7.8 Obesity and healthy weight

**Contributors:** Mobola Jaiyesimi and Michael Sinclair

### 7.8.1 Background

The Health and Wellbeing Strategy 2015-18; sets out a vision for ‘improving the health and wellbeing of residents and reducing inequalities at every stage of people’s lives by 2018’. The Health and Wellbeing Board has therefore prioritised obesity as its most important prevention priority.

The Government policy paper ‘Healthy Lives, Healthy People: A Call to Action on Obesity in England’ (2011)\(^1\) sets out the national approach for tackling obesity, building on the whole system approach described in the Foresight Report (2007)\(^2\). The document reiterated the leadership role of local government in supporting individuals to achieve and maintain a healthy weight through bringing together a coalition of partners to tackle obesity locally, and this reflects the partnership approach taken in the Healthy Weight Strategy 2016-2020.

The way people live their lives, the environment they live in, the food they have access to, the physical activity they are able to do, all affects their ability to maintain and achieve a healthy weight. Tackling obesity requires a whole system approach across a wide range of issues and partnerships; from planning roads, to promoting cycling, building houses which have the space to cook and eat as a family; to working with local businesses to provide healthy menu options, and workplace initiatives that support staff to improve their health and increase activity levels. It also involves commissioning services to support children, families, and adults who are overweight to reach their goal of gaining a healthy weight and a healthy future.

Obesity is one of Barking and Dagenham’s most significant and complex challenges, affecting the wellbeing of individuals and families. Fair society and Healthy Lives\(^3\) report describes obesity as one of the diseases that contributes dramatically to shortened lives and worse health of those in disadvantaged communities in England. Evidence suggests that obesity also contributes to significant costs across health and social care\(^4\). Carrying excess weight can have serious and long term impacts on health and wellbeing therefore resulting in increased health and social care costs.

Being overweight or obese may increase the risk of coronary heart disease, hypertension, osteoarthritis, stroke, type 2 diabetes, and some cancers such as breast, colon, endometrial and kidney cancer. People who are overweight or obese may also experience mental health problems, stigmatisation and discrimination because of their weight.

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The borough has historically faced significant challenges to tackling obesity in both children and adults; these challenges continue. NICE guidance was published in March 2015\(^5\) ‘Preventing excess weight gain’ this guideline makes recommendations on behaviours that may help people maintain a healthy weight or prevent excess weight gain.

The recommendations aim to:

- Encourage people to make changes in line with existing advice.
- Encourage people to develop physical activity and dietary habits that will help them maintain a healthy weight and prevent excess weight gain.
- Encourage people to monitor their own weight and associated behaviours.
- Promote the clear communication of benefits of maintaining a healthy weight and making gradual changes to physical activity and diet.
- Ensure messages are tailored to specific groups.
- Ensure activities are integrated with the local strategic approach to obesity.

The London Borough of Barking and Dagenham’s draft Healthy Weight Strategy 2016-2020 sets out four strategic objectives to achieve and maintain a healthy weight, these will inform the framework in which excess weight will be tackled:

1. Enable families and individuals to take responsibility for achieving and maintaining a healthy weight.
2. Make an active lifestyle and healthy eating the easier choice.
3. Address causes that put particular groups of families and individuals at a greater risk of obesity.
4. Ensure the built and natural environment support families and individuals to be more healthy and active.

7.8.2 What is Excess Weight (overweight or obese)

Excess weight (overweight or obese) is when an energy imbalance occurs which arises when energy intake exceeds energy expenditure. Simply put this means when a person eats and drinks excess calories which do not balance with the amount of physical activity, they develop excess weight. Excess weight for adults and children are categorised into ‘overweight’ and ‘obese’, and the unit measure is ‘Body Mass Index (BMI)’. BMI is calculated by dividing a person’s weight in kilograms by their height in metres squared.

<table>
<thead>
<tr>
<th>Classification</th>
<th>BMI Centile</th>
</tr>
</thead>
<tbody>
<tr>
<td>Underweight</td>
<td>&lt;18.5</td>
</tr>
<tr>
<td>Healthy weight</td>
<td>18.5 - 24.9</td>
</tr>
<tr>
<td>Overweight</td>
<td>25.0 - 29.9</td>
</tr>
<tr>
<td>Obese</td>
<td>30.0 - 39.9</td>
</tr>
<tr>
<td>Morbidly Obese</td>
<td>&gt;40</td>
</tr>
</tbody>
</table>

Excess weight is calculated slightly differently for children and this is adjusted for a child’s age and gender. The National Childhood Measurement Programme (NCMP) uses BMI reference charts to classify children which take into account children’s weight and height for their age and sex. Children over the 85th centile are considered overweight and those over the 95th centile, obese (see table 2).

\(^5\)Preventing excess weight gain NG7
Table 2: UK National BMI percentile classification for a child*

<table>
<thead>
<tr>
<th>Classification</th>
<th>BMI Centile</th>
</tr>
</thead>
<tbody>
<tr>
<td>Underweight</td>
<td>≤2\textsuperscript{nd} Centile</td>
</tr>
<tr>
<td>Healthy weight</td>
<td>2\textsuperscript{nd} - 84.9\textsuperscript{th} Centile</td>
</tr>
<tr>
<td>Overweight</td>
<td>85\textsuperscript{th} – 94.9\textsuperscript{th} Centile</td>
</tr>
<tr>
<td>Obese</td>
<td>≥95\textsuperscript{th} Centile</td>
</tr>
</tbody>
</table>

*The thresholds given in Table 2 are those conventionally used for population monitoring and are not the same as those used in a clinical setting (where overweight is defined as a BMI greater than or equal to the 91\textsuperscript{st} but below the 98\textsuperscript{th} centile and obese is defined as a BMI greater than or equal to the 98\textsuperscript{th} centile).

7.8.3 Causes of Obesity

Obesity can be caused by a variety of factors and policy recommendations state that to tackle obesity, we will have to address the causes of obesity across the social gradient\textsuperscript{6}.

Over the last few decades individuals have become less active and access to relatively low cost ‘hot food takeaway’ has become more prolific, which in turn has caused a rise in obesity. Further evidence suggests that other factors that can impact on activity levels include labour saving devices, increased car ownership, perceived safety concerns and technological entertainment such as computers and televisions. Impacts on changing eating habits include less time and skills to cook and grow food, increased ready meals, bulk shopping habits, food advertising, more eating outside the home, increased availability and hence consumption of calorie dense snacks and soft drinks and increased portion sizes.

The Foresight Report on obesity shows how the major risk factors relate to obesity in an individual this can be seen in Diagram 1.


\textsuperscript{6} Fair Society, Healthy Lives, 2010.
7.8.4 Childhood obesity

The National Child Measurement Programme (NCMP) measures children’s height and weight in Reception and Year 6 classes in Primary School. The height and weight measurements are then used to calculate the child’s body mass index (BMI) and compared to growth charts to consider whether they are underweight, healthy weight, overweight or obese compared to the average values for their gender and age.

The 2014/15 NCMP measurements show that Barking and Dagenham had the highest proportion of overweight and obese children in Reception class (27.5%) and the 7th highest proportion in Year 6 between all local authorities in London. Compared to all local authorities in England, B&D has the 2nd highest prevalence for reception year and 10th highest prevalence for year 6.

The 2014/15 NCMP measurements found show that there has been a slight increase in levels of obesity and overweight children in Reception class (Fig 7.8.1). The Year 6 showed a slight decrease compared to the previous year. Barking and Dagenham had the highest proportion of overweight and obese children in Reception class (27.5%) and the seventh highest proportion in Year 6 (40.6%) in London.

Figure 7.8.1: National Child Measurement Programme for Barking and Dagenham: % of children obese and overweight – Reception and Year 6


Figure 7.8.1 shows the excess weight for pupils in reception and year 6 for LBBD and London over an eight year period. It can be seen from the chart that the excess weight rate in LBBD fluctuates, especially in year 6, by about 3 percentage points from lowest to highest levels.

The single year data fluctuates by roughly 7% and 10% for year 6 and reception children respectively. Each year borough wide year group averages at 2,500 pupils.
in reception and 2,200 pupils in year 6. In order to understand how the trend is changing over time it is necessary to look at a three year rolling period increasing the number of pupils being looked at to around 9,000 pupils.

Figure 7.8.2 therefore looks at a three year rolling average for both London and LBBD pupils in reception and year 6.

Figure 7.8.2: National Child Measurement Programme for Barking and Dagenham: % of children obese and overweight – Reception and Year 6, rolling three year average

Excess weight LBBD and London, Three year rolling average

<table>
<thead>
<tr>
<th>Year Range</th>
<th>London Reception</th>
<th>LBBD Reception</th>
<th>London Year 6</th>
<th>LBBD Year 6</th>
</tr>
</thead>
<tbody>
<tr>
<td>2007-2010</td>
<td>40.0%</td>
<td>40.3%</td>
<td>40.3%</td>
<td>40.3%</td>
</tr>
<tr>
<td>2008-2011</td>
<td>40.0%</td>
<td>40.3%</td>
<td>40.3%</td>
<td>40.3%</td>
</tr>
<tr>
<td>2009-2012</td>
<td>40.0%</td>
<td>40.3%</td>
<td>40.3%</td>
<td>40.3%</td>
</tr>
<tr>
<td>2010-2013</td>
<td>41.1%</td>
<td>40.9%</td>
<td>41.1%</td>
<td>41.1%</td>
</tr>
<tr>
<td>2011-2014</td>
<td>41.4%</td>
<td>41.4%</td>
<td>41.4%</td>
<td>41.4%</td>
</tr>
<tr>
<td>2012-2015</td>
<td>40.9%</td>
<td>40.9%</td>
<td>40.9%</td>
<td>40.9%</td>
</tr>
</tbody>
</table>
Figure 7.8.3 (a-f) prevalence (%) of overweight, obese and excess weight, reception year and year-6, England, London, LBBD and its London Statistical Neighbouring Boroughs, 2012/13-2014/15
Using data from the NCMP, it is possible to calculate three year rolling averages at ward level which allow us to gain a better understanding of the patterns of obesity across the borough. These highlighted that although there is variation across the borough, every ward faces challenges in tackling childhood obesity, as every ward is above the national average in both Reception and Year 6.

Table 7.8.1: Obesity – Three year rolling averages Barking and Dagenham wards 2012/13-14/15

<table>
<thead>
<tr>
<th>Ward</th>
<th>2012/13-14/15 % Obese in Reception</th>
<th>2012/13-14/15 % Obese in Year Six</th>
</tr>
</thead>
<tbody>
<tr>
<td>Abbey</td>
<td>13.3%</td>
<td>24.7%</td>
</tr>
<tr>
<td>Alibon</td>
<td>10.0%</td>
<td>26.0%</td>
</tr>
<tr>
<td>Becontree</td>
<td>12.3%</td>
<td>29.3%</td>
</tr>
<tr>
<td>Chadwell Heath</td>
<td>12.8%</td>
<td>24.6%</td>
</tr>
<tr>
<td>Eastbrook</td>
<td>12.6%</td>
<td>21.6%</td>
</tr>
<tr>
<td>Eastbury</td>
<td>11.5%</td>
<td>26.5%</td>
</tr>
<tr>
<td>Gascoigne</td>
<td>16.2%</td>
<td>29.0%</td>
</tr>
<tr>
<td>Goresbrook</td>
<td>16.2%</td>
<td>25.2%</td>
</tr>
<tr>
<td>Heath</td>
<td>15.0%</td>
<td>26.0%</td>
</tr>
<tr>
<td>Longbridge</td>
<td>11.4%</td>
<td>24.9%</td>
</tr>
<tr>
<td>Mayesbrook</td>
<td>12.6%</td>
<td>24.3%</td>
</tr>
<tr>
<td>Parsloes</td>
<td>14.8%</td>
<td>26.5%</td>
</tr>
<tr>
<td>River</td>
<td>17.2%</td>
<td>30.2%</td>
</tr>
<tr>
<td>Thames</td>
<td>15.6%</td>
<td>27.0%</td>
</tr>
<tr>
<td>Valence</td>
<td>12.2%</td>
<td>24.6%</td>
</tr>
<tr>
<td>Village</td>
<td>12.9%</td>
<td>27.9%</td>
</tr>
<tr>
<td>Whalebone</td>
<td>12.8%</td>
<td>22.8%</td>
</tr>
</tbody>
</table>

Source: Health and Social Care Information Centre – National Child Measurement Programme
The wards with the highest levels of reception aged children who are obese or overweight are Gascoigne, Thames and River (see Figure 7.8.4).

Figure 7.8.4 Ward level rates of excess weight 2012/13-2014/15, and schools location across Barking and Dagenham. Reception Year

Percentage of Reception children who are obese or overweight, by ward in LBBD, 2012/13 to 2014/15, compared to London average

Legend

<table>
<thead>
<tr>
<th>TYPE</th>
<th>INFANT</th>
<th>JUNIOR</th>
<th>PRIMARY</th>
</tr>
</thead>
</table>

Reception Excess Weight
R Excess Weight Tertile
- 22.3% - 24.5%
- 24.6% - 26.9%
- 27% - 30.2%

London Average: 23.2%
The wards with the highest levels of year six children who are obese or overweight are Becontree and River. River has the highest percentage in both reception and year six (Figure 7.8.5).

**Figure 7.8.5** Ward level rates of excess weight (obese/overweight) 2012/13-2014/15, and schools location across Barking and Dagenham, and schools location across Barking and Dagenham. Year 6 children

**Percentage of Year 6 children who are obese or overweight, by ward in LBBD, 2012/13 to 2014/15, compared to London average**
7.8.5 Adult obesity

There is no national measurement programme for weight trends at a population level in adults, so the information on patterns of obesity in adults is drawn from a range of different sources.

General practices report the overall prevalence of adults over the age of 16 years who have a BMI of over 30 (obese) through the QOF framework.

Figure 7.8.6: Prevalence of obesity recorded on GP practice database (% of adults over 16yrs)

Source: HSCIC, QOF

Barking and Dagenham has a significantly higher prevalence of overweight and obese adults when compared with London and is similar to that of England (Figure 7.8.7)
Figure 7.8.7: Prevalence of overweight and obese adults in Barking and Dagenham and neighbouring boroughs, Mid January 2012 to Mid January 2015

Source: Public Health Outcome Framework 2.12

Figure 7.8.8: Excess weight in Adults in London, 2012-14

Source: Public Health Outcomes Framework
Analysis of the prevalence of healthy weight in different groups of patients registered with cardiovascular disease, diabetes and hypertension on GP databases found very slight variation between disease groups. Obesity was highest amongst people with high blood pressure (hypertension) and diabetics (Fig 7.8.8).

**Figure 7.8.9: Body Mass Index Distribution in patients registered with diabetes, hypertension or coronary heart disease (CHD) on GP database (June 2016)**

Source: Health Analytics, [https://ha.barkingdagenham.nhs.uk](https://ha.barkingdagenham.nhs.uk)
7.8.6 Physical activity

Children and young people's physical activity

There are currently no national measures on children’s physical activity outside of school settings. The last published data on participation in the national recommended minimum of physical education in schools in 2009/10 showed a significant improvement in Barking and Dagenham and closed the gap between the borough and the London and England average (Table 7.9.2). The borough also improved against the performance of statistical neighbouring boroughs.

Table 7.9.2: Percentage of school children who participate in at least 3 hours of high quality PE and school sport within and beyond the curriculum, outer north east London boroughs, London and England, 2009/10

<table>
<thead>
<tr>
<th>Area Name</th>
<th>2008/09</th>
<th>2009/10</th>
</tr>
</thead>
<tbody>
<tr>
<td>England</td>
<td>49.6%</td>
<td>55.1%</td>
</tr>
<tr>
<td>London</td>
<td>49.3%</td>
<td>55.2%</td>
</tr>
<tr>
<td>Barking and Dagenham</td>
<td>45.3%</td>
<td>54.3%</td>
</tr>
<tr>
<td>Greenwich</td>
<td>51.4%</td>
<td>57.5%</td>
</tr>
<tr>
<td>Haringey</td>
<td>41.3%</td>
<td>59.2%</td>
</tr>
<tr>
<td>Hackney</td>
<td>40%</td>
<td>42.9%</td>
</tr>
</tbody>
</table>


7.8.7 Evidence based guidance in promoting a healthy weight

Maintaining a healthy weight is an extremely important part of attaining good health and wellbeing. Excess weight is not only an individual's problem; rather it is a wider community problem. The indirect effect of excess weight contributes to increasing health care costs and decreasing productivity in the community and wider society. The local authority, community and environment has a huge role to play in improving the health of its members by increasing healthy choices as well as increasing access to healthy foods in schools and communities.

Working with communities and specific at risk groups is a recommendation from NICE guidance\(^7\). The key evidence based recommendations are:
- Develop a sustainable multi agency and community wide approach.
- Support leadership at all levels
- Coordinate local action
- Embed scrutiny and accountability
- Encourage integrated commissioning by aligning interventions with other health improvement strategies.
- Develop and support partners and professionals through regular training.
- Develop monitoring and evaluation frameworks.
- Develop consistent and communication strategies across the organisation.

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\(^7\) Obesity: working with local communities, NICE guidelines PH42, 2012.
Tackling obesity can be address by evidence based weight management programmes, NICE recommendations\(^8\) cover, children and young people\(^9\); adults\(^10\); and women before during and after pregnancy.

- Develop community based services
- Provide training to improve skills of professionals
- Provide weight management programme for;
  - Adults with a BMI of 30 or more
  - Women with a BMI of 30 or more preparing for pregnancy
  - Provide support for pregnant women to adopt a healthy lifestyle during pregnancy
  - Support women to maintain healthy weight after childbirth
- Adopt an integrated approach to preventing and managing obesity
- Commission programmes that include the core components for effective weight loss and to prevent weight regain
- Ensure contracts for lifestyle weight management programmes include specific outcomes and address local needs

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\(^10\) Weight management: lifestyle services for overweight or obese adults, NICE guidelines PH53, 2014
### Key strategies, plans and guidance

There are a number of key national, regional and local strategies and policies that can support the

<table>
<thead>
<tr>
<th>Level</th>
<th>Key Strategies, Plans and Guidance</th>
</tr>
</thead>
</table>
| **National Policy and Strategy Documents** | - Five Year Forward View, NHS 2014  
- Care Act 2014  
- Towards an Active Nation, Sport England Strategy, 2016  
- Working Together to Promote Active Travel: A briefing for local authorities, PHE 2016  
- Everybody Active, Every day (PHE 2014)  
- PE and Sport Strategy for young people (PESSYP) (2009)  
- Turning the tide of inactivity – UKActive (2014)  
- Healthy Lives, Healthy People: A call to action on obesity in England (2011)  
- Active Travel Strategy - Department for Transport & Department of Health (2010)  
- An update on the government’s approach to tackling obesity (2012)  
- No health Without Mental Health, DH, 2011  
- National Diet and Nutrition Survey: Headline Results from Years 1, 2 and 3 (combined) of the Rolling Programme 2008/09 – 2010/11 (2012)  
- Healthy lives, healthy people: Improving outcomes and supporting transparency (2012)  
- Healthy lives, healthy people: a call to action on obesity in England (2011)  
- UK physical activity guidelines (2011)  
- Changing Behaviour, Improving Outcomes: A new social marketing strategy for public health  
- The Independent School Food Plan (2013)  
- NICE public health guidance: Obesity - working with local communities (2012)  
- NICE public health guidance: Walking and cycling: local measures to promote walking and cycling as forms of travel or recreation (2012)  
- NICE Public health briefings for local government: physical activity and workplace health (2012), behaviour change and walking and cycling (2013) |
- Blueprint for a physically active sporting city (London Sport 2015)  
- Convergence – Strategic Regeneration Framework 2011 – 15  
- Parks and green spaces strategy (2003)  
- Playing pitch strategy (2015)  
- Growth Strategy (2015)  
- LBBD Mental Health Strategy Draft (2016)  
- Five Ways to Wellbeing |
Recommendations for Commissioners

The key to preventing future illness is to tackle obesity and help people maintain and achieve a healthy weight. Prevention of obesity is a key health and wellbeing priority for the borough.

A whole systems approach is required in tackling obesity, commissioners need to work with the wider partnership to ensure the promotion of public health interventions such as breastfeeding, healthy child nutrition, and physical activity are embedded in relevant contracts to address the challenges of healthy weight in children and adults. It becomes increasingly apparent that a family based approach to healthy weight and obesity is crucial.

The Healthy Weight Alliance and Healthy Weight Strategy sets out the boroughs plan to tackle excess weight and increase the numbers of residents that are able to maintain a healthy weight.

Key recommendations for commissioners;

- Communication on the benefits of maintaining a healthy weight need to be clear and consistent across the organisation.
- A whole systems approach involving different wider partners and communities is required to tackle obesity
- Commissioners should aim to embed the obesity prevention agenda across contracts and service specifications
- Commissioners should consider a targeted approach in addressing at risks groups
- Commissioners should aim to develop a outcome focused weight management programme
- Further work is required to identify and address barriers to being physically active through engagement sessions with the local community.
- Prioritise the maintenance and development of parks and open spaces to increase physical activity and play provision in the borough