. She is also specialized in medical education and is a life member of anatomical society of India.

Dr Mushira Enani is Saudi Physician working in department of medicine at KFMC. She is the director of main hospital at KFMC.



Acknowledgements

We are thankful to Research Department King Fahad Medical city for providing fund for this study IRF (015-020).

Bibliography/References

1. Epstein RM, Hundert EM. (2002) Defining and assessing professional competence. JAMA. 287: 226-35.

https://doi.org/10.1001/jama.287.2.226

2. Al-Eraky MM, Marei HF. (2015) Professionalism in medical education: a review article. Adv Health Prof Educ 1: 37-40

3. Kirk LM. (2007) Professionalism in medicine: definitions and considerations for teaching. Proc (Bayl Univ Med Cent). 20: 13-6.

4. Ludmerer KM. (1999) Instilling Professionalism in Medical Education. JAMA 282: 881-882.

https://doi.org/10.1001/jama.282.9.881

5. Hilton, S. Southgate, L. (2007) Professionalism in medical education. Teach Teach Educ 23: 265-279.

https://doi.org/10.1016/j.tate.2006.12.024

6. Al-Eraky MM, Chandratilake M. (2012) How medical professionalism is conceptualised in Arabian context: a validation study. Med Teach 34: 90-5.

https://doi.org/10.3109/0142159X.2012.656754

7. O'Flynn S, Power S, Horgan M, O'Tuathaigh CM. (2014) Attitudes towards professionalism in graduate and nongraduate entrants to medical school. Educ Health (Abingdon) 27: 200-4.

https://doi.org/10.4103/1357-6283.143770

8. Gale-Grant O, Gatter M, Abel P. (2013) Developing ideas of professionalism. Clin Teach 2013; 10: 165-9.

https://doi.org/10.1111/j.1743-498X.2012.00643.x

9. Cuesta-Briand B, Auret K, Johnson P, Playford D. (2014) 'A world of difference': a qualitative study of medical students' views on professionalism and the 'good doctor'. BMC Med Educ 14: 77.

https://doi.org/10.1186/1472-6920-14-77

10. Mueller PS. (2009) Incorporating professionalism into medical education: the Mayo Clinic experience. Keio J Med 58: 133-43.

https://doi.org/10.2302/kjm.58.133



11. Whitcomb ME. (2002) Fostering and evaluating professionalism in medical education. Academic Medicine 77: 473-4.

https://doi.org/10.1097/00001888-200206000-00001

12. Esen UI. (2013) Foundation doctors' views of medical professionalism. J Obstet Gynaecol 33: 553-6.

https://doi.org/10.3109/01443615.2013.807783

13. Riley S, Kumar N. (2012) Teaching medical professionalism. Clin Med (Lond) 12: 9-11.

https://doi.org/10.7861/clinmedicine.12-1-9

14. Steinert Y, Cruess S, Cruess R, Snell L. (2005) Faculty development for teaching and evaluating professionalism: from programme design to curriculum change. Med Educ 39: 127-36.

https://doi.org/10.1111/j.1365-2929.2004.02069.x

15. Henning MA, Pinnock R, Hazell W, Hawken SJ. (2013) Professionalism in Medical Education. Education in Medicine Journal 9: 5.

https://doi.org/10.5959/eimj.v5i3.175

16. James D, Ferguson E, Powis D, Bore M, Munro D, Symonds I, Yates J. (2009) Graduate entry to medicine: widening psychological diversity. BMC Med Educ 9: 1

https://doi.org/10.1186/1472-6920-9-67

17. Morreale MK, Balon R, Arfken CL. (2011) Survey of the importance of professional behaviors among medical students, residents, and attending physicians. Academic Psychiatry 35: 191-5.

https://doi.org/10.1176/appi.ap.35.3.191

18. Phillips SP, Clarke M. (2012) More than an education: the hidden curriculum, professional attitudes and career choice. Med Educ 46: 887-93.

https://doi.org/10.1111/j.1365-2923.2012.04316.x

19.Goldstein EA, Maestas RR, Fryer-Edwards K, Wenrich MD, Oelschlager AM, Baernstein A, Kimball HR. (2006) Professionalism in medical education: an institutional challenge. Acad Med 81: 871-6.

https://doi.org/10.1097/01.ACM.0000238199.37217.68

Appendices

Declaration of Interest

The author has declared that there are no conflicts of interest.