

# CAMDEN JSNA: FOCUS ON

## DIABETES

JUNE 2017

Diabetes is a lifelong condition that causes a person's blood sugar level to become too high. There are two main types of diabetes: Type 1 and Type 2. Type 2 diabetes is more common, because it is associated with excess body weight, which is increasing in prevalence across the population<sup>1</sup>.

In the UK, diabetes affects around 3.8 million adults, and accounts for 10% of NHS spending. Both of these are projected to rise over coming years<sup>2</sup>.

Managing diabetes well is key, because the condition can lead to complications such as cardiovascular disease, foot disease, diabetic nephropathy (kidney disease), diabetic retinopathy (eye disease), and glaucoma<sup>1</sup>.

### Facts and figures

In Camden

- Diabetes is the 3<sup>rd</sup> most common long term condition<sup>3</sup>
- 8,782 people living with diabetes which has been diagnosed<sup>4</sup>
- 5,750 people estimated to be living with diabetes which is undiagnosed<sup>4,5</sup>
- 5,118 emergency hospital admissions were for people with diabetes in 2014/15<sup>3</sup>
- 109 deaths with diabetes identified as a contributing factor in 2015<sup>6</sup>

### Measures for reducing inequalities

- Interventions to prevent and reduce the impact of diabetes which are accessible and targeted to groups in which diabetes is higher in prevalence.
- Population interventions and policies which encourage active lifestyles, give access to green spaces and healthy food options.
- Policies which address socio-economic inequalities and the wider determinants of health, such as employment and housing.

### Population groups

- **Ethnicity** - prevalence is higher in Black and Asian population groups than white ethnic groups<sup>3</sup>
- **Age and gender** – generally, more men than women are affected, and risk increases with age<sup>3</sup>
- **Deprivation** – diabetes is more prevalent among less affluent population groups<sup>3</sup>

### National & local strategies

- The Five Year Forward View
- Childhood Obesity: A Plan for Action
- The Camden Health and Wellbeing Strategy 2016-18
- North Central London Sustainability and Transformation Plan
- National Institute for Clinical Excellence Quality Standards – Diabetes in Adults

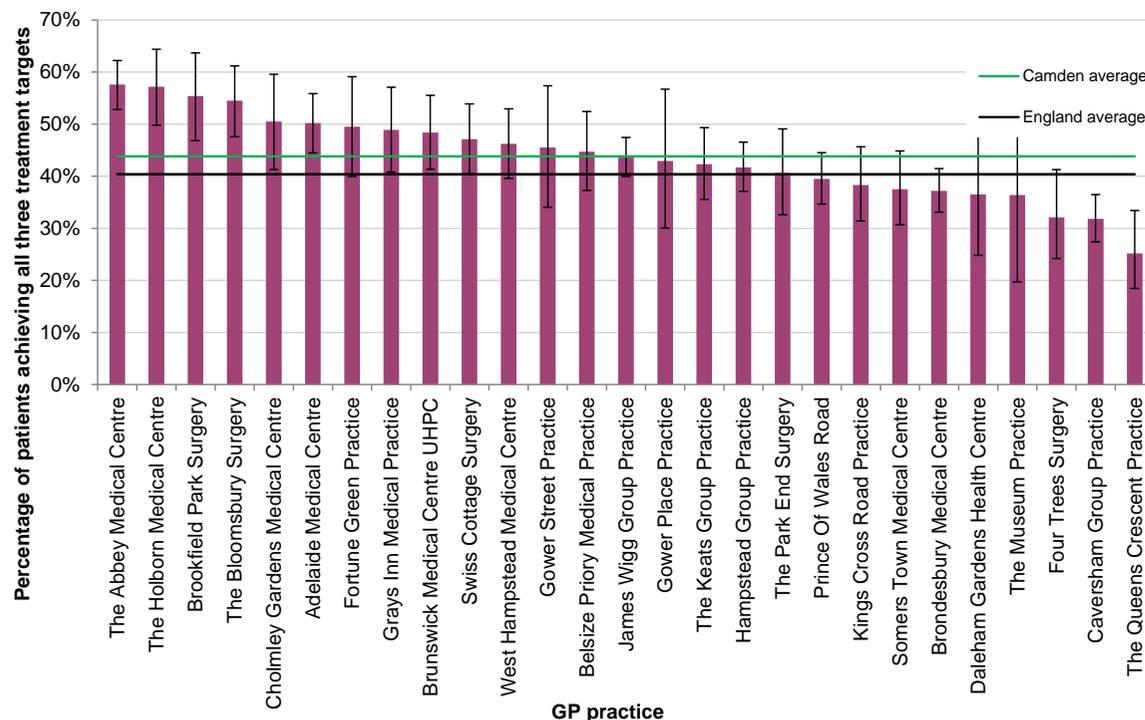
# SETTING THE SCENE: THE CAMDEN PICTURE

## Case finding

Based on prevalence modelling, **14,710** (6.7%) of Camden’s population is estimated to be living with diabetes. However, GP records tell us that only **8,782** (4%) of the population has been diagnosed. This means that around **5,750** (2.3%) of the Camden population is living with undiagnosed diabetes; the equivalent of 40% of people with diabetes. Diagnosing diabetes is an important part of supporting people to manage their condition<sup>4,5</sup>.

## Management

### Percentage of adult Type 2 diabetes patients reaching all three key treatment targets, by Camden GP practice



Source: National Diabetes Audit, 2015-16

## In Camden, there were...

- 109** deaths where diabetes contributed<sup>6</sup>
- 27** deaths where diabetes was a primary cause<sup>6</sup>
- 9,608** inpatient admissions for people with diabetes<sup>7</sup>
- 5,118** emergency hospital admissions for people with diabetes<sup>3</sup>

NICE recommends three clinical targets for people with diabetes: controlled blood glucose, cholesterol and blood pressure.

According to the National Diabetes Audit 2015-16, 44% of Type 2 diabetes patients in Camden achieve all three targets. Camden CCG ranks 5<sup>th</sup> highest in achieving the targets in London; the London median is 40%.

Although, at practice-level, there is variation in the proportion of diabetes patients meeting the three treatment targets, statistically there are only three practices which are below both the Camden and England averages<sup>3</sup>.

Proportionally fewer people with Type 1 diabetes in Camden meet the three treatment targets (22%) than those with Type 2 diabetes<sup>8</sup>.

Proportionally fewer younger people, and those of black and minority ethnic groups meet the targets than other groups of people<sup>3</sup>.

# SETTING THE SCENE: THE CAMDEN PICTURE

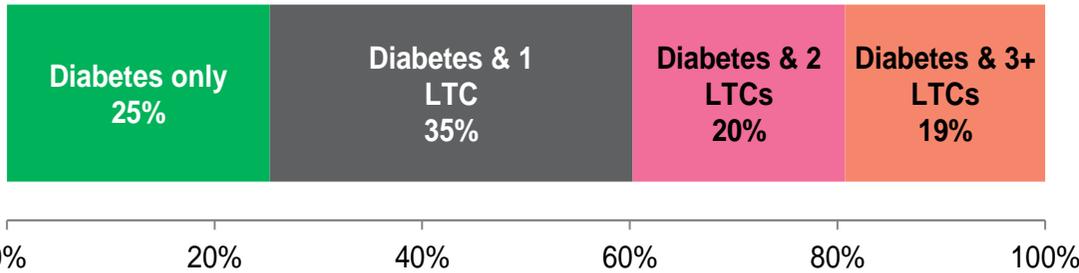
## Who has diabetes?

Modelled figures suggest that **6.7%** of people in Camden are living with diabetes, both with and without a diagnosis. This is **slightly lower** than London (8.9%)<sup>5</sup>.

Of all long term conditions (LTCs) in Camden, diabetes is the **3<sup>rd</sup>** most prevalent<sup>3</sup>.

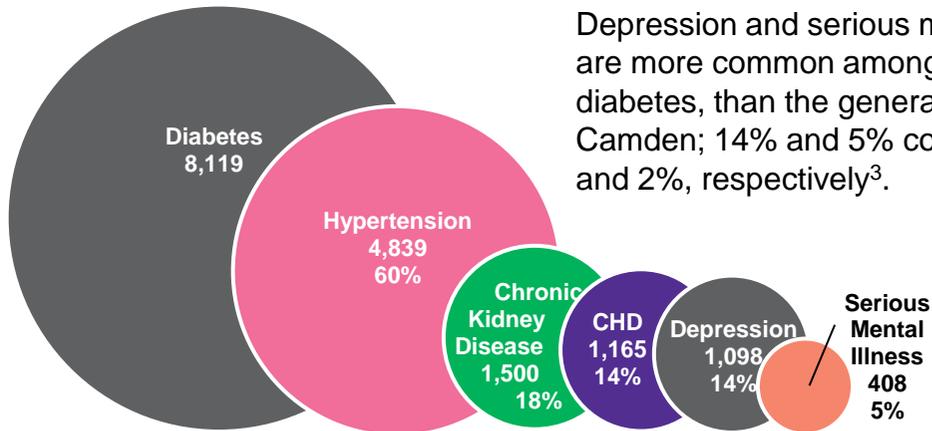
## What other conditions do people with diabetes have?

### The extent of multi-morbidity among people with diabetes, Camden



Source: GP dataset, 2015

74% of people with diabetes have at least one other LTC. 60% of people with diabetes have hypertension, which can impact on health and outcomes.



Depression and serious mental illness are more common among people with diabetes, than the general population of Camden; 14% and 5% compared to 8% and 2%, respectively<sup>3</sup>.

Source: GP dataset, 2015

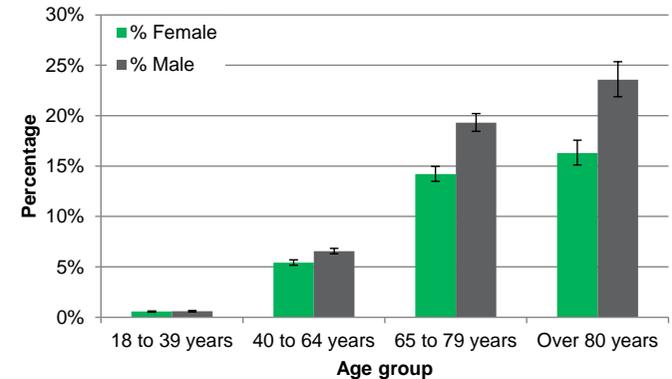
## Inequalities in diabetes

Diabetes has been diagnosed in **9%** and **7%** of people of Black and Asian ethnicity, respectively (it is 4% among the general Camden population).

Diagnosed prevalence of diabetes varies across wards, from **6%** in St Pancras and Somers Town to **2%** in Bloomsbury<sup>9</sup>.

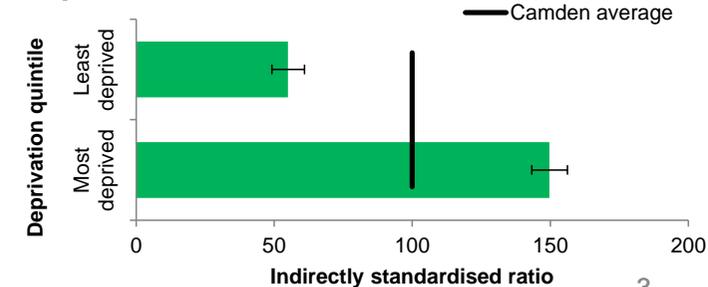
The prevalence of diabetes is greater in men across all age groups, except in 18-39 year olds, where there is no significant difference between men and women<sup>3</sup>.

### Diabetes prevalence by age and gender, Camden



Source: GP dataset, 2015

### Diabetes prevalence by deprivation profiles, Camden



Source: GP dataset, 2012

People in Camden's most deprived quintile are three times more likely to have diabetes than those in the least deprived quintile<sup>9</sup>.

# FUTURE NEED

The prevalence of Type 2 diabetes is driven by excess body weight (Page 5). Overweight and obesity are rising across the population, and so the prevalence of diabetes is projected to increase substantially over coming years, resulting in significant demands on the NHS.

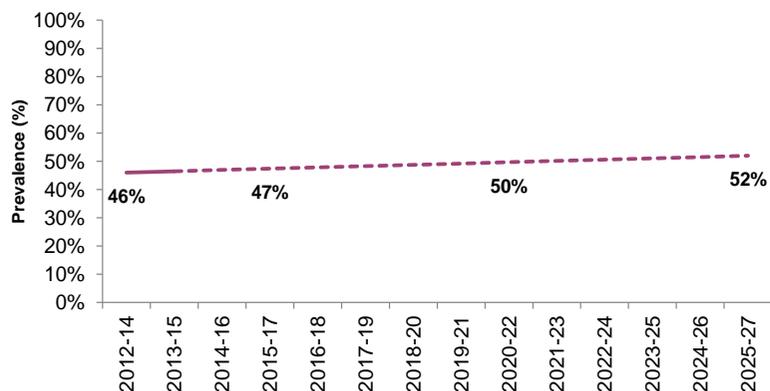
## Prevalence

### Estimated number of people with diabetes, 2015 to 2035, Camden



Source: APHO, 2016

Disease modelling suggests that prevalence of diabetes is going to increase from 6.7% to 7.9% by 2035<sup>5</sup>, driven by the rising prevalence of excess body weight<sup>1</sup>. Nationally, obesity and overweight prevalence are projected to rise to 63% and 73% by 2030, in women and men, compared to 59% and 70%, respectively<sup>10</sup>.



Local data suggests this upward trend is being observed in Camden: between 2012-2015 the prevalence of obesity rose from 46% to 46.5%. If this continues, the prevalence is projected to rise from 47% to 52% between 2015-17 and 2025-27<sup>11</sup>.

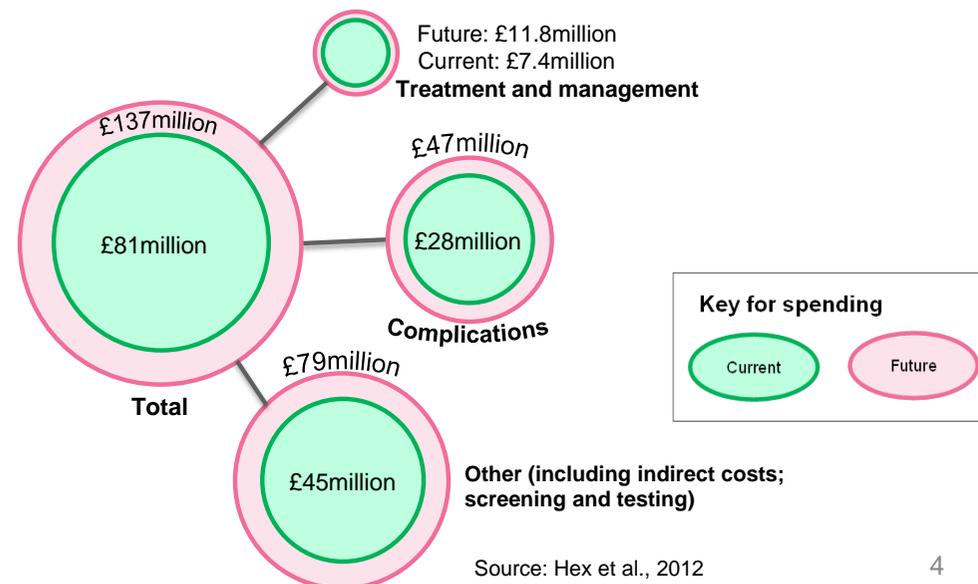
## Costs

Nationally, **10%** of the NHS budget is spent on diabetes. This amounts to £1m per hour<sup>1</sup>.

Most of the costs of diabetes are indirect costs, such as sickness absence and provision of informal care. Around a third of spending is on addressing complications, while treatment and management accounts for 9%. Less than 1% of costs is spent on screening and testing of diabetes.

The rise in spending on diabetes has been modelled, and it is estimated that in Camden, the annual costs of diabetes will rise from £81m in 2010/11 to £137m in 2035/36<sup>2</sup>.

### Current and projected spending on diabetes, 2010/11 – 2035/36



Source: Hex et al., 2012

## WHAT INFLUENCES THIS TOPIC?

The physiology of Types 1 and 2 diabetes are different, and so are the risk factors and associations. These are outlined in the table on the next slide.

Across the UK<sup>1</sup>...

90%

The proportion of **all people** with diabetes who have **Type 2** diabetes

2%

The proportion of **children** with diabetes who have **Type 2** diabetes

700

The number of people diagnosed with diabetes **each day**

25%

The proportion of people with diabetes who have **not been diagnosed**

**80%** of Type 2 diabetes risk is driven by **obesity**

The prevalence of Type 2 diabetes is set to increase markedly over the coming years. This is because levels of obesity and overweight are rising across the population, meaning more people will be at risk of diabetes.

When diabetes is not well-managed, complications develop that threaten health and can endanger life<sup>12</sup>.

People with diabetes are at risk of complications such as heart attack, stroke, kidney disease, nerve problems, poor circulation leading to amputations, and eye disease causing blindness<sup>13</sup>.



These can arise due to poor control of blood glucose, blood pressure and cholesterol levels. NICE recommends that these three factors are controlled within specific ranges, which underlines the importance of early diagnosis and careful management of people with diabetes<sup>14</sup>.

## WHAT INFLUENCES THIS TOPIC?

Risk factors and associations of diabetes <sup>1,12</sup>			In Camden...
	Type 1	Type 2	
<b>Family history</b>	Diabetes risk is 15 times higher in those with immediate family with diabetes.	Diabetes risk is 2-6 times more likely in people with family history of diabetes. People whose mother developed (gestational) diabetes during pregnancy are at higher risk.	6.7% of the population over 16 years is estimated to be living with diabetes <sup>5</sup> .
<b>Ethnicity</b>		People of Asian and Black ethnicity are 2-4 times more likely to develop diabetes than those of Caucasian ethnicity.	17% of adults are Asian and 8% are Black ethnicity <sup>17</sup> .
<b>Sex</b>	56% of all adults with diabetes in the UK are men and 44% are women.		The proportions of men and women are similar <sup>17</sup> .
<b>Age</b>	Children and adolescents are more likely to be diagnosed with Type 1 diabetes.	Older people are more likely to have Type 2 diabetes.	32% of the population is aged <24. 12% is aged over 65+ <sup>17</sup> .
<b>Smoking</b>		Active smoking increases the risk of diabetes, especially among heavy smokers.	20% of the population smokes <sup>3</sup> .
<b>Excess body weight</b>		The drivers of excess body weight and overweight also drive risk of diabetes.	34% of the population is overweight or obese <sup>3</sup> .
<b>Deprivation</b>		Deprivation is associated with obesity, smoking other risk factors for diabetes.	7 areas are among the country's most deprived 10% <sup>16</sup> .

# WHAT WORKS?

Evidence supports a number of approaches that are needed to tackle the diabetes at a population level. The overarching priorities of these are to both **prevent or delay** the onset of diabetes (for Type 2 diabetes), diagnose people early, and to give people with diabetes the right treatment and care to prevent complications.

## Prevention

## Detection

## Treatment and Care

### Policies

- National and local policies
- Urban planning, such as the design of building and public spaces

### Physical environment

- Access to recreation areas
- Healthy workplaces
- Walking and cycling infrastructure
- Availability of affordable healthy food

### Health promotion interventions

- Increasing physical activity
- Healthy eating
- Smoking cessation
- Risk assessment and lifestyle modification

### Case finding

- Identification and assessment of people at high risk of diabetes
- Early diagnosis

### Management of diabetes

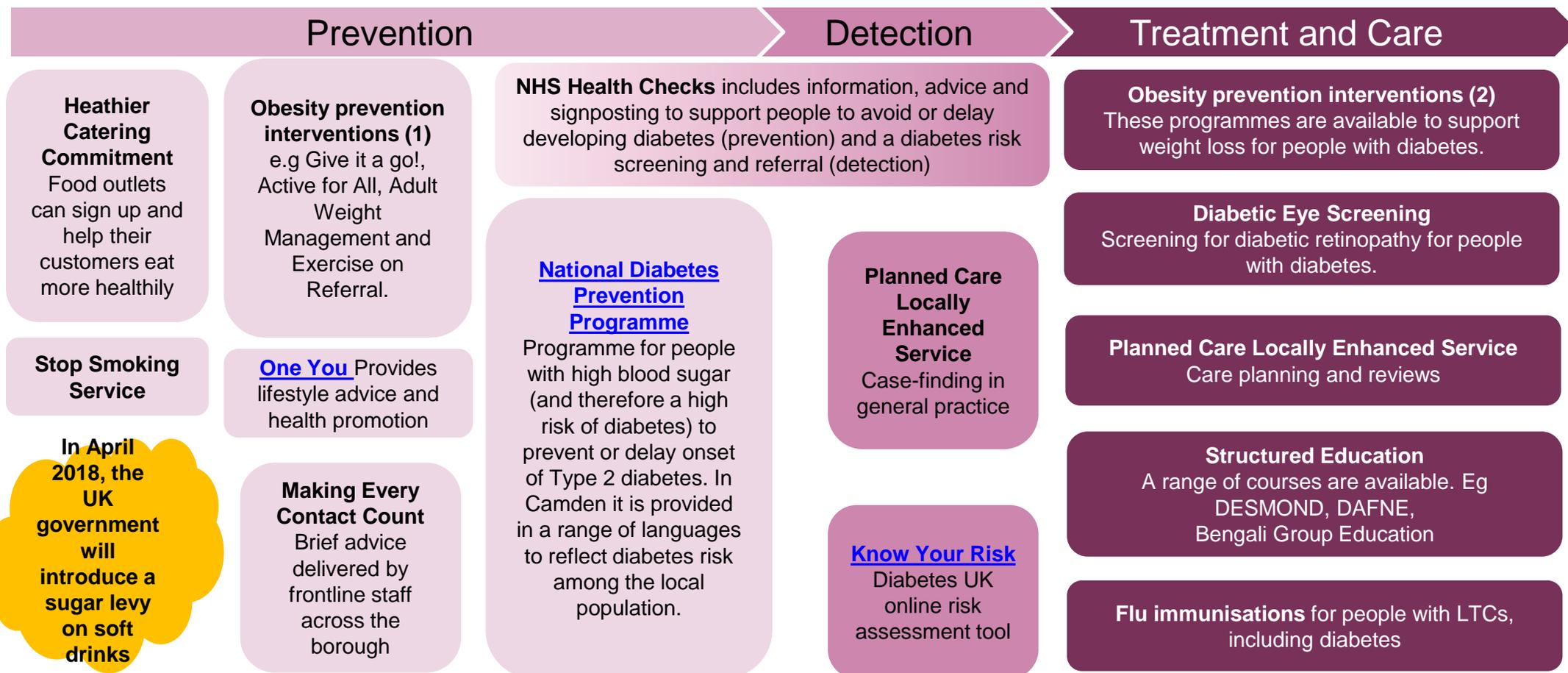
- Patient education and self-management
- Medication
- Review and management of the three treatment targets; **blood pressure, cholesterol and blood glucose**

### Management of complications

- Access to specialist care, eg specialist foot teams, or ophthalmology

# ASSETS AND SERVICES

There are a number of services and schemes which prevent and reduce the risk of complications of diabetes in Camden.



Camden CCG takes an outcomes-based commissioning approach to diabetes care. The Camden Diabetes Integrated Practice Unit (IPU), is a multi-Trust partnership set up to meet the needs of people with diabetes in Camden. The Royal Free London NHS Foundation Trust is the lead provider, working in partnership with Central & North West London NHS Foundation Trust, University College London Hospital, and Haverstock Healthcare, which all provide a range of healthcare services for people with diabetes. It is commissioned to deliver population outcomes rather than activity. The services provided in the IPU are commissioned to improve the **treatment and care** of people with diabetes through achieving the **three treatment targets** and avoiding **unplanned admissions and complications**, and **patient-reported** outcomes.

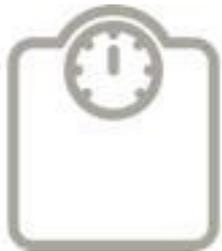
## ASSETS AND SERVICES

As a major and increasing cause of ill health in the population, the diagnosis, management and care of diabetes is a priority both nationally and locally. There are a number of national and local strategies which reflect this.

### National Strategies



**Five Year Forward View** is a national strategy which sets out a clear direction for the NHS, showing why change is needed and what it will look like. It identifies diabetes as a priority for a sustainable future of the NHS, and commits to preventing the projected rise in diabetes prevalence<sup>18</sup>.



**Childhood Obesity: A Plan for Action** is a cross-government plan which aims to reduce England's rate of childhood obesity over 10 years by encouraging:

- industry to cut the amount of sugar in food and drinks
- primary school children to eat more healthily and stay active<sup>19</sup>.

### Local Strategies



**The Camden Health and Wellbeing Strategy 2016-18** prioritises several areas likely to have an important impact on the prevention of diabetes: Healthy weight, healthy lives, reducing alcohol-related harm, and increasing breast-feeding<sup>20</sup>.



**North Central London Sustainability and Transformation Plan** brings together NHS providers, the council and commissioners to promote sustainability within North Central London's NHS. The moving care for LTCs closer to home through Care Closer to Home Integrated Networks (CHINs)<sup>21</sup>.

## TARGETS & OUTCOMES

Diabetes target	Source	Timescale
<b>Diabetes Prevention Programme</b> 812 people with non-diabetic hyperglycaemia referred to the DPP over the first two years of the programme (2016 – 2018).	<a href="#">Camden, Islington and Haringey Diabetes Prevention Programme</a>	2018; longer-term to be agreed with NHS England.
<b>Quality Outcomes Framework</b> There are thirteen QOF indicators for diabetes in 2017-18. For example: <ul style="list-style-type: none"> <li>• Patients with diabetes, in whom the last blood pressure reading is 150/90 mmHg or less (measured in the preceding 12 months).</li> <li>• The percentage of patients newly diagnosed with diabetes referred to a structured education programme within 9 months after diagnosis.</li> </ul>	<a href="#">The Quality and Outcomes Framework</a>	Annual (end of March)
<b>NHS Health Checks</b> 100% of the eligible population offered an NHS Health Check over five years.	<a href="#">NHS Health Check Best practice guidance, 2017</a>	2019 (end of March)
<b>CCG Improvement and Assessment Framework</b> People diagnosed with diabetes in past 12 months attending structured education course	<a href="#">CCG Improvement and Assessment Framework 2016/17</a>	Annual (end of March)
<b>Camden's Planned Care Locally Enhanced Service</b> <ul style="list-style-type: none"> <li>• Recorded HbA1c test result in past year for people with pre-diabetes: 70%</li> <li>• Percentage on diabetes register meeting the three treatment targets: 15%</li> </ul>	<a href="#">Planned Care LES</a>	Annual until 2019 (end of March)
<b>Integrated Practice Unit targets</b> <ul style="list-style-type: none"> <li>• The IPU is commissioned against a number of population-level outcomes, such as <b>unplanned admissions and complications</b>, and <b>patient-reported</b> outcomes. Future targets had not been finalised, at time of publication.</li> </ul>	IPU service specification	N/A

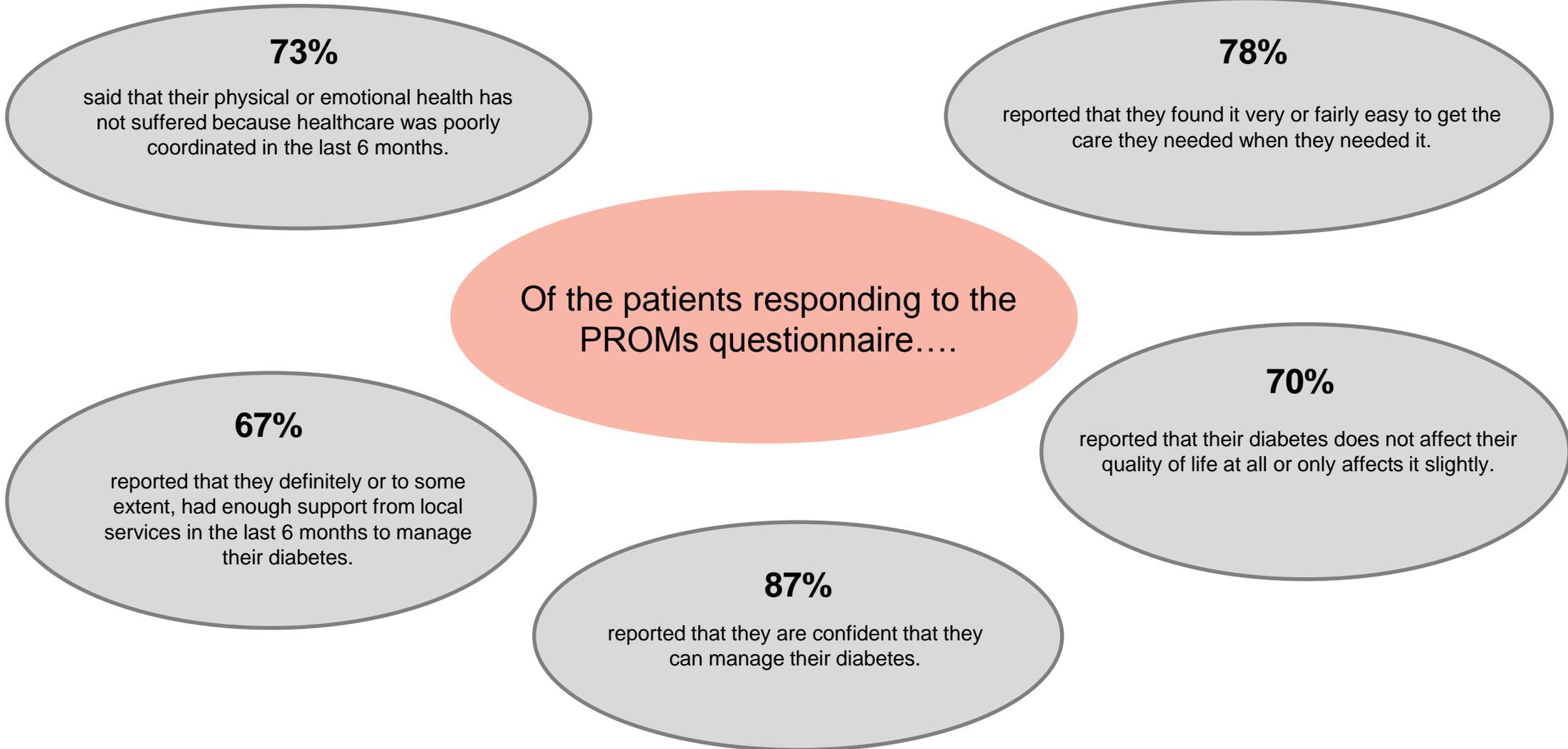
### Other targets which influence diabetes

The Camden Health and Wellbeing Strategy 2016-18 prioritises several areas likely to have an impact on the prevention of diabetes. There are a number of targets:

- **Healthy weight, healthy lives:** double the number of Camden businesses signed up to the Healthy Catering Commitment, from 24 to 50; reduce the proportion of Camden residents who are physically inactive by 5%, increase the proportion of residents achieving recommended physical activity levels to 70%; halve the proportion of children aged 10-11 who are obese; and to halt the trend of rising rates of overweight in this age group.
- **Reducing alcohol-related harm.** increase the number of dependent drinkers accessing treatment by 19%; increase the number of residents receiving interventions for their alcohol use in primary care; reduce hospital admissions directly related to alcohol by 5%.

# THE VOICE: WHAT DO LOCAL PEOPLE THINK ABOUT THIS ISSUE?

Camden IPU is commissioned against a number of population-level outcomes, five of which are patient reported outcomes. The IPU conducted a Patient Reported Outcome Measure (PROM) questionnaire for their baseline measures of these outcomes during 2016. 900 people with diabetes (accounting for 10% diabetes patients) in Camden participated.



A number of challenges remain in preventing diabetes and meeting the needs of people with the condition in Camden.



The **prevalence** of diabetes is projected to continue rising.



Many people with diabetes have **not been diagnosed**.



**Inequalities** persist in diabetes prevalence and outcomes, across socially-defined groups.



Although Camden ranks highly compared to the rest of London, the three NICE **treatment targets** are not met in a large proportion of people with diabetes. The achievement of the targets varies across certain groups, particularly younger people, BME groups and those with Type 1 diabetes.



**Risk factors** for diabetes remain significant public health issues.



Many people with diabetes have not attended **structured education** courses within 12 months of their diagnosis to help them manage their condition.

## Information on services and support

- Know Your Risk online diabetes risk assessment tool. <https://www.diabetes.org.uk/knowyourrisk>
- One You website. <http://oneyoucamden.org/>
- Diabetes Prevention Programme website. <https://preventing-diabetes.co.uk/>
- NHS Health Checks Programme. <http://camden-islington.nhshealthchecks.com/>
- Diabetes Eye Screening Programme <https://www.gov.uk/guidance/diabetic-eye-screening-programme-overview>

## References

1. Diabetes UK (2016) Facts and Stats. Available at [https://www.diabetes.org.uk/Documents/Position%20statements/DiabetesUK\\_Facts\\_Stats\\_Oct16.pdf](https://www.diabetes.org.uk/Documents/Position%20statements/DiabetesUK_Facts_Stats_Oct16.pdf)
2. Hex N, Bartlett C, Wright D, Taylor M, Varley D (2012) Estimating the current and future costs of Type 1 and Type 2 diabetes in the UK, including direct health costs and indirect societal and productivity costs. *Diabetes Medicine*. 29(7):855-62
3. GP Public Health dataset, 2015
4. NHS Digital (2016) Quality and Outcomes Framework, 2015-16. Available online: <http://www.content.digital.nhs.uk/catalogue/PUB22266>
5. National Cardiovascular Intelligence Network (2016) Prevalence

Estimates of Diabetes. Available online:

6. NHS Digital, Primary Care Mortality Database, 2015.
7. NHS Digital, Secondary Uses Service, 2014/15. Available at: <http://content.digital.nhs.uk/sus>
8. NHS Digital (2017) National Diabetes Audit . Available online: <http://content.digital.nhs.uk/nda>
9. GP Public Health Dataset, 2012
10. Public Health Outcomes Framework (2017) Indicator 2.12 - Excess weight in Adults. Available online: <http://www.phoutcomes.info/>
11. National Heart Forum (2015) Proportion of overweight and obese males and females to increase in most European countries by 2030, say latest projections by WHO. [Press release] Available online: <http://nhfshare.heartforum.org.uk/RMAssets/NHFMediaReleases/2015/ECO2015WEDSPRESSWHO4.pdf>
12. World Health Organization (2016) Global Report on Diabetes. Available at [http://apps.who.int/iris/bitstream/10665/204871/1/9789241565257\\_eng.pdf](http://apps.who.int/iris/bitstream/10665/204871/1/9789241565257_eng.pdf)
13. Diabetes UK (2016) State Of The Nation: time to take control of diabetes. Available online: <https://www.diabetes.org.uk/Professionals/Position-statements-reports/Statistics/State-of-the-Nation-2016-Time-to-take-control-of-diabetes/>

*(continued on next page)*

## References (cont.)

14. National Institute of Clinical Excellence (2016) NICE Guidance – diabetes. Available online: <https://www.nice.org.uk/guidance/conditions-and-diseases/diabetes-and-other-endocrinal--nutritional-and-metabolic-conditions/diabetes>
15. Public Health England (2016) 3.8 million people in England now have diabetes. Available online: <https://www.gov.uk/government/news/38-million-people-in-england-now-have-diabetes>
16. Department of Communities and Local Government (2015) Index of Multiple Deprivation 2015 Summary: Camden. Available online: <https://opendata.camden.gov.uk/People-Places/ID2015-Camden-Summary-And-LSOAs-By-Ward/k7iw-mzvn/data>
17. Camden Council (2017) Camden Commission Adults factsheet. Available online: <https://opendata.camden.gov.uk/browse?category=People+%26+Places&utf8=T>
18. NHS England (2014) Five Year Forward View. Available online: <https://www.england.nhs.uk/wp-content/uploads/2014/10/5yfv-web.pdf>
19. Department of Health (2016) Childhood Obesity A Plan for Action. Available online: [https://www.gov.uk/government/uploads/system/uploads/attachment\\_data/file/546588/Childhood\\_obesity\\_2016\\_\\_2\\_\\_acc.pdf](https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/546588/Childhood_obesity_2016__2__acc.pdf)
20. Camden Council (2016) Camden's Joint Health and Wellbeing Strategy 2016-18: Living well, working together. Available online: [https://www.camden.gov.uk/ccm/cms-service/stream/asset/?jsessionid=07F71D24983F5CEB78680528F4F59782?asset\\_id=3528331&](https://www.camden.gov.uk/ccm/cms-service/stream/asset/?jsessionid=07F71D24983F5CEB78680528F4F59782?asset_id=3528331&)
21. North Central London Sustainability and Transformation Plan, 2017

## About Camden's JSNA

[Open Data Camden](#) brings together information held across the organisations into one accessible place. It provides access to evidence, intelligence and data on the current and anticipated needs of Camden's population and is designed to be used by a broad range of audiences including practitioners, researchers, commissioners, policy makers, Councillors, students and the general public.

This factsheet was produced by Alice Ehrlich, Public Health Strategist and Sophia Struszczyk, Assistant Public Health Information Officer. It was approved for publication by Sarah Addiman, Assistant Public Health Director in June, 2017.

Contact: [JSNA@camden.gov.uk](mailto:JSNA@camden.gov.uk)