Medical professionalism frameworks across non-Western cultures

MEDICAL TEACHER, 2017
VOL. 39, NO. S1, S8–S14
http://dx.doi.org/10.1080/0142159X.2016.1254740

MEDICAL TEACHER
Taylor & Francis
Taylor & Francis Group

Medical professionalism frameworks across non-Western cultures: A narrative overview

A. Al-Rumayyan[a], W. N. K. A. Van Mook[b,c], M. E. Magzoub[d], M. M. Al-Eraky[e,f], M. Ferwana[a], M. A. Khan[a] and D. Dolmans[b]

[a]College of Medicine, King Saud bin Abdulaziz University for Health Sciences, Riyadh, Saudi Arabia; [b]Department of Medical Education, Maastricht University, Maastricht, The Netherlands; [c]Department of Intensive Care Medicines, Maastricht University Medical Centre, Maastricht, The Netherlands; [d]World Health Organization – Eastern Mediterranean Regional Office, Cairo, Egypt; [e]Department of Medical Education, University of Dammam, Dammam, Saudi Arabia; [f]Department of Medical Education, University of Zagazig, Zagazig, Egypt

ABSTRACT

Background: Medical professionalism is context-specific, but most literature on professionalism stems from Western countries. This study is about benchmarking of different frameworks on professionalism and interpreting the commonalities and discrepancies of understanding professionalism across different cultures. We need to study the cultural underpinning of medical professionalism to graduate future "global" practitioners who are culturally sensitive enough to recognize differences (and also similarities) of expectations of patients in various contexts.

Aim: This study aims at describing culture specific elements of three identified non-Western frameworks of professionalism, as well as their commonalities and differences.

Method: A narrative overview was carried out of studies that address professionalism in non-Western cultures in the period 2002–2014.

Results: Out of 143 articles on medical professionalism, only four studies provided three structured professionalism frameworks in non-Western contexts. Medical professionalism attributes in non-Western cultures were influenced by cultural values. Out of the 24 identified attributes of professionalism, 3 attributes were shared by the three cultures. Twelve attributes were shared by at least two cultures, and the rest of the attributes were unique to each culture.

Conclusions: The three frameworks provided culture-specific elements in a *unique* conceptual framework of medical professionalism according to the region they originated from. There is no single framework on professionalism that can be globally acknowledged. A culture-oriented concept of professionalism is necessary to understand what the profession is dedicated to and to incorporate the concept into the medical students' and physicians' professional identity formation.

Introduction

Over the past 25 years, substantial literature has been published on definitions and consensus on medical professionalism (Cruess et al. 2000; ABIM Foundation et al. 2003). However, studies done by professional medical organizations in Western culture thus defined it as a fulfillment of the medical profession's contract with society (Sohl & Bassford 1986; Pellegrino & Relman 1999). In the early 1980s, the American Board of Internal Medicine (ABIM) started its project on Humanism in which the following elements of professionalism were determined: accountability, altruism, excellence, duty, integrity, and honor (Evetts 2003; Zijlstra-Shaw et al. 2012). This project was considered an important contribution to defining the elements and meaning of contemporary medical professionalism at least in the American society.

In a related important development, the American College of Physicians, the American Society of Internal Medicine, the American Board of Internal Medicine, and European Federation of Internal Medicine established a Charter for Physician on medical professionalism in 2002. This important document listed three basic foundations of medical professionalism including, social justice, patient autonomy, and primacy of patient welfare, (General Medical Council 2001) along with 10 professional responsibilities, that include: honesty with patients, professional competence, commitment to patients' confidentiality, improving quality and access to care, maintaining appropriate relationships with patients, scientific knowledge, maintaining trust, managing conflicts of interest, professional responsibilities, and just distribution of finite resources (ABIM Foundation et al. 2003). As a result, the competence-based curriculum and professional training programs are being introduced, and professionalism is made an integral part of undergraduate and postgraduate training and assessment programs. Some of these changes may be limited to some societies and cultures, whereas others are more prominent in others.

When medical professionalism is taught to medical students, it should reflect the underpinning social contract including placing the of patients' interests above those of physicians (Cruess 2006). The importance of a sociocultural context of medical professionalism thus becomes more valuable and outstanding as voiced by the Physician Charter editor; "Does this document reflect the tradition of medicine in cultures other than those in the West, where the authors of the charter have practiced medicine?" (Blank et al. 2003).There is no universal truth about medical professionalism. Ho et al. (2011) challenged the Western framework of medical professionalism applicability and proposed a framework of professionalism reflecting the values and

CONTACT Ahmed Al-Rumayyan rumayyana@ksau-hs.edu.sa College of Medicine, King Saud bin Abdulaziz University for Health Sciences, Riyadh, Saudi Arabia

the cultural heritage of Taiwanese stakeholders (Irvine 1997). Many researchers suggested that medical professionalism needs a clear description that should be contextually linked to any culture (Van De Camp et al. 2004; Wear & Kuczewski 2004; Hafferty 2006; Woodruff et al. 2008). Cultural backgrounds may theoretically add cultural-specific elements to the concept of professionalism (Hafferty 2006), but on the other hand these are herein shown to be very limited (Cruess et al. 2010). The areas on the concept of professionalism are overlapping; therefore, the consensus on professional characteristics for professionals is not yet validated.

The emphasis on conceptualization of professionalism in medical education across cultures has come in response to perceived differences in societal core values and community needs. While Eastern world values and beliefs are propelled by Confucian traditions in terms of group dynamics and dignified persona (Ho et al. 2011), the evolution and discourse of professionalism are more prominent in the Western culture (Cruess 2006). In some of the included studies, utilization of the Western concept of professionalism was literal (Akhund et al. 2014; Nishigori et al. 2014), and other studies (Ho et al. 2011; Chandratilake et al. 2012; Al-Eraky et al. 2014) included cited concepts from other sources (Cruess et al. 2002; Cruess 2006; Cruess et al. 2010). These citations brought different concepts on the influence of cultural traditions on medical professionalism.

Other investigators from non-Western cultures especially China and Saudi Arabia followed this trend Pan et al. (2013). They all advocated that there is no professionalism framework that is comprehensive and applicable in all contexts. This study identifies three non-Western framework of professionalism; the aim is three folds: (1) to describe the three frameworks and their culture-specific elements, (2) to describe the commonalities among the three frameworks, and (3) to describe the differences between them.

Methods

A narrative overview was used to realize the objectives of this study. A narrative overview reports the authors' findings in a condensed format that typically summarizes the contents of each article (Green et al. 2006). The main justification of using this method is the fact that we found only four articles that met the criteria. Second, it is most suitable when the authors intend to bring an important issue such as professionalism in non-Western cultures to light for stimulating discussion and try to answer a pending question. In our case, we are trying to answer our research questions addressed earlier through conducting a comprehensive literature review, and identifying selection criteria of articles.

Literature search

Multiple methods was used in this review including: PubMed; Embase (an up-to-date database, PsychINFO, Educational Resources Information Centre (ERIC); Sociological Abstracts; and Topics in Medical Education (TIMELIT) were covering the most important international biomedical literature from 1947 to the present day. PubMed is more relevant to our study which covers the literature starting from 1966. We limited our search on PubMed database from 2002 to 2014 because the "Physician Charter" was established in that year. Table 1 showed the terms used for the search. References of all selected studies were subsequently hand-searched. Quantitative and qualitative research including systematic reviews, RCT, reports, and journal articles was used for the purpose of the study. Table 2 showed the numbers of hits in the database. Two reviewers assessed the inclusion criteria of all selected studies by scanning the totals and the abstracts. The reference list of the articles was scanned to retrieve the further relevant studies enabling us to incorporate seminal work such as the Medical Professionalism. Subsequently, full text articles was retrieved and reviewed by the same two reviewers taking in consideration the risk of biases.

Inclusion criteria

Studies addressing medical professionalism in non-Western culture were selected based on the following selection criteria: (1) any type of original article on medical professionalism that recruited physicians, medical students, medical teachers, medical educators, and paramedical staff, (2) research that defined medical professionalism and its dimensions across non-Western cultures, and (3) studies published in English language.

Exclusion criteria

Studies conducted in Western context, included non-medical/paramedical, and in non-English language were excluded.

Results

One hundred and forty-four full-texts were shortlisted for further review; 131 studies were excluded due to its focus

Table 2. Number of hits obtained in the database.

Recent queries in PubMed

Search	Query	Items found
1	Search professionalism[Title]	2159
2	Search medical professionalism[Title]	234
3	Search (professionalism[Title]) AND cross-cultural[Title]	0
4	Search (medical professionalism[Title]) AND culture[Title]	1
5	Search (medical professionalism[Title]) AND cross-cultural[Title]	0
6	Search (professionalism[Title]) AND culture[Title]	12
7	Search (professionalism[Title/Abstract]) AND culture[Title/Abstract]	143

Table 1. Keywords used in search method.

Key terms groups	Key terms
Professionalism	Professional behavior, professional attitudes, professional role, profession, morals, ethics, values, social virtues.
Culture	Non-Western cultures, culture, across cultures, transcultural.
Professionals	Doctor, medical students, medical educator, medical professionals, medical registrar, medicine, postgraduate, practitioners, physician, general practitioner, and medical students, undergraduate students.

Table 3. Characteristics of eligible studies.

Country/Region	Authors (year)	Study objective	Method	Participants	Results	Remarks
Taiwan	Ho et al. (2011)	To build a framework for MP that focuses on sociocultural context.	Qualitative, used different techniques for reaching consensus.	91 Medical and allied personnel.	Critical stakeholders reached consensus on a non-Western framework that integrated eight competencies. Integrity was considered most central to the framework for MP.	The Taiwanese framework emphasizes that sociocultural themes contextually impact MP.
China	Pan et al. (2013)	To formulate a Chinese framework for MP.	Qualitative method used NGT.	97 participants sorted into 13 professional groups discussed and ranked categories of professionalism.	Analysis of ranked categories and meeting transcripts added four additional themes to preexisting 8 categories of MP framework.	The Chinese framework on professionalism was developed with the basis of Confucian values that can be translated as: *humane love* and *public spiritedness*.
Japan	Nishigori et al. (2014)	To compare Bushido as a value system and the physician charter.	A qualitative survey of physicians.	422 physicians were asked about and commented on the seven virtues of Bushido still used in their practice.	The traditional Bushido' virtues of Japanese samurai worriers were found relevant to the physician charter of MP.	Educators should keep abreast of Bushido's seven principle virtues and consider the impact of religion when teaching MP and practicing in Japan.
Saudi Arabia	Al-Eraky et al. (2014)	To build a framework for MP from an Arabian perspective.	A qualitative survey using Delphi technique in three rounds.	17 experts from multiple disciplines.	Eight attributes of professionalism were groups in four themes (Gates): dealing with self, dealing with tasks, dealing with others, and dealing with God. Self-accountability and self-motivation were interpreted as *taqwa* and *ehtesab* in Arabic.	The Arabian framework has more similarities than differences with Western culture. Some attributes were interpreted variably on the basis of "faith," as a core value for Arabs.

on non-medical professionalism. Only 13 articles addressed professionalism in non-Western culture. From these 13 studies, only 4 studies had a unique non-Western framework which includes culture-specific elements. From these four studies, only three different frameworks were identified as the Chinese and the Taiwanese studies were both focusing on one framework. Table 3 presents the characteristics of the included studies. Boxes 1–3 describe the three frameworks. The other nine studies were excluded because they look at professionalism through a Western lens. Table 4 presents 24 attributes found in the three non-Western cultures. Only 3 attributes are common among the three frameworks, while 12 attributes are shared by at least two cultures. The remaining nine attributes are unique to each culture i.e. are found at least in one culture.

Box 1 Framework from Chinese cultural perspective

From China's cultural perspective, Ho et al. (2011) framework consists of Stern's medical professionalism framework in the shape of a Greek temple and includes three basic principles (communication, clinical competence, and ethics), four pillars/columns (accountability, humanism, excellence, and altruism), and a beam (integrity), the beam across the top of the columns. Included blank columns are to be used for additional values for professionalism. They used the cultural concept of *Zizhong* (self-dignity and respect) which is associated with integrity in Chinese culture. The authors consider that to be respectful and self-dignified is a fundamental steps in professional development and placed it as a beam on the top of the supporting column. Although these attributes of medical professionalism are similar to Western culture, this framework derails from Stern as all participants agreed to add "integrity" relating to the concept of *Zizhong*. This framework is deeply embedded in cultural roots of the Taiwanese and Chinese belief system. The study of Ho and her coworkers included allied health professionals and members from the community to develop the concept of professionalism in their cultural context.

Pan et al. (2013) used the same concept. However, they integrated four additional categories of: teamwork, health promotion, self-management, and economics. According to this study, eight categories offered a preexisting framework, which included integrity, clinical competence, communication, humanism, ethics, altruism, accountability, and excellence. These categories are similar to Ho et al. (2011) and Western-oriented cultures frameworks.

Box 2 The Arabian framework

The Arabian context can be perceived as the blend of culture, traditions, beliefs, and behaviors that are being practiced by nations of Arabian countries in the Middle East, where Arabic is the official language and Islam is the

Table 4. Commonalities and differences of attributes among the three non-Western frameworks.

Attributes	Arabian framework	Chinese framework	Japanese framework
Altruism/Benevolence/Compassion	√	√	√
Integrity/Honesty/Rectitude	√	√	√
Respect/Politeness	√	√	√
Accountability	√	√	
Commitment/Responsibility/Dutifulness	√	√	
Ethics	√	√	
Excellence	√	√	
Clinical competence	√	√	
Communication	√	√	
Discipline (self-awareness/self-motivation/self-regulation)	√	√	
Medical Knowledge/Health Promotion	√	√	
Teamwork	√	√	
Religion/Moral values	√	√	
Trustworthiness/Confidentiality	√		√
Honor	√		√
Role model	√		
Advocacy		√	
Equity		√	
Humanism		√	
Economic considerations		√	
Courage			√
Loyalty			√
Protection of patient rights		√	
Reflective practice	√		
Total =24	17	18	7

religion of majority of the population. Those behaviors and traditions are not necessarily derived from Islamic doctrines, but some common values have been accepted as the norm among populations of these countries. Although there are differences in ethnic groups, tribes, local cultures, and regional entities, the *Arab world* is a single, overarching society rather than a collection of several independent states. In Arabian context, Al-Eraky et al. (2014) described the Four Gates model of medical professionalism in the context of Arabian culture that is based on the value of Islam. Eight professional attributes were grouped into four themes which include: (1) dealing with self that includes two attributes of self-awareness (*taqwa*) and self-management (*ehtesab*), (2) dealing with tasks that deals with excellence, commitment to professional development, and reflective practice, (3) dealing with others that reflects attributes of respect for patients, colleagues and students, and maintaining professional confidentiality, and (4) dealing with Allah (God), a different stream in the literature that reflects attributes of self-accountability and self-motivation that link with Allah defined it as a reward professionals receive from Allah, not from people.

Box 3 Framework from Japanese cultural perspective

With respect to Japanese cultural context, Nishigori et al. (2014) described the concept of Bushido as a value system that means, "the way of the warrior," is corresponding to professionalism. This concept symbolizes a Japanese code of personal conduct extracted from the ancient warriors of Samurai. Seven principal virtues were grouped in the framework of Bushido are rectitude (*gi*), honesty (*sei*), benevolence (*jin*), politeness (*rei*), courage (*yu*), honor (*meiyo*), and loyalty (*chugi*). Rectitude (*gi*) represents the way a person thinks, decide, and behave based on reason, without wavering. It is the first attribute considered as the most important attribute of the Samurai. Courage (*yu*) is the second virtue which is culture specific to Japanese framework means the spirit of bearing and daring, in other word, how one stands, walks, behaves, and doing the appropriate acts when facing danger. Benevolence (*jin*), as a third virtue, combines the concepts of love, sympathy, and pity. It is valued as the highest attribute in the soul of human. It has been translated by medical practice as "medicine as a benevolent art." The Japanese have considered loyalty (*chugi*) to the interests and needs of the group such as hospital staff and family, and they place the needs of groups above individual interest and needs. Therefore, Bushido combined the interests of family and its members.

Discussion

In this section, we will discuss first the three frameworks followed by discussion of commonalities and differences among them.

The Chinese framework added new categories of professionalism in terms of self-dignity, team work, health promotion, and self-management to the conceptualization of professionalism. The strength of Pan et al.'s (2013) framework is that multidisciplinary expert groups using Nominated Group Technique (NGT) prioritized social and cultural attributes of medical professionalism which can benefit health-care providers not only in China but also in other Asian cultures.

The Four-Gates Model in the Arab culture may work for faith-driven societies, but not for non-Muslim Arab students or teachers, or in institutions with humanistic values. The Four-Gates model suggests a move from the classical perception of medical professionalism as a short list of standalone attributes, to link them in a structural pattern of connected professional qualities as coupled in four logical domains (Gates).

Instead of using self-accountability, Al-Eraky et al. (2014) introduced the term *taqwa;* in professionalism, an intrinsic sense of doctor for action and its consequences because they are answerable to Allah. For self-motivation, a new construct of *ehtesab* in which doctors perform their best in teaching, learning, and research and in return expect

reward from Allah was introduced. Interestingly, the center of attention of the Four-Gates is the individual, which is reflected with the presence of "self" in four out of eight attributes. Medical professionalism starts by preparing professionals – themselves – to work in a complex health-care system. In summary, although the last three themes each consisting of six attributes are similar to frameworks of Western culture, this study on the Arabian cultural perspective linked the concept of social accountability with divine accountability. As indicated above, the universal attributes of professionalism are interpreted differently in various contexts, based on the local norms and belief systems.

In regard to the Japanese culture, the attributes of a frequently referenced professionalism Western guide such as the Physician Charter were compared to the Bushido concept. They described the similarities and differences between the attributes including the effect of religion, traditions, and virtues. The researchers suggested that in Japanese culture Bushido's seven principles were applicable to medical professionalism and were fairly comparable to Physician Charter (Nishigori et al. 2014). The notable differences pointed out was the omission of several commitments such as rectitude, courage, politeness, and honor in the Physician Charter that are mentioned and discussed in Bushido, as the Charter described medical professionalism, whereas Bushido explained generally as a code of conduct for the society. Prominent of other differences is the concept of patient autonomy of the individual which is omitted in the Bushido framework but is highly regarded in Western culture.

The studies addressing non-Western perspectives on professionalism thus identified several key similarities and differences regarding professional attributes of medical practitioners. These similarities and differences will be addressed in more details in the next sections.

Commonalities of professionalism cited in non-Western studies

These three frameworks are driven and deeply influenced by cultural norms such as faith in Arab culture and tradition in Chinese and Japanese cultures. A total of 24 attributes were identified from the three articles (Table 4). Many concepts not only were comparable among the studies addressing non-Western context, but also very much comparable to Western culture, such as altruism, honesty and integrity, respect, accountability, teamwork, ethics, clinical competence, commitment and communication, and protection of patient's rights (Chiu et al. 2010; Adkoli et al. 2011; Ho et al. 2011; Pan et al. 2013; Akhund et al. 2014; Al-Eraky et al. 2014; Nishigori et al. 2014) and patients (Cruess et al. 2010; Chandratilake et al. 2012; Leung et al. 2012; Akhund et al. 2014). Notably, in the Eastern world (Al-Eraky et al. 2014; Nishigori et al. 2014), respect has a strong connectivity and influences not only in teaching but also practicing professionalism in medical settings. This is also true in the Western world, but its meaning for teaching and patient care is different in the contemporary Western society. In the non-Western society, the professional relationship between a medical teacher and a student, and likewise, the doctor and the patient is based on the paternalistic approach where decisions are usually made by professionals (Cruess et al. 2010), which has been abandoned as common practice in the Western world, moving toward shared decision-making. In summary, elemental similarities are common denominators in all three non-Western frameworks of professionalism.

Differences of professionalism cited in non-Western studies

Several important aspects described in three non-Western frameworks were notably absent from the Western frameworks. The commonalities stated earlier by the deep cultural influence on the three frameworks are also a source of major differences between them due to the fact that each culture has its own unique values that are reflected in MP. The main differences between the three frameworks are related to culture and prioritization as well as interpretation of attributes. For instance, nine attributes are not common or shared by the three frameworks.

Self-dignity and respect derived from the *Zizhong* culture concept by Ho et al. (2011) equate with integrity; Al-Eraky et al. (2014) introduced a unique dimension to the framework of medical professionalism in Arabian culture in the form of dealing with Allah (God), and under the umbrella of this theme, self-accountability (*taqwa*) and self-motivation (*ehtesab*) were described. Pan et al.'s (2013) and Ho et al.'s (2011) framework differs from the other two models in terms of four additional themes, especially health promotion, self-management, team work, and economic consideration in promoting professionalism.

While comparing the differences between the non-Western studies, this review found the attributes of advocacy, equity, humanism, and economic considerations essential attributes of professionalism in the region of China, Hong Kong, and Taiwan whereas in Saudi Arabia and Japan's culture, these attributes are not considered essential elements of medical professionalism. These similarities and differences described in the previous sections relate to social, economic, and cultural backgrounds.

Practical implication

Based on the findings and the effect of culture on professional attributes, the study may propose an extended framework of professionalism to include sociocultural factors as background variables such as faith in Arabic culture and Bushido in Japanese culture; these background factors positively or negatively influence professional attributes. The prioritization of the attributes reflects the importance to each culture. The proposed model may be completed by adding a third level which is the outcome of professional attributes on health indictors such as patient and provider satisfaction as well as better health care.

This study provides strong evidence that professionalism is contextual, and therefore including culture-specific elements in curricula and continuous professional development programs regarding teaching and assessing professionalism in medical education seems a logical consequence. Further research is however needed to develop and empirically test the suggested extended model of professionalism and the impact on teaching and assessing professionalism in different contexts.

Limitations of the study

One of the limitations of this study is the utilization of narrative review as a method. This type of review which depends on few studies may bring an element of bias which affects generalization of findings to the universe 29-30. However, we took all the measures to make it more objectives by carefully following all the steps of conducting an overview.

Conclusions

This narrative overview revealed four major findings. First, only four studies attempted to develop a three culture-tailored non-Western framework for medical professionalism (Nishigori et al. 2014); Al-Eraky et al. (2014), Ho et al. (2011), and Pan et al. (2013) representing Japan, Arab world, and China, respectively were identified. Pan et al. (2013) extended the framework developed by Ho and associates (Ho et al. 2011). These studies provided culture-specific elements in a *unique* conceptual framework of medical professionalism representing the region they originated from. Second, the three identified non-Western frameworks have commonalities of universally praised attributes, but they were interpreted differently in various cultures. For instance, integrity was relevant to *Zizhong* in Chinese Confucian values, while self-motivation and self-accountability were interpreted as *taqwa* and *ehtesab* in Arabian context, respectively. The differences thus concern the interpretation and prioritization of the attributes. Medical professionalism is context-specific. There is no single framework on professionalism that can be globally acknowledged. A culture-oriented concept of professionalism is necessary to understand what the profession is dedicated to and to incorporate the concept into the medical students' and physicians' professional identity formation. Finally, the authors propose an extended framework to include culture as background to attributes leading to an outcome on health care.

Disclosure statement

The authors report no conflicts of interest. The authors alone are responsible for the content and writing of the article.

Funding

The publication of this supplement has been made possible with the generous financial support of the Dr Hamza Alkholi Chair for Developing Medical Education in KSA.

Notes on contributors

Dr. Ahmed Al Rumayyan, MBBS, MMEd, FAAP, FRCPC is currently the Dean, College of Medicine and Associate Professor, Pediatrics, King Saud bin Abdulaziz University for Health Sciences, Riyadh, Saudi Arabia (KSAU-HS). He is a Pediatric Neurologist/Epileptologist, Department of Pediatrics, Ministry of National Guard Health Affairs, Riyadh, Saudi Arabia and a Master Degree holder in Medical Education from College of Medicine, (KSAU-HS).

Prof. Dr. Walther N.K.A. van Mook, is an Internist – intensivist at the Department of Intensive Care Medicine, Maastricht UMC; Director of the Academy (Dean) for Postgraduate Medical Training, Maastricht UMC & Academy | Maastricht UMC; Professor of Professional Development in Postgraduate medical training, Faculty of Health, Medicine and Life Sciences (FHML) | Maastricht University.

Dr. Muhammad Athar Khan, MBBS, MCPS, MBA, DPH, DCPS-HCSM, DCPS-HPE, PGD in Statistics, is an Associate Professor at College of Medicine & Dentistry, Liaquat Pakistan. He is also a PhD candidate at the Dow University of Health Sciences, Pakistan, where he furthers his research on childhood obesity in Pakistan. His main area of interest and research are public health, epidemiology, bio-statistics and medical education. His teaching areas are public health, research and medical education at both under and postgraduate levels.

Prof. Mohi Eldin Magzoub, MBBS, MSc, MFPHM, PhD, is a Professor of Medical Education and founding chair of the Department of Medical Education at King Saud Bin Abdulaziz University for Health Sciences, Riyadh, Saudi Arabia. Previously he was the Regional Advisor for Health Professions Education, EMRO, WHO and a founding Dean of the Faculty of Health Sciences, University of Gezira, Sudan.

Dr. Mohamed M. Al-Eraky, MBBCh, MSc, MMEd, PhD, is an Assistant Professor of Medical Education who holds a Master Degree in Medical Education from Dundee University (UK) and a PhD in Health Professions Education from Maastricht University (The Netherlands). He is currently appointed as Director of Development & Academic Initiatives at the Vice-President Office for Academic Affairs at Imam Abdulrahman Bin Faisal University, Saudi Arabia.

Dr. Mazen Saleh Ferwana, ABFM, JBFM, PhD is a Consultant of the Department of Family Medicine & Primary Healthcare in King Abdulaziz Medical City, Ministry of National Guard Health Affairs. He served as the Co-Director of National & Gulf Center for Evidence Based Health Practice, College of Public Health & Health Informatics, King Saud bin Abdulaziz University for Health Sciences. Presently, he is the Associate Professor of Family & Community Medicine, College of Medicine, King Saud Bin Abdulaziz University for Health Sciences Riyadh, Kingdom of Saudi Arabia.

Diana H.J.M. Dolmans, PhD, is a Professor of Innovative Learning Arrangements within the School of Health Professions Education/ Department of Educational Development and Research at Maastricht University, the Netherlands.

References

ABIM Foundation, ACP-ASIM Foundation, European Federation of Internal Medicine. 2003. Medical professionalism in the new millenium: a physician charter. J Am Coll Surg. 196:115–118.

Adkoli BV, Al-Umran KU, Al-Sheikh M, Deepak KK, Al-Rubaish AM. 2011. Medical students' perception of professionalism: a qualitative study from Saudi Arabia. Med Teach. 33:840–845.

Akhund S, Shaikh ZA, Ali SA. 2014. Attitudes of Pakistani and Pakistani heritage medical students regarding professionalism at a medical college in Karachi, Pakistan. BMC Res Notes. 7:150.

Al-Eraky MM, Donkers J, Wajid G, van Merrienboer JJ. 2014. A Delphi study of medical professionalism in Arabian countries: the Four-Gates model. Med Teach. 36:S8–S16.

Blank L, Kimball H, McDonald W, Merino J, Foundation ABIM, Foundation ACP, European Federation of Internal Medicine. 2003. Medical professionalism in the new millennium: a physician charter 15 months later. Ann Intern Med. 138:839–841.

Chandratilake M, McAleer S, Gibson J. 2012. Cultural similarities and differences in medical professionalism: a multi-region study. Med Educ. 46:257–266.

Chiu CH, Lu HY, Arrigo LG, Wei CJ. 2010. A professionalism survey of medical students in Taiwan. J Exp Clin Med. 2:35–42.

Cruess SR. 2006. Professionalism and medicine's social contract with society. [Review]. Clin Orthop Relat Res. 449:170–176.

Cruess RL, Cruess SR, Johnston SE. 2000. Professionalism: an ideal to be sustained [Review]. Lancet. 356:156–159.

Cruess SR, Cruess RL, Steinert Y. 2010. Teaching professionalism across cultural and national borders: lessons learned from an AMEE workshop. Med Teach. 32:371–374.

Cruess SR, Johnston S, Cruess RL. 2002. Professionalism for medicine: opportunities and obligations. Med J Aust. 19177:208–211.

Evetts J. 2003. The sociological analysis of professionalism: occupational change in modern world. Int Sociol. 18:395–415.

General Medical Council. 2001. Good medical practice: the duties of a doctor registered with the General Medical Council. Med Educ. 35:70–78.

Green BN, Johnson CD, Adams A. 2006. Writing narrative literature reviews for peer-reviewed journals: secrets of the trade. J Chiropr Med. 5:101–117.

Hafferty FW. 2006. Definitions of professionalism: a search for meaning and identity. Clin Orthop Relat Res. 449:193–204.

Ho MJ, Yu KH, Hirsh D, Huang TS, Yang PC. 2011. Does one size fit all? Building a framework for medical professionalism. [Comparative Study). Acad Med. 86:1407–1414.

Irvine D. 1997. The performance of doctors. I: Professionalism and self regulation in a changing world. [Review]. BMJ. 314:1540–1542.

Leung DC, Hsu EK, Hui EC. 2012. Perceptions of professional attributes in medicine: a qualitative study in Hong Kong. Hong Kong Med J. 18:318–324.

Nishigori H, Harrison R, Busari J, Dornan T. 2014. Bushido and medical professionalism in Japan. Acad Med. 89:560–563.

Pan H, Norris JL, Liang YS, Li JN, Ho MJ. 2013. Building a professionalism framework for healthcare providers in China: a nominal group technique study. [Research Support, Non-U.S. Gov't]. Med Teach. 35:e1531–e1536.

Pellegrino ED, Relman AS. 1999. Professional medical associations: ethical and practical guidelines. JAMA. 282:984–986.

Sohl P, Bassford HA. 1986. Codes of medical ethics: traditional foundations and contemporary practice. [Historical Article]. Soc Sci Med. 22:1175–1179.

Van De Camp K, Vernooij-Dassen MJ, Grol RP, Bottema BJ. 2004. How to conceptualize professionalism: a qualitative study. Med Teach. 26:696–702.

Wear D, Kuczewski MG. 2004. The professionalism movement: can we pause?. Am J Bioeth. 4:1–10.

Woodruff JN, Angelos P, Valaitis S. 2008. Medical professionalism: one size fits all?. Perspect Biol Med. 51:525–534.

Zijlstra-Shaw S, Robinson PG, Roberts T. 2012. Assessing professionalism within dental education; the need for a definition. Eur J Dent Educ. 16:e128–1e136.