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- o Cutaneous Adverse Drug Reactions in Hospitalized Patients in Benghazi, Libya
- o Evaluation of a Teaching Programme in an Acute Medical Unit
- o Dupuytren's Contracture- a Review of Pathology and Treatment
- o A Randomised Control Study on Neurosensory Outcomes of Ilioinguinal Neurectomy in Lichtenstein's Hernia Repair
- o Perception of Breastfeeding among Female Medical Students, Taibah University, Medina, Saudi Arabia 2012
- o Biocompatibility of Fe₃O₄ Nanoparticles Evaluated in vivo
- o Impact of a one-day teaching course on invasive procedures training in foundation year doctors



Evaluation of a Teaching Programme in an Acute Medical Unit

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Abstract

Work-based education including learning and teaching are considered to be vital aspects of ongoing medical education. Acute medical units are busy departments where the opportunities for bed side learning are substantial but increased service and time pressures can sometimes take priority. We initiated a dedicated education session lasting one hour each week. An electronic anonymised questionnaire was sent to all doctors who had worked in the department over the two year period after the educational sessions were started. There were 29 respondents representing a final response rate of 63%. The majority of respondents (75.9%) led at least one session with most agreeing that the opportunity had positively impacted on their teaching and presentation skills. The majority of respondents (85.7%) also agreed that the sessions were effective and translated adequately to their medical practice. Most respondents (89.7%) stated that the topics discussed were relevant to the daily practice of the unit with 65.5% indicating that their clinical decision making had been enhanced by the teaching on that subject. This survey demonstrates the overall positive impact that this training programme has after just two years of existence further indicating the need for such a teaching programme in the department.

Key Words

Postgraduate; Education; Acute Medical Unit; Teaching Programme; Questionnaire.

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Introduction

Work-based education including learning and teaching are considered to be vital aspects of ongoing medical education. Acute medical units (AMUs) are busy departments where learning opportunities are substantial and this can be an educational “playground” for a varied range of health professionals and students alike. The educational programmes, if conducted appropriately, will have a direct impact on patient care including patient safety. Any educational programme is due to impact positively on the educational experiences of trainees linked to the department. In a busy department such as the one surveyed for this report there are a number of limitations and obstacles which need to be overcome to ensure an adequate amount of educational opportunities¹.

The Royal College of Physicians (RCP) recognises the importance of teaching on AMUs. The RCP has published a series of “toolkits” which recommend that consultants should especially be actively involved in education as a direct requirement of

their ongoing responsibilities. The RCP states that “Consultants have a critical role in leading and motivating the team throughout the hospital and ensuring that the next generation of physicians is equipped to provide care of the highest quality”².

The current programme of teaching is a weekly one-hour session in which a junior doctor or consultant presents a case and/or guideline relevant to the work experienced on the AMU. The programme was commenced two years previously and the need for a review of current practice was noted.

Aim

The aim of this review was to formulate a short online survey to evaluate the current format of our AMU’s teaching programme and highlight areas for possible improvement in the short and long term plan of the unit.

Method

This cross-sectional survey evaluates the current state of postgraduate teaching in a busy Acute Medical Unit in a District General Hospital in the

East of England. A questionnaire was developed jointly by the authors, and the final version was published as a short ten-question online survey using the data collection software SurveyMonkey®³. Doctors who had been involved in regular work in the AMU over the previous two years at all levels (Foundation Doctors, Senior House Officers, Specialist Registrar including training grade and Consultants) were invited to take part in the survey. Invitation was via email; this contained an automated hyperlink and a brief covering letter. Two reminder emails during the course of the data collection period were sent.

All data collection was conducted anonymously and interpretation of the resultant data was performed using the web-based tool, and further descriptive data analysis was performed using Microsoft Excel. All free text responses were analysed and grouped according to common themes. Responses to the survey were entirely voluntary and without financial or other incentive.

Results

There were 29 respondents; comprising seven Consultants (24.1%), four ST3+ (Registrars) trainees (13.8%), ten ST1/ST2/SHO trainees (34.5%), three Foundation Year two doctors (10.3%), and five Foundation Year one doctors (17.2%). The survey was sent to a total of 46 doctors giving a final response rate of 63%.

i. Teaching Opportunity and Impact

The majority of respondents (n=22, 75.9%) led one or more teaching sessions during their attachment to the AMU. Twenty-one of the lead educators (95.5%) felt that this opportunity had positively impacted on their teaching and presentation skills. The majority of respondents (82.1%) agreed that the sessions were effective and translated adequately to their medical practice whereas only three respondents (10.7%) disagreed with this statement.

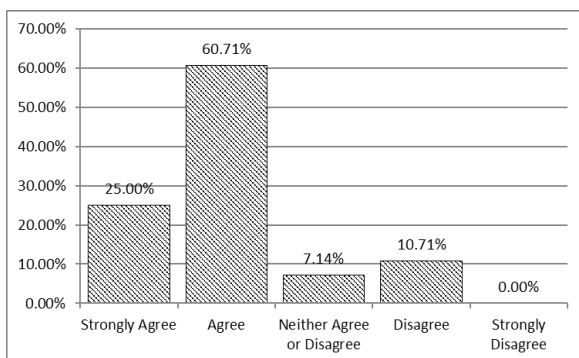


Figure 1: Did you feel that the teaching sessions were effective and translated into your medical practice?

ii. Learning Opportunity

There were no negative responses to this question with 93.1% (n=27) agreeing that new facts and learning points were obtained from attendance at the teaching sessions. Two respondents (6.9%) did not have any strong feelings towards the learning opportunities of the programme.

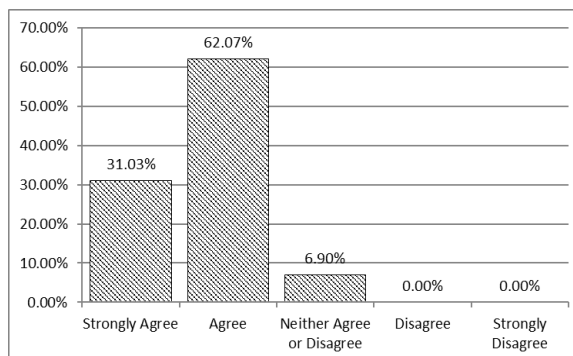


Figure 2: Did you learn something new from the teaching sessions?

iii. Topic Relevance and Educational Outcomes

Again the majority of respondents (n=26, 89.7%) felt that the topics discussed during the teaching sessions were relevant to the daily practice of the unit with one undecided and two (6.9%) disagreeing with the statement. With regards to improving confidence in the diagnosis and management of the discussed scenarios and clinical situations there was a less positive response. Just two-thirds (n=19, 65.5%) felt that their clinical decision making had been enhanced by the teaching on that subject with 27.6% (n=8) not having any positive or negative feelings towards the response.

iv. Sponsorship Presentation

The attendance of a pharmaceutical representative who would have a ten minute slot allocated to present or discuss a new product was generally accepted by the attendees with 65.5% (n=19) stating that they had learnt from the presentation and half the respondents (51.7%) felt that the time allocated was sufficient. The majority (79.3%, n=23) felt that the sponsored lunch (through the pharmaceutical company) was a positive aspect of the teaching sessions. Only three attendees (10.3%) disagreed with the presence of a pharmaceutical representative at the teaching session.

The overall feeling towards the teaching programme was positive with the majority of attendees over the previous two years finding that the sessions were generally stimulating, related to daily medical practice, well organised, mentally challenging, and were of an adequate frequency (weekly) and duration. (Table I)

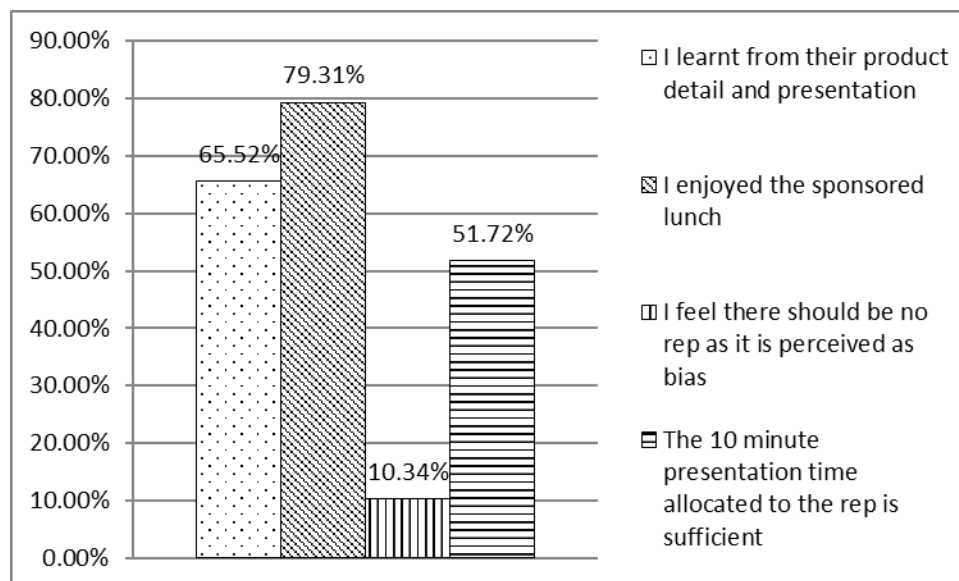


Figure 2: Attitude towards pharmaceutical representative.

	Strongly Disagree 1	2	3	4	5	Strongly Agree 6
Stimulating discussions / teaching	1	0	2	10	9	7
Related to daily	1	1	4	9	8	6
Useful for daily work	1	1	5	8	9	5
Flexible structure	0	1	5	12	9	2
Well conducted	1	1	4	10	11	2
Challenging	2	3	6	10	6	2
Adequate time for session	1	1	1	9	13	4
Adequate frequency (weekly)	1	0	2	8	11	7

Discussion

The overall responses from the survey indicated an overall satisfaction with the current system of weekly departmental teaching but a number of respondents did highlight a few deficiencies and suggestions for enhancement of the programme. These suggestions included;

1. Early notification of the subject planned for discussion which would allow more preparation time for the attendees to have a more in-depth discussion. More consultant presence was suggested indicating the need in more senior presence to assist in focussed discussion and to ensure a more stimulating environment. There is the possibility of having juniors linked to seniors (inclusive of registrars and consultants) for particular sessions with the junior presenting a case and the more senior doctor presenting a guideline or management methodology. The current quality of teaching is believed to be very presenter dependent and the majority of

suggestions indicated the positive effect that senior involvement, when available, enhanced the standard of teaching.

2. Curriculum-based teaching in a more formalised regime would assist in portfolio completion for trainees thus fulfilling a greater aspect of the departmental educational requirements. Linking discussion of hospital guidelines and other national guidelines (e.g. SIGN and NICE) would enhance these sessions.
3. Practical sessions to be considered at a later stage for possible "add-on" satellite educational sessions. What could be enhanced would be the presence of the theoretical aspects of core procedures as well as discussion and review of errors, near misses, incidents and complaints which may have recently occurred on the unit or other hospital wards.
4. Inclusion of problem based teaching and learning which would probably have a greater impact on the learning needs of the attendees as well as improving on the current educational standard.

One of the main concerns that the weekly departmental teaching was one of the few opportunities that trainees have during the acute medical rotation – and that this may sometimes be missed due to the current state that this is not protected teaching time. Therefore, in the event of an acute medical event, some juniors may miss the teaching opportunity. As this unit is of an acute nature then the chances of this occurring are quite high and does affect attendance. The opportunity to present was positively received by the respondents with feedback and presentation skills practice opportunities being the main outcomes aside from the subject education.

The current set-up of sessions is a very useful educational forum for the unit and that the suggestions garnered from this survey would possibly enhance an already effective educational plan. The linked CME certificates obtained after attendance were the most positive aspect of the sessions with most respondents commenting on the usefulness for appraisal and revalidation.

The limitations to this review include the limited response rate although the data collection window was extended from the initial four week period to an extended eight week window – minimal extra responses were gained during this extra extended time. We are unaware as to why a quarter of the survey's respondents did not present a session during their attachment on the unit as all doctors are offered to choose appropriate dates for presentation and are given the freedom to present a subject of their own choice. This issue may be overcome in the event of a more rigid structure where presentation dates, and also possibly discussion subjects, are allocated to doctors on entry into the unit.

With regards to the length of the questionnaire; it was agreed to keep to a short format of no more than ten questions to ensure an appropriate response rate. The concern was that a long survey would affect responses. For future reference it may be indicated to have trainees complete a questionnaire related to teaching on completing the Acute Medical attachment thus acquiring more detailed information without the risk of recall bias.

At the beginning of the programme set-up it was agreed that, wherever possible, a pharmaceutical representative would be invited to give a short presentation on a product or brand with the intention that a sponsored lunch would improve attendance and also act as a team-building opportunity. The feedback on the presence of a pharmaceutical representative at the beginning of most sessions were non-committal with the general

take being positive from the aspect of sponsorship; indicating that the presence of a catered lunch break being a positive incentive for attendance.

Conclusion

Teachers in a clinical setting face the challenge of teaching other doctors or health professionals whilst simultaneously caring for patients in a very time-constrained setting. Even though time is limited and strained it is noted that even small moments of teaching time can offer important learning opportunities to trainees. These small pockets of educational intent provide learners with new insights and skills which would not be normally acquired through self-learning or through isolated patient assessment. To achieve this combined caring and teaching goal in a time efficient manner, clinical teachers use various strategies to identify individual learning needs; teach according to these needs and providing feedback on subsequent performance.^{4,5}

With the introduction of the European Working Time Directive (EWTD), we note that the time in which trainees are exposed to clinical work has decreased significantly. Whereas previous long working shifts would allow for a one hour break/teaching time this is no longer always possible. With a 48-hour week limitation; daily formal teaching is not an option; and instead less frequent formal teaching is organized. The most obvious next step would be to increase the frequency of bed-side teaching as more senior presence is usually available in the Acute Medical Unit's setting.

In the future, it is hoped that newer evidence-based strategies for teaching will become embedded in curricula and develop our confidence as educators. In an ideal setting, specialists in Acute Medicine would collaborate more to make clinical skills teaching more contextual and scenario specific. On a positive note this survey demonstrates the overall positive impact that this training programme has after just two years of running and it has been met by positive and constructive responses further indicating the need for such a teaching programme in the department.

Competing interests

The authors declare that they have no competing interests.

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