Health Inequalities in Scotland

Trends in deaths, health and wellbeing, health behaviours, and health services since 2000

Executive summary

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Health inequalities in Scotland: An independent review

Unfair differences in health and wellbeing across Scotland's population are stark. For example, healthy life expectancy is a quarter of a century shorter in the most deprived tenth of areas in Scotland compared to the least deprived tenth of areas. Following a global pandemic, and as Scotland enters a cost-of-living crisis, concern around the impacts on health inequalities is considerable among researchers, policy makers, and the Scottish public.

These inequalities are not a new concern. At both Scottish and UK government levels, parliamentary inquiries have considered evidence on health inequalities, and provided recommendations for action. This includes, most recently, the Health, Social Care and Sport Committee Report: Tackling health inequalities in Scotland[1]. Our understandings of the scale of the problem and what progress has been made is supported by well-established monitoring of health inequalities in Scotland. Yet despite this focus, and some improvements made during the 2000s, health inequalities have persisted and, in some cases, worsened over the last decade.

Wide-ranging analysis and synthesis of new and existing data is critical in establishing the magnitude of the problem, where improvements or deteriorations are evident, and who is most affected. This report, funded by the Health Foundation as part of their independent review of health inequalities in Scotland, describes trends in inequalities in the timing and causes of deaths, health and wellbeing, health-related behaviours, and health and social care services in Scotland over the last two decades. It is published alongside a series of other reports on the social determinants of health and public and stakeholder perceptions of health inequalities.

Following a period of improving mortality rates and reducing inequalities in the first decade of the 21st century, improvements have stalled, and some inequalities have widened.

Between 2000 and 2012, life expectancy was increasing, and avoidable mortality was decreasing. Progress was being made in deaths from cancer and cardiovascular disease, alcohol deaths, and suicides. In line with these improvements, absolute inequalities in mortality outcomes were generally reducing. However, in the decade since we have seen a stagnation in these previous improvements and in some cases a worsening of outcomes and inequalities.

For example, inequalities in infant mortality rates and all-cause mortality in 15 to 44-year-olds narrowed between 2000 and 2013, but improvements now show signs of reversing. Drug-related deaths and associated inequalities are particularly striking, which were increasing between 2000 and 2013, but are now growing at an exponential rate. In some cases, these worsening mortality rates and widening inequalities seen over the past decade have likely been exacerbated by the COVID-19 pandemic.

Health consistently worsens as deprivation increases, but the most deprived are faring particularly badly.

Across almost every outcome considered in the report, the least deprived fifth of areas have the best outcomes, with health worsening with each increase in deprivation level. However, in many cases, we see the most deprived fifth of areas faring particularly badly. That is, the gap between the most and second most deprived fifths of areas (fifths 1 and 2) was equal to or greater than the gap between the second most deprived and the least deprived fifth of areas (fifths 2 and 5). We see this pattern for avoidable mortality, deaths from drugs and alcohol, and outpatient appointments where the patient 'Did Not Attend'. Patterns were similar but less pronounced for low birthweight, child development concerns, antenatal services, and amenable mortality.

These patterns have been shown according to area-level deprivation, the most consistently available measure of social circumstances. However, this is unlikely to be solely an issue of area or geography, but one of social disadvantage, which is also experienced by people living outside Scotland's most deprived areas.

A life course framework can help us to consider why there are especially high rates of ill health and deaths in the most deprived groups. Possible explanations include the accumulative effects of social disadvantage on health across the life course, the strong links between children's educational and employment opportunities and that of their parents, and the negative consequences that ill health can have for life opportunities such as employment. These can lead to the perpetuation and deepening of health inequalities across people's lives and from one generation to the next.

Inequalities are greatest for the most severe outcomes.

The starkest inequalities are seen for outcomes relating to the timing and cause of death. People living in the most deprived fifth of areas are at least twice as likely to die for each of the outcomes considered in the report compared to those in the least deprived fifth of areas. Those living in the most deprived fifth of areas are five times as likely to die from an alcohol-specific death and 20 times as likely to die from a drug-related death compared to those living in the least deprived fifth of areas.

Healthy life expectancy also showed very large inequalities. Given current levels of health and death rates, people living in the most deprived tenth of areas could expect to live almost a quarter of a century less in good health than people living in the least deprived tenth of areas.

Young and middle-aged men are faring particularly badly for some outcomes.

One group that stands out is young-to-middle-aged men, especially those living in the most deprived areas. For men living in the most deprived tenth of areas healthy life expectancy fell by almost five years (between 2015 and 2020) to 45 years, compared to being maintained at around 70 years for men living in the least deprived tenth of areas. Young and middle aged, socioeconomically deprived men are most likely to suffer deaths of despair (suicide, drug, or alcohol related deaths) and the exponential rise in drug deaths has largely been concentrated among men.

Young and middle-aged men living in deprived areas are also most likely to experience multiple overlapping social disadvantages (homelessness, justice involvement, opioid dependence, and psychosis) associated with premature mortality. The proportion of outpatient and GP appointments where the patient 'Did not Attend' is higher in the most deprived fifth of areas and among men in their 20s and 30s.

The foundations for maximising health, wellbeing, and life opportunities are built in the early years and while there have been some improvements, children's start in life is not equal.

The picture is not all negative for child health – rates of timely antenatal booking, smoking in pregnancy, breastfeeding at 6-8 weeks and development in toddlerhood are all improving, although some remain far below optimum levels and all have large inequalities. We see worrying patterns for childhood obesity risk. While overall prevalence has remained at around 10%, this masks decreasing rates in the least deprived areas and increasing rates in the most deprived areas. In 2019/20, children living in the most deprived areas were twice as likely to be at risk of obesity than their peers living in the least deprived areas.

Childhood immunisations, previously a success story of high uptake and small inequalities, are now falling and inequalities are widening. Aside from placing some children at unnecessary risk of infection, this trend points towards increasing social barriers to utilising health services more generally. The widening of inequalities in some early years' outcomes may lead to inequalities in adult health, such as in diabetes and cardiovascular disease. We may therefore be storing up problems for the future, in terms of population health, life chances, and inequalities.

Trends and patterning of health-related behaviours highlight complexities in the generation, explanation, and consequences of health inequalities.

Not all health-harming behaviours are more prevalent in more deprived groups. High alcohol consumption is greater in *less* deprived areas, but those living in *more* deprived areas are more likely to die from alcohol-related harms. Furthermore, while children living in deprived areas are at higher risk of obesity, overall levels of physical activity show they are just as active as their more advantaged peers. This reflects the increasingly negative consequences of health-risk factors for less advantaged groups, due to the presence of other health-harming factors accumulated over the life course, including food insecurity, low quality green space, targeted advertising, as well as time constraints, and barriers to high quality preventative health services and treatment, to name a few.

Health-related behaviours that affect infants (smoking in pregnancy and breastfeeding) have seen sustained improvements over the past 20 years in Scotland. However, inequalities remain. For example, in 2020 the prevalence of smoking in pregnancy was 11 times as high in the most deprived fifth of areas compared to the least. These examples show the importance of avoiding interventions and policies which focus solely on health behaviours, or that suffer from lifestyle drift.

Social, demographic, and other characteristics interact to shape experiences of health.

Health varies according to a multitude of characteristics which we refer to as the 'axes of inequality', including social deprivation, ethnicity, migration status, gender, sexual identity, and living with disabilities. These different characteristics are not experienced in isolation and their effects, when in combination, are not uniform.

Exploration of the combined relationships of area-level deprivation and ethnicity shows that the social gradient in health (by area-level deprivation) varies for different ethnic groups. It is most pronounced for people in the White Scottish group. Health in the White Polish group was relatively good regardless of area-level deprivation, whereas in the Pakistani ethnic group, health was relatively bad regardless.

Furthermore, for some groups, including those with experience of the care system or adults with learning disabilities, the prevalence of ill health was high across all levels of area deprivation, indicating the potential severity of other barriers to good health for these groups even in affluent areas.

Health and social care services have an important role in tackling inequalities but are only part of the picture.

Inequalities exist across the health and social care service outcomes described. Progress has been made in uptake of specific services, such as antenatal bookings and bowel screening, and the proportion of outpatient appointments where the patient 'Did Not Attend' has fallen. Amenable mortality (that is, deaths which could be avoided through good quality healthcare), like many other mortality outcomes, was improving in the first decade of the 21st century but has since stalled. Repeated emergency hospital admissions have seen little improvement in overall rates or inequalities over the past decade. Uptake of the childhood immunisations, the HPV vaccine, and cervical screening meanwhile have started to decline, and inequalities have widened.

A focused look at the cancer 'care cascade' highlighted how there are inequalities in cancer prevention, diagnosis, and care, which can accumulate to create large inequalities in cancer mortality. This points towards the important role of health services in early identification and treatment. There are a complex set of barriers to health services in Scotland, including differences in people's propensity to consider themselves a legitimate 'candidate' for services, as well as inequalities in access to and quality of services once received. These factors are in turn influenced by a range of barriers including competing priorities and other health needs, language barriers, and experiences of stigma or mistrust in services.

Deepening our understanding of health inequalities is dependent on the availability of data.

Monitoring of health in Scotland using health surveys and routinely collected data such as hospital records underpins our knowledge of health inequalities in Scotland. These valuable sources most consistently provide information on how health differs according to area-level deprivation, sex, age, and geographical location. Other types of health inequalities, such as inequalities according to ethnicity, individual socio-economic circumstances, and disability, are less routinely measured and monitored. Where these additional axes of inequality are available, they are normally reported in isolation, often because of a reliance on small sample sizes or bespoke datasets.

This siloed approach to monitoring means that health inequalities resulting from the accumulation of multiple forms of disadvantage may currently be overlooked, and we have a limited understanding of how this is changing over time. The same applies to our approach to monitoring health outcomes. We know that poor health can cluster, and that it is more likely to do so in disadvantaged groups. However, our understanding of trends in multimorbidity or the co-occurrence of poor health over time is limited because health outcomes are normally reported in isolation.

This report shows the depth and breadth of health inequalities that affect the population of Scotland. These inequalities are seen across people's lives, in experiences of health and wellbeing, health-related behaviours, health and social care services, and in the timing and causes of deaths. In the first decade since 2000, we see a pattern of modest improvements in health and inequalities, particularly in mortality rates. However, many have stalled, and some have worsened in the decade since. Today, we see considerable inequalities in health and wellbeing, which are widest for the most severe outcomes, especially deaths that occur early in life and from causes linked to despair. The worsening picture over the past decade indicates the importance of action now, in the aftermath of the pandemic and facing a cost-of-living crisis, which will likely exacerbate inequalities further.

Patterning of health-related behaviours does not always align with patterning of health outcomes. Further, we see some improvements and less pronounced inequalities in some health service outcomes. Therefore, while health-related behaviours and health services are important, they cannot alone explain inequalities in health and deaths experienced across the population. The wider determinants of health continue to be of utmost importance in understanding and addressing inequalities.

Our findings also go some way to confirming that the scale of health inequalities in Scotland is not inevitable. Despite concern at the generally worsening trends we now face, the period of health improvement and narrowing of absolute inequalities in the first decade of the 21st century should not be overlooked. Trajectories are amenable to change for the better, as well as for the worse.

As part of the Health Foundation's "Health Inequalities in Scotland: An Independent Review", this report has presented trends in inequalities in timing and causes of deaths, health and wellbeing, health-related behaviours, and health and social care services over the last two decades. Further reports explore social and economic trends that influence these outcomes; public perceptions of health inequalities and the action needed to tackle them; and views of policy and practice stakeholders about the difficulties in taking action to improve health and reduce inequalities.

Reference

1. Health, Social Care and Sport Committee. Tackling health inequalities in Scotland. SP Paper 230. Edinburgh: Scottish Parliament, 2022.

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