

Introduction

This is one in a series of Data Supplements providing intelligence to inform future health and social care planning for the resident population of Cambridgeshire produced in support of *Cambridgeshire JSNA: Long Term Conditions Across the Lifecourse (2015)*.

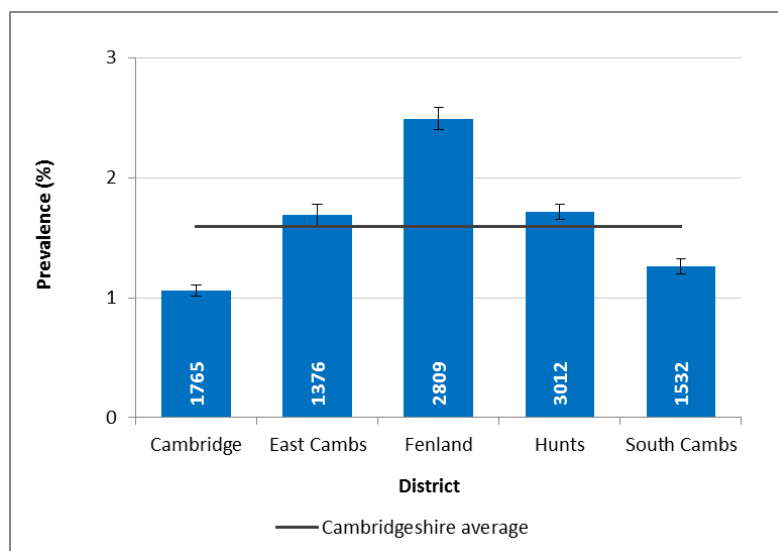
Background

Chronic obstructive pulmonary disease (COPD) describes lung damage that is gradual in onset and results in progressive airflow limitation. The principal cause of COPD is smoking. Other factors include workplace exposure (eg to dusts, gas/fumes or chemicals), genetic make-up and general environmental pollution. COPD is a progressive illness, and the likelihood of people dying as a result of COPD increases with age. It is not curable, but it is treatable. Its progress can be halted and can be managed to minimise its burden.¹

What is the prevalence and who is at risk?

Current and ex-smokers are most at risk of contracting COPD. The picture is even worse for smokers from the most disadvantaged sectors of society, where in some cases (eg for people with schizophrenia) smoking prevalence can reach 74%. External factors such as air pollution can also exacerbate conditions. 40% of people with lung disease are below retirement age (1.4 million based on 3.5 million cases nationally) and a quarter of those below retirement age are unable to work at all (400,000 people nationally).²

Chronic Obstructive Pulmonary Disease (COPD)



Number on the register stated at the base of each bar
Error bars represent 95% confidence intervals
Source: Quality and Outcomes Framework (QOF) 2013/14

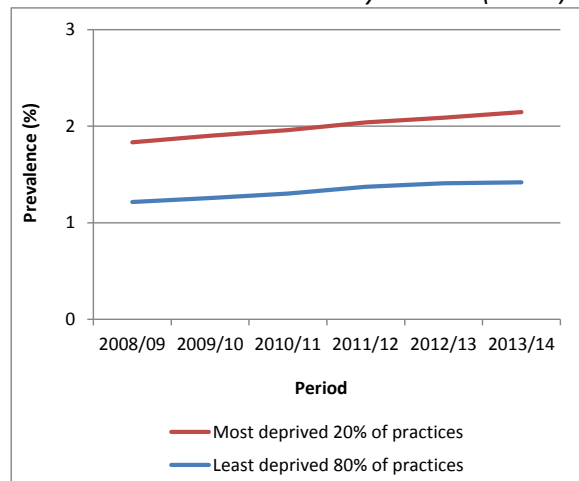
Around 10,500 people are recorded on disease registers for chronic obstructive pulmonary disease (COPD) in general practices in Cambridgeshire.

The prevalence of COPD is lower in Cambridgeshire as a whole compared with the England average (1.6% vs 1.8%). However, in Fenland prevalence is higher than the county and national averages and in Huntingdonshire, prevalence is higher than the county average. In Cambridge City and South Cambridgeshire, prevalence is lower than the county and national averages.

It is important to note, however, that these prevalence data are not age-standardised and so areas with older population will be expected to have higher prevalence of COPD.

The prevalence of COPD is higher in the most deprived neighbourhoods and lower in the least deprived areas.

Chronic Obstructive Pulmonary Disease (COPD)



The prevalence of people on COPD registers has increased across the county since 2008/09. However, rates remain consistently higher in the most deprived 20% of GP practices in the county compared with the least deprived 80%.

The prevalence of COPD is 51% higher in the most deprived 20% of GP practices in Cambridgeshire compared with elsewhere.

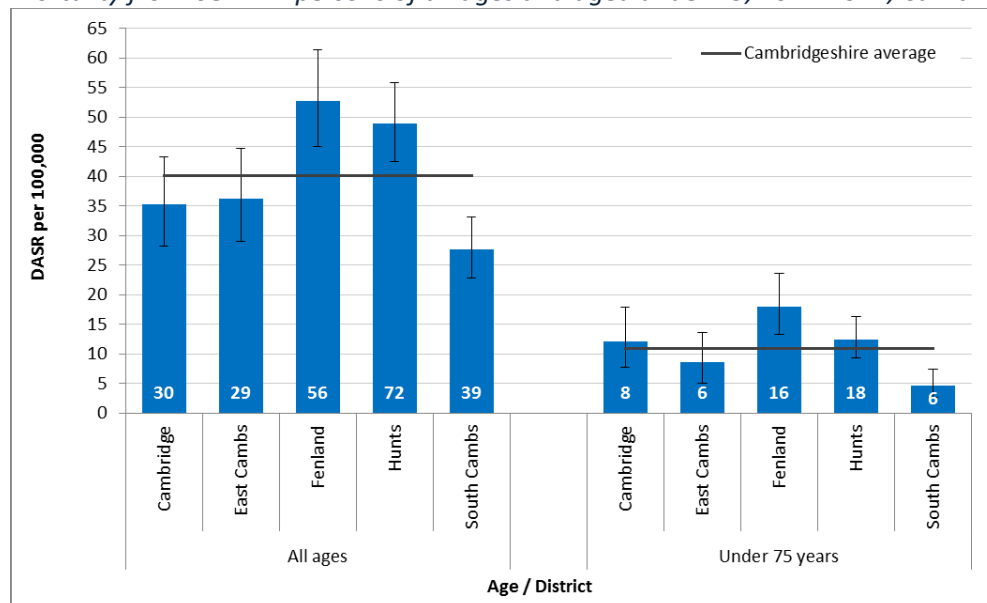
33% of people on COPD registers in the county are registered with the most deprived 20% of practices.

Source: Quality & Outcomes Framework (QOF)

How many deaths are related to COPD?

Around 220 deaths occur due to COPD in Cambridgeshire each year. 56% of COPD deaths are in men and 24% occur in people aged less than 75 years. In Fenland, all age and under 75 mortality is significantly higher than the county average. Note that the number of deaths annually is relatively small and the confidence intervals are wide. All age mortality is significantly lower in Cambridgeshire compared with the England average (2011-13 data).

Mortality from COPD in persons of all ages and aged under 75, 2012-2014, Cambridgeshire

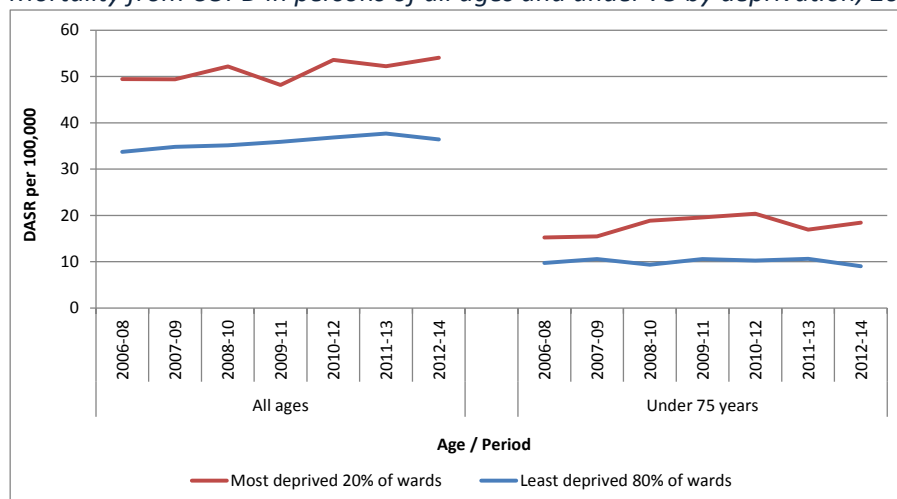


Average number of deaths per year stated at the base of each bar. Error bars represent 95% confidence intervals. DASR - directly age-standardised rate. COPD defined by ICD10: J40-J44.

Sources: Health and Social Care Information Centre Primary Care Mortality Database and Office for National Statistics mid-year population estimates.

There is a social gradient in COPD mortality, with more deprived areas experiencing higher death rates than less deprived areas. Rates of COPD mortality have increased in people of all ages, and in those aged under 75 years. Rates remain higher in the most deprived 20% of wards in the county compared with the remaining 80%. Rates of premature mortality (in people aged under 75) are twice as high as the rates in the rest of the county. 35% of deaths in people aged under 75 occur in people resident in the 20% most deprived wards.

Mortality from COPD in persons of all ages and under 75 by deprivation, 2006-08 to 2012-14, Cambridgeshire



Sources: Health and Social Care Information Centre Primary Care Mortality Database and Office for National Statistics mid-year population estimates. COPD defined by ICD10: J40-J44

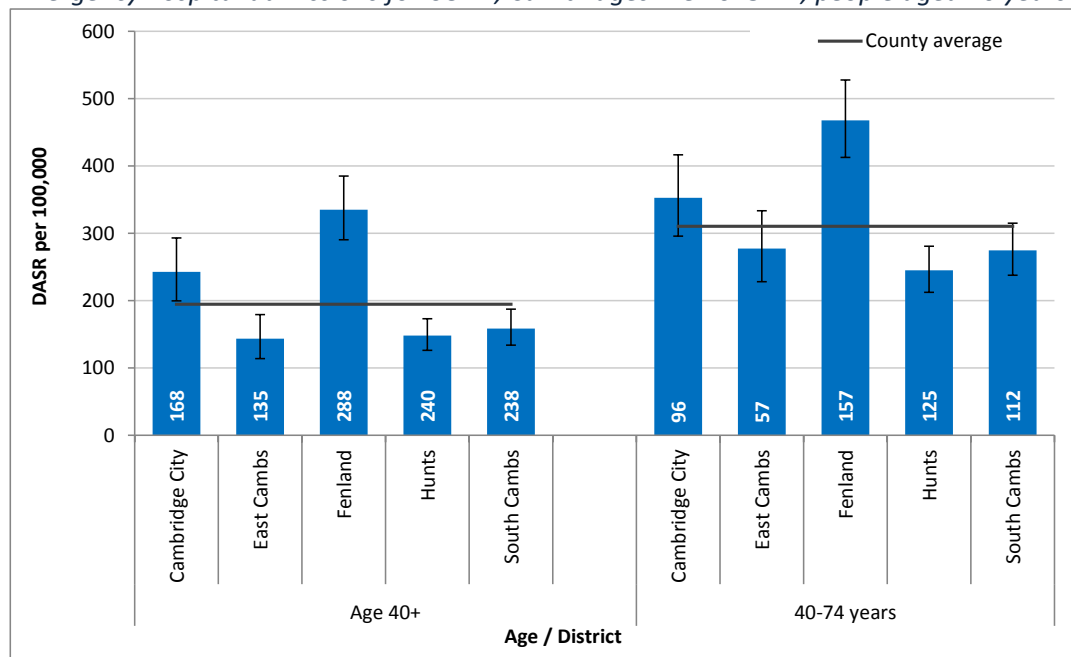
Hospital admissions and episodes of care

People resident in Cambridgeshire (based on LSOA), 2013/14, aged 40 and above

- In 2013/14, of the 1,220 hospital episodes in Cambridgeshire where COPD was the primary diagnosis (ie the main reason for the hospital episode) 1,070 (88%) were emergency admissions.
- Emergency admissions with COPD as primary diagnosis resulted in 6,800 bed days and a cost of £2.6m.
- 52% of emergency admissions occur in people aged under 75, 48% of whom are male.

In Fenland, the age-standardised emergency admission rate is significantly higher than the county average in people of all ages (40+) and in people aged 40 to 74 years. In East Cambridgeshire and Huntingdonshire rates are significantly lower than the county average in people of all ages (40+) and in Huntingdonshire rates are significantly lower in people aged 40 to 74 years.

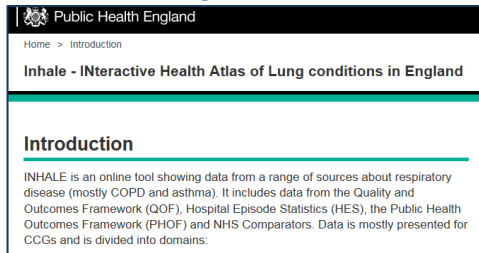
Emergency hospital admissions for COPD, Cambridgeshire 2013-14, people aged 40 years+ and 40 to 74 years



Number of emergency admissions per year stated at the base of each bar. Admissions to All Hospital Trusts. Error bars represent 95% confidence intervals. DASR - directly age-standardised rate. COPD defined by primary diagnosis of ICD10: J40-J44. Sources: Inpatient Commissioning Dataset. FHS Registration System (Exeter) registered population.

Further Resources

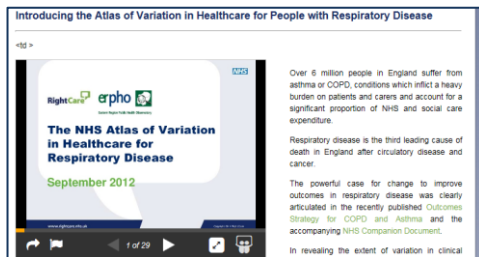
Public Health England - INHALE



<http://fingertips.phe.org.uk/profile/inhale>

INHALE – interactive Health Atlas of Lung Conditions in England

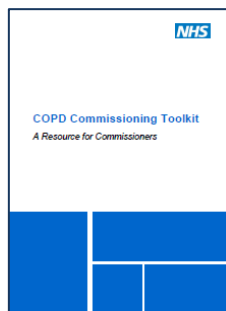
NHS Atlas of Variation in Healthcare for Respiratory Disease



<http://www.rightcare.nhs.uk/index.php/atlas/respiratorydisease/>

<http://www.sepho.org.uk/extras/maps/NHSatlasRespiratory/atlas.html>

COPD Commissioning Toolkit



https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/212876/chronic-obstructive-pulmonary-disease-COPD-commissioning-toolkit.pdf

Acknowledgement of source material

This supplement uses information from Public Health England (PHE), the Health and Social Care Information Centre (HSCIC) and other publications shown above. More detailed information is available from each of the Key Resources described above.

Where to find the local data

Cambridgeshire JSNA

Cambridgeshire Insight and Atlases

<http://www.cambridgeshireinsight.org.uk/jsna>

www.cambridgeshireinsight.org.uk/

References

¹ COPD Commissioning Toolkit (2015) See Key Resources .

² An Outcomes Strategy for Chronic Obstructive Pulmonary Disease (COPD) and Asthma in England Department of Health, 2011. Available at:

https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/216139/dh_128428.pdf