



Carrickfergus Borough

**Sustainable Development
Audit and Action Plan**

*‘Living as if we intend to stay here
(A citizen of Carrickfergus)’*

September 2010

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1. Introduction

1.1 Definition and Objectives

Sustainable development is defined as, ‘Development which meets the needs of the present without compromising the ability of future generations to meet their own needs’ (The Brundtland Report, 1987).

The objectives of any sustainable development policy is to balance social, environmental and economic costs with the benefits sustainability brings, in order to ensure current generations have a high quality of life but that future generations are not compromised. It involves a consideration of both the local and global long term outcomes of current actions.

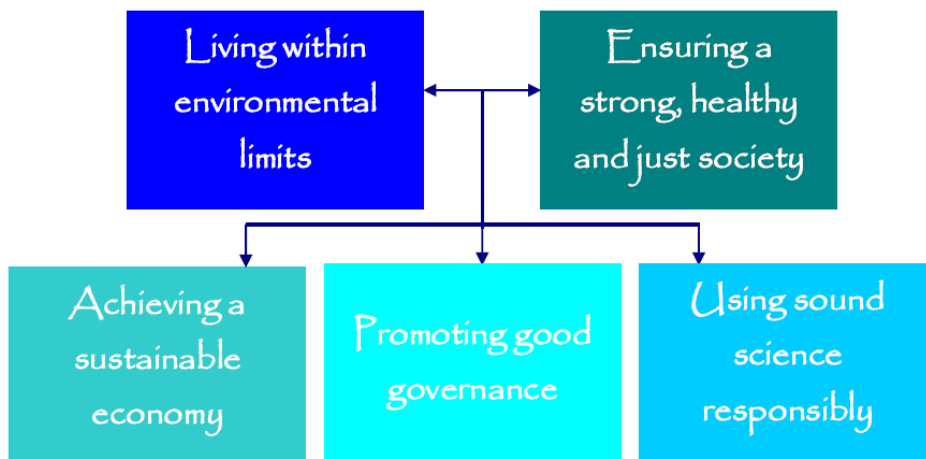
1.2 Importance

The key aim of sustainable development is to ensure societies are sustained and that future generations are not compromised by current actions. Alongside a moral obligation, councils now have a legal obligation to ensure appropriate measures regarding sustainable development are implemented. As of 31 March 2007 it became a statutory duty for public authorities, including district councils to ‘act in the way it considers best calculated to contribute to the achievement of sustainable development in Northern Ireland, except to the extent that it considers that any such action is not reasonably practicable in all the circumstances of the case’ (Northern Ireland (Miscellaneous Provisions) Act 2006) (Appendix 1).

1.3 The Five Principles of Sustainable Development

The Sustainable Development Commission highlights the five key principles of sustainable development (Figure 1). In May 2006 the Secretary of State Peter Hain launched the Northern Ireland Sustainable Development Strategy, which provided a framework and encouragement to public bodies regarding sustainable development. In addition to these principles this Strategy has a sixth principle: ‘Promote Opportunity and Innovation’.

Figure 1



1.4 The Six Priority Areas

Six priority areas have been defined (Everyone's involved - Northern Ireland Sustainable Development Strategy) in order to make the sustainable development objectives approachable and achievable. These six priority areas are:

- 1) Sustainable consumption and production
- 2) Natural resource protection and environmental enhancement
- 3) Sustainable communities
- 4) Climate change and energy
- 5) Learning and communication for sustainable development
- 6) Governance for sustainable development

1.5 Preface

The Corporate Plan and yearly Business Plans of Carrickfergus Borough Council share a broad objective with the Northern Ireland Sustainable Development Strategy; that is aiming to improve the quality of the Carrickfergus Borough without compromising the future of the Borough. The Corporate Plan (2005-2009) outlines the broad intentions of Carrickfergus Borough Council and the four key areas of this plan are relevant to sustainable development: citizenship, social progress, environment and economy. The Corporate Plan outlines objectives and targets to achieve these. A yearly Business Plan is produced with aims complementary to those in the corporate plan, thus ensuring the aims of the corporate plan remain active. The Corporate Plan and Business Plan are implemented via specific actions.

This document will address each of the six priority areas in turn, highlighting the objectives of Northern Ireland Sustainable Development Strategy, identifying actions currently taken by Carrickfergus Borough Council and proposing possible actions for the future. Under each proposed future action there is a table outlining potential environmental, economic and social impacts of implementing the action so that a balanced decision can be made. This is the recommended procedure for debating the relevant costs and benefits of proposed actions. Ideally any actions taken should be monitored and reported on yearly and incorporated in future Business Plans. Where possible the citizens of the Carrickfergus Borough should be made aware of progress and achievements, which will engineer a sense of enthusiasm amongst citizens. For clarity and simplicity a summary table of recommended actions is included but any person responsible for considering an action should consult the relevant detailed section, which may provide additional helpful information.

2. Sustainable Consumption and Production

2.1 Objectives

The key objectives outlined in the Northern Ireland Sustainable Development Strategy are:

- To become more *resource efficient*.
- To make the Northern Ireland public sector a UK regional leader in *sustainable procurement*.
- To minimise the unsustainable impacts of *consumption*.

2.2 Current Actions

2.2.1 Environmental Purchasing Policy

In pursuit of Carrickfergus Borough Council's objectives relating to environmental sustainability, the Council recognises the need to act as a role model, by carrying out its purchasing activities in an environmentally responsible manner. The Environmental Purchasing Policy is available to all staff. This policy is also included in the tender for parks in the Borough.

This policy states that the Council will therefore:

- Encourage and persuade suppliers to investigate and introduce environmentally friendly processes and products and will educate our suppliers concerning the Council's environmental strategy.
- Ensure that suppliers' environmental credentials are considered in the process by the completion of an Environmental Management Questionnaire forwarded to all potential suppliers and asking them to demonstrate existence of an Environmental Management System.
- Ensure that, where appropriate, environmental criteria are used in the award of contracts.
- Specify, wherever possible and reasonably practicable, the use of environmentally friendly materials and products.
- Ensure that consideration is given to inclusion, within all specifications, of a facility for potential suppliers to submit prices for environmentally friendly alternatives.
- Ensure that appropriate consideration is given to the costs and benefits of environmentally friendly alternatives.

It is hoped that networking between staff and firms will facilitate local sourcing.

In addition to this policy, all timber supplies are purchased from sustainable sources.

2.2.2 Fair Trade

The Council is committed to the Fair Trade initiative, and will, where possible, purchase catering products carrying the Fair Trade Mark. When using outside catering services, the use of catering products carrying the Fair Trade Mark is encouraged. The preferential purchasing of Fair Trade products ensures traders get a fair price for their products, facilitating sustainable production.

2.2.3 Healthy Eating

Carrickfergus Borough Council seeks to promote healthy eating choices within the borough. An important initiative has been the ‘Small steps to healthier choices’ scheme. Four hot food outlets in Carrickfergus are involved in this scheme to provide customers with a range of healthier options alongside their traditional products. Small changes are made but these have the potential to have a positive impact on the health of citizens. Small steps taken include healthier menu options, alternative ingredients and products with a lower fat and salt content compared to traditional products. Healthier preparation methods are also encouraged.

Any functions organised by Carrickfergus Borough Council aims to have healthy eating options available whenever refreshments are provided.

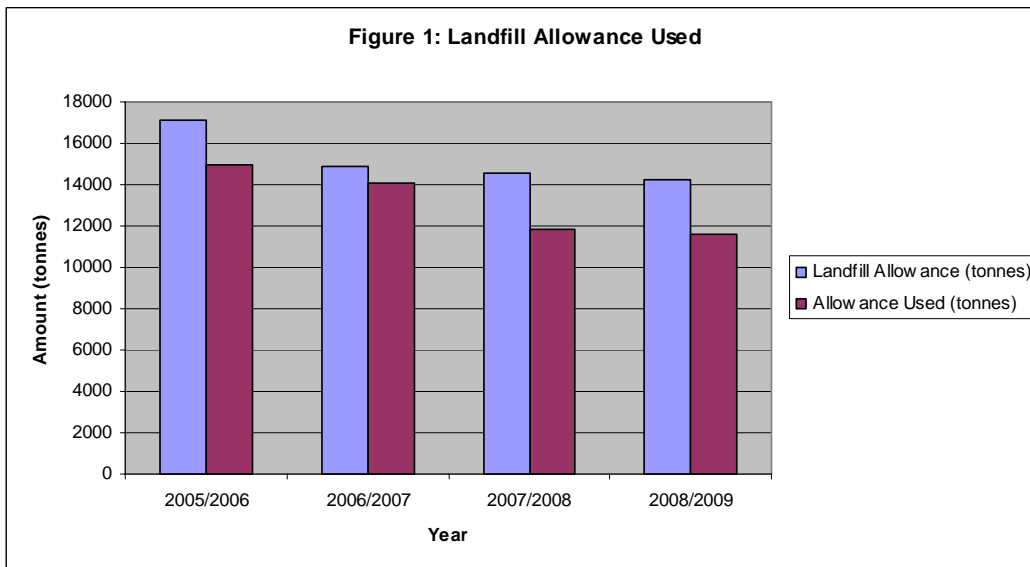
Healthy eating is further promoted through support for school growing clubs, the One Pot Pledge and the Eden Allotment Gardens.

2.2.4 Whole Life Costing

The ‘Procurement Policy and Procedures’ reminds staff that “value for money in procurement is not just about the cheapest option, but rather comes from focusing on the optimum combination of whole life cost and quality to meet customer requirements”. Whole life costing is therefore considered in purchasing decisions and policy.

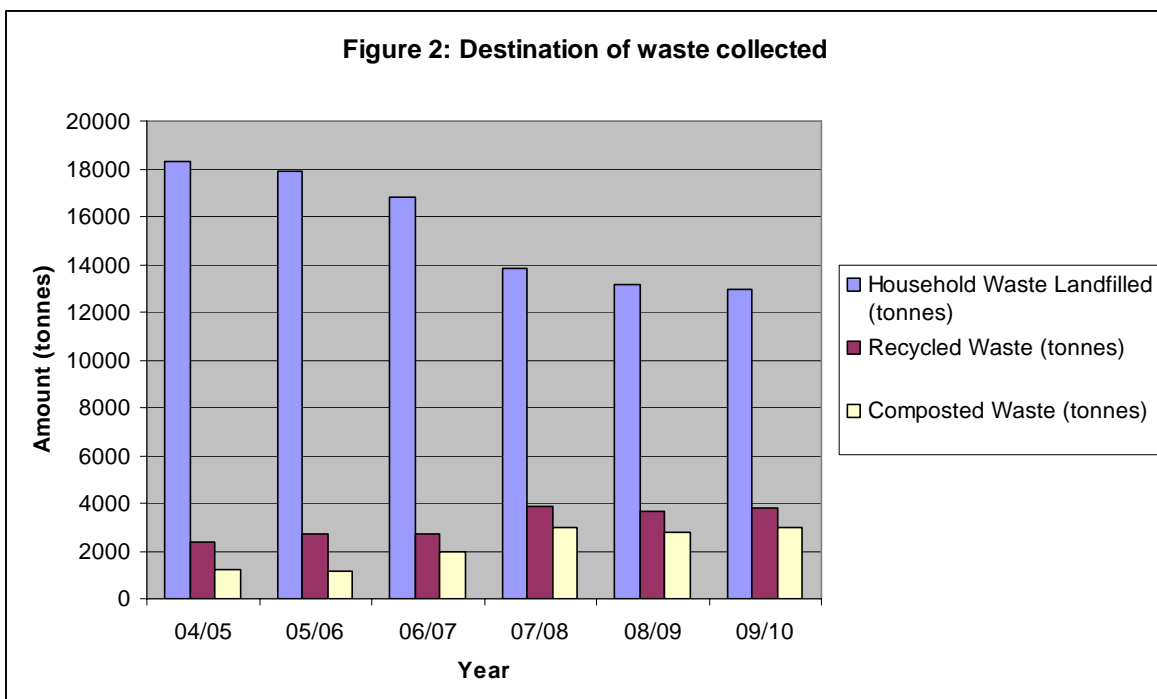
2.2.5 Landfill Diversion

Carrickfergus Borough Council aims to minimise the amount of waste diverted to landfill. Carrickfergus Borough Council seeks to meet the requirement of The Northern Ireland Waste Management Strategy and the EU targets for waste reduction, recycling and reuse. Councils have a landfill quota after which fines are implemented. The landfill waste from Carrickfergus Borough Council has consistently fallen beneath this quota (See Appendix) (Figure 1) with around 12,000 tonnes of waste being diverted to landfill in the last working year. This is more than three times the amount of waste diverted to recycling and so further improvements are being considered. The landfill allowance is also being progressively decreased to approximately 5,000 tonnes by 2020 so there is a sense of urgency to avoid large fines.



2.2.6 Recycling

Since 2004, Carrickfergus Borough Council has seen a decreased annual total municipal waste and annual household waste landfilled (See Appendix). This can be largely attributed to increased recycling in the borough, as demonstrated by the increases in the amount of waste recycled or composted (See Appendix) (Figure 2).



The waste from the kerbside collection is an important contribution to recycling. This is operated on behalf of Council by Bryson Recycling. Each household is supplied with a black and red kerbside box but there is no limit to the number of boxes that can be collected from each residence. Waste should be sorted as follows:

Black kerbside box	Red kerbside box
Paper	Card/cardboard
Plastic bottles	Glass bottles and jars
Cans	Clothes
Foil	Hand tools
Aerosol Cans	

To assist elderly or disabled citizens in positioning their kerbside box on the kerbside 'wheela trolleys' are provided on request. Citizens are also advised of the Bryson House assisted lifting service.

Alongside grey bins for non-recyclable household waste, the Council provide brown bins free of charge in an attempt to maximise the recycling within the borough. Currently replacement bins are also provided free of charge on request. The current stock of brown bins was purchased using a grant from the Northern Ireland Environmental Agency. It is hoped that the alternate week collection system for brown and grey bins will encourage recycling within the borough. Waste that can be disposed of in brown bins includes:

Brown Bin
Grass cuttings
Hedge clippings
Leaves
Twigs
Plants prunings
House plants
Food waste

Recently (2010) a new food waste collection service has been implemented allowing citizens to recycle more and waste to be processed in a more environmentally acceptable way. This reduces the amount of food waste entering landfill sites which would generate methane, a potent greenhouse gas. Citizens are currently provided with biodegradable bags to line their food waste bin free of charge. A publication has been produced by Carrickfergus Borough Council to educate citizens entitled, 'Your new food waste collection service'. It is also hoped that collection of food waste will highlight the importance of minimising food wastage. Food waste that can be recycled includes:

Food waste for Brown Bin
Meat and fish
Dairy products
Fruit and vegetables
Bread, cakes and pastries
Rice, pasta and beans
Uneaten food
Tea and coffee grounds

Waste from brown bins is shredded and composted and can be used on the allotments in the borough to help prepare, fertilise and level the land for planting.

The Civic Amenity Site offers further recycling opportunities for citizens including facilities to recycle tyres, fluorescent tubes, wood, paint, cardboard, rubble, oil, garden waste, white goods, batteries, plasterboard, metal, mobile telephones, paper, tins, textiles, glass, tetra packs and gas cylinders.

Recycling facilities are available for staff use in the Civic Centre and Town Hall car park. These are widely used and thus are emptied weekly. Kitchen facilities within Council buildings also contain kerbside boxes for staff convenience. Printer cartridges from Council offices are also recycled.

Recycling facilities are positioned in parks on special event days to encourage recycling. These facilities allow the recycling of plastic, glass and paper.

2.2.7 Recycling – Encouragement and Education

It should be noted that Carrickfergus Borough Council receive 50% of the revenue obtained from the materials collected that are sold on by Bryson House for recycling. This reduces the cost of the service to the ratepayer. It is therefore in the interest of citizens to recycle as much as possible and for this reason extensive awareness schemes are in place.

Council staff are enthusiastic regarding education and encouragement to citizens of the Borough, seeking to educate citizens in several ways. Visits to the Civic Amenity Site and presentations are available on request. These are widely used by schools and youth groups in the borough. On visiting the Civic Amenity Site young people are provided with a selection of stationary and bags produced from recycled materials such as tyres and vending cups. This stationary also advertises the 'Reduce, Re-use and Recycle' logo and it is hoped this will educate young people about the importance of recycling. This also demonstrates the importance of resource efficiency because recycled products are considered an efficient use of material.

The Council also supports Environmental Youth Speak an annual public competition which aims to stimulate environmental awareness amongst young people. Each age category is given a topic to debate and Carrickfergus Borough Council is an area where heats are held.

Another key information and education point is the Carrickfergus Borough Council website which has a section dedicated to recycling.

Council finances the production of leaflets quarterly by Bryson Recycling. These are delivered to home owners in the borough and are available from Council buildings throughout the borough. These leaflets seek to encourage and educate citizens further about the materials that can be recycled. Previous articles have included battery recycling, glass and top tips for a sustainable summer.

Council also runs litter campaigns, particularly via posters on their vehicles reminding citizens of the new food waste collection and the importance of reducing littering in the borough.

2.2.8 Use of ICT

The extensive use of ICT by Carrickfergus Borough Council has reduced the use of paper and the need to travel to meetings. Carrickfergus Borough Council aims to become a 'paperless office'.

2.3 Future Actions

2.3.1 Environmental Management System

It is recommended that Carrickfergus Borough Council produce an Environmental Management System in order to achieve ISO 14001 accreditation; an internationally accepted, environmental standard. The STEM Project in Northern Ireland can guide local authorities in achieving this standard and is currently working with nine local authorities. Since the Environmental Management Questionnaire asks businesses to demonstrate that they have an Environmental Management System in place, it seems appropriate that Carrickfergus Borough Council should also demonstrate this and ISO 14001 accreditation will enable this. The Council can then ask that contractors demonstrate equally good practice. Banbridge City Council is currently working to become the first council in Northern Ireland with ISO 14001 accreditation across all its departments.

2.3.2 Environmental Purchasing Policy

68.8% of staff responding to a survey (See Appendix 2 for results) said they were not aware of the Environmental Purchasing Policy, with 25% of staff applying this policy when making purchasing decisions. When asked to pick factors considered when making purchases from a choice of value for money, cost, environmental impact, local sourcing and whole-life costing no staff said they considered the environmental impact of purchasing decisions. 43.5% of staff who make purchases said they usually consider Fair Trade options and this is quite positive although there is room for improvement.

It is recommended that any staff that make purchases be educated about this policy and the importance of considering the environmental impacts of any purchasing decisions taken. Staff should also be encouraged to give preference to locally sourced products and services when making purchasing decisions, since minimising the travel miles will minimise carbon dioxide emissions. Where relevant, preference should also be given to goods which can be easily recycled or reused. (Note: the results of the Environmental Purchasing survey have also been passed to Ian Eagleson)

The Environmental Management Questionnaire could be edited to ask potential suppliers to attach evidence of their sustainable practice; since some staff are concerned that answers given may be inaccurate.

Alongside the Environmental Management Questionnaire, further attempt be made to encourage suppliers to provide sustainable options. This means making suppliers aware that they will only be considered if they have an Environmental Management System in place. In all cases suppliers should comply with the standards of sustainability set by Carrickfergus Borough Council. Any suppliers that are unsuccessful in securing business for reasons of sustainable development should be advised on possible improvements they could make.

The possibility of a sustainable procurement policy could be considered in the hope that this would clarify the procedure to assess economic and environmental benefits. Banbridge City Council have produced an excellent and comprehensive ‘Sustainable Procurement Policy’ (<http://www.banbridge.com/uploads/docs/sustainprocurementpolicy.pdf>). It details the key issues that staff should consider when purchasing products or services and suggests considerations for the sustainable procurement of specific items; for example paper and electrical goods.

The success of staff education could be audited internally each year. If staff education is resisted then consideration could be given to appointing a Purchasing Officer who is responsible for making all purchases.

Environmental impact	Decrease negative environmental impact and encourage businesses to do likewise.
Economic impact	No impact since email involved.
Social impact	Increase businesses and public opinion of the Council.

2.3.3 Fair Trade

Carrickfergus Borough Council could seek Fair Trade Accreditation and the Fairtrade Mark Ireland. This would require Fairtrade products to be provided in meetings and conferences and the Council to actively support the sale of Fairtrade products in the community. Currently Belfast City Council is the only council in Northern Ireland with accreditation from both the UK Fairtrade Foundation and Fairtrade Mark Ireland.

The suppliers used successfully by Belfast City Council are given below. They have been contacted and have provided information which has been forwarded to Building Control.

Product	Supplier	Web address
Tea, coffee, sugar	Robert Roberts (Mark Austin – Business card in Appendix 2)	http://www.robert-roberts.ie/cms_rr/
Biscuits	Traidcraft	http://www.traidcraft.co.uk/

Environmental impact	Improve quality of life of those involved in production.
Economic impact	Often a slight cost associated with Fairtrade products. Staff involved may require additional payment.
Social impact	Increase public opinion of the Council.

2.3.4 Further Recycling Facilities

To further increase the amount of waste recycled within the borough it is recommended that the possibility of providing recycling facilities within all parks and countryside be researched and considered. This could include recycling facilities for plastic bottles and drinks cans. Careful research may be necessary to decide whether park users would comply. This may prove infeasible because recyclable material in the borough is collected by Bryson House.

Some improvements could be made to encourage Council staff to recycle in their workplace. Five staff (out of 40) said no facilities for recycling were available in their workplace; it seems this may be applicable to the workplace at the Amphitheatre. 82.5% of staff (33/40) said they regularly recycled paper in their workplace which is very positive! Approximately 50% of staff recycled other materials such as tins, cardboard, printer cartridges and plastic bottles so perhaps further awareness is needed here. 17.5% of staff (7/40) said they currently emptied the recycling facilities and this appears to be on a voluntary basis. 47.5% said they would be happy to empty the recycling facility (19/40) and this could be via a designated 'emptier' for each facility (35%) or a voluntary rota (32.5%). Several staff provided additional comments on how best to ensure recycling facilities are emptied (Appendix 2). There should be a policy developed concerning workplace recycling to ensure procedure is consistent across Council. The survey results are available (Appendix 2) for guidance and they have also been passed to Jean Stewart.

Recycling facilities should also be made available at other Council buildings such as the leisure centre and community centres.

Those residents failing to recycle on a regular basis could be consulted to identify reasons for this and to solve any problems they may be having. It is possible that Bryson House would offer a service of education for these citizens. If citizens do not wish to recycle then perhaps their facilities for doing could be better used elsewhere.

Environmental impact	Decrease landfill.
Economic Impact	Facilities and collection would have a cost.
Social Impact	Improve public opinion of Council. May decrease litter in parks.

2.3.5 Ecological Footprint

The Sustainable Development Implementation Manual (2007) recommends that councils monitor and manage the reduction of their ecological footprint. This will have an environmental and economic benefit. The publication, 'Ecological footprints. A guide for local authorities' produced by WWF is available (Appendix 2). A programme (REAP software) for calculating ecological footprints is available from the Stockholm Environment Institute in York (see information sheet in Appendix 2). This software does have a cost but the consequent push to reduce the ecological footprint may have economic benefits.

Council could also promote the benefits of reducing citizens' ecological footprint. Savings of up to £1700 can be made per household per year (Community Eco-Challenge Project). A helpful contact is Eileen Campbell at the Southern Group Environmental Health Committee who organised the Community Eco-Challenge in five councils in the Southern Group. This involved working with community groups in each borough. She has kindly provided a Community Eco-Challenge CD Rom Toolkit and information booklet (Appendix 2).

Environmental impact	Decrease negative environmental impact.
Economic impact	REAP software has a cost but the WWF publication is free. Ecological footprint analysis may be the current responsibility of a member of staff otherwise there will be a further cost.
Social Impact	Improve public opinion of the Council.

2.3.6 Re-use

It is recommended that the Council consider the possibility of installing a re-use section in any future Civic Amenity Site. This would allow citizens to deposit goods that other citizens may be able to purchase for re-use. This would further reduce waste within the Carrickfergus Borough. The profit or a proportion of the profit could be passed to Carrickfergus Borough Council to finance the project. Another option would be to enter a partnership with a local bring-and-buy business, similar to the partnership between Restore and Banbridge District Council (<http://www.banbridge.com/template1.asp?pid=675&parent=671&area=1>).

Banbridge District Council received funding from the Department of Education and Learning for this project, which involves Restore claiming furniture that can be re-used and selling it to local citizens for a reasonable price.

Carrickfergus Borough Council could promote re-use of plastic carrier bags by promoting 'Need a bag' week in the borough. It is hoped that this would also reduce plastic waste. Amongst ten other councils in Northern Ireland this has been done successfully at Banbridge District Council. Help can be obtained from the Marine Conservation Society and their 'Go plastic bag free' campaign.

(http://www.mcsuk.org/what_we_do/Clean%20seas%20and%20beaches/Litter%20campaigns/Go%20plastic%20bag%20free)

Environmental Impact	Decrease landfill. Perhaps decrease incidents of littering and illegal dumping.
Economic Impact	Staff payment to run facility but may be offset by profit from such a scheme. 'Need a bag' could be organised by a community group, hence cost would be negligible.
Social Impact	Improve public opinion of the Council. Increase community involvement.

2.3.7 Recycling in Council Buildings

The possibility of paper recycling facilities installed in offices within Council buildings could be considered. Positioning of such facilities beside printers would be most appropriate. It is hoped that this would encourage paper recycling.

Environmental Impact	Decrease landfill.
Economic Impact	Staff to remove recycling from office may require payment.
Social Impact	Council could act as role models if this scheme is publicised via the website.

2.3.8 Recycling and Local Businesses

The Sustainable Development Implementation Manual (2007) recommends local councils “promote and develop incentives for businesses and individuals to encourage recycling and waste minimisation”. The possibility of encouraging local businesses to recycle waste has been assessed and unfortunately recycling may appear to be an economically more expensive method of disposal compared to landfill. It is likely that the main objective of small, local businesses is to make a profit and therefore encouraging a more expensive method of disposal may prove unsuccessful. Other advantages of recycling could be promoted; such as raising profile in the community and protecting the environment. Any business in the Carrickfergus Borough area that wishes to consider recycling should be directed to ‘The Business Recycling Info Pack’ produced by Bryson Recycling. Bryson Recycling offers a free audit and advice to any local businesses on request and believes that with their advice, recycling can be economically viable.

Instead of focusing efforts on encouraging recycling, Carrickfergus Borough Council should encourage waste minimisation. This will have a positive economic impact on local businesses, as well as a positive environmental impact. These benefits should be highlighted to businesses, with emphasis on the economic benefit. It will also help Carrickfergus Borough Council to decrease its total waste collected and that which is directed to landfill. This will become increasingly important as the landfill allowance is decreased. A publication could be produced for local businesses.

Environmental Impact	Decrease landfill.
Economic Impact	Any publications will have a cost. May hugely reduce landfill in the future thus helping avoid fines. Cut income from waste collection from businesses but reduce need for staff for this collection.
Social Impact	Improve businesses opinion of the Council.

2.3.9 Resource Efficiency

Consideration should be given to how Carrickfergus Borough Council can promote resource efficiency within Council Buildings. This could include posters encouraging the reduction of water wastage from taps and the importance of eliminating unnecessary printing.

Relevant posters can be ordered or downloaded here:

<http://www.carbontrust.co.uk/cut-carbon-reduce-costs/products-services/technology-advice/posters/Pages/posters.aspx>

The possibility of double-sided printing could be considered (this can already be done on the printers but paper must be manually turned over and put in tray 1 –machines can be purchased which do this automatically), as could the use of scrap paper for printing. A note could be added to the end of emails: ‘Save paper: do you need to print this email’.

Extending this to the Borough, the importance of minimising food wastage could be promoted to citizens, in conjunction with the new food waste collection service.

Environmental Impact	Conserve environmental resources.
Economic Impact	Decrease cost of water and paper. Printers that print double sided could be considered when facilities are renewed. Food wastage: Costs associated with such a campaign, although perhaps information and encouragement could be added to any existing publications, such as the leaflet produced for the Council by Bryson Recycling.
Social Impact	Council could act as role models if this is publicised on the website.

2.3.10 Healthy Eating

Carrickfergus Borough Council should continue to encourage Small Steps to Healthier Choicer in the Borough’s hot food outlets and attempt to increase the number of participants.

Environmental Impact	Improve health of citizens.
Economic Impact	Little economic impact since scheme already in place.
Social Impact	Improve relationships between hot food outlets and their customers through giving more extensive food choices.

3. Natural Resource Protection and Environmental Enhancement

3.1 Objectives

The key objectives outlined in the Northern Ireland Sustainable Development Strategy are:

- To conserve our *landscape* and manage it in a more sustainable way.
- To protect and enhance the *freshwater and marine environment*.
- To improve our *air quality*.
- To conserve, protect, enhance and sustainably re-use our *historic environment*.
- To protect and enhance *biodiversity*.

3.2 Current Actions

3.2.1 Corporate Plan - Environment

Inclusion of environmental sustainability in the Corporate Plan (2005-2009) is intended to promote care for our environment and to create a sustainable clean and healthy living space. The Corporate Plan aims to promote use of the Borough's natural and recreational assets. This is intended to increase the health and social well-being of citizens, whilst ensuring an attractive, high quality environment. The Corporate Plan also aims to develop an ethos of environmental sustainability in all areas of Council business. These objectives ensure sustainable development is considered in all decisions made by Council.

3.2.2 Parks and Countryside

It is hoped that the availability of parks and countryside encourages citizens to interact with their natural environment. Carrickfergus Borough is renowned for its parks and countryside; winning 'Ulster in Bloom' six times and achieving runner-up in 'Britain in bloom' five times. Alongside a section on Council's website and a Carrickfergus Parks and Countryside blog (<http://carrickfergus-parks.blogspot.com/>), nine core principles have proved successful:

- 1) ***Parks to be Proud of*** - improving the quality of the Borough's greenspace through current and future investment.
- 2) ***Bringing the Parks to Life*** - making our parks open and accessible to all user groups.
- 3) ***A Partnership with the Community*** - encouraging a sense of ownership through our 'community involvement scheme'.
- 4) ***Parks with a Presence*** - maintaining a staff presence in parks and giving each park a clear identity.
- 5) ***The Healthy Living Centre*** - ensuring that our greenspace contributes significantly towards the improvement of health for all who live, visit and work in the Borough.
- 6) ***A Safe Environment for All*** - improving safety in parks and reducing anti-social behaviour and the fear it causes.
- 7) ***Promoting Sustainability*** - contributing to Council's objectives in sustainability, bio-diversity and the promotion of Local Agenda 21.

- 8) **Urban Regeneration and Social Renewal** - Establish greenspace provision as a core element in the Borough's programme of social and economic regeneration and urban renewal.
- 9) **Citizenship** - encouraging Citizens to view their gardens as extensions of the Borough's greenspace.

The parks and countryside available to citizens include: Legg Park, Marine Gardens, Shaftesbury Park, Joymount Gardens, Bashfordsland Wood, Oakfield Glen, Leisure Centre Park, Whitehead Recreation Grounds and Blackhead Path (Figure 1 and Figure 2). Plans are in place to redevelop the marine gardens and create a new park area at the Amphitheatre. The Knockagh Monument Project also aims to promote environmental improvement and recreation and it is hoped this will attract further tourism. It is also hoped that any plans Larne Borough Council has to redevelop the pathway from Blackhead to The Gobbins could be extended to include the pathway from Whitehead to Blackhead, although this project is in very initial stages. The Eden allotments are another area of greenspace available to citizens on request.



Figure 1 – Parks and countryside in Carrickfergus

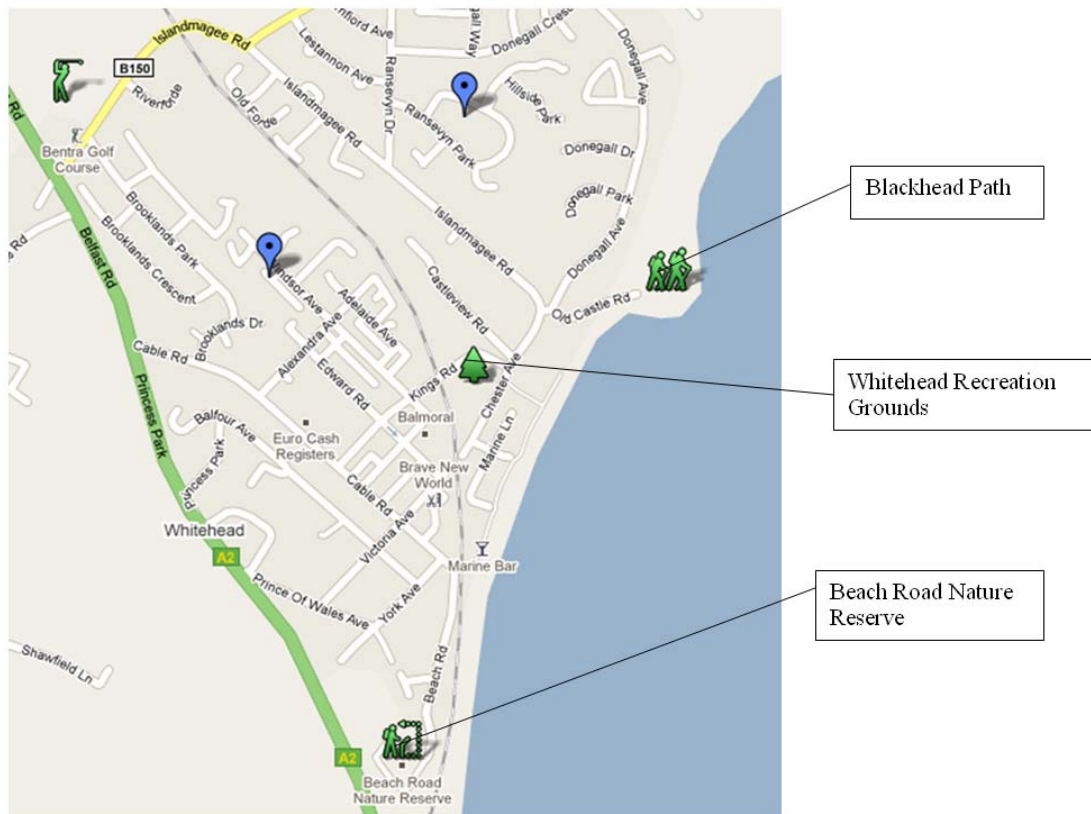


Figure 2 – Parks and Countryside in Whitehead

Citizens of the borough are educated about the park facilities via the Carrickfergus Borough Council website and signage within the parks. The Countryside Code is provided on Council website to ensure protection of the countryside. Events and activities are also held in the parks throughout the year to encourage citizens to interact with their environment.

3.2.3 Nature Reserves and Conservation Areas

Beach Road Nature Reserve is located in Whitehead and is owned and managed by Carrickfergus Borough Council. Recently the local community group ‘Brighter Whitehead’ received a grant from Better Belfast to make substantial environmental improvements to the reserve. A publication entitled, “From Working Quarry to Nature Reserve. Beach Road Nature Reserve” has been produced and details the history of the area, the habitat and the wildlife that exists there.

Carrickfergus Conservation Area is located near to the town centre; an area of wildflower pasture. Tree plantation, management and reduced cutting maintain the natural status of this area.

Carrickfergus Borough has seen a reduction in cutting with the hope of maintaining and promoting the existence of natural grassland species. For example at Greenisland Sports Pitches reduced cutting has led to areas of increased grassland.

Carrickfergus Borough Council can provide Carrickfergus and Whitehead ‘Wild Trails’ leaflets to citizens produced by the Ulster Wildlife Trust. These seek to increase citizens’ awareness of their natural environment.

3.2.4 Marine Environment

Carrickfergus Borough Council Marina and Harbour operate in accordance with guidelines provided by the British Marine Federation and Royal Yachting Association. These areas have also received the European Blue Flag Award; an eco-label awarded on demonstration of high water quality, environmental education and information, environmental management and safety. Five Gold Anchor status has been achieved since 2006 and environmental considerations are an aspect of this award. An environmental impact assessment is performed when installing new facilities; for example the new pontoons in 2009. The normal operating procedures outline appropriate responses to any fuel spillages and emergency procedures can be applied for larger spillages that would otherwise negatively impact the environment. Facilities are available for waste oil disposal to discourage illegal disposal into the water.

The Carrickfergus Masterplan research found that the Marine Highway acts as a barrier separating the citizens of Carrickfergus from their coastline. Despite this, action is taken to educate citizens about the marine environment in the borough and to ensure protection and enhancement of this marine environment. This is achieved primarily by Seashore Safari events; public events educating citizens about their coastline. Hour long Mystery Boat trips are also offered throughout the summer months for a terrific view of the castle and coastline. Beach clean events are organised regularly both by Carrickfergus Borough Council and by groups of local citizens (for example, Transition Whitehead), hence increasing involvement with the natural environment. Carrickfergus Borough Council can supply anyone wishing to hold a beach clean with gloves and bags and can arrange the removal of any waste collected. Council can also provide information and encouragement regarding the recycling of beach waste.

The Northern Ireland Environmental Agency test water quality at various locations in the Borough (See Appendix 2 for letter).

3.2.5 Biodiversity

A high biodiversity is preferable for sustainable development. The landscape of the Carrickfergus Borough is dominated by urban sprawl and is considered under threat from urban expansion, especially in the area between Greenisland and Carrickfergus. Biodiversity of the Carrickfergus shoreline is considered weak but there are opportunities for improvement (Carrickfergus Shoreline Biodiversity Profile. 2006). Carrickfergus Borough Council has a duty to conserve biodiversity under the Wildlife and Natural Environment Bill 2010 which states, "It is the duty of every public body, in exercising any functions, to further the conservation of biodiversity so far as is consistent with the proper exercise of those functions". A ten point action plan has been produced, which outlines key steps taken to protect and enhance biodiversity:

1. Reducing chemical inputs in our properties.
2. Not using peat based products.
3. Planting wildflower meadows and thousands of trees since 2000.

4. Deploring the illegal collection of plants from the wild. An advice section is available on Council website.
5. Ensuring where possible that wood products used, are genuinely certified as coming from forests that are well managed with full regard to the environment.
6. Employing horticultural best practice and encouraging a sustainable approach to the work we do.
7. Monitoring, recording and enhancing biodiversity at our open spaces.
8. Providing relevant scientific and practical advice to our customers.
9. Maintaining plant genetic diversity by growing a wide range of ornamental plants.
10. Providing advice on the control of invasive alien plants. An advice section is available on Council website.

To achieve the objective to protect and enhance biodiversity, public awareness is essential. This is primarily achieved via a biodiversity webpage on Council's website, which outlines how citizens can increase biodiversity in their gardens.

Five key aspects of biodiversity are taken into account when Carrickfergus Borough Council considers its business:

- 1) ***Protecting biodiversity*** - Ensure that biodiversity on Carrickfergus Borough Council land or land Council has influence over is protected from removal, damage and disturbance.
- 2) ***Maintaining biodiversity*** – Ensure that any operation required to maintain biodiversity on Carrickfergus Borough Council land is undertaken. This may include maintaining water levels, appropriate grazing and cutting regimes, removing alien invasive species and avoiding over-fertilisation.
- 3) ***Enhancing biodiversity*** – Where possible take opportunities to enhance biodiversity on Carrickfergus Borough Council land or property; for example, by planting native broadleaves, converting amenity grassland to wildflower meadow, providing bat boxes and creating new ponds and wetlands.
- 4) ***Restoring biodiversity*** – Undertake actions that restore former natural biodiversity previously lost from a site. This could involve restoration of woodlands, wetlands or hedgerows, reintroduction of species such as the grey partridge, or extending existing habitats for priority species.
- 5) ***Promote an understanding of biodiversity.***

3.2.6 Environment Maintenance – Waste Collection

The waste collection policies focus on decreasing the amount of waste going to landfill sites and place emphasis on recycling. For this reason non-recyclable household waste is collected from each household once a fortnight rather than once per week. Each household is responsible for purchasing a grey bin. In general one bin is collected per household but in certain circumstances two can be collected. The Civic Amenity Site is also available for public use. Waste is also collected from commercial premises and shops on request and for a fee (except for registered

charities). Carrickfergus Borough Council also provides a ‘Bulky Items’ collection service on request and via a number of bulky waste mobile collection points.

3.2.7 Environmental Maintenance – Street Cleansing

Street sweeping is a key aspect of street cleansing in the Carrickfergus Borough. The town centre is swept on a daily basis by a mechanical sweeper. It is also litter picked manually and brushed daily. High density residential areas are swept by a mechanical sweeper once a week and low density residential areas once a month.

Waste in litter bins in the Town Centre is collected on a daily basis. Carrickfergus Borough Council aims to empty all other litter bins two to three times per week, including dog litter bins.

3.2.8 Environmental Maintenance – Fly tipping

Fly tipping is regularly reported within the borough. There has been a slight but not significant increase in fly tipping reports within the borough during the last three years (See Appendix). In all cases Council aims to be proactive and reactive taking suitable measures to remove waste and take appropriate measures to prevent further offences. When available, witness statements are collected. If the offender is identified, fixed penalties can be applied. The removal action is dependent on the amount of waste in question. Small amounts (less than 20m³) are removed by Council but if a larger amount of waste is illegally dumped, the Northern Ireland Environmental Agency is contacted. If fly tipping occurs recurrently in a particular area, local citizens are contacted to inform them of the ‘Bulky Collection Service and mobile collection points. An article about fly tipping has also featured in the Compass Newsletter to increase awareness and decrease incidents of fly tipping.

3.2.9 Environmental Maintenance – Dark smoke

The emission of dark smoke is prohibited under the Clean Air Order (NI) 1981. This Act defines dark smoke as, “smoke which, if compared in the appropriate manner with a chart of the type known on the 9th June 1964 as the Ringelmann Chart, would appear to be as dark as or darker than shade 2 on that chart”. This Act prohibits dark smoke from being emitted from the chimney of any building and from any industrial or trade premises. Council actively supports this Act within the borough, as do the majority of businesses. If dark smoke is reported from a chimney or trade premises Council write to the premises to inform of the offence. If offences are recurrent this can result in prosecution. There has been a significant decrease in smoke service requests received by Carrickfergus Borough Council during the last three years (See Appendix).

3.2.10 Environmental Maintenance - Pollution

Carrickfergus Borough Council is actively involved in supporting the Integrated Pollution Prevention and Control Order (IPPC), alongside the Northern Ireland Environmental Agency, via the implementation of Pollution Prevention and Control regulations. On a large scale the Northern Ireland Environmental Agency monitors

pollution to air, water and ground but Carrickfergus Borough Council monitor pollution to air are involved on a smaller scale, ensuring premises comply with their PPC permit. Business premises must make an application and a permit is issued outlining conditions that the business must comply with. Routine inspections ensure businesses comply with these conditions. This involves ensuring all permitted premises in the Borough operate within required limits by performing routine inspections of premises and records.

Regarding air pollution, Carrickfergus Borough Council acts in accordance with the Environment (Northern Ireland) Order 2002 which states, "Each district council shall from time to time cause a review to be conducted of the quality for the time being, and the likely future quality within the relevant period, of air within the council's district". Diffusion tubes are used in monitoring air quality with areas of high density road traffic being targeted. Carrickfergus Borough Council has one permanent, automatic air quality monitoring station in Sunnylands which allows a continuous measurement of air quality. There are also many diffusion tubes positioned at various urban and rural locations throughout the borough which measure concentration of nitrogen oxides and sulphur dioxide in atmospheric air (i.e. air pollution from road traffic and solid fuel home heating systems). These measurements are analysed by the Department of the Environment Northern Ireland and an annual report is produced. If air pollution is identified, the appropriate action is taken to rectify it, involving collaboration with the Department of the Environment Northern Ireland.

Water supplies in the Carrickfergus Borough are regularly chemically tested by Northern Ireland Water Limited. Carrickfergus Borough Council performs bacteriological tests on any water destined for human consumption. The water quality of the swimming pool at Carrickfergus Leisure Centre is also regularly monitored using an automatic hypochlorite dosing system, including two filter tanks. The output from these filter tanks enters a holding tank and ultimately the sewerage system. If water quality of any premises is found to be below the acceptable level a public health notice will be issued in accordance with the Public Health Ireland Act 1878. The Environmental Services Department will also test any other water sources when required. Since any deviations from satisfactory are investigated these measures ensure the freshwater environment of the Borough is protected.

Northern Group Systems routinely monitor levels of radiation in the Borough. The radiation levels of shellfish are also routinely monitored by Carrickfergus Borough Council.

Action is taken to prevent pollution on land within the Carrickfergus Borough. It is hoped that the employment of a Litter Warden will act as a successful deterrent. Signage is also used to combat littering and dog fouling. Action is taken to minimise land pollution caused by bonfires; for example, the bonfire forum is proving to be extremely successful with a huge decrease in the number of bonfires in the borough and a dramatic reduction in the level of illegal activity associated with the bonfires. If land pollution is reported a public health notice is issued and the appropriate action taken to rectify land conditions.

Carrickfergus Borough Council continually investigates possible action that can be taken to target all forms of pollution. In the past articles in the Compass newsletter and mail drops have proved successful. On request information presentations can be given in youth groups and schools.

3.2.11 Environmental Maintenance – Noise

The Environmental Services Department investigates noise service requests under the Pollution Control and Local Government (NI) Order 1978. A publication is available from Environmental Services entitled, 'A Step by Step Guide to Noise Complaint Investigations'. Officers can investigate noise service requests from domestic, commercial and industrial sources. The appropriate action is taken to ensure problems are resolved. On receiving a service request Officers will contact the person responsible for the noise nuisance in writing to advise them of the legal position. The complainant will also be asked to keep a noise monitoring diary which will be assessed to decide whether the noise constitutes a nuisance. The complainant will be asked if they would be willing to provide evidence in court. Where diaries indicate a nuisance exists, an Environmental Health Officer will obtain further evidence by visiting and witnessing the nuisance or by installing monitoring equipment. Normally up to three attempts will be made to witness or record the nuisance. Complainants will also be advised about pursuing Private Nuisance Action at this stage. If evidence is obtained a Noise Abatement Notice will be served on the person responsible for the noise nuisance or if that person cannot be found, the owner of the land from which the nuisance arises. If this notice is not complied with or is breached, the next step will involve prosecution of the person responsible, provided the complainant is willing for their name to be disclosed. This procedure has proved successful with a slight reduction in noise pollution service requests from 2007 to 2009 (See Appendix).

3.2.12 Environmental Maintenance – Dampness and Condensation

Citizens can arrange a visit to establish the cause of any dampness in their home. Visits can also be arranged to assist with other public health measures such as dry and wet rot. Carrickfergus Borough Council Officers can also meet with landlords on behalf of citizens. A section of Carrickfergus Borough Council website is dedicated to advice on preventing condensation and mould promoted by damp. Where conditions amount to a Public Health Nuisance, Officers from the Environmental Health section may serve a Public Health notice on the owner occupier or landlord in order to require them to take certain measures to abate the nuisance within a specified time period. Failure to comply with such a notice could result in the individual being prosecuted.

3.2.13 Environmental Maintenance – Pest Control

The Environmental Health Department offers a range of advice regarding pest prevention, dealing with infestations and pest proofing your home. On request pest control fact sheets and contact details for pest control services are provided. Pest control information is also available on Council website and via occasional press releases.

3.2.14 Environmental Maintenance – Tobacco

The Smoking (NI) Order 2006 affects most businesses in Northern Ireland including factories, offices, bars and restaurants as well as work vehicles and public transport. The law also applies to enclosed public places such as community and church halls, sports centres, shopping centres and schools. The Environmental Health Section in Carrickfergus Borough Council is available to answer any smoke-free queries and useful links are available on Carrickfergus Borough Council website. To discourage litter from cigarettes Carrickfergus Borough Council supply disposal boxes. These disposal boxes also educate citizens about the fines that can be imposed for littering offences.

The Environmental Health department also aim to protect young people from tobacco and frequently carry out test purchasing with retailers regarding sale of tobacco to underage citizens.

3.2.15 Environmental Maintenance - Abandoned Vehicles

Occasionally abandoned vehicles are reported in the borough. Abandoned vehicle reports have fallen by 25% over the last three years (see Appendix), possibly due to media attention and therefore increased public awareness. Reports are made by members of the public and the Police Service Northern Ireland. Council attempt to ascertain the owner of the vehicle by performing a DVLA registered enquiry. If this is successful the owner is contacted. If unsuccessful, a seven day notice is normally served and in most cases the vehicle is removed. After this period Council employs a contractor to remove the vehicle. The key objective is swift removal of the abandoned vehicle.

3.2.16 Environmental Maintenance – Dog Control

Dog Control includes dogs fouling, straying, attacks on person or livestock. Carrickfergus Borough Council employs one Dog Warden who patrols the area and is available during office hours. Carrickfergus Borough Council website informs citizens of regulations which should be adhered to.

It is an offence under the Dog Fouling (Prescription of Places) Regulations (NI) 1995 for “a person in charge of a dog to permit the dog to deposit its excrement in any place”. Citizens are encouraged to adhere to this and disposable bags are available from the Sullatober Depot (Environmental Services Cleansing Section) and from the reception desk of the Museum and Civic Centre. Dog fouling bins, stickers and signage are placed in strategic locations throughout the borough close to known walking routes and these are emptied at least three times per week. Further action includes an extra warden employed at peak times when owners are most active with their dogs and an environmental warden to carry out visits in the community to educate children and adults on the importance of dog care and control. If dog fouling becomes problematic in a particular area, citizens of that area are informed regarding dog control in an attempt to combat the problem. A publication produced by Carrickfergus Borough Council is available for citizens entitled, “Fouling”. This

outlines possible punishment if a crime is reported and current action taken. A recent article in the Compass Newsletter also highlighted the importance of dog control.

Under the Dogs (NI) Order 1983 it is an offence for a dog to be unaccompanied or not be 'under control'. Action is taken by the Dog Warden who can be contacted by telephoning the Environmental Health Section.

Further publications available from Carrickfergus Borough Council buildings include, 'Is your dog barking too much? (Environment and Heritage Service)' and 'Environmental Hazard. Are you a responsible dog owner? (The Kennel Club)'. Carrickfergus Borough Council hopes to support Noise Action Week, specifically focusing on noise pollution caused by dog barking.

3.2.17 Sustainable Food

Carrickfergus Borough Council seeks to encourage and support the sustainable growth of food within the Borough. Sustainable growth is encouraged through the provision and maintenance of the five hectare Eden Allotment Gardens, which in the past has won the 'BTCV project of the year' award and is currently the largest allotment site in Ireland. Carrickfergus Borough Council also provides encouragement and mayoral support for the One Plot Pledge. Sustainable food growth is also encouraged by supporting school growing clubs and it is also hoped that this will promote healthy dietary choices. Further advice on 'Green Gardening' is available on the Council website.

In a further bid to encourage sustainability Carrickfergus Borough Council is committed to encouraging allotment holders at the Eden Allotment Gardens to minimise use of pesticides and other chemicals. One of the four allotment sites is entirely organic and thus no chemicals are permitted to be used in this site. Allotment holders are also encouraged to maximise water use efficiency and an advice section entitled, 'Water Conservation at Eden Allotment Gardens' is provided on the Eden Allotments website.

Carrickfergus Borough Council seeks to appropriately educate and inform allotment holders. This has been achieved via the production of clear information, including pamphlets ('Your guide to good allotment use' Carrickfergus Borough Council), display boards, posters and a dedicated website. A key point of communication to plot holders is the 'Eden Allotment Gardens Newsletter'. Information for citizens, encouraging them to become involved with Eden Allotments is provided via Council website and a leaflet entitled, 'Eden Allotment Gardens. Grow your own!'. This is in line with a key objective of the Allotment Strategy: to promote citizen involvement with the Eden Allotment Gardens.

3.2.18 Chemical Usage

Carrickfergus Borough Council acts to ensure there is a minimal negative environmental impact of any chemical substances used in their parks.

Regarding park facilities and general maintenance, environmental issues are given consideration. Plastic furniture is used within the parks, thus eliminating the use of wood preservatives. Only non-toxic paint is used within parks. In all appropriate circumstances cleaning of park facilities and pathways is via warm water thus minimising the use of chemicals.

Fertilisation of shrubs, flowers and trees planted by Carrickfergus Borough Council is intended to have minimal negative environmental impact. Nitrogen, potassium and phosphorous based fertilisers are used but are always at the lowest appropriate concentration. Often the use of natural fertilisers is considered; such as seaweed based fertiliser. Since 2007 there has been a 15% reduction in the amount of fertiliser applied per annum (See appendix). The last five years have seen a decrease in the amount of fertiliser being used, due to decreased application throughout parks and open areas. A further reduction is estimated for 2011 due to application solely to sports grounds.

There is also an aim to minimise the amount of pesticide used. Since 2007 a 23.7% reduction in application has occurred (See appendix), primarily due to increased use of and manual weeding. Usage is mostly in public amenity sites; such as bowling greens and sports grounds. This action is deemed necessary and desirable by the citizens of the Borough. All staff involved in the handling and application of pesticides have achieved relevant qualification such as, 'NPTC Level 2 Certificate of Competence in the Safe Use of Pesticides (PA1, PA6)'.

The application of herbicides is occasionally necessary on Public Amenity Sites. In these cases care is taken to choose species-specific herbicides, thus minimising the risk to non-target species.

In all cases of chemical usage, the lowest appropriate concentration is chosen and a risk assessment is performed to ensure this action is not a hazard to Carrickfergus Borough Council staff or citizens. Special consideration is taken in areas used frequently by children and household pets. Consideration of weather conditions is also taken to ensure re-application is not necessary, again with the aim of keeping usage at minimal levels and decreasing the risk of run-off. All persons applying chemicals are appropriately trained in doing so and are aware of the necessity to minimise negative impacts on the environment. Guidance provided by suppliers regarding methods of decreasing environmental impacts are also adhered to. The appropriate application method is chosen and the use of wide-covering mist nozzles is avoided, achieving highly targeted application. Special care is taken when chemical application occurs close to waterways to avoid run-off and the associated eutrophication problems.

Chemicals are stored in the appropriate chemical cabinets and relevant staff are trained in safe storage practices. The amount of chemical storage is minimised to avoid wastage, thus increasing efficiency of use.

Disposal of packaging and chemical substances is the responsibility of the supplier.

3.2.19 Peat

Carrickfergus Borough Council has a policy not to use peat based composts.

3.2.20 Hedges

For public safety and convenience, hedges within parks and in the borough are cut when necessary. All material removed is recycled via deposition in facilities at the Civic Amenity Site. Hedges are not interfered with during the bird nesting season and if nests are located measures are taken during hedge trimming to ensure these are not disturbed (thus complying with The Wildlife (Northern Ireland) Order 1985). The risk of noise pollution from machinery has also been considered and the most environmental method of removal is used.

Carrickfergus Borough Council also hopes to encourage citizens to cut hedges at certain times of the year and in the past this has been achieved via newspaper articles.

3.2.21 Public Rights of Way

The Access to the Countryside (NI) Order 1983 states: “A district council shall assert, protect and keep open and free from obstruction or encroachment any public right of way; and for this purpose a district council may institute proceedings in its own name”. Carrickfergus Borough Council actively pursues this duty, regularly visiting public rights of way to ensure they are kept in a satisfactory condition. Carrickfergus Borough Council receives reports and enquiries regarding public rights of way and attempts to act accordingly; for example removing any waste illegally dumped and ensuring hedges and flooding do not prevent access. Often this involves contacting land owners. The ‘Public rights of way in Carrickfergus Borough’ policy and public right of ways investigation initiation application forms can be obtained from the Carrickfergus Borough Council website or from the Civic Centre. These outlines the procedure to investigate the status of a route alleged to be a public right of way.

3.2.22 Tree Planting and Removal

Carrickfergus Borough Council seeks to enhance our environment via the plantation of a wide variety of tree species. Trees are planted in several sites within the borough (Bentra Golf Course, Beach Road Nature Reserve, Blackhead Path, Whitehead Recreation Grounds, Eden Playing Fields, Eden Allotment Gardens, Woodburn Playing Fields, Greenisland Playing Fields, Shaftesbury Park, Legg Park, Leisure Centre.) as decided by the Parks and Countryside Officer. The number of trees planted per year varies, with 96,000 individuals being planted since 2000. There are plans to reach 100,000 within the next year. Examples of species recently planted include: *Fagus sylvatica*, *Carpinus betulus* and *Pinus sylvestris*. Before plantation occurs the suitability of a site is assessed and appropriate species are chosen based on the site conditions. Normally plantation does not involve chemical clearance of the area as this has been found to decrease sapling establishment.

3.2.23 Bonfires

The Carrickfergus Bonfire Forum launched in 2005 consists of members from Carrickfergus Borough Council's Environmental Services Department and Good Relations Unit, Carrickfergus Community Safety Partnership, the PSNI, Fire and Rescue Service, Roads Service and local community representatives. The Forum's objective is to "influence the celebrations at bonfire sites, to generate a spirit of movement towards consensus, to reduce perceived community tension and improve intra-community relations". The Carrickfergus Bonfire Forum has proved very successful with a reduction in bonfire service requests in the last three years (See Appendix).

A publication entitled, 'Bonfires (Interagency Working Group on Bonfires)' is available from the Environmental Services Department at Carrickfergus Borough Council Civic Centre.

3.2.24 Water Conservation

Carrickfergus Borough Council has fitted low flush devices on several toilet facilities in the Borough and there are plans to fit these on refurbishment of buildings. Hippo bags have been installed in many of the facilities.

Pressure reducers and percussion taps have been installed in many facilities and again there are plans in place to further this on refurbishment. Electronic water saving devices have also been fitted in the showers within the Leisure Centre.

Rainwater harvesting equipment has been installed at Sunnylands Community Centre and this equipment will be considered for any new buildings. The possibility of installing such equipment in existing buildings has been dismissed because the plumbing and fitting of a holding tank would be infeasible, impractical and extremely disruptive.

3.2.25 Wildlife Protection

Advice is provided for citizens of the Carrickfergus Borough, summarising 'The Wildlife (Northern Ireland) Order 1985' in order to educate citizens of regulations in place to protect wildlife. Relevant areas covered by this law include the removal of animals, wildflowers and hunting. It is also hoped that this will protect the species living in the Borough.

3.3 Future Actions

3.3.1 Biodiversity

The possibility of appointing a full-time Biodiversity Officer should be further considered, in order to further comply with the Wildlife and Natural Environment Bill 2010. This would allow a Local Biodiversity Action Plan to be produced as recommended by the Sustainable Development Implementation Manual (2007). I

have been made aware that funding is to be made available from the Northern Ireland Environmental Agency for a joint Biodiversity Officer with two other councils.

The ten point action plan for biodiversity should be actively adhered to and its success monitored. Several of the points could be expanded on to educate the public on the issues and successes through inclusion of additional information on the website. Suggestions have been included in the sections which follow. Point 9 could be adapted to emphasise the maintenance of *native* genetic diversity.

A species list for the Carrickfergus Borough could be compiled. It should be noted that several public events have begun this process; for example, butterfly and bumblebee counting days. A species list for the Beach Road Nature Reserve has been compiled already. There is large scope for citizen involvement, thus increasing the interaction of citizens with their natural environment. Larne Borough Council and Newtownabbey Borough Council appear to be working together to compile a species list for their area so perhaps Carrickfergus Borough Council could seek to enter this partnership. This initiative involves asking citizens to complete a freepost form listing: species observed, number, date and location. This information is held and passed to the Centre for Environmental Data and Recording. The forms can be found here: <http://www.newtownabbey.gov.uk/biodiversity/>. This information will be useful in preparing for climate change and in attracting nature enthusiasts to the area. It will also be of public and scientific interest. Unfortunately Newtownabbey Borough Council appears to have had very few returns from citizens. The Biodiversity Officers of both Newtownabbey Borough Council and Larne Borough Council are currently on leave so I have not been able to discuss this with them. It is possible that citizens had not been made aware of this scheme effectively.

Environmental Impact	Maintain and enhance biodiversity.
Economic Impact	Biodiversity officer: Funding may be available. Action plan: No cost. Species list: Little cost. Freepost forms may cost Council but return is likely to be small.
Social Impact	Improve public opinion of Council. Increase public involvement. Improve partnerships with other Councils.

3.3.2 Climate Change and the Environment

The environmental impacts of climate change should be considered and appropriate preparation taken to minimise the negative impacts, especially on biodiversity. In fulfilling this, the SNIFFER report (Preparing for a changing climate in Northern Ireland) should be considered (Relevant summary tables in Appendix 2). Given the uncertainty regarding the effects of climate change, an appropriate action plan should be produced, to ensure timely implementation of actions (See suggested action plan in Section 5). This will require climatic conditions to be monitored in the Borough.

Although Councils have no statutory duty at present regarding climate change (although some suggest it is included within the term ‘sustainable development’ and hence is covered by the Northern Ireland (Miscellaneous Provisions) Act 2006), Sustainable Northern Ireland recommends the following action in preparation:

1. Using *drought tolerant species* in flowerbeds, roundabouts, parks and along verges.
2. *Alternatives to grass* (such as clover).
3. Utilising parks and open spaces to develop sustainable *urban drainage*, reducing the amount of hard surfacing and allowing water to collect and drain naturally.
4. Alternative *maintenance schemes* in selected areas to allow grass to grow longer, reducing carbon usage and increasing biodiversity.
5. Increasing the size of *mulched areas* to improve water retention of soils, particularly around trees.

Environmental Impact	Protect environment and minimise negative impact of climate change.
Economic Impact	Changes may carry cost but the negative impacts of climate change are likely to have a larger economic cost in the long term.
Social Impact	Improve public image. Minimise risk to citizens.

3.3.3 Environmental Policies

It is highly recommended that Carrickfergus Borough Council produce clear policies regarding noise pollution, land, air, and water pollution, fly tipping and dog control. These policies should cite the relevant laws and penalties should they be disobeyed. These should be widely available to citizens, including being available on the website. In the case of any offence, any written communication should inform the offender of the Council policy, which should then be closely followed. This will also be of use during period of staff absence.

Environmental Impact	Decrease incidents of pollution, fly tipping and dog fouling.
Economic Impact	Little economic impact.
Social Impact	Increase public opinion of Council. Improve quality of life. Increase awareness and decrease ambiguity.

3.3.4 Environmental Management Systems – Local Businesses

An environmental management system is a tool to enable businesses to limit the negative environmental impact of their business activities. Whilst visiting premises to inspect records and ensure they are complying with their PPC permit, environmental health officers could provide information and encouragement to adopt an Environmental Management System (ISO 14001). This action is recommended in the Sustainable Development Implementation Manual (2007).

Environmental impact	Decrease negative environmental impact of businesses
Economic impact	Little impact because information could be provided on inspections by Environmental Health Officers. Businesses could be directed to http://www.stemproject.com/
Social impact	Encouragement of businesses.

3.3.5 Dog Fouling

Further attempt should be made to decrease instances of dog fouling in the Borough. The attitude of dog owners should be further tackled, although it is understood that this is a difficult problem and extensive measures have already been applied. The Environmental Health Department are enthusiastic in improving dog control.

Environmental Impact	Decrease dog fouling.
Economic Impact	Economic cost depending on action decided.
Social Impact	Increase public opinion of Council. Decrease health risks.

3.3.6 Chemicals within Council Buildings

It appears that the environmental impacts of chemicals (for example, cleaning fluid) used within Council buildings have not been fully assessed. This should be given consideration when making purchasing decisions. It should be noted that this was included in the biodiversity ten point action plan but it appears no action has been taken. In contrast, chemical usage within parks and green space in the Borough has decreased.

Environmental Impact	Minimise negative impact of chemicals.
Economic Impact	If different chemicals are chosen these may be more costly.
Social Impact	Improve public opinion of Council. Minimise harm caused by chemical outputs.

3.3.7 Water Conservation

Effort should be made to further conserve water as an important environmental resource. Existing water meters on all properties and sites should be identified. It has been noted that this is a very difficult task, with monitoring equipment often being hidden by vegetation or in some cases infrastructure. Currently it appears that water usage is not monitored in over 50% of the Council's properties, with monitoring occurring mainly when it is judged to be economically advantageous. In the other instances the estimated value for usage produced by Northern Ireland Water is accepted by individual directors with responsibility for payment of the water bill. A standard practice could be identified for all buildings. The responsibility for monitoring water meters at regular intervals could be designated to one individual and reported on (perhaps this task could be designated to a joint 'Efficiency Officer' for Larne Borough Council, Carrickfergus Borough Council and Ballymena Borough Council). Water usage should be monitored with a view to decreasing usage. Measures that could be taken to decrease usage include: education of users about water conservation and assessment of figures for indication of possible leaks. The possibility of rainwater harvesting could be considered on refurbishment and on the building of new facilities. Dual flush systems on toilet cisterns could be further considered for any new properties. The replacement of hippo bags could be considered, since these were last fitted approximately ten years ago. Further consideration is being given to decreasing water usage at the Eden Allotment Gardens because this site in particular could benefit economically from decreased water usage.

Environmental impact	Conserve water resources.
Economic impact	Saving may be made on water bill.
Social impact	Improve public opinion of Council. Council will act as a role model if this is publicised.

3.3.8 Air Quality

The Sustainable Development Implementation Manual (2007) recommends that councils implement air quality action plans to reduce levels of ambient air pollution. This is in line with the Northern Ireland Sustainable Development strategy objective, 'To improve our air quality'. This recommendation could be considered by the Environmental Services Department; although action is already taken to ensure air pollution levels are minimal. The possibility of hiring the Northern Group Systems Air Quality Trailer to educate citizens could be given further consideration.

Environmental impact	Enhance air quality.
Economic impact	Economic cost depending on action decided.
Social impact	Improve public opinion of Council.

3.3.9 Marine Water Quality

Carrickfergus Borough Council should investigate the possibility of monitoring marine water quality. This is in line with the Northern Ireland Sustainable

Development Strategy objective to protect and enhance the freshwater and marine environment. As far as I am aware the quality of sea water in the marina is not currently tested. This is not done by Carrickfergus Borough Council (although they do test hose pipe and drinking water) or Northern Ireland Water Limited. I have asked the Northern Ireland Environmental Agency whether they test the water but they have not yet responded.

Environmental impact	Protect and enhance marine water.
Economic impact	Economic cost depending on method of monitoring
Social impact	Improve public opinion of Council. Improve water quality which could promote the area for tourism and nature enthusiasts.

4. Sustainable Communities

4.1 Objectives

The key objectives outlined in the Northern Ireland Sustainable Development Strategy are:

- To increase the *economic well-being* of the people of Northern Ireland.
- To create an *attractive, high quality environment* where people feel safe and which provides the conditions for health and social well-being.
- To promote the development of *community engagement, civic leadership and responsible citizenship*.

4.2 Current Actions

4.2.1 Corporate Plan

4.2.1.1 Economy

Economy is a key area outlined within The Corporate Plan. An aim of the Corporate Plan (2005-2009) is to promote the economic wellbeing of the Borough through a co-ordinated approach to development.

4.2.1.2 Citizenship

Citizenship is included as a key area within The Corporate Plan. The Corporate Plan (2005-2009) ^{outline the objective to} ensure enhancement of citizens' sense of civic pride by communicating with people, encouraging participation and valuing diversity. The key long term objectives are to enhance the Council's civic leadership role and to mainstream the principles of equality.

4.2.1.3 Social Progress

Social progress is included as a key area within The Corporate Plan. The Corporate Plan (2005-2009) outlines the objective to ensure citizens' celebrate their past and create a brighter future by promoting education, heritage and culture. The Corporate Plan (2005-2009) identifies the objectives to encourage a joined-up approach by the business, voluntary and statutory sectors in Borough initiatives. There is also an aim to promote awareness of Council responsibilities, business and activities amongst the population of the Borough and to promote the Borough as one which is outward and forward looking.

4.2.2 Economic Well-being and GROW

GROW South Antrim celebrated becoming the first group to award funding for farm diversification and business creation and development under the Rural Development Programme (RDP) 2007-2013. GROW offers a wide range of support to assist new businesses to set up or to help existing businesses with less than 10 employees to develop or expand and to help farmers diversify into non-agricultural activities, generating additional income and increasing sustainability.

GROW South Antrim is responsible for distributing funding from the Rural Development Programme 2007 - 2013 in the rural wards of Antrim, Carrickfergus and Newtownabbey Borough Councils. The Rural Development Programme 2007-2013 is part financed by the European Agricultural Fund for Rural Development (EAFRD) and the Department of Agriculture and Rural Development.

At a local level the programme is strategically delivered by a Joint Committee with members from Carrickfergus Borough Council, Newtownabbey Borough Council and Antrim Borough Council and implemented by a Local Action Group comprised of representatives from the area from business, community, agriculture, council and statutory sectors.

4.2.3 Consumer Protection

The Environmental Health Department aims to protect consumers and others against the risk of injury or ill-health from non-compliant goods manufactured, supplied or in use. Consumer protection relates to almost all non-food products, such as upholstered furniture, bicycles, electrical goods, toys, hired goods, tyres, and even second hand goods.

To ensure consumers are protected Environmental Health officers routinely survey goods to check they are safe and sample and test goods. They investigate hazard alerts and consumer complaints and advise business on how to comply with regulations. They promote home safety and provide advice to the general public on home safety. When necessary, they take enforcement action to ensure manufacturers and suppliers of products comply with regulations.

4.2.4 Food Safety and Scores on the Doors

The Environmental Services Department can provide publications and advice on food safety for citizens and businesses. Publications for citizens include, 'Follow the 4Cs for Food Safety (Foodlink)'. Publications available for businesses include, 'Starting up. Your first steps to running a catering business (Food Standards Agency)'.

The Scores on the Doors scheme is supported by the Food Standards Agency (FSA) as part of a nationwide pilot scheme and is seen as an important tool for local councils committed to improving food safety. Scores on the Doors is a new way of finding out about the food hygiene standards of local food businesses which are now given a star rating based on how well they meet hygiene standards with the results available via a link on the Council website. The council's Environmental Health Officers inspect over 250 premises across the borough including restaurants, cafés, pubs which serve food and takeaways all of which have been given a star rating. Premises are also inspected on notification of food poisoning instances, infectious disease instances, hazard warnings and voluntary surrenders. The aim is to respond within one working day.

4.2.5 Health and Well-Being

Investing for Health is the strategy for improving public health in Northern Ireland and the Council is part of the Northern Investing for Health Partnership which is implementing the strategy in Carrickfergus. Working with other public sector partners, such as the Northern Health and Social Care Trust and Northern Ireland Housing Executive, a number of schemes aimed at improving the health and well being of citizens in the council area have been introduced. These include:

- ***Home Safety equipment and Home Accident Prevention scheme*** - to provide home safety equipment to families with young children. The Energy Efficiency Officer recently obtained training in Home Safety which will allow this scheme to further develop. Residents' homes can be assessed for safety on request and occupiers can be directed to organisations that can help improve home safety.
- ***Small Steps to Healthier Choices*** - to reduce the problems of obesity, fast food takeaways are being encouraged to make healthy changes to their menus
- ***Fuel Poverty*** - To help citizens deal with high fuel costs the Council is planning to introduce a home heating oil saving stamp scheme later in 2009
- ***Warm Homes*** - The Warm Homes Scheme provides a grant to make homes warmer, healthier and more energy-efficient. The scheme provides a host of insulation and heating measures to eligible private sector householders who are in receipt of a specified qualifying benefit.
- ***No Smoking Day*** – Carrickfergus Borough Council is in support of No Smoking Day and provides information stands in public places.
- ***NHSCT Bereaved by Suicide Project*** – The Council website provides a link to relevant information.
- ***Health and Safety at Work*** – Environmental Health Officers respond to complaints.

Carrickfergus Borough Council has a dedicated Health and Equality Officer who works to identify groups in society that would benefit from additional help but are not yet receiving it.

4.2.6 Promoting Exercise

Carrickfergus Borough Council also promotes exercise in the Borough including golfing (Bentra Golf Course) and walking (Highway to Health and many parks are provided).

The recently refurbished Leisure Centre (Amphitheatre) facilities include a swimming pool, a fitness suite, a sports arena and a spinning suite. Staff are available to provide further advice regarding exercise and health.

Exercise is also promoted via the weekly 'Green Gym' at the Eden Allotment Gardens, in association with charity groups such as Mind Wise, Sense and Conservation Volunteers Northern Ireland.

Playing fields in the Borough include: Greenisland, Woodburn and Eden Playing Fields and Whitehead Recreational Grounds.

The feasibility of a new Sailing Centre for excellence is being assessed and this would further sporting achievement in the borough.

Team Madigan Cycling Club and Cycling Ulster are also sponsored by Carrickfergus Borough Council.

4.2.7 Crime and Antisocial Behaviour

Carrickfergus District Policing Partnership is responsible for issues related to crime and antisocial behaviour. It has a series of statutory functions laid down in the Police Act 2000. The core function of this Partnership is to ensure that the people of the Borough receive the Police service that they want and need. The Partnership will consult with any group or individual who is committed to improving Policing in the Borough, and who will work with the PSNI and this Partnership to achieve that aim. They monitor Police performance on a regular basis and work with the Police to establish meaningful targets for improvement. They congratulate the Police when they achieve or exceed these targets and seek to identify reasons if targets are not achieved. They represent the views of the people of the Borough on Policing issues and ensure that these are put forward in a constructive manner to assist the PSNI in their duties. After extensive consultation with the District Policing Partnership, the Police Service has launched its local Policing Plan for Carrickfergus Borough, outlining relevant targets.

4.2.7 Building Regulations

Council seek to ensure structures are built soundly and can be used safely. A publication produced by Council is available entitled, 'Building Control – protecting people and the environment: A brief guide to building regulations'. A Building Regulations application must be made in the situations highlighted in this publication, to ensure citizens are kept safe and the environment is protected. Council can also provide citizens with a copy of the handbook produced by Building Control Northern Ireland.

4.2.8 Community Support and Consultation

Carrickfergus Council's Community Services is a unit within the Department of Development Services. Its mission statement is "The encouragement of Local Voluntary/Community Groups to undertake the development of procedures which will lead to the resolution of issues within their community and the provision of services of high quality and excellence". The Community Support Plan (2009-2012) outlines how Carrickfergus Borough Council seeks to support the community via the provision of:

- Community facilities (Town Hall).

- Community centres (Oakfield Community Development Centre, Sunnylands Community Centre, Woodburn Community Centre, Greenisland Social Centre, and Castlevew Pavilion).
- Information regarding grants (Start Up, Community Support Large Grant, Community Support Small Grant, Resource Centre, Capital Grants).
- Employment to staff in councils
- Information regarding advice services (Citizens Advice Bureau)

There are plans to provide a new community centre facility at Eden.

There are also a number of community groups and forums established in the borough to allow close community engagement and consultation. These include:

- Glenfield Community Association
- Carrickfergus Community Forum
- Carrickfergus Community Drug & Alcohol Advisory Group
- Carrickfergus Bonfire Forum
- Woodburn Community Association

Carrickfergus Borough Council also works closely with the YMCA within the Borough, a charity that aims to establish a caring community in which the Borough's young people can fulfil their potential for good.

4.2.9 Carrickfergus Masterplan

The Masterplan is a plan for the future of Carrickfergus town centre. The key objective of the plan is to provide an aspirational vision supported by the regeneration objectives for the town centre. It provides a context in which developments or projects can be assessed and appraised for viability. Delivering these projects depends on conditions being correct and the Masterplan proposes that some actions will be supported by Government departments and other agencies including Carrickfergus Borough Council. It will be the responsibility of a new Masterplan Implementation Board to monitor, review and progress the Masterplan and to respond to changing conditions to maximise any development opportunities and sources of funds for the vision of the town centre.

4.2.10 Heritage

The Carrickfergus Borough has considerable heritage which Carrickfergus Borough Council aims to protect, whilst working in partnerships with other agencies; such as the Northern Ireland Environmental Agency. Included in the most recent Business Plan are aims to safeguard the built heritage of the Borough. Key heritage sites include Carrickfergus Castle, Fisherman's Quay and North Road Cemetery Crypt.

The possibility of attaining funding for a landmark piece of public art is also being researched.

4.2.11 Carrickfergus Community Forum

Carrickfergus Borough Council provides funding to enable the Community Support Officer position at the Carrickfergus Community Forum. This Forum has 85 established community groups and aims to improve community infrastructure in the Carrickfergus Borough, whilst building a strong, confident and vocal community sector.

4.3 Future Actions

4.3.1 Support and Encouragement for Local Businesses

The Sustainable Development Implementation Manual (2007) recommends councils 'be extremely active in providing support for local business...and encourage those who do not already implement such practices (sustainable development practices)'. Carrickfergus Borough Council currently has no direct links with local businesses; instead there exists indirect links via the Carrickfergus Chamber of Commerce and Trade. Carrickfergus Borough Council has encouraged the Chamber of Commerce and Trade to hold a sustainable development workshop for small and medium enterprises in the borough to be held on 9th September 2010, entitled, 'Reducing business overheads through energy and resource efficiency' (See Appendix 2 for programme).

Consideration could be given to how the Council could become more actively involved with businesses but it currently appears that businesses are fairly well informed. A publication about how businesses can become involved with sustainable development could be considered. Perhaps consultation with businesses could be considered to identify how best the Council could support them.

Environmental impact	Indirect positive environmental impact.
Economic impact	Economic cost depending on specific action taken.
Social impact	Improve contact with local businesses.

4.3.2 Service Requests

The response time for service requests should be monitored because staff report that approximately 95% of queries are responded to within two working days. This is exceptionally high and residents should be made aware of this to increase public opinion of the Council.

Compliments logged on the Te-care system could also be publicised on the website (rather like the guestbook already on the website); although permission would need to be requested from the person leaving the compliment. It is understood that these comments are often staff-specific and thus would need to be edited first.

Both suggestions above will require effective staff training.

Environmental impact	No direct environmental impact.
Economic impact	Little economic impact.
Social impact	Vastly improve public opinion of Council if positive comments are made known. Constructive comments will also help the Council to improve.

5. Climate Change and Energy

5.1 Objectives

The key objectives outlined in the Northern Ireland Sustainable Development Strategy are:

- To reduce greenhouse gas emissions, principally by promoting *energy efficiency* and the use of *renewables*.
- To establish Northern Ireland as a world class exemplar in the development and use of *renewable energy*.
- To plan and prepare for *climate change impacts* in Northern Ireland.

5.2 Current Actions

5.2.1 Energy Usage

Energy usage is monitored by Building Control with a view to reducing energy usage within Council buildings. Figures regarding energy usage can be obtained from Building Control and these vary yearly, fluctuating with weather conditions and staff usage.

5.2.2 Energy Efficiency within Council buildings

Council staff are continually attempting to improve energy efficiency within Council buildings. Automatic light switches, thermostats and weather compensation and optimisation systems have been fitted throughout Council buildings where appropriate, normally being installed on refurbishment. T5 fluorescent tubes are now used throughout buildings and LFLs are used where possible. Gas condensing boilers have also been fitted in several buildings to increase efficiency. Capacitance testing is regularly performed in Council buildings to decrease induced resistance, thereby increasing efficiency.

A large contribution to energy usage is the close control unit installed in the Museum which monitors temperature and humidity and adjusts accordingly for the protection of exhibits.

5.2.3 Energy Performance Certificates

Energy Performance Certificates used to inform purchasers of the energy efficiency of a building. By law Energy Performance Certificate must be obtained if selling a property, building a new property or renting out a property. The current Energy Performance Certificate grades for Council buildings are all above the national average:

Building	Grade
Town Hall	B
Oakfield Community Centre	C
Museum and Civic Centre	D
Sullatober	D

Council can also provide an advice leaflet produced by Building Control Northern Ireland to citizens to which the above criteria apply. A province wide pilot programme is in place to advertise that Energy Performance Certificates are essential when selling or letting a property. Information for citizens is also available on Council website.

5.2.4 Renewable Energy

Council have installed 26 solar photovoltaic cells (5kW) at both the Sullatober Depot and the Leisure Centre potentially saving 4,500 kW h of energy usage, contributing to the total electricity usage. Solar thermal panels have been fitted at Bentra Golf Course. Two combined heat and power systems in the Leisure Centre, alongside a wood pellet boiler. Variable speed drives and air source heat pumps have been fitted in several buildings. All these renewable technologies have been made possible through grants from Northern Ireland Electricity, BP and the Energy Saving Trust.

5.2.5 Insulation of Buildings

Council buildings have been appropriately insulated to decrease heat loss and therefore increase energy efficiency. Measures taken include installing double glazing or secondary glazing to all possible buildings. Cavity wall insulation is also installed in all possible buildings. Fibre glass roof insulation and other methods of insulation have been employed in all buildings.

5.2.6 Home Insulation Advice

Adequate home insulation is a component of energy efficiency and is therefore environmentally and economically beneficial. Carrickfergus Borough Council has produced a publication entitled, 'A building control guide to grants and other offers for home owners and private tenants' which highlights various agency schemes that citizens may be able to participate in. Further publications available for citizens from Council include, 'We've got insulation all wrapped up (Powergen)' and 'Maintaining your home: A householder's guide for Northern Ireland (Housing executive)'. Carrickfergus Borough Council has appointed an Energy Efficiency Officer who is available to advise citizens regarding the Warm Homes Scheme (H&A Mechanical Services) and the Warmer Ways to Better Health Scheme. Both schemes attempt to improve home insulation (for example; by offering loft and cavity wall insulation) and eradicate fuel poverty; an objective shared by Carrickfergus Borough Council. Information about the Warm Homes Scheme can also be obtained from Council website.

5.2.7 Energy Efficiency Advice

Alongside providing information regarding home insulation, the Energy Efficiency Officer can advise on any energy efficiency matter. Council website also has a link to the Energy Saving Trust; an organisation that can provide additional information to citizens. The following advice for saving energy is provided on Council website and has been supplied by the Energy Saving Trust:

- Turning your thermostat down by 1° C can cut your heating bill by 10%.
- Take appliances off standby- they continue to use 5% of energy while left on standby.
- Kettles only boil as much water as you need ensuring you have covered the element (in electric kettle)
- Close curtains and tuck behind radiators to keep the heat in.
- Use 30°C Instead of 40°C temperature programmes when washing clothes.
- If you are buying new appliances, look for the energy saving logo. The higher the rating the more you save.
- Energy saving light bulbs use 80% less energy than standard bulbs and can last up to 12 times longer.

Energy efficiency advice has also been provided in the Compass Newsletter, posters and via leaflets distributed in the Borough's Health Centres. There are plans to target school and youth groups to educate about energy efficiency.

5.3 Future Actions

5.3.1 Carbon Footprint

It is highly recommended that a carbon footprint is calculated for the Council, along with an action plan, with a view to becoming 'carbon neutral'. The Council is a member of the COMET Region partnership. This partnership has applied for funding (INTERREG IVA) for member councils to analyse their carbon footprint from the Special EU Programmes body. The proposal made, with Belfast City Council as its promoter is included in Appendix 2. The key contact is Alastair Curran (Sustainable development manager, Belfast City Council).

Consultation with 'The Carbon Trust' may prove useful. Their brief guide to carbon footprinting is included, as is an email reply from WWF about footprinting (Appendix 2). This organisation offers the Local Authority Carbon Management Programme (see case study – Appendix 2); offering advice on carbon and cost saving. It begins in May each year and requires two days commitment per week for ten months. The Carbon Trust also has a free online training tool to aid staff in decreasing carbon dioxide production. Carrickfergus Borough Council could work to accredit their carbon footprint with The Carbon Trust Standard (see Appendix 2 for information leaflet and email reply from Rachel Brain). To achieve certification Carrickfergus Borough Council would need to: measure their carbon footprint using recognised methodologies, demonstrate they have a carbon strategy in place to reduce emissions, demonstrate a reduction in emissions on an absolute basis (<0%) or relative basis (2.5% p.a.) and provide one to three years worth of data for electricity, gas, other fuel and company vehicle fuel consumption (See Appendix 2 for email from Rachel Brain).

Information on the Carbon Trust can be found here:

<http://www.carbontrust.co.uk/cut-carbon-reduce-costs/calculate/pages/default.aspx>

Local Authority Management Programme information can be found here (this page also details other methods of expert advice offered):

<http://www.carbontrust.co.uk/cut-carbon-reduce-costs/reduce/public-sector/local-authorities/Pages/consultative-help.aspx#CM>

Moray Council, Scotland has used the Local Authority Management Programme and Emma Gordon (emma.gordon@moray.gov.uk) has kindly provided the product of this Programme – a carbon reduction strategy:

<http://www.moray.gov.uk/downloads/file64690.pdf>

Leeds City Council have also used the Local Authority Carbon Management Programme and the case study provided by The Carbon Trust is included in Appendix 2.

Woking Borough Council in Surrey have worked to decrease their carbon footprint and have seen an 82% decrease in carbon output since efforts began. This has been achieved by installing 13 combined heat and power schemes, forming partnerships with energy companies, installing photovoltaic cells, insulation for households and by investing money saved by increasing energy efficiency into devices to further increase efficiency. They received funding from the Carbon Trust, the Energy Savings Trust, the Department of Trade and Industry and the Department for the Environment, Food and Rural Affairs. Woking Borough Council case study:

(http://www.audit-commission.gov.uk/SiteCollectionDocuments/Downloads/Innovation_casestudy_09.pdf)

Environmental impact	Reduction of footprint will reduce carbon emissions.
Economic impact	Funding hopefully provided.
Social impact	Improve public opinion of Council. Council will act as a role model if this is publicised.

5.3.2 Energy Efficiency Policy and Procedures

It is highly recommended that Council reviews and develops an up-to-date ‘Energy Efficiency Policy and Action Plan’. This should identify practical steps that staff can take to increase energy efficiency and should encourage action both within offices and their homes. All staff should be made aware of such a policy and its importance once produced. There is a necessity for Council to lead by example regarding energy efficiency. Where applicable the source of any funding for achieving targets of the action plan should be included. The Energy Saving Trust has provided a briefing note on sustainable energy strategies, included in Appendix 2. An example energy strategy and action plan can be found here (Newcastle City Council):

<http://www.newcastle.gov.uk/wwwfileroot/ns/energy/NewcastleCityCouncilEnergyStrategyfinal2.pdf>

Staff should be reminded of the importance of turning off computers, monitors, photocopiers and printers when not in use both for economic reasons and to decrease

energy usage. It has been noted that equipment has a power save mode, although this still uses more energy than if the equipment was switched off. 52.5% of staff (21/40) said they turned off both the computer and monitor when not in use. 15% (6/40) did not turn off the computer or the monitor and 32.5% turned off the computer but not the monitor or vice versa. It seems there is some confusion over whether printers and photocopiers are turned off when not in use. This should be clarified. See Appendix 2 for survey results and note that these have also been passed to Ian Stewart. 'Turn it off' stickers and posters have also been left with Ian Stewart and Helen McClean. Additional stickers and posters can be obtained from The Carbon Trust and 10 free resources can be claimed per month.

A staff member should join the NI Energy Managers Forum which meets quarterly and is open to all Council energy managers (Building Control). This was attended in the past by Ian Stewart (Building Control) and proved useful but unfortunately attendance ceased due to time and resource availability. The possibility of a staff member attending Forum events should be considered because this would allow networking with other Councils and public sector representatives on all energy matters including renewable energy, new technologies, energy and water conservation. If any staff are available to attend they should email Chairman Mr Leo Strawbridge (leo.strawbridge@derrycitycouncil.org).

Funding information for energy efficiency projects can be obtained from the Central Energy Efficiency Fund (<http://www.dfpni.gov.uk/index/buildings-energy-efficiency-buildings/public-sector-energy-campaign/psec-ceef.htm>).

Carrickfergus Borough Council could work towards achieving a National Energy Efficiency Award, which was achieved by Ballymena Borough Council in 2006. The installation of renewable energy technologies has saved approximately £180,000 and around £250,000 was received to fund the project, further decreasing expenditure.

Council should seek to encourage citizens and local businesses to increase their energy efficiency. Discussion between the Energy Efficiency Officer (Environmental Health Department) and the Building Control Department should occur to allow the sharing of ideas. A Borough schools programme might be an example: Building Control could explain the things that Council do to ensure energy efficiency and the Energy Efficiency Officer could educate about home insulation.

The energy efficiency information on the website could be made more accessible and should be provided in a separate webpage to 'Warm Homes' because this scheme is not applicable to some citizens, unlike energy efficiency which applies to all.

The possibility of working with other councils to encourage businesses to increase energy and resource efficiency could be considered. The possibility of working with Larne Borough Council, Ballymena Borough Council and Newtownabbey Borough Council to fund an energy efficiency officer to provide advice for businesses, staff and citizens could be considered. Councils could work together to provide a training programme for businesses; either an ongoing programme or a one day event. Perhaps InvestNI could provide assistance. This might be the most economic measure of promoting energy efficiency to the business sector as recommended by the

Sustainable Development Implementation Manual (2007). It should be noted that the Carrickfergus Chamber of Commerce and Trade are holding a ‘Sustainable Development’ workshop for local businesses in September 2010 and advice for improving energy efficiency will be included. Businesses are therefore already fairly well informed.

Usage of LEDs for the Borough’s Christmas lights should be further researched.

Environmental impact	Increase energy efficiency.
Economic impact	Funding will make a substantial contribution to any economic cost. Economic saving in terms of energy usage.
Social impact	Increase public opinion of Council. Further contact with local businesses.

5.3.3 Renewable Energy

The possibility of using wood deposited at the Civic Amenity Site for the wood pellet boiler has been considered but perhaps it could be further investigated. This would involve the purchase of licences for moving and storing waste. This is currently performed by a contractor so this may prove economically beneficial in the long term.

Council should also seek to promote and support the use of renewable energy sources. Education of citizens, particularly young people could prove beneficial: improving acceptability of renewable energy sources could be targeted. Community involvement through competitions could be a feasible and economically viable possibility; for example, citizens (both adults and young people) could be asked to submit ideas for renewable energy sources that could be used locally.

Environmental impact	Indirect positive environmental impact.
Economic impact	Licences for wood chipping would be costly but may save energy in the long term. Funding may be available. Slight economic cost associated with education of residents.
Social impact	Improve contact with residents.

5.3.4 Reduction in Fossil Fuel Usage

Sustainable Northern Ireland recommends that Councils focus on mitigating climate change. With this in mind it is recommended that Carrickfergus Borough Council actively attempt to reduce fossil fuel usage in their buildings. For the year 2009/2010 3% (3895 kWh) of the total electricity consumed at the Sullatober Works Depot was ‘Green’ electricity. There should be an attempt to increase this both for the Sullatober Works Depot and other Carrickfergus Borough Council buildings. This is one area where Carrickfergus Borough Council can lead by example if the information is publicised. Reduced fossil fuel consumption can be achieved by increased use of

renewable energy but also through increased energy efficiency which is also economically beneficial.

Carrickfergus Borough Council should encourage citizens and local businesses to reduce their fossil fuel usage; for example, making use of publications, posters and mail shots. Where possible, incentives could be provided; this could be via an award scheme and hence would be economically viable.

Environmental impact	Reduce gaseous emissions from fossil fuels.
Economic impact	Economic saving from decreasing fossil fuel usage. This saving could be passed to encouragement of citizens and businesses.
Social impact	Improve contact with citizens and businesses.

5.3.5 Travel

Consideration could be given to how energy used for staff travel can be decreased. Transportation also produces air pollution so changes here could have wide positive consequences, as well as meeting the previous objective to improve air quality. Staff yearly travel methods could be firstly surveyed, in order to produce a total mileage count for Carrickfergus Borough Council, with a view to decreasing it.

Public transport could be encouraged via a reward scheme. The Department for Employment and Learning Northern Ireland liaised with Translink to provide their staff with a one-week travel pass to assess later via surveys how convenient public transport was as an alternative. Perhaps such a liaison could be considered for Carrickfergus Borough Council. The Council could consider subsidising the purchase of Translink Commuter Travel Cards to make this option economically attractive to staff.

The Government's Cycle Scheme could be further considered (<http://www.cyclescheme.co.uk/>).

The idling of vehicles should be prohibited on all Council premises.

The use of Council vehicles should be restricted to essential journeys only and where travel occurs via taxi, the relative costs and benefits of public transport as an alternative should be considered. In many cases this may also be economically advantageous also.

The use of electric vehicles as an alternative to the current vehicles should be performed. The benefits of these have been considered in the past but staff attitudes may have been a hindrance. The assessment should be in written form, clearly identifying reasons for any conclusion.

Facilities for video-conferencing and telephone-conferencing could be considered as an alternative to travelling to meetings. Possible programmes include Microsoft NetMeeting and Skype, both of which appear to be free.

Environmental impact	Decrease gaseous emissions from transportation; both carbon dioxide and other gases, thus decreasing contribution to climate change and improving air quality.
Economic impact	Economic cost to subsidising public transport. Savings made when public transport is a cheaper alternative to taxis. Fuel savings made from decreasing idling and journeys.
Social impact	Council will act as a role model.

5.3.6 Department of Environment's 13 Indicators of Climate Change

The Sustainable Development Implementation Manual (2007) states, 'Councils must keep up to date with the Department of the Environment's 13 indicators of climate change'. A staff member could be appointed to be responsible for this. The most recent update of these indicators can be found here: <http://www.ni-environment.gov.uk/pubs/publications/cci.pdf>

The 13 indicators are:

- Air temperature
- Number of 'hot' and 'cold' days each year
- Rainfall seasonality
- Annual rainfall
- Snow days
- Position of the Gulf Stream
- Length of growing season
- Potato production
- Date of first sighting of swallow
- First appearance of large white butterfly
- Mean river flow in River Bush
- Groundwater levels in Killyglen and Dunmurry
- Sea level in Northern Ireland

Environmental impact	Staff could monitor the indicators for Carrickfergus for any anomalies. If staff are aware of these indicators then action is likely to happen more quickly to decrease negative environmental impact of climate change.
Economic impact	Little impact. Cost of staff member monitoring the indicators.
Social impact	Indirect.

5.3.7 Climate Change Preparations

Using climate change models a temperature increase of up to 3°C has been predicted for Northern Ireland (Northern Ireland Sustainable Development Strategy). Worldwide average temperatures have already risen more than 0.6°C since 1900; this suggests a very real threat. The actual effects of climate change are largely speculative due to unknown consequences of increased carbon dioxide feedback. With this in mind it is recommended that Carrickfergus Borough Council have preparations in place to respond effectively.

The Sustainable Development Implementation Manual (2007) suggests preparation for climate change should encompass effects on agriculture, tourism and infrastructure in the borough. The possibility of increased public health risks such as heat waves, cyclones and increased air pollution should also be considered.

Preparations should include suggestions for citizens to personally contribute to mitigating the effects of climate change. A study recently carried out by the Department of the Environment Northern Ireland suggested 77% of Northern Ireland's citizens would be prepared to make changes to their lifestyle to combat climate change. This was intended to be representative of the people of Northern Ireland, thus demonstrating that Carrickfergus citizens are likely to be willing to take action.

The Northern Ireland Climate Change Impacts Partnership (<http://www.sniffer.org.uk/our-work/climate-change/niccip.aspx>) was established in 2007 (key contact: Julian Holbrook julian@sniffer.org.uk). They have produced newsletters and keep an up-to-date database of useful contacts. They aim to inform of the impacts of climate change and suggest appropriate adaptations to minimise the effects of these impacts.

The Energy Saving Trust briefing note for producing a climate change strategy is included in Appendix 2. Examples of Climate Change Strategies produced by other Councils in Britain include:

[Climate change strategy – London Borough of Waltham Forest.](#)

[Climate change strategy - Chichester District Council](#)

[Climate change strategy – Reigate and Banstead District Council](#)

[Climate change strategy – Suffolk Coastal District Council](#)

Please see additional tables in Appendix 2 entitled: 'SNIFFER UKCC13 Preparing for a Changing Climate in Northern Ireland'. This report outlines the possible effects of climate change and provides adaptation strategies relevant to different public bodies under the various titles below. I have included the strategies that the report suggested were relevant to local councils. I have further interpreted this and produced the action plan below with the strategies that I consider to be most feasible. It is very likely that such action will be obligatory in the future. The Building Control Department has noted that the Carrickfergus Borough is potentially less vulnerable to flooding than other areas. It is currently felt that other organisations have greater responsibility

regarding flooding. Nevertheless this issue should be given consideration and it is likely that future laws will place duties on Local Authorities.

Proposed Climate Change Action Plan

- 1) *Calculate the carbon footprint of Carrickfergus Borough Council and aim to decrease carbon dioxide emissions. Make this available on the website as an example of good practice.*
- 2) *Consider how carbon emissions of the Borough can be decreased.*
- 3) *Assess effects of climate change on the biodiversity of Carrickfergus given that rainfall is predicted to increase. The key changes predicted are: increased rainfall, increased temperature and increased wind speed. This could be the responsibility of a potential Biodiversity Officer.*
- 4) *Identify how ecosystems can be protected and restored.*
- 5) *Protect habitats from fragmentation and create habitat mosaics (protect and improve ‘joined-up-ness’ of areas).*
- 6) *Ensure current species are adequately protected from other factors. Each species has a ‘climate envelope’ (niche) that it can exist within. Human interference in many cases decreases the size of this envelope; for example introductions of invasive species. A larger ‘climate envelope’ increases the likelihood that a species will survive climate changes so ‘climate envelopes’ should be protected. The best way to do this is to ensure compliance with the Wildlife Laws.*
- 7) *Increase public awareness of climate change. Perhaps a webpage section could be created. Awareness should be monitored; for example by surveys. There could be an aim to make 25% of the community aware of climate change issues (Aberdeen Council have this aim).*
- 8) *Assess the likelihood of coastal flooding and the need for engineered structures at the coast to protect the Borough from flooding and erosion. The sea level in Northern Ireland is predicted to rise by 9cm to 69 cm by 2080.*
- 9) *Produce contingency plans in case fluvial or pluvial flooding should occur.*
- 10) *Take action to tackle the flooding of drainage and sewerage systems which is likely to increase in severity. Although Council may not have responsibility for this issue, it does affect citizens and thus more pressure should be applied to the appropriate organisations.*
- 11) *Promote water conservation in preparation of warmer and drier summer months.*

- 12) *Assess storm risk and any implications on buildings, heritage and, mature trees.*
- 13) *Ensure that any property insurance policy adequately covers damage caused by the effects of climate change.*
- 14) *Consider provision of indoor tourism facilities. Although in the Borough these are already fairly good. Hotter and drier summers may also promote tourism.*
- 15) *Ensure any future sporting facilities are weather proof and have adequate insurance to cover effects of climate change.*
- 16) *Develop a heat wave procedure. It should be noted that the risk is deemed minor.*
- 17) *Any urban planning should consider reducing urban heat islands. These are areas of dark material that retain heat near the ground.*
- 18) *Consider how food hygiene measures will be affected by hotter temperatures. Warmer temperatures may lead to increased bacterial growth and pest activity but again there is a minor threat.*
- 19) *Monitor instances of pests in the Borough. Any increase in pest activity should be noted and a correlation with temperature should be considered.*

Environmental impact	Decrease risk of negative environmental impact of climate change.
Economic impact	Each adaptation strategy will have a different associated cost.
Social impact	Improve public opinion of Council if this is publicised. Protect agriculture, tourism and safety.

6. Learning and Communication for Sustainable Development

6.1 Objectives

The key objectives outlined in the Northern Ireland Sustainable Development Strategy are:

- To provide access for all citizens to gain *sustainable development skills and knowledge*.
- To bring about the *behavioural changes* necessary to progress towards a sustainable society.

6.2 Current Actions

6.2.1 Carrickfergus in Bloom

A massive component of community education and communication is the Carrickfergus in Bloom initiative formed by Carrickfergus Borough Council. This aims to make Carrickfergus a more pleasant place to work, live and visit, to stimulate self-pride and hence care of the environment by the citizens of the Borough and to create opportunities for involvement particularly at Community level in the initiative.

Carrickfergus and Whitehead have entered many competitions and received numerous awards since the initiative began. The Carrickfergus in Bloom initiative also holds community competitions encouraging citizens to become involved with the scheme. These include painting, poetry and photography competitions and best kept garden competitions.

A vital part of the Carrickfergus in Bloom initiative is campaigning within the community. Current campaigns include:

- ***Blooming Wild*** – this campaign aims to encourage citizens to do one more thing for wildlife in their gardens. Local wildlife habitats are increasingly under threat and every garden is a potential mini nature reserve.
- ***School growing clubs*** – This campaign aims to promote school growing clubs within the Borough's schools. Growing areas offer students the benefit of practical hands on activities, helping to motivate and enhance their learning experience. Gardening has many positive benefits, increasing younger children's likelihood of trying new fruit or vegetables that they have grown and all pupils' understanding of healthy eating.
- ***Community grants*** - To encourage participation in the Carrickfergus in Bloom initiative Carrickfergus Borough Council has two grants available for citizens. Advice is provided on further organisations that often provide grants.
- ***Tree Week*** – National Tree Week is an annual festival to mark the start of the tree planting season. This is a chance for communities to do something positive for their local environment. Across the Borough there are many opportunities for citizens to plant trees. Carrickfergus Borough Council invites anyone who would like to volunteer to contact them. This project has previously been carried out in collaboration with the Northern Ireland Forest Schools Programme. Carrickfergus Borough Council also provides funding

for the Northern Ireland Forest Schools Programme and introduces and promotes it in schools in the Borough.

- ***Gardening for health and fitness*** – Carrickfergus in Bloom aims to inform citizens of the health benefits of gardening, which include exercising muscles, protecting the heart, relieving stress, building confidence and stimulating the senses.

6.2.2 Environmental Youth Speak

Carrickfergus Borough Council supports Environmental Youth Speak, an annual speaking competition for young people organised by local councils to increase environmental awareness by promoting discussion and debate. Heats are held in the Carrickfergus Borough for citizens. Winners then compete against citizens from other boroughs and ultimately in the Northern Ireland final.

6.2.3 Carrickfergus Borough Council Website

The Carrickfergus Borough Council website is a key information point for citizens (<http://www.carrickfergus.org/>). The Council uses this to inform and educate citizens about their community and environment. Contact details are also provided should citizens wish to communicate further with Carrickfergus Borough Council. The website proves to be an extremely resource efficient means of communicating with citizens.

6.2.4 Publications

Carrickfergus Borough Council also produces many publications to inform, educate and communicate with citizens. In an attempt to increase resource efficiency, publications are only produced when they are deemed the most successful means of communication. The major publication produced is the Compass Newsletter, a twice yearly publication informing of events and happenings within the Borough. The Compass Newsletter is delivered to over 15,000 houses in the Borough.

6.2.5 Eco-schools

Several schools in the Carrickfergus Borough have been involved with the Eco-schools initiative. Carrickfergus Borough Council contributes two hundred pounds per year to help fund the TIDY Northern Ireland Eco-schools Administrative Officer.

6.2.6 School Education Programmes

Plans are in place for the Litter Warden of Carrickfergus Borough Council to approach four schools in the Borough at the beginning of the academic year with the hope of administrating a programme of education regarding litter.

The possibility of hiring the Northern Group Systems Air Quality Education trailer is being considered and this would complement the Northern Ireland Sustainable Development Strategy objective to improve air quality within Northern Ireland

(Section 3). This has also been considered for educating about dog barking and dog neutering.

6.2.7 Member and Staff Education

Presentations are available for the training of staff and members although these have proved relatively unsuccessful in the past. Policies are available for all staff in the shared resources section.

6.2.8 Carrickfergus Community Forum

Carrickfergus Borough Council provides funding to enable the Community Support Officer position at the Carrickfergus Community Forum. This Forum has 85 established community groups and aims to improve community infrastructure in the Carrickfergus Borough, whilst building a strong, confident and vocal community sector.

6.2.9 Community groups

Alongside links with community groups via the Carrickfergus Community Forum, Carrickfergus Borough Council also works with groups such as youth groups, community centre groups and church groups.

6.3 Future Actions

6.3.1 Communication – Carbon Footprint and Ecological Footprint

The Sustainable Development Implementation Plan (2007) suggests Carrickfergus Borough Council could develop projects with local community groups to reduce their carbon and ecological footprint. I have discussed the possibility of fulfilling this recommendation with the coordinator of Carrickfergus Community Forum, who feels that such projects with Carrickfergus Community Forum groups would not be successful at present. He has agreed to reconsider this recommendation if potential opportunities and community groups arise. It is hoped that Carrickfergus Borough Council could then take an active role in this.

Carrickfergus Borough Council may be able to approach the community groups that they have contact with (youth groups, church groups and community centre groups) and deliver an educational programme about carbon and ecological footprints. Again the Community-Eco Challenge CD Rom toolkit may be beneficial (see 2.3.5).

Environmental impact	Reduction of carbon and ecological footprint of community groups.
Economic impact	Little impact. Funding and resources available for community groups.
Social impact	Improve contact with community.

6.3.2 Publications

A full list of publications produced by Carrickfergus Borough Council should be collated and reviewed regularly. This should be made available on the Council website to ensure citizens are well informed regarding information available to them. To achieve this each department could be asked to supply a list of publications they are responsible for. Currently it is likely that citizens do not know the extent of the publications available to them.

Environmental impact	Availability of environmental publications will have a positive impact.
Economic impact	Little impact.
Social impact	Improve contact with residents and improve public opinion of Council.

6.3.3 Attitude of Citizens

The attitude of citizens of the borough needs to be further considered regarding several issues previously discussed; such as dog fouling, illegal dumping and recycling. Research into the best techniques for altering the attitude of citizens should be considered as this will be useful in targeting many issues highlighted and could also be referred to in the future should further issues arise. For example, a comparison of the success of website updates, leaflets and bill boards could be performed. Research could also be carried out to decide on the best placement of leaflets to ensure they are accessible to the maximum number of citizens.

Environmental impact	Indirect positive impact.
Economic impact	Economic cost depends on action decided. Printing of surveys will have associated cost.
Social impact	Improve contact with residents. Results will help improve local attitudes.

6.3.4 Schools

Further outreach to schools could include the active promotion of Eco-schools. This scheme has very similar objectives to Carrickfergus Borough Council and offers a method of implementing Council objectives at a community level. TIDY Northern Ireland is the organisation responsible for the Eco-schools initiative. On request TIDY Northern Ireland will arrange organising training days for teachers where they are informed about Eco-schools. Amongst others, the councils frequently involved include Newry and Mourne District Council, Magherafelt District Council and Banbridge District Council. Carrickfergus Borough Council could support these events by attending to explain Council procedures and targets regarding recycling and biodiversity. The benefits of this would include reducing Council output to landfill and an increased awareness of the natural environment. Furthermore, studies in the Republic of Ireland show that households of eco-schools children recycle more waste than households without eco-schools children, hence extending the effect to the wider community. In conjunction with the Council, TIDY Northern Ireland can help

organise Mayoral events, rewarding schools when they achieve the Green Flag award. Contact is via this email address: enquiries@tidynorthernireland.org

Environmental impact	Indirect environmental impact.
Economic impact	Staff may be required to fulfil role.
Social impact	Improve contact with residents.

6.3.5 Inform Staff and Members

The success of training and information for staff and members has in some cases proved disappointing. It appears that this is mostly due to negative attitudes. In future all forms of staff training should be monitored for their success and reported on as a follow-up; perhaps involving satisfaction surveys distributed to staff.

The frequency and format of team meetings could potentially be improved especially since 41% of staff said they are unhappy with the frequency of team meetings. (See Appendix 2 for staff survey results and note these have also been passed to Lisa Adair.) Many staff gave suggestions for improvements that could be made. Increased and improved staff interaction will be helpful when implementing the Sustainable Development Action Plan. A team building event may also help increase interaction. 33 out of 39 staff said they would be interested in participating in such an event; with a slightly greater potential attendance if held during working hours. 87% of staff felt an event would improve relationships within and between departments. 48.7% thought it could also improve relationships with councillors. Staff were asked the likelihood that they would attend such an event and responses to each suggested event were fairly close. An event that benefited the Carrickfergus Community or the wider community in Northern Ireland could increase public opinion of Carrickfergus, as well as having a sustainable development scheme, helping to emphasise the importance of sustainable development to staff. This may help extend the measure into the home communities of staff and hence have wider benefits.

Environmental impact	Indirect environmental impact.
Economic impact	Little cost as could be via email.
Social impact	Little impact.

7. Governance and Sustainable Development

7.1 Objectives

The key objectives outlined in the Northern Ireland Sustainable Development Strategy are:

- To mainstream sustainable development across *government*.
- To strengthen the *network of accountability for governance* for sustainable development.

7.2 Current Actions

7.2.1 Sustainable Development Action Plan

This sustainable development policy and implementation plan has been produced with the hope that it can be integrated within Carrickfergus Borough Council practice to ensure sustainable development.

7.2.2 Carrickfergus Borough Council Policies

Policies are an important method of ensuring action is taken. Sustainable development principles are integrated within the relevant Council policies; such as the Procurement and Purchasing Policy.

7.3 Future Actions

7.3.1 Implementation Forum

It is recommended that Council develops a forum of partners from the various council departments to be responsible for implementing possible future actions to ensure sustainable development. It is essential that persons involved in such a forum have an enthusiastic attitude towards sustainable development and understand the vital importance of inter-departmental collaboration if actions are to be implemented. The key objective of such a forum should be to incorporate sustainable development objectives into Council decisions.

Environmental impact	Indirect positive environmental impact.
Economic impact	Involvement on forum could be voluntary or involve department directors and thus have no economic cost.
Social impact	Indirect social impact.

7.3.2 Senior ‘Champion’

It is recommended that Carrickfergus Borough Council appoint a senior ‘champion’ with responsibility for ensuring the sustainable development policy and implementation plan is adhered to. This ‘senior champion’ should work alongside an implementation forum to ensure implementation measures are taken.

The ‘senior champion’ should remain in contact with Patricia Mackey (patricia@sustainableni.org) from Sustainable NI who produced the Sustainable Development Implementation Manual (2007) from which I have been working. She has answered several of my queries and will be a useful source of information. She has also offered to visit Council to help staff perform a Sustainable Audit Matrix and to provide a half day of training for relevant staff from several departments about sustainable development.

The ‘senior champion’ should make themselves aware of the ‘Everyone’s involved – Northern Ireland Sustainable Development Strategy’ and the current draft of the Implementation Plan.

Environmental impact	Indirect positive impact.
Economic impact	Senior ‘champion’ may require additional payment.
Social impact	Wide impact since has overall responsibility for ensuring implementation.

7.3.3 Within Council Communication

In several instances communication between departments will be particularly essential in effectively fulfilling the action plan. All staff responsible for implementing any sustainable development measures should consider whether staff in other departments could be helpful and arrange meetings to discuss how shared aims can be achieved. Tasks should not be parcelled to one staff member or one department – many of the objectives are cross-departmental and everyone has a role to play. If the staff that will be responsible for implementing the plan are included in assessing options early on, there may be a greater likelihood of commitment and success because of a sense of ‘ownership’.

Environmental impact	Indirect positive impact.
Economic impact	No impact.
Social impact	Improve relationships within Council which will have indirect wider social impact.

7.3.4 Partnerships

Advantage should be taken of the partnership approach, often with registered charities, to ensure an economically viable implementation of the policy. In all possible cases Carrickfergus Borough Council could seek to form partnerships with other local councils with similar aims.

Carrickfergus Borough Council could extend their partnership with the Police Service Northern Ireland, especially regarding environmental issues such as littering, fly tipping and dog fouling. This would ensure common objectives are met. The first step could be a Council run information day with the PSNI to network and brainstorm

ideas. This has proved successful in the past; for example the outcome being ‘Safe Cycle Challenge’, a programme run in conjunction with Borough schools.

Environmental impact	Indirect positive environmental impact.
Economic impact	Little economic cost. Time dedicated to research.
Social impact	Improve contact with organisations and other councils.

7.3.5 Progress

A webpage on the Carrickfergus Borough Council website could be created which outlines clear targets regarding the implementation of the sustainable development policy. This should be updated regularly reporting on progress made, thus exerting pressure to ensure progress is monitored. In the future there has been speculation that it will become a statutory duty for councils to report on sustainable development progress. By reporting on progress now, the Council will be prepared for the future. A progress report will encourage citizens to follow Carrickfergus Borough Council example and implement principles of sustainable development in their own home communities.

Environmental impact	Indirect positive impact.
Economic impact	Little impact.
Social impact	Improve public opinion of Council. Council will act as a role model.

7.3.6 Monitoring progress

A time frame should be identified for formally monitoring progress of the action plan.

Environmental impact	Indirect positive environmental impact.
Economic impact	No cost.
Social impact	Progress can be publicised to citizens.

8. Recommended Actions Summary Tables

8.1 Sustainable Consumption and Production

Recommended Action	Key Benefits	Action (proposed)
Consider producing an Environmental Management System and achieving ISO 14001 accreditation.	<p>Decrease negative environmental impacts of any practices.</p> <p>Staff can demonstrate to potential contractors and businesses the environmental standard required of them.</p>	(To be agreed by an officer steering committee that will report to the Corporate Steering Sub-Committee.)
Educate staff of the Environmental Purchasing Policy and its importance. Audit success of staff education annually.	<p>Decrease negative environmental impacts of any business practices.</p> <p>Persuade businesses to adopt environmental practices.</p>	
Remind staff that Fair Trade products should be given consideration as outlined in the Procurement and Purchasing Policy.	<p>Decrease negative environmental impacts of any business practices.</p> <p>Persuade businesses to adopt environmental practices.</p>	
Remind staff of the importance of uses products that are locally sourced.	<p>Decrease negative environmental impacts of any business practices.</p> <p>Persuade businesses to adopt environmental practices.</p> <p>Improve the local economy.</p>	
Consider adopting a preference for purchasing goods that can be realistically recycled.	<p>Decrease negative environmental impacts of any business practices.</p> <p>Decrease waste going to landfill.</p>	
Edit the Environmental Management Questionnaire to ask potential suppliers to demonstrate evidence of environmental practice rather than relying on yes/no	<p>Demands honesty hence increasing staff confidence in suppliers.</p> <p>Decrease negative environmental impacts of any business practices.</p>	

answers to questions.		
Ensure all suppliers comply with the standards of sustainability set by Carrickfergus Borough Council (easier once have ISO 14001).	Decrease negative environmental impacts of any business practices.	
Advise unsuccessful potential suppliers on improvements they could make i.e. attain ISO 14001 accreditation	Apply pressure on the business sector to consider sustainable development.	
Consider producing a comprehensive Sustainable Procurement Policy as adopted by Banbridge City Council.	Make staff aware of procedures to follow when purchasing certain named materials.	
Consider seeking the Fairtrade Accreditation and the Fairtrade Mark Ireland.	Council will act as a role model for citizens. Improve public opinion of the Council.	
Consider possibility of supplying recycling facilities in all parks within the Borough.	Increase waste recycled hence decreasing waste directed to landfill.	
Ensure recycling facilities are available at all Council Buildings, including the Amphitheatre.	Increase waste recycled hence decreasing waste directed to landfill.	
Develop a consistent system for the emptying of workplace recycling facilities.	Ensure workplace recycling improves. Ensure staff are not resentful because they always empty the recycling facility, hence engineering positive attitudes.	
Calculate the ecological footprint of Carrickfergus Borough Council with a view to reducing it.	Positive environmental impact through decreased land space required for the operation of Council, including land required for fuel and resource production. May have economic benefits	

	<p>through reduced use of resources.</p> <p>Act as a role model for citizens.</p>	
Promote the benefits to citizens of reducing their ecological footprint.	<p>Citizens in the Southern Group Community Eco-Challenge Project made savings of up to £1700 per year per household.</p> <p>Positive impact on environment.</p>	
Consider possibility of installing a re-use facility at future Civic Amenity Sites.	<p>Decrease waste directed to landfill.</p> <p>Provide re-used material to citizens for a cheaper price than high street stores.</p> <p>Profit passed to Carrickfergus Borough Council for the operation of the facility.</p>	
Consider promoting 'Need a bag' week within the Borough.	Decrease plastic bag waste and litter.	
Consider providing paper recycling boxes beside all printers and photocopiers.	Increase waste recycled hence decreasing waste directed to landfill.	
Consider providing incentives for local businesses to recycle.	<p>Increase waste recycled hence decreasing waste directed to landfill.</p> <p>Improve contact with local businesses.</p>	
If recycling is deemed a more expensive alternative by local businesses, focus on encouraging waste minimisation. Publications could be considered.	<p>Positive economic impact on local businesses, hence encouraging economic development.</p> <p>Increase waste recycled hence decreasing waste directed to landfill.</p>	
Consult citizens who fail to recycle on a regular basis to identify reasons for this.	Encourage and increase the amount of waste that is recycled.	

Promote energy efficiency within Council Buildings, perhaps through posters.	Decrease energy expenditure. Positive environmental impact through decreased energy wastage.	
Consider purchasing printers that automatically print double sided on renewing existing facilities.	Decrease expenditure on paper.	
Promote use of scrap paper for appropriate documents.	Decrease expenditure on paper.	
Consider adding 'Save paper. Do you need to print this email' to the signatures of staff.	Decrease expenditure on paper within Council. Decrease paper wastage outside Council hence having a wider impact.	
Consider a campaign to minimise food waste within the Borough in conjunction with the new food waste collection service.	Decrease food wastage. Decrease amount of food waste collected.	
Attempt to increase the number of hot food outlets participating in Small Steps to Healthier Choices.	Improve the health of the Borough's citizens.	

8.2 Natural Resource Protection and Environmental Enhancement

Action	Key Benefits	Action (proposed)
Appoint Biodiversity Officer	Responsibility for actions associated with biodiversity. Further comply with Wildlife and Natural Environment Bill 2010.	
Biodiversity 10 point plan: - change point 9 to emphasise <i>native</i> genetic diversity	Native diversity is the main concern in Britain.	
Biodiversity 10 point	Ensures each point is	

plan: - monitor progress of each point and report to citizens.	followed through.	
Begin to compile a species list.	Help prepare for climate change. Attract nature enthusiasts.	
Prepare for impacts of climate change on environment by adhering to guidelines from Sustainable NI.	Minimise negative impact in future.	
Environmental Services should produce clear policies regarding fly tipping, noise pollution, dark smoke, litter, land pollution and dog fouling etc and make them available to citizens.	Increase awareness of penalties and thus decrease offences. Makes citizens aware of their rights and responsibilities, thus avoiding potential disputes. A standard procedure to follow will help during staff absences.	
Recommend that local businesses work to achieve an Environmental Management System accreditation (ISO 14001).	Positive impact on environment.	
Additional focus on reducing levels of dog fouling in the Borough.	Create a more pleasant and healthy environment for citizens.	
Additional focus on improving air quality of the Borough.	Create a more pleasant and healthy environment for citizens.	
Assess possibility of hiring Northern Group Systems air quality trailer.	Educate citizens about action they can take.	
Assess chemicals used in Council Buildings for environmental impact, with a view to decreasing negative	Decrease negative environmental impact of chemicals.	

environmental impact.		
Identify a standard practice for monitoring water usage on Council properties with a view to decreasing usage.	Conserve water as a natural resource. Economical saving on water bill.	
Consider dual flush systems for toilet facilities on refurbishment.	Conserve water as a natural resource. Economical saving on water bill.	
Replace 'hippo bags' in toilet cisterns.	Conserve water as a natural resource. Economical saving on water bill.	
Monitor water quality of sea water in the marina.	Protect marine environment (an objective of the Northern Ireland Sustainable Development Strategy).	

8.3 Sustainable Communities

Action	Key Benefits	Action (Proposed)
Consider ways for Carrickfergus Borough Council to directly and actively support and encourage businesses regarding sustainable development.	Indirect positive impacts on the improvement of businesses.	
Monitor response time for service requests and report to citizens (because in most cases it is exceptional!).	Improve public opinion of Carrickfergus Borough Council.	
Consider publishing compliments logged on the Te-care systems on the website.	Improve public opinion of Carrickfergus Borough Council.	

8.4 Climate Change and Energy

Recommended Action	Key Benefits	Action (Proposed)
Calculate a carbon footprint with a view to becoming carbon neutral.	Support the Northern Ireland Sustainable Development Strategy by taking action to mitigate climate change. Act as a role model for citizens of the Carrickfergus Borough.	
Consider applying for the Local Authority Carbon Management Programme and The Carbon Trust Standard.	Attain an award as evidence of actions taken to reduce carbon dioxide emissions.	
Develop an up-to-date 'Energy Efficiency Policy' and ensure all staff are aware of this policy.	Decrease energy expenditure. Positive environmental impact through decreased energy wastage.	
Remind staff of the importance of turning off appliances when not in use; including computers, monitors, printers and photocopiers.	Decrease energy expenditure. Positive environmental impact through decreased energy wastage.	
Elect a staff member to attend the Northern Ireland Energy Managers Forum.	Network with other councils and organisations allowing the transfer of ideas which could decrease the Council's energy expenditure.	
Facilitate meetings between the Energy Efficiency Officer (Environmental Services) and Building Control.	Ensures staff working on similar issues can share ideas.	
Consider a Borough Schools Programme where Building Control informs young people of methods taken by Carrickfergus	Educate citizens regarding energy efficiency. Improve public opinion of Carrickfergus Borough Council.	

Borough Council to increase energy efficiency. The Energy Efficiency Officer (Building Control) could also advise on home insulation.		
Move the energy efficiency advice section on the website to a more noticeable section (currently within Warm Homes Scheme which does not apply to all citizens).	Ensure positive advice reaches all citizens.	
Consider a joint Energy Efficiency Officer position with other Councils.	Allows funding received to be shared. Ideas shared between Councils.	
Consider how Carrickfergus Borough Council can support businesses actively and directly perhaps via publications regarding energy efficiency.	Indirect positive impact through improvement of businesses.	
Purchase LEDs for Borough's Christmas lights.	Decrease energy expenditure.	
Consider using wood deposited at Civic Amenity Site for wood pellet boiler. Currently taken by a contractor.	May save money in the long-term.	
Educate citizens regarding renewable energy sources: for example, facilitate a competition asking citizens to submit ideas for how renewable energy could be used locally.	Educate citizens. Some ideas may be able to be adopted.	
Attempt to decrease	Help in mitigating climate	

fossil fuel usage through increased use of renewable technologies (as well as improved energy efficiency). Publicise this information.	change. Act as a role model for citizens.	
Consider methods of encouraging businesses to reduce fossil fuel usage.	Indirect benefits through improvement.	
Consider methods of encouraging citizens to reduce fossil fuel usage.	Indirect benefits through improvement.	
Monitor staff travel with a view to decreasing gaseous emissions.	Decrease emissions of harmful gases including carbon dioxide, nitrous oxides and sulphur dioxide.	
Consider methods of encouraging staff usage of public transport.	Decrease emissions of harmful gases including carbon dioxide, nitrous oxides and sulphur dioxide.	
Further consider the 'Bike to Work' scheme.	Decrease emissions of harmful gases including carbon dioxide, nitrous oxides and sulphur dioxide. Promote staff exercise.	
Prohibit idling of vehicles on Council land.	Save fuel expenditure. Decrease emissions of harmful gases including carbon dioxide, nitrous oxides and sulphur dioxide.	
Adopt a work travel policy whereby environmental and economic impacts of travel options are assessed.	Decrease travel expenditure. Decrease emissions of harmful gases including carbon dioxide, nitrous oxides and sulphur dioxide.	
Assess possibility of using electric vehicles and produce report on assessment.	Decrease emissions of harmful gases including carbon dioxide, nitrous oxides and sulphur dioxide.	
Consider facilities for video and telephone conferencing.	Decrease travel expenditure. Decrease emissions of harmful gases including	

	carbon dioxide, nitrous oxides and sulphur dioxide.	
Responsibility designated for a staff member to monitor 13 indicators of climate change.	Realise impacts of climate change on Carrickfergus early so action can be taken.	
Follow the example of other Councils by producing a comprehensive Climate Change Action Plan (suggestion included section 5.3.7)	Adequately prepare for possible disastrous impacts of climate change on health, tourism, biodiversity, agriculture, infrastructure and communities.	

8.5 Learning and Communication for Sustainable Development

Recommended Action	Key Benefits	Action (Proposed)
Consider methods of delivering an environmental education programme to community groups (youth groups, church groups and community centre groups). Education about carbon footprints and ecological footprints could be included in this programme.	Educate citizens about environmental issues and help them decrease their own negative environmental impact.	
Compile list of publications produced by Carrickfergus Borough Council.	Make it easier for citizens to access the information they need and understand what is available to them.	
Assess best way of changing negative attitudes of citizens via surveys. In particular assess the best placement of leaflets and decide whether website communication is more effective than leaflet and posters.	Allow the Council to effectively target negative attitudes. Save money long term, through decreased wastage of badly placed resources and use of less effective types of media.	
Work in partnership	Studies show that	

<p>with eco-schools to deliver a programme in the Borough's schools. This involves staff members from the cleansing section visiting schools alongside eco-schools events (arranged by TIDY NI) and explaining how Carrickfergus Borough Council makes it easy for citizens to recycle.</p>	<p>households with children participating in an eco-schools programme recycle more frequently.</p> <p>Educate citizens.</p>	
<p>Ensure that the success of all staff training is assessed via surveys after training events.</p>	<p>Help identify effective training methods and improve on these.</p> <p>Clarify the importance of a positive attitude to training.</p>	
<p>Improve team meetings; both the frequency and the format (in line with results of the staff survey)</p>	<p>Create better working relationships.</p> <p>Ensure staff work together on shared objectives.</p> <p>Create more positive and less resentful attitudes amongst staff.</p> <p>Ensure directors and managers have authority over staff.</p> <p>Allows that sharing of ideas for improvements.</p>	
<p>Facilitate team building events and attempt to make this at least an annual occurrence. If possible this should have a 'sustainable development' theme and increase public awareness; both of sustainable development and the Council's willingness to help in the</p>	<p>Create better working relationships.</p> <p>Ensure staff work together on shared objectives.</p> <p>Help the community and hence improve public opinion of the Council.</p> <p>Educate staff about sustainable development, in the hope that they will continue efforts in their own</p>	

community.	home communities. Educate the community about sustainable development.	
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8.6 Governance for Sustainable Development

Recommended Action	Key Benefits	Action (Proposed)
Develop an Implementation Forum with members from each Council Department.	Ensure implementation of sustainable development actions.	
Appoint a ‘senior champion’ with responsibility for coordinating Implementation Forum.	Designate overall responsibility for implementation of sustainable development actions.	
Consider inviting Patricia Mackey (Sustainable NI) to Carrickfergus Borough Council to provide training to relevant staff on sustainable development issues.	Ensure staff are adequately trained. A valuable source of advice.	
Consider ways of improving within council communication – team building events.	Engineer a sense of inclusion to ensure sustainable development actions are taken. Improve staff relationships and ensure staff work together on shared objectives.	
Seek out possible partnerships for implementing sustainable development actions.	May allow the sharing of funding. Allow groups to work together to achieve shared objectives.	
Consider method of reporting on sustainable development progress	Act as a role model for citizens. Improve public opinion of	

and making citizens aware of progress.	Council. Apply pressure to ensure recommended actions are followed through.	
Decide on time frame for monitoring progress.	Apply pressure to ensure recommended actions are followed through.	

9. Additional References

Carrickfergus Borough Council Corporate Plan (2005-2009)

Carrickfergus Borough Council Website

Carrickfergus Shoreline Biodiversity Profile. 2006.

Community Eco-Challenge Project

Everyone's Involved - Northern Ireland Sustainable Development Strategy

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11. Appendix 1

Northern Ireland (Miscellaneous Provisions) Act 2006

2006 CHAPTER 33 Sustainable development

(1) A public authority must, in exercising its functions, act in the way it considers best calculated to contribute to the achievement of sustainable development in Northern Ireland, except to the extent that it considers that any such action is not reasonably practicable in all the circumstances of the case.

(2) For this purpose—

(a) a public authority must have regard to any strategy or guidance relating to sustainable development issued by the Department of the Environment, and

(b) a public authority other than a Northern Ireland department must have regard to any guidance relating to sustainable development issued by a Northern Ireland department other than the Department of the Environment.

(3) In this section “public authority” means—

(a) a Northern Ireland department,

(b) a district council in Northern Ireland, and

(c) any other person designated for the purposes of this section by order made by the Office of the First Minister and deputy First Minister.

(4) The power to make an order under subsection (3)(c) is exercisable by statutory rule for the purposes of the Statutory Rules (Northern Ireland) Order 1979 (S.I. 1979/1573 (N.I. 12)).

(5) Such an order may not be made unless a draft of the order has been laid before, and approved by a resolution of, the Northern Ireland Assembly.

Peat compost usage

Year	Volume used (m³)
2004	50
2005	22
2006	0
2007	0
2008	0
2009	0
2010	0

Fertiliser usage

Financial Year	Amount Purchased (kg)	Amount Applied (kg)
2007-2008	7625	6925
2008-2009	7400	6400
2009-2010	6250	5875

Pesticide Usage

Financial Year	Amount Purchased (Litres)	Amount Applied (Litres)
2007-2008	320	295
2008-2009	275	245
2009-2010	255	225

Noise Service Requests

Year	Number
2007	205
2008	155
2009	189

Smoke Service Requests

Year	Number
2007	24
2008	12
2009	13

Illegal Dumping Service Requests

Year	Number
2007	305
2008	327
2009	336

Abandoned Vehicle Service Requests

Year	Number
2007	42
2008	36
2009	31

Bonfire Service Requests

Year	Number
2007	57
2008	16
2009	36

Dog fouling Service Requests

Year	Number
2007	190
2008	210
2009	157

Energy Usage 2008/2009

	Electricity (kWh)	Oil (kWh)	Gas (kWh)	'Green' Sources (kWh)
Town Hall	61733	0	166900	0
Oakfield Community Centre	189473	170284	0	0
Sullatober Works Depot	161244	91614	0	2477
Civic Centre	305280	0	269808	0

Energy Usage 2009/2010

	Electricity (kWh)	Oil (kWh)	Gas (kWh)	'Green' Sources (kWh)
Town Hall	58061	0	124964	0
Oakfield Community Centre	99684	172638	0	0
Sullatober Works Depot	125947	99128	0	3895
Civic Centre	299421	0	270174	0

Waste Collection and Recycling

Year	Total Municipal Waste (tonnes)	Household Waste Landfilled (tonnes)	Recycled Waste (tonnes)	Composted Waste (tonnes)
04/05	25657	18287	2362	1233
05/06	25328	17902	2732	1149
06/07	24186	16820	2725	1988
07/08	23375	13809	3851	3013
08/09	22736	13122	3659	2793
09/10	22238	12965	3784	2955

Landfill Allowance

Year	Landfill Allowance (tonnes)	Allowance Used (tonnes)
2005/2006	17114	14935
2006/2007	14843	14115
2007/2008	14549	11802
2008/2009	14252	11586

12. Appendix 2

This consists of leaflets and online documents and thus is contained in a document wallet. A computer presentation has been passed to Lisa Adair, Alan Barkley and Stephen Daye.