



## Teaching communication skills and medical ethics to undergraduate medical student

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### Abstract

**Introduction:** The purpose of this study was to improve communication skills and knowledge of bioethics of last year medical students doing clerkship and to evaluate the effectiveness of using workshops for this purpose from students' point of view, in order to continue such programs in future.

**Methods:** After Ethical approval for the study a two-day workshop on teaching effective communication skills and principles of medical ethics was planned and conducted by the department of Medical Education through multidisciplinary faculty of Foundation University Medical College, Pakistan. A total of 102 last year medical students participated in this workshop. The students were divided into 8 groups each containing 12 students. A team of pre trained facilitators for each group conducted the group activities. Teaching strategies including interactive discussions on basic principles of doctor-patient relationship, power point presentations, day to day case scenarios, video clips and presentations involving students in role plays were used. Pre and post workshop self evaluation proformas about knowledge and skills of communication and medical ethics were rated (0=none, 1=below average, 2=average, 3=above average, 4=very good, 5=excellent) by the students.

**Results:** 89 out of 102 participants returned the proformas. A significant percentage of students (%82) showed improvement in their knowledge and skills of appreciating bioethical issues like valid informed consent, patient confidentiality, end of life issues and breaking bad news by rating as "very good" after participation in the workshop. More than %70 students recommended this activity for other students.

**Conclusion:** Teaching through interactive workshops was found to be an effective method as reflected by students' feedback. Therefore, the program will be continued in future.

**Keywords:** Communication skills, Medical ethics, Undergraduate medical students

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### Introduction

Professionalism is the core competency of physicians, developed over the framework of clinical competence, effective communication skills and sound knowledge of ethical and legal aspects of medicine (1). These attributes cannot be learned by chance alone; they can be taught, learned and assessed. One of the major reasons to incorporate these skills into medical education is to improve overall patient care (2). Effective communication skills and sound knowledge of ethical issues contributes to better doctor-patient relationship and medical outcome (3, 4). Studies from south Asian countries depict that

medical students lack knowledge and realization of the existence of institutional ethics committee and its exact role. Students show mixed responses--both desirable and undesirable in relation to questions regarding different facets of basic ethical reasoning in their professional lives (5, 6). Most students agree that there is a need to integrate ethics teaching programs into their curriculum. Results of these studies emphasize the incorporation of medical ethics and communication skills in medical curriculum (7, 8). Another reason to teach medical ethics is that medical students have been shown to face problems especially poor decision making and inability to communicate,

where they have to deal with ethical dilemmas like confidentiality, doctor-patient relationship and informed consent (9). Teaching medical ethics and communication skills would improve the moral reasoning of physicians when facing ethical dilemmas in their practice. Various methods have been successfully employed in teaching communication skills and medical ethics including lectures, small group discussions, ward rounds, standardized patients, role modeling, etc (3,4).

Integrated contextual curriculum was introduced in 2009 at Foundation University Medical College. Communication skills and medical ethics teaching has formally been introduced from first year MBBS since 2011 in the form of small group discussions over standardized patients during skills lab sessions. The outgoing class of last year MBBS was taught through a conventional system where no formal teaching program was devised to teach medical ethics and communication skills during their studies. Therefore, a two-day interactive workshop on developing effective communication skills and medical ethics was planned for them. The present study evaluates the effectiveness of this workshop in improving communication skills and medical ethics knowledge of last year MBBS students. The purpose of this study was to improve communication skills and knowledge of bioethics of last year medical students doing clerkship and to evaluate the effectiveness of using workshops for this purpose from students' point of view, in order to continue such programs in future.

## Methods

A two-day workshop on teaching effective communication skills and principles of medical ethics was planned and administered by the department of Medical Education through the multidisciplinary team of Foundation University Medical College, in April 2012. Ethical approval for the study was taken from the university ethical review committee. A total of 102 students (67 girls and 35 boys) of last year MBBS with the age range of 22-25 years participated in this workshop. Pre workshop intimation and the reading materials regarding medical ethics were provided to the students a week before the workshop. On day one, the participants were divided into eight small groups with about 10 to 13 students in each. Anonymous self assessment pro formas with code numbers were provided to the students and they were asked to remember the codes so that the same codes could be written and matched with the post workshop self assessment proformas. Students rated their pre workshop knowledge and communication skills

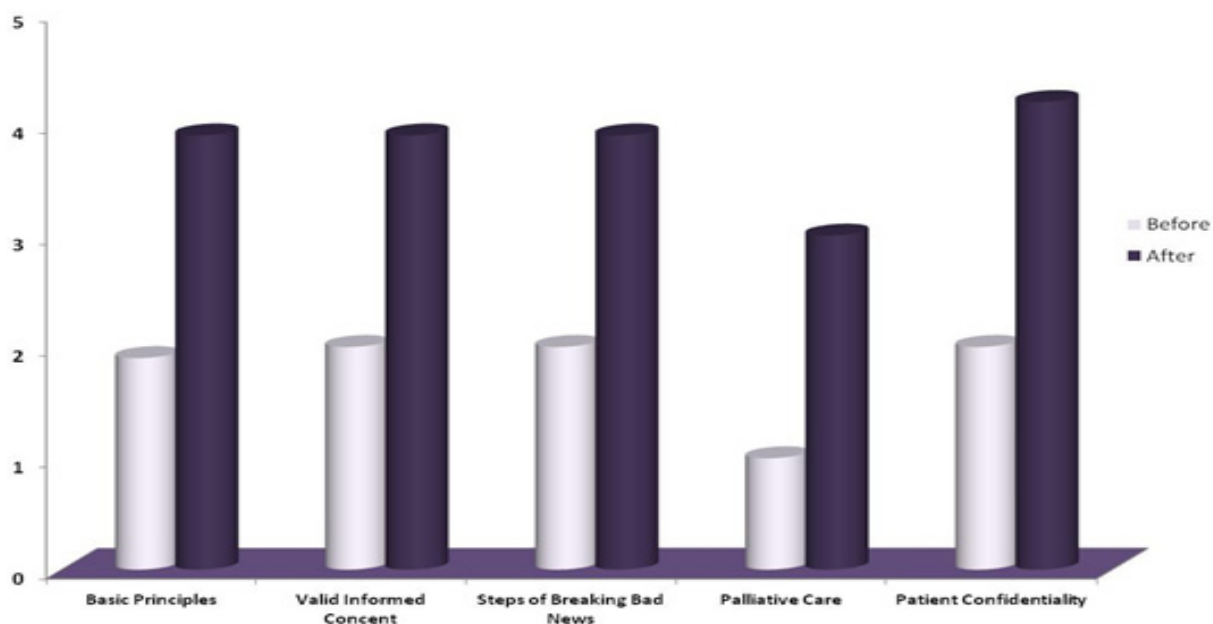
regarding the following categories on likert scale:

1. Principles of bioethics
2. Informed consent
3. Breaking bad news
4. Palliative care
5. Patient confidentiality

Where 0 was no knowledge, 1=below average, 2=Average, 3=Good, 4=very good and 5 was excellent. After the completion of the proformas, they were collected by the coordinator of the workshop. Large group interactive sessions on importance of good communication skills, history of medical ethics, and examples of ethical dilemmas faced by physicians were discussed by a subject expert. Students were encouraged to discuss ethical issues faced by them during their ward rotations. Video clips provided by Center of Bioethics and Culture, Sindh Institute of Urology and Transplant (SIUT) were displayed. Permission to use the material was taken from SIUT beforehand. Next, small group activity was arranged where case scenarios related to informed consent, breaking bad news, palliative care and patient confidentiality were discussed with pre trained facilitators from multidiscipline. For homework, theme related literature was provided to the group members and they were asked to prepare case scenarios for role plays on day 2. On day 2, the case scenarios and role plays were discussed and amended under the guidance of facilitators. Individual students were given time to rehearse their communication skills while preparing role plays according to the theme allotted to their group. Individual group presentations were done in classroom. After each role play the group members concluded their case and how they resolved the ethical dilemma. House and faculty were invited for questions. Presentations were judged by two members of ethical committee and one clinician on Communication Skills Attitude Scale (CSAS) (10). The best presenting group was awarded a shield. Post workshop proformas were provided for the students. They were asked to write same code numbers which were present on their pre workshop proformas. Pre and post workshop pro formas were matched with the codes by the coordinator and handed to the workshop organizers.

## Results

The collected data were analyzed using SPSS version 14. Mean response of students for each category was calculated before and after the workshop. Improvement in knowledge and skills was considered, if mean pre and post workshop response difference was statistically significant with  $p \leq 0.05$  using paired



**Figure1.** Mean changes in knowledge of medical ethics of students before and after workshop

sample t test. Out of 102 a total of 89 proformas were completed. %82 of the students had an improvement from an average (2 before workshop) to very good (4 post workshop) in their basic knowledge of medical ethics, informed consent and steps of breaking bad news. The students’ knowledge about palliative care showed a remarkable improvement with an average response from 1.2 pre workshop to 3.9 post workshop. Similarly a significant improvement was recorded in the knowledge of maintaining or breaking patient confidentiality (%84). Overall %78 of the students felt improvement in their ability to take valid informed consent, break bad news, discuss palliative care with patient and decide upon patient confidentiality from below average to very good. Mean responses on likert scale are shown in figure 1 and Table 1. Almost %74 of the students recommended this activity for the upcoming class of final year.

**Discussion**

The importance of good communication skills

and knowledge of medical ethics cannot be overlooked. Lack of inculcating these competencies in undergraduate medical students would transform them into professionals demonstrating adverse medical outcomes including yelling, abuse, insults, refusal to complete duties, etc. Evidence shows that these skills can be both learned and assessed by different teaching and feedback techniques. Didactic lectures, Web based learning modules, interactive teaching models, for example, case discussions, hands-on practice sessions, role modeling and grand rounds have been shown as effective teaching strategies (1). Interactive workshops with a combination of lectures, videos, case discussions and small group activities were therefore planned for the students.

In the present study the reason for selecting basic themes, i.e. (a) Principles of bioethics (b) Informed consent (c) Breaking bad news (d) Palliative care and (e) Patient confidentiality was that in a two-day workshop not every aspect of ethics could possibly be covered. Therefore, the content of the workshop was

**Table 1.** Comparison of managers’ leadership style and maintenance motivational needs of employees

Categories	Average pre workshop score	Average post workshop score	P
Taking valid informed consent	1.5	3.5	< 0.05
Breaking bad news	1	3	< 0.05
Discussing palliative care and end of life issues	1.2	3.9	< 0.05
Deciding and communicating about keeping or breaking patient confidentiality	2	4	< 0.05
Presentation skills	2	3	< 0.05

carefully devised with the help of subject experts and clinicians to highlight common issues faced by the students during their clerkship in the last year. It is noted that students often come across ethical dilemmas in their clinical rotations. A survey on evaluation of frequency and type of ethical issues faced by medical students was carried out by Sarah L Clever et al. on 103 third and fourth year medical students of the University of Washington. The researchers reported that medical students often faced ethical issues and felt uncomfortable to speak up about their concerns, suggesting a need to train students in both knowledge of medical ethics and effective communication skills to resolve such problems (11).

Pre workshop knowledge of medical ethics of our last year medical students of MBBS was below average and the significant improvement after the workshop suggests the achievement of the objectives. The students especially found themselves lacking in the knowledge of palliative care before the workshop, which is not unusual because palliative care is not yet part of the traditional curriculum. In addition, there is a debate still going on in the west on how undergraduate palliative care education and its assessment should be incorporated in the curriculum. In a study carried out by Schulz, C. et al. pre and post undergraduate palliative care education program effectiveness was assessed and compared between two groups of students using two independent self administered tools based on likert scale. Self estimation of improvement in knowledge and skills was highly significant in undergraduates exposed to the palliative care education program compared to the control group (12). Results of the present study are consistent with Schulz, C. et al., that is the students' knowledge improved from no knowledge (1 on scale) to good knowledge (3).

Improvement only in knowledge of medical ethics is not enough to change daily practice of physicians. Therefore, communication skills teaching and clinical teaching should be consistent and complementary (13). For the same reason, small group activities and role plays were included in this workshop to let the students practice communication skills from their acquired knowledge. Studies reveal that employing role plays as a simulation method for developing necessary patient-care skills, including communication results in superior outcomes (14, 15).

This workshop was planned for last year students because they had not been delivered any formal teaching sessions of medical ethics and communication skills during their previous undergraduate years. With the advancement of medical education this inadequacy was identified. A study conducted at King Faisal University, Saudi Arabia also confirmed inadequate

formal training of medical students in medical ethics in developing countries and strongly recommended regular bioethics teaching in clinical settings (16). Murat Civaner, et al. express the importance of medical ethics education in undergraduate and post graduate terms to develop core professional values in physicians-to-be (17).

The main limitation of the present study is that it did not measure actual improvement in the students' performance in their clinical rotations. However, a review of literature indicates measurable improvements in knowledge, ability to handle ethical dilemmas and patient care when ethical education is incorporated in residency programs (18). We intend to follow these students in their house job and use feedback methods to evaluate this activity and measure improvement in their overall performance as doctors.

## Conclusion

After a two-day interactive workshop with multiple learning strategies, a significant improvement was found in communication skills and knowledge of medical ethics by medical students on the basis of self evaluation proformas. Teaching through interactive workshops was found to be an effective method and will be continued for other students.

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