Results 13 cases were primary chest wall tumours. Underlying diseases included chondrosarcoma, osteosarcoma, sarcomas, primary and metastatic lung tumours, radionecrosis and Aspergilloma. Mean number of ribs resected was 3.5. Reconstruction was performed using Marlex mesh with methyl methacrylate in all patients. The exact nature of the resectional defect cannot be fully planned for reconstruction until after its creation. Muscle, myocutaneous and chimeric flaps were used. Soft tissue reconstruction was carried out using Latissimus Dorsi muscle or myocutaneous flaps in 10 patients, Pectoralis Major in 2 patients, Rectus Abdominis in 1 patient, Trapezius in 1 patients and Serratus Anterior in 1 patient. 3 patients had post-operative complications requiring re-admission. There were no cases of 30-day mortality on follow-up.

Conclusions Chest wall resection and reconstruction with Marlex mesh had excellent results, and is useful for managing defects following chest wall resectionwith low morbidity. The importance of close collaboration between reconstructive and cardiothoracic surgery team is demonstrated.

Respiratory education and training issues

P63 PATIENTS' AND HEALTHCARE PROFESSIONALS' PERCEPTIONS OF OXYGEN THERAPY? A QUALITATIVE STUDY

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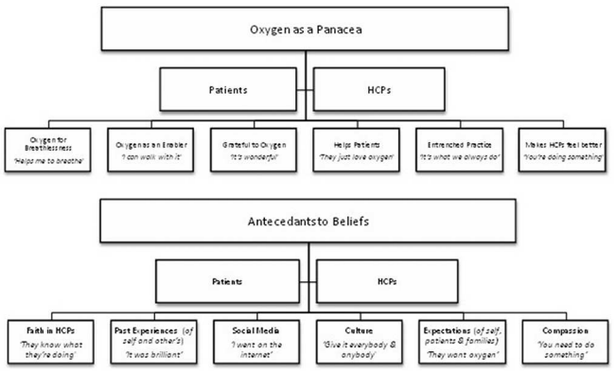
Background Despite common usage of oxygen as a therapeutic intervention, audit suggests poor prescribing and administration practices exist. Contemporary studies and guidelines propose an influencing culture whereby oxygen is given to alleviate breathlessness with disregard for potential harm; but there is no evidence supporting this claim. Further suggestions indicate confusion regarding the use of oxygen therapy, possibly as a consequence of conflicting information; again, there is no evidence. The problem may self-perpetuate as erroneous beliefs are passed to patients, their carers and the general public.

Aim To explore healthcare professionals' (HCPs) and patients' perceptions of oxygen therapy and help direct future research, education and practice.

Method Semi-structured interviews were undertaken with 28 patients and 33 HCPs, including doctors, nurses, paramedics and pharmacists. Self-reported beliefs and behaviours were recorded and transcribed verbatim and analysed iteratively using interpretative phenomenological analysis (IPA). Independent audit served to validate findings.

Results Two overarching themes were identified: *oxygen as a panacea* and *antecedents to beliefs* (Figure 1). Sub-themes under these constants differed between HCPs and patients but fundamentally both groups viewed oxygen as an innocuous therapy with numerous benefits. HCPs use of oxygen stems from *entrenched culture*, *expectations* (of patients, families and other HCPs) and a need to '*to do something*'. Patients are influenced by *HCPs*, *past experiences* (of self and others) and *social media*. Knowledge, education and understanding predisposed both groups' perceptions, but without exception all HCPs believed that they had not received enough education about oxygen therapy and an approach of DIY education prevails.



Abstract P63 Figure 1 Major Themes

Conclusion These findings suggest that a set of fixed beliefs and practices regarding oxygen therapy exist, influenced by several factors. The overwhelming perception being that oxygen is a universal remedy. Patients rely on HCPs for education and information, yet HCPs' fixed beliefs regarding oxygen therapy can lead to ill-informed practice. As the gatekeepers to oxygen therapy, and a major influence on patients' education, HCPs would seem the logical catalyst to change these fundamental beliefs and practices. In order to achieve this, current educational curricula needs to be addressed.

P64 THE IMPACT OF SIMPLE INTERVENTIONS ON OXYGEN PRESCRIBING AND MONITORING: AUDIT OF OXYGEN MANAGEMENT IN CENTRAL LONDON TEACHING HOSPITAL

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Introduction Oxygen is one of the most commonly used drugs, but one of the most poorly prescribed. National BTS audits show many patients receive oxygen without prescription[1]. Local historical data showed over 50% of patients were on oxygen without prescription and not titrated appropriately. Currently there are no targeted interventions to improve practice. We aimed to improve oxygen prescribing and monitoring through simple interventions.

Methods For 5 weeks all patients on oxygen were audited using the BTS audit template. Prescriptions, written orders, target ranges and saturations were recorded, together with the ward and speciality. Nurses were also surveyed to gauge understanding of oxygen management. Subsequently, the key findings were emailed to clinical staff as a Clinical Governance issue and the results were presented to junior doctors, together with targeted teaching on oxygen prescribing. Oxygen "hangers" raising awareness of oxygen management were trialled on 5 medical wards, which were subsequently re-audited.

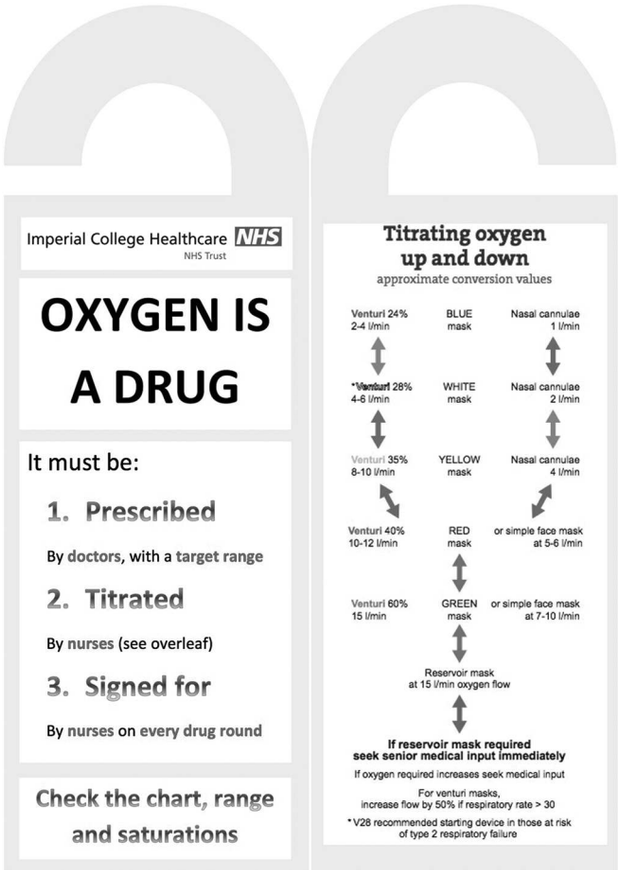
Results 43% of patients on oxygen had a prescription with target range. A further 13% had a written order in the notes. Medical wards out-performed surgical wards (52% vs. 24%). Oxygen prescriptions were signed by nurses on just 5% of drug rounds. 45% of patients' saturations were out of range, with 61% of patients with saturations above the 88–92% target range. However, all surveyed nurses reported feeling confident titrating oxygen. Furthermore, 72% and 20% of nurses thought shortness of breath and anxiety were indications for oxygen respectively.

Post-interventions, oxygen prescriptions increased by 35% and there was an increase in nurses signing prescriptions from 7% to 46%. 13% fewer patients' saturations were out of range.

Conclusions This audit confirms the results of BTS national audit 2012[1] and NPSA rapid response report[2] that oxygen is poorly administered in NHS hospitals, putting patients, particularly those liable to CO_2 retention, at risk. We found that simple interventions raising awareness can have an impact and improve patient safety, although there is clearly room for further improvement, through further training for both clinicians and nurses.

REFERENCES

1. BTS National Emergency Oxygen Audit Report, May 2013, B. Ronan, O'Driscoll
2. NPSA Rapid Response Report–Oxygen safety in hospitals, 2009



Abstract P64 Figure 1.

P65 WHY HAS EMERGENCY OXYGEN ADMINISTRATION FAILED TO IMPROVE DESPITE 'BEST PRACTICE' INTERVENTIONS?

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Introduction and Objectives Despite instigating all operational and educational recommendations in the BTS Emergency Oxygen Guideline (local policy, standardised prescription and bedside

Abstract P65 Table 1. Survey results. All percentages are for number of respondents answering that question, all Likert scales are reported as mean scores out of 5 with 1 being the most negative response and 5 being the most positive, with standard deviation in parentheses afterwards.

Variable	Doctors	Nurses
Demographics:		
Responses - Complete (partial)	21 (41)	24 (72)
Rank/Grade (self professed respiratory interest):F1	9 (1)	N/A
•F2	9 (1)	N/A
•CT1	10	N/A
•CT2	1	N/A
•ST3+	8	N/A
•HCA	N/A	1
•Band 5	N/A	24(10)
•Band 6	N/A	24(16)
•Band 7	N/A	8(8)
•Band 8	N/A	1(1)
Ward/Work environment:	N/A	2
•Respiratory Ward	N/A	24
•Acute/Coronary Care Unit (includes NIV)	N/A	6
•A&E	N/A	14
•ITU	N/A	4
•Medical Wards	N/A	4
•Surgical Wards	N/A	4
•Other		
Awareness of Guidelines:		
BTS Guideline awareness	64.9%	46.2%
Trust Policy awareness	78.4%	88.5%
Able to locate Trust Policy on intranet	34.3%	17.1%
Read guidelines:	34.3%	7.3%
•BTS	8.6%	36.6%
•Trust	8.6%	19.5%
•Both		
Received training within last 5 years	62.9%	43.9%
Usefulness of training	3.41 (0.67)	3.82 (0.73)
(1=Not at all–5=Very)		
How much did the training change your practice	3.09 (1.06)	3.71 (0.92)
(1=Not at all–5=Significantly)		
Awareness of Content:		
Awareness of concept of target saturations	100%	100%
Confidence:· Prescribing· Administering	4.23(0.65)	N/A
to target saturations	3.97(0.92)	3.97(0.68)
(1=Not at all confident–5 = Very confident)		
Prescription Scenarios	3.65	2.89
(mean mark out of 5 by two assessors	2.93	2.17
(five way =0.274)–Doctors expected to	3.56	3.22
diagnose and prescribe, nurses asked to comment	3.35	2.78
what they thought prescription should be for	3.35	2.26
given diagnosis)		
•Critically Ill Patient		
•Acute Coronary Syndrome		
•COPD at risk of Type II Respiratory Failure		
•Carbon Monoxide Poisoning		
•Obesity Hypoventilation with home nocturnal NIV		
Agreement:		
Understanding of why the approach to oxygen	66.7%	85.2%
administration has changed		
Belief changes are beneficial to patients	4.44 (0.75)	4.74 (0.59)
(1=Outcomes are a lot worse–5=Outcomes definitely better)		