Woking 2050

A Vision for a Sustainable Borough



Foreword

Fast forward to 2050...what do we want Woking to look like? What kind of place do we want Woking to be? 2050 is a long way off, possibly too far ahead in the future to contemplate but the reality is that to influence positively the future of the Borough for generations to come, we need to plan and act now.

Woking has long been committed to protecting the environment. Our first Climate Change Strategy was adopted in 2002. We have achieved a lot since the original Strategy was published and much has been made possible through working in partnership with key stakeholders, commercial partners and volunteer organisations to meet our common environmental goals.

Our previous strategies have focussed on carbon reduction. Woking 2050 is not just about carbon. It takes a look at our whole way of living and how it can influence our environment. Balancing our environmental aspirations and the Borough's needs for development and economic prosperity is at the heart of our goals.

The aim of this strategy is to coordinate a wide range of objectives into one comprehensive document that can be used by the Council and Woking's residents, businesses, community groups and others to reduce the Borough's impact on the environment.

I believe that sustainability is one of the most important issues that we as a Council have to tackle and I am proud that we have made good progress over the years. However, we still have a long way to go and we hope that by working together we can positively influence the future of the Borough as an enterprising, vibrant and sustainable place to live, work and visit.

CIIr Mrs Beryl Hunwicks

Portfolio Holder for the Environment and Sustainability and Chair of the Council's Climate Change Working Group

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1.0 Introduction

Woking 2050 provides an overarching vision to coordinate our efforts to create a sustainable Borough by reducing our impact on the environment. Our previous strategies have focussed on carbon. Woking 2050 is not just about carbon, it takes a look at our whole way of living and how it influences our environment. As a Council we have a role to bring together our combined potential to make a difference to the future of the Borough.

Woking 2050 is the follow up Strategy to the Council's Climate Change Strategy (2008-2013). Using various information sources to build a picture of the demographic, socioeconomic and environmental changes predicted for the Borough, we have put together a vision for Woking in 2050. Essentially we look at the type of place and community we hope Woking will be and how we can all help shape and achieve it. We also look at the opportunities, threats and challenges to achieving this vision.

The Strategy is long term in its outlook and runs to 2050. It is based around a series of themes that contribute to Woking as a place and in achieving the long-term vision. It defines the vision, aims and targets for the Council as well as the wider aspirations for the Borough that we think we can achieve by working together. In this way, we hope that Woking 2050 is a document that is accessible by the variety of readers for whom it is intended ranging from school children, to householders, to Council staff and Councillors, to stakeholders. Throughout the Strategy we have signposted to further information and technical details for each section which can be found in the Strategy's appendices. Accompanying the Strategy will be a series of rolling three-year action plans that will set out measurable actions that will contribute to improving the Borough's sustainability within defined timelines and responsibilities.

Woking 2050 provides a framework to coordinate our efforts to create a sustainable Borough by reducing our impact on the environment. Our goal is a Borough:

- that protects and enhances its high quality natural environment;
- where resources are used wisely and biodiversity is conserved;
- that has a built environment that is developed sustainably, which meets local needs and enables the local economy to prosper;
- that recognises, prepares and adapts to the socio-economic; environmental and demographic changes that the future will bring.

We hope that by working together we can positively influence the future of the Borough for generations to come.

Want to know more?

Appendix 1 details the policy and research context for the Strategy and the science behind the reasons we need to plan for the future.

2.0 The Vision for Woking 2050

Fast-forward to 2050...what do we want Woking to look like? What kind of place do we want Woking to be?

Woking Borough Council's own vision is Towards Tomorrow Today supported by three thematic aims of People, Place and Us. Key to this is the Council's aim to create an enterprising, vibrant and sustainable place. The Council pledges to create a sustainable community which has a strong identity and is a place where people want to be. The aim is to achieve this by:

- Maintaining a high quality natural environment where resources are used wisely and biodiversity is conserved;
- Creating a high quality built environment which meets local needs, and enables an enterprising culture to flourish and the local economy to prosper; and
- Providing, in collaboration with partners, the physical and electronic infrastructure to enable efficient and integrated travel and to support high quality electronic services.

This creates a strong foundation for Woking 2050 and the type of place and community we hope Woking will be. Our goal is a Borough:

- that protects and enhances its high quality natural environment;
- where resources are used wisely and biodiversity is conserved;
- that has a built environment that is developed sustainably, which meets local needs and enables the local economy to prosper;
- that recognises, prepares and adapts to the socio-economic; environmental and demographic changes that the future will bring.

Each theme will contribute to these through the theme targets and sub-actions, further details of which will be included in the rolling three-year action plans accompanying the Strategy. The Strategy is designed to enable us all, whether we live, work or are visitors to the Borough, to help shape and achieve this vision.

2.1 Why 2050?

The significance of the year 2050 lies in the climate change targets which were central to the previous Climate Change Strategy and continue to be relevant in the context of national legislation. The UK's Climate Change Act seeks to reduce greenhouse gas emissions by 80% by 2050 on the 1990 baseline. This was adopted as a local target at the time of the last revision of the Climate Change Strategy.

2050 is a long way off - perhaps too far away to contemplate. However, the reality is that "the future depends on what we do in the present" (*Mahatma Gandhi*). This Strategy hopes to positively influence the future of the Borough for generations to come – the very ethos of sustainability.

A long-term vision requires strategic planning for the future. The key objectives within the vision, together with the theme targets, will form the basis of an action plan that will accompany the Strategy. These will be complemented by intermediate goals and targets recognising that achieving this vision will not be a quick fix.

Appendix 1 details the policy and research context for the Strategy and the science behind the reasons we need to plan for the future.

2.2 The Statistics – What will Woking look like

Using a variety of information sources this section paints a picture of the demographic, socio-economic and environmental changes predicted for the Borough. It takes a snapshot of what Woking Borough looks like currently in terms of population; number of houses; etc, and how this is predicted to change for 2050.

2.3 **Demographic**

The Council's Core Strategy paints a picture of how Woking has evolved since the town emerged from the coming of the railway in 1838. The population of Woking Borough has grown from under 5,000 in 1851 to 99,567 (mid 2013 estimates for Woking). The ONS subnational projections (based on 2012 estimates) predict this to increase to 114,000 in 2037¹.

This will mean a 14% increase in 24 years and with population growth, pressures on the local environment can occur. By planning for the future we can help safeguard the local environment to be enjoyed by those living and working in the Borough now and in the future.

While considering these figures, it is important to note that the ONS highlight the projections are trend-based, making assumptions about future fertility, mortality and migration levels based on trends in recent estimates, usually over a five-year reference period. They give an indication of what the future population size and age and sex structure might be if recent trends continued. They are not forecasts and take no account of policy nor development aims that have not yet had an impact on observed trends.

2.4 Socio-economic

Woking Borough Council's Economic Development Strategy outlines a vision for Woking:

Woking has the potential to be Surrey's economic hub; recognised regionally, nationally and even internationally as a premier location from which to do business. It will offer a modern yet quality environment with a wide range of amenities across retail, leisure and culture. It will be a location where businesses wish to locate to, where people want to visit and where people want to live.

¹ Appendix 2, Section 2 🛛

Given the objectives of Woking 2050 and Woking's reputation as a Borough with 'green' credentials, it is important that economic growth is sustainable and smart. The Economic Development Strategy cites the principles of Smart Growth as "...using technology and innovative ways of working to increase productivity without damaging...quality of life or the environment...".

According to Smart Growth UK, a national coalition pursuing sustainable communities, planning and transportation, smart growth is a sustainable approach to planning that emphasises compact and accessible urban communities and opposes urban sprawl and car dependency. It seeks traditional ways of planning towns based around local services, ease of walking and cycling and good public transport, particularly rail. It also looks to encourage a sense of community.

Examples of how this can be enabled are:

- Facilitating significant population and continued economic growth, through high quality, sustainable brownfield redevelopment for housing, commercial space and transport networks is key. This will help to accommodate projected growth not only in Woking but across the South East as businesses and their staff locate within the Borough.
- Embracing sustainable living, working and transport trends such as making use of technology and flexible working to lessen the impact on the environment, whilst enabling businesses and staff to enjoy a productive work/ life balance.
- Actively promoting the Borough's sustainability initiatives to inward investors such as sustainable transport schemes and renewable and sustainable energy generation.
- Working with local business and commercial property owners/agents in promoting modern, sustainable stock that is energy efficient.

Key growth statistics for the Borough include:

- A Core Strategy target of at least a net additional 292 dwellings per annum.
- Woking Town Centre alone (considered a Primary Retail Centre) has proposed levels of growth in retail and commercial floorspace supported by the Town, District and Local Centres Study and Employment Land Review. Approximately 27,000 sq.m of additional office floorspace to be provided in the town centre as part of mix-used developments up to 2027. Potential for up to 75,300 sq.m of additional A class floorspace including 67,600 of A1 retail made up of 59,300 sq.m of comparison and 8,300 sq.m of convenience floorspace up to 2027.
- The Employment Land Review (2009) forecast that total employment in Woking is set to experience steady growth with the Borough's economically active population set to grow at a rate of 2.7% (as predicted at the time).

These figures and others from a number of Council research projects and papers inform the Council's Local Development Framework and Core Strategy.

2.5 Environmental

What was Woking Borough like in 1980? Can you picture it or remember how it looked? How will our local environment change over the next 35 years? It's difficult to visualise but with the help of some key resources we can identify the factors that will be key to shaping its future.

The demographic and socio-economic changes outlined above will inevitably shape our environment. We've also identified the following environmental factors that will have a bearing on how the Borough's environment is set to change and forthcoming Council policy documents that will help to shape and protect it:

- Local climate scenarios: Appendix 1 outlines the latest scientific findings from the UN's IPCC report on climate change. More locally, Climate South East predicts that the south east of England is likely to see greater volatility of weather by the 2050s more intense downpours, more severe droughts and floods, and more extreme heatwaves. Essentially we are due to see more extremes in weather with an increase in temperature and rainfall variability, together with more frequent and extreme summer heatwaves and very wet winters. Summer temperatures are predicted to increase by 2.8%; winter rainfall is predicted to increase by 16% and summer rainfall is predicted to decrease by 19%.
- **Carbon emissions targets**: Woking 2050 will continue to adopt the Government's Climate Change Act (2008) targets for carbon emission reductions i.e. to reduce (greenhouse gas) emissions by 80% by 2050. Woking's 1990 baseline is estimated to have been 895,440 tonnes² so the target is to reach 179,088 tonnes by 2050. The latest statistics from the Department of Energy and Climate Change (DECC) show that in 2013, Woking's carbon emissions were 575,952 tonnes. Domestic and industrial/commercial emissions account for approximately 40% each; with transport accounting for approximately 20% of the Borough's carbon footprint.³
- Site Allocations DPD: The Council is preparing a Site Allocations Development Plan Document (DPD) to allocate sites for development and protection. This DPD will be part of the Development Plan for Woking Borough and is critical to the delivery of the Woking Core Strategy. Site allocations will be illustrated on an updated Proposals Map. Further information is available from http://www.woking2027.info/allocations
- **Development Management Policies DPD**: The Council has drafted a Development Management Policies DPD, which contains detailed development management policies on various issues to help determine day to day planning applications. This will facilitate the delivery of the Woking Core Strategy (2012). Further information is available from http://www.woking2027.info/management

² Appendix 2, Section 4 🛛

³ Chapter 4: Emissions targets for 2050

- Housing Standards Review: In early 2015, it is anticipated that the Government will publish a statement of policy setting out how new nationally described standards for energy and water will be applied. Currently, the Code for Sustainable Homes offers a voluntary national standard for the sustainable design and construction of new homes. Its aim is to reduce carbon emissions and promote higher standards of sustainable design above the current minimum standards set out by the Building regulations. The Housing Standards Review is reviewing the current building regulations framework and voluntary housing standards with the aim of rationalising the large number of codes, standards, rules, regulations and guidance that add unnecessary cost and complexity to the house building process while delivering quality, sustainability, safety and accessibility. The review is considering accessibility; space; security; water efficiency; energy; indoor environmental standards; materials; process and compliance.
- **Biodiversity and Green Infrastructure Strategy**: The Council will be developing a Biodiversity and Green Infrastructure Strategy and Action Plan. This will set out how the Council will work with partners to ensure biodiversity protection and security while also enhancing accessibility to our natural habitats and wildlife and promoting the benefits that enjoying our green spaces can bring including to our own health and wellbeing. A key component of the Strategy will include the Green Infrastructure Strategy. Green infrastructure is defined as a network of multi-functional green space, urban and rural, which is capable of delivering a wide range of environmental and quality of life benefits for local communities (National Planning Policy Framework). This will set out the Council's strategic approach to green infrastructure in the Borough by identifying the existing network and identifying gaps for potential new provision. It will provide guidance to help inform planning decisions.
- **Biodiversity action planning**: A Biodiversity Partnership has been convened by Woking Local Agenda 21 including membership from the Surrey Wildlife Trust and Horsell Common Preservation. The partnership will be key to assisting the Council in developing an Action Plan for the Borough to sit alongside the Biodiversity and Green Infrastructure Strategy. Collaborative working with partners will help achieve the objectives of the Strategy to protect and enhance the Borough's rich and diverse wildlife and habitats.

Want to know more?

http://www.woking2027.info/corestrategy/adoptedcorestrategy.pdf http://www.woking.gov.uk/council/strategies/ecdevstrategy http://www.metoffice.gov.uk/climate-guide http://www.woking.gov.uk/planning/policy/ldfresearch http://www.climatesoutheast.org.uk/index.php/climate/climateChange http://www.woking.gov.uk/planning/policy/ldfresearch/greenbeltreview http://www.ons.gov.uk/ons/publications/re-reference-tables.html?edition=tcm%3A77-335242 http://www.ons.gov.uk/ons/publications/re-reference-tables.html?edition=tcm%3A77-246448 http://www.ons.gov.uk/ons/rel/snpp/sub-national-population-projections/2012-basedprojections/rpt-snpp-2012-based-methodology-report.html http://www.smartgrowthuk.org/

3.0 Opportunities, challenges and threats

The opportunities, challenges and threats in the context of the vision for Woking 2050 are outlined in this section. By recognising the potential impacts and preparing in advance, it will mean we will be better protected against the negative impacts such as more extreme flooding that changes in our environment may bring. It also means that we will be in a better position to take advantage of positive outcomes and opportunities like enhanced tourism prospects or growing different plants and creating new habitats. By embracing and planning for adaptation, the less it will cost and the better prepared and more resilient we will be. The importance of behaviour change in underpinning technology and policy developments is also a factor.

The Surrey Community Risk Register provides public information about the hazards that exist within the County and the control measures that are in place to mitigate their impact. The Register was published in response to the Civil Contingencies Act 2004 and can be accessed through the Surrey County Council website (see link below). Using the Register as a guide, the table below has been created to summarise, adapt and highlight the threats, challenges and opportunities to Woking Borough relevant to the Woking 2050 Strategy.

Category	Туре	Effect?	Description	Likelihood
Challenge	Air quality	Environment;	Local air quality issues exacerbated by	With population changes and
		Health	changes in climate	possible increases in
				congestion, issues are likely to
				become more frequent / more
				severe.
Challenge	Wildfire / Heath fire	Environment;	Wildfire affecting heathland can result in	Events likely to become more
		Social	significant natural environment impacts e.g.	frequent / more severe
			special protection areas etc. If severe, it can	recognising changes in climate.
			also result in the evacuation of properties	
			and closure of roads affected by dense	
			smoke.	
Challenge	Storms and high	Environment;	Storm force winds; mean speeds in excess of	Events likely to become more
	winds	Social; Health;	55mph with gusts in excess of 85mph. Likely	frequent / more severe
		Economic	damage to properties and infrastructure.	recognising changes in climate.
Challenge	Heavy snow	Environment;	Snow falling and lying for at least one week	Events likely to become more
		Social; Health;	with further snow fall after. Likely disruption	frequent / more severe
		Economic	to transport, business, utilities, schools.	recognising changes in climate.
			Vulnerable sections of the community	
			impacted.	
Challenge	Heatwave	Environment;	Extreme heatwave declared if temperatures	Events likely to become more
		Social; Health;	reach above 32°C and minimum	frequent / more severe
		Economic	temperatures above 15°C for at least five	recognising changes in climate.
			consecutive days and nights. Disruption to	
			utilities and transport intrastructure.	
			vulnerable sections of the community	
Challenge	Drausht	F assing a set	Impacted.	Evente likely to become survey
Challenge	Drought	Environment;	Prolonged period without rainfall leading to	Events likely to become more

		Social; Health;	depletion of stored water reserves. May lead	frequent / more severe
		Economic	to supply disruption and use of stand pipes.	recognising changes in climate.
Challenge	Flooding	Environment;	Groundwater; fluvial; flash; localised flooding.	Events likely to become more
		Social; Health;	Disruption to transport and infrastructure.	frequent / more severe
		Economic	Property damage / evacuation resulting in the	recognising changes in climate,
			need for alternative accommodation in some	particularly wetter winters.
			cases. Waterborne diseases / contamination.	
			Need for flood prevention measures.	
Challenge	Infectious disease	Social; Health	Pandemics / epidemics could occur in one or	May present more of a
	such as Flu		more waves affecting significant proportions	challenge with population
	pandemic		of the population. Impact on health service	growth.
			and other critical services.	
Opportunity	Hotter drier	Environment;	Opportunities for increased tourism; different	Changes in climate could result
	summers – more	Social; Health;	species of plants and wildlife;	in a more Mediterranean climate
	frequent extremes in	Economic		for the South East of England
	temperature.			
Opportunity	Increased take up of	Environment;	Increased public awareness regarding	By working with partners there is
	energy efficiency	Social; Health;	energy efficiency and renewables could see	a real opportunity to increase
	measures and	Economic	local business expand. Health; environmental	take up of these measures
	renewables		and economic benefits from warmer and	recognising likely changes in
			more efficient homes. Reduced energy bills	climate.
			resulting in savings in carbon and money. An	
			opportunity for Planning and developers to	
			work together to ensure new developments	
			incorporate smart design features that are	
			tuture-proof to changes in climate e.g.	
			mitigating against solar gain; enhance	
			drainage etc.	
Threat and	Protection of local	Environment;	Changes in climate resulting in changes or	Impacts likely recognising

opportunity	wildlife species and habitats.	Social	even losses to local wildlife species and habitats. An opportunity to work with partners to help protect and enhance the local environment and even introduce new species and enhance habitats given the likely	changes in climate.
			changes in climate.	
Threat and opportunity	Traffic and congestion	Environment; Social	As our Borough economy grows and the population increases it is likely that our roads may become more congested with increased levels of traffic. This could have an impact on the environment and on health as air quality may be a subsequent issue. However, there is an opportunity to work with partners to provide an integrated network that promotes sustainable modes of transport.	Impacts likely given changes in population and economic growth predicted for the Borough.

<u>Challenges</u> are noted as existing issues which will be ongoing or exacerbated in the scenario of Woking 2050.

<u>Threats</u> are noted as new issues which may come to light in the future due to changes in environmental, social, economic, social factors / influences.

<u>Opportunities</u> are noted as new issues which may present positive outcomes for the Borough.

The table above gives an indication of the factors to consider as the Borough moves forward to 2050. Many factors will interlink and threats may also provide opportunities. This Strategy aims to outline how these factors can be managed.

Want to know more?

http://www.surreycc.gov.uk/people-and-community/emergency-planning-and-community-safety/emergency-planning/community-risk-register

4.0 Emissions targets for 2050

Woking 2050 continues to adopt the Government's Climate Change Act (2008) targets for carbon emission reductions i.e. to reduce *(greenhouse gas)* emissions by 80% by 2050. As per the Government's targets, Woking 2050 will use a 1990 baseline. Woking's 1990 baseline is estimated to have been 895,440 tonnes so the target is to reach 179,088 tonnes by 2050. The latest statistics from the Department of Energy and Climate Change (DECC) show that in 2013, Woking's carbon emissions were 575,952 tonnes.

		% of		% of		% of		Per capita
	Industry &	Total		Total		Total		emissions
	Commercial	Emissions	Domestic 🛛	Emissions	Transport	Emissions	Total	(tonnes)
2005	219.6	36.5	236.9	39.4	143.5	23.8	601.8	6.6
2006	222.9	36.8	237.7	39.3	143.2	23.6	605.4	6.5
2007	216.1	36.4	233.8	39.4	142.2	24.0	593.6	6.3
2008	215.3	36.4	237.3	40.1	137.2	23.2	591.3	6.2
2009	197.3	36.1	215.2	39.4	132.3	24.2	546.3	5.7
2010	215.6	37.3	231.2	40.0	129.4	22.4	577.7	5.9
2011	211.2	38.8	203.3	37.4	127.9	23.5	543.9	5.5
2012	239.9	40.8	220.4	37.4	126.9	21.6	588.6	5.9
2013	233.6	40.6	217.7	37.8	123.2	21.4	576.0	5.8

Table: Woking - Local CO2 emissions estimates, kT, 2005-2013 (published by DECC June 2015) (*Figures may not add due to rounding*)

Our homes and the Borough's commercial and industrial activities account for approximately 40% each of our carbon footprint. Meanwhile transport accounts for approximately 20% of the Borough's carbon footprint. If these proportions were to continue forward to 2050, in order to reach the goal of an 80% overall reduction in emissions, we would need to see the following reductions across the sectors:

2013 Emissions



5.0 Theme 1: Home is Where the Heart Is

Theme summary: This theme looks at how making changes to our everyday activities at home can contribute to a sustainable Borough. Energy and water use; the amount of waste we produce; how we shop; and our health and well-being all have an impact. By making small changes, we can all help contribute to a more sustainable, healthier and more economical lifestyle for families and individuals and a greener future for Woking.

Theme targets and objectives:

- In line with Surrey Waste Partnership targets and national/local performance indicators, continue to reduce residual waste collected from households (SWP Strategy currently being reviewed, to be available in 2015)
- In line with Surrey Waste Partnership targets, continue to increase the Borough recycling rate (SWP Strategy currently being reviewed, to be available in 2015)
- Work with partners to provide an integrated transport system that promotes lower carbon and healthy transport choices.
- Work with partners to reduce the number of children travelling to school by car.
- Work with partners to promote healthy lifestyles including eating well and being more active.
- Work with partners to implement flood risk management activities to help reduce the consequences of future flooding in the Borough.
- Work with partners to promote awareness amongst householders of flood protection measures to build resilience to properties.
- Work with Action Surrey to help homeowners make their homes more energy and water efficient.
- Address affordable warmth in our partnership work with Action Surrey and with the health sector and include it in the future development of a Health and Well-Being Action Plan for Woking.
- All new residential and non-domestic buildings to be built to zero carbon standards from 2016 and 2019 respectively.
- Work with partners to promote awareness of water efficiency amongst Woking residents.
- Encourage residents to reduce consumption and consume local produce and use local services.
- Continue to work with New Vision Homes in providing quality homes for residents that meet with frameworks such as the Housing Health and Safety Rating System.
- Continue to work with New Vision Homes in delivering schemes that increase the wellbeing of residents in line with the New Economics Foundation's Five Ways to Wellbeing. This includes connecting residents with the community; encouraging an active lifestyle; and offering skills training.

Our aim is to create a Borough where our residents can contribute to, and benefit from, a more sustainable, healthier and more economical lifestyle and a greener future for Woking.

Home is where the heart is...So many aspects of the way we live, in and around our homes, can have an impact on the environment and we want to help people understand that impact and make informed choices on how it can be reduced.

In this section we cover some of the main aspects of home life and running a household – whether you live in a small but perfectly formed studio flat or a grand stately mansion – and how small changes can make a big difference to our environment, to our well-being and to our bank balances!

Utilities:

The average household spends 5% of its income on energy (2012 figure from ONS report Household Energy Spending in the UK, 2002-12). According to OFWAT the average household bill for water and sewerage is £354 (for the Thames Water company area - £449 for Southern Water company area). By saving energy and water you not only help your bank balance but you can also reduce the impact you have on the environment. Action Surrey is a county-wide impartial energy advice centre, working with local councils across Surrey to help homeowners, schools and businesses save money on their energy bills, keep warm and reduce their environmental impact. Find out how they can help you: <u>www.actionsurrey.org</u>

As fuel prices continue to rise, affordability of fuel becomes more difficult, especially for those that are more vulnerable in our community. According to the ONS report, retired households consistently spend a greater percentage of their income on household fuel than non-retired households, even after accounting for winter fuel payments (ONS report Household Energy Spending in the UK, 2002-12). Action Surrey has developed a programme of support to help vulnerable people in the community in order to enhance health and well-being through warm homes initiatives. By working with the care community through service providers and agencies, Action Surrey is providing training for front line workers visiting vulnerable people in their homes to identify those eligible for support and assistance to tackle fuel poverty and to keep warm. Find out more at <u>www.actionsurrey.org</u>

For water efficiency tips, check out http://www.woking.gov.uk/environment/climate/canyoudo/la21/t ips#water

Local water companies also offer advise on using water efficiently: <u>https://www.affinitywater.co.uk/saving-water.aspx</u>

Shopping: Purchasing power! What we buy and where we buy it from can have an impact on the environment. Buying local produce;

supporting local markets; using long-life bags etc can all make a positive difference. For more tips on sustainable shopping visit

http://www.woking.gov.uk/environment/climate/canyoudo/gree npages/produce

http://www.woking.gov.uk/environment/climate/canyoudo/gree npages/sustainableshopping

Waste: Woking Borough Council empties over three million wheeled bins every year and thanks to our residents we recycled 59.7% of household waste in 2013/14. Woking Borough Council operates a selection of services to make recycling easy, simple and convenient for our residents. Find out more at http://www.woking.gov.uk/environment/wasterecycle/househol dwaste

Garden: Getting out in the garden is great for playing with the kids; stoking up the barbecue or lazing about on a hot sunny day. But our gardens, whether small or large, can also play an important part in greening our urban and suburban environments. RHS research shows that 'urban greening' can contribute to storm water mitigation which helps to reduce garden flooding; provide a source of habitats for wildlife; and Find improve air quality. out more at https://www.rhs.org.uk/science/gardening-in-a-changingworld/urban-planting

Household Maintenance:

Maintaining your home can help keep running costs down. For instance, installing energy efficiency measures such as draught proofing and topping up loft insulation could save you up to £45 a year on heating alone. Action Surrey can help assess what might improve your home and assist with installation. http://www.actionsurrey.org/house

And if you're thinking of doing some DIY, it may be worth incorporating some other measures at the same time. The Energy Savings Trust has some useful tips for improving your home: <u>http://www.energysavingtrust.org.uk/Take-action/Improve-your-home</u>

If you live in an area that is susceptible to flooding, thinking about how to make your home more resilient by keeping sandbags easily accessible; investing in air brick protectors or door barriers can help. Woking Borough Council encourages residents to <u>be prepared for flooding</u> - the Environment Agency offers some quick and simple advice that everyone can take to <u>protect your home</u> from flooding.To find out more visit <u>http://www.woking.gov.uk/benefits/emergencies/flooding#be_p</u> repared_and_protect_your_home

The National Flood Forum has lots of advice for householders available at <u>http://nationalfloodforum.org.uk/wp-</u> content/uploads/Ready-for-flooding.pdf

Woking Borough Council continues to work with partners to implement flood risk management activities to help reduce the consequences of future flooding in the Borough. One such flagship project was the Hoe Valley scheme completed in March 2012. The scheme removed almost 200 properties from the flood plain. Find out more at http://www.woking.gov.uk/business/casestudies/hoevalley

Further work is ongoing with partners the Environment Agency and Surrey County Council to identify areas at risk of fluvial and surface water flooding. Schemes are currently being developed to identify potential flood resilience measures and associated environmental benefits which will then be considered for detailed design and implementation.

The Environment Agency's Floods Destroy campaign also gives householders useful tips on how to prepare for flooding. This includes checking the latest Environment Agency flood maps to check if your property is at risk; signing up for flood warnings affecting your area; and preparing a personal flood plan. Find out more at https://www.gov.uk/floodsdestroy

For small scale repairs, improvements and adaptations, Woking Borough Council may be able to assist with a Safe and Warm grants of up to £6,000 (subject to eligibility criteria). Find out more at

http://www.woking.gov.uk/housing/services/grants/safeandwarm

Health and well-being: This is one of Woking Borough Council's key priorities. We are working towards integrated and accessible local facilities and services to encourage the health and well-being of the community. Healthy living, exercise and eating well contribute to a more sustainable community. Looking after ourselves not only benefits our own health and well-being now and for the future but is also a form of preventative healthcare that benefits the whole community by easing the pressure on the NHS etc.

Aspects of living well: it's not rocket science and they're messages we're all familiar with! Eating well / eating balanced meals; reducing the amount of sugar and fat in our diets; keeping active – the NHS recommends 150 minutes of moderate intensity activity per week; moderating alcohol consumption and stopping smoking. All these factors contribute to a happy and healthy body and mind.

There is no doubt that these days we are generally less active than generations gone by. Technology has made our lives easier – machines and gadgets do our everyday chores; we generally do less manual work; we are entertained by televisions and computers; and generally have much more sedentary lifestyles. Being more active can help lessen the risk of chronic diseases such as heart disease; stroke; diabetes and obesity.

Woking Borough Council will be working with partners in health and adult social care to jointly develop a Health and Well-Being Action Plan covering health needs identified in the Borough including tobacco control; promoting physical activity and the uptake of health checks; and alcohol awareness. This will also address other aspects of improving the overall wellbeing of Woking's community incorporating aspects of mental health awareness including the Dementia Friendly Strategy for Surrey.

- Affordable Warmth Unfortunately affordable warmth is an issue affecting many people during the winter months. A housing stock analysis undertaken in 2014 showed that almost 6% of Woking's dwellings suffered from fuel poverty. The Government measures fuel poverty using the Low Income High Costs definition. A household is considered fuel poor if they have required fuel costs that are above average; and were they to spend that amount they would be left with a residual income below the official poverty line. The key fuel poverty factors are: the energy efficiency of the property and therefore the energy required to heat and power the home; the cost of energy; and household income. By working together with Action Surrey and health professionals we can better integrate action on health and fuel poverty by tackling cold homes, improving health and reducing the burden on the health system as well as improving energy efficiency.
- Homes of the future Planning and Regulation has a key role to play in the development of new homes in our Borough and how residents of the future will live. The Woking Local Development Framework Core Strategy, adopted in October 2012, sets out

the overall strategic vision for spatial planning and management of development in the Borough up to 2027. It contains a number of policies that will help to reduce carbon emissions and build resilience to changes in our climate and environment, for instance through encouraging renewable and low carbon energy generation and delivering high standards of sustainable construction of buildings. The Council's Climate Change Supplementary Planning Document (SPD) provides more detailed guidance on the application of these planning policies.

It is inevitable that some renewable and sustainable energy technologies may take a bit of getting used to and may require slight lifestyle changes for householders used to conventional heating and power systems. Action Surrey is developing an online forum – Low Carbon Communities – to enable householders to share experiences and tips to get the best out of their installations. Find out more at <u>www.actionsurrey.org</u>

Want to know more?

www.woking.gov.uk/leisure/healthylifestyles www.nhs.uk/livewell http://www.nhs.uk/change4life/Pages/change-for-life.aspx https://www.rhs.org.uk/science/gardening-in-a-changing-world/urban-planting http://www.nationalfloodforum.org.uk/property-level-protection-community-tool/ http://www.woking2027.info/supplementary/climatechangespd/climatechangespd.pdf http://www.surreycc.gov.uk/roads-and-transport/surrey-transport-plan-ltp3 www.actionsurrey.org http://www.neweconomics.org/projects/entry/five-ways-to-well-being

6.0 Theme 2: In the Workplace

Theme summary: This theme provides general advice and links to further information on how local companies can incorporate sustainability into their business. Reducing energy and water consumption; enhancing waste and recycling initiatives; promoting sustainable transport by staff; and incorporating sustainable procurement practices can all make a positive difference – not only to the sustainability objectives for the Borough, but also economically for a business.

Theme targets and objectives:

- Link the Woking 2050 strategy to the Council's Economic Development Strategy to encourage SMART and sustainable growth for the Borough.
- Work with local organisations such as Woking Chamber of Trade and Commerce and Woking Asian Business Forum to promote sustainability good practice amongst local businesses.
- Membership of the Council's Climate Change Working Group to continue to involve representation from the Woking Chamber of Trade and Commerce.
- Promote local initiatives to encourage take up of advice and funding for sustainable travel plans (e.g. Travel SMART led by Surrey County Council this concludes in March 2015).

The Council's Economic Development Strategy aims for Woking to be Surrey's economic hub and premier location from which to do business. We want Woking to be a place in which businesses want to be located. However, it is important that economic growth is sustainable and smart.

Smart growth = sustainable growth.

According to Smart Growth UK (see section 2), smart growth emphasises compact and accessible urban communities and opposes urban sprawl and car dependency. It promotes local services, ease of walking and cycling and good public transport, particularly rail. It also looks to encourage a sense of community.

Going green has benefits for not only the environment but also your business. These benefits could include increased efficiencies; reduced costs; increased profits; enhanced profile; future proofing against legislation.

Our aim is to create a dynamic Borough that is a hub for business growth but one that also helps local businesses to play their part in contributing to a sustainable Woking.

So how can businesses be more sustainable? We asked the Woking Chamber of Commerce for some tips:

• Energy and water consumption savings: An energy and water audit can help a company to assess where savings could be made and put together a plan for action. Savings can be made by installing measures such as LED lamping; presence / occupancy sensors and hippo bags in water cisterns. Encouraging staff to switch off

lights and computer screens when not in use can assist in saving energy. Some companies may be required to report to Government on their energy use through the Carbon Reduction Commitment, so improving efficiency and reducing consumption will help. To find out more visit <u>https://www.gov.uk/crc-energy-efficiency-scheme-qualification-and-registration</u>. Buildings that are occupied by a public service organisation are required to produce a Display Energy Certificate. Find out more at <u>https://www.gov.uk/government/publications/display-energy-certificates-and-advisory-reports-for-public-buildings</u>

- Waste reduction and recycling initiatives: Central waste collection points help small businesses. Removing individual bins from employee desks in favour of central sorting bins, encourages staff to recycle more.
- Company travel plans that promote audio or video conferencing; car sharing; and bike schemes can lower business mileage costs and emissions; and improve staff health and well-being. The Energy Savings Trust offers a Green Fleet Consultancy Service that can help businesses cut carbon and reduce fleet costs. Find out more at http://www.energysavingtrust.org.uk/Organisations/Transport/Products-andservices/Fleet-advice/Fleet-Health-Check
- By incorporating **sustainable procurement practices** into your business you can manage the impact of the goods and services you purchase. By looking at your business contracts and service delivery options you can also encourage suppliers and contractors to consider their impact in turn. For instance you might specify that contractor vehicles must be minimum Euro 5 or 6 emissions or that the packaging you source meets a minimum percentage of recycled material.
- Think about the impacts that your business' working environment can have on the health, wellbeing and productivity of your employees. According to a report by the World Green Building Council, office design can significantly impact the health, wellbeing and productivity of staff. A range of factors including air quality, lighting, active design and exercise, views of nature and interior layout can affect the health, satisfaction and job performance of office workers.
- Adapting to a changing climate and environment is not just down to governments and communities. By creating a **business continuity plan**, organisations can identify the risks and opportunities these changes can bring and help businesses to be better prepared for the future. The table below identifies some examples:

Opportunity	Risk
Technology development and innovation	Extreme weather causing damage to
	physical assets and business interruption
New markets, products and services	Disruption of local infrastructure affecting
	supplies and workforce
Supporting the local community through	Rising insurance costs
sustainability projects	

Looking for inspiration? These case studies might help...

- The Living Planet Centre WWF UK's Headquarters in Woking was awarded 'Outstanding' by BREEAM and uses smart design, materials and technology to create a state of the art building with minimum environmental impact. Find out more at http://www.wwf.org.uk/about_wwf/the_living_planet_centre2/
- **Repropoint** has worked hard to tackle waste at source by enabling online access to its printing services. A virtual print department avoids paper proofs by enabling clients to create ready proofed materials for printing. Digital printing, email quotations and online account statements result in a faster service and reduce paper. As a result of these changes, the company has saved over £5,000 per year on postage and almost £3,000 per year on the cost of waste collection.
- Skanska extensively refurbished Hollywood House between 2010 and 2011. Originally constructed in the 1980s, the building was energy inefficient and had high operational costs. The £3.5m extensive refurbishment took 32 weeks to complete and involved the installation of new heating, lighting, ventilation and energy management systems. A 20kW photovoltaic (PV) array, 9.8kW solar domestic water heating system and heat pump were installed to generate renewable energy on site. The building was also fitted with sophisticated energy monitoring and control systems, and was connected to Thameswey's town centre combined heat and power (CHP) system which provides low carbon electricity and district heating. Waste management and water efficiency were also addressed, with a rainwater harvesting system and water efficient fixtures installed as part of the refurbishment. The building now uses around 3m³ of water per person per year which is 55% less than what the Environment Agency considers to be good practice for an office building. The retrofit also considered healthy working environments with natural ventilation and a daylight dimming control system that regulates artificial lighting levels. Hollywood House now uses over 50% less energy than prior to the project and the total cost of the refurbishment is estimated to be repaid in approximately 13 years through energy savings.

Want to know more?

<u>http://www.wokingchamber.org.uk/resources.php</u> <u>http://www.energysavingtrust.org.uk/Organisations/Transport/Products-and-services/Fleet-advice/Green-Fleet-Consultancy</u> <u>http://www.worldgbc.org/activities/health-wellbeing-productivity-offices/</u>

7.0 Theme 3: Getting Around

Theme summary: This theme looks at how we can make positive changes to the sustainability of the Borough by adopting sustainable modes of transport. The Council will promote sustainable transport; walking and cycling; and electric vehicles in order to contribute to a cleaner, greener Borough.

Theme targets and objectives:

- The Council to continue to encourage the use of car clubs including the CarShare scheme, operated by Enterprise Rent A Car.
- The Council to continue to implement vehicle emissions thresholds to include 120g/km at April 2015, 110g/km at April 2017 and 100g/km at 2019.
- Work with partners to promote the local cycle network and increase the number of local cycle journeys in the Borough.
- Promote the use of the electric vehicle charging network in Woking and links to the wider South East network.
- Work with partners to provide an integrated transport system that promotes lower carbon and healthy transport choices. *[Links to Section 5]*
- Work with partners to reduce the number of children travelling to school by car. [Links to Section 5]

Transport accounts for just over 20% of Woking Borough's carbon footprint (source DECC local authority carbon statistics 2012, published June 2014).

Whether you live here, work here or are a visitor, we want getting around in Woking to be easy while also contributing to and maintaining a cleaner, greener Borough. We hope that walking, cycling and public transport will be the first choice for short trips.

The Borough offers a range of sustainable transport options:

Cycling: Between 2008 – 2011, Cycle Woking, a partnership between Woking Borough Council and Surrey County Council, delivered a programme of infrastructure and soft measure improvements to enhance cycling and walking provision and take-up in the Borough. The programme saw a 40% increase on overall cycle journeys from 2004 levels; a 50% increase in cycle commuting journeys to railway stations on 2004 levels; and increases of 4% and 5% respectively in cycling in primary and secondary schools. In 2015/16, the Council will work with Surrey County Council and the Sustainable Travel Sub-Committee to produce a local plan to further improve the cycling infrastructure and provision across the Borough and build on the success of the Cycle Woking and TravelSmart programmes.

Car club: In February 2010, the Council teamed up with Enterprise Rent-a-Car Ltd to establish CarShare, an innovative way of providing car hire to businesses and residents that is convenient, affordable and good for the environment. CarShare is a membership-based car sharing scheme that offers short-term affordable access to a

car, while positively contributing to the objectives for a cleaner, greener Borough. Not only does car sharing reduce the number of cars on the road, CarShare uses fuel efficient vehicles to lessen the impact on the environment. For a membership fee of £50 per annum (plus a one-off registration fee of £25), CarShare members have access to vehicles for an hourly rate of just £5 per hour, which includes 30 miles worth of fuel.

Electric Vehicles: There are currently eight charging points across Woking Town Centre's car parks. Parking charges apply as normal but users can charge their vehicles for free. Six of the points are registered on the national Charge Your Car network. Woking's points are also included in the South East network of charging points called energiSE. Electric vehicle drivers also benefit from a 50% discount on car parking season tickets in town centre car parks. Through its Core Strategy and Climate Change Supplementary Planning Document (SPD), the Council's Planning policies require that electric vehicle charging infrastructure be included in new development.

TravelSMART: Travel SMART is a programme designed to provide people with more travel choices that help cut carbon, calories and cost. It aims to support economic growth by helping people travel better. The Travel SMART towns - Woking, Guildford, Redhill and Reigate - have been chosen as they are Surrey's biggest economies and all currently suffer from significant traffic congestion. The programme is funded by the Department for Transport's Local Sustainable Transport Fund, with over £18 million to spend until March 2015 on schemes like improving and installing cycle lanes, investing in interactive and live travel information and encouraging and supporting more people in travelling sustainably. To deliver its programme of improvements, Travel SMART is working closely with borough councils, residents, community groups and businesses.

Differential Parking Charges: To encourage lower emission vehicles, the Council offers differential parking charges on season tickets for its Town Centre car parks. The cost of a season ticket is based on a vehicle's CO₂ emission rating (determined by the Vehicle Certification Agency). A 50% discount is applied for vehicles that produce the lowest emissions (CO₂ band A) and a 25% discount for band B vehicles. Those with a band G rating (the highest band) pay a 25% surcharge.

Staff Transport Plan: This has been in place since 2000 with the aims of reducing the environmental impact of staff travel through a range of policy initiatives. These include: progressively improving the environmental standards of vehicles used on Council business and encouraging other modes of transport; continue the implementation of vehicle emissions thresholds to include 120g/km at April 2015, 110g/km at April 2017 and 100g/km at 2019; and the provision of a cycling mileage allowance for staff.

Integrated travel network: Through Cycle Woking and TravelSMART, the Borough has benefitted from improvements to the local transport network to improve integration and enhance the usage of sustainable modes of travel. As well as improving and installing cycle routes and cycle parking, improvements have been made to bus services and routes, together with investments in interactive and live travel information, and improved integration and connectivity with rail travel. Further improvements are

planned that will continue to improve accessibility across the Borough. In addition, the National Express Heathrow Airport transfer offers a sustainable way of getting to the airport.

Transport is a key consideration for Woking's Planning policies. Through the Climate Change Supplementary Planning Document, we ask that developers consider transport impacts and choices and plan to minimise the need for occupants to use motorised transport. This can be achieved through the following measures:

- Provision of travel plans and packs that promote active travel for shorter journeys;
- Localising as many amenities and services as possible;
- Provision of safe and attractive walking and cycling opportunities including, where appropriate, secure cycle parking and changing facilities;
- Ensuring the provision of car parking is consistent with cutting greenhouse gas emissions, including through providing for electric vehicle charging infrastructure;
- Provision of secure and covered storage / parking for bikes and pushchairs in public areas.

However, we also recognise that sometimes journeys do need to be made by car. Here are some tips on keeping travel by car more efficient:

- According to the Energy Saving Trust, by driving smarter, the average UK driver could save between £250 and £300 per year.
- Smarter driving includes: switching off your engine if stationary for more than a minute or two; shifting to a higher gear as soon as you can as this uses less fuel; driving smoothly to avoid unnecessary braking and acceleration; and keeping tyres correctly inflated.

We also recognise the benefits that travel by motorbike can make in easing congestion.

Want to know more?

http://www.woking2027.info/supplementary/climatechangespd/climatechangespd.pdf http://www.woking.gov.uk/jobs/package/transport http://www.cyclewoking.org.uk/aboutus/projectreport http://www.woking.gov.uk/transport/wecar http://chargeyourcar.org.uk/ http://www.woking.gov.uk/transport/parking/season/permitcharges www.energisenetwork.co.uk http://www.energysavingtrust.org.uk/Travel/Driving

8.0 Theme 4: The Great Outdoors

Theme summary: This theme promotes and celebrates our diverse countryside and urban environments. We want to enhance accessibility to our natural habitats and wildlife and promote the benefits that enjoying the great outdoors can bring including to our own health and well-being. We also recognise the need for ensuring biodiversity security and protection so that future generations can benefit. We also highlight the importance of working in partnership to achieve these aims with organisations including Horsell Common Preservation Society; Surrey Wildlife Trust; Basingstoke Canal Authority; WWF and Woking LA21.

Theme targets and objectives:

- Develop a Biodiversity and Green Infrastructure Strategy and Action Plan that sets out how the Council will work with partners to ensure biodiversity protection and security.
- Work with local partners to implement and support wildlife and species protection projects.
- Promote sustainable development in the Borough through existing Plans and Policies such as the Local Development Framework Core Strategy; Green Spaces Development Plan; and Biodiversity and Green Infrastructure Strategy.
- Identify targets and monitoring for species and habitats protection important to the Borough.
- Raise awareness of the need for biodiversity conservation.
- Promote the use of the Borough's green spaces for sport, recreation and social interaction and the benefits this can bring to health and well-being.
- Maintain and enhance access to locally based green space and outdoor recreation facilities.
- Work with partners to enable the Borough to protect our green spaces and habitats in the face of challenges brought about by changes in climate.
- Continue to support New Vision Homes in their approach to the green spaces they manage in providing well maintained and attractive neighbourhoods including the promotion of biodiversity; working with Surrey Wildlife Trust to establish wildflower meadows; developing community gardens and urban allotments; and planting fruit trees to create urban orchards.
- Continue to monitor and review local air quality in line with Government based health standards.

Woking is a Borough of contrast: from the hustle and bustle of the thriving town centre to the green open spaces of Horsell Common. We want Woking to be a Borough that promotes and celebrates its diverse countryside and urban environments; that promotes accessibility to its natural habitats and wildlife and the benefits this can bring including health and wellbeing; while ensuring biodiversity security and protection so that future generations can benefit. The Borough comprises 1600 hectares of green spaces. The profile of these green spaces is diverse and includes:

- Parks and gardens including Woking Park and recreation grounds;
- Natural and semi natural urban green space including 12 countryside sites such as Horsell Common, Prey Heath, Smarts Heath, Brookwood Lye, Brookwood Country Park and Pyrford Common;
- Green corridors including areas alongside the Basingstoke Canal and River Wey;
- Outdoor sports facilities including private golf courses and recreation grounds set up for sports;
- Amenity green space including green spaces within housing areas and village green;
- Provision for children and teenagers i.e. play areas, multi use games areas, skateparks and youth shelters;
- Allotments;
- Burial grounds and cemeteries including closed burial grounds and Brookwood Cemetery.

Nowhere in the urban area of the Borough is more than 1 mile from open countryside*. This provides our population with a great opportunity to enjoy and benefit from the use of the Borough's green spaces for sport, recreation and social interaction and the benefits this can bring to health and well-being. Woking Borough Council has an abundance of leisure and cultural opportunities for residents and visitors to enjoy. Getting out and about and enjoying our local amenities can help contribute to a healthy lifestyle.

*reference taken from the Council's Cultural Strategy

There are a range of opportunities and challenges to consider with regards to the urban and countryside environment. We want to balance these and ensure that the Borough copes with existing and future demands for green space and outdoor recreational facilities; the need to protect and secure our local wildlife and biodiversity; and the need to respond to issues such as changes in climate and developmental pressures.

What are the opportunities?

- A clean, healthy and safe environment positively contributes to our sense of place and our quality of life.
- Accessible green spaces can have positive effects on local economic vitality and tourism.
- The diversity of our local habitats and wildlife provides valuable opportunities for education, awareness and engagement of local people and visitors.
- Whilst changes in climate will give rise to challenges, they will also give rise to new species of flora and fauna. Further ahead it could mean the opportunity for cultivation of otherwise more difficult to grow crops etc.
- The great outdoors offer our local population and our visitors the opportunity to enjoy a range of activities, sports, recreation and social interaction...all of which positively contribute to our health and well-being.

What are the challenges?

- Climate scenarios for the south east of England show that by the 2050s we will likely experience changes in seasonal weather characteristics such as drier, warmer summers and colder, wetter winters which will affect local plant and animal life. We will likely experience greater and more frequent extremes in weather events such as flooding, drought and heatwave.
- Drier, hotter summers could result in a greater need for irrigation and water resource management and the need to plant vegetation that is suitable to changes in seasonal weather characteristics e.g. drought tolerant species.
- Changes in climate resulting in factors such as reduced soil moisture and greater risk of fire damage may adversely affect the Borough's hectares of heathland and woodland. Secondary impacts of these changes can mean that shallow rooted trees are more susceptible to high winds and root damage.
- Possible migration of species as they become intolerant to their surroundings following changes in the local environment and climate.
- A growing population may mean potential gaps in green infrastructure for future generations. A Biodiversity and Green Infrastructure Strategy is currently being prepared that will set out a strategic approach to green infrastructure within the Borough by identifying the existing network and identifying gaps for potential new provision (see section 2).
- Future housing requirements and other developmental needs have required that a Green Belt boundary review was undertaken in response to recommendations by the Secretary of State during the Core Strategy Examination in April 2012. The review has been necessary to enable the Council to identify sufficient land to meet its future housing and development needs beyond 2022. The findings will inform the Council's Delivery Development Plan Document (DPD) which will in turn identify specific sites for future development.

Woking Borough Council will be developing a Biodiversity Action Plan with Woking LA21 and partners to maintain and enhance green spaces and local biodiversity. The Plan will identify priorities and targets for local habitats and species and outline what action is required.

As identified in chapter 3, air quality is a further challenge to our environment and our health and could be exacerbated by changes in climate. It is generally accepted that these days the major threat to clean air is now posed by traffic emissions. With population changes and possible increases in congestion it is essential that we monitor and manage our air quality to maintain a clean, healthy and safe environment. Air quality in the Borough is generally good and in the main meets health based standards set by the Government. Local authorities are required to undertake periodic reviews of their local air quality to assess current levels of pollutants and review predicted future levels against Government health based standards. To find out more about how the Council monitors air quality, visit <u>http://www.woking.gov.uk/planning/envhealthservice/control/airquality</u>

Engaging in nature conservation through volunteering is a great way to get involved and make a positive contribution to your local environment. Groups such as the Horsell Common Preservation Society and the Basingstoke Canal Authority welcome volunteers to help with maintenance and protection work.

Want to know more?

http://www.woking.gov.uk/leisure/greenspaces

http://www.climatesoutheast.org.uk/

http://www.woking.gov.uk/planning/policy/ldfresearch/greenbeltreview

https://www.gov.uk/government/publications/biodiversity-indicators-for-the-uk http://www.woking.gov.uk/leisure

http://www.horsellcommon.org.uk/volunteer_working_parties.php

http://www3.hants.gov.uk/basingstoke-canal/canal-volunteers.htm

9.0 Theme 5: What the Council is doing

Theme summary: This theme outlines how the Council can make a positive contribution to the vision for Woking 2050. We can play a key role in shaping the Borough's future and in helping the community do the same. We can work to reduce the negative environmental factors that may threaten that vision; and recognise the opportunities to secure it.

Theme targets and objectives:

- Continue to work with partners to improve the energy efficiency and reduce the energy consumption of Council owned buildings and housing stock.
- Continue to work with partners to increase the proportion of renewable and sustainable energy consumption of Council owned buildings.
- Encourage the adoption of standards promoting development that is more sustainable.
- Through Action Surrey, encourage the adoption of energy efficiency measures and renewables to make Woking homes more efficient and more comfortable while also helping to tackle fuel poverty and reducing domestic carbon dioxide emissions.
- In line with Surrey Waste Partnership targets and national/local performance indicators, continue to reduce residual waste collected from households (SWP Strategy currently being reviewed, to be available in 2015) [Links to section 5]
- In line with Surrey Waste Partnership targets, continue to increase the Borough recycling rate (SWP Strategy currently being reviewed, to be available in 2015) [Links to section 5]
- Work with partners to provide an integrated transport system that promotes lower carbon and healthy transport choices. [Links to Sections 5 and 7]
- Work with partners and other Surrey authorities to ensure community resilience in the face of extreme weather events e.g. flood; heatwave; drought etc.
- Establish monitoring and targets for reduced water consumption in Council owned buildings.
- Work with partners to implement flood risk management activities to help reduce the consequences of future flooding in the Borough.
- Continue to monitor and review local air quality in line with Government based health standards.

The Council plays a key role in shaping the future of the Borough given its fundamental roles as a user, influencer and regulator of policy and services. These roles offer a range of opportunity to influence the future of Woking, the type of place it will be and its environment. See diagram 1 below.



Diagram 1: The roles of the Council: Regulator, user and influencer. Diagram highlighted in the findings of an independent audit by Cap Gemini into the Council's Climate Change Strategy.

The table below	shows how the	Council can	contribute to	Woking 20P	N's objectives
	SHOWS HOW THE	Council can		VVUKING 200	o s objectives.

Area	Activity	How?		
Planning Policy	Encourage sustainable construction and development.	 Core Strategy - the main document within the Council's Local Development Framework (LDF). It includes a spatial vision for the Borough and covers strategic objectives focussed on the key issues and challenges facing the area (http://www.woking2027.info/corestrategy). Climate Change Supplementary Planning Guidance and policies CS22 (Sustainable Construction) and CS23 (Renewable and Low Carbon Energy Generation). Biodiversity and Green Infrastructure Strategy. 		
Procurement	Encourage sustainable procurement of goods and services used by the Council and its operations	 Inform contractors and suppliers regarding the Council's commitments to sustainability. Record and report incorporation of Social Value Act considerations for 100% of procurement projects that are subject to EU Procurement Regulations. Where possible, undertake procurement of goods and services in partnership with others which could reduce sustainability impacts. 		
Energy	Improve energy efficiency and reduce the energy consumption of the Council's own estate	 Monitor the Council's energy use through Government requirements such as Display Energy Certificates, the Carbon Reduction Commitment and greenhouse gas emissions reporting. 		

	and operations.	 Work with Skanska, the Council's asset and facilities management partner, to develop environmental monitoring targets for the Council including energy management. Work with partners, such as Skanska, New Vision Homes and Thameswey Energy Ltd, to implement energy saving measures across the Council estate and housing stock. Work with partners, such as Skanska and Thameswey Energy Ltd, to increase the amount of energy the Council uses from renewable and sustainable sources. Work with partners to implement environmental management plans for Council operational buildings.
Waste Management	Reduce and recycle the Council's own waste. Enable the community to maximise the amount of household waste that can be diverted from landfill and recycled.	 Work with Skanska to develop environmental monitoring targets for the Council including waste management. In line with Surrey Waste Partnership targets and national/local performance indicators, continue to reduce residual waste collected from households. In line with Surrey Waste Partnership targets, continue to increase the Borough recycling rate http://www.surreywastepartnership.org.uk/
Travel	Promote sustainable transport modes for Council business. Promote community sustainable transport schemes.	 Various targets and initiatives identified in the Council's Staff Transport Plan (http://www.woking.gov.uk/jobs/package/transp ort). Work with partners to promote and the availability of schemes such as CarShare (http://www.woking.gov.uk/transport/carshare) and TravelSMART (http://www.travelsmartsurrey.info/).
Community resilience	Build resilience against environmental factors which may affect our community such as flooding, drought, heatwave and wildfire.	 The Council has identified the local flood risks and responses in its Multi-Agency Flood Plan. This forms part of the Council's emergency planning duties. Woking Borough Council has identified its planned response to incidents affecting the community through its Emergency Plan. The Council is a member of the Surrey Local Resilience Forum (SLRF). The SLRF brings together all agencies with a significant role to play in responding to and recovery from the

			effect of emergencies and plans and prepares
Community	Work with partners to	•	The Council works with a range of partners and
support	help the community to access services, support and grants that contribute to the Woking 2050 vision.		organisations that can help including Action Surrey; Woking LA21 and Surrey Community Action.
Learning	The Council can learn from others and share experience using networks and partnerships.	•	The Council is a member of a number of groups such as the Surrey Energy and Sustainability Partnership; ICLEI Local Governments for Sustainability; Zero Carbon Hub and Climate Local.
	Education and awareness raising	•	Junior Citizen is a three week long educational safety scheme organised by members of the Safer Woking Partnership, with assistance from other agencies, including Surrey Police, Surrey Fire and Rescue Service, Freedom Leisure and Woking Borough Council. It teaches primary school children how to stay safe in everyday situations and includes education on waste and recycling and looking after the local environment.
Green Spaces	Protect and enhance green spaces, habitats and wildlife Maintain and enhance access to green spaces for sport, recreation and promote the benefits this can bring to health and well-being. Maintain good air quality levels in the Borough.	•	Work with partners such as Serco to develop appropriate maintenance programmes. Develop a Biodiversity and Green Infrastructure Strategy and Action Plan that set out how the Council will work with partners to ensure biodiversity protection and security. Work with local partners to implement and support wildlife and species protection projects. Continue to work with partners to offer a range of quality parks, recreation grounds and open spaces. Continue to monitor and review local air quality in line with Government based health standards.
Partnership Working	Work with partners across a range of themes, actions and projects.	•	Throughout this document, partnership working has been highlighted as an effective way of achieving our sustainability goals and targets. The potential impacts on our environment are

complex and could affect many different
aspects of the community and environment in
which we live. By pooling together the
knowledge and expertise of multiple
organisations, we can achieve the most
effective results.

Want to know more?

http://www.local.gov.uk/climate-local

http://www.zerocarbonhub.org/

http://www.iclei.org/

http://www.surreycc.gov.uk/environment-housing-and-planning/energy-sustainability/surrey-

energy-and-sustainability-partnership

http://www.thamesweygroup.co.uk/

http://www.surreycc.gov.uk/people-and-community/emergency-planning-and-community-

safety/emergency-planning/surreys-local-resilience-forum

http://www.woking.gov.uk/environment/climate/canyoudo/la21

http://www.woking.gov.uk/community/safety/juniorcitizen

http://www.woking.gov.uk/leisure/greenspaces/parks

10.0 Conclusion

Woking 2050 provides a framework to coordinate our efforts to create a sustainable Borough by reducing our impact on the environment. Our goal is a Borough:

- that protects and enhances its high quality natural environment;
- where resources are used wisely and biodiversity is conserved;
- that has a built environment that is developed sustainably, which meets local needs and enables the local economy to prosper;
- that recognises, prepares and adapts to the socio-economic; environmental and demographic changes that the future will bring.

This Strategy sets out how the Council and the community can contribute to these aspirations. Through the action plan that accompanies this Strategy we will measure how we are meeting these aims.

We hope that by working together we can positively influence the future of the Borough for generations to come.

11.0 Glossary

Term	Definition
Adaptation	The action or process of recognising inevitable
	changes and adapting to them.
Biodiversity	Biological diversity - or biodiversity - is the term
	given to the variety of life on Earth. It is the variety
	within and between all species of plants, animals
	and micro-organisms and the ecosystems within
	which they live and interact. (WWF)
Green Belt	A designated area of open land around a town or city,
	on which building is restricted.
Croop infractructure	A natural of multifunctional groop appear when and
Green milastructure	A network of multi-functional green space, urban and
	environmental and quality of life benefits for local
	communities (NPPF)
Greenbouse gas emissions (GHG)	Gases in the Earth's atmosphere that absorb and emit
	radiation. This process is considered a fundamental
	cause of the greenhouse effect. The primary
	greenhouse gases are carbon dioxide, methane and
	nitrous oxide. Greenhouse gases greatly affect the
Renewable	In terms of resources, those that are renewable are not
Kenewabie	limited in availability. Their source will never run out
	Coal and gas are finite resources as their stocks are
	exhaustible. Wind is renewable as it will forever be
	available.
Resilience	In the context of this Strategy we consider community
	resilience and our duty to ensure the community is
	able to withstand, and recover quickly from, an event
	or situation which threatens serious damage to human
	welfare or the environment.
Sustainable	This can refer to development or the use of a resource
	- its use or existence must be able to be continued
	without being detrimental to the environment, or
	endangering the resource for its use by future
	generations.

12.0 Thank you

To ensure that this Strategy represents a fair vision for Woking 2050, we consulted a range of residents, organisations, partners and special interest groups. Thank you to those who responded with comments and feedback which were incorporated where possible.

We hope that Woking 2050 is a document that is accessible by the variety of readers for whom it is intended ranging from school children, to householders, to local business people, to Council staff and Councillors, to stakeholders. And we hope it reflects your hopes for a sustainable Borough.

13.0 Appendix 1: Policy and Research Context for the Strategy

13.1 Now for the science bit...Why does this matter?

Rio...where it all began...

In 1992, more than 100 heads of state met in Rio de Janeiro, Brazil for the first international Earth Summit convened to address urgent problems of environmental protection and socioeconomic development. The assembled leaders signed the <u>Convention on Climate Change</u> and the <u>Convention on Biological Diversity</u>, endorsed the <u>Rio Declaration</u> and the <u>Forest</u> <u>Principles</u>, and adopted <u>Agenda 21</u>, a 300 page plan for achieving sustainable development in the 21st century.

The Convention on Climate Change led to the Kyoto Protocol which is an international treaty that sets binding obligations on industrialized countries to reduce emissions of greenhouse gases.

Local Authorities world-wide were challenged to address global environmental concerns by taking actions locally, under community-led Local Agenda 21 (LA21) programmes. Woking Local Action 21 is a community led initiative that is supported by Woking Borough Council and pro-actively promotes environmental and sustainability issues in the Borough.

Since the early 90s, the environment and climate change have never been far from the political and media spotlight.

Fast forward to spring 2014 which saw the publication of the United Nations Intergovernmental Panel on Climate Change (IPCC) Working Group 2, Fifth Assessment Report (31 March 2014). The report is the work of over 300 scientific experts from universities and research institutes from 73 countries. Whilst the report did not focus on outcomes for specific countries, it identified three key risks for Europe:

- Increased economic losses and people affected by flooding in river basins and coasts, driven by increasing urbanisation, increasing sea levels, coastal erosion and peak river discharges.
- Increased water restrictions. Significant reduction in water availability from river abstraction and from groundwater resources, combined with increased water demand (e.g. for irrigation, energy and industry, domestic use) and with reduced water drainage and runoff as a result of increased evaporative demand, particularly in southern Europe.
- Increased economic losses and people affected by extreme heat events: impacts on health and well-being, labour productivity, crop production, air quality, and increasing risk of wildfires in southern Europe and in Russian boreal region.

A further report was later released by the UN IPCC in April 2014. This third section looks at how to address the issues and risks identified in its first two reports by reducing those activities that contribute to human-induced climate change. It looks at current greenhouse gas emissions; the levels they will need to fall to in future; and how this can be achieved.

The report took four years to prepare by 235 experts from across the world. Key findings included:

- Greenhouse gas emissions are still rising.
- On a business-as-usual pathway, global mean temperatures will increase by 3 to 5 degrees over pre-industrial levels by the end of the century.
- Efforts to reduce emissions need to take place across all sectors and all regions.
- Many countries already have policies in place to reduce emissions, but much more needs to be done.
- International action and cooperation is required to tackle climate change.

The findings confirm the continuing need to protect our environment. Listed in the Technical Appendix are some of the headlines messages from the third report (IPCC WGIII AR5 – Summary for Policymakers – April 2014)¹. Whilst reducing CO2 emissions is a key concern, the findings conclude that much can be done to protect our environment by making changes in the way we live and behave i.e. through changing our consumption habits around energy and resources.

Want to know more? http://www.un.org/en/development/ http://www.ipcc.ch/ https://www.gov.uk/government/news/united-nations-intergovernmental-panel-on-climatechange-report-published

14.0 Appendix 2: Technical References

14.1 IPCC Working Group 3 report (IPCC WGIII AR5 – Summary for Policymakers - April 2014)

Listed below are some of the headline messages from the subsequent IPCC Working Group 3 report (IPCC WGIII AR5 – Summary for Policymakers - April 2014). Whilst reducing CO2 emissions is a key concern, the findings conclude that much can be done to protect our environment by making changes in the way we live and behave i.e. through changing our consumption habits around energy and resources.

The full summary report is available at

http://report.mitigation2014.org/spm/ipcc wg3 ar5 summary-for-policymakers approved.pdf

Highlights:

- i. CO2 emissions from fossil fuel combustion and industrial processes contributed about 78% of the total GHG emission increase from 1970 to 2010, with a similar percentage contribution for the period 2000-2010. [page 5; SPM.3 Trends in GHGs]
- ii. Annual anthropogenic GHG emissions have increased by 10GtCO2eq between 2000 and 2010, with this increase directly coming from energy supply (47%), industry (30%), transport (11%) and buildings sectors (3%). [page 7; SPM.3 Trends in GHGs]
- iii. Globally, economic and population growth continue to be the most important drivers of increases in CO2 emissions from fossil fuel combustion. [page 7; SPM.3 Trends in GHGs]
- iv. Without additional efforts to reduce GHG emissions beyond those in place today, emissions growth is expected to persist driven by growth in global population and economic activities. [page 8; SPM.3 Trends in GHGs]
- v. Scenarios to make significant cuts in anthropogenic GHG emissions by mid-century through large-scale changes in energy systems and potentially land use. Scenarios also characterised by more rapid improvements of energy efficiency; a tripling to quadrupling of the share of zero- and low-carbon energy supply from renewables, nuclear energy and fossil energy with carbon dioxide capture and storage (CCS), or bioenergy with CCS (BECCS) by the year 2050. [page 15; SPM.4 Mitigation pathways and measures in the context of sustainable development]
- vi. Mitigation scenarios...co-benefits for human health, ecosystem impacts, and sufficiency of resources and resilience of the energy system. [page 19; SPM.4 Mitigation pathways and measures in the context of sustainable development]
- vii. Behaviour, lifestyle and culture have a considerable influence on energy use and associated emissions, with high mitigation potential in some sectors, in particular when complementing technological and structural change. Emissions can be substantially lowered through changes in consumption patterns (e.g. mobility demand and mode, energy use in households, choice of longer-lasting products) and dietary change and reduction in food wastes. A number of options including monetary and non-monetary incentives as well as information measures may facilitate behavioural changes. [page 23; SPM4.2 Sectoral mitigation pathways and measures]

- viii. Direct CO2 emissions from the energy supply sector are projected to almost double or even triple by 2050 compared to levels in 2010m unless energy intensity improvements can be significantly accelerated beyond the historical development. In the last decade, the main contributors to emission growth were a growing energy demand and an increase of the share of coal in the global fuel mix. [page 23; SPM4.2.2 Energy Supply]
- ix. Decarbonizing (i.e. reducing the carbon intensity of) electricity generation is a key component of cost-effective mitigation strategies in lowering emissions. Key role of renewables. [page 23; SPM4.2.2 Energy Supply]
- x. GHG emissions from energy supply can be reduced significantly by replacing current world average coal-fired power plants with modern, highly efficient natural gas combined-cycle power plants or combined heat and power plants. *[page 23; SPM4.2.2 Energy Supply]*
- xi. The transport sector accounted for 27% of final energy use and 6.7GtCO2 direct emissions in 2010, with baseline CO2 emissions projected to approximately double by 2050. [page 24; SPM 4.2.3 Transport]
- xii. Technical and behavioural mitigation measures for all transport modes, plus new infrastructure and urban redevelopment investments, could reduce final energy demand in 2050 by around 40% below the baseline...Energy efficiency and vehicle performance improvements have potential to make significant reduction contribution. Integrated urban planning that supports cycling and walking can lead to modal shift. [page 24; SPM 4.2.3 Transport]
- xiii. Decouple transport GHG emissions from economic growth in all regions...reduce travel demand...induce modal shifts...provide co-benefits including improved access and mobility etc. [page 25; SPM 4.2.3 Transport]
- xiv. In 2010, the building sector *(sector covers residential, commercial, public and services sectors)* accounted for around 32% final energy use with energy demand projected to approximately double and CO2 emissions to increase by 50-150% by mid-century in baseline scenarios. *[page 25; SPM 4.2.3 Buildings]*
- xv. Opportunities to stabilize or reduce global buildings sector energy use by midcentury. For new buildings, the adoption of very low energy building codes is important. Retrofits form a key part of the mitigation strategy. [page 25; SPM 4.2.3 Buildings]
- xvi. Lifestyle, culture and behaviour significantly influence energy consumption in buildings. Scenarios indicate that lifestyle and behavioural changes could reduce energy demand by up to 20% in the short terms and by up to 50% of present levels by mid-century. [page 26; SPM 4.2.3 Buildings]
- xvii. Most mitigation options for buildings have considerable and diverse co-benefits in addition to cost savings e.g. energy security; health; fuel poverty reductions etc. [page 26; SPM 4.2.3 Buildings]
- xviii. Building codes and appliance standards, if well designed and implemented, have been among the most environmentally and cost-effective instruments for emission reductions. Can reduce total energy demand for buildings. [page 26; SPM 4.2.3 Buildings]
- xix. Important options for mitigation in waste management are waste reduction, followed by re-use, recycling and energy recovery. [page 27; SPM 4.2.3 Industry]

- xx. Infrastructure and urban form are strongly interlinked, and lock-in patterns of land use, transport choice, housing and behaviour. Effective mitigation strategies involve packages of mutually reinforcing policies, including co-locating high residential with high employment densities, achieving high diversity and integration of land uses, increasing accessibility and investing in public transport and other demand management measures. [page 28; SPM 4.2.5 Human Settlements, Infrastructure and Spatial Planning]
- xxi. Successful implementation of urban-scale climate change mitigation strategies can provide co-benefits. [page 29; SPM 4.2.5 Human Settlements, Infrastructure and Spatial Planning]
- xxii. Regulatory approaches and information measures are widely used, and are often environmentally effective. Examples of regulatory approaches include energy efficiency standards; examples of information programmes include labelling programmes that can help consumers make better-informed decisions. [page 31; SPM 5 Mitigation policies and institutions]

14.2 Lima Climate Change Conference - December 2014 - Summary

The Lima Climate Change Conference took place between 1 - 14 December 2014. The discussions were seen as a step towards achieving a global climate deal in Paris in 2015 in furtherance of the Kyoto Protocol. The agreed document calls for the following objectives:

- An "ambitious agreement" in 2015 that reflects "differentiated responsibilities and respective capabilities" of each nation
- Developed countries to provide financial support to "vulnerable" developing nations
- National pledges to be submitted by the first quarter of 2015 by those states "ready to do so"
- Countries to set targets that go beyond their "current undertaking"
- The UN climate change body to report back on the national pledges in November 2015

Further information about the Lima Climate Change Conference can be found at http://www.unfccc.int/2860.php#decisions

14.3 EU2030 - Reducing greenhouse gas emissions by at least 40%

On 23 October 2014, EU leaders agreed a binding target to reduce EU domestic greenhouse gas emissions by at least 40% below the 1990 level by 2030.

This target will ensure that the EU is on track towards meeting its objective of cutting emissions by at least 80% by 2050, as set out in the <u>Roadmap for moving to a competitive</u> <u>low carbon economy in 2050</u>, the <u>Energy Roadmap 2050</u> and the <u>Transport White Paper</u>.

The agreement acknowledges that renewable energy will play a key role in the transition towards a competitive, secure and sustainable energy system. A binding target to increase

the share of renewable energy to at least 27% of the EU's energy consumption by 2030 was agreed.

An energy savings target of at least 27% by 2030 was also agreed.

Further information available at http://ec.europa.eu/clima/policies/2030/index_en.htm

14.4 ONS 2012 based subnational population projections for Woking

Figures in the table below taken from Table 2: 2012-based subnational population projections for Local Authorities in England. http://www.ons.gov.uk/ons/publications/re-reference-tables.html?edition=tcm%3A77-335242

Year	Population
2012	99,000
2013	100,000
2014	101,000
2015	101,000
2016	102,000
2017	103,000
2018	103,000
2019	104,000
2020	105,000
2021	105,000
2022	106,000
2023	107,000
2024	107,000
2025	108,000
2026	109,000
2027	109,000
2028	110,000
2029	110,000
2030	111,000
2031	111,000
2032	112,000
2033	112,000
2034	113,000
2035	113,000
2036	114,000
2037	114,000

14.5 Calculation of Woking's 1990 Carbon Emissions Baseline

Woking Borough's emissions levels for 1990 were estimated assuming UK per capita emissions levels and by plotting a linear extrapolation to the 2005 Department of Energy and Climate Change emissions data for Woking. See graph below.

The 1990 population estimate for Woking of 86,100 was multiplied by the UK's 10.4 tonnes per capita emissions rate. This results in an overall estimate of Woking's 1990 baseline of 895,440 tonnes. The Council's original Climate Change Strategy, adopted in 2002, carried an estimate of 1,060,000 tonnes. It is felt this latest estimate is more accurate as it is based on more up to date Woking population data and UK per capita emissions data.