

The
BOW
GROUP

Target Paper



Obesity Epidemic – Paranoia or Evidence Based?

**The Bow Group Health & Education Policy Committee
(Thomas Kelley, Stuart Carroll, Gary Jones & Jennifer White)**

**with a foreword by Professor David Haslam
and contributions from Cancer Research UK, Diabetes UK
& Antony Worrall Thompson**

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FOREWORD

by Professor David Haslam

This report starts with the question, ‘Is obesity an epidemic?’ and answers its own question with a resounding, ‘Yes’. It is frightening to realise that even if Government and societal initiatives on obesity prevention were to be put in place across the UK, at the click of a finger, the obese population would continue to grow because of deeply entrenched behavioural traits, combined with the burden of genetics and epigenetics.

Furthermore, the Giant will arise from its slumber, and mere obesity will become seen as obesity the precursor of epidemics of diabetes, heart disease and premature death. To do nothing is not an option. If obesity is left unmanaged, the burden on the individual and to the wider economy will become immense because of the costs associated with long-term diseases and reduced productivity of the work force. Management must not only rely on prevention of obesity, but must also include treatment of those who are already obese if the epidemics of diabetes, heart disease and premature death are to be avoided.

In 1985, ‘The Health of the Nation’ report set a target that by 2005, obesity levels would have returned to 1980 levels: 6% for men, 8% for women. The target was missed by 400%. Targets are cheap and easy ways of giving the illusion of getting to grips with a problem, but being so wide off the mark displayed a profound lack of understanding of obesity and the drivers of the epidemic. The authors of this report understand the problem, the political, organisational and resource barriers to dealing with it, and possess, and share insight into overcoming them. Not much has improved since 1985 despite the appearance of dozens of reports, White Papers and campaigns, which are documented here. The report examines why failure has occurred, and is not shy of exploring the less well-known areas such as cancer risk, weight gain associated with drugs such as anti-depressants, and the lack of medical school training on obesity.

Seeing and treating obese patients on a daily basis, often with severe co-morbidities and with significant difficulties functioning from one day to the next, creates a different perspective from the slightly detached version of the societal problem described from afar in reports such as Foresight. Tackling obesity in the clinical context means helping a person whose life is profoundly affected by their weight, to regain health and productivity and treat or avoid major co-morbidities and ultimately premature death. There is now the challenge of GP consortia and local authorities being responsible for either understanding or dismissing the epidemic, and managing prevention and treatment appropriately and cost-effectively, or myopically pouring money into treating its consequences rather than its causes.

The Bow Report defines and describes the epidemic of obesity accurately and thoroughly, documenting the efforts which have already been made, with refreshing honesty, leaving the reader with no doubt that obesity is a major medical and societal problem which needs addressing urgently. It is a useful route map for those starting with an interest in obesity, but also an invaluable reference for those of us who have been round the block a few times. It should act, through its powerful and diverse recommendations, as a call to action to Government, Health Care Professionals and the public that the battle against obesity is only just beginning.

Professor David Haslam
Chairman of the National Obesity Forum
May 2011

From the Research Secretary

Britons are overweight. Unless something is done to tackle this problem, all the indications are that our waistlines are likely to get even larger. It is a terrifying prospect that 60% of the UK population could be classified as clinically obese by 2050. The negative effects of obesity on people's health – and, therefore, on the economy and society as a whole – are generally well known. Although the links between obesity and heart disease or diabetes are commonly understood, it is more surprising that being obese can increase the likelihood of developing cancer. This is clearly an issue of great social and economic importance.

There are a number of disturbing features in this obesity 'epidemic', not least the distinct socio-economic form that the problem has assumed. The correlation between obesity on the one hand and low incomes and deprivation on the other is worrying. There is a danger that many of the most vulnerable members of our society could be caught in a vicious circle of poor health and deprivation, with the two reinforcing one another. Given that parental obesity appears to be a good predictor of a child's present or future obesity, the spectre is raised of obesity afflicting several generations of the same family, increasing the likelihood that they will suffer from poor health. Therefore, there is a strong moral dimension to this problem as well.

This piece of work also challenges our assumptions about the causes of obesity. The link between weight gain and various kinds of medication calls into question the assumptions we make about an obese person's personal responsibility for their condition. Being overweight might not simply be a matter of eating too much and exercising too little.

Finding solutions to this problem will be immensely challenging. There are pervasive environmental factors that cause and perpetuate the problem of obesity, including long working hours, increasing commuter times and the lack of availability of healthy food and drink. For instance, how will we be able to influence the fact that there is a greater incidence of fast-food outlets in those areas characterised by the worst levels of deprivation?

With growing numbers of obese young people, it is essential that we do something. The obesity epidemic must be arrested and it is up to us to act.

Luke Powell
Research Secretary of the Bow Group
May 2011



The Bow Group (BG) was founded in February 1951 as an association of Conservative graduates, set up by a number of students who wanted to carry on discussing policy and ideas after they had left university. They were also concerned by the monopoly which socialist ideas had in intellectual university circles. It originally met at Bow, East London, from which it takes its name.

Geoffrey Howe, William Rees-Mogg and Norman St John Stevas were among those attending the first meeting. From the start, the Group attracted top-flight graduates and quickly drew the attention of a number of government ministers, notably Harold Macmillan. In the intervening time, Michael Howard, Norman Lamont and Peter Lilley have all held the BG chairmanship. Christopher Bland, the current Chairman of BT, was BG chairman in 1969. In the recent General Election five recent members of the BG Council were elected to the Commons.

Since its foundation the BG has been a great source of policy ideas, and many of its papers have had a direct influence on government policy and the life of the nation. Although it has no corporate view, it has at times been associated with views both of left and right - always within the broad beliefs of the Conservative Party. The BG has four clear objectives:

To contribute to the formation of Conservative Party policy

To publish members' work and policy committee research

To arrange meetings, debates and conferences

To stimulate and promote fresh thinking in the Conservative Party

Recent publications include (all available at www.bowgroup.org):

'Putting the Health Back in Education'

Tracey Bleakley, Stuart Carroll & Ross Carroll with a foreword from Charlotte Leslie MP (BG Health & Education Committee) **February 2011**

'Delivering Enhanced Pharmacy Services in a Modern NHS: Improving Outcomes in Public Health'

Ross Carroll, Mike Hewitson & Stuart Carroll with a foreword from Baroness Cumberlege (BG Health & Education Committee) **September 2010**

'Equity and Excellence: Liberating the NHS' – Opportunities and Challenges

Stuart Carroll & Gary Jones (BG Health & Education Committee) **August 2010**

The Enterprise Nation? Developing Northern Ireland into an Enterprise Zone

Ross Carroll with a foreword by Lord Trimble (BG Economics Committee) **April 2010**

The Quality and Outcomes Framework – What Type of Quality and Which Outcomes?

Gary Jones, Stuart Carroll & Jennifer White (BG Health & Education Committee) **February 2010**

The Right Track – Delivering the Conservatives' Vision for High Speed Rail

Tony Lodge with a foreword by Lord Heseltine (BG Transport & Energy Committee) **January 2010**

"People Power: Reforming QUANGOs" – Is this Applicable to Health Agencies?

Stuart Carroll & Nick Hoile (BG Health & Education Committee) including contributions from Sir Andrew Dillon, Dr. Richard Barker and Dr. Bill Moyes **November 2009**

More for Less: Cutting Public Spending, Protecting Public Services

The Rt. Hon John Redwood MP & Carl Thomson (BG Economics Committee) **November 2009**

Doing Veterans Justice: Conversations with the Forgotten Fighters

Ross Carroll, Stuart Carroll and Julien Rey (BG Health & Education Committee) including contributions from Simon Weston OBE and Captain Surgeon Morgan O'Connell **June 2009**



A Report by the Health & Education Policy Committee of the Bow Group

(1st June 2011)

Thomas Kelley, Stuart Carroll, Gary Jones and Jennifer White

Bow Group Health & Education Policy Committee

The Health & Education Policy Committee is committed to researching and analysing the issues and challenges facing the NHS, wider healthcare sector, and education system as a result of Government policies. The Committee regularly meets to discuss new research projects and how it can support viable, sustainable and effective policies to improve the provision and delivery of healthcare and education services.

Chairman – Stuart Carroll

For more information about the Health & Education Policy Committee, please contact Stuart Carroll on health.policy@thebowgroup.org.

Technical Acronyms and Abbreviations

BBC	British Broadcasting Corporation
BMA	British Medical Association
BMI	Body Mass Index
DCMS	UK Department for Culture, Media and Sport
Defra	UK Department for the Environment, Food and Rural Affairs
DfE	UK Department for Education
DH	UK Department of Health
DfT	UK Department for Transport
GP	General Practitioner
GMC	General Medical Council
HSC	Health Select Committee
NCGCACC	National Clinical Guidelines Centre for Acute and Chronic Conditions
NHSCB	National Health Service Commissioning Board
NHS	National Health Service
NICE	National Institute for Health and Clinical Excellence
NIHR	National Institute for Health Research
NOF	National Obesity Forum
PCT	Primary Care Trust
PE	Physical Education
QOF	Quality and Outcomes Framework
UK	United Kingdom
WC	Waist circumference
WHO	World Health Organization

Executive Summary

- *“The predictions of significant increases in obesity-related ill health in the future mean that the next government will need to sustain investment in initiatives delivered by the NHS and all other relevant agencies.” **The King's Fund report: ‘A High-performing NHS?’ April 2010.**¹*
- In 2004, 67% of men and 69% of women were overweight or obese. Current predictions indicate that 60% of the UK population will be classified as clinically obese by 2050.
- Body Mass Index (BMI) has been, and continues to be, a useful tool for measuring obesity. However, it has its limitations as it does not consider body fat or body shape and therefore it is possible to categorise people as obese, according to their BMI, when they are in fact perfectly healthy. Therefore, judgement must also be used rather than simply categorising people based on numbers alone.
- The provision of fast food outlets is generally greater in deprived areas. Evidence suggests that people who consume fast food regularly weigh more than those who do not. The uncomfortable truth is that society must address commuting distances, and in particular distances to shops and schools.
- The 5-A-DAY Programme has successfully penetrated into societies across the UK and is arguably one of the most successful public health campaigns in recent years.
- Significant efforts have been made in schools to promote physical activity and healthy eating environments. There has also been a concerted effort to improve the nutritional quality of school meals. This paper supports the Coalition Government’s proposal that Physical Education remains a core subject in the National Curriculum.
- The Foresight report emphasises the need for long-term strategies spanning several generations and beyond traditional planning cycles. The report concludes that the environment does influence physical activity and indeed obesity but the mechanisms remain unclear. We believe that the Big Society offers great hope in this very area. Communities working together to educate and to encourage their local population to eat healthily and to exercise.
- Change4Life has been successful in galvanising departments across Government to work closer together to tackle the critical problem of obesity. The scheme also appears to have made some impact on the wider public with evidence of behavioural change as a result of the campaign. We fully support the government’s position that Change4Life must become more of a societal movement.
- We must acknowledge that obesity is not simply media hype or paranoia and the UK confronts a serious problem. To date, obesity policy in the UK is limited to promoting prevention as the standalone priority: this approach is flawed. Obesity prevention is indeed crucial for the next generation, but obesity management is crucial to this

generation to ensure that we avoid consigning a lost generation to be written off because of their weight. There are four key areas in obesity management:

- Identification and inclusion on a register.
 - Screening of obese patients for diabetes, hypertension, lipid profile, depression, and sleep apnoea.
 - Management of co-morbidities.
 - Sustained weight loss.
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- Obesity is a risk factor for many different types of cancer. It is estimated that between 30-40% of cancers could be prevented by more physical activity, better diets and the maintenance of an appropriate body weight.
 - Many, but not all, people develop type 2 diabetes because they are overweight or obese.
 - Obesity is also a major problem for patients requiring surgery. It greatly impacts upon the provision of safe anaesthesia and perisurgical care.
 - It is important to recognise that obesity or weight gain is a side effect of many different types of medication. Many of the medicines commonly used in psychiatry to treat schizophrenia or bipolar disease can produce significant weight gain. Therefore, society must be careful who it is calling “fat” or obese, and rather approach the issue from a more considered perspective.
 - Effectively training our future doctors and healthcare professionals in the causes, management and prevention of obesity is absolutely essential. Currently, obesity receives very little attention in the undergraduate curriculum. We spoke with a number of medical students and junior doctors and the consensus was that greater emphasis needs to be placed on obesity in the undergraduate and postgraduate medical curricula.
 - The most significant risk factor for childhood obesity is parental obesity. Amongst the most successful school based programmes aimed at tackling childhood obesity are those that have a parenting component.
 - The workplace has a crucial role to play in tackling obesity. Walking and cycling to work must be promoted; healthy food and drink must always be available; and clubs promoting physical activity should be established. In order for these policies to work the workforce must be educated as to WHY a healthy lifestyle is important; HOW they as individuals can lead a healthy lifestyle; and HOW the organisation is going to help them to achieve this objective.
 - Obesity prevention and management is vital for the health of our economy. A healthy workforce is essential for business growth, better productivity and international competitiveness.

1. Introduction

“Obesity is one of the biggest health challenges we face...The Government’s ambition is to be the first major nation to reverse the rising tide of obesity and overweight in the population, by enabling everyone to achieve and maintain a healthy weight.” Department of Health, March 2010.²

“Low income and deprivation are particularly associated with higher levels of obesity”. Department of Health, ‘Healthy Lives, Healthy People: Our Strategy for Public Health in England’, page 15.³

In November 2010, the Coalition Government published its flagship White Paper on Public Health, *‘Healthy Lives, Healthy People: Our Strategy for Public Health in England’*.⁴ It did so against the backdrop of a plethora of previous reports and analysis painting a picture of deep-rooted public health problems afflicting the UK. Across the political spectrum, the healthcare community and the general public, opinion has crystallised around the view that the UK is facing a serious public health crisis; most notably demonstrated by binge drinking, smoking, poor sexual health and an obesity epidemic. Tip-toeing around the issue of public health is no longer an option.

Although few doubt the need for better public health and a shift in mentality of the NHS from curative to preventative healthcare, the key policy question of how best to do it – and in what way – is the essence of the ongoing debate. Despite the general difficulties and complexities associated with many of the public health challenges facing society, this policy question is particularly topical in the case of obesity. Some have claimed that the UK is in the midst of an “obesity epidemic”, but is this claim evidence-based or is it just paranoia and an over-exaggerated claim? To what extent, if at all, can Britain’s obesity problem be classified as an “epidemic”? Answering these questions is important. After all, it is difficult to prescribe an appropriate policy response and set of solutions in the absence of a clear diagnosis of the problem.

Government policy towards obesity has already sparked controversy. Anne Milton MP, the Parliamentary Under-Secretary for Health with responsibility for public health, told the BBC in an interview in July 2010 that GPs and other healthcare professionals should tell people they are fat rather than obese.⁵ Although stressing that she was speaking in a personal capacity, the Minister has argued that the term fat is more likely to motivate obese people to lose weight and accept “personal responsibility”. Some health experts have responded by saying such a word could stigmatise those who are overweight and was a simplification of the public health challenge. Others have questioned whether this fits with the Government’s “nudge rather than push” approach to public health. And so another key policy question hangs: should the NHS and healthcare professionals use the term “fat” rather than “obese” to describe overweight patients? Should the UK redefine and rethink the way it views and understands obesity? To put it more simply, what does obesity mean?

As part of *‘Healthy Lives, Healthy People’*, the Government has promised to publish a separate follow up policy document specifically looking at the issue of obesity. This provides a timely opportunity for policymakers, healthcare professionals and the general

public to contribute to an important policy debate. This is pertinent not just in terms of answering questions around the true meaning of obesity, its scale and its causes, but also from the perspective of thinking through how the issue should best be addressed.

2. Research Objectives and Methods

To inform the Government's forthcoming policy document on obesity, our research has three main objectives:

1. To review the prevailing policy approach to tackling obesity in the UK as a public health imperative with specific focus placed on evaluating the previous Labour Government's policies and those proposed by the current Coalition Government;
2. To establish the facts surrounding the obesity debate by reviewing the existing evidence base; and,
3. To propose recommendations to improve Government policy targeted at dealing with obesity in the UK.

In researching these objectives, the emphasis is placed on evaluating preventative approaches to tackling obesity, current public health education, and other public health initiatives. For the purposes of policy recommendations, we focus on the following key areas:

1. Obesity in society and the general population;
2. Obesity and its link to other disease areas;
3. Obesity, the medical profession and clinical training/education around obesity;
4. Obesity in schools and young people;
5. Obesity in the workplace and occupational health; and,
6. Obesity and its impact on the UK economy.

Against this backdrop, we seek to provide a definition of obesity and assess the clinical facts and evidence base against prevailing Government policy. Finally, we consider desired long-term results and outcomes, and examine how public health policy can be improved to better deal with the underlying causes of obesity and its consequences for general public health.

In addition to quantitative and qualitative analysis of current policies, our research methods included personal communications and interviews with healthcare experts, and a structured literature review of published papers and viewpoints expressed by leading writers on this wider subject area.

3. Obesity – The Facts

Given the amount of literature, political commentary and column inches that have been dedicated to the issue of obesity, it is important to take a step back and appraise the existing evidence base. This is fundamental to properly assessing the key clinical and medical facts and in turn understanding where Government policy can play an effective role and in what manner.

It is also important against the backdrop of Anne Milton's "tell it like it is" approach to calling people fat and the amount of media coverage – some might argue hysteria – surrounding this wider topic. After all, if we are going to start calling obese people "fat", this raises two critical questions: 1) what do we mean by "obese" and how should "obesity" be defined? And 2) how can we measure obesity to allow for an appropriate and accurate application of any said definition?

3.1. Definitions

According to the Oxford English Dictionary, the lexicographical definition of obesity is "the state of being fat or overweight" and that of an epidemic is "a sudden widespread occurrence of an undesirable phenomenon".⁶ Etymologically, the term obesity comes from the Latin word *obesus*, which roughly translated means intensive eating. For a long time, societies have been concerned with the problems of excess weight. Even the Greek philosopher Hippocrates dedicated some of his work to writing about the dangers of excessive weight. However, it was not until the mid-1600s that the word obesity started being regularly used as a medical and clinical term.

Although historical analysis is insightful, it is more important to look at modern day clinical and medical definitions of obesity. The World Health Organization (WHO) classification of weight is based on the Body Mass Index (BMI); a measure of obesity invented by the Belgian scientist Adolphe Quetelet (sometimes referred to as the Quetelet Index) and calculated by dividing weight by height. A BMI ≥ 25 means a person is overweight, while a BMI ≥ 30 means someone is "clinically obese".

There is no doubt that BMI has been, and continues to be, a very valuable tool. It has been pivotal in forming classification and surveillance systems and statistics. However, there are concerns about its usage and application.

BMI measures body weight and not the actual amount of fat a person is carrying. For example, athletes will frequently have a BMI > 30 , which is simply due to extra muscle mass.⁷ Body shape is also important, as it is possible for a person to have a normal BMI but a dangerously high waist circumference (WC); so-called "apple" shaped. A high WC is associated with greater risks of developing diseases like ischaemic heart disease and hence provides valuable additional information.

There are calls to directly measure body fat in populations. Aging populations, different racial groups and athletes all have different body fat to lean body mass ratios; this exposes the problem with the BMI as it fails to capture these differences. It simply looks at weight and height, and does not consider body fat or body shape. To put it crudely, someone could be categorised as obese according to their BMI, but actually be perfectly healthy and *vice versa*.

Speaking about the BMI as a measure of obesity, **Celebrity Chef and Television Broadcaster, Antony Worrall Thompson** told this paper: "*When thinking about obesity and its measurement, the most important thing is judgement and balance. It is not helpful to simply think about obesity in terms of BMI numbers and statistics as these can be*

misleading. I remember once meeting a schoolgirl who was “obese” according to her BMI, but the truth was she was perfectly healthy and by no means obese. It is important to use judgement, and not just categorise people based on numbers alone”.

It would therefore appear that consensus is lacking regarding the best way to define obesity and in turn the most appropriate way to measure the condition. It is from this perspective that definitions of obesity, particularly those solely reliant on the BMI, need to be placed in a broader and more meaningful context. This is fundamental to targeted and considered public health policies designed to counter obesity in the wider population.

For the purposes of this paper, we use the WHO definition, i.e. that is a BMI ≥ 25 , but importantly seek to place this definition in a broader context to allow for a more meaningful analysis of obesity as commonly understood.

3.2. Measuring Obesity in the UK

Given that the UK Government utilises comprehensive national health surveys, it is possible to reliably assess obesity rates using the WHO definition. When evaluating current obesity rates against retrospective data, a worrying trend emerges confirming the widely held hypothesis that obesity in the UK has significantly increased in recent years.

In 1980, 6% of men and 8% of women were classified as “clinically obese”. By 2002, rates had risen significantly to 23% and 25% for men and women, respectively. The largest increases in obesity over the last decade have been amongst the younger age groups. Childhood (2-15 years old) obesity rates now stand at 22% of boys and 28% of girls being classified as overweight or obese.⁸ Furthermore, in England 67% of men and 69% of women were overweight or obese in 2004.⁹ Specifically, obesity prevalence rates have increased nearly fourfold since the 1980s and by 300% amongst 10 year old boys and by 500% amongst 10 year old girls. Current predictions indicate that a shocking 60% of the UK population will be classified as being clinically obese by 2050.¹⁰

Obesity rates vary between the four devolved nations with rates higher in Wales and Scotland than England. Evidence shows rates are generally higher in women than in men, particularly in the Indian, Pakistani and Black Caribbean ethnic groups. Furthermore, obesity rates tend to increase with age and are directly linked to low incomes and low educational attainment.³ Obesity is also a major risk factor for the development of diabetes and heart disease, and can increase the likelihood of developing cancer.¹¹

One study demonstrated that in 2003/2004 7.3% of UK morbidity and mortality was due to overweight and obese individuals. This equated to a healthcare cost of approximately £3 billion or 4.6% of total NHS expenditure in 2002. Furthermore, these figures do not include indirect costs such as absenteeism due to sickness and associated productivity losses.⁴

3.3. Environmental Factors

The environment is widely accepted as a driving force behind the UK’s current obesity problem. A keystone of effective health policy, particularly in the context of public health, is to understand the wider living environment surroundings. This is critical to formulating

policies effective at reducing a given public health concern such as obesity and implementing appropriate strategies to tackle problems head on.

An “obesogenic environment” has been defined as “the sum of influences that the surroundings, opportunities, or conditions of life have on promoting obesity in individuals or populations.”⁶

Research has been carried out across the globe looking at the social determinants of obesity. Cummins et al demonstrated that putting a supermarket in a deprived area by itself does not improve eating habits.¹² Food purchased from restaurants and fast food chains are up to 65% more energy dense than the average diet.¹³ Evidence suggests that people who consume these types of food regularly weigh more than those that do not, and provision of fast food outlets is generally greater in deprived areas.⁷

New nutritional standards were introduced to schools in the UK in 2006, partly thanks to Jamie Oliver’s healthy eating campaign. Despite this, the past intense marketing of energy dense food to school children is thought to be in part responsible for current obesity problems.¹⁴

Research looking at perceived safety of the environment in which people live and their levels of physical activity have largely been conducted in the US. In general, no relationship is seen between perceived safety of the environment and levels of physical activity. Regarding accessibility to facilities to participate in physical activity, there is no consistent pattern, leading to mixed conclusions. There is no significant evidence to suggest that there is a positive association between levels of leisure time/physical activity and an appropriate enabling environment.⁶

A consistent pattern exists showing that adults living in more deprived areas have a decreased likelihood of engaging in leisure time physical activity. Hilsdon et al looked at whether access to green space influenced leisure time physical activity. This study demonstrated that there is no direct association between physical activity and access to green spaces.¹⁵

Much of the available evidence is based on cross-sectional comparisons. These are often hard to interpret and should therefore be treated with some caution. Nonetheless, it is difficult to contend or dispute the notion that the UK is confronting a serious obesity problem, which could be reasonably referred to as an epidemic of sorts. All current measures and projections indicate a significant rise in obesity. It is from this perspective that it is important to consider the prevailing UK response to obesity and how effective recent policy has been and is proving to be.

4. The UK Response to Obesity

Tackling obesity has become a public health priority within the UK having risen up the health policy agenda. Prior to the recent publication of the Coalition Government’s Public Health White Paper, the prevailing strategy in England for tackling obesity has predominately focused on five areas:

- 1) Promotion of child health;
- 2) Promotion of healthy food;
- 3) Building physical activity into individual's lives;
- 4) Promotion of health at work; and,
- 5) Effective treatment and support for overweight and obese individuals.

In recent years, target setting has been a key feature of health policy, but with highly variable and uncertain results. In 2007, the Labour Government set an overall target to reduce rates of overweight and obese children to year 2000 levels by 2020. Based on current projections, this target will not be achieved. In addition, all of the devolved nations have the stated aim of improving population diet and nutrition as well as increasing physical activity amongst children and adults. Evidence to date does not make for healthy reading.

The importance of marketing and advertising has also been widely recognised as being a key policy factor, not least in terms of providing accurate, clear and well-balanced information for public dissemination and consumption. For example, Ofcom, the UK regulator for the marketing and advertising of food products, has banned the advertising of high fat, high salt or sugary substances in or around programmes aimed at children (up to the age of 15). In 2007, Labour MP Nigel Griffiths introduced a Private Members' Bill which called for restrictions such as a pre-9pm watershed ban on junk food advertising. Griffiths' Bill failed as only 42 MPs voted for it at the Second Reading Stage.

Significant efforts have been made in schools to promote physical activity and healthy eating environments. There has also been a concerted effort to improve the nutritional quality of school meals particularly following Jamie Oliver's highly visible and public campaign.

One of the other main areas forming part of the obesity strategy in England has been supporting health and healthy living within the workplace. The Government is working to produce "healthy towns" using whole-town approaches to encourage physical activity.⁵

4.1. The Labour Years (1997 – 2010)

The Labour Government introduced a number of policies aimed at tackling obesity. At the heart of these plans was a public service target ambition to "be the first major nation to reverse the rising tide of obesity and overweight in the population by ensuring that everyone is able to achieve and maintain a healthy weight."¹⁶ Sadly, this aim has not been achieved as both adult and childhood obesity rates continue to rise.

The NHS Plan launched in July 2000 introduced the "5 A DAY Programme". This programme aimed to increase fruit and vegetable consumption, and increase access to information on the benefits of eating a healthy balanced diet. This has successfully penetrated into societies across the UK and is arguably one of the most successful public health campaigns in recent years.

The Department of Health (DH) published the *Choosing Health* policy paper in 2004. This document set out the key principles for supporting the public to make healthier and more

informed choices on a range of key public health issues including obesity. The proposals for tackling obesity specifically included:

- Improved marketing of healthy choices, such as a “5 a day” message on fruit and vegetables, and working with sports groups to promote the health benefits of exercise.
- Influencing industry to take more account of broader health issues and working with the food industry to improve food labelling.
- Ensuring that information is available to disadvantaged groups to help tackle health inequalities.
- Set a national target to halt by 2010 the increase in the level of obesity in children under the age of 11.
- Improve nutrition and physical education in schools and establish a healthy start scheme to provide mothers on low incomes with vouchers that can be exchanged for fresh fruit and vegetables and fresh or formula milk.

Obesity was no exception in the Labour Government’s obsession with targets. Yet targets have failed to stop the rise in obesity. In fact, the number of obese adults continues to increase. Moreover, some have complained that under Labour healthcare professionals have not always been properly informed of policies introduced to tackle obesity, for example the Healthy Start Programme where vouchers have been available. As a consequence, the impact has not been as great as it could have been. The Coalition has proposed that Physical Education (PE) remains a core subject within the National Curriculum, which is an important move to increase the amount of exercise children do to improve future health and wellbeing.

However, the current Government faced considerable embarrassment over plans to scrap Schools Sports Partnerships in England. Schools Sports Partnerships support joint initiatives between primary, secondary and specialist state schools designed to increase sporting opportunities for children. Ministers had called the partnership scheme a “complete failure”, arguing it had done too little to increase physical activity among young people. Teachers and athletes mounted a strong campaign against the original decision. This led to Michael Gove, Secretary of State for Education promising in December 2010 to salvage over £47 million from his department budget to ensure the scheme, aimed at increasing competitive sport, survives until the summer. While the Government u-turn is to be welcomed, it is crucial in future that enough funding is set aside to encourage sport in schools.

On a more positive note, the Government have set aside £10 million to establish an annual “schools Olympics”, which they say will help contribute to the legacy from the 2012 Games. The Government have also indicated that they are going to put in place extra protection to prevent the sale of playing fields which previous administrations of both colours have failed to act upon.

3.3.1. Foresight: Tackling Obesities: Future Choices

The Foresight: Tackling Obesities: Future Choices – Project Report was launched in October 2007 by Dawn Primarolo MP, then Public Health Minister. The report was

compiled by Foresight, the Government's futures think-tank. The project was sponsored by the DH and directed by Sir David King, Chief Scientific Advisor at the Government Office for Science.

This project examined the causes of obesity and produced a long-term vision on how to deliver a sustainable response to obesity in the UK over the next 40 years. Key recommendations from the report included:

- A need for “long-term strategies spanning several generations and beyond traditional planning cycles”.
- For every health professional to be trained to identify those at risk from increasing body weight and be skilled in the initial management of the condition.

This report offers very little in the way of concrete recommendations, concluding that the environment does influence physical activity and indeed obesity, but the mechanisms remain unclear. This Coalition's “Big Society” and localism agenda offer great hope in this very area. Indeed, this is the very essence of the idea of communities working together to not only influence the location, protection and even development of green and open spaces, but also to educate and encourage their local population to eat healthily and to exercise. Provision of resources is one thing but using them is another; it is local communities and local people that must reach out to their populations to educate and to encourage.

3.3.2. Cross-Government Obesity Strategy

The Cross-Government Obesity Strategy was published in January 2008 with the aim to promote the creation of a healthy society by working with employers, individuals and communities. The key elements of the strategy included:

- 1) Children, healthy growth and healthy weight** – This outlined the aspiration to see every child grow up with a healthy weight through healthy eating and increased physical activity. Key recommendations included encouraging mother breastfeeding; providing parents with child weight results; and making food technology a compulsory part of the National Curriculum.
- 2) Promoting healthier food choices** – This element embodied the vision for a future where healthier food is eaten and individuals are encouraged to increase the amount of fruit and vegetables they eat. The Labour Government outlined an expectation to see companies and employers promote healthy eating through the creation of a Healthy Food Code of Good Practice.
- 3) Building physical activity into our lives** – This set out the plan to encourage individuals and families to exercise regularly and to stay healthy. In order to achieve this, Government, businesses, local communities and other organisations will create urban and rural societies in which exercise is accessible and safe.
- 4) Creating incentives for better health** – This element outlined the vision for a future where employers value their employees' health and in which the long-term health risks arising from excess weight are effectively communicated to all members of staff.

5) Personalised advice and support – This set out the ambition for a future where individuals have access to highly personalised information to aid healthy living.

The Strategy made reference to a Food Standards Agency (FSA) survey that found that 89% of people slightly or strongly agreed with the statement that “eating healthily is very important to me”. 88% of people said that “parents should be strict with children and make them eat healthily”.

Importantly, the Cross-Government paper found that there are few areas of public policy where the positive benefits to lives, health and well-being are as dramatic as diet and nutrition. For example, if people were to adopt the following lifestyles the following health outcomes could be achieved:

- Increase fruit and vegetable intake to 5 a day – **42,200 deaths would be avoided every year**
- Reduce daily salt intake from average 9g to 6g – **20,200 deaths would be avoided every year**
- Cut saturated fat intake by 2.3% of energy – **3,500 deaths would be avoided every year**
- Cut added sugar intake by 1.75% of energy – **3,500 deaths would be avoided every year**.

At the time of publication the director of the Nutritional Policy Unit at the London Metropolitan University claimed it was “feeble fantasy” to state that labelling was the key. However, the latest progress report published by the government in 2010 reveals that childhood obesity levels are beginning to “level off”; perhaps this is an indication that policies are working? Change4Life has been well received with 400,000 families having signed up; over the previous 12 months over 2 million people visited the healthy weight calculator site. Many other policies have been introduced, but the progress report lacks data to illustrate whether or not their policies have actually been well received; how many people are actually cycling to work/school; how many pupils are actually doing 5 hours of PE per week; how many people are actually attending the new health checks for adults and teenagers.

3.3.3. Health Select Committee Report into Health Inequalities (March 2009)

In March 2009, the Cross Party Health Select Committee (HSC) published a report on health inequalities, which considered areas around public health. The report concluded that, whilst the overall health of the English population has increased over the last 10 years, health gaps between different social classes have widened by about 4% amongst men and 11% amongst women. This gap has come about because “the health of the rich is improving more quickly than the health of the poor”.

The report concluded that the underlying causes of this widening gap include lifestyle factors, including nutrition and exercise, but also wider determinants such as poverty,

housing and education. The report also recognises that there is a need for more intensive and targeted interventions in order to communicate to harder to reach groups.

The HSC noted that the Quality and Outcomes Framework (QOF) had made a start in tackling health inequalities, covering most of its major causes but so far has seen modest outcomes. However, the QOF was not actually designed for the purpose of tackling health inequalities; this was an unintended side effect. The Committee recommended that the QOF should be redesigned to take more account of health inequalities, and that doing so should be a specific objective during annual QOF negotiations.

The main focus of the Government's response to the HSC was on the Committee's criticism of the lack of evidence and evaluation used in implementing policies to tackle health inequalities. The Government has said that "there is no single formula or blueprint to tackle health inequalities but a systematic approach has informed Government action in this area." In response to recommendations around the QOF the Government welcomed the Committee's recognition of the potential value of the QOF in tackling health inequalities, and recognised that the Committee's evidence showed that there is still more to do in this area.

Whilst obesity was not mentioned a great deal in the HSC's report, it was right to conclude that the underlying causes of the widening health inequalities gap include lifestyle factors, such as nutrition and exercise, but also wider determinants such as poverty, housing and education. The report also recognises that there is a need for more intensive and targeted interventions in order to communicate to "harder to reach" groups.

The HSC also considered the "modest outcomes" that the QOF had achieved to date in public health and tackling health inequalities. The Bow Group's own report on the QOF called for the Government to urgently review the proportion of the framework which is geared towards prevention and public health.¹⁷ The report also explored the possibility of allocating QOF points to GPs for referring patients to weight management services.

Recently, an article published in the Journal of Epidemiology and Community Health shows that the QOF has narrowed health inequalities. In fact, the point is made that the best way to tackle health inequalities is to focus resources into driving up the QOF achievement particularly in deprived areas.¹⁸ The Kings Fund commented that from now on clear evidence should be presented to show how new QOF indicators reduce health inequalities; it is yet to be seen whether this will be adopted. Therefore, it is clear that the recommendations from the HSC's report are percolating through to the front line.

3.3.4. Change4Life – One Year On

Change4Life, the social marketing aspect of the *Healthy Weight, Healthy Lives* cross-governmental strategy in England, has recently celebrated its first birthday. To mark this, the DH published a report in February 2010 looking at the first year of Change 4 Life's operation, with particular focus on its achievements, its methods and strategy for the next year.

4.1.4.1. Achievements

In terms of changing behaviour and encouraging families to buy healthier foods, which is the seminal part of the programme, the report concluded that the first 12 months of Change4Life to be a success. There was a small percentage rise (from 77% to 83%) in the number of mothers claiming their children have adopted at least four of Change4Life's eight "behaviours" that make up a healthy lifestyle. Using a "basket analysis" of the Change4Life participants, it was also claimed that healthier beverages were being purchased, with "low-fat milks and low-sugar drinks" being increasingly preferred.

However, the report also acknowledged that there is scope for more research to be performed. The need for "in-depth analysis" of participants' shopping habits is mentioned, as is the need for academic research to judge whether people's "claimed behaviours are an accurate reflection of the changes they are actually making"; an important question yet to be fully answered. The flattening of the trend in childhood obesity in the year to 2009 was called "encouraging", but the report also acknowledged that "rates of obesity are still unacceptably high" and complacency was dangerous.

4.1.4.2 What They Did

Local Supporters

A key aspect of the Change4Life campaign is the use of "**local supporters**". A local supporter would perhaps be someone from a community whose job was to promote healthy lifestyles or it could be a member of the community who had a lot of influence with the campaign's target audience.

Change4Life asked Continental Research to undertake some quantitative research with these local supporters, asking how they'd promoted the Change4Life brand. 75% of those surveyed said they'd had conversations with others about healthy weight and eating well and over two thirds of people had given out Change4Life leaflets or put up a Change4Life poster. A full 23% of those surveyed said that they'd spoken to over a hundred people about Change4Life. What was also encouraging for the campaign was that very few people told researchers that their involvement in Change4Life would decrease in the next year; just 5% of respondents said this, compared to 44% who expected their involvement to increase.

Commercial Supporters

Change4Life works with commercial partners to deliver their message "not for their financial might but because of the close relationships that they have with the public." Building a coalition of partners, including the commercial sector, was judged to be one of the factors that has been critical to Change4Life's success to date.

In February 2010, Change4Life launched a fresh campaign looking to encourage overweight adults aged 45-65 to lose some weight and prevent the onset of "lifestyle diseases" such as diabetes. A set of behavioural goals has been developed with the help of the Food Standards Agency and the Healthy Weight, Healthy Lives Expert Advisory Group. If adopted, these goals can help adults maintain a healthy weight and can even help them lose weight. Many

of these behaviours are similar to the Change4Life target behaviours for families but there are some specific ones developed for adults related to liquid calories and fibre.

Analysis

It is fair to say that Change4Life has been successful in galvanising departments across Government to work closer together to tackle the critical problem of obesity. Five Government Departments (Department of Health (DH), Department for Education (DfE), Department for Culture, Media and Sport (DCMS), Department for Environment, Food and Rural affairs (Defra) and Department for Transport (DfT)) have run Change4Life activity and this has enabled joint working on a scale not seen before. The scheme also appears to have made some impact on the wider public with evidence of behavioural change as a result of the campaign with 35% of the 300 mothers with children under 11 asked saying they have taken some action after seeing Change4Life adverts between July and September 2009, compared with 28% between February and April 2009.¹⁹

A study from YouGov research found that cooking shows and documentaries are more influential than the Government's healthy eating campaigns.²⁰ If behavioural change on a scale not witnessed before is to be achieved more support is needed from the wider community including charities, local authorities and the commercial sector. Using this method the general public should be given better information to support their choices in a less prescriptive manner. The recently launched Great Swapathon is a great example of how this new approach works with families able to get a £50 book of vouchers for money off healthier foods and activities. Brands that have partnered with the Great Swapathon initiative include Asda, Unilever, Warburtons, JJB Sports and Haven Holidays.

4.2. National Institute for Health and Clinical Excellence (NICE) Obesity Guidance

In December 2006, NICE issued its first ever national guidelines addressing both the prevention and treatment of obesity in adults and children. The guideline on the prevention, identification, assessment and management of overweight and obesity in adults and children covers:

- How staff in GP surgeries and hospitals should assess whether people are overweight or obese
- What staff in GP surgeries and hospitals should do to help people lose weight
- Care for people whose weight puts their health at risk.
- How people can make sure they and their children stay at a healthy weight
- How health professionals, local authorities and communities, childcare providers, schools and employers should make it easier for people to improve their diet and become more active.

Responsibility for undertaking a review of this guidance at the designated review date has passed to the National Clinical Guidelines Centre for Acute and Chronic Conditions (NCGACC). The National Collaborating Centre for Primary Care is no longer active.

The guidance correctly identifies that diet changes and exercise, supported by behaviour change, should be the first-line treatment for adults who are overweight or obese, followed by drug treatments if lifestyle interventions are unsuccessful. It also recommends that bariatric surgery should be considered in exceptional circumstances for young people who have gone through puberty.

NICE recommends that the healthcare professional should:

- Talk to patients about the benefits of being physically active
- Suggest how patients could fit more physical activity into their everyday life, based on what they like doing and how easy it is for them to do it
- Suggest how patients could eat more healthily, based on their own likes and dislikes, and discuss how easy it is for them to buy food and prepare meals
- Help patients to come up with some realistic goals and give them some tips on how to achieve those goals (these might include, for example, how to cope in a situation where there is a lot of tempting sugary or high-fat food)
- Provide patients with written information and offer ongoing support.

4.3. Conservatives in Opposition

In Opposition, the Conservative Party focused a significant part of its proposed health policy looking at the issue of public health. Within this theme, the issue of obesity was prominent going into the 2010 General Election.

4.3.1 A Healthier Nation

In January 2010, the Conservative Party launched their Green Paper, *A Healthier Nation*, on Public Health. Obesity was highlighted as a particular problem with the paper stating that “...of all the health problems facing Britain, obesity is the most exaggerated by international standards and is growing alarmingly.” Since its publication much has changed in the world of politics. Nevertheless, the Coalition has strongly stated its commitment to dealing with the UK’s public health challenges including those posed by obesity.

4.3.2 The Coalition

After the 2010 General Election, the Health Secretary, Andrew Lansley, laid out his intentions for public health in his inaugural speech. Mr. Lansley declared that the Government would be spending less money on the high profile Change4Life campaign to encourage healthy eating and exercise and instead would ask industry and business to pay for it. In addition, the Health Secretary said there would be no new regulation of unhealthy foods adding that fast food companies had felt “stigmatised”. Although a contentious decision, this is arguably consistent with the Government’s desire to “nudge” rather than “nanny”.

4.3.2.1 Changing Change4Life

In July 2010, the Coalition Government announced that funding for the Change4Life programme will be scaled back. Mr. Lansley said the DH planned to use social media to get the Change4Life message across rather than traditional advertising campaigns. He added that it would become “less a government campaign, more a social movement”, with the Government asking charities, local authorities and the commercial sector to participate.

The cutting back of Change4Life has provoked much criticism. Dr Vivienne Nathanson, the British Medical Association’s (BMA) Head of Professional Activities, is worried that having industry at the helm of a potentially lifesaving strategy could damage what has so far proved an effective message: *“We think the campaign has been fantastic, really simple and impressive and has engaged the public. And some of the families in its target groups are quite difficult to reach. We need to not just educate people but to get them to commit to long-term changes. It might be expensive, but it could cut the cost to the NHS in the long-term.”*²¹

While it is too early to fully assess Change4Life it is fair to say that the initiative has made some progress in reaching a wider section of the population by using a positive campaign. However, the Coalition’s plans to develop the programme offer even greater potential. It is stated on the DH website that “the campaign aims to inspire a societal movement in which everyone who has an interest in preventing obesity, be they Government, business, healthcare professionals, charities, schools, families or individuals, can play their part.” We support the Government’s position that Change4Life must become more of a societal movement and indeed must have support from many different organisations and therefore, not just be a government led initiative. We think this proposal will help reach a much wider cross section of society.

4.3.2.2 Healthy Lives, Healthy People: Our Strategy for Public Health in England

The Coalition Government published their strategy for public health in November 2010. This White Paper sets out the Government’s long-term vision for the future of public health in England. The aim is to create a ‘wellness’ service – Public Health England – and to strengthen both national and local leadership.

Localism is a key theme of the public health strategy and will be at the heart of the Government’s proposed public health system. The White Paper confirms that the Government will publish a further policy document on obesity in 2011. Few details on the Coalition’s planned strategy are provided in *Healthy Lives, Healthy People*.

Analysis

The White Paper is right to conclude that public health is a cross-cutting imperative that transcends the boundaries of the NHS and health policy, and actually incorporates a variety of areas including the environment, poverty, education and housing. However, the proposals in the document are vague and for the future obesity strategy to be a success, it will be essential that all follow up proposals are clear and focused, moving above and beyond the rhetoric and platitudes of previous Government policy, with a clear plan of action as to how new policies will align with the “new NHS”.

The detail is needed. Indeed, this is particularly important and pertinent in light of the wide-ranging reforms, as embodied in *'Equity and Excellence'*, which are currently being implemented across the English NHS. It will be a significant challenge for the Government to ensure that priorities around public health remain firmly at the centre of the wider reform package being rolled out in the NHS. Much hangs on the promised obesity policy document.

5. Tackling Obesity

As the previous section shows, the previous Labour Government was by no means inactive in its attempts to formulate policies to tackle the UK's widely accepted obesity problem. Similarly, the Conservative Party in Opposition and now the Coalition Government have identified obesity as a major public health problem, and an issue that requires a new and focused policy response. This is most notably exemplified by the Government's commitment to publish a separate policy paper on obesity later this year.

With this in mind, we focus our policy recommendations around the following key areas:

- 1) Obesity in society and the general population;
- 2) Obesity and its link to other disease areas;
- 3) Obesity, the medical profession and clinical training/education around obesity;
- 4) Obesity in schools and young people;
- 5) Obesity in the workplace and occupational health; and,
- 6) Obesity and its impact on the UK economy.

5.1. Obesity in Society and the General Population

People in the UK today are not excessively more gluttonous, do not have significantly less willpower, and do not have fundamentally different biology compared with previous and recent generations. However, society has evolved. In particular, transport, food production and work patterns have all changed. This has led to an increased tendency for people to put on weight and indeed to retain that weight put on. For many, weight gain is largely an involuntary consequence of a modern day lifestyle. In addition, the socially and economically disadvantaged, as well as certain ethnic groups, tend to be more vulnerable.

Giving his view on the UK obesity challenges, **Antony Worrall Thompson**, told this paper: *"I do think there is an obesity problem in the UK, mainly caused by bad diet, poor lifestyles, lack of exercise and generally consuming more food than we need. Although food prices have gone up and hit some family budgets hard, food is still comparatively fairly cheap and that means it is accessible and people can eat too much. This is one of the causes. We can use all the excuses in the world, but if you eat too much, without compensating with exercise, you will become obese"*.

Worryingly, obesity is now seen as a passive phenomenon that is a gradual process resulting from our day to day lives. This so-called passive obesity makes healthy behaviour a real challenge. Given that weight is often difficult to lose, prevention is crucial – and prevention requires action.

This is not least the case because as obesity prevalence increases, it will become increasingly normal to be obese and this could reduce the desire to act. Policies to tackle obesity must therefore be aligned with other policy areas, such as social inclusion. Beyond this, interventions must be sustainable and long-term. Obesity in an individual does not happen overnight. It is an insidious process that typically happens over a sustained period of time. Similarly, changing habits and developing structures to support a healthy lifestyle takes time. There are no silver bullets.

Dr. Jason Halford, the Chairman of the Association for the Study of Obesity at Liverpool University, told this paper: *“We strongly support the sentiment of the [public health] White Paper to take long-term, concrete action on obesity across the life course, involving all stakeholders. We agree that a range of solutions are required, that one solution does not fit all and that innovative and specifically tailored solutions at local level may support the development of healthier behaviours in terms of diet, physical activity, and sedentary behaviour. Prevention remains the key to solving the obesity crisis and this will require significant investment and co-ordinated effort.”*

For many, it is now the case that organisations decide what food is available in the place of work, whether vending machines are on hand, and whether employees receive incentives for cars over bikes. There is a paucity of research looking into the environment in which people live and physical activity, but the general consensus is that residents in “highly walkable” neighbourhoods (access to shops, safety, green spaces) are more active and have lower levels of obesity.

When attempting to change a population’s behavioural attitudes to promote public health, positive results will only be achieved if change is maintained, managed and seen to be acceptable. Clearly, provision of facilities for sport and exercise is important to counter obesity. However, people in lower socioeconomic groups use such facilities less and thus provision alone is not enough. Active transport (walking, cycling) is important, but on its own is likely to have a small impact. The uncomfortable truth is that society must also address commuting distances, distances to shops, and schools.

Commenting on the management of weight problems in the UK and the need for a fresh approach, **Professor David Haslam, Chairman of the National Obesity Forum**, told this paper:

“Obesity is presently in epidemic proportions in the UK, and is here to stay. Society must become accustomed to the presence of obese and morbidly obese individuals in its midst, and accept them without discrimination. Obesity policy in the UK is limited to promoting prevention as the standalone priority: this approach is flawed. Attempting to prevent obesity in the UK is as futile as standing in a house fire and calling Health and Safety to check the wiring of the plugs, when the fire brigade is what’s required. Obesity prevention is indeed crucial for the next generation, but obesity management is crucial to this one, to ensure that we avoid consigning a lost generation to be written off because of their weight”.

It is a question to ponder as to why UK obesity policy has largely been limited to prevention alone as prevalence and incidence rates have rocketed particularly in the context of the QOF.

It is even more difficult to understand when reviewing the available evidence base. According to **Professor David Haslam**, this is a much misunderstood area:

“The authors of the Foresight report cited a lack of evidence for obesity management as the reason for its omission, despite many studies including Counterweight and MEND proving the opposite. Change4Life excused the exclusion of obese characters in the Saatchi ads, on the desire to avoid negative messages, and only showed lithe and lean individuals. In clinical practice, the QOF incentivises GPs to identify and register obese patients and weigh them again the next year to ensure they still qualify to earn more income for the Practice. There are no incentives for inducing weight loss. Management of the currently overweight and obese members of society must be prioritised alongside prevention. There is compelling economic evidence of the cost of obesity to the nation and to the taxpayer, not just to the health of the individual and the massive economic benefits of weight loss are well-documented.

However, it is reassuring that NICE has proposed that weight management advice or inclusion on a weight management programme should become part of the obesity QOF indicators.

As **Professor Haslam** advised this paper, there are four critical aspects that should be considered in managing an obese patient – three can be easily achieved, but one is extremely difficult.

The Haslam 4 Point Plan

1. **Identification and inclusion on a register.** This is a simple task and already incentivised.
2. **Screening of obese patients** for diabetes, lipid profile, blood pressure, sleep apnoea, and depression. The register already exists; it is a small extra step to include screening.
3. **Management of co-morbidities.** If diabetes, hypertension or dyslipidaemia is diagnosed, GPs have a proven track record in treating chronic diseases, thereby saving lives and money by avoiding expensive complications such as heart attacks, stroke and diabetic sequelae.
4. **Sustained weight loss** is almost impossible to induce in an individual patient, let alone a population, but is the one thing studied in trials and obsessed upon by the Government in maintaining obesity as the Cinderella risk factor. Actually, it is the least important of the four. If obesity management focused on the first three, an immediate difference would be seen in the health of the population, and cynicism amongst practitioners and taxpayers would be banished.

Professor Haslam also points to the potential role of alternative treatment:

“One outstanding method of simultaneously managing co-morbidities of obesity, whilst inducing sustained weight loss is bariatric surgery, for which the clinical and cost

implications are compelling. NICE provides a highly positive appraisal, but its use is being severely hampered by PCTs and SCGs who have created a postcode lottery, denying operations to those who desperately need it. With changes in commissioning imminent, bariatric surgery for severe and complex obesity must be wrestled from the hands of specialist commissioners, and prioritised by commissioning consortia”.

Recommendations

- 1. The QOF system should be changed so that GPs are incentivised not only to register obese patients, but to manage their patients so that they lose weight. The QOF needs to be urgently revised to include new targets for screening and offering weight-management advice.**
- 2. Public and private sector organisations should be incentivised in order to encourage and support healthy behaviour and habits in and around schools and throughout the work place (see section on obesity in the work place).**
- 3. Bariatric surgery should be a realistic option for all obese patients who are deemed appropriate for this intervention.**
- 4. Greater powers and greater freedom must be given to local government to tackle factors that affect health and wellbeing. In addition, local government, local councils and local organisations should continue to be encouraged to organise events to promote physical activity; for example, local runs, local bike rides and local walks. Ultimately, the aim should be to nudge people in the right direction.**
- 5. Government, businesses, schools, charities and community groups should be encouraged to promote and use Change4Life as a tool to tackle obesity.**
- 6. This paper supports active aging and the government’s proposals to work with local government, voluntary groups and older people to create opportunities to maintain physical and social activity.**

5.2. Obesity and Other Disease Areas

In this section, we explore the link between 1) obesity and cancer; 2) obesity and diabetes; 3) obesity and surgery; and 4) obesity as a side effect of medical treatment. This is particularly important in terms of better understanding obesity as a potential risk factor for other diseases, and the appropriateness of using “fat” as a description of “obesity”.

5.2.1. Obesity and Cancer

Obesity is a risk factor for many different types of cancer. It is estimated that between 30-40% of cancers could be prevented by more physical activity, better diets and the maintenance of an appropriate body weight. Globally, this represents between 3-4 million cases of cancer. As **Ms. Aisling Bernard MBE, Executive Director of Policy and Public Affairs at Cancer Research UK**, told this paper:

“There is convincing evidence that being overweight or obese increases cancer risk. After smoking, excess bodyweight is one of the most important modifiable risk factors for cancer.

Estimates suggest that current levels of obesity in the UK could lead to 19,000 cases of cancer every year. This represents over 6% of all cancer cases.

Being overweight or obese increases the risk of breast cancer in women who have been through the menopause, as well as cancers of the bowel, womb, oesophagus, pancreas, gallbladder and kidney. Studies have estimated that having a high body weight accounts for a quarter of kidney and gallbladder cancers.

There is also more and more evidence that being overweight or obese could increase the risk of many other types of cancer, including: brain cancer; leukaemia; liver cancer; multiple myeloma; non-Hodgkin lymphoma; ovarian cancer, before the menopause; aggressive prostate cancer; and thyroid cancer”.

It is therefore vital that Government, charities, industries and local communities all work together in the national interest to inform people of these risks and to help individuals, where necessary, to reduce their weight, engage in physical activity, and improve their diet.

In 2001, a study looked at the proportion of cancer cases attributable to obesity within the EU. Overall, the analysis found that 6.4% of cancers in women and 3.4% of cancers in men could be attributed to obesity. Breaking this down for the UK, the study demonstrated that obesity was responsible for the following proportions of each cancer type (Table 1).²²

Table 1: Proportion of cancer cases for which obesity is responsible²³

Cancer	Men	Women
Breast	N/A	7.8%
Colon	10.0%	9.8%
Endometrium*	N/A	36.1%
Prostate	4.0%	N/A
Renal	22.7%	22.7%
Gallbladder	21.4%	21.4%

NB: *Endometrium: The inner membrane of the uterus.

Another study concluded that “obesity is associated with more forms of cancer than previously reported.” They found that overall there was a 33% increased risk of developing cancer in obese patients compared to the non-obese.²³

These findings were confirmed and validated following communications with Cancer Research UK. Two large studies funded by Cancer Research UK – the EPIC study and the Million Women Study – have found that obese women have a 30% higher risk of postmenopausal breast cancer than women with a healthy weight. This means that if the average lifetime risk of breast cancer is one in nine, an obese woman’s lifetime risk is one in seven. In the case of oesophageal cancer, **Ms. Aisling Bernard MBE**, told us:

“Being overweight or obese increases the risk for a type of oesophageal cancer called “oesophageal adenocarcinoma”. Being overweight doubles the risk of developing this

cancer, and being obese can triple the risk. Experts have estimated that in Western countries, it causes about 37% of this type of cancer. In fact, the rates of oesophageal adenocarcinoma in white UK men are among the highest in the world and rising. Some studies have suggested that this type of cancer may be becoming more common because of rising levels of obesity”

5.2.2. Obesity and Diabetes

There is also a very strong link between obesity and the development of type 2 diabetes. In 2004, leading obesity and diabetes organisations, including The International Diabetes Federation, released a joint press release stating: “Urgent action is needed to avert a global public health crisis.” The press release went on to state that action is required to prevent obesity and diabetes epidemics, which will otherwise explode during this century.

Emphasis was also placed on physical activity and healthy diets being encouraged, and that access to energy dense foods and drinks should be controlled. The document also highlighted that in 2004 diabetes affected 194 million people worldwide, and it is predicted that this will reach a staggering 333 million by 2025. At the present time, diabetes and other obesity related diseases account for more deaths worldwide than AIDS. Finally, it is predicted that the prevention of weight gain could help to reduce by as much as 5% all cases of diabetes. As Professor Claude Bouchard (President of the International Association for the study of Obesity (IASO) has stated: “Governments and business communities have a vital role to play in fighting the current obesogenic environment.”²⁴

As **Mr. Simon O’Neill, Director of Care Information and Advocacy at Diabetes UK**, told this paper:

“Once again, we see a shocking rise in diabetes and obesity rates in the UK. Many, but not all, people develop Type 2 diabetes because they are overweight or obese so we must keep up the mantra of ‘five fruit and veg a day’, encourage daily physical activity, and warn of the potentially devastating consequences of an unhealthy lifestyle.

Specifically commenting on the need for a new set of policies and a fresh approach, **Mr. O’Neill** remarked on the following:

“The obesity-fuelled Type 2 diabetes epidemic is a clear example of where the new Coalition Government’s rhetoric of tackling health problems through prevention must be turned into action. Failure to act now means a bleak future of spiralling NHS costs and worsening public health. Diabetes is serious: if not diagnosed early or poorly managed, it can result in blindness and amputation or a shortened life expectancy from heart disease, stroke and kidney failure. Diabetes UK is encouraging people to go online and take its new Diabetes Risk Score test (www.diabetes.org.uk/riskscore) to find out about their risk of developing Type 2 diabetes. People at increased risk of Type 2 diabetes can often decrease or even reverse their risk by losing weight, increasing their physical activity levels and improving their diet”

Commenting on the UK's increase in the incidence of Type 2 diabetes, **Antony Worrall Thompson** told this paper: *"We have seen an increase in Type 2 diabetes, which is primarily an obesity problem. This can be directly linked to diet and what people eat"*.

5.2.3. Obesity and Surgery

Obesity is also a major risk factor for patients undergoing surgery. As **Dr Jodi Lestner**, a **first year academic junior doctor at Imperial College London**, told this paper it is a big problem for the surgeon and anaesthetist, but more crucially the patient themselves:

"The rising incidence of obesity in the UK greatly impacts upon the provision of safe anaesthesia and peri-surgical care. Problems arise from a number of factors related directly to high BMI (for example difficulty achieving adequate ventilation, slow recovery due to deposition of anaesthetic agents, and difficulty providing regional anaesthesia where landmarks are obscured), as well as the significantly increased risks due to associated conditions such as diabetes mellitus, deep vein thrombosis, myocardial infarction and stroke. In addition, the need for specific bariatric equipment and an increased need for post-operative critical care present logistical problems when preparing these patients for surgery. The additional costs, both for the individual and collectively, resulting from these issues is difficult to quantify, but is undoubtedly significant, as the large majority of surgical lists typically have at least one obese patient."

5.2.4. Obesity and Medical Treatment

It is important that the whole issue of obesity is placed in an appropriate context. This is particularly important when considering the tolerability of some drugs and medications and the potential for weight gain as a side effect. If society is to call obese people "fat", it is imperative that this is not misaimed or misdirected at ill patients who are overweight because of medical treatment.

As **Mr. Michael Hewitson**, a **Community Pharmacist and an expert in pharmacology and the use of prescription medicines**, explained to this paper, a common side effect of many medications is weight gain.

"Across the UK, millions of people take medicines which increase their risk of putting on weight. There are many, well known culprits such as antipsychotics and anti-depressants, but by far the most common are widely used corticosteroids, such as prednisolone, which is used for many inflammatory and auto-immune conditions such as Rheumatoid Arthritis, Crohns disease, and even asthma. While the effect on the waistline of most people may be little more than an annoyance, to a person who is already battling weight issues they may be enough to tip the scales. Underactive thyroid (hypothyroidism), undiagnosed tumors of the pituitary gland, or even giving up smoking are all genuine causes of weight gain – the issue of weight gain and obesity is not always as straightforward as simply blaming risky behaviours and unhealthy lifestyles".

As **Mr. Hewitson** went on to explain understanding the causes and reasons as to why someone is overweight or “obese” is essential in the context of wider health policy and political communication on this issue.

“While to some it may be seen as ‘straight talking’, and to others it may be serving a political purpose to call overweight people ‘fat’, the reality can often be less clear cut. Many of the medicines which are commonly used in psychiatry to treat schizophrenia or bipolar disease can produce significant weight gain; sometimes this may mean an increase of one or more stones in overall bodyweight. For patients who may be experiencing moderate to severe mental illness, life skills such as knowing which foods to buy or how to cook may be a significant challenge. For others with conditions affecting mobility, such as Rheumatoid Arthritis, where the prescribed medicines are commonly associated with weight gain, it may be difficult to exercise regularly or even at all”.

Given the visible role of pharmacy in local communities and the pharmacological expertise of pharmacists in terms of understanding the role of medications and their potential side effects, it is a question to ponder as to whether pharmacy has a greater role to play in advising and managing patients who suffer weight gain due to the medicines they are prescribed. As **Mr. Hewitson** told this paper, such an opportunity does exist:

“Patient education can be a big part of reducing the risk of weight gain with some medicines, simply warning a patient that it is a possibility can often be enough to provoke changes to behaviour. Pharmacists have a large role to play in helping to prevent drug-induced weight gain; the Medicines Use Review (MUR) service, and proposed First Prescription Service are designed to utilise the expertise of highly accessible and trusted healthcare professionals to educate people about their medicines. Psychiatrists in particular could make greater use of the MUR service, which involves the patient discussing their medicines in private with the patient’s regular pharmacist, in an attempt to improve their understanding and increase acceptance of the intended treatment. Encouraging people with mental illness to accept the advice and expertise of the pharmacist could pay long-term dividends in terms of preventing drug interactions (which can be both common and serious with psychiatric medicines) and treatment-limiting side effects which reduce outcomes and increase costs”.

Moreover, as **Ms. Aisling Bernard MBE, Executive Director of Policy and Public Affairs at Cancer Research UK**, told this paper:

“Clear, simple language can be helpful when talking to people about weight issues. We know that people often underestimate the impact that their weight is having on their health.

However, obesity is a complex problem that requires a multifaceted approach. Whilst personal responsibility should be an important part of this approach, an environment that supports and facilitates healthy choices must be established and individuals need to be encouraged to want to make healthier choices, recognising that their behaviour is influenced by others, including organisations and business, and the government.

Unhealthy behaviours are also related to wider societal issues such as relationships, wealth, unemployment and status within society. Encouraging or ‘nudging’ people to change their

behaviour without addressing the social problems that are linked to this behaviour won't be effective in tackling an issue as complex and vast as the current obesity epidemic”

Recommendations

- 1. The population should be educated and empowered so that they are aware of the health risks associated with obesity and are in the driving seat to confront this problem. This should be achieved through:**
 - a. Diet, lifestyle and levels of physical activity becoming integral parts of the standard medical history, like smoking and alcohol, as taught to medical students.**
 - b. All health professionals working together to educate their patients in managing their weight and leading a healthy lifestyle to tackle current obesity and to prevent future obesity.**
 - c. All healthcare professionals working in partnership with their patients so that decisions and action plans are shared and reached through mutual agreement.**
- 2. Improved access for all to supermarkets, green spaces and leisure facilities in conjunction with education and encouragement from health, social and education services.**
- 3. It is essential that the issue of obesity is placed in an appropriate and considered context. Often some people are overweight because of the side effects of drugs and medicines they are taking to treat a given illness or disease. Society must not fall into the trap of categorising and labelling vulnerable and sick patients as being “obese” or “fat”.**
- 4. The Government should continue with their plans for Change 4Life. In order to access all members of society from Moss Side in Manchester to Chelsea in London and indeed in order to have the maximal impact on population health, charities, community groups, Government, businesses, schools and others must work together to move Change4Life to this next stage.**

5.3. Obesity and Medical Education

Effectively training our future doctors and healthcare professionals in the causes, management and prevention of obesity is essential. After all, if medical professionals do not have a full and proper understanding of the underlying causes of obesity, and the best available treatment pathways for obese patients, there is little chance and hope for the wider population or “average man on the street”.

Currently, obesity receives very little attention in the undergraduate curriculum. Recently, a study looked at nutrition education amongst medical students in US medical schools. The study concluded that the amount of nutrition education that medical students receive continues to be inadequate.²⁵ In a UK study, 90% of medical students and 87% of nursing

students agreed that part of their role was to counsel obese patients. 45% of medical students and 63.5% of nursing students felt that they should have received more teaching on obesity at that particular time in their course, in contrast to only 23.7% of dietetic students.²⁶

The General Medical Council's (GMC's) document, *'Tomorrow's Doctors'*, states the outcomes that new UK graduates must be able to demonstrate. In their latest edition (2009), there is only one mention of obesity and this is in the context of "discussing sensitive issues." Furthermore, obesity is mentioned in the Foundation Doctor curriculum, but surprisingly we found separate sub-sections for smoking and alcohol yet not for obesity.

We spoke with a number of medical students and first year junior doctors to consider their views on obesity education in the undergraduate and postgraduate curricula. The overarching view is not only surprising and revealing, but actually rather worrying. For the purposes of transparency and context, we provide the near full transcripts from the interviewed experts.

Dr. Karen Findlay, a Foundation Year 1 Doctor at the Royal Blackburn hospital and recent graduate from Manchester Medical School, told this paper:

"For the most part, I think the curriculum I followed has covered the major medical problems I am faced with on a day to day basis. However, there appears to be one rather large gap in my knowledge, namely, the effects of obesity on our health.

We all know being "fat" is undesirable on many levels...be it for our health or aesthetically. Obesity is a growing problem facing today's medical practitioners and is one often overlooked by current medical curricula. When our knowledge falls short on a topic, so too I fear, does our ability to treat such patients adequately, which is clearly worrying.

My knowledge, as well as the knowledge of many of my peers, on the complexities of dealing with the obese patient, or the true cost to the NHS that this lifestyle choice is having, is something of a mystery. For this reason, I feel it should be something that features in 21st Century medical curricula much more than it does currently, in order to prepare the modern doctor for the modern challenge that is our nation's obesity crisis!"

Dr. Robert Morgan, a Foundation Year 1 Doctor at the Oxford Radcliffe NHS Trust and a recent graduate from University College, London Medical School, echoed a similar opinion:

"During the preclinical years, we had 6-7 lectures on the biochemistry of lipid synthesis plus the associations between obesity and nutrition. During the clinical years, there was little emphasis on "obesity" as a medical condition other than if your clinical tutor was an Endocrinologist with a specialist interest in obesity – this was rare. There was also minimal discussion during our Obstetrics module regarding the link between maternal mortality and obesity and the complications associated with delivery".

Mr Matko Marlais, a final year medical student at Imperial College, London, reinforced this viewpoint. Talking about the need for better teaching around health promotion, we were told:

“Current medical school curricula contain more public health teaching than they have in the past, but health promotion is still an area which is taught sporadically. I would argue that medical students should be actively involved in health promotion from their first day on a clinical attachment. Medical schools should encourage students to use their knowledge for health promotion purposes. For this to happen, health promotion teaching will need to be formalised, and medical students should be taught principles such as brief motivational interviewing. Some medical schools have formalised teaching on smoking cessation which is a step in the right direction, this now needs to be extended to other public health issues such as obesity to ensure that healthcare professionals of the future can play their crucial role in health promotion”.

Mr. Andrew Gough, a final year medical student at Manchester University, explained the need for teaching to provide a better overview of the medical and surgical options available to treat obese patients:

"The widespread prevalence of obesity has meant that all undergrad medics should have been exposed to the 'overweight' patient and the consequent complications and while we haven't had any explicit teaching on obesity, I do feel that most students have an awareness of the health complications of being overweight. Where I do feel an improvement could be made is in the management of overweight patients, for example the professional advice we should be offering these patients and an improved understanding of the medical and surgical options available to reduce weight."

This view was echoed by **Miss. Mary-Ellen Lynall** who is a second year graduate student at Oxford University:

“In my course to date, we haven't received specific teaching on obesity, although it has featured in lectures on diabetes and atherosclerosis. When it is discussed, the teaching focuses on the physiology of adipose tissue and its endocrine effects, rather than the problems of daily living which obese people experience. It is treated alternately as a risk factor and a lifestyle choice, rather than a condition. Having now begun the clinical section of my course, I would appreciate more holistic teaching on the problems associated with obesity.”

Echoing the sentiments of the Junior Doctors we interviewed, **Antony Worrall Thompson** told this paper, there are problems with the current approach to medical training: *“We have got to have more nutritional training for doctors and healthcare professionals. GPs are going to be in charge of much of the NHS through local GP consortia. I think GPs should have a nutritionist on board as part of every consortium to help fill this gap. In the longer-term, medical training needs to be improved to deal with this public health problem”.*

Due to the autonomy that medical schools have in delivering their curricula, it is clear that there is variation in the teaching emphasis placed on obesity. However, there is little doubt that urgent improvement is needed across British medical schools, and indeed postgraduate schools, so that our next generation of doctors are better equipped with the basic knowledge and skills to tackle the obesity crisis confronting the UK. Based on our research, this is a

gaping hole in the current policy approach and one that needs to be filled quickly should salutary improvements be achieved.

Recommendations

- 1. Nutrition must form a greater part of the undergraduate medical and nursing curricula. Specifically, students should be aware of the causes, consequences and management principals of obesity. This should specifically feature in the GMC's publication Tomorrow's Doctors.**
- 2. The management principles of obesity should specifically feature in post graduate curricula for all specialities as this is a problem that affects every aspect of medicine.**
- 3. Obesity management is multidisciplinary. Obesity education is required for all health professionals. Therefore, we recommend pooling resources and educating all healthcare professionals together in a truly multi-disciplinary format.**
- 4. The Government should consider Antony Worrall Thompson's idea of making it mandatory for all GP consortia and Health and Wellbeing Boards to have professional representation from a nutritionist to ensure appropriate skill mix.**

5.4. Obesity, Children and the Education System

There are two key aspects to childhood obesity: 1) parents and upbringing, and 2) schooling and the education system.

5.4.1. Obesity, Parents and Upbringing

The most significant risk factor for childhood obesity is parental obesity¹².

The Tackling Child Obesity joint report in 2004 emphasised that policies and legislation must ensure safe outdoor play; safe transport to and from school by bicycle and by foot; and protection from influential advertising that can promote the inappropriate consumption of energy dense food and drink.

The National Obesity Forum (NOF) has found that for many children obesity will continue into adult life as habits established early in life are always more difficult to change. It is clear that health problems are likely to present at an earlier stage if obesity continues into adult life. The NOF also states that childhood obesity may have a negative impact on future income and educational attainment. Parental responsibility is recognised as a crucial component in tackling childhood obesity. At the most obvious level, parents create the environment in which their child lives. Therefore, they have the power to create an environment that fosters healthy eating and physical activity and hence an environment that can almost prevent outright childhood obesity.²⁷ Professor Leonard Epstein (Professor of Paediatrics at the University at Buffalo and a leading authority on childhood obesity) gives three key reasons as to why parents are crucial in the fight against childhood obesity:

1. Obesity runs in families and so it is illogical to target interventions at one family member when the rest may be engaging in behaviour that's the opposite to what the intervention is encouraging.
2. Parents are role models for their children.
3. Parents may be needed to use behaviour changing strategies such as positive reinforcement²⁸

It is well recognised that the environment in the womb can affect the child's subsequent likelihood of developing obesity. For example, women who suffer from diabetes, under-nutrition or over-nutrition during pregnancy, all increase the risk of their child subsequently becoming obese. Many researchers also believe that breast feeding does have a protective effect against obesity. Currently, data implies that how parents feed their children in early life influences how they regulate their food intake later on during childhood. There is also evidence to suggest that children will often develop preferences for food associated with positive contexts.

Dr. Jason Halford, Chairman of the Association for the Study of Obesity commented that *“the specific focus on maternal health and the early years fits closely with current thinking regarding intervening at critical periods during the life course to prevent obesity.”*

In addition, it is absolutely clear that physical activity is a key part in preventing childhood obesity. The Framingham Children's Study has shown that children of active mothers are twice as likely to be active as children of inactive mothers. When both parents are active children are 3.8 times as likely to be active than their counterparts where both parents are inactive. Outdoor play is essential for increasing children's activity levels.²⁹

As children grow older, parental influence decreases. It is vital that parents ensure healthy food is readily available at home and in addition that they themselves also eat this food. Parents are crucial for providing support and encouragement.

Evidence would suggest that programmes should aim to improve parenting behaviour. Amongst the most successful school-based programmes are those that have a parenting component.²³

Dr Halford told this paper that *“the expansion of the family nurse programme would play a key role in providing support to those families most in need. The expansion of Change4Life and suggested schemes to improve access to fruit and vegetables are also welcomed.”*

Recommendations

1. **Obesity prevention must be the overarching aim in childhood obesity policy.**
2. **Parents play a vital role in providing an environment that encourages a healthy lifestyle.**

- a. Antenatal classes should provide education to pregnant mothers and fathers on how to provide a healthy diet and environment for their child. Specifically, obesity should be targeted and openly discussed.
 - b. Classes should also focus on how parents should manage their own health and well-being. Obesity should be mentioned specifically given the rising numbers of obese adults, the impact their health and behaviour has on their children and the effects of obesity on infant mortality rates.
 - c. Post-natal care should follow antenatal care providing encouragement, support and further education, to enable parents to provide a healthy environment for their children and themselves.
 - d. This paper supports the Government's proposals to increase the number of health visitors to deliver the healthy child programme and to expand the Family Nurse Partnership. Supporting parents is a key part of tackling childhood obesity.
3. As recommended by Government reports, parents must be enabled to purchase fruit and vegetables. We support extensions of the government's vouchers scheme enabling parents to purchase frozen fruit and vegetables.
 4. Programmes aimed at reducing childhood obesity should target children and parents. Targeting either in isolation is less likely to be a success.
 5. Healthy living should be a key consideration for the Government while they are implementing their education reforms including the early intervention strategy.

5.4.2. Obesity and Schooling

Schools have an important role to play in tackling childhood obesity.

80% of schools now have healthy schools status and it is increasingly recognised that there is a relationship between healthy pupils and high academic achievement. Since 2008, Primary Care Trusts (PCTs) have been writing to families informing them of their child's BMI for reception and year 6 pupils. In Nottingham, evidence shows that 30% of parents subsequently responded to follow-up help and advice.

Dr. Jason Halford commented further saying, *"The Association for the Study of Obesity strongly supports the continued collection of data on children's weight at ages 4/5 and 10/11 through the National Child Measurement Programme. Furthermore, we strongly support the monitoring of adult weight status as this is where the greatest burden of excess weight lies and parental weight is a key determinant of children's weight."*

A leaflet entitled "Top Tips for Top Kids" is sent to families nationwide with this BMI measurement and it covers areas such as the 8 key messages for tackling childhood obesity. These include amongst others eating five portions of fruit and vegetables per day and promoting 60 minutes of activity per day. The school nurse is a key member of the team for

promoting health as is the class teacher who can support their pupils and develop targets based on the Every Child Matters outcomes.

Schools will also often have members of staff who are responsible for engaging with families, which may include family cooking clubs to encourage a healthy diet. The school sports co-ordinator is also instrumental in effecting change and not only can they engage with pupils but they can also engage with families. For example, Tottenham Hotspur has introduced a programme that encourages parents as health champions, where they have established a before school parents' netball club.³⁰

Dr. Jerry Wales, a Consultant Paediatric Endocrinologist with a specialist interest in childhood obesity, told this paper:

“In the long-term, clearly prevention is the best option, but children who are already severely overweight and obese and suffering the consequences of this requires medical help and should not be forgotten. There is some slight evidence that the rate of increase of childhood obesity is now slowing down and this has also been seen in other countries. However, we do live in an obesogenic environment and it is difficult for young people today not to gain excessive weight. This is due to the ready availability of calorifically dense food and the lack of opportunities to exercise coupled with such things as parental anxieties about walking to school.

If prevention does not work and for children who are already overweight or mildly obese there are a large number of community-based programmes currently available in England. All these programmes are characterised by being able to produce short-term weight loss in children and families who engage with these programmes. However, a fairly large number of families drop out of the programmes or do not attend in the first place and my experience is that they are almost always characterised by re-gaining weight after the programme finishes.

We are now seeing type II diabetes in children; we estimate about 35 children in the United Kingdom are receiving overnight ventilation because they are so obese and will probably die from a cardiac or respiratory death before young adulthood. We are seeing a large amount of non-alcoholic fatty liver disease and all of these complications are really only treatable by weight loss. The only solution to massive obesity, with body mass index equivalent to over 40 in adult life is bariatric surgery. Our hospital pioneered the use of bariatric surgery in people less than 16 years of age. There is good evidence that this is a curative procedure for type II diabetes as well as preventing other complications”.

Antony Worrall Thompson told this paper that “calling people fat” is not the way to solve the obesity problem, but rather there was a urgent need for better education: *“We need to have a more forward-thinking policy than is currently the case. The responsible Health Minister coming out and telling us that we should call people fat is all absolute nonsense really. It has to start with education. If this is not happening within the family, then schools need to take control of the issue. I think obesity and healthy eating are perhaps a bit more on the radar and generally monitored following the Jamie Oliver campaign, but not as much as it should be or as is needed. Schools need to take responsibility and I would be in favour*

of introducing initiatives such as weighing children at the start of term and the end of term, and including this information in school reports so parents can track a child's weight and be aware of any problems"

Recommendation

- 1. Strategies to tackle obesity must be long-term and not short-term fixes. Community programmes, school initiatives, advertising campaigns must provide continued, long-term support for individuals suffering from obesity.**
- 2. Strategies to tackle obesity must be evidence based and proven to be cost effective.**
- 3. Schools must play an increasing role in obesity management and prevention. Education campaigns aimed at their pupils must continue but parents and carers must be involved. Healthy Living should be a key consideration in the Government's reform of the National Curriculum.**
- 4. Physical education and sport must remain a core subject for all pupils in all years at primary and secondary schools.**
- 5. The Government should use their plans to slim down the curriculum to allow more opportunities for young people to undertake activities outside the classroom to help reduce obesity levels.**

5.4.3. Obesity in the Workplace and Occupational Health

It is clear and backed by evidence that by reducing the prevalence of obesity, particularly in those with a BMI > 35, could ultimately lead to significant savings for employers. It is becoming increasingly recognised that obese employees take significantly more short-term and long-term sick leave than their non-obese counterparts. Therefore, it is in the employer's best interest to become involved with tackling obesity.^{31 32}

Psychosocial stress at work has been shown to be an independent predictor for the development of type 2 diabetes mellitus in women.³³ This demonstrates the well known link between psychological well being and physical health.

The business, Unilever, launched "Fit Business", which aimed to improve the health and fitness of their workforce. They successfully engaged employees in health checks, they provided attention-grabbing adverts on nutrition in canteens and they truly empowered their staff rather than simply lecturing to them. The majority of people in the UK spend a significant proportion of their lives at work, emphasising further the importance of the workplace engaging with efforts to stem the rising number of obese individuals. In addition, behaviour in and around the workplace can have a profound effect on an individual's body habitus.

One NHS trust in the UK has introduced flexible working to enable physical activity before, during or after work. In addition, they are trying to make their staff more active by encouraging them to cycle or walk to work, by providing information on local leisure facilities and by establishing a lunchtime activity group. They have also provided health and

nutrition education to their employees as well as ensuring that all catering provided by the trust, including vending machines, includes healthy options for food and drink. Staff are also encouraged to have a break for their lunch and to eat it in a hygienic area. This is one organisation's efforts to try and curb the rising prevalence of obesity.

Sadly, this is not typical of the rest of the NHS. A recent report published by the Royal College of Physicians and the Faculty of Occupational Medicine revealed that only 15% of NHS trusts have a policy to help combat staff obesity. NHS staff should be leading by example; this not only improves their health but increases the likelihood of their patients following their advice.³⁴

Recommendations

- 1. We call on businesses (public and private), organisations, voluntary groups and other employing institutions to ensure that they promote healthy living amongst their employees:**
 - a. Walking or cycling to and from work must be promoted.**
 - b. Clubs promoting physical activity should be established. For example, lunchtime running clubs.**
 - c. Healthy food and drink should always be available in canteens and vending machines.**
 - d. Change4Life should be used by our public and private sector organisations.**
 - e. Schools and work places should promote and actively engage in local events such as walks, runs, triathlons and others.**
- 2. This paper supports the Government's welfare reform package, their framework for enterprise and job creation and their focus on health and well being at work. Getting people to work and ensuring they are happy at work are central to reducing the levels of obesity.**
- 3. Putting mechanisms in place is essential. Equally essential is educating workforces so that they engage with the policies that are established. Therefore, all institutions must educate, train and inform their employees on WHY a healthy life style is important; HOW they as individuals can lead a healthy lifestyle; and HOW the organisation is going to help them achieve this.**
- 4. As emphasised previously all workplaces should create healthy living champions who are charged with seeing through this agenda.**
- 5. The Government must consider how it can support small and medium sized businesses in the implementation of the aforementioned strategies.**

5.4.4. Obesity and its impact on the UK economy

*“The estimated cost to the NHS of obesity-related conditions is £4.2 billion each year”. Department of Health, ‘Healthy Lives, Healthy People: Our Strategy for Public Health in England’, page 20.*³⁵

Public health, and therefore the issue of obesity, is not just a health imperative. It is also an economic imperative. As the Bow Group’s recent response to the public health White Paper outlined, this is particularly important against the backdrop of the UK’s yawning budget deficit and the current economic climate.³⁶ Although the argument surrounding the “politics of prevention” has largely been won – after all, it would be extraordinary to see a politician argue in favour of the 10 pints a day, 20 fags in the back pocket and donor kebab with extra chilli sauce in the evening lifestyle – the truth is that the argument in favour of the “economics of prevention” has yet to be convincingly won.

This is arguably a consequence of hitherto Treasury and Whitehall thinking about the need for short-term gains to fit the political and parliamentary cycle. It should be clear that if the UK is serious about public health it needs to invest (not just financially, but also politically and conceptually) and be committed to that investment over the long-term and not just the short-term.

Successful public health outcomes can help reduce the burden on the NHS and in turn alleviate resource pressures on a financially stretched healthcare system. It is from this perspective that the Government’s policies for improved public health confer an important economic reality – and obesity is one area where this is highly applicable.

This economic reality is true in a number of ways. It is important in the sense that, although healthcare should primarily focus on the health of an individual, it should also look to provide wider societal benefits to individuals and communities. When taxpayer money is spent on higher education, it has the benefit of educating individuals, but it also has the benefit of up-skilling the workforce so as to benefit business and to attract investment. When taxpayer money is spent on transport, it helps connect people but it also improves business linkages and therefore productivity and efficiency for the wider economy.

Commenting on Government policy, **Antony Worrall Thompson** told this paper a long-term approach is desperately needed if the UK is to tackle its obesity problem and if the NHS and UK economy is to save money: *“I think the problem down the years has been that governments and the media have made knee-jerk reactions, as seen with the Jamie Oliver campaign, without thinking 20 years down the line and what is best in the long-run. I think if we were to invest in a proper long-term strategy such as taxing unnecessary foods and ploughing that money into free school meals that are healthy and encourage a structured and well-balanced diet, the NHS and society would save an absolute fortune – and of course the UK economy would benefit. We need to think long-term about how we are going to solve the problem as things like Type 2 diabetes are going to get worse. We need more innovative initiatives to encourage things like sport and exercise. It could be things like ensuring that access via cars to schools is limited so people actually have to walk to school rather than being dropped off outside the classroom. This way you would have to at least walk a few 100 yards!!”*.

Successful public health interventions can help improve the health of the nation at large. This is inherently good for individual wellbeing, but it is also good for society. If people are healthier and fitter, they are less likely to lose their jobs through ill health and more likely to be able to enter the workplace if out of work. They are also more likely to deliver greater productivity in the work place. All of this is good for the economy and for business, particularly in the current economic climate and given that the UK needs to maximise “injections” rather than “withdrawals”.

This has recently been highlighted by the Employment and Learning Minister in Northern Ireland, who explained that achieving a healthy workforce is essential to achieve higher business growth, better productivity and international competitiveness. He also stated that obesity costs the Northern Ireland economy approximately £500 million each year and that it causes the loss of approximately 260,000 working days. It is this value-based argument that Andrew Lansley and co must continue to make to their Treasury colleagues to ensure public health, and tackling obesity, is given appropriate financial backing.

6. Summary of Policy Recommendations

Tackling Obesity

1. The QOF system should be changed so that GPs are incentivised not only to register obese patients, but to manage their patients so that they lose weight. The QOF needs to be urgently revised to include new targets for screening and offering weight-management advice.
2. Public and private sector organisations should be incentivised in order to encourage and support healthy behaviour and habits in and around schools and throughout the work place (see section on obesity in the work place).
3. Bariatric surgery should be a realistic option for all obese patients who are deemed appropriate for this intervention
4. Greater powers and greater freedom must be given to local government to tackle factors that affect health and wellbeing. In addition, local government, local councils and local organisations should continue to be encouraged to organise events to promote physical activity; for example, local runs, local bike rides and local walks. Ultimately, the aim should be to nudge people in the right direction.
5. Government, businesses, schools, charities and community groups should be encouraged to promote and use Change4Life as a tool to tackle obesity.
6. This paper supports active aging and the government’s proposals to work with local government, voluntary groups and older people to create opportunities to maintain physical and social activity.

Obesity and Other Disease Areas

7. The population should be educated and empowered so that they are aware of the health risks associated with obesity and are in the driving seat to confront this problem. This should be achieved through:
 - a. Diet, lifestyle and levels of physical activity becoming integral parts of the standard medical history, like smoking and alcohol, as taught to medical students.
 - b. All health professionals working together to educate their patients in managing their weight and leading a healthy lifestyle to tackle current obesity and to prevent future obesity.
 - c. All healthcare professionals working in partnership with their patients so that decisions and action plans are shared and reached through mutual agreement.
8. Improved access for all to supermarkets, green spaces and leisure facilities in conjunction with education and encouragement from health, social and education services.
9. It is essential that the issue of obesity is placed in an appropriate and considered context. Often some people are overweight because of the side effects of drugs and medicines they are taking to treat a given illness or disease. Society must not fall into the trap of categorising and labelling vulnerable and sick patients as being “obese” or “fat”.
10. The Government should continue with their plans for Change 4Life. In order to access all members of society from Moss Side in Manchester to Chelsea in London and indeed in order to have the maximal impact on population health, charities, community groups, Government, businesses, schools and others must work together to move Change4Life to this next stage.

Obesity and Medical Education

11. Nutrition must form a greater part of the undergraduate medical and nursing curricula. Specifically, students should be aware of the causes, consequences and management principals of obesity. This should specifically feature in the GMC’s publication Tomorrow’s Doctors.
12. The management principles of obesity should specifically feature in post graduate curricula for all specialities as this is a problem that affects every aspect of medicine.
13. Obesity management is multidisciplinary. Obesity education is required for all health professionals. Therefore, we recommend pooling resources and educating all healthcare professionals together in a truly multi-disciplinary format.
14. The Government should consider Antony Worrall Thompson’s idea of making it mandatory for all GP consortia and Health and Wellbeing Boards to have professional representation from a nutritionist to ensure appropriate skill mix.

Obesity, Children and the Education System

- 15.** Obesity prevention must be the overarching aim in childhood obesity policy.
- 16.** Parents play a vital role in providing an environment that encourages a healthy lifestyle.
 - a. Antenatal classes should provide education to pregnant mothers and fathers on how to provide a healthy diet and environment for their child. Specifically, obesity should be targeted and openly discussed.
 - b. Classes should also focus on how parents should manage their own health and well-being. Obesity should be mentioned specifically given the rising numbers of obese adults, the impact their health and behaviour has on their children and the effects of obesity on infant mortality rates.
 - c. Post-natal care should follow antenatal care providing encouragement, support and further education, to enable parents to provide a healthy environment for their children and themselves.
 - d. This paper supports the Government's proposals to increase the number of health visitors to deliver the healthy child programme and to expand the Family Nurse Partnership. Supporting parents is a key part of tackling childhood obesity.
- 17.** As recommended by Government reports, parents must be enabled to purchase fruit and vegetables. We support extensions of the government's vouchers scheme enabling parents to purchase frozen fruit and vegetables.
- 18.** Programmes aimed at reducing childhood obesity should target children and parents. Targeting either in isolation is less likely to be a success.
- 19.** Healthy living should be a key consideration for the Government while they are implementing their education reforms including the early intervention strategy.

Obesity and Schooling

- 20.** Strategies to tackle obesity must be long-term and not short-term fixes. Community programmes, school initiatives, advertising campaigns must provide continued, long-term support for individuals suffering from obesity.
- 21.** Strategies to tackle obesity must be evidence based and proven to be cost effective.
- 22.** Schools must play an increasing role in obesity management and prevention. Education campaigns aimed at their pupils must continue but parents and carers must be involved. Healthy Living should be a key consideration in the Government's reform of the National Curriculum.
- 23.** Physical education and sport must remain a core subject for all pupils in all years at primary and secondary schools.

24. The Government should use their plans to slim down the curriculum to allow more opportunities for young people to undertake activities outside the classroom to help reduce obesity levels.

Obesity in the Workplace and Occupational Health

25. We call on businesses (public and private), organisations, voluntary groups and other employing institutions to ensure that they promote healthy living amongst their employees:
- a. Walking or cycling to and from work must be promoted.
 - b. Clubs promoting physical activity should be established. For example, lunchtime running clubs.
 - c. Healthy food and drink should always be available in canteens and vending machines.
 - d. Change4Life should be used by our public and private sector organisations.
 - e. Schools and work places should promote and actively engage in local events such as walks, runs, triathlons and others.
26. This paper supports the Government's welfare reform package, their framework for enterprise and job creation and their focus on health and well being at work. Getting people to work and ensuring they are happy at work are central to reducing the levels of obesity.
27. Putting mechanisms in place is essential. Equally essential is educating workforces so that they engage with the policies that are established. Therefore, all institutions must educate, train and inform their employees on WHY a healthy life style is important; HOW they as individuals can lead a healthy lifestyle; and HOW the organisation is going to help them achieve this.
28. As emphasised previously all workplaces should create healthy living champions who are charged with seeing through this agenda.
29. The Government must consider how it can support small and medium sized businesses in the implementation of the aforementioned strategies.

7. Concluding Thoughts

The Coalition Government's proposed public health reforms present a unique opportunity to tackle the issue of obesity, and its associated challenges, head on. At a time of fiscal restraint in the "Age of Austerity", the NHS can ill afford the significant cost associated with treating and dealing with obesity. Obesity costs the UK millions every year, not just in terms of healthcare expenditure but also through economic "withdrawals" resulting from productivity losses at work and forced absenteeism, and on current projections shows no signs of waning as many people pile on the pounds and put their health at risk.

The reasons for obesity are invariably a result of a combination of different, often complex reasons ranging from environmental to social factors to medical and genetic issues. The Coalition Government has rightly continued the work of the previous administration in looking at the issue across governmental departments rather than simply as a DH problem to be solved. And there is a big problem to be solved. Yes, some media coverage and press attention has been over-hyped and misguided, but in the end the evidence is compelling and most of us who have our eyes wide open can see there is a problem with unhealthy living and obesity.

However, the problem cannot be solved by central Government intervention alone and will ultimately need individuals to take more personal responsibility if society is to turn the tide. “Nannying” will not work and has not worked. It is also contrary to Conservative principles. The key is to nudge and educate to improve people’s awareness, and the decisions and actions they take as a direct consequence. Those on the far right-wing tend to argue “do nothing” as anything other is an apparent erosion of personal freedom. Those on the far left-wing argue for full scale intervention claiming that people are incapable of making proper decisions. The truth is that neither perspective is particularly helpful or insightful, and does very little to advance a genuinely important public health challenge.

Andrew Lansley is right to focus the frontline obesity drive away from a Government campaign to more of a social movement, utilising and maximising the important contributions of charities, local authorities and the commercial sector where possible. It is from this perspective that tackling obesity confers an important opportunity for the “Big Society”; an opportunity the Prime Minister would do well to take as his “mission in politics” continues to be challenged and doubted.

The early sounds from the Government have been positive, but it is absolutely essential that strong rhetoric is backed up with clear detail and a strategy for implementation. With something as delicate, difficult and complicated as public health, this is not always easy. This is the challenge for the Government’s soon to be published obesity strategy, and something interested stakeholders will be following closely.

The Government is right to put early intervention at the centre of its policies and as such it logically follows that it would make sense to urgently prioritise the tackling of childhood obesity. This will be particularly important given that evidence suggests obese children are likely to go on to become obese adults, and the associated escalation in obesity related health problems with age.

In the end, obesity is neither attractive from a health point of view nor affordable from an economic standpoint. Tackling it not only constitutes good health, but also good business.

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Further Information

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