

## 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)*.

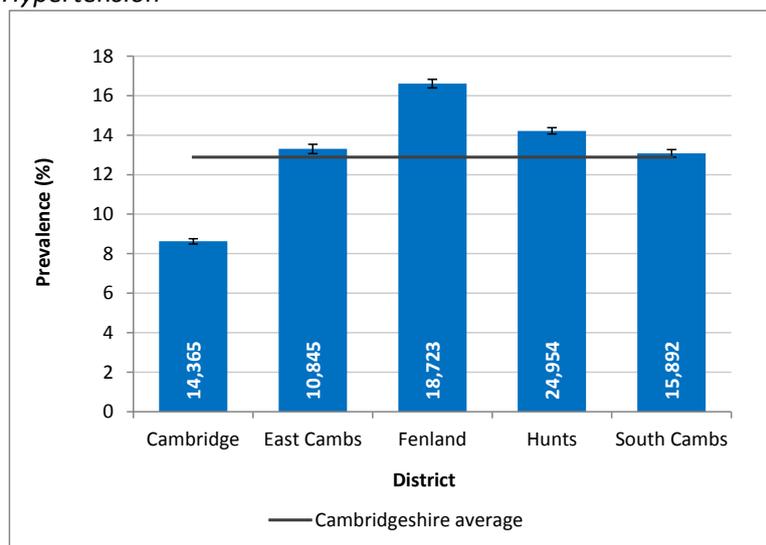
## Background

Hypertension, persistently high blood pressure, is a major risk factor for stroke, heart attack, heart failure, aneurysms and chronic kidney disease. It can also lead to early death.<sup>1</sup> Known as ‘the silent killer,’ it is often preventable yet is a leading cause of cardiovascular disease, chronic kidney disease and cognitive decline.<sup>2</sup>

## What is the prevalence and who is at risk?

Hypertension affects more than one in four adults, and is the second biggest risk factor for premature death and disability in England. The risk of hypertension increases with age. In England in 2011 the prevalence of hypertension was 7.4% among people aged 16 to 24 years. This rose to 44.0% among those aged 55 to 64 years and 72.6% in people aged 75 years or older. The prevalence of hypertension was higher among men than women (31.1% for men compared to 28.0% for women).<sup>3</sup>

## Hypertension



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

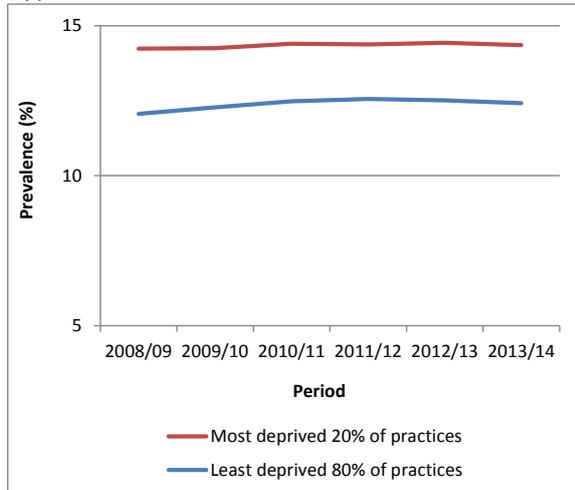
Around 85,000 people are recorded on disease registers for hypertension in general practices across Cambridgeshire.

The prevalence of hypertension is lower in the county as a whole compared with the England average (12.9% vs 13.7%). However, in Fenland prevalence is higher than both the county and national averages. In Hunts prevalence is higher than the county average. In Cambridge prevalence is lower than the county and national average.

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

Hypertension is most common among individuals from low income households and those living in deprived areas.<sup>3</sup> In England, the proportion of people from black African and black Caribbean ethnic groups who have hypertension is higher than in the general population.<sup>4</sup>

### Hypertension



The prevalence of recorded hypertension has increased slightly since 2008/09 in the least deprived 80% of practices in the county but has remained relatively stable in the most deprived 20%.

Rates of hypertension are 16% higher in the most deprived 20% of practices compared with elsewhere.

37% of people on hypertension registers are registered with the 20% most deprived practices.

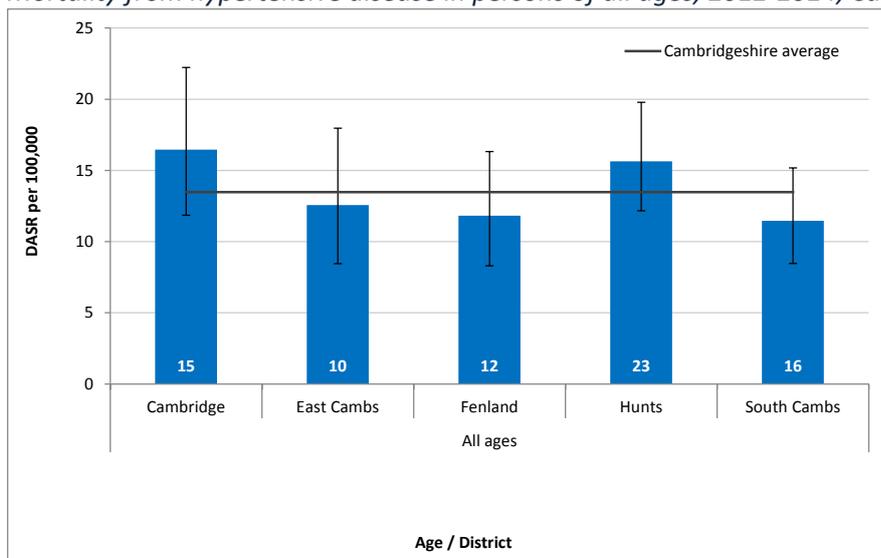
Source: Quality & Outcomes Framework (QOF) 2013/14

### How many deaths are related to hypertension?

Routine mortality statistics of death from hypertension are an under-estimate of the total number of deaths as it is not routinely recorded as the underlying cause of death, rather as a contributing factor. High blood pressure is a major risk factor for other conditions such as stroke, heart attack, heart failure and chronic kidney disease, and there will be further deaths associated with hypertension not included in the figures below.<sup>5</sup>

Between 2012-14 there were 230 deaths (an average of around 77 deaths annually) in Cambridgeshire where the underlying cause of death was hypertensive disease. 29% of deaths occur in people aged under 75 and 60% of hypertensive disease deaths are in women. All-age mortality is significantly higher in Cambridgeshire compared to the national average (although this is comparing 2012-14 data for the county to 2011-13 data for England (2012-14 not available)). At district level, no rates are significantly higher than the county average.

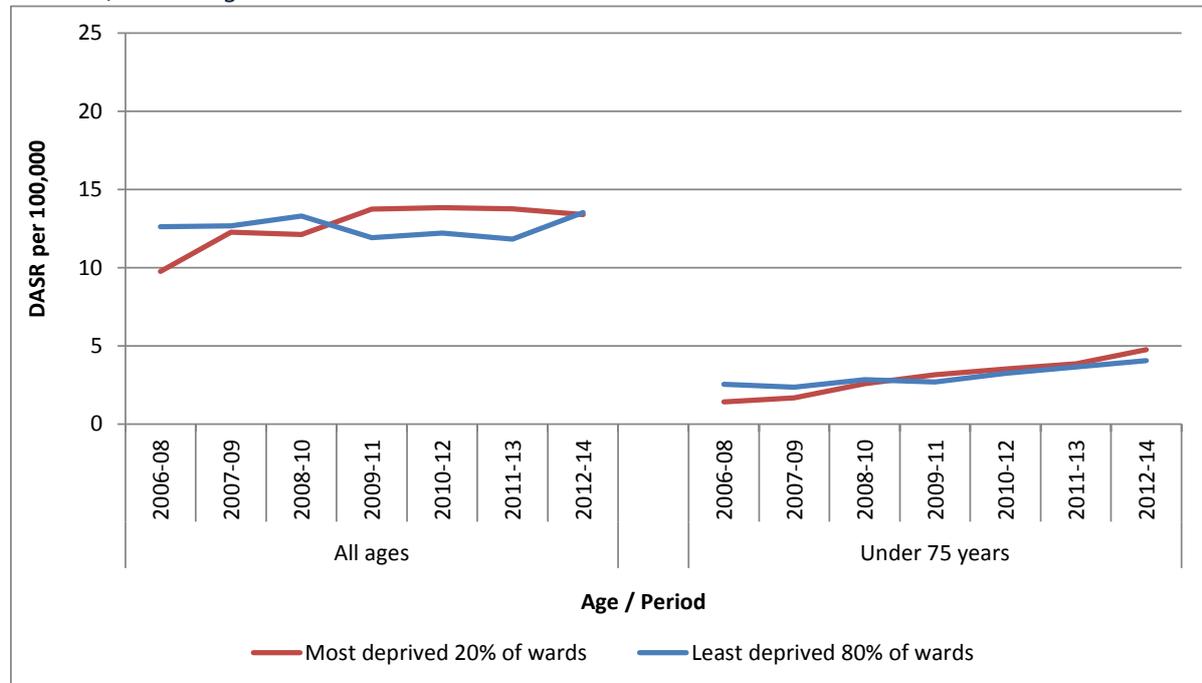
### Mortality from hypertensive disease in persons of all ages, 2012-2014, Cambridgeshire



Error bars represent 95% confidence intervals. Average number of deaths per year is small and confidence intervals are wide. DASR - directly age-standardised rate. Hypertensive disease defined by ICD10: I10-I15.

Current literature suggests there is a social gradient in mortality from hypertensive disease, with more deprived areas experiencing higher death rates than less deprived areas. Rates of mortality from hypertensive disease have increased slightly among people of all ages with increases in both the most deprived 20% and the least deprived 80%. Rates are similar in both deprivation groups. 21% of deaths in people aged under 75, occur in people registered with the 20% most deprived wards.

*Mortality from hypertensive disease in persons of all ages and aged 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. Hypertensive disease defined by ICD10: I10-I15

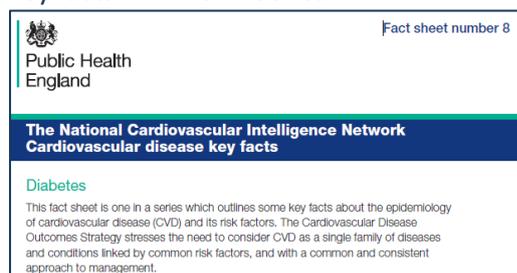
### Hospital admissions and episodes of care

*People resident in Cambridgeshire (based on LSOA), 2013/14, aged 30 and above*

- Coding in hospital episode data at discharge records the primary diagnosis (the underlying reason for the admission), a subsidiary diagnosis and up to 12 other contributory causes/diagnoses. Coding is known to be variable between hospital trusts.
- In 2013/14, a diagnosis of hypertension (ICD10: I10-I15) was recorded in any diagnostic code in over 13,000 emergency admissions, which resulted in over 95,000 emergency bed days and a total cost of £33.7m.
- 42% of these emergency admissions were in people aged under 75 and 52% were in women.
- In emergency admissions where hypertension was recorded, 20% had a primary diagnosis of CVD, primarily stroke and coronary heart disease.
- In 2013/14, there were 123 hospital episodes in Cambridgeshire where essential (primary) hypertension was the primary diagnosis (ie the main reason for the hospital episode). Emergency admissions accounted for 75 (61%), 71% of which were in people aged under 75 and 57% were in women.

## Further Resources

### Key facts PHE – CVD Series



[http:// www.yhpho.org.uk/default.aspx?RID=185796](http://www.yhpho.org.uk/default.aspx?RID=185796)

Key Facts series produced by Public Health England (PHE) with headline epidemiological and comparator data.

Each factsheet summarises information about a cardiovascular disease (CVD) risk factor or disease area.

### PHE - Healthier Lives



<http://healthierlives.phe.org.uk/topic/hypertension>

Interactive Atlas describing prevalence, expected prevalence, risk factors, treatment and care and complications

Find more detailed comparison tools, at GP practice level, on [National General Practice Profiles](#).

### Faculty of Public Health Toolkit



The Faculty of Public Health's [Toolkit for developing a local strategy to deal with high blood pressure](#) is a comprehensive resource, giving local partners useful information, tools, templates and checklists to help develop effective strategies on high blood pressure prevention, detection and control.

### 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 data

Cambridgeshire JSNA  
Cambridgeshire Insight and Atlases

<http://www.cambridgeshireinsight.org.uk/jsna>  
[www.cambridgeshireinsight.org.uk/](http://www.cambridgeshireinsight.org.uk/)

### References

- <sup>1</sup> NICE. Quality Standard 28, 2013. Available at: <http://guidance.nice.org.uk/QS28> and NICE. Clinical guideline 127: hypertension, 2011. Available at: <http://guidance.nice.org.uk/CG127/NICEGuidance/pdf>
- <sup>2</sup> Faculty of Public Health. Easing the pressure: tackling hypertension. [www.fph.org.uk/uploads/hypertension\\_all.pdf](http://www.fph.org.uk/uploads/hypertension_all.pdf)
- <sup>3</sup> Knott C, Mindell J. Hypertension. In: Craig R, Mindell, J, editors. Health survey for England 2011: volume 1: health, social care and lifestyles. Available at: <http://www.hscic.gov.uk/catalogue/PUB09300>
- <sup>4</sup> Chaudhury M, Zaninotto P. Blood pressure. In: Sproston K, Mindell J, editors. Health survey for England 2004: volume 1: the health of ethnic minority groups. Available at: <http://www.hscic.gov.uk/catalogue/PUB01209>
- <sup>5</sup> Mortality from hypertensive disease: directly standardised rate, all ages, annual trend, MFP cited in The Health and Social Care Information Centre. Indicator portal. Available at: <https://indicators.ic.nhs.uk/webview/>