Patient Attitudes Towards Medical Students In Riyadh, Saudi Arabia

Hamza Mohammad Abdulghani, Mohammed Othman Al-Rukban, Shaik Shaffi Ahmed

Assistant Professor & Consultant Family Physician Department of Family & Community, Medicine College of Medicine, King Saud University, Assistant Professor and Consultant Family Physician Department of Family & Community, Medicine College of Medicine, King Saud University

Introduction: The aim of this study was to describe patients’ attitudes toward medical students.

Materials and Methods: This study was conducted for 2 months at 2 hospitals. The randomly selected patients were interviewed using a questionnaire. Data were analysed using SPSS software. Pearson’s chi-square test was used to look for associations between different attitudes and other categorical variables. Student t-test and one-way analysis of variance were also used.

Results: Of the 492 patients surveyed, 51% were outpatients, 50% were males, 73.8% were married and 60.2% had interacted with medical students before. The majority of the patients (80.7%) felt that the general appearance and manner of the medical students affected their co-operation with the latter (P = 0.003), while 63% stated that they should be informed beforehand (P = 0.005). More than half of the patients believed that they had the right to refuse medical students and 57.9% preferred medical students of the same sex (P = 0.01). Forty-two per cent of the patients preferred the presence of the physician alone during examination, while 38% would accept the presence of both physician and students. The patient’s preferences were different towards the visiting hours of medical students.

Discussion: Maintaining privacy seems to be the most important aspect of patient-doctor relationship. A significant proportion of patients do not practically cooperate well with medical students. However, improved collaborations with patients would provide better teaching opportunities for students at most levels of patient care.

Conclusion: Prior information about the involvement of medical students in patient care was the crucial aspect in establishing a positive patient-medical student relationship. Patients prefer medical student participation to be based on their consent, and visits to patients should be restricted to certain times, as preferred by patients.

REFERENCES

ABSTRACT NUMBER: PS2
Evolving From Competency To Capability In Chiropractic Education
Phillip Ebrall
The Division of Chiropractic School of Health Sciences RMIT University PO Box 71, BUNDOORA VIC 3083 AUSTRALIA

Objective: To demonstrate using contemporary theories of learning and teaching that competencies are weak measures of the preferred educational outcomes of educational programs in the chiropractic discipline. It is argued competencies must immediately be replaced by higher level graduate capabilities.

Discussion: Reference is made to a hierarchy of knowledge described by the educator Biggs and competencies are shown to lie at the lower levels of this hierarchy, namely about the level of declarative and procedural knowledge. In contrast graduate capabilities are shown to be about place and time and the measures of how and where learned skills apply. As such they graduate up the knowledge hierarchy and represent conditional and functioning knowledge and provide a more realistic mechanism for the student to make the transition from university to professional knowledge.

Conclusion: Clinical educators hold a primary responsibility to their graduates and the things that will affect their practice in whatever global environment they find themselves. It is imperative that capability-based curricula items replace those based solely on competencies to ensure chiropractic programs produce graduates that retain a high degree of relevance in the rapidly changing field of health care.

INDEX TERMS
MESH: COMPETENCY-BASED EDUCATION; CHIROPRACTIC EDUCATION; CLINICAL COMPETENCE.
Index to Chiropractic Literature: COMPETENCY-BASED EDUCATION; EDUCATION, CHIROPRACTIC; EDUCATION, CHIROPRACTIC/AUSTRALIA; EDUCATION, CHIROPRACTIC/STANDARDS; EDUCATION, CHIROPRACTIC/TRENDS

ABSTRACT NUMBER: PS3
IMU Through Students’ Eyes: The IMU-REEM
Hla Yee Yee, Catherine Arokiasamy, Kellyn Fang & Rohayati Raben
Centre for Medical Education, The International Medical University, Kuala Lumpur, Malaysia

Introduction: The students’ educational environment is critical in achieving educational outcomes. A robust curriculum delivered by quality teachers in an optimum setting physical or otherwise would ensure that these outcomes are achieved. A trend is emerging in recent years where medical schools are trying to evaluate the educational environment. The Dundee Ready Education Environment Measure (DREEM) is widely used as a ‘diagnostic’ tool of the educational quality assessment and has been validated and tested in a range of settings from tutorial level to whole school cohorts in many medical schools (Roff et al., 2005). The IMU-REEM is derived from DREEM, with a slight modification in terminology to fit IMU’s situation.

Materials and Methods: The IMU-REEM assesses 5 domains of educational environment that involves 50 items (questions). Each item is scored 0 – 4 with (0 = Strongly Disagree; 1 = Disagree; 2 = Unsure; 3 = Agree; and 4 = Strongly agree). Ratings for negative items were changed to the equivalent ratings for positive items using the ‘TELEform’ software. Scores for each item were summed up according to domains and the approximate guide of interpretation is provided in Table 1.

Table 1: Approximate Guide to Interpret IMU-REEM

<table>
<thead>
<tr>
<th>Domains</th>
<th>Items</th>
<th>Max Score</th>
<th>Interpretation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Students' perception of learning</td>
<td>12</td>
<td>48</td>
<td>0-12: Very poor 13-24: Teaching is viewed negatively 25-36: A more positive perception 37-48: Teaching highly thought of</td>
</tr>
<tr>
<td>Students' perception of teaching</td>
<td>11</td>
<td>44</td>
<td>0-11: Abysmal 12-22: In need of some retraining 23-33: Moving in the right direction 34-44: Model Teachers</td>
</tr>
<tr>
<td>Students' academic self-perception</td>
<td>8</td>
<td>32</td>
<td>0-8: Feelings of total failure 9-16: Many negative aspects 17-24: Feeling more on the positive side 25-32: Confident</td>
</tr>
<tr>
<td>Students' social self-perception</td>
<td>7</td>
<td>28</td>
<td>0-7: Miserable 8-14: Not a nice place 15-21: Not too bad 22-28: Very good socially</td>
</tr>
<tr>
<td>Total measurement</td>
<td>50</td>
<td>200</td>
<td>0-50: Very poor 51-100: Plenty of Problems 101-150: More positive than negative 151-200: Excellent</td>
</tr>
</tbody>
</table>

The Centre for Medical Education had conducted the first survey of IMU-REEM for the five semesters of the Phase 1 (preclinical) during Nov-Dec, 2005 and in Phase 2 (clinical)
in the first half of 2006. A repeat survey has been completed for Phase 1 Medical Sciences in the latter half of 2006. These involved seven cohorts of students, with a total of 694 + 831 students respectively.

Results

Table 2: Scores for Semesters 1 to 5 for the five domains

<table>
<thead>
<tr>
<th>Domain</th>
<th>2005</th>
<th>2006</th>
<th>Interpretation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Perception of Learning</td>
<td>27.5 to 30.7</td>
<td>27.41 to 31.25</td>
<td>more positive</td>
</tr>
<tr>
<td>Perception of Teaching</td>
<td>26.9 to 29.1</td>
<td>24.41 to 28.35</td>
<td>moving in the right direction</td>
</tr>
<tr>
<td>Academic Self-perception</td>
<td>16.6 to 18.6</td>
<td>16.21 to 21.05</td>
<td>feeling more on the positive side</td>
</tr>
<tr>
<td>Perception of Atmosphere</td>
<td>27.2 to 30.3</td>
<td>25.5 to 31.57</td>
<td>a more positive atmosphere</td>
</tr>
<tr>
<td>Social self Perception</td>
<td>15.8 to 17.7</td>
<td>15.73 to 18.41</td>
<td>not too bad</td>
</tr>
</tbody>
</table>

The scores for the five domains were consistently in the acceptable range (50% of total score and above), although social self-perception scores just made it to “satisfactory”, an observation consistent with others’ findings (Roff et al., 2001; Bassaw et al., 2003).

Discussion: Comparison of two observations for the three cohorts of students who were observed twice showed significant improvement in scores with the repeat survey, the most significant being in the academic self-perception component. This could very well reflect that the students have adjusted to their life and learning in IMU.

Interestingly, scores for Semester 2 were significantly lower than the other semesters in four out of the five categories. This could be explained by the fact that this particular cohort contains more band 3 and 4 students (the lower bands) on entry; exposure to Semester 2 which comprises of “heavy” disciplines like general microbiology, pathology, pharmacology after Semester 1 (comprising of basic Anatomy, Physiology, Biochemistry) could have made the students feel more stressed. Added to this is the fact that with the new examination regulations that will take effect with this cohort, they are under the pressure of an impending “big bang” examination for Semesters 1 & 2.

REFERENCES


ABSTRACT NUMBER: PS4

Stress Experienced By Medical Students: Fact Or Fiction?

Pereira X V1, Fok J S2, Hong S S2, Lim L W2

1Clinical School, International Medical University, Seremban, Negeri Sembilan, Malaysia, 2Ministry of Health, Malaysia

Introduction: Training to become a medical professional is stressful. The idealistic notion of becoming a healer and lifesaver is often drowned under the pressures of training to become a doctor. This paper attempts to explore stress experienced by medical students in clinical training.

Materials and Methods: A survey was done among medical students in the International Medical University (IMU) clinical school to explore the experience of stress. A questionnaire was administered to the student population assessing prevalence, sources and consequences of stress. Ways in which the students coped with stress were also studied.

Results and Discussion: 152 students from Years 3, 4 and 5 responded to the questionnaire. Most (97.4%) of the respondents admitted to experiencing stress. The main source of stress was academic stress (61-69%). The aspects of life most affected by stress were interpersonal relationships, health and academic performance. The two most common strategies used to cope with stress were sleeping and listening to music. The majority of students (55%) felt that stress was good because it motivated them to study. Yet 72% thought that stress affected their academic performance. An overwhelming majority (92%) thought it was still worthwhile studying medicine in spite of the stress.

REFERENCES

4. Firth J. Levels and Sources of Stress in Medical Students. BMJ 1986; 292: 1177-80

Abstract from the International Medical Education Conference 2007
**Abstract Number: P55**

**Perception Of Medical Students On Standard Precautions In Relation To HIV, HBV, HCV Infections**

Nagamani H, S T Kew, T Song, J Abdullah

Clinical Sciences Section, International Medical University, Malaysia

**Introduction:** Globally, knowledge and perception of standard precautions amongst health care professionals is inadequate, and the compliance low. Guidelines for protecting health-care workers from becoming infected with blood-borne infections like human immunodeficiency virus (HIV), hepatitis B virus (HBV), and hepatitis C virus (HCV) were developed in 1985, and these are now known as universal Precautions. More recently they were renamed “Standard Precautions”. However, research continues to report less than full compliance among health care professionals with standard precaution guidelines. Medical students are the future health care professionals, and are at high risk of exposure to blood-borne pathogens during their training years.

The aim of our study was to assess the knowledge and perception of medical students of the International Medical University (IMU) in Malaysia, and to formulate further teaching strategies, if needed, for standard precautions.

**Materials and Methods:** The medical students, from semester 1 to 10, were asked to complete 14 combination questionnaires.

**Results and Discussion:** 1,103 students completed and returned the questionnaires. On evaluation, Phase 1 students (semesters 1 to 5) scored 80.9% on the average, while phase 2 students (semesters 6 to 10) scored 88.4% on the average for knowledge and perception of standard precautions. The study demonstrates the level of awareness about the standard precautions amongst the IMU medical students. Though it is reasonably good, the results still suggest the need to continually emphasize the standard precautions through out the undergraduate medical education.

**REFERENCES**


---

**Abstract Number: P56**

**Selecting Medical Students: The School Academic Performance Or Interviews?**

Shailja Sharma, Shubhadra Pillay, Nagarajah Lee, Perera Joachim

International Medical University, Bukit Jalil, Kuala Lumpur, Malaysia

**Introduction**

There is an increase in demand for entry into medical undergraduate courses throughout the world. The appropriate selection criteria for the medical schools are mandatory as the quality of the health delivery system depends on the quality of the end product of the medical undergraduate course. In most of the public universities, the major criteria for selection is the candidate's academic potential. As this increases the affinity of selecting larger proportion of candidates from educationally advantages schools, some consider this method of selection inequitable. Most medical schools especially in the private sector, evaluate the personal qualities and attitudes, communication skills and the ability of critical thinking by means of a pre selection interview. The International Medical University uses the academic score and an interview score in selecting the candidates into its medical undergraduate course. The objective of this study is to analyse the validity of the two selection criteria in relation to the academic performance and educational development.

**Materials and Methods**

The study was done using the following data of 391 medical undergraduate students, collected retrospectively

1. The academic band of each student, which was based on their grades obtained in three science subjects at the pre university examination.
2. The score that each student obtained at an interview conducted by two interviewers.
3. The scores obtained by each student at the summative assessments at the Foundation level and semester 3 and 5 levels.

**Results**

The mean scores for the end of Semester One, Three, and Five examinations for the M1/04 group are 74.00, 69.63, and 73.93 respectively while for the M2/04 cohort the mean scores range from 75.70 to 77.90 where the end of semester three cases will have to repeat the course. Those who are successful in the re-sit will continue to the next semester and the failure cases will have to repeat the course.

Students’ results were further compared for significant difference according to academic banding. The findings showed some interesting pattern; the mean scores for all the three examination formed consistent clusters. The average scores of students from band ONE and TWO are close to each other while the band THREE and FOUR students displayed similar academic performance. Also, students’ academic performance between these two clusters were significant with...
students from Band ONE and TWO having higher scores. This pattern was observed in both the cohorts, M1/04 and M2/04. Further comparisons between academic banding and academic performance revealed that the association between these two variables was obvious for End of Semester One examination, where significantly greater percentage of students in band ONE have high scores in the EOS compared with students from the lower bands. However, this association became weaker for the EOS 3 and EOS 5 examination. This provides evidence for the positive association between academic banding and students’ academic performance during the beginning years in the medical program, but it fades gradually once they enter higher semesters. As for the interview scores, there seems to be no clear association between these scores and the students academic performance. This is evident from the similar average interview scores for all the students regardless of their academic banding.

Discussion
The results showed that a higher percentage of students in Band 1 and 2 scored more than 65% in foundation level examination and semester 3 examination compared to that of the Band 3 and 4 students. This indicates the importance and validity of the academic score as selection criteria. There is no significant difference in the scores obtained and the different banding for the semester 5 assessment thus indicating that even students of the band 3 and 4 have the capability of personal development with time and maturity.

The interview scores did not show any correlation with the in course academic performances at any level. This has to be accepted as: the criteria assessed at the interviews are not the capability of performing well at assessments but the ability for continuous educational and professional development. There is no difference in the interview scores between the upper and lower bands, demonstrating that band 3 and 4 candidates have the same ability at personal and educational development as the candidates at band 1 and 2. The fact that band 3 and 4 students have performed to the same standard as the band 1 and 2 with time and maturity proves this to a certain extent. The interviews have a place in selecting candidates which have the capability of improving educationally and professionally.

Recommendations
1. Banding should be considered as valid criteria in selecting candidates.
2. Interviews should not be discarded based on the lack of correlation between the interview scores and performance at undergraduate assessments
3. The objectivity of the interviews should be clearly laid down and measures should be taken to improve their quality.

REFERENCES

ABSTRACT NUMBER: P57
Self-Perception Of Obesity Among Students And Role Of Peak Expiratory Flow Rate
K M Padmavathy
Principal Lecturer (School of Medicine), Asian Institute of Medicine, Science & Technology, Aman Jaya, 08000 Sungai Petani, Kedah Darul Aman, Malaysia

Introduction: Obesity is an important problem in Malaysia and several other countries (Siedell J. C. 1995; Flegal et al 1998). Weight gain is ultimately a consequence of multiple environmental and biological factors that encourage behaviours resulting in positive energy balance. However it has generally failed to produce meaningful motivation for remedial dieting and regular exercise. This presentation is an attempt to find out some reasons for this failure.

Materials and Methods: The subjects who participated in this study were 175 students of Asian Institute of Medicine, Science and Technology, Malaysia aged 18 to 30 years. The physical parameters, physical activity habits (leisure-time physical activity - LTPA) and obesity self-perception data were elicited from the students by allowing the students to fill up a questionnaire. LTPA reported by the participants was classified using accepted concepts (Ainsworth et al 1993). Peak expiratory flow rates (PEFR) were obtained from the subjects before and after moderate exercise.

Results: Self-perception of obesity varied widely among the students. Those with high obesity perceived their obesity effectively and modified their leisure time activities accordingly. It was observed however that the subjects in the range of moderate obesity failed to perceive their obesity. In this range, their PEFR increased with increasing measures of obesity. The data support the conclusion that PEFR is a determinant of self-perception of obesity.

Discussion: Pulmonary functions are invariably related to obesity. Obese people have to overcome increased respiratory resistance resulting from reduced lung volume and air-way resistance. This causes diminished expiratory flow rates in proportion to reduced lung volumes (Zerah F., Harif A. et al 1993). In this study evaluating the impact of leisure-time physical activity (LTPA) on self-perceived obesity has shown that body-mass index (BMI) does not correlate with LTPA. However, there is moderate amount of positive correlation between BMI and PEFR. Besides the above, PEFR shows positive correlation with LPTA. This study also throws more light into the query why the obese are not motivated to do exercise.

REFERENCES
Biology At Pre-University Level: Does This Provide An Advantage To Medical Students?

Ponnudurai G, Chen Y S, Nagarajah L, Hla Yee Yee, Achike F

International Medical University, Malaysia

Introduction: Entry into the medical programme at the International Medical University (IMU) requires students to offer three of the four science subjects (Biology, Chemistry, Mathematics, Physics) at STPM/A level or equivalent. Many students planning to apply to medical schools take Biology at the pre-university level. However, a small percentage of students entering medical schools, including IMU, do not have Biology.

In the IMU medical programme, the Semester 1 students undergo a Foundation 1 course which integrates anatomy, physiology, biochemistry, genetics, behavioural sciences and statistics. Assessment is in the form of two summative in-course assessments (ICA1 and ICA2) and an End-of Semester 1 (EOS1) examination which determine progression. The tools used in EOS1 examination are the short answer questions (SAQ) and objective-structured practical examinations (OSPE).

The aim of this study was to determine if there is a relationship between taking Biology at pre-university level and students’ academic performance in Semester 1. The academic banding, [bands 1 to 4, with 1 being highest] based on certain academic criteria, are also taken into consideration for analysis.

Material and Methods: The examination results of 385 students from two cohorts of medical students, namely M1/05 and M2/05 were analysed. Students’ academic performance in the EOS1 examination [first attempt] as well as the two in-course assessments were analysed to gauge the relationship between pre-university Biology and academic performance. The SAQ and OSPE components of the EOS1 examination were also analysed separately with the aid of the SPSS statistical software.

Results and Discussion: The majority of the students (86%) from both the cohorts had pre-university Biology, and this is reflected in all the four academic bands. For the M1/05 cohort, pre-university Biology contributed significantly to their performance in the ICA1, but not in the ICA2, SAQ, OSPE, or EOS1 examination. For the M2/05 cohort, pre-university Biology does not seem to have contributed to their academic performance. Based on these results it is concluded that pre-university Biology does not contribute significantly to students’ academic performance in IMU.

A cross tab analysis comparing the passed and failed students against pre-university Biology was carried out and the $\chi^2$ test was used to test for significant differences. The results show that in general, pre-university Biology does not significantly contribute to students’ academic performance. Significant relationships have been reported in other medical schools especially in the pre-clinical part of the course (Green et al., 1993; Tomilson et al., 1977). However, in this study, the lack of difference in academic performance observed between the students who have taken Biology and those who have not may suggest that the Foundation 1 course plays a role in bridging the gap between these two groups of students.

It is evident from further analysis that there are significant differences in academic performance between students from bands 1 and 2 compared with students from bands 3 and 4. A higher percentage of students who passed the examinations are from bands 1 and 2. A cross tab analysis shows that there is no significant association between academic performance and pre-university Biology for students from bands 1 and 2. Similar results were also found for students from bands 3 and 4. Thus, it is concluded that pre-university Biology does not provide an advantage for successful progression in the IMU medical curriculum. The results also suggest that students who fall within the lower bands require closer monitoring than those without pre-university Biology.

REFERENCES


Perceptions Of Pharmacy Students On Problem-Based Learning (PBL)

Yeoh Peng Nam1, Ong Chin Eng1, Peter Pook1, John Ling Kie Yieu1, Hirotaka Onishi2

1School of Pharmacy & Allied Sciences, International Medical University, Bukit Jalil, 57000 Kuala Lumpur, Malaysia, 2University of Tokyo, Japan

Problem-based learning (PBL) is a learning activity where students work in small groups as a team to work on problems identified in a case scenario. It is believed to be innovative, interactive and promote critical thinking, problem solving, communication and self directed learning1-3. In the IMU Bachelor of Pharmacy degree programme, PBL is used as a learning tool to achieve the educational objectives of developing problem solving skills, knowledge acquisition, application and integration skills, communication skills, self-directed and lifelong learning attitudes, evidence-based practice, team-working and collaborative skills.

In PBL, the activity is conducted in small groups of 10 to 12 students in 2 sessions of 1 _ hours per session. A facilitator, not necessarily a content expert will monitor both sessions and assess the performance of the students based on identified objectives of the PBL. During the first session, students are presented with a PBL trigger, which is often a case scenario. After discussion, they identify learning issues to be worked on by the students for a week meeting informally at their own time using many learning sources including the Internet.
Abstract from the International Medical Education Conference 2007

Active Learning: A Means Of Enhancing Personal Empowerment

Surekha R Kamath, Subramanya Upadhya

Department of Physiology, Melaka Manipal Medical College, Manipal

Introduction: Active learning may be facilitated by several modes of activities which include class room discussion, small group discussion and debate posing questions to the class.\(^1\) All of these knowledge acquiring strategies assume that the learning process must be essentially learner driven, does not mean that it can dispense guidance. Learning without teacher intervention is a slow and frustrating way to learn.\(^2\) One such active learning method was adapted by Melaka Manipal Medical College, Manipal, to the undergraduate Medical students. In first year, students will learn basic sciences in an organ system based curriculum; physiology is taught in four blocks. Students are made aware of learning objectives in physiology at the beginning of the year itself. However, the students were not effectively using learning objectives, so the physiology department at MMMC, decided to revise the learning objectives at the end of each block.

Materials and Methods: All the learning objectives of the concerned blocks were split into smaller topics. The topics were written on pieces of paper. The topics can include the learning objectives not covered in class. Students were called one by one to come and pick up a piece of paper randomly. Each student had to present a small topic written on the piece of paper for two to five minutes. The rest of the students could actively participate by asking relevant questions to clear their doubts. Such a topic presentation can extend up to two hours. Throughout, the role of teacher is to direct students to limit discussion to the topic.

Results and Discussion: The programme evaluation was done by taking students feedback with the short questionnaire. The students feed back regarding the activity was very positive. They also opined that they should this type of activity more often as it helps them to remember and better focus on important information. Active learning is a useful technique as it ensures discussion and some degrees of consensus amongst the students. It also provides feedback which can be acted upon quickly as the teacher can review any particularly difficult points following the session. Such an interactive review time helps the student to gain knowledge, study skill, increase their oral communication skills, and team spirit. In the process of becoming an expert physician medical undergraduates acquire knowledge not only through listening to lectures or by reading text books but also by effective ways of monitoring learning, as it is a motivating factor for student learning.

REFERENCES


ABSTRACT NUMBER: PS10

Active Learning: A Means Of Enhancing Personal Empowerment

Surekha R Kamath, Subramanya Upadhya

Department of Physiology, Melaka Manipal Medical College, Manipal

Introduction: Active learning may be facilitated by several modes of activities which include class room discussion, small group discussion and debate posing questions to the class.\(^1\) All of these knowledge acquiring strategies assume that the learning process must be essentially learner driven, does not mean that it can dispense guidance. Learning without teacher intervention is a slow and frustrating way to learn.\(^2\) One such active learning method was adapted by Melaka Manipal Medical College, Manipal, to the undergraduate Medical students. In first year, students will learn basic sciences in an organ system based curriculum; physiology is taught in four blocks. Students are made aware of learning objectives in physiology at the beginning of the year itself. However, the students were not effectively using learning objectives, so the physiology department at MMMC, decided to revise the learning objectives at the end of each block.

Materials and Methods: All the learning objectives of the concerned blocks were split into smaller topics. The topics were written on pieces of paper. The topics can include the learning objectives not covered in class. Students were called one by one to come and pick up a piece of paper randomly. Each student had to present a small topic written on the piece of paper for two to five minutes. The rest of the students could actively participate by asking relevant questions to clear their doubts. Such a topic presentation can extend up to two hours. Throughout, the role of teacher is to direct students to limit discussion to the topic.

Results and Discussion: The programme evaluation was done by taking students feedback with the short questionnaire. The students feed back regarding the activity was very positive. They also opined that they should this type of activity more often as it helps them to remember and better focus on important information. Active learning is a useful technique as it ensures discussion and some degrees of consensus amongst the students. It also provides feedback which can be acted upon quickly as the teacher can review any particularly difficult points following the session. Such an interactive review time helps the student to gain knowledge, study skill, increase their oral communication skills, and team spirit. In the process of becoming an expert physician medical undergraduates acquire knowledge not only through listening to lectures or by reading text books but also by effective ways of monitoring learning, as it is a motivating factor for student learning.

REFERENCES