Distraction in Simulation

King's College Hospital
NHS Foundation Trust

NHS

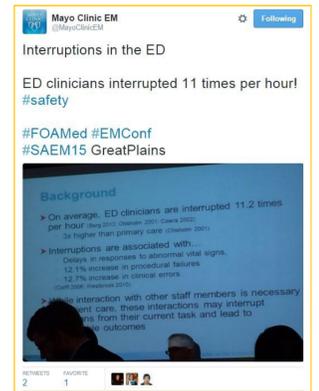Dr Charlotte Davies, Emergency Medicine Registrar and Education Fellow

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Simulation is widely used as a tool to improve patient safety, by focusing on human factors as additional skills. It can be used to simulate situational stress to allow participants to develop strategies for dealing with rare events and controlling their bandwith.

Doctors spend 16—24% of their working lives engaged in simultaneous activities, and emergency physicians are interrupted at least 11 times an hour. Distraction is a safety risk. Mentally rehearsing the actions you will take for distraction is an important part of preparation, and stress inoculation.

For senior emergency staff, in contrast to other clinical environments for example the operating theatre, their clinical work involves responsibility for multiple clinical demands and areas, and is therefore subject to more distractions. This is difficult to simulate within the constraints of a simulation lab where most scenarios are focused on a single patient.

When planning a simulation course for only Emergency Medicine staff, we wanted to pilot the feasibility of using distraction as tool to simulate the experience and stressors of running the whole department within the sim lab.

Distractions are defined as stimuli which produce observable behavioural change during task execu-

Mayo Clinic EM
@MayoClinicEM

Interruptions in the ED

ED clinicians interrupted 11 times per hour!
#safety

#FOAMed #EMConf
#SAEM15 GreatPlains

Distractions

Sensory Distractions

Sensory distractions make it harder to concentrate. Some people are better at tuning the noise out than others. A constant background noise can be stressful.

We used:

- Background ED noise—this track has general chatter, footsteps, babies crying, alarms, and phones.
- A cleaner mopping around the bay and clattering bins
- Repeated tannoys for the doctor or nurse in the room. Calling the staff member by name helps distract them further.
- Phone calls for the doctor or nurse in the room from someone important in the organisation e.g. Dr Smith, you are late for an appointment with the medical director.
- Short lived power cut, simulated by turning the lights off.
- A disengaged embedded practitioner, answering their mobile phone and having a very loud conversation.

Cognitive Distractions

Some distractions are easy to ignore, but sometimes you have to make a decision about what your priority is. As much as these are sensory distractions, they are also cognitive distractions.

We used:

- Junior doctors coming to ask for help about other patients e.g. " I have a 72 yr old with right sided flank pain. I'd like to send him and his renal colic home"
  [This was a good distraction, as sometimes the senior "saw the silver lining" in the distraction and asked the junior to stay, as an extra team member.]
- Nurse in Charge asked about the plan for patient xyz who is about to breach, and informed you there was a four hour wait in minors that you needed to go and address.
- The fire alarm went off intermittently so that team members had to decide whether to evacuate or not.

Evaluation

Focus groups were conducted for faculty and participants after each course:

- Faculty felt able to act as embedded practitioners
- Candidates felt the depth of experience helped to add emotional realism into the scenario
- Candidates enjoyed the distractors, and offered suggestions for further distraction.

Conclusions

Distraction is a feasible tool to simulate the demands of departmental leadership within the constraints of a single manikin simulation lab.

We look forward to hearing how you introduce distraction to emergency medicine simulation, and your strategies for coping with it.

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