Director of Public Health

Annual Report

2015/16

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South Gloucestershire Council

Contents

Welcome

Thank you for reading this director of public health annual report for South Gloucestershire 2016. I hope that you find it interesting. I am very grateful to the many colleagues who have helped to put it together.

The last year has been one of significant challenge for the public health and wellbeing division. The comprehensive spending review announced cuts to funding for public health of 17% over four years with a flat cash settlement for another year after that. As a result we have been reviewing our activity and are in the process of deciding how to make best use of the resources we have - people, money, networks, professional capital, processes - to support our purpose 'To promote and protect the health of the population of South Gloucestershire and to advocate for those whose voice is seldom heard' and to deliver our vision 'To improve healthy life expectancy and reduce health inequalities in South Gloucestershire'.

Two years ago we reviewed public health issues in South Gloucestershire in some detail. South Gloucestershire is one of the healthiest places to live in the country with excellent outcomes in many areas including some of the longest lifespans in England; and in last year's report we set out our priorities. This year we are looking in more detail at the contributors to health and wellbeing and specifically inequalities in health. This is particularly important in South Gloucestershire as the population figures are generally good and it is easy to miss parts of the population who do significantly worse in terms of health outcomes.

Some of the recent work in the department has illustrated this issue, for example our recent Child Poverty Needs Assessment. Children in South Gloucestershire are less likely to live in poverty than in most parts of the country because many of the wider determinants of health are better here – employment, housing, environment etc. However if you are a child living in poverty you can do worse in South Gloucestershire than in areas with a higher prevalence of child poverty. We know that the single largest contributor to child poverty persisting across generations is educational attainment and that one of the best ways to break the cycle is for children from low income families to do well at school. However, the attainment gap at schools in South Gloucestershire for children who qualify for free school meals (a proxy indicator for low income) compared with those who do not grows more rapidly in South Gloucestershire as children get older than in areas where child poverty is more prevalent.

There are no easy or quick answers to the question 'how should we prioritise?'

However, it is precisely this kind of detailed analysis that helps to ensure that we make the best use of our resources, especially at a time of reducing budgets. This report is part of that process and describes in some detail the tools available and what they say about individual wards in South Gloucestershire. We are very interested in your comments and I would be delighted if you would like to get in touch with me or members of the team to discuss this further.

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Introduction

Public health and wellbeing

Public health is defined as "***the science and art of promoting and protecting health and wellbeing, preventing ill health and prolonging life through the organised efforts of society***" (1). It is holistic and inclusive in its approach, assessing the causes of disease and ill health within the population and developing interventions across communities and neighbourhoods to tackle them. Whilst endeavouring to improve outcomes at a population level, public health remains engaged with the wellbeing, attitudes, behaviours and choices of individuals.

As a profession, public health is split into three broad domains: health protection, health improvement and health services. Within these domains, public health specialists and practitioners monitor population health data, identify health needs, help develop appropriate services and evaluate health programmes.

Public health involves advocacy and action to promote healthy lifestyles, reduce health inequalities, prevent disease, protect health and improve healthcare services. As a discipline, it recognises that health is not merely the absence of disease, but is "***a state of complete physical, mental and social wellbeing***" (2).

The concept of wellbeing is in some ways more difficult to define, but relates to quality of life, satisfaction, happiness, positive mental health welfare and wellness. It requires that basic needs are met, that individuals have a sense of purpose and are able to participate in society (3).

The public health and wellbeing division is the team within the Children, Adults and Health directorate that coordinates, facilitates and supports the work of the council and its partners in this area. Professor Mark Pietroni leads and manages the division in his role as the local director of public health and this is his annual report.

This report

The publication of an annual report by the director of public health is both a longstanding professional tradition and an opportunity to highlight ongoing and emerging population health issues and how they will be addressed. Readers may be less aware that the publication of an independent annual report is also a legal requirement **(a)** for local authorities. The duty has two parts: firstly that the director of public health must prepare the report; and secondly that the local authority must publish it. This arrangement helps to ensure that information is disseminated, policy making is transparent, and the advice is seen to be objective and independent (4).

Previous annual reports have variously provided a comprehensive assessment of the health and wellbeing of the population or taken a more focused approach to specific themes and topics. A back catalogue of previous annual reports is available on the South Gloucestershire Council

website.

Over the past twelve months, a great deal of good work has gone into the revision of the South Gloucestershire JSNA. This document provides a comprehensive picture of the current and future health and wellbeing of the local population. It is used by health and social care organisations as an evidence base for commissioning and developing services, to improve public health and reduce inequalities. Similar to the annual report of the director of public health, the production and maintenance of the JSNA is a statutory responsibility placed on the local health and wellbeing board **(b)**.

The refreshed JSNA contains over forty chapters of detailed analysis which have been prepared in partnership with a range of stakeholders both within and without the council. An executive summary is available which identifies the key findings from the JSNA under five areas:

1. Overview of health
2. Wider determinants of health
3. Children and young people's health
4. Adult's health
5. Communicable diseases and health protection

The whole JSNA has also been published online and is available to the public and our partner organisations (6).

In addition to this resource, Public Health England continues to produce an annual local health profile for South Gloucestershire (7) which complements the data it publishes online under the Public Health Outcomes Framework.

Addressing many wider wellbeing issues, the South Gloucestershire annual report on quality of life indicators 'Better or Worse' was published in 2015 to include the results of the 2014 Viewpoint survey and other key sources of data (8). The report illustrates trends over time for the following areas:

1. Quality of life
2. Our place
3. Our economy
4. Our communities
5. Our health

Rather than duplicate the information contained in these four important resources, this report instead focuses on addressing a specific question – that is how to allocate and prioritise public health resources in an apparently healthy population like South Gloucestershire.

- In Section 1 of the report, there is a review of the previous year, starting with a short review of the previous annual report. This section includes a discussion on the financial challenges for local authority public health teams and how they are being addressed in South Gloucestershire.
- Section 2 of the report considers South Gloucestershire as a healthy area in which to live and

work. There is a review of how the area compares favourably in comparison to the rest of the country in terms of health and wellbeing and consideration of what this means for public health.

- In Section 3, there is a discussion about how the distribution of disease, disability and ill health within South Gloucestershire presents challenges which must be addressed collectively by the council, its partners and the public.
- Section 4 outlines possible approaches to prioritising needs and allocating resources, drawing on academic research and the experience of other health and wellbeing boards in England.
- Finally, Section 5 is a look forward to the coming year with consideration of how the findings of the JSNA can be used in agreeing priority objectives for the next Joint Health and Wellbeing Strategy which is due for publication in April 2017.

A local atlas of health determinants and outcomes has been prepared as a companion to this report and is available to download from the council website.

[a] Section 73B of Part 3 of the National Health Service Act 2006 as amended by Section 31 of the Health & Social Care Act 2012

[b] Sections 176 – 183 of the Health and Social Care Act 2012

Section 1: Looking back

Annual Report of the Director of Public Health

Overview

Last year's report (9) provided an introduction to the public health and wellbeing team and outlined the purpose, vision, values and key objectives for the two years ahead (2015-2017).

Our purpose

To promote and protect the health of the population of South Gloucestershire and to advocate for those whose voice is seldom heard

Our vision

To improve healthy life expectancy and reduce health inequalities in South Gloucestershire

Our values

- we have a culture of excellence
- our work is evidence based and outcome focused
- we are outward looking and client centred
- we are a learning division who reflect and evaluate
- we are creative, innovative and dynamic
- we are open, trusting and work in partnership

Our priorities

- mental health and wellbeing
- childhood poverty
- alcohol harm reduction
- health in schools programme
- childhood obesity
- domestic abuse
- preventing young people starting to smoke

Source: Annual Report of the Director of Public Health 2015 (9)

Significant progress has been made against our priorities as illustrated in the following brief summary of our performance over the past year.

Mental health and emotional wellbeing

- Specific needs assessments have been undertaken for both adults and children and young people in South Gloucestershire
- A strategy and action plan for adult mental health and wellbeing have been agreed and one for children and young people is in development
- Funding has been secured for five years to further develop and improve local child and adolescent mental health services (CAMHS), with specific investment in prevention
- Development of an adult resilience approach in partnership with the University of the West of England and launch of an anxiety toolkit for use in schools

Childhood poverty

- A specific needs assessment for child poverty has been completed followed by the development of a strategic implementation plan which will be agreed and overseen by the Children's Trust Board

Alcohol harm reduction

- Progress continues to be made against the objectives within the Alcohol Harm Reduction Strategy
- The public health and wellbeing division supported Avon and Somerset Constabulary and South Gloucestershire Council licensing officers in undertaking a licence review for Bar Celona in Kingswood where the recommendation to revoke the license for alcohol sales was upheld by the committee

Health in Schools programme

- Public health intelligence from the first South Gloucestershire online pupil survey has been incorporated into the revised JSNA and other needs assessment with funding secured for a follow-up survey in 2016/17
- The Health in Schools programme was officially launched in June 2015 at a well attended and high profile event supported by schools, agencies, charities and other council teams
- A school health and wellbeing audit tool has been developed with the aim of allowing schools to be accredited as being healthy settings - a standard and quality assurance process for the first incremental award (bronze) has been developed and trialled

Childhood obesity

- Whilst the National Obesity Framework has been significantly delayed, the health and wellbeing division has undertaken a review of potential approaches to dealing with this the complex problem of childhood obesity and has reported their findings
- A research proposal has been submitted to CLAHRC West in partnership with Bristol University: RE-AIM (Reach, Effectiveness, Adoption, Implementation, and Maintenance) to undertake a systematic review to identify locally implementable child obesity prevention programmes

Domestic abuse

- A specific needs assessment is currently underway to identify, assess and understand the health impacts associated with domestic abuse and violence

Preventing young people starting to smoke

- ASSIST, an evidence-based peer-support programme aimed at preventing smoking amongst school children in Year 8, has been used and the SG Smokefree Alliance are currently reviewing how a similar model will be implemented from 2017

Resource challenges

Comprehensive spending review 2015

Since 2013, South Gloucestershire Council, like other local authorities in England, has had a duty to take the steps that they believe are appropriate to improve the health of their populations. The Department of Health funds this activity through a ringfenced public health grant. The Department of Health makes some conditions on how the grant is spent, however the council can decide which issues to prioritise and which programmes and interventions to fund.

Comprehensive spending review is a process carried out by the Treasury to set expenditure limits for government departments and define what improvements that the public can expect to see as a result. In June 2015 the chancellor of the exchequer announced savings to be made across government to reduce public debt. The savings amount to £3 billion and included £200 million from the 2015/16 public health grant. Further details announced during the autumn budget statement included 3.9% annual reductions in the public health grant to local government until 2020/21. This amounts to a total reduction in funding for South Gloucestershire of around £1.8 million, alongside wider reductions in the revenue support grant which funds other council activity. There is clearly a national and local imperative to live within our means, however local authority public health teams must now ensure that reductions in funding do not result in worse health outcomes or widening health inequalities.

Divisional review

Initial savings were made at the end of the 2015/16 financial year in response to the announcement of in-year reduction in funding. However, around £1 million of additional savings must now be made over the next four years to ensure that local public health services and programmes can be sustained.

In order to achieve this level of savings, it has been agreed that the most appropriate way forward is to undertake a comprehensive review across the whole of the public health and wellbeing division to ensure that our priorities, our structure and the services we deliver, both directly and through our commissioning arrangements, continue to be fit for purpose and meet the needs of our population and stakeholders.

We recently consulted with our key partners on our public health priorities and how we should go about achieving these savings. The key outcomes from this were support for our existing public health priorities but with a request for an increased focus on mental health, healthy lifestyles and wider determinants of health. Partners also felt that the review should be based on identified priorities rather than apply savings equally across all areas. The priorities identified through this process are discussed in more detail in Section 4 of this report and an outline of the way forward is included in Section 5.

Section 2: South Gloucestershire is a healthy place to live and work

South Gloucestershire is generally seen as a healthy place to live and work, with low levels of deprivation and good health and wellbeing outcomes for the local population.

Overall health: Key findings

"Overall health in South Gloucestershire is good and has been improving. Life expectancy is higher than the national average and has been rising. Mortality rates for most diseases, including cancer and heart disease, are below the national average and have fallen over the last decade."
Source: JSNA Executive Summary (5)

Of the 31 outcome indicators included in the Local Health Profile, 18 (58%) show that South Gloucestershire is statistically significantly better than the national benchmark and nine (29%) are statistically similar. None of the local indicators included in the 2016 profile were statistically significantly worse than those provided for England.

The recently refreshed JSNA has shown that in recent years there have been improvements in a range of outcomes, including:

- Infant mortality rates (an indicator for the general health of the population) have almost halved in the last decade
- Year-on-year reduction in deaths from causes considered preventable, with rates falling by 25% over the last decade
- Reduction over the last decade in the rate of premature deaths in those under the age of 75, including a 45% reduction in cardiovascular disease and a 16% reduction in cancer
- Increase in life expectancy in for both males and female - with an increase of 2.5 years for both men and women over the last decade
- A significant decline in many of the risk factors adversely affecting health including smoking, teenage conceptions, and violence and an increase in rates of breastfeeding

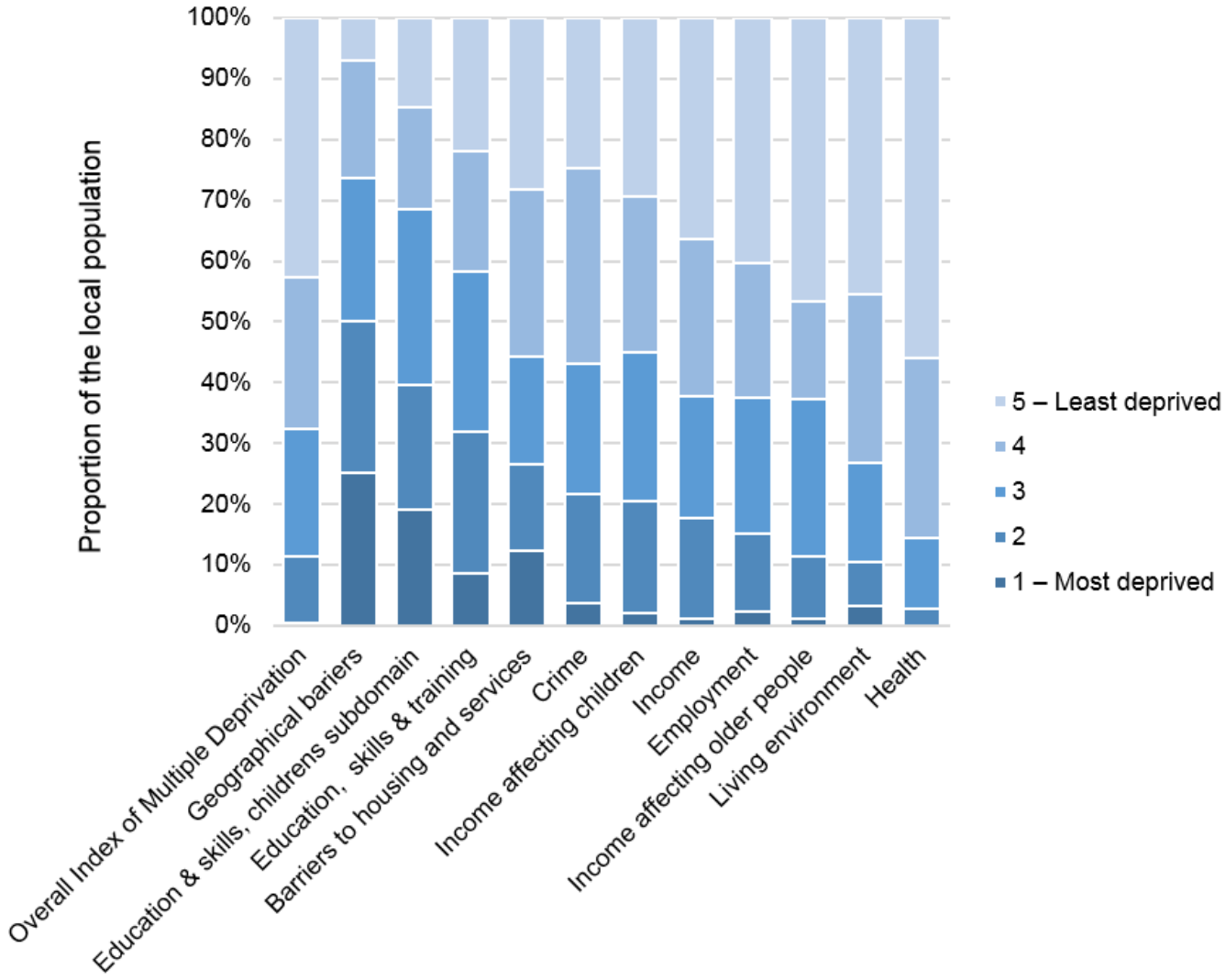
South Gloucestershire is, on the whole, a relatively affluent area with pockets of deprivation: only 16% of local authority areas in England are estimated to be more affluent than South Gloucestershire. Over two thirds (68%) of the local population live in the most affluent two fifths (40%) of neighbourhoods in the England, while nearly a third (30%) of residents live in the most affluent tenth (10%) of neighbourhoods in the country (5).

77% of respondents to the 2014 Viewpoint survey said they were satisfied with their local area as a place to live, including 32% who were very satisfied. Only 12% of respondents said they were dissatisfied with their local area (8).

The recently recalculated index of multiple deprivation (IMD) for 2015 shows that no South Gloucestershire residents live in neighbourhoods which are within the fifth of neighbourhoods

considered to be the most deprived in England in term of health. Meanwhile more than half of residents live in the least deprived fifth of neighbourhoods (see the rightmost column in Figure 4 below).

Figure 1: Proportion of the local population living in each national quintile of deprivation



Taken as a whole, these figures suggest that South Gloucestershire is indeed a healthy place to live and work, particularly in comparison to the rest of England. This is, however, not the full picture and the refreshed JSNA contains an in depth analysis of the unmet needs of the population, identifying how pockets of deprivation and other risk factors within the area can have a significant impact on health outcomes.

This then raises the question of how best to prioritise public health resources in an apparently healthy population.

Photo by Chris Bahn

Section 3: Inequalities and distribution of health outcomes and determinants

Relative contribution of health determinants to health outcomes

One of the challenges to prioritising needs and allocating resources to public health problems is establishing the causes behind identified patterns in disease and ill health. Medical and epidemiological research is very useful in describing the association between various risk factors or exposure and different disease outcomes.

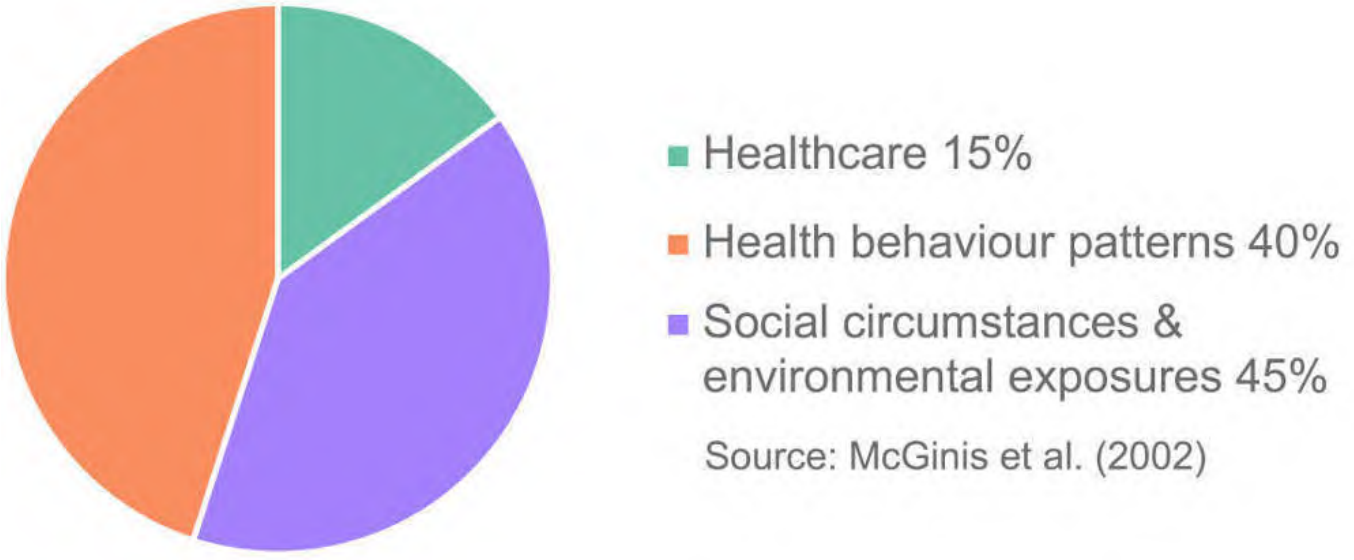
In many ways it is more difficult to model the relative contributions of different broad groups of risk factors on health and wellbeing as a whole. The first ever annual report of the director of public health for South Gloucestershire in 2003 introduced the concept of the wider determinants of health and their influence on inequalities in health and wellbeing.

What are inequalities in health?

The opportunity for a long and healthy life is still linked today, to social circumstances, childhood poverty, where we live, what job we do, how much our parents earned, our race and our gender. Some of the differences, or inequalities in health, are due to factors such as gender that are fixed. But many relate to our social circumstances, our lifestyles and our behaviours: things that can change.
Source: Annual Report of the Director of Public Health 2003 (10)

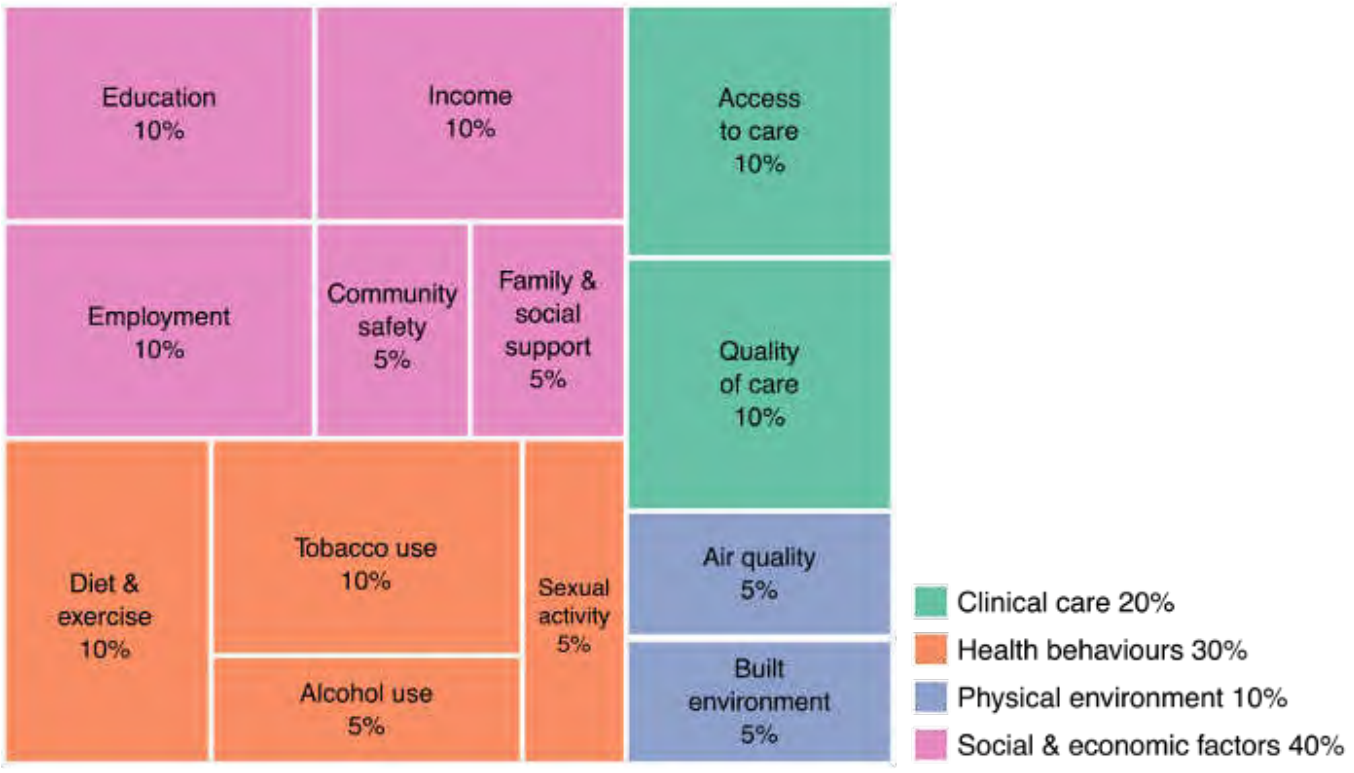
The relationship between different health determinants is complex. Over the past 20 years, research in this area has provided a range of models to help estimate the relative contribution of different groups of health determinants. Over time, models have become increasingly complex, introducing estimates of the relative contribution of our behaviour, genetics, environmental exposures and socioeconomic circumstance. Figure 2 illustrates a simple model consisting of four main groups of health determinants: healthcare, environmental exposures, genetic determinants and socio-economic factors. Understanding the relative contribution of these different groups of determinants is important because it helps us to prioritise our resources, policies and actions as we look to prevent, rather than treat or manage, health needs.

Figure 2: Simple model of relative contributions of the determinants of health



In a recent influential piece of research from the US, estimates of the relative contributions of the determinants of health were calculated by comparing statistics relating to health outcomes with information about health behaviours and risk factors identified in local surveys. The relative weighting applied to each group of determinants in their model is illustrated in Figure 3 on the following page. There are of course many differences between the US and England which mean that this model cannot be directly or easily applied to South Gloucestershire. There are differences in the provision of healthcare and social security, environmental protection, trends in health behaviours and criminal justice.

Figure 3: Model of relative contributions



Source: Analysis of US County Health Rankings data (11,12)

To find a recent example drawing on information from England, we can look at the recent work undertaken by Public Health England as part of the Global Burden of Disease study (13). They estimated the relative contribution of different groups of health determinants by modelling the proportion of different causes of disease that could be attributed to known risk factors.

One of the advantages of this model is that it is based on national data (England) and can be compared with similar data for all of the other countries included in the Global Burden of Disease study. The analysis undertaken by PHE looked at the data by each of the English regions, comparing and highlighting differences between these populations.

There is no model which can currently be used to estimate the relative contribution of broad determinants of health on the health and wellbeing outcomes in South Gloucestershire. Although individual estimates can be made of the contribution of specific health behaviours on specific outcomes (for example, alcohol consumption on hospital admissions or smoking on mortality), a more complete breakdown is more difficult. This is due in part to the limitations of our understanding of health knowledge, attitudes, beliefs and behaviours at the local authority and neighbourhood level.

Variation between electoral wards in South Gloucestershire

One way in which we can increase our understanding of the relationship between determinants and health outcomes is to explore their distribution and variation between smaller geographic areas or communities. Electoral wards are a useful geographic level to study differences and associations in health determinants and outcomes. They are large enough to be able to pull together information about individuals without compromising confidentiality, but small enough to ensure there are enough data points to allow for some meaningful analysis.

The supplementary health atlas which accompanies this report provides a collection maps that illustrate the geographic distribution of a range a health measures which are available at electoral ward level **[a]**.

There are a range of different ways that public health professionals can assess the level of inequality within and between populations (15–17). Although the JSNA includes short sections on health inequalities for each topic area (6), there has not previously been an attempt to comprehensively assess the scale of health inequalities for each of indicator available at electoral ward level. For this annual report of the director of public health, a suite of summary measures of health inequality were calculated for each health outcome in the atlas to identify which issues made greater or lesser contributions to overall health inequalities in South Gloucestershire **[b]**.

Table 1 below summarises a single measure of relative inequalities for the selection of health indicators included in the atlas. A higher relative index of inequality (RII) score suggests a greater degree of inequality between wards within South Gloucestershire and a higher association with the locally ranked measure of deprivation (IMD 2015). As the reduction of health inequalities is a key

public health function for local authorities, a higher rank on this list indicates a greater priority for addressing inequalities **[c]**.

Table 1: Rank order of health outcomes by measure of relative inequality

Indicator measure	Relative Index of Inequality (95% CI)
Mothers with record of smoking at time of delivery	3.55 (2.73 - 4.37)
Alcohol-specific hospital admissions	3.22 (2.53 - 3.9)
Emergency admissions for substance misuse	2.8 (2.22 - 3.38)
Emergency admissions for Chronic Obstructive Pulmonary Disorder (COPD)	2.72 (2.12 - 3.32)
Bad health (census)	2.34 (1.87 - 2.81)
Very bad or bad health (census)	2.03 (1.71 - 2.35)
Emergency hospital admissions for mental/behavioural issues	2.03 (1.76 - 2.29)
Alcohol related admissions	1.64 (1.39 - 1.89)
Rate of years of life lost - all causes	1.64 (1.32 - 1.96)
Emergency admissions for diabetes	1.51 (1.26 - 1.76)
Continuation of breastfeeding	1.37 (1.12 - 1.76)
Emergency admissions for Coronary Heart Disease (CHD)	1.36 (1.13 - 1.58)
Children overweight or very overweight at Year 6	1.3 (1.1 - 1.5)
Emergency hospital admissions for injury in children under 5	1.24 (0.92 - 1.57)
Children overweight or very overweight at reception	1.1 (0.9 - 1.3)
Male life expectancy at birth	1.07 (1.03 - 1.12)
Female life expectancy	1.07 (1.01 - 1.13)
Low birth weight	0.97 (0.74 - 1.2)
Teenage pregnancy (small area data suppressed)	Estimate not available

The data in Table 2 is ranked by the RII measure. It shows the indicators with the highest measures of inequality at the top of the table. Whilst the table shows a social gradient across

nearly all of the indicators, the ranking suggests priority areas for the council and its partners to make gains in reducing in equality.

It is possible to use the RII measure to track progress in reducing health inequalities over time and the public health and wellbeing division will consider how it can use these measures to monitor the impact of our work in this area.

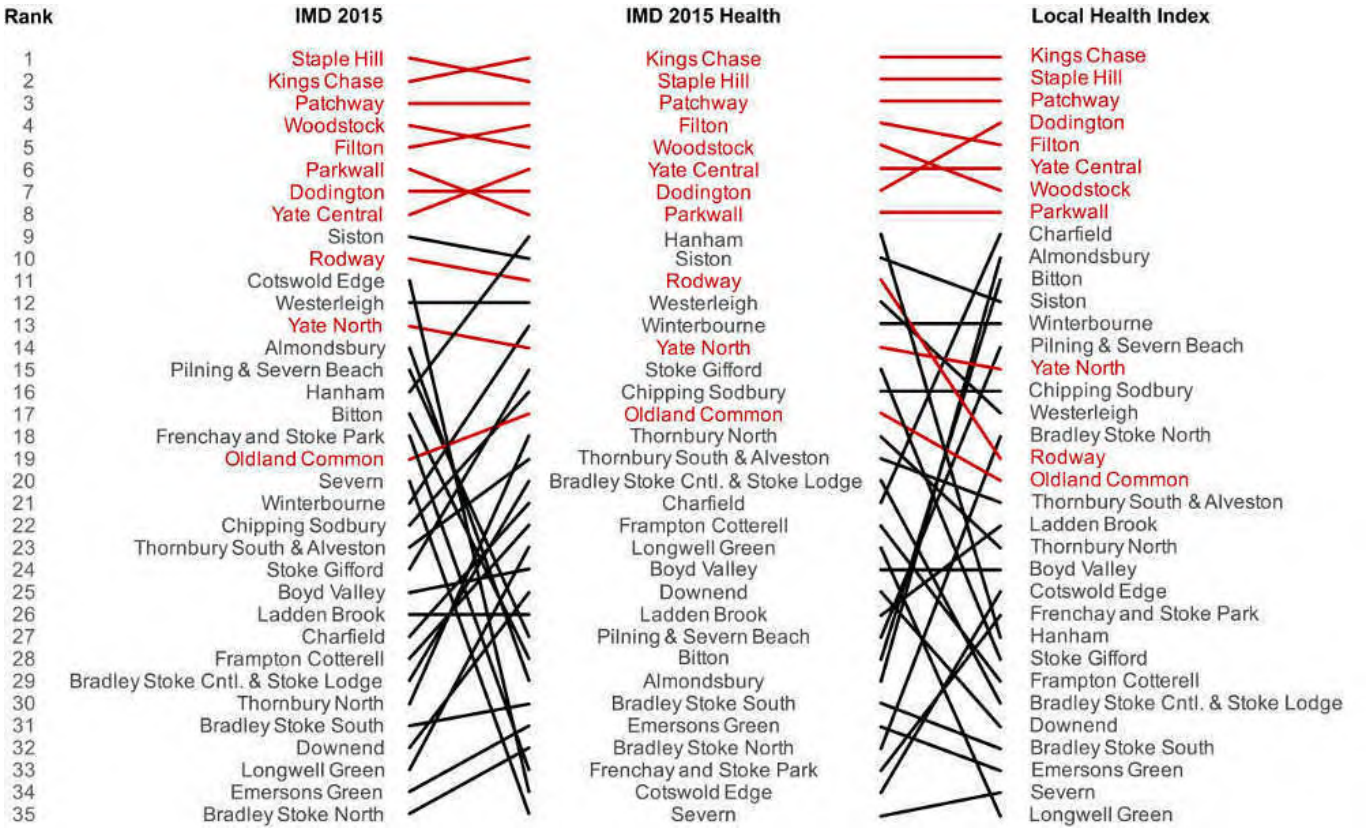
Using data to identify where the greatest health inequalities lie only tells half of the story. Measures of inequality show the gap or difference in health outcomes experienced by the most and least deprived communities - in the example given above, this was the difference by electoral ward areas. Another approach to tackling inequalities is to look at which local communities appear to have the consistently highest level of health needs when looking at the information available at this level.

Although ward level health data has previously been published by the council, the English indices of multiple deprivation (IMD) are often used as a proxy indicator for local needs and a way of prioritising local resources. For this report, we used the ward level health indicator data listed in Table 1 to rank each ward area by the level of need and assigned them to five equal sized groups or ‘quintiles’. By counting the number of indicators that each ward appears in each indicator quintile, the wards were then ranked by a measure of overall health need.

Figure 4 shows the comparison of the different approaches to ranking electoral wards by a summary measure of health need. The first column uses the IMD 2015 score to show the local rank order; the second column shows the wards ranked by only the health domain of the IMD 2015 score; the final column is ranked by the mean rank value using the suite of health indicators available at ward level as described above. Ward names highlighted in red are those which include priority neighbourhood areas.

This figure shows that the relative level of overall health need for each electoral ward is highly dependent on the indicators used to generate the index. This is a strong argument in support of local authority access to health data at individual level and small area geographies as this enables an improved understanding the spatial distribution local health need and levels of health inequality across a wider range of issues.

Figure 4: Comparison of ward ranking by different measures of health need



This summary analysis supports the prioritisation of public health resources and activity by ward area to address the health inequalities identified earlier in the report. The principle of 'proportionate universalism' requires to the council to address the social gradient in health through universal action, but with a scale and intensity which is proportionate to the level of disadvantage (18).

[a] A list of the indicators included in the atlas is included in Appendix A of this report.

[b] Summary measures included: absolute and relative gap, odds ratios, and slope and relative indices of inequality.

[c] Further information about how the RII has been calculated for this report is included in Appendix A of this report.

Section 4: Prioritising needs and resources

Priorities at different levels

Although locally identified health needs, inequalities and risks are the foundation of agreeing the priorities for public health and wellbeing, there are a range of other factors which influence this decision making process:

- The first set of priorities are driven by policies developed by national Government, which in turn may be influenced by international bodies such as the World Health Organisation (WHO). It is important that these national priorities are considered in the local context and prioritised accordingly. A summary of the current national priorities is provided in the following pages
- The second set of priorities are identified from the differences in health outcomes in South Gloucestershire in comparison with other local authority areas, nationally, regionally and within demographically similar areas. Of particular interest are indicators which show South Gloucestershire as a statistically significant outlier for a given measure of health. These comparative needs drive local targets aimed at reducing inequalities between areas and within England. These needs are illustrated in the local health profiles, public health outcomes framework and other sets of published indicators. They are summarised in the updated JSNA
- A third set of priorities relates to inequalities in health outcomes and determinants of health identified through analysis of the available data at populations and geographies smaller than the local authority area. An example of such analyses is provided in Section 3, but more detailed analyses are included in the JSNA as well as health equity audits undertaken locally for specific services
- A fourth and final set of priorities are those which are emerge from engagement with the public, patients, service users, elected representatives, and health and care professionals. These so-called 'felt needs' form an important part of the overall picture and provide valuable context to the prioritisation process

In this section of the report, we consider these sometimes competing pressures and propose an approach to agreeing local priorities for public health and wellbeing.

National priorities

Department of Health

The Department of Health for England has published a five year strategy which outlines its priorities. There are objectives covering a wide range of issues, however Objective 5 directly relates to public health and wellbeing and summarises six areas for action.

Department of Health public health priorities

Objective 5: Preventing ill health and supporting people to live healthier lives
• Review how best to support those suffering from long-term, but treatable, conditions (such as drug and alcohol addiction or obesity) back into work
• Reduce childhood obesity
• Continue to promote clear food information
• Implement a national, evidence-based diabetes prevention programme
• Deliver the prime minister's 2020 Dementia Challenge
• Continue to combat antibiotic resistance, taking forward the findings of the independent review
Source: Department of Health Shared Delivery Plan 2015-2020

NHS England

The Five Year Forward View provides the strategic plan for the NHS in England. (19) It describes a range of priorities for improving healthcare and public health, including:

- helping people live healthier lives to prevent disease and ill-health
- breaking down barriers in how care is provided and taking a holistic approach to healthcare which is appropriate for the local population
- improving the use of technology in healthcare
- investing in research and development to support service improvement
- reducing the demand for health services, improving service efficiency and better allocation of funding

Public Health England

Public Health England set out its main public health priorities in parallel with the NHS England Five Year Forward View.

Public Health England priorities

• Addressing obesity, smoking and alcohol
• Ensuring a better start in life
• Reducing dementia risk
• Robustly tackling tuberculosis and antimicrobial resistance
Source: Strategic plan for the next four years: Better outcomes by 2020

Nationally mandated functions for local authority public health

There are a number of nationally defined mandatory public health functions which local authority public health teams must deliver by law, including:

- protecting the health of the local population (for example from disease outbreaks and environmental hazards)
- ensuring commissioners of NHS services receive the public health advice they need
- ensuring appropriate access to sexual health services
- the National Child Measurement Programme (weighing and measuring children in reception

and year 6 classes)
- the NHS Health Check programme
- delivering the mandated checks for 0-5 year olds (health visitors)

Local priorities

In addition to mandatory work, the South Gloucestershire Director of Public Health Report 2014-2015 identified a number of priorities for the 2015/16 - 2017/18 These priorities are based on the 2013 JSNA.

South Gloucestershire Council Public Health and Wellbeing Priorities
- Mental health and wellbeing
- Reducing childhood poverty
- Alcohol harm reduction
- Health in schools
- Childhood obesity
- Domestic abuse
- Preventing young people starting to smoke

Source: South Gloucestershire Director of Public Health Report 2014-2015 (9)

Approaches to prioritising needs and resources

In this section of the report we have shown that the local prioritisation of health needs, activity and resources requires us to use a range of sources of information. However, the process of prioritisation is as important as the information itself - perhaps more so.

A range of approaches and tools have been developed to support the prioritisation of health resources within administrative areas. Multi-criteria decision analysis (MCDA) has emerged as one of the dominant approaches and is now used extensively by health and wellbeing boards to prioritise health issues for policy making, strategy development and resource allocation.

There are different ways of undertaking MCDA analysis (20), but the following steps are central to the process:

1. Identifying the needs or interventions to evaluate
2. Identifying the criteria relevant to the organisation or partnership
3. Determining relative weighting to score the criteria based on locally agreed values
4. Measuring how well the needs or interventions meet the criteria
5. Combining the scores for all the criteria
6. Comparing the summary scoring for each need or intervention and ranking them by relative priority

Agreeing scoring criteria from locally held values

It is important that the scoring process for prioritisation is agreed locally and in advance of the scoring. The criteria and relative weighting applied to each issue should relate to locally agreed values and principles. The box below lists the strategic values included in the South Gloucestershire Joint Health and Wellbeing Strategy.

- **Prevention**: Our actions should facilitate healthy lifestyles to keep people in good health and prevent illness
- **Early intervention**: Appropriate treatment or other support should be initiated as soon as possible through early diagnosis and assessment of people's circumstances. This minimises the risk and severity of illness and maximises the effectiveness and efficiency of treatment
- **Equity**: Provision of services should be proportional to need and specific services targeted to the areas, groups and individuals that need them most.
- Accessibility: Services should be accessible to all in terms of opening hours, location, transport links and physical access
- **Integration**: The integration of services should be considered where it would improve ease of use and outcomes for people. All relevant organisations should work together to maximise benefits and efficiency
- **Effectiveness**: Activities and services should be evidence based and provide value for money
- **Safety and safeguarding**: Services should be delivered safely and patients treated with dignity. Processes should protect children and adults from abuse and neglect

Source: South Gloucestershire Joint Health and Wellbeing Strategy 2013-2016 (21)

Examples of criteria used by other health and wellbeing boards in England have been collated in and are appended to this report (see Appendix A).

The use of MCDA as a prioritisation process is strongly supported by the public health and wellbeing division. Prioritisation of the health needs identified in the JSNA and other documents referred to in this report will be an important part of the review of the Joint Health and Wellbeing Strategy (JHWS) which is due to be published in April 2017 (see Section 5: Looking forward).

Section 5: Looking forward

In summary

In this report we have provided a retrospective summary of the progress made against our agreed local priorities and objectives. We have described patterns of inequality in the distribution of health outcomes and determinants across our population. We have articulated the need to undertake an objective evaluation of identified health needs to support the prioritisation of public health resources and activity.

In this final section, we look at how we will use this information in our work over the coming year.

Outline of planned work for the year ahead

Divisional review

The strategic review of the priorities, structure and form of the public health and wellbeing division will take place between June and December 2016 when a final proposal for service reconfiguration will be agreed. The review will include a public consultation between July and September 2016 where residents, partner organisations and other stakeholder will be invited to comment on the identified options for development.

In addition to realising the savings required by reductions in the public health ringfenced grant, this review provides an opportunity for the council to ensure that the structure and function of the division is designed to effectively and efficiently meet the needs outlined in the JSNA.

Joint health needs assessment

The 2016 JSNA will be the last time that the whole document will be comprehensively reviewed in a single year-long project. Instead we will introduce a rolling programme of specific needs assessment which will be used to update the information in the existing JSNA chapters.

Joint health and wellbeing strategy

The current Joint Health and Wellbeing Strategy (JHWS) was developed and agreed in 2013 and is due to be reviewed and updated this year. The needs identified in the JSNA, along with other evidence, will be used to develop priority objectives for the next three years.

Public health viewpoint survey

The public health and wellbeing division will be working with the consultation and engagement team to develop a local survey of knowledge, attitudes, beliefs and behaviours of South Gloucestershire residents. The survey will be run through the council's Viewpoint panel on an

annual basis to help improve our understanding of how these determinants are associated with observed health outcomes.

Ward and priority neighbourhood profiles

Building on the analyses undertaken in preparing this report, the public health intelligence team will shortly be developing local profiles at both electoral ward and priority neighbourhood levels to help communities and elected representatives to identify, champion and address the health and wellbeing needs within their local areas.

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Appendix A: Technical note on data analysis

Indicators

The table below provides a breakdown of indicators mapped in the supplementary health atlas and used to develop the local health index referred to in this report. These indicators have been routinely collated by the public health intelligence team to support local decision making and prioritisation.

Table 2: Compendium of health indicators available at ward level

Health outcomes	Health determinants	Environmental exposures
Life expectancy at birth (male, female and statistical difference)	Index of Multiple Deprivation (including health domain)	Air quality: Nitrogen oxides (NOX) concentration
Years of life lost by cause	Rural or urban area	Air quality: PM10 particulate concentration
People reporting bad/very bad health in 2011 census	Density licensed premises	Air quality: PM2.5 particulate concentration
Emergency hospital admissions by cause	Density of fast food outlets	Indicative risk of radon
Rate of conceptions (all ages and under 18 years)	Households in fuel poverty	
Continuation of breastfeeding at 6-8 weeks	Children in poverty (IDACI)	
Proportion of children overweight or obese at reception and year 6	Pensioners living alone	
Incidence of tuberculosis infections	Mothers smoking at time of delivery	

Analysis of health inequalities

The Public Health England inequalities calculation tool was used to generate measures of health inequality included in this report. Relative index of inequality (RII) was selected as a single measure as it gives both a relative measure of inequality within a population and can be used to track change in the level of inequalities over time. RII values included in this report were calculated using

the comparison of highest and lowest score method.

Ward level measures of deprivation were derived from the IMD2015 LSOA data using the NHS general practice registered patient database which provides address point level population counts. The analysis was undertaken on request by a GIS specialist at South West and Central Commissioning Support Unit. Ward population estimates used in the calculation of the measures of health inequality were specific to the time period specific to the indicator measure. Other measures of health inequality are available on request, including absolute and relative gaps, slope index of inequality (SII), Gini coefficient, and concentration coefficient.

Derivation of a local health index

The local health index referred to in Section 3 of the report (specifically Figure 4) was calculated using the unweighted mean of the rank value of each health indicator listed in Table 2 above.

As this used indicators which were routinely available, rather than indicators selected on the basis of value of information, some information bias may be inherent to the index. Further development of a local health index is recommended based on an identified list of key indicators and with appropriate weighting for locally agreed values, principles and priorities.

Table 3: Ranking of electoral wards by summary of available health indicator data

Ward Name	Q1	Q2	Q3	Q4	Q5	Mode	Mean
Kings Chase	15	1	0	2	2	1	1.75
Staple Hill	12	3	4	0	1	1	1.75
Patchway	11	3	1	2	3	1	2.15
Dodington	9	4	3	4	0	1	2.10
Filton	8	8	2	1	1	1	1.95
Yate Central	8	6	2	2	2	1	2.20
Woodstock	7	4	2	5	2	1	2.55
Parkwall	7	4	1	3	5	1	2.75
Charfield	6	2	4	4	4	1	2.90
Almondsbury	5	4	4	3	4	1	2.85
Bitton	4	7	3	4	2	2	2.65
Siston	4	5	2	4	5	2&5	3.05

Ward Name	Q1	Q2	Q3	Q4	Q5	Mode	Mean
Winterbourne	4	3	4	5	4	4	3.10
Pilning and Severn Beach	4	2	4	6	4	4	3.20
Yate North	3	8	5	3	1	2	2.55
Chipping Sodbury	3	3	7	4	3	3	3.05
Westerleigh	3	4	5	4	4	3	3.10
Bradley Stoke North	3	1	5	4	7	5	3.55
Rodway	2	12	4	1	1	2	2.35
Oldland Common	2	2	9	6	1	3	3.10
Thornbury South and Alveston	2	3	6	6	3	3	3.25
Ladden Brook	2	5	3	4	6	5	3.35
Thornbury North	2	5	2	6	5	4	3.35
Boyd Valley	2	2	6	6	4	3	3.40
Cotswold Edge	2	2	4	6	6	4	3.60
Frenchay and Stoke Park	2	3	4	2	9	5	3.65
Hanham	1	6	8	3	2	3	2.95
Stoke Gifford	1	6	6	7	0	4	2.95
Frampton Cotterell	1	4	7	7	1	4	3.15
Bradley Stoke Central and Stoke Lodge	1	4	5	4	6	5	3.50
Downend	1	3	4	7	5	4	3.60
Bradley Stoke South	1	4	1	8	6	4	3.70
Emersons Green	1	2	5	2	10	5	3.90
Severn	1	1	2	1	15	5	4.40
Longwell Green	0	4	6	4	6	3	3.60

Note that there is a risk of an inherent information bias in the evaluation of health needs between population groups (in this case electoral wards) where only routinely available data can be used.

Higher levels of inequality may be present for health issues where indicator data is not routinely available at smaller geographic/population levels.

Appendix B: Prioritisation criteria

The criteria in the list below were identified from a review of needs assessment prioritisation tools published online.

- Population need/magnitude/numbers affected
- Extent of the problem within local population
- Strength of evidence of effective interventions
- Scale of impact of actions on health
- Scale of inequality/opportunity to reduce inequality/improve equity
- Association with social deprivation/disadvantage
- Trend (worsening or improving over time)
- Current spend on treatment/management/potential savings
- Capacity to benefit/opportunity to intervene
- Opportunity for early intervention/upstream prevention
- Severity of issue on individuals/patients
- Strength of views from public/stakeholders/political acceptability
- Wider societal impacts of this health need/wider benefits to addressing
- Speed of potential improvement
- Availability of local needs assessment evidence (uncertainty of information)
- Cost-effectiveness of available interventions
- Overall likely costs to address the issue
- Requires partnership approach to effective intervention
- Problem provides opportunity to improve service quality/efficiency
- Opportunity to exercise local leadership/champion health and wellbeing
- National policy objective
- Capability of the market to provide services to address need
- Opportunity to improve patient choice
- Risk of not delivering against potential priority, if agreed

The following JSNA prioritisation processes were used to collate the list of criteria above:

- Bath and North East Somerset
- Bristol
- City of London
- Coventry
- Devon
- Knowsley
- Nottinghamshire
- Portsmouth
- Stockton on Tees
- Warwick