Hiam, L. and Dorling, D. (2018) Rise in mortality in England and Wales in first seven weeks of 2018, British Medical Journal 2018;360:k1090 (Published 14 March 2018)
http://www.bmj.com/content/360/bmj.k1090

Editorials

Rise in mortality in England and Wales in first seven weeks of 2018

Lucinda Hiam, honorary research fellow [1], *Danny Dorling, Halford Mackinder professor of geography* [2]

[1] *London School of Hygiene and Tropical Medicine, London, UK.* [2] *University of Oxford, Oxford, UK*

Correspondence to: D Dorling danny.dorling@ouce.ox.ac.uk

Health chiefs are failing to investigate a clear pattern of worsening health outcomes

Within the first seven weeks of 2018, some 93 990 people died in England and Wales.[1] Over the same weeks in the previous five years, an average of 83 615 people died.[1] This rise of 12.4%, or 10 375 additional deaths, was not due to the ageing of the population. Ageing is a slow process and leads to slow, not sudden, rises in mortality.[2] An additional person died every seven minutes during the first 49 days of 2018 compared with what had been usual in the previous five years. Why?

Not the weather or flu

The weather was unusually mild during the initial weeks of this year—very cold weather did not arrive until late February. The mean temperature was 4.1°C across the UK in January 2018, almost half a degree above the average for this time of year.[3]

Nevertheless, the first seven weeks of 2018 were unusual in terms of the operation of the NHS. On 2 January, after "an unprecedented step by NHS officials," thousands of non-urgent operations were cancelled, a clear sign of a system struggling to cope.[4] Many hospitals were

already at or beyond their safe working levels, "with high numbers of frail patients stuck on wards for want of social care,"[4] and a rise in influenza cases had begun.

The proportion of deaths in the first seven weeks of 2018 caused by respiratory disease was 18.7%. This includes all deaths for which influenza or pneumonia was identified as the underlying cause and compares with 18.3% for the same period in 2017, 15.8% in 2016, 19.5% in 2015, 14.9% in 2014, and 17.9% in 2013. In short, mortality due to the large group of causes that include influenza was not unusually high. Whatever the key reasons are, they do not include an unusual influenza epidemic.

By the seventh week of 2018, there had already been three weeks when more people had died in England and Wales than during the worst single week of 2017 (**fig 1**). In four of the first seven weeks of 2018, more people died than in the worst week of 2016 or 2014. To date only two weeks in 2015 have been worse than their corresponding week in 2018.[1]

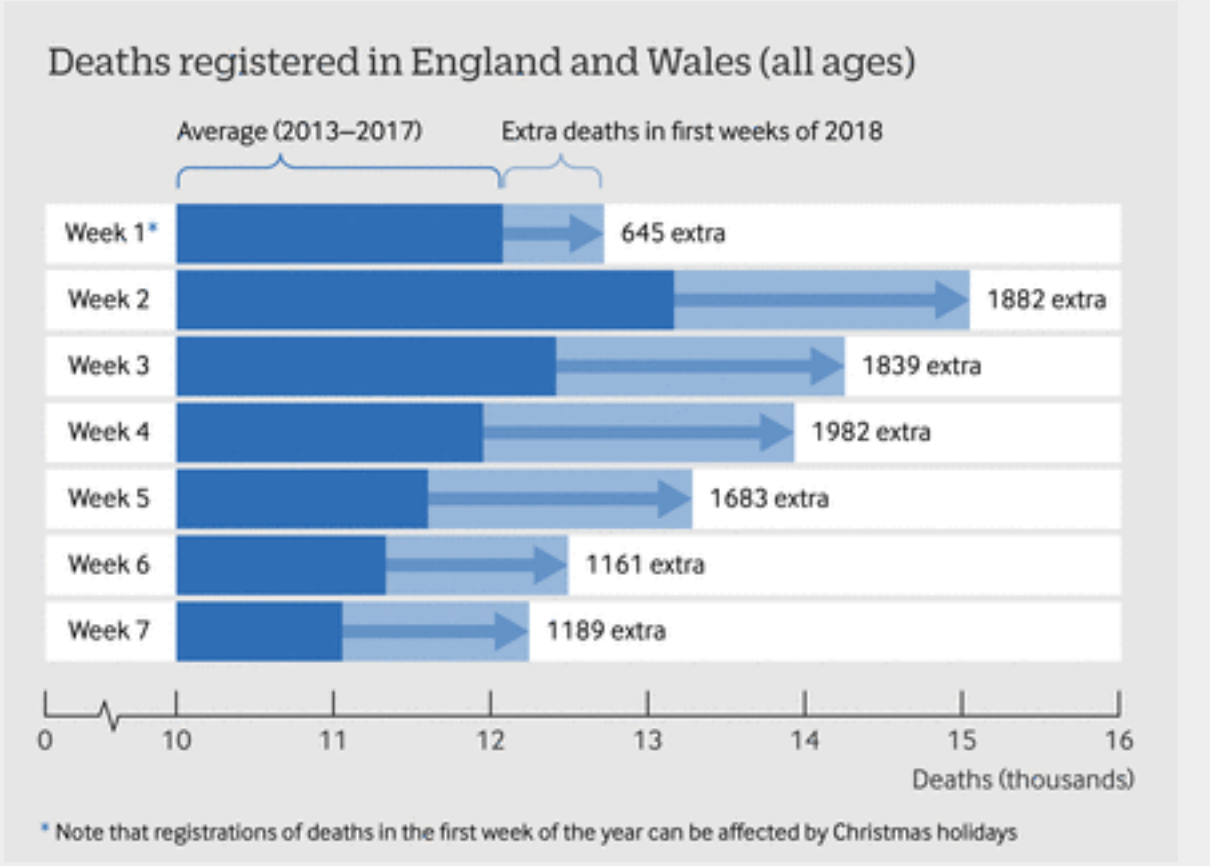

Fig 1

Mortality in the first seven weeks of the year

The past five years have been challenging in terms of health outcomes in the UK.[5] Spending on health and social care year on year has increased at a much slower rate than in previous years.[6] Outcomes on many indicators have deteriorated, including a rapid recent increase in the numbers of deaths among mental health patients being looked after in care in England and Wales.[7]

Reduced life expectancy

We know that the Office for National Statistics in the past 12 months reduced its estimate of future life expectancy for both men and women in the UK by almost a year and, in doing so, has estimated that more than a million lives will now end earlier than expected.[8] We also learnt within the past year that mortality in infants born into the poorest families in the UK has risen substantially since 2011.[9] All this emerged before the most recent weekly mortality figures were released.[1]

In 2013, official comments on the rise in deaths for some age groups and geographical groups suggested ageing, influenza, and cold weather as the main culprits for adverse changes seen then.[10] That was disputed at the time, and three years on from 2015—in which the increase year on year was the worst since at least the 1960s[11]—a clear lack of consensus remains. No official explanation has been forthcoming for death rates continuing to be so high relative to expectations from previous trends.[12] Mortality has continued to improve in all other European countries between 2010 and 2015, most quickly in Norway and Finland, more slowly in some other countries.[13]

We and others have already called for an urgent investigation by the House of Commons health select committee.[14] We did this because the Department of Health and Social Care is not taking the slowdown in improvements in mortality seriously. The figures for this year make the case for an investigation both stronger and more urgent with each passing day.

Footnotes

- Competing interests: We have read and understood BMJ policy on declaration of interests and have no relevant interests to declare.
- Provenance and peer review: Commissioned; not externally peer reviewed.

References

1. ↵ONS. Weekly provisional figures on deaths registered in England and Wales, released 6 March 2018. https://www.ons.gov.uk/peoplepopulationandcommunity/birthsdeathsandmarriages/deaths/datasets/weeklyprovisionalfiguresondeathsregisteredinenglandandwalesGoogle Scholar
2. ↵Loopstra R, McKee M, Katikireddi SV, Taylor-Robinson D, Barr B, Stuckler D. Austerity and old-age mortality in England: a longitudinal cross-local area analysis, 2007-2013. J R Soc Med2016;109:109-16. doi:10.1177/0141076816632215 pmid:26980412CrossRefPubMedGoogle Scholar
3. ↵Meteorological Office. January 2018. https://www.metoffice.gov.uk/climate/uk/summaries/2018/januaryGoogle Scholar
4. ↵Donnelly L, Bodkin H. NHS hospitals ordered to cancel all routine operations in January as flu spike and bed shortages lead to A&E crisis. Telegraph 2018 Jan 3. https://www.telegraph.co.uk/news/2018/01/02/nhs-hospitals-ordered-cancel-routine-operations-january/Google Scholar
5. ↵Hawkes N. Sharp spike in deaths in England and Wales needs investigating, says public health expert. BMJ2016;352:i981. doi:10.1136/bmj.i981 pmid:26888875FREE Full TextGoogle Scholar
6. ↵Full Fact Team. Spending on the NHS in England 2017. https://fullfact.org/health/spending-english-nhs/Google Scholar
7. ↵National Statistics. Coroners statistics annual 2016, England and Wales, 11 May 2017, statistical tables. Table 6 (deaths reported to coroners). https://www.gov.uk/government/statistics/coroners-statistics-2016Google Scholar
8. ↵Dorling D, Gietel-Basten S. Life expectancy in Britain has fallen so much that a million years of life could disappear by 2058. Why? The Conversation, 29 Nov 2017. https://theconversation.com/life-expectancy-in-britain-has-fallen-so-much-that-a-million-years-of-life-could-disappear-by-2058-why-88063Google Scholar
9. ↵Taylor-Robinson D, Barr B. Death rate now rising in UK's poorest infants. BMJ2017;357:j2258. doi:10.1136/bmj.j2258 pmid:28495791FREE Full TextGoogle Scholar
10. ↵Newton J. Public Health England's role in the publication and analysis of mortality data. 2013. https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/229832/John_Newton_Letter_Excess_Winter_Mortality.pdfGoogle Scholar
11. ↵ONS. Spike in number of deaths in 2015 driven by increased mortality in over 75s. 7 Apr 2016. https://www.ons.gov.uk/news/news/spikeinnumberofdeathsin2015drivenbyincreasedmortalityinover75sGoogle Scholar
12. ↵Marmot M. Marmot indicators briefing.Institute of Health Equity, 2017, http://www.instituteofhealthequity.org/resources-reports/marmot-indicators-2017-institute-of-health-equity-briefing/marmot-indicators-briefing-2017-updated.pdf.Google Scholar
13. ↵Eurostat. Life expectancy at birth, 1980-2015 (years). 2017. http://ec.europa.eu/eurostat/statistics-explained/index.php/File:Life_expectancy_at_birth,_1980-2015_(years).pngGoogle Scholar
14. ↵Hiam L, Harrison D, McKee M, Dorling D. Why is life expectancy in England and Wales 'stalling'?J Epidemiol Community Health2018jech-2017-210401. [Epub ahead of print]. doi:10.1136/jech-2017-210401. pmid:29463599Abstract/FREE Full TextGoogle Scholar