

Background The RCOPP was a national programme aimed at enabling older people to stay independent and well at home. Three of the interventions funded by the RCOPP in Glasgow City targeted COPD. This study aims to describe emergency admissions (EAs) for those with COPD in Glasgow City during the RCOPP.

Methods COPD EAs were defined using a primary diagnosis of COPD, while EAs for those with COPD were defined using any of the 6 diagnostic fields. Monthly standardised rates of emergency admission between April 2011 and March 2015 were calculated, for residents of Glasgow City aged 65 years+. Multilevel Zero-inflated Negative Binomial models for EAs nested by datazone adjusted for sex, 5 year agegroup, area-level deprivation (SIMD quintile), season, month and month squared. Relevant interventions were entered into the models, to test association with the two outcomes by time and location.

Results COPD EAs first rose, from April 2011 until October 2012, then fell until March 2015. When modelled, both month (RR for month 12 relative to month 1% and 95% CI=1.08 (0.996, 1.17)) and month squared (RR=0.998 (0.996, 0.999)) were significant, with risk of admission falling below the baseline figures by October 2013 and continuing to reduce thereafter. EAs for COPD patients, however, had the opposite trend, first falling between April 2011 and February 2013, then rising until March 2015, although never reaching the level of April 2011. Under the model, month (RR=0.92 (0.87, 0.97)) and month squared (RR=1.002 (1.001, 1.003)) were both significant. However, this increase was only in the North East and North West sectors of Glasgow. EA for COPD patients reduced in the South, with particularly large reductions from July 2012. When included in the model, the Community Respiratory Team, in the North West, was associated with reductions in COPD EAs (RR=0.89 (0.82, 0.97)) from the point of full staffing) and increases in EAs for COPD patients (RR=1.11 (1.03, 1.20)). Two other projects were also potentially associated with increases in EAs for COPD.

Conclusion COPD EAs reduced from the end of 2012, in line with all-cause EAs shown previously. The timing and geography suggest these reductions may be due to the Community Respiratory project which helps people to manage their symptoms at home. EAs for COPD patients, however, increased from around the same time. This or another RCOPP service may have raised awareness of other health concerns or health more generally, increasing EAs for these patients.

P40 EXPERIENCES AND ILLNESS PERCEPTIONS OF WORKING-AGE CARDIAC REHABILITATION ATTENDEES

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Background Cardiac rehabilitation (CR) research often focuses on older individuals. With particular pressures faced by working-age individuals (<65 years), such as work and family responsibilities, it is important to consider how this group engages with cardiac rehabilitation. We present here a synthesis of qualitative literature and initial results of a longitudinal qualitative study.

Methods We conducted thematic synthesis of studies (2006–2016) describing CR experiences of 18–65's. Synthesis was

gender-sensitive and guided by Leventhal's Self-Regulation Model of Illness. Results informed development of the qualitative study.

The longitudinal qualitative study recruited participants aged 18–65, following MI, from a Phase IV CR programme in Scotland. Semi-structured interviews occur at commencement and completion of the 12 week programme. Participants complete a questionnaire (Illness Perceptions Questionnaire-Revised and health behaviour questions) plus a family member is interviewed at both time points. Questionnaire data contextualises qualitative data (analysed using theoretical thematic analysis).

Results Review Nine studies were included. Heterogeneity existed in CR setting, participant numbers and gender. Thematic synthesis identified themes including illness perceptions, emotional representations and behaviour for illness control i.e. diet change. Some themes appear specific to the 'working-age' group. The influence of gender featured across all themes.

Study (At time of submission) Five participants and two family members interviewed, three baseline and follow-up, two baseline only. Participants are male, aged 41–61, all married and employed. Family members are female spouses. All participants had MI. Genetics or bad luck were often seen as cause of their MI, leading to limited behaviour change. Participants and family valued CR as a place of safety and reassurance due to monitoring and advice provided by staff. Participants identified themselves as fit and active, and therefore not 'old', suggesting recovering function/fitness may be particularly important for this age group. Following completion of CR, participants felt they could now exert themselves without causing their body or heart harm. Participants also described a lack of age-relevant support material that addressed issues like returning to work, family demands such as elderly parents, and exercise advice accounting for their greater pre-MI fitness.

Conclusion It is important to consider how working-age individuals experience CR, as it impacts on engagement and behaviour. Existing literature regarding this group that also includes gender is limited and heterogeneous. Our study thus far indicates male working-age CR attendees and their family value the reassurance monitoring provides and allowing them to regain confidence in their bodies.

P41 MENTAL HEALTH COMPETENCE IN ELEVEN YEAR OLDS AND ITS ASSOCIATION WITH POOR PHYSICAL HEALTH AND MENTAL WELL-BEING: FINDINGS FROM THE UK MILLENNIUM COHORT STUDY

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Background Positive mental health (not simply absence of mental disorder) may hold potential for fostering resilience and reducing risks of poor health and well-being. However, it is challenging to define and measure. One promising conceptualisation is mental health competence (MHC), comprising age-relevant developmental tasks and abilities. To date MHC has not been investigated in UK children.

Methods We developed a measure of MHC in the UK Millennium Cohort Study (MCS) (~18 000 children born 2000–2002) using seven items addressing learning skills and pro-social behaviours, reported by mothers at age 11 (n=12082).