Trainees in the Association for the Study of Medical Education

Spring Conference 2018

“Developing the Clinical Teacher: From student to sensai”

Abstract Book

21/04/2018
Oral Presentation Prize: Shortlisted Abstracts

Abstract Number: 33
Andy Cheng, Li, YM Ayoirinde, A Mulhem, H; Sahnan, K; Adegbola, SO
The Perceived Role of the Medical Student in the Healthcare Setting

**Background:**
Students are a constant presence in the clinical team. However, the importance of students in patient care and the collaborative relationship between students and healthcare professionals (HCPs) can be overlooked, which may lead to less team cohesion and learning among students.

**Aims:**
This study investigates how HCPs, students and patients perceive the student’s role and importance in the healthcare setting.

**Methods:**
A cross-sectional study was conducted at Northwick Park Hospital. Seventy five participants were included (17 in-patients, 21 third-year medical students, 17 doctors and 20 other HCPs). Closed questions using the Likert scale regarding three key themes (perceived usefulness of students in patient care; perceived quality of student relationship with other staff; perceived hindrance to patient care by students) and open questions were used. Statistical analyses were undertaken as well as thematic analyses on the qualitative data from open questions.

**Results:**
There was significant association between hospital roles and perception of student usefulness (p < 0.001). Students significantly rated ‘student importance’ the lowest and patients significantly rated ‘student contributions’ highest. Patients and students regarded students to be more patient-centred than HCPs. Qualitative analysis revealed 93% regarded the role of students is to learn and 36% perceive that students’ main role is to assist with clinical practice. Response rate to open questions was lowest in the other HCPs group (40%) compared to students (90%), doctors (88%) and patients (82%).

**Conclusion:**
This study found that students undercut their own usefulness in clinical care and that patients value of student contributions was greater than that of other healthcare role groups. Patients also perceived students to be more patient-centred than HCPs. Based on these findings, suggested strategies to improve student involvement / self-confidence are: inclusion of HCPs in teaching students, better integration of students in patient care and improvement in the teaching environment.

Abstract Number: 41
Joanne Ridgley, Radhika Patel, Hyun Seok Lee, George Dawson, Lucy Gibson
“Speak Up for Asthma” student teaching initiative: a service validation

**Background:**
Asthma is the most common chronic illness in children in the UK. Misconceptions amongst children about the disease can lead to stigma and bullying. “Speak Up for Asthma” is an innovative programme designed to raise asthma awareness among children through presentations given in schools by medical students.

**Aims:**
The project aimed to educate second year medical students about asthma so that they could teach school age children about the topic.

**Methods:**
At King’s College London, eight second year medical students were trained to give interactive presentations focussed on asthma, its precipitating factors, emergency management and identifying attacks. Preparation and mentorship was given by fourth year medical students and doctors in six two-hour sessions. Presentations were delivered to 65 children aged 11-12 across seven London schools. Service validation was conducted through independently scored, nine question, anonymised paired quizzes, completed before and after presentations. The quiz covered key learning points and was not seen by medical students prior to presenting. Quantitative analysis was performed using paired T-test and McNemar’s test. Quantitative and qualitative feedback was collected from the second year medical students.

**Results:**
There was a significant increase in percentage of correctly answered questions following the presentation (64.3% ± 5.97 to 84.0% ± 4.56, t(40) = 5.42, p < 0.001). Significant increases were noted in six questions (p < 0.05), with the greatest increase in the understanding of salbutamol inhalers. Qualitative feedback from the presenting students was largely positive; 100% reported that they would recommend this module.

**Conclusion:**
A significant improvement in asthma knowledge was seen in children after presentations. By increasing awareness this programme has the potential to reduce stigma and improve emergency management in schools. Repeats and wider evaluations are required to determine long-term retention. This programme engaged medical students as educators and enabled them to provide a cost-effective public health initiative.

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**Abstract Number: 43**

Shreena Shah, Laura Adams, Christina Cotzias, Patrick McGown

**Enhancing Specialty Application Preparedness and Confidence Through Near Peer Mentoring**

**Background:**
The specialty training application process is competitive and varies significantly between specialties. Foundation trainees locally reported receiving little guidance and support through the process.

**Aims:**
The aim was to investigate these gaps in support and to implement a near peer mentoring scheme, which supported trainees, building confidence to aid preparedness for the specialty application and interview process.

**Methods:**
All foundation trainees were surveyed to explore support needs, gauge interest in the mentoring scheme and then invited to participate. Those enrolled were matched with specialty-specific senior trainees/consultants who had volunteered as mentors. Mentors underwent a package of education from the postgraduate fellows to optimise skills, including - a face-to-face ‘Introduction to Mentoring’ session and provision of a handbook highlighting specialty specific objectives, deadlines and relevant resources. Additionally, for one popular specialty, a mock interview with immediate feedback to trainees was piloted. The structure and marking scheme was modeled on the Royal College of Physicians formal interviews.

**Results:**
15 foundation trainees responded to the initial survey, of which 20% (n=3) reported feeling prepared for the application process and 13% (n=2) for the interview. 20% (n=3) felt their application was likely to be successful.

40 foundation trainees were invited to participate in the mentoring scheme, of which 33 enrolled and 28 were paired with a mentor. Following mentoring and mock interview, 100% of participants felt significantly more prepared for the application process and interview respectively. All participants reported the mentoring scheme was “valuable” and “enhanced their applications”.

**Conclusion:**
Formalised and structured near peer mentoring for specialty applications has improved trainees confidence and preparedness for the specialty applications. Due to the success and demand for this initiative, the programme will be continued and mock interviews extended to all specialties. Following job offer outcomes in March 2018, Kirkpatrick level 4 data will be collected on application success.

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**Abstract Number: 46**

Martha Hawker, Anne Swift, Mark Lillicrap

**Introducing Transgender Health Teaching in a UK Medical School**

**Background:**
Estimates of the proportion of people who identify as transgender vary from between 0·5% and 1·3% for birth-assigned males, and between 0·4% and 1·2% for birth-assigned females (Winter et al. 2016). The GMC provides advice for doctors on treating transgender patients on its website (GMC, 2016). It is likely that medical students will encounter transgender patients during their careers and should therefore be prepared.

Aims:
We wanted to see whether a teaching programme involving members of the transgender community improved students’ knowledge, attitudes and confidence around transgender health.

Methods:
We developed a programme in conjunction with the local transgender community which was delivered to Year 5 students at the University of Cambridge. The programme consisted of: A large group case-based teaching session on key aspects of transgender health A facilitated panel discussion with a group of local transgender patients

We used before and after questionnaires to assess changes in knowledge, attitudes and confidence. There were also questions on the teaching’s value and space for free text comments.

Results:
48 before and 22 after questionnaires were at least partially completed. There was no significant difference noted in attitude. There was a significant increase in the proportion of students who would like to have friends who are transgendered individuals (p = 0.0475). There was a significant improvement in confidence (p < 0.0001) and knowledge (p = 0.0281). Knowledge increase was particularly noted in questions about hormone prescription. All students strongly agreed or agreed that the teaching was worthwhile and should be given to more students in the future. Free text comments suggested that students found the teaching useful.

Conclusion:
This teaching improved knowledge and confidence and was viewed favourably by students. This method of teaching could be used by other medical schools to introduce transgender health teaching.
Abstract Number: 35
Lauren Misquita, Robert Potter

Virtual on-calls - a valuable tool for improving confidence and allaying fears prior to starting FY1 on-calls

Background:
Many newly qualified doctors feel under-prepared to become FY1s and lack confidence in non-technical skills such as prioritisation, time management and managing acutely unwell patients [1, 2]. These skills are necessary during on-call shifts and are a source of anxiety for FY1 doctors.

Aims:
To develop a ‘virtual on call’ teaching programme that enables students to develop key non-technical skills required for FY1 and feel prepared for their first on-call shift.

Methods:
Twenty-one final year medical students each attended two sessions and were bleeped about common FY1 on-call tasks of varying urgency. Students made management plans, prescribed medication, and sought senior advice if required. Each session included an acute scenario created using role play. Following the sessions, individualised feedback and handouts were given. Students completed pre- and post- session questionnaires consisting of 5-point Likert scales and free-text questions.

Results:
Students felt significantly more confident in four fundamental non-technical skills and significantly more prepared for FY1 on-calls (p<0.01) following the sessions. 100% found the sessions more useful for on-call preparation than seminars or shadowing doctors. Free-text feedback was extremely positive with appreciation of the pressured on-call environment. Students highlighted the benefit of two sessions for the opportunity to put the learning points from the first session into practice and build confidence after seeing their subsequent improvement. Many felt the sessions had alleviated their fears and suggested that they become a standard part of medical school training.

Conclusion:
The virtual on-call programme significantly improved confidence in non-technical skills that are essential for FY1, in particular on-call cover. By exposing students to the pressures of on-calls in a safe and supported environment, students felt better prepared for starting FY1 on-calls. While providing two sessions per student required greater time commitment from facilitators, the second session proved particularly valuable in allaying fears and developing confidence.
Abstract Number: 38
Natasha Santana-Vaz, C Paireaudue, N Burri, A Amarasekera
The educated and wild guess within postgraduate anaesthetic examinations

Background:
The phrase ‘preparation prevents poor performance’ is well indoctrinated within medical education. Rigorous and ever evolving examination strategies aim to eliminate the impact of chance luck on candidate scores, ensuring fairness and validity.

Nevertheless, various sources propose methods for improving ones’ probability of guessing correctly within multiple true-false (MTF) and single-best answer (SBA) examinations; two question styles used within the Fellowship of the Royal College of Anaesthetists (FRCA) examinations. They advise on educated guessing with partial knowledge and offer statistically backed wild guessing strategies.

Aims:
Evaluate whether a purposefully developed MTF and SBA guessing guide could improve candidate examination scores within two Coventry anaesthetic courses.

Methods:
Anaesthetic trainees attending primary (N=23) and final (N=46) FRCA written exam courses in January 2018 were randomised so that half received the diagrammatic guides available for use during the mock examination. Examination questions independently written and course faculty marked answer papers, collecting scores for comparison. Candidate guessing guide feedback and proportion of MTFs/SBAs guessed was also recorded.

Results:
No significant difference in candidate MTF or SBA scores between primary FRCA groups. Mean number of guessed MTFs 27/100 and SBAs 4/10. Mean SBA score (83.5/120) and mean overall score (293.5/420) higher in final FRCA briefed group: as opposed to unbriefed (mean SBA 79.8; mean overall 291.8). Mean number of guessed MTFs 51/300 and SBAs 5/30.

Conclusion:
Interestingly, primary candidates guessed far more often than final candidates in both MTF (27% vs 17%) and SBA (40% vs 16%) questions. Further work is needed to ascertain why; perhaps it represents a steeper learning curve during core anaesthetic training.
The small improvement in briefed final FRCA scores was not statistically significant. Therefore, acquisition and application of knowledge seems the key to success within FRCA examinations. There is no evidence to support introduction of educated guessing strategy teaching within future Coventry anaesthetic courses.

Abstract Number: 40
Mesedah Alnahdi, Mubarak Almansour, Muhammad Anwar Khan, Sajida Agha, Syed Zaidi
The Effectiveness of Flipped Classroom on Short Knowledge Retention at King Saud Bin Abdulaziz University for Health Sciences: A Mixed Method Study

Background:
Researches that investigate the effectiveness of flipped classroom (FC) compared to traditional class (TC) show an increase in retention of material, while others have shown no difference. This pedagogical model was challenging for Middle East learning culture in which students are familiar with teacher-centered learning. Aim: To assess the effectiveness of FC modality on short knowledge retention compared to TC and to identify the perceptions and challenges faced by students at KSAUHS, Jeddah, Saudi Arabia.

Methods:
We conducted this modality in Neurosciences Pharmacology course for (n=193) 3rd year medical students in 2017. An educational outcome, assessed by the same MCQs of the topic taught by TC and FC methods and questionnaire were given to FC students regarding their perception toward this method. After that, semi-structured interviews were conducted to find out the challenges students faced.

Results:
The student knowledge was assess based on the result of post-test. There was a significant mean difference between TC (4.12±0.9) and FC (3.6±1.03) with p-value=0.01. No significant mean difference was found between male and female students with p-value=0.77. The students perception was favoring the flipped classroom with reference to information sharing, interaction with peers and a unique experience. Four themes emerged: (1) Perception about FC, (2) Challenges of FC, (3) Effect of Personal Characteristics, and (4) No Difference.

Conclusion:
Students performance was better on TC compared to FC particularly in interpretation and applying data (C2 level questions) with p-value<.001. However, the perception of students for the FC was positive when comparing to the TC. The explanation for that students noticed they need time to preparation before they come to the class. Lack of students motivation and orientation before conducting the FC could be reasons for that. Last, it required sources to watch the videos and find some articles related to their objectives.

Abstract Number: 44
Laura Adams, Shreena Shah, Christina Cotzias

How to create an inspired Curriculum Mapped Foundation Teaching Programme (FTP) – Listen to What Trainees Want.

Background:
All foundation trainees (FTs) must be provided with a minimum of one hour protected curriculum-based teaching locally per week.(1, 2) FTs must attend at least 70% of teaching for successful Annual Review of Competence Process.(1) Locally, feedback from FTs highlighted low satisfaction with the local FTP. In response, the teaching fellows were tasked with modelling a new FTP.

Aims:
The aim was to explore FTs views on and wishes for a FTP and, using this evidence, develop and deliver a fresh trainee-focused curriculum-mapped FTP.

Methods:
A survey exploring FTs opinion on a FTP was devised and sent to all local FTs. Following data analysis, the FTs opinion (and desire for more clinical teaching) was cross correlated against the existing FTP and foundation curriculum. Sessions which both met the curriculum and delivered more clinical teaching were generated. Speakers were identified and invited to teach. This new curriculum-mapped, clinically focused FTP was reviewed and approved by the Foundation Training Programme Directors prior to implementation.

Results:
Of the 60 FTs surveyed, 30 (50%) responded to the survey. Of those, 15 (50%) felt that the weekly foundation teaching did not improve their clinical knowledge, and 12 (40%) felt it was not relevant to their clinical practice, with a further 12 (40%) unsure whether teaching was relevant to clinical practice. 30 (100%) of FTs reported a wish for teaching with a greater clinical emphasis. Having implemented the new FTP, weekly feedback collected immediately after teaching shows 100% of FTs now report feeling satisfied with teaching.

Conclusion:
The delivery of a curriculum-mapped FTP which allows trainees to meet their curriculum requirements, and fulfils the FTs wish for more clinically focused and relevant teaching, is possible. However, it requires careful planning and curriculum mapping. Delivery of this programme has improved trainee satisfaction and engagement with teaching.

Abstract Number: 52
Gareth Thomas, Jaime Fanning
FOAMdation: The development of a social-media-enabled learning platform to enhance Foundation Doctor’s education with a free, open access medical education resource

**Background:**
Social media usage within medical education, especially blogs and podcasts, has rapidly grown with the concept of FOAM (Free, Open-access Medical education). In February 2017, we launched FOAMdation; an open access combined blog and podcast aimed specifically at Foundation Doctors. FOAMdation provides high-quality, up to date, evidence-based medical education free at the point of use and accessible irrespective of location and time.

**Aims:**
We aim to highlight the for social media platforms such as FOAMdation to educate en masse using a modern and easily accessible format.

**Methods:**
We provide a descriptive account of the first 12 months of development of this resource with engagement figures extracted from the analytics of WordPress and Podbean.

**Results:**
Since going live there have been 19 combined blog posts and podcasts, presented by senior clinicians but developed by junior doctors, across a range of subjects and clinical specialities including; sepsis, ACS and how to be a junior doctor. FOAMdation, via WordPress.com and podbean.com, has received 14,610 views from >7700 people across all posts with a mean of 769 per post (range = 85 – 1951). Viewers from every continent of the world have accessed these resources with 80.27% (n=11728) from the UK.

**Conclusion:**
This descriptive piece highlights the extensive educational reach of social media platforms such as FOAMdation. By developing this resource, we are ensuring that Foundation Doctors have a chance to keep up-to-date with current cross-speciality clinical practice and developments in medical education.

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**Abstract Number: 67**
Abigail Masding, Elisa Lewington-Gower, Anitha Vijayasingam, Alanna Hare

A flipped classroom approach pilot study: Using video to complement simulation-based learning of procedural skills in Core Medical Training (CMT)

**Background:**
Simulation-based skills lab training is a valuable educational method for teaching procedural skills during CMT, especially where clinical opportunities are often lacking. Evidence suggests that simulation-based training combined with deliberate practice (DP), the focused repetitive practice of a skill, is particularly effective (1). Procedural skills sessions should dedicate most time to DP, rather than the demonstration and explanation of skills by advanced practitioners. A flipped classroom approach which provides trainees with learning material prior to training sessions could enable more teaching time dedicated to DP.

**Aims:**
To develop a flipped classroom approach to simulation-based learning of CMT procedural skills.

**Methods:**
Video-based learning materials explaining the indications, contra-indications, complications, consent, procedural steps and after care for six CMT procedural skills were designed. Multiple-choice questions testing trainee knowledge were also created.

**Results:**
We have designed a flipped classroom approach to teaching procedural skills for CMTs using video. The videos include live footage of each procedure being performed with voiceover. Prior to attending subsequent skills training sessions, trainees will be required to review the videos and complete a short multiple-choice questionnaire testing their knowledge. Trainees will perform 30 minutes of DP for each procedure, receiving 1:1 feedback from experienced teaching faculty.

**Conclusion:**
We suggest a flipped classroom approach to teaching CMT procedures using video, to enable more time dedicated to DP in skills lab sessions. Pre-post qualitative feedback on trainees’ confidence and perceived ability will be collected to evaluate the effectiveness of sessions.
Anne Shields

Lucky Dip Business Cards

**Background:**
The idea to introduce business cards for clinical options in medical education came about as a result of poor/non-attendance from medical students.

**Aims:**
The aim was to improve attendance at the clinical options, improve student independence and identify a process for feedback to the clinical option staff.

**Methods:**
A PDSA cycle for improvement was used as a framework to structure the project. This was then tested on a group of 6 students. Information was collected about attendance, ease of use of the business cards, any reasons the students were declined access to the clinical options. A feedback session identified what the students had learned and this was collated and sent to the clinical staff.

**Results:**
The first cycle demonstrated an 83% attendance, 1 student was off sick. On 2 occasions the students were declined access due to problems with staffing and sickness, however this was identified early and an alternative was given. The feedback session allowed the other students to have information about options they were unable to attend.

**Conclusion:**
That non-attendance issues demonstrated that it was not always the students at fault. The telephone numbers needed to be written in full and not just an extension number as the students were not aware of how to use an extension number from their phones, and therefore were not independent in being able to make contact. The clinical staff were contacted early and if they were not able to have the students, another option was identified in a timely fashion. Some small changes will be made to the business cards to reflect the findings from the first cycle. This will then be re-tested and re-evaluated.

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Abstract Number: 2

Theodoulou Lakovos, Marios Nicolaides, Professor Thanos Athanasiou, Professor Apostolos Papalois, Dr Michail Sideris

**Simulation-Based Learning Strategies to Teach Undergraduate Students Basic Surgical Skills: A Systematic Review**

**Background:**
We aimed to identify and critically appraise all literature surrounding simulation-based learning (SBL) courses, to assess their relevance as tools for undergraduate surgical education, and create a design framework targeted at standardizing future SBL.

**Methods:**
We performed a systematic review of the literature using a specific keyword strategy to search at MEDLINE database.

**Results:**
Of the 2371 potentially eligible titles, 472 were shortlisted and only 40 explored active interventions in undergraduate medical education. Of those, 20 were conducted in the United States, 9 in Europe and 11 in the rest of the world. Nineteen studies assessed the effectiveness of SBL by comparing students’ attributes before and after interventions, 1 study assessed a new tool of surgical assessment and 16 studies evaluated SBL courses from the students’ perspectives. Of those 40 studies, 12 used dry laboratory, 7 wet laboratory, 12 mixed, and 9 cadaveric SBL interventions. The extent to which positive results were obtained from dry, wet, mixed, and cadaveric laboratories were 75%, 57%, 92%, and 100%, respectively. Consequently, the SBL design framework was devised, providing a foundation upon which future SBL interventions can be designed such that learning outcomes are optimized.

**Conclusion:**
SBL is an important step in surgical education, investing in a safer and more efficient generation of surgeons. Standardization of these efforts can be accelerated with SBL design framework, a comprehensive guide to designing future interventions for basic surgical training at the undergraduate level.

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Abstract Number: 3

Manju Netto, Miss Melissa Whitten

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Perceptions of Obstetrics and Gynaecology Trainees on the Educational Value of the Obstetric Ward Round

**Background:**

The educational value of ward rounds is often cited in medical education literature, however little exists specifically relating to Obstetrics. The Obstetric ward round provides a unique opportunity to interact with labouring women, sometimes with multiple risk-factors for peri-partum complications, unparallelled in any other clinical area. Therefore the educational value of such ward rounds should be optimised.

**Aims:**

Aims include: if trainees think Obstetric ward rounds are educational, which aspects they thought were educational, if there are any barriers to obtaining educational value and what can be done to mitigate these.

**Methods:**

Trainees from two hospitals in a major city in the UK will be asked to complete questionnaires. Confidentiality and anonymity will be ensured such that data can be obtained without undue stress of providing truthful/negative responses. 3-5 randomly selected trainees will be asked to take part in interviews to provide information regarding underlying factors relevant to learning from Obstetric ward rounds.

**Results:**

Data collection is currently ongoing and will be analysed using inductive thematic analysis to obtain important themes relevant to the trainees' perceptions of Obstetric ward rounds. Information obtained will be useful to understand already existing educational components of Obstetric ward rounds, and also to identify areas for improvement to maximise the educational potential of these rounds.

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**Abstract Number: 4**

Hemant Kumar, Dr Manish Sonsati

**The Surgical Team- Improving teamwork**

**Background:**

Teams within surgery have been through countless cycles of refinement, with the ultimate goal of meeting the increasing demands of the population. The ever-increasing list of team members results in a more dispersed team, making effective teamwork much harder to achieve. Impacts of this is seen across the field, with inadequacies leading to disastrous outcomes. The ad hoc nature of surgical teams in particular mean that the privilege of team familiarity is not always given. This propagates communication breakdown and it is shown that two thirds of adverse events in theatre are caused by poor communication.

**Aims:**

This is a review of research that has been done into the topic of surgical teams, and several core themes have been extracted. It will investigate the barriers surgical teams face, and consider the evidence available on how to improve the current infrastructure.

**Methods:**

MEDLINE was used to search for peer reviewed, English language articles published between 2005-2017 reporting on the subject of surgical teams. Search terms used include ‘Surgical teams’, ‘teamwork’, ‘ad hoc’, ‘collaboration’ and ‘operative time’. The subset of high quality and relevant studies were selected.

**Results:**

The studies highlighted an increased effectiveness of surgical teams (measured by outcomes such as operative times, mortality and complication rate), with structures that allowed consistency in team members. The parameters investigated show a positive relationship with outcome; this includes team familiarity, experience of surgeons and reduced staff turnover.

**Conclusion:**

The studies available on the topic yielded consistent results, which suggest that focusing on improving this aspect of healthcare may be the low-cost but high-yield strategy health services need to implement. This research advocates that advancements may be better made in improving teamwork and efficiency, rather than focusing on the more tangible technological advancements.

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**Abstract Number: 6**

Robert Ker, Jake Gibbon
Clinical Reasoning Cases - low fidelity simulation to improve medical student preparedness for practice

Background:
The transition between medical student and junior doctor is a challenging process (Monrouxe et al, 2014). Educational interventions focussed on prescribing and clinical reasoning have been proposed to help students become prepared to practice as junior doctors (Monrouxe et al, 2017). Simulation followed by debriefing has been shown to be effective at teaching clinical reasoning (Fornes et al, 2015) and prescribing skills (Woodfield et al, 2014). A teaching session was therefore, utilising low-fidelity simulation, followed by debrief, in order to develop prescribing and clinical reasoning skills so that students would feel more prepared to practice as a junior doctor.

Aims:
To evaluate the impact of a teaching session, involving low fidelity simulation and subsequent debrief, on students confidence in: 1. Performing key skills (prescribing, interpreting investigations, summarising cases) 2. Clinical reasoning 3. Preparation to practice as a junior doctor.

Methods:
Students participated in two low-fidelity simulation cases. They were given semi-completed clerking documents, then asked to summarise the case to formulate differential diagnoses and initial management plans. Students completed request forms to receive investigation results, and prescribed all necessary fluids or medications. Students could phone for advice from a facilitator role-playing as a senior team member. Students presented their case at session’s end, which was followed by a group discussion and debrief on key learning points. Students completed a questionnaire to gauge confidence in three key skills (prescribing, interpreting investigation and summarising cases), clinical reasoning and preparation to practice as a junior doctor. There were free text boxes looking at the impact of the simulation cases, and the group debrief, on the educational value of the session.

Results:
Data gathering and evaluation is ongoing. Initial results suggest students feel more confident in all domains assessed, and that the combination of role play and debrief is an effective, memorable way for students to learn.

Abstract Number: 7
Robert Ker, Dr Jonny Guckian

The Mysterious Case of the Swiss Cheese: the use of role play in root cause analysis teaching for medical students

Background:
Patient safety and learning from error are key components a doctor’s duties (1). It has been demonstrated that junior doctors have poor engagement with incident reporting and subsequent patient safety processes (2). Role-play is established for teaching communication skills (3), but few studies focus on its use in promoting patient safety processes.

Aims:
To assess the impact of a role-play root cause analysis process in teaching patient safety processes.

Methods:
A group of 12 final year medical students partook in a fictitious role-play care where where a patient came to harm. There were multiple sources of error, with one underlying root cause: poor handover. Students were given different sources of information using a variety of media including interview recordings and newspaper articles. They analysed information following the root cause analysis structure. The group discussed the evidence to agree on a root cause. Students were given pre and post session questionnaires to assess confidence in various domains including identifying types of error, addressing them and highlighting incidents of clinical error in practice.

Results:
The pre-test showed the majority of students had low indices of confidence in types of error, root cause analysis process and how to address error. The post-test demonstrated a significant increase in all domains, and students felt more comfortable raising concerns about clinical error. Qualitative feedback commented on the particular usefulness of auditory resources in reinforcing patient safety principles.

Conclusion:
This study demonstrated that students have poor confidence in patient safety processes. Role-play mock root cause analysis can be used to help increase that confidence. Further study would be relevant to assess whether similar processes could be used in junior doctor cohorts, to assess whether it influenced behaviors or subsequently increased engagement with patient safety processes. Drawing on feedback from this study, a mock root causes analysis podcast is being developed.

Abstract Number: 8
Arpan Tahim Deborah Gill, Jeff Bezemer
Understanding how surgeons learn through the use of workplace-based assessment during specialist training? A study rationale.

**Background:**
This is an exploratory educational research project aimed at understanding how surgeons-in-training learn through workplace-based assessment (WBA) during specialist surgical training. WBA is used across medical training in a formative capacity. An assessor usually observes an episode of patient care carried out by the learner as part of their practice. A pre-structured proforma acts as a template to facilitate learner: assessor dialogue, allowing for assessment of all aspects of performance and for feedback. Current research focusses on outcomes of WBAs (how well a trainee performs) and user perception (how participants feel about WBAs). However, there is limited understanding of what actually happens during WBAs and therefore no empirical basis for explaining outcomes, users' perceptions or predicting the learning potential of these activities.

**Aims:**
This study will aim to understand what WBAs look like in situ, what surgeons-in-training identify as having learnt from them and how they respond to it in their future practice.

**Methods:**
Data for analysis will be gathered through audio-visual recordings of WBAs routinely carried out by a sample of surgeons-in-training, in tandem with non-participant observation with field notes, the learner's completed WBA proforma and post-WBA interviews.

**Results:**
This presentation will review the context in which WBA is currently used in surgical education. It will review the methodological rationale behind the study design and outline the study protocol and proposed data analysis methods.

**Conclusion:**
The complex learning needs in surgery (knowledge, professional skills, craft elements, the nature of the learner: teacher relationships and the challenging working environments) share parallels with numerous other professions. So, surgical education is an important ‘telling case’ to explore workplace learning and assessment in greater detail. Insights gained could improve education practice within surgery and shed light on the potential of WBA in the broader workplace.

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**Abstract Number:** 9

Wajihah Saghir, Ben Fleming, Abu Basu

An Evaluation of Junior Doctors’ Perspectives of their Radiology Teaching and Understanding of Radiological Requests at a District General Hospital

**Background:**
The Royal College of Radiologists state that clinical radiology should be taught so that newly qualified doctors have the correct ‘knowledge and skills to practice and learn effectively’. The Ionizing Radiation Medical Exposure Regulations (IRMER), 2000 state ‘when requesting an investigation, the referrer should provide sufficient information to justify its necessity’. Understanding why an investigation has been requested, modified to an alternative or rejected all together is an important learning opportunity. Potential risks associated with unnecessary imaging means it is imperative to deliver regular postgraduate radiology teaching.

**Aims:**
Explore the perspectives of junior doctors regarding their postgraduate radiology training and experience of requesting imaging within a 4 month period.

**Methods:**
An online questionnaire was sent to all 80 junior doctors at a District General Hospital. Specialties spanned across Medicine, Surgery, Paediatrics, O&G, GP, Psychiatry and Anaesthetics and ICU. Retrospective questions were asked about the respondent’s perception of radiology training.

**Results:**
25/80 questionnaires were completed, giving a response rate of 31%. Participants included six FY1 doctors, nine FY2 doctors and ten Core Trainees. 68% of respondents were unsatisfied with the radiology teaching they were receiving. Small group sessions were the preferred method. 16 out of 25 doctors (64%) have requested imaging without entirely knowing the reason for doing so with 5 out of the 25 doctors (20%) reporting to have done this at least once a week. The thematic analysis identified three main themes: 1) Availability of resources 2) Speciality requirements 3) Inexperience & Attitudes. Not having the resources available to be taught was an issue with time pressure being an important contributing factor. Orthopaedic surgery delivered the most at regular morning trauma meetings.

**Conclusion:**
Improvements need to be made to ensure effective postgraduate radiology teaching is being delivered to junior clinicians. Focussed small group teaching was the most popular method.

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**Abstract Number:** 10

Ashling Thompson, Susannah Brockbank, Kristian Tattam, Kishan Vadhe, Tamer Hatem
“Fifty shades of grey” professionalism boundaries in medical education

Background:
The literature regarding professionalism boundaries has largely focused on aspects of clinical practice that could be considered ‘high risk’, such as psychotherapy (Gabbard and Nadelson 1995, Miller et al. 2006, Nadelson and Notman 2002) and rural medicine (Brooks et al. 2012). Since these early years frameworks have been proposed to assist in evaluating boundary dilemmas which are often useful in a clinical setting. There is acknowledgement that medical students’ experience of boundaries is different to that of practising physicians and little evidence exists regarding medical student understanding of these issues.

Aims:
This project aimed to explore medical students’ understanding of professional boundary dilemmas.

Methods:
Medical students from Liverpool Medical School were invited to participate in focus groups, which entailed facilitated discussion of potential professional boundary dilemmas. Themes explored included; accepting gifts, disclosing personal information, physical contact, dual (including romantic) relationships with patients and intimate examinations. Transcripts of these were then subject to thematic analysis via a collaborative, iterative coding process.

Results:
63 students, sampled from all years of the undergraduate curriculum, participated in focus groups. Thematic analysis yielded four core themes: recognition of boundaries, “the grey area”, coping mechanisms and consequences.

Conclusion:
Students demonstrated understanding of clear-cut boundaries (GMC 2009) and could describe contextual factors that may influence more complex situations, reflecting the existing literature in the field of professionalism. Despite acknowledging these factors, students voiced uncertainty balancing these elements to come to a decision. This highlights the need for a framework that facilitates the analysis of boundary dilemmas, for which a combination of the theory of planned behaviour and ‘graded risk’ model is proposed.

Abstract Number: 11
Khalil ElGendy, Prof. Alan Horgan

Comparison between cadaveric and virtual simulation in colonoscopic training: trainee prospective

Aims:
To compare previously validated virtual simulation (VS) with cadaveric simulation by comparing face and content validation features of each modality, with the objective of highlighting the advantages and challenges facing validation of cadaveric simulation as well as integration of both modalities for better training experience.

Methods:
5-point Likert-type scale questionnaires were used by candidates attending a colonoscopic course involving one station for cadaveric simulation and another for VS. Features for face validity (11 points) included tissue behaviour and manoeuvre reality, while content validity (9 points) included basic and invasive skills, realism, user-friendliness and applicability for future courses. Statistical analysis was done using Mann–Whitney U test, to compare independent groups of non-parametric data.

Results:
10 candidates attended an endoscopy course at the Simulation Centre with variable degrees of experience and backgrounds (surgeons/gastroenterologist, ST3 to ST6). Concerning content validity, Cadaveric simulation was significantly higher regarding realism (p<0.05), including tissue behaviour and pathology. Regarding the face validity features, the score was only statistically significantly higher for the reality of pathology (p<0.05). Although there were no statistically significant differences achieved, cadaveric simulation scored higher for haptic feedback, resolving loops, inflation, suction, tissue pliability, anatomical landmarks and mucosal visualization. VS scored higher non-significantly in the features of scope navigation, interactive feedback and user-friendliness.

Conclusion:
Preliminary results show no significant differences between validated VS and non-validated cadaveric simulation in most features of face and content validity, which indicate approachable validity of cadaveric simulation in colonoscopic training, which necessitates higher study power. The significant differences were achieved in tissue and manoeuvres realism as an advantage of cadaveric simulation. VS has advantages of interactive feedback and objective assessment parameters. There is a need for structured training program that can implement both features for better endoscopic training experience, which is currently under research in the Simulation Centre.

Abstract Number: 12
Khalil ElGendy, Prof. Alan Horgan
Cadaveric simulation in colonoscopic training: face and content validation

**Aims:**
To demonstrate face and content validity of cadaveric simulation as a tool for training in colonoscopy.

**Methods:**
5-point Likert-type scale questionnaire is used by candidates attending an endoscopic course involving one station of cadaveric simulation for training basic skills of colonoscopy. The face validity included mainly tissues behaviour (5 points, pliability, deformation, landmarks, mucosal visualization and pathology reality) and manoeuvre reality (6 points, haptic feedback, torqueing, loops resolving, inflation, suction and score navigation). Content validity (9 items) included usefulness for basic & invasive skills, realism, user-friendly and applicability for future courses.

**Results:**
10 trainees attended an endoscopy course at the Simulation Centre with variable degrees of experience (ST2 to ST6) with different backgrounds (surgeons/gastroenterologists). For face validity, overall average score was 3.83. Tissue behaviour score was 3.81 with highest score (>4) achieved in mucosal visualization, anatomical landmarks and reality of pathology. The lowest score was (3.4) regarding tissue pliability. Overall score for reality of manoeuvre was 3.9. Highest score was for tactile feedback (4.4) and torqueing (4) while the lowest score (3.5) were for scope navigation. Overall score for Content validity was 3.5. Highest score was achieved for overall comfort and realism. Usefulness for basic and advanced training was 3.4.

**Conclusion:**
The preliminary results of cadaveric simulation show face and content validation of cadaveric simulation is approachable. Advantages of cadaveric simulation include reality of tissues and pathology, mucosal visualization, tactile feedback and training for torqueing. Challenges may include the tissue pliability and reality of deformation (which is due to differences between cadavers and real patients). Future research will include larger number of candidates aiming at achieving higher study power and construct validation.

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### Abstract Number: 13

**Lucy Havard, Tom Baker**

**Mentoring in Medicine**

**Background:**
A 'mentor' is an experienced, empathetic person who guides another individual (the mentee) through their personal and professional development (SCOPME, 1998). Mentoring in medicine is not a new concept. Indeed, it has been a key element of a medical education since the dawn of the profession. However in recent years it has been sadly neglected and consigned to the wings of the medical education theatre. This poster argues for the promotion of this under-utilised resource back to centre-stage.

**Aims:**
To establish the perceived benefits of near-peer mentoring for Foundation Year doctors at a busy London District General Hospital.

**Methods:**
The researcher is a second year Core Medical Trainee (CMT) and set up a near-peer mentoring programme between FY doctors and CMTs in September 2015. 5 of the 29 mentees in the programme were recruited to participate in a focus group. Inductive thematic analysis was used and multiple thematic maps were generated. A condensed thematic map demonstrating the benefits and barriers to mentoring was then produced.

**Results:**
Mentoring was useful for mentees’ personal development in terms of networking opportunities, pastoral support and the sharing of experiences. Positivity and camaraderie were key to an effective mentoring partnership whilst rota clashes posed a significant barrier. Dangers identified included mentors adhering too tightly to a ‘mentoring formula’ and encouraging mentees to become ‘carbon copies’ of themselves. Precipitation of mentoring practices by mentees furthered accessibility of mentoring to junior doctors.

**Conclusion:**
This study has provided a valuable insight into the benefits of mentoring for junior doctors. Recommendations include: promotion and active creation of formal mentoring programmes; an active timetable of support workshops to help mentors in their role; and integration of formal mentoring training into the CMT curriculum.

**References:** Standing Committee on Postgraduate Medical and Dental Education (SCOPME), 1998. ‘Supporting doctors and dentists at work: an enquiry into mentoring,’ London.

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### Abstract Number: 15

**Alistair Lawrence, Eunjong Yoo, Luke Johnson, Naomi Gostelow Faye Gishen**
Reflecting on Reflection; Examining Medical Students’ Views of the Role of Reflective Practice

**Background:**
Reflection is an active process that helps inform future encounters. It can help develop the therapeutic relationship, professional practice, and resilience. A recent feedback poll of 296 medical students at University College London Medical School across 5 years of study showed only 9% of students found written reflective assignments to be useful. The authors wished to understand students' views on the reflective curriculum.

**Aims:**
Improve medical students’ engagement in reflection through better alignment of reflective activities to their learning preferences and needs.

**Methods:**
This was student-staff collaborative mixed-methods research. Students in their penultimate year were invited to take part in a voluntary questionnaire and focus group. The questionnaire used The Self Reflection and Insight Scale (SRIS) to assess reflective ability and Likert score questions rating different methods of reflection used in the curriculum. Participants attended a student-led focus group to further explore their attitudes to reflection. A transcript was independently analysed thematically by two researchers. Sub-themes were collated and discussed as a research group before themes were finalised.

**Results:**
11 students participated Likert scale responses revealed students preferred Schwartz Rounds as the most useful means of reflection. Students considered written assignments least useful. Thematic analysis of the focus group revealed overarching themes of 'Engagement' and 'Format' as potential barriers to engagement. Detailed analysis of the questionnaire and focus group will be presented.

**Conclusion:**
A key outcome of this project was the ability to co-design the reflective curriculum to better reflect student learning preferences, with overall improvement in the student experience. The project produced useful recommendations that are being implemented and evaluated further. With emphasis on the role of students in these changes, we hope to increase their overall sense of co-design their curriculum. The project continues into this academic year to evaluate how these changes effect engagement.

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**Abstract Number: 16**

Robert Ker, Jake Gibbon

**Question Writing Workshops - a flipped classroom approach for peer generated revision resources**

**Background:**
A ‘Flipped Classroom’ approach, where students study the required content prior to a teaching session, can improve learning by allowing more time for learner-centred activities during the session(1). It is an efficient way of covering a broad range of topics in a limited time period(1). Students generating mock-exam questions, and subsequently answering them, has been shown to be an effective way of consolidating knowledge and creating deeper knowledge(2). Single Best Answer questions (SBAs) are an integral form of assessing knowledge and clinical reasoning skills in many medical schools in the United Kingdom(3). To promote self-sufficiency and aid revision in a broad range of topics, we devised a novel flipped classroom session involving student generated SBAs for final year medical students.

**Aims:**
To evaluate the impact of the teaching session on: 1. Confidence in critically analysing and answering single best answer questions 2. Views on using peer generated revision resources 3. Views on preparatory work to enhance learning during the session The overall aim is to establish whether this model of a teaching session is an effective way of revising multiple topics in a limited time period.

**Methods:**
Students were given topics, selected from their university curriculum, and generated an A4 summary one week prior to the teaching session. During the teaching session, students wrote SBAs on their topic, including justification for the correct answer. Questions were collated and distributed as a mock-exam. Having completed the mock-exam, students discussed the answers as a group. The A4 summaries and mock-exams were given to multiple student groups to act as revision aids. Students were asked to complete a questionnaire, including Likert scales, to gauge their perceptions of the teaching session. Free text space was available to gather qualitative data to further the understanding of students views.

**Results:**
Data gathering and evaluation is ongoing

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**Abstract Number: 17**

Ben Hughes, Rebecca Robertson
West Yorkshire mentoring scheme: A model of clinical assistantships to encourage engagement and maximise learning for 5th year medical students.

**Background:**
The transition from medical school to FY1 can be daunting and so a shadowing approach is adopted during 5th year at Leeds University. During this time, we sought to pair students with willing junior doctors to help maximise their experience on placement throughout the year. Students could increase their exposure to ward-work, and have a designated contact to help them with their specific learning needs.

**Aims:**
1. To enable medical student learning in a clinical environment using an assistantship model
2. To increase exposure and confidence on the wards
3. To develop foundation doctors as clinical teachers

**Methods:**
A 'mentoring lead' was identified at each hospital trust in West Yorkshire, whom then had to recruit junior doctors to take part. We initially gave everyone guidance on practicalities of meeting up, suggestions on topics to cover, and providing feedback forms. Towards the end of the year we provided some mock OSCE ideas to help structure revision. We collected feedback from both parties to identify positive and negative aspects of the scheme.

**Results:**
The FY1’s saw this as an invaluable experience to develop themselves as a leader and a clinical educator. They felt they could provide key information and advice, some of which they may not have been privy to before finals. The students reacted in a similar way; identifying practical exposure and one-to-one guidance as pivotal to their engagement in the scheme, and overall confidence in the year.

**Conclusion:**
Nothing can truly prepare you for life as an FY1, but shadowing and learning from them as a medical student will help with a smooth transition. Mentees could connect on a more personal level and benefit from specific teaching, ultimately contributing to building confidence throughout the year.

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**Abstract Number: 19**

Joanne Ridgley, Radhika Patel, Hyun Seok Lee, George Dawson, Lucy Gibson

“Speak Up for Asthma” student teaching initiative: a service validation

**Background:**
Asthma is the most common chronic illness in children in the UK. Misconceptions amongst children about the disease can lead to stigma and bullying. “Speak Up for Asthma” is an innovative programme designed to raise asthma awareness among children through presentations given in schools by medical students.

**Aims:**
The project aimed to educate second year medical students about asthma so that they could teach school age children about the topic.

**Methods:**
At King’s College London, eight second year medical students were trained to give interactive presentations focussed on asthma, its precipitating factors, emergency management and identifying attacks. Preparation and mentorship was given by fourth year medical students and doctors in six two-hour sessions.

Presentations were delivered to 65 children aged 11-12 across seven London schools. Service validation was conducted through independently scored, nine question, anonymised paired quizzes, completed before and after presentations. The quiz covered key learning points and was not seen by medical students prior to presenting. Quantitative analysis was performed using paired T-test and McNemar's test. Quantitative and qualitative feedback was collected from the second year medical students.

**Results:**
There was a significant increase in percentage of correctly answered questions following the presentation (64.3% ± 5.97 to 84.0% ± 4.56, t(40)= 5.42, p<0.001). Significant increases were noted in six questions (p<0.05), with the greatest increase in the understanding of salbutamol inhalers. Qualitative feedback from the presenting students was largely positive; 100% reported that they would recommend this module.

**Conclusion:**
A significant improvement in asthma knowledge was seen in children after presentations. By increasing awareness this programme has the potential to reduce stigma and improve emergency management in schools. Repeats and wider evaluations are required to determine long-term retention. This programme engaged medical students as educators and enabled them to provide a cost-effective public health initiative.
### Abstract Number: 20

**Jess Leighton, Jonathan Guckian**  
Podcasts in medical education: a systematic review

**Background:**  
Podcasts (audio tracks disseminated online) are a versatile tool which have been used in education for some time. Their use in medical education is widespread - iTunes lists 100 ‘medical’ podcasts ranging from ethics to toxicology(1). As is often the case with new technology, they have been adopted in variably between medical specialties and universities.

**Aims:**  
The aim of this study was to conduct a systematic review of the evidence on the use of podcasts in medical education.

**Methods:**  
An evidence search was carried out on the MEDLINE, EMBASE and PUBMED databases, using the terms ‘medical education’ and ‘Webcast’ or ‘podcast’ keyword. Analysis was carried out on full papers which were accessible and published in English, if they focussed on podcast (not video/slideshare) teaching value for medical students/trainees.

**Results:**  
Of 21 studies identified, only 4 were controlled trials, comparing podcasts to other teaching methods (or against nothing if supplementary to normal teaching techniques)(2−5). All 4 controlled trials demonstrated non-inferiority or better. The largest group (10/21) was surveys of students/trainees opinions of podcasts(6–15). These studies showed students generally value podcasts as an educational resource; up to 90% used them regularly. Given the choice, students preferred audiovisual media to purely audio. 4 of the studies focussed on the quality and uptake of currently available podcasts, and showed most podcast series are short-lived and the quality of their content cannot be validated, although they remain popular across medical professionals and the general public(16–19). Only 8 of the top 100 journals (by impact factor) produce a regular podcast(19).

There were 2 additional intervention studies, both of which showed improvement in knowledge after podcast use(20−22).

**Conclusion:**  
In conclusion, podcasts, while by no means a replacement for traditional educational methods, are an acceptable and potentially useful tool in medical education.

### Abstract Number: 21

**Lucy Diss, Abi Sharp, Freya Scutt, Lewis Moore, Prem Daniel, S Menon**  
Re-living anatomy: medical student use of lecture capture

**Background:**  
Lecture Capture resources offer students the chance to ‘re-live’ the anatomy lectures online, within the student central platform to improve and consolidate their learning. These resources are thought to be particularly useful for medical students given they are required to gain an extensive knowledge of anatomy in relatively short periods of time when compared to other university degrees.

**Aims:**  
The study objective was to investigate how Lecture Capture aided student learning.

**Methods:**  
An online survey invited 405 medical students ranging from years 1-3 to participate achieving a 24.7% response rate (n=100). Ethical Approval was granted by The Brighton and Sussex Medical School Research Governance and Ethics Committee (RGEC). The students gave informed consent for participation in the study.

**Results:**  
Results suggest Lecture Capture to be useful to student’s learning, understanding concepts and improving performance in assessments and, despite a concern over lecture recording affecting attendance records, attendance remained constant. Students in particular found the live recorded lectures and practical demonstration sessions most useful. Interestingly, 74.2% of students preferred to selectively view certain sections of the recordings opposed to the full lectures. The most common reasons to view the lecture recordings was to help with difficult material not fully understood and to generate more complete lecture notes.

**Conclusion:**  
In summary, Lecture Capture provides students with a positive opportunity to further develop their learning.

### Abstract Number: 22

**Ali Luhishi, Rebecca O’Rourke**
What is the effect of student gender on learning in undergraduate obstetrics and gynaecology clinical rotations?

**Background:**
Obstetrics and gynaecology has become an increasingly female dominant workforce. Conversely, fewer males are choosing to pursue a career in this specialty. Previous research highlights gender differences in the experience of obstetrics and gynaecology placements. These studies have shown educational inequalities reported by males.

**Aims:**
This study aimed to explore the perceptions of both medical students and medical educators on how students learn during their obstetrics and gynaecology placement, including barriers, and whether and in what ways gender influences this.

**Methods:**
This qualitative study involved recruiting five participants in fourth and fifth year from the University of Leeds and three clinical educators in the Leeds Teaching Hospital Trust. Each participant was involved in one semi-structured interview which was recorded on an audio-device, transcribed then coded and themed. Thematic analysis was used to identify the core themes raised during the discussion.

**Results:**
Five themes emerged from the data; 1) The process of learning, 2) expectations, 3) barriers to learning, 4) overcoming barriers, 5) the influence of gender. These themes tell an overall story of how students learn on obstetrics and gynaecology placements and whether and in what ways gender influences this.

**Conclusion:**
Students reported learning through a process of active participation in the workplace. This was found to be conducive with the situated learning and communities of practice theories. The process of learning was wrought with barriers with the majority of these being gender neutral. Both staff and students reported numerous strategies in overcoming these barriers. Gender was perceived to be an issue due to higher rates of patient refusal of male medical students. Apart from this, gender was perceived to have no other influence (i.e. on engagement, knowledge, skills and dynamics with clinical teams).

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**Abstract Number: 23**

Jack Haywood

Using the medical rota of a DGH to improve medical student confidence in going on-call

**Background:**
Medical students feel particularly anxious about going on call when they become doctors. The use of a mixed skill set is rarely practiced or rehearsed at medical school. In order to relieve some of the anxiety, simulation scenarios or classroom based teaching has been used. However, there hasn’t been a programme developed using a hospital on-call rota as a skeleton for teaching. This study aims to improve final year confidence in going on call doing just that.

**Methods:**
A three-part teaching programme was created; a briefing, the student shadowing a doctor and participating in a real on-call shift, and a final debriefing. Final year medical students placed at Lister Hospital signed up and were allocated sessions. These students were given a list of statements about their confidence in going on-call before the briefing and again after the debriefing. The results of these were compared.

**Results:**
There was a large increase in confidence of the students regarding going on call. 55% of students felt confident about going on call independently after the programme as opposed to 4.2% before. They also felt that they knew more of what was expected of them when they were on call. There were improvements in the confidence the students had of the individual skills required on-call, such as prioritising, handover and recognising unwell patients.

**Conclusion:**
This study has demonstrated that students felt under confident before the on-call teaching programme. They now feel more confident having taken part which will make these students better doctors. It would be beneficial for this to be implemented across core undergraduate medical programmes.

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**Abstract Number: 24**

Rachael Lucas, J Hardisty, H O'Neill, L Parkin, J O'Connell, R Hancock
Simulating complexity: providing undergraduate students with exposure in early clinical training to the multidisciplinary management of frail older people.

**Background:**
This project aimed to translate the clinical experience of the multidisciplinary frailty team into a classroom-based session for undergraduate students. The objectives of the project were to:
- Simulate the complexities of management of frail older people.
- Assess the feasibility of delivering teaching focusing on the care of frail older people in the early stages of clinical training.
- Assess the attitudes and acceptance of students to inter-professional education and low-fidelity simulation.
- Provide a preliminary indication of the knowledge and skills gained.

The students were in groups containing pharmacy and medical students, to work through cases exemplifying the common characteristics of a frail older person. Tasks included creating problem lists, medicine reconciliation and review and producing discharge information. The facilitators were from medical and pharmacy backgrounds. An ‘old age’ simulation suit was used to attempt tasks from the perspective of a frail older person.

**Methods:**
Feedback was obtained from the students using questionnaires. The RIPLS (readiness for inter-professional learning score) was used to assess perspectives on inter-professional learning. Free text comments were also used.

**Results:**
Feedback was obtained from 64 student. Six themes emerged regarding learning:
- Knowledge acquisition – around medication use, monitoring and side effects.
- Prescribing skills including how to weigh up the risks and benefits of a medication.
- Discharge planning.
- Diagnostic skills.
- Increased understanding of the multidisciplinary team.
- The implications of reduced mobility/sensory impairments.

Students also enjoyed working with the other professional group, the opportunity to apply previous learning to the cases, the relevance of the case to both professional groups and the multi-disciplinary facilitation.

**Conclusion:**
It is feasible and acceptable to students to introduce the multidisciplinary management of frail older people in early clinical training. Future work will aim to address the logistical challenges to offer this opportunity to larger numbers of students and engage other healthcare professionals in training.

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**Abstract Number: 25**

Kevin Gervin, Jennifer MacFie, Coralie Turner, Sarah McCusker

Are medical students going to sea at all? The current state of clinical teaching at a university hospital

**Background:**
Clinical teaching (CT) involving real patient encounters may occur within in-patient or ambulatory settings and is vital to medical education. However, its usage is apparently diminishing, with various reasons being hypothesised.

**Aims:**
In this study, we seek to describe and evaluate medical students' current experiences of CT, at a tertiary, university hospital.

**Methods:**
96 final phase medical students on 10-week senior general internal medicine rotation were surveyed on their experiences of CT. Questionnaires included five-point Likert-type and free-response questions. Details included approximate number of encounters, setting, grade of tutor, organisation and quality indicators including enjoyment, relevance, improvement to practice. Free-response questions enquired about most/ least useful elements and suggestions for improvement.

**Results:**
Number of sessions per student: mean= 20.759; mode= 20; range= 8-40. Volume is considered less than adequate. CT provided by all grades from first-year graduates to consultants, 17 students received teaching from all grades.

Overall quality: mean= 4.167/5 mode= 4/5. Bedside & out-patient CT quality: mode= 4/5 for both. Ward round CT quality: mode= 2/5 Enjoyability (mean= 3.967; mode=4/5) Relevance (mean= 4/5; mode= 4/5) Improvement to practice (mean= 4.067; mode= 4)

Themes expressed by free-text responses include value placed on real-patient exposure, and opportunities for feedback on performance. Negative comments relate to number of students present, poor ward round teaching and organisational issues. Students' suggested improvements include these issues and desire for more CT.

**Conclusion:**
The volume of teaching in particular is concerning, with students reporting an average of only two CT sessions/week. These students are on their final general internal medicine placement. Students particularly value experience and feedback gained from CT. At our institution the quality of CT is good, without being stellar. However, students have a desire for more, better organised CT. Ward rounds in particular appear to be a missed CT opportunity.
- The implications of reduced mobility/sensory impairments.
Students also enjoyed working with the other professional group, the opportunity to apply previous learning to the cases, the relevance of the case to both professional groups and the multi-disciplinary facilitation.

**Conclusion:**
It is feasible and acceptable to students to introduce the multidisciplinary management of frail older people in early clinical training. Future work will aim to address the logistical challenges to offer this opportunity to larger numbers of students and engage other healthcare professionals in training.

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**Abstract Number: 26**

Naomi Mathew, In-Ae Tribe

Using Inter-Professional Games to Enhance Understanding of the Multidisciplinary Team

**Background:**
The General Medical Council state doctors 'must work effectively with healthcare professionals and others involved in providing care' and learn to respect their roles and support them in delivering good patient care. Undergraduate institutions have been exploring the use of inter-professional education as a means to develop these skills. Furthermore, the use of games has been explored as a potential method to enhance learning among health professionals.

**Aims:**
48 second year pre-clinical students attend a 3 week attachment, which focuses on services, structure of the NHS and staff, as well as learning about the patient journey and the role of the multi-disciplinary team. Our aim is to explore whether the combination of team games with inter-professionals involvement can enhance their ability to meet these objectives.

**Methods:**
We designed an interactive morning of team learning activities that built on work from previous teaching fellows. We had 3 stages:
1. 'Meet and Greet' – a session where students would try to guess who a particular staff member was from behind a screen asking ‘Yes’ and ‘No’ questions. This included lesser known roles within the hospital e.g. Chaplain.
2. 'Patient Journey Builder' – students would have a graphical map of a patient’s journey which they needed to correctly label with departments, staff and services.
3. 'Simulated Stroke MDT' - students would rotate around a simulated MDT of physiotherapist, pharmacist, nurse, occupational therapist, dietician and speech and language therapist (SALT). They would discuss the case from Stage 2.

We collected verbal and written feedback from students.

**Results:**
70% of students had been taught about the roles of the MDT previously, predominantly in the form of previous work experience, lectures or e-learning material. Student's understanding of the individual MDT roles, in pre and post evaluation, had all improved, with greatest change in Chaplaincy, SALT, physiotherapist and occupational therapist. On review of the teaching method of games, the majority of students found it useful (87%) and enjoyable (90%).

**Conclusion:**
Inter-professional learning is key to understanding the different health care roles. Whilst games have been used as an educational tool before, we found that integrating multi-disciplinary team members to the games and case discussion was well received by medical students and gave them a greater appreciation for the different specialties.
Kevin Gervin, Sarah McCusker, Jannifer MacFie, Coralie Turner

Does a flipped-classroom model result in better retention of ECG interpretation skills?

**Background:**
The flipped classroom model has demonstrated acceptability and effectiveness for developing undergraduate ECG interpretation, immediately post session. Evidence is lacking on its longer-term efficacy.

**Aims:**
We seek to discover if, in third year medical students utilising a private-study flipped classroom collaborative workshop model leads to greater knowledge retention at four weeks than lectures.

**Methods:**
A convenience sample of 50 year 3 medical students will be randomised to lecture or flipped classroom (FC) format. One week prior to class time, a power-point presentation will be disseminated to FC students, with links to further FOAM-Ed resources on ECG interpretation for private study. During a 90-minute class-time, students were asked to divide themselves into groups of three to five. Students will have the opportunity to clarify questions relating to ECG interpretation. A series of ECGs will then be displayed, which groups will be asked to interpret for five minutes. After five minutes has elapsed, one group will be selected at random to report their interpretation to the class, opportunity for wider discussion will then be given. This process will continue for 10 commonly encountered ECG patterns. Lecture students will participate in an interactive lecture on an ECG interpretation model and the same example ECGs as the FC group. Retention of knowledge will be tested by written examination at intervals of one and four weeks.

**Results:**
Pending. We anticipate our FC model to be more enjoyable, acceptable and effective for teaching ECG interpretation to third year medical students than lectures, and lead to greater knowledge retention at four weeks.

**Conclusion:**
Pending results.

Abstract Number: 28
Kevin Gervin, Coralie Turner, Sarah McCusker, Jannifer MacFie

Does simulation improve medical students' clinical reasoning?

**Background:**
Clinical reasoning (CR) lies at the heart of medical practice. However, there is no established method of teaching this multifaceted skill. Simulation is increasingly utilised within undergraduate medical education. It is used for developing psychomotor, affective and lower order cognitive skills e.g. clinical knowledge. However, it’s utility for developing clinical reasoning is unclear. Durning et al (2012) developed a post-encounter form (PEF) validated against OSCE performance, a similar setting to high-fidelity simulation.

**Aims:**
We sought to evaluate if, in final phase medical students, simulation improved clinical reasoning ability, as measured by PEF performance.

**Methods:**
A pre-test post-test quasi experimental design was performed, with a convenience sample of 48 fourth year undergraduate medical students. Students were invited to participate in high-fidelity simulation sessions. Students participated in 5 groups of 8-10 students. CR ability was evaluated before & after the session using two cases (abdominal pain and chest pain) with post-encounter forms; faculty agree on appropriate answers in advance. Descriptive statistics were used to compare student CR ability.

**Results:**
Results for 23 participants results are as follows:

Abdominal pain (AP):  
- Mean pre-test= 7.609/10  
- Mean post-test= 7.978/10  
- Students with lower pre-test scores tended to improve post-test, while higher scorers deteriorated.

Chest pain (CP):  
- Mean pre-test= 6.478/10  
- Mean post-test= 6.500/10  
- No pattern across the range of scores pre-test post-test

**Conclusion:**
Mean student PEF scores improved marginally for both cases. Higher-scorers may be at risk of expertise reversal effect. The simulation package utilised focuses on communication and teamwork skills. Debrief time was absorbed by discussing these skills, and knowledge teaching. Little time was devoted to CR. Sample size also limits the findings. We still believe simulation has a role in CR development. We plan to re-run our study, with a CR focussed debrief.

Abstract Number: 29
Kevin Gervin, Stephen Foley, Kim Kilmurray, Scott Taylor, Alistair Ireland
Developing a Medical Student Emergency Medicine Teaching Curriculum

Background:
Glasgow Royal Infirmary Emergency Department (GRI-ED) receives five final phase University of Glasgow Medical School (UOG-MS) students, on five-week clinical attachments. Before the 2016/17 academic year, teaching entailed situational, opportunistic teaching during clinical attachment. Students occasionally received small-group teaching. Student feedback frequently praised their clinical placements, but also demonstrated desire for further organised teaching.

Aims:
We aim to evaluate student opinion of a learner-centred emergency medicine teaching programme

Methods:
In August 2016 GRI-ED employed two Clinical Teaching Fellows (CTF), to develop a teaching programme for rotating students, supported by an ED Specialty Doctor. A programme of twice weekly, small-group sessions utilising a modified flipped classroom approach was deemed the optimal format. This balanced desire for organised teaching with avoiding significantly reducing students’ situated learning opportunities. Peer discussion of topics was facilitated by teaching staff promoting active, socio-constructivist learning. Additionally, students received two simulation sessions, based upon a bespoke EM simulation curriculum. Session ILOs were adapted from the UoG-MS curriculum. For quality assurance/improvement, students were asked to complete a nine-item questionnaire; seven Likert-type (five-point) and two open response questions. Descriptive statistics were utilised on gathered data. The UoG-MS also collects end-of-year feedback.

Results:
In total we have data from 408/504 post-session student questionnaires representing 80.95% of all individual student attendances. Mean scores for Likert-type questions was greater than 4.80/5 for all areas, except for amount of new material gained (4.47/5). UoG-MS feedback also demonstrated year-on-year improvement across all areas. Free-text response praised the interactive format and focus on developing clinical acumen and management skills. They expressed a desire for case-based learning.

Conclusion:
Our results demonstrate how relatively small increases in organised teaching, greatly improve student engagement and enjoyment of a specialty attachment. We believe this to be easily adaptable to other EDs and other specialties.

Abstract Number: 30
Frabkie Anderson, Rebekah Davidson

Attitudes of Core Medical Trainees Towards Rehabilitation Medicine; results from a Questionnaire Survey

Background:
Rehabilitation Medicine is a medical specialty that recruits from multiple core training programmes including Core Medical Training, Psychiatry, Surgery and General Practice. However, most trainees that fill Rehabilitation Medicine training posts come from the core medical route (64% in 2015). However, Rehabilitation Medicine is one of the least popular training programmes. In 2016 the application rate was 1.6 and the fill rate only 47% (www.st3recruitment.org.uk 2017). There has been no previous research in to why this was the case.

Aims:
The aim of this study was to look at a snapshot of opinion from Core Medical Trainees across the country and their experience and attitude towards Rehabilitation Medicine. This was an initial study to explore those initial thoughts, before working towards a deeper qualitative research project on this.

Methods:
An online questionnaire survey was sent to all Deaneries in the UK. Of these Deaneries, 19/23 confirmed that the questionnaire had been sent on to all Core Medical Trainees in the area. The ten question questionnaire was designed using Survey Monkey. It was intentionally designed to be short in order to act as a ‘snapshot’ view and designed in order to be completed in less than 2 minutes. There was also a free text box from the respondent to comment on any aspect of the questionnaire.

Results:
The invitation went to no more than 2962 people, with 300 replies of which 294 (10%) were valid. 240 (83%) knew of rehabilitation medicine as a speciality; 100 (36%) had had some experience; but only 12 (4%) were thinking of applying. However, 80 (24%) would have considered applying if they had more experience and 100 (37%) would have taken ‘taster days’ to gain more insight.

Conclusion:
One major reason Rehabilitation Medicine has so few applicants is that most trainees have no exposure and, even if they know of it they do not apply. We hope to do further work on raising the awareness of Rehabilitation Medicine.

Abstract Number: 31
Helen Stevenson
Feedback in Obstetrics and Gynaecology: A trainee perspective

Background:
The use of feedback is well documented as a method of improving performance when learning new skills in medical education. When good quality feedback is delivered it should help learners to develop their skills and improve, however this is not necessarily reflected in student satisfaction. This lack of trainee satisfaction with feedback is reflected in the opinion of the trainer's as well.

Aims:
To determine the attitude of trainees' towards feedback in medical education

Methods:
A structured questionnaire was delivered to all current obstetric and gynaecology trainees in the West Midlands.

Results:
26 trainee's completed the questionnaire. 64% were grade ST3 and above. 46% were happy with the amount of feedback they received and 44% felt they had regular feedback more than once per month. Only 32% reported getting feedback consistently from the same supervisor. When asked how they prefer to have feedback delivered 68% prefer immediate feedback after the event and 48% found structured work-placed based assessments useful as a tool for feedback sessions. However 36% of trainee's felt these assessments were a tick-box exercise and not useful to improve. 68% said feedback was delivered in an appropriate environment

Conclusion:
Most trainee's prefer immediate feedback on clinical skills and felt this was generally given within an appropriate environment. Trainee's are generally not satisfied with the amount of feedback they receive. The majority prefer it to be consistently by the same supervisor and using reflective discussion rather than structured forms. This follows Pendelton's rules which were determined to achieve effective feedback. Pendelton suggests a structure that involves the learner reflecting on both the positive elements as well as areas for improvement and then agreeing an action plan for future learning.

Abstract Number: 32
Namita Panicker, Harry Gunn, James Black

Bleep the FY1: Using Low fidelity Simulation to develop practical skills needed by a junior doctor in medical students

Background:
As an undergraduate teaching fellow – I am often involved in organizing the learning final year medical students get while they are on their clinical rotation at WMUH . Reviewing their learning outcomes, I felt that there was not much emphasis on them developing the practical skills they would need as FY1 doctors after graduating and felt that this was a learning gap that needed to be addressed.

Aims:
To create a learning activity that would help develop practical skills needed by junior doctors in final year medical students using the limited resources available.

Methods:
We created a teaching course aimed at final year medical students. Each session would run for ~2 hours. During these sessions – the students would be placed on the wards and be asked to answer simulated pager calls and deal with any clinical or non-clinical (for example - prescribing, unwell patient, distraught relative etc) scenarios that may develop. There would be no direct patient contact – though doing the teaching on the wards, allows for a degree of influence by the stressors that are inherent to that clinical environment. Keeping the group small allowed each participant to complete multiple simulated scenarios and receive individual feedback on how they prioritized them and dealt with them.

Results:
100% of the participating students found the sessions to be useful and asked if more repeat sessions could be planned. All the students were asked to grade from 1 to 10 (with 1- not prepared at all and 10- extremely prepared) on how prepared they felt to be an FY1 on call. All the students showed varying improvement in their grading after the session compared to before the session.

Conclusion:
• We required very little in terms of initial input and resources to achieve very good learning outcomes.
• Low fidelity simulation can be an effective teaching tool for preparing future doctors.
• This can be easily replicated in any acute clinical setting.

Abstract Number: 34
Robert Gatherer, Katie Keen
Acquisition vs Participation: Trainee and Trainer Perspectives on a Ward Involvement Project for Third Year Medical Students at Guy’s & St Thomas’ NHS Foundation Trust

**Background:**
Theory of learning can be conceptualised as acquisition, individual gaining of knowledge, versus participatory, where learning is contextual and continuous.1

**Aims:**
We present here these contrasting perspectives in review of a ward involvement project.

**Methods:**
Medical students at GSTT were allocated a ward and attended two half-day sessions where they were integrated into the working of the ward. Aims were to improve understanding of the multidisciplinary team, engender inclusion, develop skills, improve communication and provide direct patient care. We collected feedback and present themes below:

**Results:**
Prior to completing the sessions students expressed opinions that AHCPs were only necessary to support doctors: ‘As Medicine becomes more complex it becomes more difficult for just one doctor/surgeon to process all the information and so a teamwork approach is needed’. There was, however recognition of the value of expertise within other professions: when asked who should manage post-operative pain, 75.9% chose a pharmacist whilst only 22% a doctor. After completing the sessions feedback reflected a greater understanding of the MDT: ‘I learnt the multitasking of various skills and experienced the ward dynamic which nurses have ownership of’.

**Conclusion:**
Consultant led, bedside teaching risks role-modelling a paternalistic approach, potentially leading to dangerous adoption or rejection and disillusionment. Approaches that value individual learning are congruent with the traditional view of the doctor as autonomous. Whereas the multi-disciplinary team-based approach, challenges this autonomy, instead placing the doctor within the team; acknowledging its power over the individual in delivery of complex care. Transitioning from didactic, pre-clinical, learning requires support. To facilitate engagement, we must acknowledge the students’ perspective by encouraging exploration of ‘doctor’ autonomy within a multi-disciplinary team. Forming one’s concepts by adopting outdated tradition leads to perpetuation of hierarchy, however the astute student will identify the most effective approaches to care and develop their professional identity in response to these experiences.

**Abstract Number:** 36
Grace McKay, Rebecca Robertson, Lewis Bates

Pre-briefing in Simulation- How much is enough?

**Background:**
Pre-briefing in simulation is considered a cardinal feature of successful learning, and is described as the communication between faculty and learners preceding a simulation course (1). Dieckmann (2) posits that pre-briefing can prepare learners for upcoming sessions by clarifying expectations, logistics and learning objectives.

**Methods:**
We reviewed a cohort of 18 Final Year Medical Students partaking in ‘acute-scenario’ simulation teaching. Prior to the simulation, we provided students with learning objectives, recommended reading and guidelines for half of the scenarios. We explored students’ engagement with the material via a survey and group discussion following the session.

**Results:**
The majority of students 61% (11) did not read the pre-briefing material provided and 66% (12) did not prepare in any way for the simulation course. 10 (55%) students reported that they preferred the simulation scenario content to be a complete surprise because they felt it better replicated clinical practice.

**Conclusion:**
Many educationalists advocate pre-briefing because it can empower students to take ownership of their learning and optimise their simulation experience (3). It was surprising therefore to discover that most students did not engage with the pre-briefing material and preferred to be ‘surprised’ in simulation. Perhaps our findings are due to the seniority of medical student. It is possible that our learners required high-fidelity experiences and unpredictable content to prepare them for clinical practice. Alternatively, perhaps students are not motivated to take full responsibility for their learning and instead perceive the facilitator as an information provider. Students may believe that attendance at a simulation session is sufficient. From our study we posit that there is no ‘one-size fits all’ approach for pre-briefing in simulation. Instead we suggest that facilitators consider students’ learning needs prior to forming presumptions for pre-briefing material.

**Abstract Number:** 37
David Wandless, Ian Gillanders
Cheaper Case for PACES: A New MRCP PACES(UK) Course Idea

Background:
A mandatory examination set known as the Membership of Royal College of Physicians of the UK (MRCP (UK)) consists of 3 examinations, including 2 written and one practical examination – Practical Aspects of Clinical Examination (PACES) (1,2) The latter alone is near £2500 for most trainees in educational materials and fees (3) Private or commercial PACES courses can often cost up to £1400 (4). Core Medical Trainees themselves have asked deaneries to supply formal teaching for this exam to improve morale, retention and readiness for Speciality Training (4).

Methods:
We designed and ran a course, based on pedagogical principles underlying simulation and high-fidelity exams with hawk-dove effect to mimic the real PACES experience (5). We also canvassed local trainees to find tips and pitfalls in the exam. The course was run with volunteers, gaining experience in running an exam and writing learning materials, to allow a low-cost course

Results:
We ran a course for less than an individual attendance fee to a private course. Candidates found the course engaging and value for money. They, and their registrar colleagues suggested that additional post-graduate educational opportunities were not the reason for their decision to work in deanery but may encourage them to stay, and improve morale.

Conclusion:
It is our hope that by running thrice yearly we can improve the quality of physicians in NHS Grampian, using the course to gain experience on many levels of the post-graduate curriculum. It is the eventual hope to assess the longitudinal data to assess retention and exam performance over the duration of the course.

Abstract Number: 39
David Wandless, Jonathan Whitfield, Laura Clark, Andharad Marks, Alison Jack, Jill Austin, George Ramsay, James Stewart, Douglas Bean

A New Modern Model for Teaching Intravenous Fluid Prescribing in an Undergraduate Curriculum

Background:
Foundation year doctors have been shown to struggle with the composition of the Fluids, and the patients themselves (2) The reasons for this are multi-factorial, but often there are discrepancies between textbooks as to practices and principles (3–5) Guidance from large communities such as GIFTASUP and NICE have made movements to standardize practices (2,6,7) this inconsistency has been cited in Qualitative studies to being at the heart of why undergraduate students struggle with learning the principles and practices (1,8) (9) As a potential patient safety issue, it has been suggested that real world prescribing practices are required (10)

Aims:
We hope to outline how, in using what is known of the challenges in intravenous fluids, we have designed a new approach to teaching based on both evidence and pedagogical principles therein. We have developed this within a 5 year long undergraduate MBCHB curriculum in Aberdeen University, Scotland.

Methods:
Prior to this development, much of intravenous fluids teaching was experiential on ward placements, small group sessions planned in year 5 and supplemented by a single lecture by our biochemistry team. With the co-ordination and coalition of active front line NHS staff we aligned this, to blueprint a multi-academic level syllabus to tie traditional systems teaching to practical principles.

Conclusion:
We are assessing not only the engagement and feedback from students to this new methodology, but to use the learning materials created to teach and engage throughout the undergraduate curriculum and beyond. Using this approach, standardized to both local, national and international guidance could improve the discrepancy in knowledge within both the University, but the wider healthcare system beyond.

Abstract Number: 42
Rumbidzai Chandauka
### Bridging The Gap: Students Transitional Experience Into Their Clinical Phase Of Learning

**Background:**
West Middlesex Hospital hosts up to 120 third year Imperial College London medical students annually. The first attachment is recognised as a clear transition point where medical students move from lecture based learning (abstract conceptualisation) within the medical school to an apprentice style approach in the hospital setting (active experimentation).

**Aims:**
The undergraduate clinical teaching fellows (CTFs) at West Middlesex Hospital, supported thirty one students to undertake this transition. The CTFs wanted to better understand the student transition experience at their hospital, and if their existing measures were effective in supporting it. Where appropriate, changes would be considered in response to the feedback.

**Methods:**
CTFs organised an induction week, which included tutorials on history and examinations, exposure to senior students, information on how to utilise the wards and how the wards work, a hospital tour, and a luncheon with their clinical team’s junior doctors. Foundation doctors were briefed on their role in helping the year three transitions. On the final day of their attachment, medical students were invited to complete an anonymised electronic feedback form (Qualtrics) reviewing their experience. The data was analysed using platform.

**Results:**
Thirty one (100%) participated in the survey and 62% found the transition easy. The key factor was having ‘helpful’ foundation year doctors. Also they found the introduction week prepared them for approach ward based learning. Having an attachment in their second year had already introduced them to the hospital environment. Regular contact with CTFs who provided additional history and examination ward based teaching, helped them make the adjustment. They felt being taught clinical skills in their second year would have helped them make the transition easier.

**Conclusion:**
When supporting the transition of medical students into clinical learning, it is important to have an enhanced induction programme, recruitment of junior doctors and prior brief experience in the clinical setting.

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### Abstract Number: 45

**Sarah Rangan, Huw Davies, Jon Morris, Wyn Harris**

**Inter-Professional Learning between Medical and Physician Associate Students**

**Background:**
Physician Associates (PA) will graduate from Swansea University alongside Graduate Entry Medical (GEM) students for the first time in 2018. PA’s have varied clinical roles alongside doctors and healthcare professionals in a wide range of settings.

**Aims:**
The aim of the project was to establish a link between PA and GEM students, promoting inter-professional learning, building relationships and establishing roles before commencement of clinical duties.

**Methods:**
48 participants, (33 medical students, 10 PA students and 5 clinicians) attended a voluntary collaborative education event mediated by experienced clinical supervisors in October 2017. This consisted of an introduction, icebreaker and plenary with facilitated clinical breakout discussions between PA and GEM students. Feedback questionnaires were collected from participants and analysed.

**Results:**
The response rate from attendees was 100%, 95% were satisfied with the quality of the session, 88% stated that the case discussions were effective and 85% felt that their understanding of junior doctors and PA’s roles in clinical practice had improved. Individual feedback supported this interpretation. However, some respondents noted a variation in supervisor’s approach. Results are encouraging, however Swansea Medical School has comparatively small numbers of PA and GEM students. Similar events in other institutions would require increased resources to accommodate cohort size. Time, space and budget constraints limited the activities and scale of this session.

**Conclusion:**
A working model for inter-professional learning between PA and GEM students has been demonstrated. Key points to improve this model include supervisor standardisation, clinical simulation sessions and other allied healthcare professional’s involvement. Follow up studies and repeat inter-professional development days would be necessary to establish a link between events and successful working relationships. As PA’s become increasingly active and involved members in the clinical environment, this project suggests that early collaborative team exercises are essential to improving standards of multidisciplinary health care delivery.

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### Abstract Number: 47

**Christopher Taylor, Cecily Christopher, Alex Coldstream**

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26
Utilising Medium Fidelity Simulations to enforce acute illness management for 3rd Year Medical Students by managing a patient with seizures

Background:
Simulations are now widely used in final year undergraduate and postgraduate medical education. It is not currently a key feature of the third-year medical student curriculum at Newcastle University. We used medium fidelity simulation for 3rd year students as an adjunct to their teaching of acute illness management.

Aims:
To explore third-year medical students’ perceptions of whether medium fidelity simulations advance their learning and improve their confidence of acute illness management, specifically regarding seizure management.

Methods:
Simulations were completed with 3rd Year medical students acting in teams of 3 to complete initial review and subsequent management in a patient with epilepsy having a seizure. Each team had to perform ABCDE, work together and initiate seizure management. These were repeated with a smaller cohort after 4 months. Feedback was collected with Likert 5-point scores, and via a post-simulation debrief discussion, to assess the benefits and challenges faced from the simulation.

Results:
Overall the students found the sessions 96% useful, 99% would recommend the sessions to peers and 96% prefer simulation teaching to traditional lecture work. 86% would change their practice and on average were 88% more confident afterwards in further management. Subjectively the students repeating the scenario performed better and were calmer throughout. They benefitted from the repeated practice and appreciated the more interactive teaching with implications of not completing full ABCDE assessments.

Conclusion:
Students benefit from simulations to enforce acute illness management with ABCDE assessments and are better placed to reflect on their own performance following repeated practice, with improvements seen after a 4 month period. Simulation is increasingly used in undergraduate settings, but a structured programme focussing on skill and knowledge mastery shows potential of producing students who are better prepared for clinical practice. Introducing this early in undergraduate clinical training is a viable teaching approach.

Abstract Number: 48
Mohammad Farwana, Faheem Ahmed, Ibrahim Sheriff

Exploring the potential of vlogging in medical education

Background:
It has been recognised that current methods of online medical education should be supplemented with newer interventions which better facilitate peer-to-peer discussion and empower students to direct their own learning. Video blogging or ‘vlogging’, where individuals or groups video themselves expressing opinions or imparting information, is a social media phenomenon which could potentially meet this need. It is cheap, popular and familiar to the student community, and has the potential to reach a wide audience including those overseas.

Aims:
The purpose of this study was to identify whether vlogging has been harnessed as an educational tool previously and to explore its scope within medical education.

Methods:
A comprehensive review of the literature was performed on Medline using Boolean operators ‘AND’ and ‘OR’ to link the search terms ‘video’, ‘video blog’, ‘vlog’, ‘vlogger’, ‘vlogging’, ‘teaching’ and ‘education’. Studies were included if they reported on teachers or learners producing videos in the video blog format and excluded if they focused on video-taped lectures or the passive videoing of learners as they performed a task or skill.

Results:
Whilst there are numerous studies reporting the use of video as a helpful and effective learning tool, there is a paucity of literature which specifies the use of vlogging in medical education. There are several studies which analyse vlogging as a means of teaching in the arts and humanities, which report that it may help to facilitate peer-to-peer learning and learner reflection.

Conclusion:
Vlogging could represent an untapped resource for medical education. In particular, it could be suited to help students reflect on particular learning points or ethical situations they experience during their training, within the confines of professionalism and confidentiality. Future work will involve working with faculty and trainees with an interest in medical education to pilot online vlogging forums as an adjunct to pre-existing teaching modalities.

Abstract Number: 49
Cecily Christopher, Christopher Taylor, Alex Coldstream
Are medium-to-high fidelity simulation useful in undergraduate education to teach the importance of human factors in acute care scenarios? Student and faculty perceptions

**Background:**
Undergraduate medical students at our Trust undertake medium-to-high fidelity simulations, as adjuncts to their learning, about acute illness management. At this stage in their career, they have little experience of interprofessional teamwork and no explicit training on human factors. Instead, there is a heavy focus on teaching towards the content of their outcomes-based curriculum.

**Aims:**
By simulating acute illness management, students can also learn about core human factors including; teamwork, leadership, decision making and communication, and how these will affect their practice. The main aim was to explore if acute illness scenarios are useful for students’ appreciation of the relevance of human factors in anticipation of future clinical practice.

**Methods:**
Simulations on seizure management were completed with students working in teams of 3 with a nurse ‘stooge’ assistant. The activity was live-streamed to an adjacent room for peers to observe. These were then debriefed, utilising senior and peer feedback on student performance and observed human factors.

**Conclusion:**
3rd year medical students with minimal experience of ward-based care and interprofessional teamwork viewed human factors as a less important focus of their learning than the senior medical students undertaking simulation. High fidelity simulations appear to be too advanced for more junior medical students, who are instead focussing on mastering the basics of management. From our work they appear to be overwhelmed by also learning about human factors. Not all human factors were appropriate to discuss, with situational awareness and cognitive burden appearing the most abstract to more junior students.

Suggestions for further work include developing explicit teaching on human factors appropriate for third and final year medical students, while integrating this with medium-to-high fidelity simulations within the curriculum. This will in turn propagate the importance of human factors recognition in acute care scenarios and for future clinical practice.

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**Abstract Number: 51**
Shreena Shah, Laura Adams, Christina Cotzias

**Responding to National Training Survey (NTS) feedback - can improvement be demonstrated by interval local assessment? Using teaching for medical specialities as an example**

**Background:**
The NTS captures trainee feedback. In response to an annual report, published in summer, an action plan is generated so training opportunities are continually improved. However, following change, the initial cohort of reporting trainees have often changed rotation. In our NTS 2017 teaching opportunities were reportedly below the national average for medical trainees.

**Aims:**
Having implemented change in teaching opportunities in response to NTS 2017, we aimed to assess trainee satisfaction with these changes prior to the NTS 2018 by creating an interim mock survey locally.

**Methods:**
A mock internal training survey based on the NTS model was devised. 41 questions on a digital programme which generated a web-link were sent to all junior doctors in the trust - four of the questions focused just on teaching. The results were analysed to assess perceived teaching quality and quantity. Further focused changes to teaching programmes were prioritised based on challenges identified.

**Results:**
32 of the local survey responses were from trainees working in a medical specialty. Compared to NTS 2017 where 30% of trainees received less than an hour, and 51% received 1-2 hours of teaching/week, the mock survey revealed a significant improvement - only 17% received <1 hour, 68.97% reported receiving 1-2 hours teaching/week. Bleep free teaching improved from 21% in the GMC survey, to 55%. Following the specific changes to teaching, feedback showed improved trainee satisfaction and better curriculum alignment but areas for further focused improvement could also be worked on.

**Conclusion:**
The information generated from the mock survey helped identify improvement as well as any ongoing areas for improving medical trainee teaching. The survey was work intensive for the education fellows, but optimises in real-time the review of the learning experience for a current cohort of trainees. Continued improvement will hopefully be reflected at our next NTS practice.

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**Abstract Number: 53**
Anita Cheah, Roshan Navin, Vivek Srivastava

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**TASME**
Trainees in the Association for the Study of Medical Education
Can trainees co-design and implement an undergraduate Acute Medicine teaching programme?

**Background:**
To our knowledge, King’s College London (KCL) School of Medicine became the first medical school to include a formal Acute Medicine curriculum in 2017. The curriculum specified learning outcomes mapped to the GMC’s “Outcomes for Graduates” guidance.

**Aims:**
To co-design and implement an undergraduate training programme at Guy’s and St Thomas’ NHS Foundation Trust (GSTT) that delivered the new Acute Medicine (AM) curriculum for KCL School of Medicine.

**Methods:**
We delivered the first 8-week AM clinical placement in May 2017. Groups of 2-3 students were placed in AM firms, each with named educational supervisors. Training started with a 2-day induction programme that included AM-focused lectures and simulation scenarios. This was followed by a weekly case-based tutorial programme mapped to the AM learning outcomes. The effectiveness of the clinical placement was assessed by using the quantitative KCL End of Placement Survey (EoPS) results, and compared with scores for other hospitals running the same placement.

**Results:**
In the first placement, 17 of 18 students completed their EoPS feedback (94% response rate). GSTT received a global score of 4.35 out of 5.00, compared with a school-wide average of 4.12. Areas of strength were course organisation (4.76), clinical experience (4.71), induction (4.65), learning opportunities (4.59) and teaching sessions (4.53). Areas for improvement were clinics (3.59), bedside teaching (3.76) and post-take ward rounds (PTWR) (3.82).

**Conclusion:**
Medical trainees can co-design and implement a new undergraduate AM teaching programme. An Acute Medicine curriculum is valuable in meeting the needs of tomorrow’s doctors. Having no precedence should not be a barrier to medical education or quality improvement. Next steps include: (i) Improving clinic, bedside teaching and PTWR experiences for undergraduates; (ii) Continually evaluating the training programme; (iii) Designing new ways to measure improvement; (iv) Facilitating knowledge sharing and learning with other clinical sites.

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**Abstract Number:** 54

Benjamin Beska, Nicola Wyatt

‘Asked To See Patient’: Design, rationale and acceptability of a near-peer final year medical student teaching programme

**Background:**
Near-peer teaching is expanding across both undergraduate and postgraduate medical education. A gap exists between final year medical students and newly-qualified doctors, particularly in the real-world approach to acutely unwell patients; with this perceived unpreparedness leading to feelings of anxiety. Student assistantships aim to smooth this transition, however as exposure to the initial management of acutely unwell patients remains limited, a persistent barrier remains to increasing confidence in this area.

**Aims:**
We will present the design and rationale of a novel near-peer final year medical student teaching programme with analysis of student acceptability of near-peer teaching of this subject.

**Methods:**
‘Asked To See Patient’ is an on-going weekly near-peer teaching programme for final year medical students focused on the application of final year ‘textbook’ knowledge to common and realistic acute scenarios encountered by newly-qualified doctors, using a case-based approach. Acceptability of near-peer teaching was assessed with the validated Clinical Learning Preference Questionnaire (CLPQ), with students indicating agreement with 10 statements on a Likert scale of 1 (strongly disagree) to 5 (strongly agree). Responses were analysed according to the two CLPQ factors, a preference for either ‘Peer’ or ‘Instructor’ supervision.

**Results:**
21 CTPQ responses were collected. Students reported a higher level of agreement with items indicating a preference for near-peer teaching (median score 4.0 [interquartile range 3.0-5.0]) verses instructor-led teaching (3.0 [2.0-4.0]) of this subject (P<0.0002). There was strong agreement that peer-taught sessions made students feel more self-confident and able to perform independently (4.0 [4.0-5.0]), more supported (4.0 [3.0-5.0]), and less anxious (4.0 [4.0-5.0]), compared to instructor-led sessions.

**Conclusion:**
Final year medical students are accepting of a near-peer medical education model to teach an approach to common acute scenarios experienced by new doctors. Evidence of this method improving aptitude in approaching these patients is awaited.

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**Abstract Number:** 56

Nafia Rehman, Isma Rafiq, Hannah Y Yonis, Russell Hearn

"Trainee in the Association for the Study of Medical Education"
M-Learning in Medical Education - The future for medical students?

Background:
Mobile usage has rapidly increased with a 2017 survey reporting mobile ownership at 96% in individuals aged 16-24 (1). Mobile devices are small hand-held wireless computing systems. In the medical profession, mobiles create self-learning environments and improve communication amongst professionals (2). Many medical schools also employ digital learning environments with online modules and interactive teaching, significantly cutting costs. Furthermore, top institutes, such as Yale, have provided portable devices to students. However, does this enhance learning or is it financially inefficient? (3)

Aims:
The aim of this study is to understand the role mobile learning plays in medical education, focusing on the benefits and drawbacks of using mobile devices by students at King’s College London.

Methods:
This research was based on a cross-sectional online survey distributed to all medical students via the Medical Student Association newsletter and social media. The questionnaire consisted of 23 questions including student demographic, smartphone type and details of usage i.e. frequency, location, resources, benefits and limitations.

Results:
Data collection is still ongoing, though initial result analysis shows 82 student respondents ranging from 19-26 years old, from all year groups (male/female =24 (29.2%) and 58 (70.7%)). Most respondents were third (25%) and fourth year students (28%). All owned a smartphone; 93% reported using it for learning with 45% using it multiple times a day. Students predominantly used their phones for: researching information (94%); email/calendar/diary (80%), collaborative learning (78%) and medical applications (55%). The largest barriers were battery life (72%) and social media distractions (70%). Most participants felt that mobiles aided learning but was not an alternative to textbooks (67%).

Conclusion:
Mobile learning plays an integral part in self-directed learning. Further discussion with a focus group would help ascertain whether providing mobile devices would be well received by students and can be integrated into the Curriculum.

Abstract Number: 57

Natasha Santana-Vaz, C Pairaudeau, S Sreevaths

Is paediatric anaesthesia training exposure related to performance within primary FRCA OSCE examination?

Background:
The two years of core training is a steep learning curve within anaesthesia. During this time, trainees complete initial general and obstetric anaesthesia competency assessments, 24 units of training and must pass the primary Fellowship of the Royal College of Anaesthetists (FRCA) examinations. Prioritising these multiple requirements is challenging and there is no guiding evidence regarding the relationship between completion of differing training units and success within primary FRCA examinations.

Aims:
Evaluate whether candidates who have completed paediatric core training unit perform better within objective structured clinical examination (OSCE) paediatric stations. Analyse whether confidence answering paediatric questions correlates with mean paediatric OSCE station scores.

Methods:
Anaesthetic trainees attending 3 Coventry Primary FRCA OSCE courses in November 2017 and January 2018 given a pre-course questionnaire to evaluate paediatric exposure and confidence answering paediatric questions. Paediatric station scores (out of 20) within the 16-station mock OSCE exams recorded by examiner faculty for analysis. Paediatric OSCE stations included caudal anatomy, laryngoscopy blades and resuscitation. Mean candidate specific station scores generated and compared with paediatric experience, measured by Advanced Paediatric Life Support (APLS) and unit of training completion. Candidates’ percentage confidence intervals generated from a linear confidence scale within pre-course questionnaire also analysed.

Results:
Mean scores of candidates with APLS no better than counterparts in caudal (10 vs 13) station. Laryngoscopy blades (17 vs 16) and resus (17 vs 16) station scores marginally higher.
Mean scores with completion of paediatric unit training worse in caudal (10 vs 14) and resuscitation (15 vs 17) and equal in laryngoscopy blade stations (17). Higher percentage confidence scores not significantly correlated with higher mean station scores (coefficient 0.0113).
Candidates who had completed paediatric unit of training (N=27) more confident answering paediatric questions (mean confidence 60% vs 44%) than remainder (N=29), but overall mean scores essentially same (16 vs 17).

Conclusion:
Neither completion of APLS nor paediatric unit of training conferred a benefit in OSCE station scores within our small study. This may suggest that theoretical knowledge of paediatrics is adequate to pass primary FRCA examinations. Further validating work is needed and to assess application to other subspecialties.

Abstract Number: 58
Junior Doctors Education Committee: Today's Trainees, Tomorrow's Trainers

**Background:**
Medical student numbers are increasing nationally, with higher demand on teaching hospitals to deliver clinical education. Medical education is growing in popularity as an interest for junior trainees, with significant emphasis placed on teaching roles in specialty applications. We already rely on junior doctors to deliver teaching to medical students, but due to their own training and service needs, this can be poorly coordinated.

**Aims:**
Our department has developed the Junior Doctors Education Committee (JDEC) to empower educationally-minded junior doctors to lead, deliver and evaluate educational initiatives within an organised framework.

**Methods:**
The JDEC is headed by the Director of Undergraduate Medical Education (DUME), supported by two registrar-grade Education Fellows. At the beginning of the academic year, junior doctors are invited by the DUME to join the JDEC. The DUME and Education Fellows identify educational initiatives that need to be delivered. JDEC members choose which initiative they would like to lead, with support from the Education Fellows.

**Results:**
We have delivered mock OSCEs, bedside teaching programmes and a Virtual On Call programme. We are now in the process of developing new educational material to support a Transition to Practice module for final year MBBS students. Feedback from JDEC members includes “feeling part of a concerted effort to develop education at the hospital…driving lasting improvement [rather] than providing opportunistic teaching alone”. Members noted benefits for their own exam preparation, gained insights into the challenges of delivering education in a busy hospital and appreciated the support provided by Education Fellows and the DUME. For the Education Fellows, supporting the JDEC provided an opportunity to develop their educational, leadership and mentorship skills.

**Conclusion:**
The JDEC initiative allows our institution to more effectively meet our students’ educational needs, while developing the trainers of tomorrow.

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**Abstract Number: 60**

Sindhu Naidu, Maria Bashyam

Training students to be doctors: the use of ward round simulations

**Background:**
Medical students have informal ward round training during clinical placements. However, this is not always sufficient in preparing a new junior doctor to efficiently participate in ward rounds. The Royal College of Physicianss advises all new staff should be trained in ward rounds, and simulation could be a valuable tool for this training.

**Aims:**
To improve the confidence and preparedness of final year medical students for ward rounds

**Methods:**
We used an interpretive paradigm for a study evaluating the effect of ward round simulation, which has been approved by the medical education ethics committee at Imperial College School of Medicine. Final year students were offered a voluntary opportunity to roleplay junior doctors in typical ward rounds. Faculty members ran and acted as consultants, patients and nurses. Focused debriefs highlighted areas for development and key learning points for action. Students completed a pre- and post-session questionnaire and were provided with specific feedback.

**Results:**
N = (9). Quantitative and qualitative data has been obtained through questionnaires. This will be coupled with focus groups to provide further data for thematic analysis. Preliminary results showed students felt more knowledgeable and confident about ward rounds (p<0.02) and this simulation improved their ability to effectively participate in ward rounds (p<0.01). 100% students found the simulation session useful. Qualitative data showed students felt able to improve their technical and non-technical skills and would like these types of sessions within their curriculum.

**Conclusion:**
Ward round simulations are effective in improving students’ confidence and skills for participating in ward rounds as a junior doctor. Students agree that formal ward round training should be included in their curriculum.

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**Abstract Number: 62**

Kirsty Bates

Training students to be doctors: the use of ward round simulations
Students perspectives on whether having skeletal lecture notes to fill in improves concentration and overall learning experience in large group teaching.

**Background:**
Lectures continue to be one of the main ways of teaching in all areas of undergraduate teaching, including medicine. This is despite the fact there is a lot of evidence to show that they are not useful for student learning unless an active process is involved rather than information being passively transmitted. There are lots of ways that the format of a lecture can be changed to enhance learning and concentration.

**Aims:**
I was tasked to deliver a lecture on dementia to around 200 second year medical students as part of their Nervous System module. I wanted to evaluate whether producing an intervention to allow the students to actively participate in the lecture improved their concentration and learning experience. I created a skeletal framework of notes to act a summary of the important points from the lecture which would be useful for revision but left blank spaces at intervals for the students to fill in as they came across the information during the lecture.

**Methods:**
After the lecture I sent out a survey to find out:
- Whether the students used the skeletal notes
- If they managed to follow it to the end of the lecture
- If it help to improve their concentration
- If it helped to improve their overall learning experience
- If it aid their understanding of dementia
Also conducted a focus group to further discuss why it was/wasn't a useful learning tool.

**Results:**
- awaiting complete survey results and focus group results but will be done in the next couple of weeks.
Preliminary results show that it was a valuable tool to improve concentration and learning experience in the lecture.

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**Abstract Number: 63**

Claire Tomkinson, Hannah Sweeney

Audit of Ability to Safely Manage Ophthalmic Presentations in a Cohort of Medical Students and Junior Doctors in a DGH

**Background:**
Medical schools across the UK devote a very small percentage of their curriculum to 'Ophthalmology'. Often students get five days to learn all the ophthalmic skills required to be a competent F1 doctor, which includes mastering the notoriously difficult fundoscopy. Foundation doctors are exposed to ophthalmology in all specialities, especially during general practise and acute medical rotations, with 6% of A&E attendances being ophthalmic. We felt that the standard of ophthalmology teaching delivered by most medical schools’ curriculum needs to be readdressed to ensure it is adequately preparing students to be safe clinicians.

**Aims:**
Assess how confident medical students and foundation doctors feel managing common ophthalmic presentations. Evaluate if medical students/foundation doctors want extra ophthalmology teaching and if so what form of teaching/revision aids would they prefer.

**Methods:**
A cohort of 26 UK trained final year medical students/foundation doctors were sent an online survey assessing their confidence. All participants also answered 3 MCQ questions related to managing sight-threatening presentations.

**Results:**
87% (n=22) of participants said they did not feel comfortable managing ophthalmic presentations. Of these 22 participants 100% answered the MCQ questions incorrectly and 100% said they would like more teaching. Of the 13 % (n=4) participants who felt comfortable, only 50% answered the questions correctly and 100% said they would like more teaching.

**Conclusion:**
Ophthalmology is a poorly understood specialty amongst junior doctors, hence the need for more teaching resources. We plan on setting up a bimonthly teaching session that covers the basics of examination and management. To facilitate this, we will also set up a monthly ophthalmology email that contains a quiz and key facts for a different condition every month with a prize for the winner.

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**Abstract Number: 64**

James Ashcroft
Innovating the trainee journal club: Virtual journal clubs and journal club takeaways

**Background:**
The West Middlesex University Hospital Trainee Journal Club (WMUH TJC) is a bimonthly journal club aimed specifically at students and junior trainees from a wide range of healthcare professions.

**Aims:**
The WMUH TJC aimed to further its educational value and the academic experience of undergraduate medical students by developing an online and interactive virtual journal club and ‘Journal Club Takeaways’

**Methods:**
This virtual journal club is updated once a month with a new paper which demonstrates weakness or strengths discussed in the previous month’s journal club sessions, with accompanying multiple choice questions and assessments allowing students to allow students to test themselves and formally identify and improve knowledge gaps. The WMUH TJC ‘Journal Club Takeaways’ are online questionnaires following each meeting which ask attendees to enter their key learning points and key appraisal points from each session. These points are then written up into a concise article and emailed in a newsletter to the attendees of the club for review.

**Results:**
The points gathered from a pilot of Journal Club Takeaways in response to a recent article were elaborated upon and written up by members of the WMUH TJC into an article which has now been published in the BMJ’s Postgraduate Medical Journal doi: 10.1136/postgradmedj-2017-135327[2]. This novel journal club innovation allowed trainees to gain both critical appraisal insight and valuable academic writing and publication experience.

**Conclusion:**
The WMUH TJC has made significant steps forward to move from the traditional journal club, where trainees were small voices in a room of senior healthcare professionals, to creating leading positions for healthcare trainees through novel innovations.

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**Abstract Number: 65**

Gnananandan Janakan

Developing a high fidelity simulation course of acute medical scenarios for the Royal Auxiliary Air Force

**Aims:**
High fidelity simulation has been embraced by many specialities within the NHS. However, the transition into the military setting is not as widespread. Much like the emergency teams that attend acutely unwell patients do not normally work together but are forced to do so based on the on call rota, military reservist do not work together except on training weekends until they are deployed.

**Methods:**
A pre-existing high fidelity course set for core surgical trainees was adopted to meet the needs of the 4626 Aeromedical Evacuation Squadron of the Royal Auxiliary Air Force. This was complex as the candidates were a mix of nurses, paramedics, emergency medicine physicians, anaesthetists, general practitioners and a dentist. The scenario setting were changed to either on board an aircraft or in a field hospital taking into account realistic restrictions.

**Results:**
The qualitative questionnaire that was given to all the candidates over two courses demonstrated how all the candidates bar one found the course useful. They could see how these scenarios allowed candidates from different healthcare backgrounds work together in a way they wouldn’t normally experience until they were deployed.

**Conclusion:**
This was technically difficult to create the course due to the complexities of adapting NHS based scenarios into various military settings taking into account the differences. The candidates are by the fact they have volunteered to join the RAF self motivated people with an interest in acutely unwell patients. This made the debriefs very challenging to introduce issues and factors to talk through as a group. Due to the highly skilled group, the level of distraction added was more complex than those used in the NHS course.

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**Abstract Number: 66**

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Kristen Davies, Emma Rocheteau, Ollie Burton, Sophie Simmonds, Vinay Madegere, Declan Murphy, Cameron Jenkins, Rajiv Sethi

@BecomingaDr: widening access in medicine

Background:
Being accepted into medical school remains a fiercely competitive process. In addition to potential entrance examinations, students are required to have undertaken relevant work experience and gained insight into the profession. Gaining relevant experience in preparation for applying is not equally accessible to students from all walks of life. This disparity compelled us to establish Becoming a Doctor (BAD) @BecomingaDr, a team of clinicians, medical students and advisors with a belief that anyone with the ability and aspiration to study medicine should have the opportunity to do so.

Aims & Methods:
To deliver a national event which was free and engaging for prospective medical students and where they could find out more about applying to medicine and allied health careers. To set up regional and local widening participation programmes to help deliver interactive experiences. To recruit university ambassadors to help design and lead workshops across the UK.

Results:
The BAD National Health Careers Conference and Exhibition, held in Manchester in October 2017, was the UK’s largest event for individuals considering a career in healthcare. Over 1,000 delegates participated, with some travelling from as far as Scotland and Athens, to experience an immersive programme supported by 30+ key organisations in the sector. These included the General Medical Council, Medical Schools Council, Royal Colleges, British Medical Association, JASME and several Universities. We also collaborated with students, clinicians, schools and hospitals from the UK to deliver free resources and workshops as part of our outreach programme. Conclusion:
The need for widening participation programmes in the UK are highlighted by the popularity of our national conference and outreach programme. We have been approached to support widening access across other health disciplines and countries. We welcome collaborative efforts in this area, aim to develop our initiatives and look forward to continue making an impact. An engaged and interactive grassroots approach is appealing for prospective students and stakeholders. More collaborative efforts are encouraged in this important area.