

Background In 2012 changes in the home oxygen service (HOS) contract offered patients the potential to benefit from new technology designed to assist ambulatory oxygen (AO) use, such as liquid oxygen (LOX) and refillable cylinders (Homefill). Prior to the change in contract only three services were thought to be commissioned in London (serving approximately 10,000 HOS users, costing £10.5m), with many areas attempting to meet increasing demand with no increase in resources.

Aim

- To determine the service provision, commissioning arrangement and assessment protocols for AO across London
- Establish an AO network across London

Methods A telephone audit was carried out in January-March 2013 with all known oxygen assessment centres in London. Two clinicians used an agreed proforma, with email follow-up. The interview included questions regarding; commissioning/funding; location; access to service, referrals and pathway; assessment protocol; disciplines/grades; and integration with respiratory services.

Results 34 interviews were performed across the 32 London boroughs. Key findings are:

Access: Two boroughs had no service, some had multiple.

Who: In 20 teams nursing staff assessed; 15 teams, physiotherapists; and 7 teams, respiratory physiologists.

Where: 16 assessed in the hospital, 9 in the community and 7 in both.

How: The majority (94%) performed the 6MWT, however teams that assessed in the home did not use validated reproducible exercise tests.

Equipment for assessment: The majority had standard cylinders (88%); 53% had lightweight and conservers; and other devices were rarely (3–13%) available.

Size: 16 services (47%) carried out less than 5 assessments per month.

Funding: 47% have some arrangements in place, 29% had no funding or no service provided and 24% unclear.

Integration: 67% were part of an integrated service, 18% stand alone, 12% unclear and 6% had no service.

Conclusions Service provision for AO across London is varied, with no standardised referral pathway, assessment protocol and often limited range of equipment available for assessment. This raises concerns over access to services, clinical assessment skills/competencies and unsuitable prescriptions. Approximately half of the services have no or unclear funding arrangements and although the majority of services (67%) are integrated within a wider COPD/IRS there was no established network and many clinicians felt isolated.

M26

TEACHING STUDENTS TO PRESCRIBE OXYGEN SAFELY: THE IMPACT OF AN E-LEARNING MODULE AND BTS OXYGEN PRESCRIPTION SECTION ON OXYGEN PRESCRIBING BY MEDICAL STUDENTS TAKING FINAL MBBS EXAMINATIONS

¹D Hammersley, ²LJE Smith, ²D Furnedge, ¹C Ward, ¹S Kennedy, ¹LJ Restrict, ²A Sturrock; ¹Department of Respiratory Medicine, Whittington Health, London, England; ²University College London Medical School, London, England

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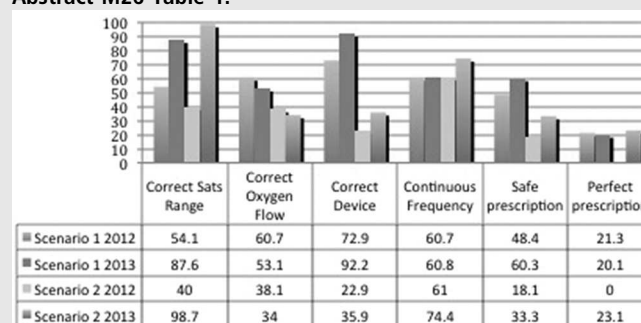
Introduction and Objectives National audits show oxygen prescribing is not consistently safe, despite BTS Emergency Oxygen

Guidelines. We previously identified that medical students were unable to safely prescribe oxygen at final MBBS examinations.¹ A compulsory e-Learning module was introduced to address this unmet educational need. We assessed the impact of this intervention in 2013.

Methods An Oxygen Prescribing Final MBBS OSCE station was used in 2012 and 2013. In 2013 candidates (350) completed a new compulsory oxygen e-Learning module. Candidates in 2012 (227) had not. In 2013 the exam prescription chart also included an oxygen prescription section. Each year, candidates were presented with one of two clinical scenarios. Scenario 1: 72-year-old patient with COPD, and Scenario 2: 72-year-old hypoxic patient without respiratory disease. Oxygen prescriptions were assessed against BTS standards across a number of domains. They were classified as 'safe/unsafe' and 'perfect/imperfect' by a respiratory nurse specialist.

Results Some improvements were seen in both scenarios (See Table 1), particularly prescription of the correct target saturation range. In 2012 40% (42/105) prescribed correct range for the non-COPD scenario; in 2013 this was 98% (154/156).

Abstract M26 Table 1.



Conclusions Introducing an oxygen e-Learning module and BTS-recommended oxygen prescription section resulted in improved competence and safety of oxygen prescribing with significant improvement in correct target saturation ranges. However, students still have gaps in equipment knowledge and a high proportion did not prescribe oxygen safely for a patient without respiratory disease. The e-Learning module was undertaken by students at a point close to examinations; moving this earlier in the year may lead to better engagement and improve the understanding of oxygen prescribing in non-COPD patients, emphasised in the module. Safer prescribing is enabled by oxygen prescription sections with target range saturation choices but equipment education is also needed. Adverse consequences of incorrect oxygen use continue to cause patients harm. Ensuring undergraduates have the practical knowledge and skills to prescribe oxygen safely is essential.

REFERENCE

1. D Hammersley, A Connor, C Ward, *et al.* Competence in, and safety of, oxygen prescribing by medical students taking Final MBBS as assessed by Objective Structured Clinical Examination. *Thorax* 2012; 67(Suppl 2):A168

M27

SHOULD THERE BE A RESPIRATORY-SPECIFIC MODIFIED EARLY WARNING SCORE?

H Finamore, M Pritchard, O Abdul Kadir, J Mayer, J Bannon, H Burhan; *Royal Liverpool and Broadgreen University Hospitals NHS Trust, Liverpool, UK*

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