showed a sharp increase, particularly toward the end of the financial year (difference in slope -0.77 (95% CI -2.16 to 0.61) versus 9.53 (6.03 to 13.03), $p < 0.0001$) [Figure]. 36.8% of patients were found to be on off-label inhaled therapy for COPD.

Conclusion The number of referrals to PR increased significantly following inclusion in QOF. The majority of the referrals from GPs either require further evaluation or are inappropriate. The spirometry data suggests there is a high misdiagnosis rate of COPD in primary care.

P119 IS A PRACTICE INCREMENTAL SHUTTLE WALK TEST NEEDED FOR PATIENTS WITH CHRONIC OBSTRUCTIVE PULMONARY DISEASE ADMITTED TO HOSPITAL FOR AN ACUTE EXACERBATION?

¹V Johnson-Warrington, ²K Mitchell, ²S Singh. ¹University Hospitals Coventry and Warwickshire, Coventry, UK; ²Centre for Exercise and Rehabilitation Science, University Hospitals of Leicester NHS Trust, Leicester, UK

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Introduction The Incremental Shuttle Walk Test (ISWT) assesses exercise capacity in patients with Chronic Obstructive Pulmonary Disease (COPD). Guidelines suggest 2 ISWTs should be performed. However, in patients who have been admitted with an acute exacerbation, it is unknown if 2 ISWTs are required.

Objective To investigate if a practice ISWT is needed for inpatients with an acute exacerbation of COPD.

Methods Patients admitted to hospital with an acute exacerbation completed 2 ISWTs, prior to discharge. Patients gave written informed consent (ISRCTN84599369) and were included if they used the same oxygen and mobility aid (if any) between tests.

Results 37 inpatients with COPD (19 male) were included: mean (SD) 67.89(8.02) years with BMI 24.66(6.60), FEV₁ was 1.07(0.44)[41.94(13.72)% predicted], FEV₁/FVC 47.11(11.70)%, median (inter-quartile range) MRC dyspnoea grade 4 (3–5), resting Borg breathlessness 2(0.5–3) and 11 had never exercised.

Participants achieved ISWT1 92.16(97.67)m, post-HR 108.64(14.33), post-SaO₂ 90.33(3.89), post-Borg breathlessness 4(3–5) and post-Rated Perceived Exertion (RPE) 13(13–15). There was a statistically significant increase of 14.59(29.12)m for ISWT2 ($p < 0.05$) but no significant differences in HR, SaO₂, Borg or RPE. Bland Altman plot (Figure 1a) shows acceptable agreement between the ISWTs.

When calculating Endurance Shuttle Walk Test (ESWT) level at 85% VO₂ peak as estimated from ISWT1 and ISWT2, there was a significant increase of one level ($p < 0.05$).

Multiple regression explained 92.1% of the variance ($F_{(9,18)}p < 0.001$, R^2 0.921) of the difference between ISWTs using FEV₁%predicted, FEV₁/FVC%, BMI, exercise history, resting SaO₂, ISWT1 distance, ISWT1 post-SaO₂, post-Borg and post-RPE ($p < 0.05$). Using the multiple regression equation to calculate predicted ISWT2, there was good agreement (Figure 1b) and no significance difference between this and actual ISWT2 (0.04 m, $p > 0.05$).

Conclusions There was a small but statistically significant increase between ISWTs, which was below the minimal clinically important difference. However, this difference changed the ESWT level for some patients which would have had consequences for exercise prescription.

Abstract P119 Figure 1a Bland Altman Plots showing agreement between ISWT1 and ISWT2 and 1b predicted ISWT2 and actual ISWT2

This exploratory work has shown that we can predict the difference between ISWTs using a multiple regression equation which could substitute the need for a second ISWT; this needs to be confirmed prospectively. A practice ISWT is therefore not necessarily needed in this patient group.

P120 SHARED DECISION MAKING IN A PULMONARY REHABILITATION SETTING FOR COPD PATIENTS

CL Madsen, J Tomkinson. Bristol Community Health, Bristol, UK

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Title: Evidence of Shared Decision Making in a COPD education and supported self-management group setting.

Authors: Jen Tomkinson, Advanced Respiratory Physiotherapist, Specialist Services (Long Term Conditions) Bristol Community Health CIC; Claire Madsen, Consultant Physiotherapist; Bristol Community Health CIC

Introduction and objectives Shared Decision Making (SDM) is a patient centred, research based approach which empowers patients to work in partnership with health professionals to manage their long term conditions. There is no published data of

Abstract P120 Table 1

Shared Decision Making Descriptor	Result
% of patients felt that the clinician addressed what was important to them at their appointment	90%
% of patients felt that their expectations were met during their appointment	90%
% of patients felt able to make a decision that was right for them with their clinician	90%
% of patients felt that the clinician shared their expertise with them enough to help the patient feel that they were making the right choice for them	90%
% of patients felt that they fully understood the pros and cons of each treatment option	88%
% of patients were happy that there was enough time to help them feel confident in making their treatment choice	90%
% of patients reported that the information they received led to them changing their decision regarding treatment choices	45%
% of patients felt more confident to manage their condition after attending an education and self-management group	90%
% of patients reporting that they now do things differently as a result of their consultations showing changes in lifestyle and health behaviours	95%
% of patients reporting high confidence scores in self-managing their condition at the start of the group	5%
% of patients reporting high confidence scores in self-managing their condition at the end of the group.	90%

shared decision making within group education for COPD patients to date.

Methods 20 semi-structured interviews were performed to obtain quantitative and qualitative data from COPD patients who had recently attended an education and supported self-management group held over six weeks. Data collection was performed by allied health professionals who do not work in the COPD clinic. Questionnaires were reviewed and amended by a Questionnaire Users, Interviews and Surveys group prior to use.

Results (see Table) Qualitative feedback provided by patients supported the quantitative results and ranged from neutral to highly positive in nature, with several patients reporting significant impact on their quality of life, confidence in supported self-management, increased exercise participation, physical function, and social participation.

Conclusion COPD patients attending a six weeks education and supported self-management group reported significant understanding of information, increased understanding of treatment options, and increased education and ability to self-manage.

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SPEECH AND LANGUAGE THERAPY IN PULMONARY REHABILITATION: THE IMPLICATION OF EDUCATION SESSIONS ON DYSPHAGIA MANAGEMENT

SF Lillie, J Haines, A Vyas, SJ Fowler. *Lancashire Teaching Hospitals Trust, Preston, UK*

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Introduction Pulmonary rehabilitation (PR) programs use multi-disciplinary teams to optimise physical and social functioning of patients with chronic respiratory impairment. Such patients demonstrate an increased prevalence of oropharyngeal dysphagia as a consequence of impaired co-ordination between respiration and swallowing function. Often patients will not be aware of the warning signs of dysphagia and unfortunately will not be seen by a speech and language therapist until they are admitted to hospital. We report the outcomes of a pilot scheme whereby such patients underwent education, assessment and treatment for dysphagia as part of their PR programme..

Methods The pilot scheme ran between June 2013 and May 2014. Intervention consisted of: (1) a one hour group education

session on the signs, symptoms and risks of dysphagia; (2) screening for oropharyngeal dysphagia; and (3) individual outpatient management in Airways Clinic. The majority of patients attending the education sessions had a diagnosis of Chronic Obstructive Pulmonary Disease (COPD).

Results The education programme was delivered to 72 patients, and resulted in a significant improvement in dysphagia knowledge. The average score pre education was 3/11 and post education was 8/11. Fourteen patients (19%) exhibited or reported symptoms of dysphagia. Of these two patients were overtly aspirating and required food/fluid modification and seven patient's required instrumental assessment in the form of fibre endoscopic evaluation of swallowing (FEES). During FEES, three patients showed penetration of food/ fluids and were at risk of silent aspiration. These patients attended for further SLT where diet/ fluids were modified, posture was assessed and dysphagia therapy was introduced.

Conclusions Dysphagia education and management of patients in PR can contribute the early identification, patient awareness and self-management of dysphagia. We have confirmed that undiagnosed but clinically important dysphagia is present in patients undergoing PR. We are investigating whether improved dysphagia knowledge and early identification of dysphagia symptoms leads to reduced exacerbations and improved quality of life.

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A SURVEY OF PULMONARY REHABILITATION (PR) SERVICES IN KENT, SURREY, SUSSEX (KSS)

J-P Crofton-Biwer, E Lazar, J Bott. *Kent Surrey Sussex Academic Health Science Network, Crawley, UK*

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Introduction and objectives There is no agreed model for Pulmonary Rehabilitation (PR) and wide variation in services exists. A regional PR network was established 4 years ago, with the aim to drive up standards and reduce variation. An audit was undertaken of all PR services in the region to determine costs of services and factors influencing variance.

Method In June 2013 e-questionnaires were sent to all 16 known PR providers; fifty questions requested average annual/ weekly data including: staff pay bands, time spent on exercise, education, administration, travel and other identifiable costs, numbers failing to complete (drop-out) and clinical outcomes. All costs were calculated in terms of cost-per-patient. Providers