## **Biodiversity Duty Report** 2018 - 2020









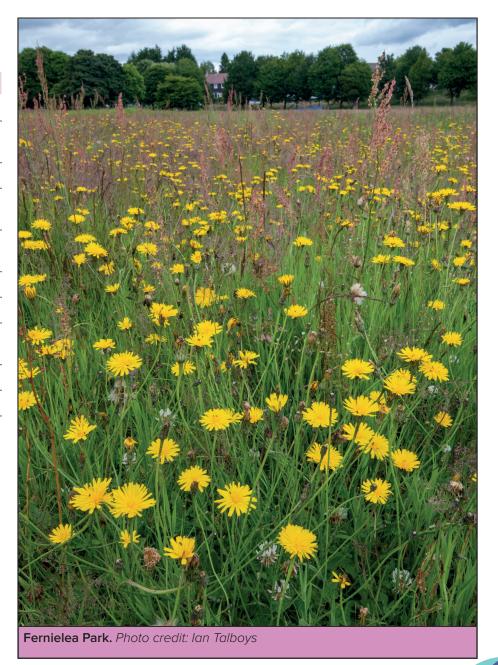
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#### **SECTION 1: ABOUT ABERDEEN CITY COUNCIL**

Aberdeen City Council (the Council) is a local authority which covers an area of 185.7 km2 and on 30th June 2019, *National Registers of Scotland* estimated it was home to 228,670 people. Many internationally, nationally and locally protected areas fall within the Council's boundary, most prominently the River Dee Special Area of Conservation (SAC), designated for its Atlantic salmon, freshwater pearl mussel and European otter. But perhaps more importantly, the City is also home to a diversity of public green and open spaces for people and wildlife, whilst helping us adapt and mitigate to climate change and enriching people's wellbeing.

As a local authority, our services are diverse and wide-ranging. The Council is a landowner and land manager, a planning authority and a provider of education and social care services. The Council also has a broad regulatory remit that can have impacts on biodiversity, such as within the planning system. The Council is also responsible for the management and maintenance of all Council buildings and associated grounds, public open spaces such as parks, woodlands, cemeteries, school grounds, road verges and play parks.

Our Countryside Ranger Service manages 25 countryside sites across Aberdeen City where the priority is managing for biodiversity, education and public access. These sites total more than 1,000 hectares and include a Site of Special Scientific Interest, four Local Nature Reserves, and 14 Local Nature Conservation Sites. In addition to this the Council manages 350ha of woodlands and 1,450ha of parks and other greenspaces.

In addition to the global biodiversity emergency and the effects of climate change, as in most other local authorities, one of the major pressures on biodiversity in Aberdeen is the increasing requirement for land for housing and industrial development. Another key threat to biodiversity in the City area comes from invasive non-native species. In this report we will outline some of the many ways we protect and enhance biodiversity while still delivering vital services to the citizens of Aberdeen City.

This report will also be of relevance demonstrating how Aberdeen is working towards delivering the United Nations Sustainable Development Goals (SDG) locally, especially SDGs 13, 14 and 15. This report covers the period from January 2018 to December 2020.

### SECTION 2: ACTIONS TO PROTECT BIODIVERSITY AND CONNECT PEOPLE WITH NATURE

#### **Key partnerships**

#### North East Scotland Biodiversity Partnership (NESBiP)

Aberdeen City Council is a key partner of NESBiP, and we believe that this partnership approach to tackling threats to biodiversity and facilitating conservation action for local biodiversity is essential to achieve our outcomes under the Biodiversity Duty. NESBiP's Strategic Delivery Plan and actions complement the Council's environmental and community objectives and helps to support us in our land-use planning duties.

During the reporting period, one of the big benefits coming out of the partnership has been the new website with its "Developer's Hub", which is a fantastic resource primarily aimed at developers, but which also provides lots of useful information for the region's local authority planners.

The Hub has been developed by NESBiP and its partners to support planning decisions within the area covered by the partnership and in doing so, facilitate protection and enhancement of biodiversity through the planning process.

In 2017, NESBiP contacted Countesswells Development Ltd. to offer its help on some of the green elements of the new community development. Eager to compliment any work being done by the Council, NESBiP began by clarifying what they could and could not get involved in. That collaborative working and supportive relationship featured high profile events such as a community centred <code>BioBlitz</code>, and continues to grow through Residents Association events and hopefully with the new Countesswells Schools.

Many projects which NESBiP have done, such as the highly successful <u>Camera Trapping for primary schools project</u>, started before the report timeframe, are still going strong and their longevity demonstrates that NESBiP projects are designed to be sustained in the long-term, which is what most communities need and want.

The partnership is regularly invited to receptions at the Scottish Parliament where they publicise and receive acknowledgement for work done in the north-east. The partnership also holds Annual Biodiversity Awards, with the first one in 2017, where MSPs are in attendance and the local community can network and showcase their projects.

#### North East Scotland Biological Records Centre (NESBReC)

Aberdeen City Council is a partner with NESBReC who collects, stores, manages and disseminates biological data for various organisations including local authorities. Through a Service Level Agreement (SLA), NESBReC provide information that assists the Council in making decisions in a nature conservation and land-use planning context, and contributing data to inform the Council's site management plans.

NESBReC also engages with residents of Aberdeen, as well as across North East Scotland, to increase awareness of biodiversity and to encourage participation in biological recording. Records of any species can be submitted to NESBReC by the general public for inclusion in the database (after necessary validation and checking procedures) and for future use by the council.

The Mammal Atlas of NE Scotland and the Cairngorms was produced by NESBReC assisted by many volunteers. The Atlas was published in March 2017 to highlight all the mammal species recorded in the area with species descriptions and distribution maps.

During 2018-19, NESBReC carried out habitat mapping in sites across Aberdeen City to build up a profile of habitat types and plant species data. The data will be used to inform future decision-making processes in development management and various internal strategic planning initiatives. The data can be used to compare with older habitat data to highlight any changes in habitat type, whether natural or man-made and to assess any losses or gains in biodiversity value.

### Creation, enhancement and protection of wildlife and natural habitat

#### The Maidencraig Flood Alleviation Project

A major project which has come out of the need to mitigate flooding has also made a great difference to biodiversity within one of the Council's Local Nature Reserves. More information on this project is contained within Case Study 1 in section 7.

#### The Middlefield / Heathryfold Park project

Another project, started in 2018, to help manage surface water, reduce flooding and make biodiversity improvements is the Middlefield / Heathryfold Park project.

The initial driver for this was to create a sustainable surface water management system for a new development of social housing by increasing the capacity of a nearby culverted burn by bringing it back to the surface and creating areas that would hold water and flood at times of high rainfall. This gave the opportunity to engage with the local community on how the park was re-developed and create some new wildflower and wetland areas within an urban housing scheme. These biodiversity areas total about 1.5ha. In addition, the path network was upgraded and extended, native trees and shrubs planted and a new children's play area was installed. As part of the project a fixed term Community Ranger was employed to work with the community to support schools to

use the area more for outdoor learning, organise public events and support local volunteers to help look after the area. The area has now been transformed from a 'green desert' of mown grass into an area full of wildflowers, insects, birds and mammals benefitting from the new habitats created. This project was part funded by the SNH Green Infrastructure funding.

#### Addressing key drivers of biodiversity loss

#### Managing non-native invasive species

The Countryside Ranger Service has taken the lead in managing invasive non-native plant species across the City. This has focussed on giant hogweed, Himalayan balsam, American skunk cabbage and Japanese knotweed. These are mainly found along the main river and burn corridors but also in areas away from these usual transmission routes. Over the period of this report there has been a North East Non-Native Invasive Species Project (NENNIS) working across Aberdeenshire and Aberdeen City lead by Aberdeenshire Council. The Countryside Ranger Service represented Aberdeen City Council on the project management group.

This project looked to deliver control works on these species at a regional level, filling in gaps left by other projects such as the Scottish Invasive Species Initiative. Much of the work was delivered through community groups supported by the project staff and partner organisations.

In 2020 the Countryside Rangers spent over 20 person days spraying or otherwise controlling these species. This was centred on giant hogweed and Japanese knotweed in the main, extensive areas of Himalayan balsam needed to be controlled but staff resources limited what could be achieved.

Good levels of control are being achieved with Japanese knotweed following several years intensive work. In 2020 work on invasive species was delayed by Covid-19 restrictions but these restrictions meant that more time was available to do the work than normal as other duties such as outdoor learning sessions with schools and public events were not permitted. Increased resource commitments are likely to be required in future years if control is to be achieved for all these species, without this there may be significant habitat loss.

In addition to our efforts to control the above INNS plant species within our area, the Council is a strong supporter of Saving Scotland's Red Squirrel project in their efforts to control grey squirrel, and also the Scotlish Invasive Species Initiative (SISI) project to control American mink.

#### Wider community benefits and biodiversity action

#### Connecting vulnerable people with nature

The Countryside Ranger Service has worked with a number of community groups and horticultural therapy projects to develop a small area at the Council's former plant nursery to create an area for groups to use who find outdoor learning in publicly accessible places more challenging due to their physical or mental capacity limitations or issues around social interaction.

This is an area of existing young woodland that has been extended, it also has a wildflower area and a small wetland/pond. Within this, "Discovery Woodland" areas have been created for 'leave no trace' campfires, bird feeding stations, minibeast hotels and many other features.

The area is extensively used by Ranger led "Branching Out" programmes which are programmes where adult clients are referred by their medical practitioners to the programme as an alternative to drug therapy for some mental health conditions.

It has proved exceptionally successful with many clients; many getting in to work for the first time or being able to return to work and support themselves and their family whereas before their lifestyle and mental health meant they were not able to work and were in a bad place with their mental health.

The area has also been used by the Family Learning Team working with families with severe autism, by the Play Forum and as a venue for woodland craft and fire training with adults.

#### Works to core paths

The quality of the place we live in impacts on people's health and wellbeing. Increasing active travel is one of the key outcomes of the Aberdeen Local Outcome Improvement Plan (LOIP) 2016-2026. Our Core Paths Plan 2009 outlines key routes which will allow active travel as well as connecting people to nature.

Projects to upgrade parts of the core path network have been delivered during the reporting period. In 2018, flood damage occurred at a section of the River Don Path near Dyce. The popular riverside path became dangerous after the riverbank eroded, undercutting the path. The contractor CR Contracting Ltd and their advisors CBEC, a river restoration specialist, provided a natural solution to fixing the erosion issue by using coir rolls and matting, planted with native wetland plants and seeds to stabilise the river bank and naturally shift the flow of the water away from the problem area.

Once established the coir matting is entirely covered with vegetation, making it blend in with the surroundings. The solution not only enables safe access but delivers additional benefits for biodiversity.

In 2019 a section of core path 79 on Kincorth Hill was moved away from a wet area in private ownership to a drier route on Council managed land. Upgrades of the paths on either side of this section to join up with previously upgraded sections was also undertaken.

This was funded by Developer Obligation funding secured through the planning process. In 2020 a section of Core Path 27 along the Denburn was upgraded, a bridge deck replaced and new seats installed with funding from SUEZ Community Trust and Developer Obligation funding.

As with all the core paths through the Council area, these paths are well used by the local community and improve access to the greenspaces and opportunities to engage with nature.

#### **SECTION 3: MAINSTREAMING BIODIVERSITY**

# Current Local Development Plan 2017 (LDP 2017) and the Proposed Aberdeen Local Development Plan (pLDP 2020) (KH/LEB)

Our current natural heritage policy within the Local Development Plan (LDP 2017) has been cited as a contributing factor in 102 planning cases within the report period. This shows us that the policy is being used in decision making to protect our natural heritage and our biodiversity. (LEB) The Proposed Aberdeen Local Development Plan (pLDP 2020) contains an updated natural environment policy. The addition of the term "biodiversity gains" strengthens the policy position and marks a significant step upwards from the extant policy position which seeks simple enhancements to the surrounding environment of planning application sites.

Proposed Policy NE3 – Our Natural Heritage reads as follows:

#### Proposed Policy NE3 – Our Natural Heritage

Development should not have a detrimental effect (directly or indirectly) on its own or in combination with other proposals) on:

- Sites, habitats, ecosystems or species protected by law or natural heritage designation;
- Sites which have been designated for their geodiversity value;
- Areas of peatland or other carbon-rich soils;
- Sites, habitats, ecosystems or species of regional or local nature conservation value.

Where a development is likely to affect any of the above assets it must demonstrate that alternative solutions have been considered and ruled out, detrimental effects can be minimised through mitigation and overall biodiversity gains can be achieved. Where detrimental effects are still unavoidable, development will only be supported where these adverse effects are clearly outweighed by social, environmental or economic benefits at a level which is at least equal to the designation's or species' importance (international, national or local).

Following the adoption of the pLDP, which is expected to take place in early 2022, supporting Aberdeen Planning Guidance will be produced which will include guidance for developers on the Council's expectations for all planning applications under this new policy structure.

The recent National Planning Framework 4 consultation and resulting submissions from members of the public, Key Agencies, Local Authorities and developers showed strong support for implementation of Biodiversity Net Gain in Scottish Planning Policy and called strongly for a robust policy framework to be set out as quickly as possible.

Policies in the Local Development Plan have been revised to protect the open spaces and the use of open spaces in flooding management and tackling climate change and biodiversity. In the new developments, developers are encouraged to design open spaces to reduce the flood risk and make provision of SUDS where opportunities are available.

#### **Environmental Planning and Development Management**

The Environmental Policy team provide specialist advice to other departments within the Council on topics such as nature conservation, tree protection, biodiversity, sustainability, outdoor access and climate change, to ensure legislation and best practice is covered in decision making. The team is also working to improve on the level and type of advice associated with developer contributions which could help to further conserve biodiversity.

A Natural Heritage Checklist was created in 2019 by the Environmental Policy team to assist development management case officers. It helps to determine under which circumstances surveys for wildlife may be required for planning applications, and when they would need to consult further with the Environmental Policy team for specialist advice. It also contains a locally relevant calendar for survey seasons so that officers can make sure a seasonably bound survey is acceptable when submitted.

Due to recent changes in case law, work has also been undertaken over the past year to raise awareness of the Habitats Regulations Appraisal (HRA) process within the Council. This has included work to raise awareness, produce templates, improve internal processes and deliver training on HRA across the Planning Service in order to ensure better understanding, compliance and reduce misconceptions around the HRA process.

#### **Nature Conservation Strategy**

In 2017, the Council updated its Nature Conservation Strategy to include new legislation and guidance. Overall, the focus of the strategy is nature conservation for the sake of biodiversity and our natural heritage, plus the natural resources that we depend on. The strategy recognises that biodiversity also provides health, social and cultural benefits through the provision of good quality open spaces which are biodiverse and positively contributing to enhanced quality of life. The strategy also considers the future impacts of climate change; the strategy recognises that biodiversity loss and climate change are interlinked and that both threaten the availability of natural resources. The strategy recommends that the Council continues to conserve nature using current best practices and to adapt procedures based on the influences of climate change and associated appropriate quidance.

#### **Open Space Strategy**

The strategy is one of the key ways for the Council to deliver on its biodiversity duty. The strategy contains high level aims and objectives and an action plan setting various tasks and resources required for its delivery. There are eight objectives in the strategy and 33 various actions identified by the partners, stakeholders, and the public who contributed towards the development of the strategy. The strategy considers open space as defined by "Planning Advice Note (PAN65), Planning and Open Space". The strategy is due to be revised next year in light of the Planning (Scotland) Act 2019. The review of the open space audit is currently in progress which will provide the evidence base for the revised strategy.

In 2019, NESBReC applied a biodiversity scoring system for habitat compartments within the City to help assess sites for the Open Space Audit. The data is held in GIS format for multiple use and

cross referencing with other data. This scoring system identified areas that contained UK BAP Priority Habitats and also highlighted areas that might benefit from future biodiversity improvement. This input into the audit ensured that biodiversity was accounted for as part of the overall process. In addition, individual polygons were also scored for future use in any planning application assessment and other decision making on land use and development.

Over the last 2-3 years some high priority actions were taken forward based on the results of the open space audit 2010 outlined in section 7 of the open space strategy. Actions classed as high to medium were given priority. One of the key actions to deliver the biodiversity duty is enhancing the green space network across the city to avoid habitat fragmentation and link various habitats and species. We developed a Green Space Network GIS tool to assist with protecting, enhancing and managing green spaces across the city. Business and developers are encouraged to use the GIS tool in developing masterplans and various development frameworks. This tool is being used to promote biodiversity through the planning process in determining planning applications. Open Space and natural environment policies in the Local Development Plan have been promoted working with developers. Objective 8 "maximise opportunities to mitigate and adapt to climate change and further biodiversity" of the strategy focuses on the role of open spaces in enhancing biodiversity in the urban environment. This is an ongoing action throughout the life of the strategy. It also has overlaps with other strategies for example the Nature Conservation Strategy.

### Local Nature Conservation Sites/Local Nature Reserve management plans

Management plans for all four Local Nature Reserves (Den of Maidencraig, Donmouth, Kincorth Hill and Scotstown Moor) are being reviewed in 2020 along with management plans for some of the other countryside areas. Where there was not a management plan one is being compiled. By the end of 2020 it is planned that there will be an up to date management plan for all 25 countryside sites. This has been possible due to the restrictions on the Countryside Ranger Service during the Covid-19 lockdown and subsequent restrictions on work activities.

### **Environmental Services grounds maintenance management plans and policies**

Areas within formal parks are now starting to be managed in a more biodiversity friendly manner with wildflower areas being developed in Victoria Park, Cloverfield Park, Westfield Park and Seaton Park. The 'Friends of' groups for these parks have been instrumental in establishing and helping to manage these areas. In 2019 and 2020 grass cutting regimes in some areas have been changed to one or two cuts a year to promote biodiversity. Large areas of Fernielea Park and Seaton Park have been managed in this way. With the Covid-19 restrictions in 2020 most areas of grass were left uncut until June or July due to the lockdown.

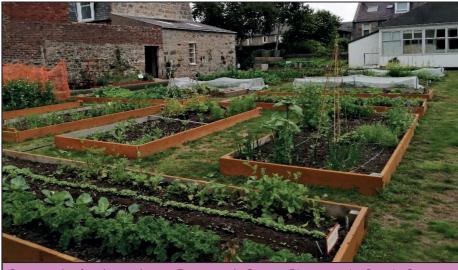
This meant that many more areas could grow long which was met with support from many communities, though not all. Looking forward it is planned to identify more areas currently under high levels of grass cutting to reduce to one or two cuts a year which will benefit biodiversity and reduce carbon emissions relating to cutting the grass and movement of staff and machinery to sites.

#### **Food Growing Strategy**

The Community Empowerment (Scotland) Act 2015 gave local authorities the duty to prepare a food-growing strategy for their areas. Granite City Growing was approved at committee in February 2020; the culmination of nearly three years of work. Food-growing has many co-benefits and, in Aberdeen, making strong links to health and wellbeing as a therapeutic activity and in providing fresh edibles has been locally important. Embedding it within the local spatial and community planning landscape has underpinned the strategy throughout. As well as alignment to the Local Development Plan, Granite City Growing has also sought to fit in with the governance of the Local Outcome Improvement Plan and the Sustainable Food City Partnership Aberdeen vision and action plan. Please see our case study 3 on page 24.



Functional wetland plants. Photo credit: Ian Talboys



Community food growing at Bonnymuir Green. Photo credit: Sandy Gustar

### SECTION 4: NATURE-BASED SOLUTIONS, CLIMATE CHANGE AND BIODIVERSITY

The Council recognises the devastating effect climate change is having on biodiversity and working towards net zero in as many aspects of our business as possible is essential.

#### **Climate Change Adaptation**

The Council led the development of "Aberdeen Adapts - a Climate Adaptation Framework" for the city which was approved in December 2019. The framework was developed with input from 41 organisations through a series of workshops including a specific one on the theme of Natural Environment. The Final Framework includes a priority for "Safeguarding our natural environment — Adapt through nature, for a healthy, protected and productive natural environment." It includes adaptation goals and action areas for:

#### Goal - Managing flooding shade and shelter

Actions include: Support measures to implement the North East Flood Risk Management Plan and identify city opportunities for natural flood management. Expand the use of blue green infrastructure in new development and regeneration.

#### **Goal - Space for nature**

Actions include: Assess the vulnerability of Aberdeen's natural environment to climate change and establish processes to monitor change. Review and strengthen local plans, policy and strategy, as we learn more about climate impacts for the natural environment. Protect and expand Aberdeen's Green Space Network and increase naturalised green spaces in the city, to improve habitat connections. Promote partnership action to reduce the risk of wildfire. Integrate climate resilience in the management of Aberdeen's parks, gardens and greenspaces.

#### **Goal - Productive soil**

**Action includes:** Encourage management and protection for soil during planning, development and construction processes, to maintain soil function, quality and stability.

#### Goal - Healthy trees and woodlands

Actions include: Establish a programme to assess tree cover in Aberdeen and monitor the health of city trees and woodlands. Expand Aberdeen's tree coverage, planting resilient species at appropriate locations. Explore the use of trees and woodlands to reduce flood risk and provide shade and shelter in Aberdeen.

#### **Goal - Protecting water courses and coastline**

**Actions include:** Support the development of natural coastal defences, to improve the resilience of vulnerable soft coastal areas to flooding and erosion. Investigate opportunities to reintroduce meanders to watercourses, where appropriate, to slow down water flow. Encourage sustainable riverbank management to reduce erosion.

An Evidence Base document was developed to inform Aberdeen Adapts. This examined strategic climate risks affecting the city, including those for the natural environment and considers information under the UK Climate Risk Assessment and UK Climate Projections (UKCP18).

#### **Climate Change Mitigation**

The Council approved a Council Energy and Climate Routemap in May 2020.

This outlines commitment and indicative mitigation and adaptation actions for Council assets and operations.

It also sets out the phased approach to producing a detailed plan by March 2021, governance has been established to take this work forward.

The Other Operations theme in the Routemap includes "while trees and other blue / green infrastructure are not solutions in themselves, they play a critical role in managing our climate and environments; absorbing carbon dioxide, contributing to climate resilience and providing co-benefits as critical spaces to protect the health and wellbeing of people and wildlife."

A range of actions will be developed for the full plan, and the Routemap indicates areas for consideration under this theme including:

- Expand and proactively manage tree and woodland cover across the urban and rural landscapes we own, focusing on a mix of climate resilient species and ensuring delivery of cobenefits.
- Protect, increase and appropriately manage the quantity and types of blue / green infrastructure across the land and structures we design, deliver and manage, including flood alleviation schemes and green roofs and walls as business as usual.

#### Sustainable travel options for work

The Council has a large fleet of pool vehicles for use when conducting our business. Moving towards our net zero vision, many of these vehicles are now carbon neutral;







hydrogen powered vehicles



pool bikes

In December 2020, the Council won the Green Fleet National Awards 'The Public Sector Fleet of the Year 2020 (Medium to Large)' for our commitment to the investment and implementation of alternative fuelled vehicles.

#### Partnering to change the way we manage our land

The Council's Environmental Services staff are working in collaboration with the North East Scotland Biodiversity Partnership (NESBiP) to develop new grass cutting regimes to promote biodiversity through reduction in the number of cuts and the removal of arisings to reduce soil fertility and therefore vigour in the coarse grasses to allow wildflowers to succeed.

The Countryside Ranger Service are also working with NESBiP to help some of the 'Friends of' groups for parks to develop and manage wildflower areas within their greenspace areas.

NESBiP have offered groups free Scottish sourced wildflower seeds to create and manage wildflower areas.

With some of these projects the local schools have been involved in preparing the ground and sowing the seeds.

Some have been growing the seeds into plug plants which are planted out into existing grass swards.

This supports many parts of the curriculum and helps taking learning outdoors too. NESBiP has highlighted several Council projects on their website.



Photo credit: Ian Talboys

Tree bumblebee (Bombus hypnorum), a recent arrival in the City area. Photo credit: Lina-Elvira Back

### Co-operating in collecting, managing and using biodiversity data

North East Scotland Biological Records Centre (NESBReC) continues to receive and manage reports of invasive non-native species (INNS) from residents within Aberdeen so that the data can be held on the NESBReC database for further use by the Council. Sightings of the INNS plant species are shared with the Countryside Rangers Service to enable control measures to be planned. Sightings of grey squirrel are shared with Saving Scotland's Red Squirrels to aid their project work in Aberdeen City and Aberdeenshire. NESBReC has also given presentations and held workshops at the annual NE INNS Forum.

During 2018-20, NESBReC has been continually active on the Scottish Biodiversity Information Forum (SBIF) Advisory Group, attending regular meetings and responding to ongoing consultations on the SBIF Review. This review process aims to achieve an improved flow of biodiversity data across the whole of Scotland and NESBReC represents organisations and biological recorders of both Aberdeen City and Aberdeenshire.

In the Council area, the main challenge from climate change is likely to be from flooding, and overall the challenges from climate change for biodiversity are similar to the overall Scottish ones which have been detailed in the 'UK Climate Risk Assessment – summary for Scotland' which include:

**Ne1:** Risks to species and habitats due to inability to respond to changing climatic conditions.

The pace of change is resulting in habitat loss and fragmentation, which means there is a shift in species numbers and distribution and warmer springs/later autumns also changes the lifecycle events of many species. In the Council area this could be a particular problem for the fishing industry with the northward movement of cold-water marine species.

Rising river temperatures are a risk to the qualifying species of the River Dee Special Area of Conservation (SAC), particularly the freshwater pearl mussel which is an immobile species.

Ne4: Risks to soils from increased seasonal aridity and wetness.

This includes water-based soil erosion, deterioration/ loss of soil quality and function plus risks from compaction. We can especially see the impacts of water-based soil erosion around the Council area and tackling this problem ties in with aims for flood alleviation. The collapse of banks along the River Don, as described on page 21 of this report, is linked to high water flows. The remedial works to strengthen the bank added benefits for biodiversity due to planting of native plants to assist with resisting the erosion. Our case study no 1 (page x) also shows how flooding problems can be addressed while delivering benefits for biodiversity.

**Ne5:** Risks to natural carbon stores and carbon sequestration, **Ne6:** Risks to agriculture and wildlife from water scarcity; and flooding and **Ne7:** Risks to freshwater species from higher water temperatures.

The River Dee is a Special Area of Conservation for the freshwater pearl mussel, Atlantic salmon and European otter. With lower water flows and warming water temperatures, the impact on water quality from flood events there is a need for management practices which reduce risks from low and high water flows. Our involvement with the Dee Catchment Partnership allows us to do more for the River Dee higher up in the catchment to make the river better in our own Council area.

**Ne9:** Risks to agriculture, forestry, landscapes and wildlife from pests, pathogens and invasive species.

Warmer climate is changing dispersal which means there is increased threat from pests/ disease and non – native invasive species. Having a good baseline of biological species records will help us monitor the change of species and habitats, including the arrival of new ones, such as the Tree Bumblebee (Bombus hypnorum) which was first recorded in Aberdeen City Council area in 2019 after first arriving in the south of the UK in 2001. Whilst it is not considered an invasive species as such, it shows the potential rapid colonisation which has occurred in a short space of time. The arrival of Ash dieback disease in the Council area has had a devastating impact on the locally important Wych elm population.

**Ne12:** Risks to habitats and heritage in the coastal zone from sea level rise; and loss of natural flood protection.

Coastal inundation i.e. through storm surge events causes loss/ erosion of coastal habitats. There is an increase in dynamic movement of soft coastal areas. The Dynamic Coast modelling by NatureScot shows that beach erosion at Aberdeen beach is likely to become more pronounced with climate change, which can affect unique plant communities found in sections of the dune beaches north of the Don.

### SECTION 5: PUBLIC ENGAGEMENT AND WORKFORCE DEVELOPMENT

#### **Partnerships for public engagement**

The Council works in partnership with a number of local and national organisations to be able to deliver more for our biodiversity, these include:-

#### **Saving Scotland's Red Squirrel Project**

This project is led by the Scottish Wildlife Trust to promote and protect red squirrels and their habitats. In Aberdeen much of the work relates to the control of grey squirrels, with the objective of the complete removal of grey squirrels from Aberdeen and Aberdeenshire in the next few years. As the local population is separated from the populations further south this is a realistic objective. Red squirrels are making a good comeback to Aberdeen with regular sightings in Hazlehead Woods, Seaton Park, along the River Dee and Don as well as in many private gardens. The 'Return of Red Squirrels to Aberdeen' was highly commended in the RSPB Nature of Scotland Awards 2020 in the Woodlands and Forest category.

#### **RSPB** Dolphinwatch

The RSPB Dolphinwatch Project has been running for a number of years, growing each year. It is based around engaging visitors to the Torry Battery, overlooking Aberdeen Harbour entrance, with the bottle-nosed dolphins that are very frequently seen there. This involves speaking to visitors about the dolphins but also gives a good opportunity to raise issues around marine litter and its consequences for the marine environment. The Countryside Ranger Service jointly host public events with the Dolphinwatch staff as well as helping them with other local knowledge and

support. This location is now regarded as the best urban place in Europe to watch dolphins from the land. In 2019 the Dolphinwatch Project ran a Dolphinfest Week of events around the City which was supported by the Council and other local environmental organisations. A similar week of events was planned for 2020 but this was not able to go ahead due to Covid-19.

#### **Whale and Dolphin Conservation Shorewatch**

Whale and Dolphin Conservation are also a partner in the RSPB Dolphinwatch Project. They train many of the Dolphinwatch staff and volunteers to undertake their Shorewatch surveys for marine mammals. These are 15 minute surveys undertaken regularly from specific locations around the UK coast, one of which is near Torry Battery. In 2020 the Countryside Rangers were trained to undertake these surveys too, especially at times of year when Dolphinwatch are not present on site, to extend the amount of data collected.

#### **Greyhope Bay Project**

The Greyhope Bay Project is looking to develop a dolphin watching facility around the Torry Battery area with a permanent building, including a coffee shop, interpretation area, facilities for school groups and events etc overlooking the harbour entrance. This is an ambitious project that will be funded by local businesses, grants, donations etc. The first phase on site will involve a temporary building as a pilot project to the larger permanent facility. This is being developed alongside an interactive website telling the stories of the area, both wildlife and people based. The Council's Countryside Ranger Service are involved with providing information and background for this as well as guiding ideas for structures on site.

#### Input to Buglife B-lines project

The Council have been working with Buglife and other partner organisations to identify good, connected pollinator habitat across the NE of Scotland to link into the UK wide B-Lines Project. In Aberdeen these have focussed mainly along the River Dee and Don corridors.

Once agreed, these 3km corridors will be highlighted as areas where additional work to improve the pollinator habitats could be focussed and recognise their importance in land-use planning decisions.

#### **Education services**

Our Education services are bringing learning about biodiversity and the natural environment into daily school life. They have worked with our Countryside Ranger services on over 500 occasions during the reporting period to learn about nature and do projects. Within the school estate new thinking is evolving how the school grounds are being built, used and maintained, we have more on this is our Case Study 2 in section 7.

Schools with physical biodiversity features

Type of feature	Number
School garden	18
Food growing opportunities	9
Outdoor teaching space	16

#### **The Countryside Ranger Service events**

The Countryside Ranger Service offers a year-round programme of public events to raise the profile of local biodiversity, countryside sites and provide for public volunteering opportunities to assist with habitat and site management work.

The Countryside Ranger Service offer free outdoor learning opportunities to early years settings, schools, colleges and university students which are very popular.



44 Events 471 Attendees



2019 41 Events 535 Attendees



2020 4 Events 43 Attendees

#### POPULAR FREE OUTDOOR LEARNING

Available to early years, schools, colleges and university students



2018 158 Sessions 3962 students



2019 300 Sessions 6649 Students



**2020** 82 Sessions 1147 Students

#### **VOLUNTEERING**

2019



2141 Hours 3458 Hours 305 Days 494 Days

Local public volunteering at sites help assist with habitat and site management



**2020** 615 Hours 88 Days

#### **VOLUNTEER SUPPORT**

n

The support of volunteers to help manage our countryside sites is invaluable.
This benefits bio-diversity but helps connect people to nature and associated health benefits

#### **VOLUNTEER FRIENDLY AWARD**



The first ranger service to achieve this recognition.

The award is for best practice approach to recruiting, training and managing volunteers.

The Countryside Ranger Service has been awarded the Volunteer Friendly Award which demonstrates the best practice approach to recruiting, training and managing volunteers. It was the first Countryside Ranger Service in Scotland to achieve this recognition.

The Countryside Ranger Service has an active <u>Facebook</u> page with a following of over 3,000 people and some posts reaching over 1 million people.

The Facebook page is used to promote the activities of the team, achievements, interesting wildlife sightings and a weekly 'Friday Elevenses Quiz' which is a biodiversity related photograph or sound clip posted with a question for followers to respond to. The Facebook page is a good way for two-way communications with individuals and other groups in the area.

#### North East Scotland Biological Records Centre (NESBReC)

NESBReC has continued to hold an annual Recorders Forum event at University of Aberdeen to a typical audience of around 100 attendees. At this event people who are active in biological recording enjoy a day of presentations and discussion focussed on recording the wildlife of North East Scotland. Furthermore, during 2017-20, six free of charge public training events have been held in the city to provide attendees with identification skills for different wildlife species. The subjects that were covered in each of these training sessions were: amphibians; butterflies; mammals; coastal plants; swifts; and grasses, sedges, rushes and ferns. Attendees build up their identification skills and then feel more qualified to record these species in their local area by submitting records to the NESBReC database. NESBReC has also given CPD events to council staff to highlight biodiversity issues on different sites within the city. These are held on Local Nature Conservation Sites and include the identification of key habitats and indicator species.

In order to increase awareness of the biodiversity of Aberdeen and to encourage participation in biological recording within the city, NESBReC has given presentations to a range of local groups such as Airyhall Primary School Eco Group, Mannofield Church, Scotland's Rural College students, Ruthrieston Residents Association, Bon Accord 50+ Group and University of Aberdeen Environmental Careers Fair.

In addition, NESBReC has participated in events run by other organisations to raise awareness of local biodiversity in Aberdeen City and North East Scotland: Duthie Park Environment Day, Aberdeen Highland Games, Mayfest, Aberdeen Science Centre Discovery Day, Reclaim The Streets and James Hutton Institute Bioblitz.



The Comma butterfly (*Polygonia c-album*) is a new exciting record to the City area in the reporting period. *Photo credit: lan Talboys.* 

### Inspiring changing behaviours to protect our natural world and enhance our living spaces

#### **Community engagement**

The Environmental Services team work with around 150 different community groups across the city. Each group is contributing something towards the management of their local greenspace. This can be through raising funds to deliver projects, helping Council staff manage and maintain greenspace areas or just neighbours litter picking their street or adding some extra planters for their local community.

Working in conjunction with Keep Scotland Beautiful, Aberdeen currently has 28 "Its Your Neighborhood" groups.

This is significantly more than any other local authority area in Scotland. These groups lead the way with regards to improving their local environment and inspire 1000s of hours of local volunteering.

These groups work closely with the local teams and help shape green space work programmes and schedules.

These groups have helped Aberdeen establish itself as the top city in Scotland in regard to Britain In Bloom and Beautiful Scotland campaigns. <u>Beautiful Scotland Results 2019</u>

It's Your Neighbourhood Souvenir Brochure 2019

Celebrate-Aberdeen-in-Bloom Facebook

#### **Clean Up Aberdeen**

Clean Up Aberdeen is part of Keep Scotland Beautiful's national mass-engagement campaign Clean Up Scotland. Clean Up Scotland aims to involve one million people in action against litter and mess.

It is a national coalition of organisations and people from all places and backgrounds who want Scotland to shine and work towards making Scotland the cleanest country in Europe.

The campaign is working to change long-term behaviour by making dropping litter as socially unacceptable as drink driving is today. Aberdeen City Council is fully committed to supporting both the local and national campaigns with our Environmental Services team leading the campaign.

The Clean Up Aberdeen Facebook page is a great success. With more than 600 followers, it connects those in the community who want to come together to keep the city clean. It focuses on the positives of clean ups and the great work that local people do.

#### **Keep Scotland Beautiful**

Environmental Services staff work closely with Keep Scotland Beautiful staff and volunteers on a number of programmes including Clean up Aberdeen, Beautiful Scotland Awards, Beach Awards and Green Flag Awards.

The City has been successful in achieving a Beach Award for many years along Green Flag status for Duthie Park, Hazlehead Park, Seaton Park, Johnston Gardens, Victoria Park with successes in the Beautiful Scotland Awards winning the City award and Royal Caledonian Horticultural Society Award in 2019.

Some staff also volunteer as judges for Green Flag Awards and Beautiful Scotland Awards.

#### **Aberdeen Communities Together (ACT)**

Aberdeen Communities Together (ACT) is an initiative, devised and led by the Council's Environmental Services. It is a partnership of thousands of inspirational people, of all ages and backgrounds, who work together for the benefit of Aberdeen's green spaces.

Everyone is involved in a wide range of innovative, award-winning projects, including fund raising, tree planting, gardening, litter picking, food growing, beach cleans, bulb planting, path repairs, campaigning to name but a few.

ACT brings people together and makes Aberdeen a better place. ACT works with around 150 different community groups across the city.

These successful community led groups continue to grow and include Friends groups, schools, community councils and businesses.

Each group is contributing something towards the management of their local greenspace.

ACT is a multiple award-winning initiative for its campaigns such as In Bloom and Clean Up Aberdeen.

#### Craster

Craster is a project which works closely with primary and early learning school children to teach the value and benefit of green space through the growing of fruit and vegetables.

The teaching element includes school visits but the key to the success of the project is the use of digital technology including animations and live action (green screen).

Schools have embraced the project with over 4000 school children having taken part since the project began in early 2019.

#### **The Council Gardener**

Staff are being encouraged to lead by example and create opportunity and change for themselves. This is exactly what Daniel Shand, The Council Gardener has done.

He has grabbed the opportunity to create a digital platform that can be easily shared.

The Vlog is used as a promotional tool to showcase all the fantastic parks and green spaces in Aberdeen but is also used as a teaching and mentoring aid.

Daniel and his colleague Norman Adams, Audio-Visual Content Officer, write the scripts and film and edit every Vlog themselves. With every Vlog the audience grows! The Council Gardener Vlog is now beginning its second year, and everyone is excited about its possibilities and where it will go next.

#### Workforce skills and training

#### **Green Champions**

A programme for creating Green Champions (sustainability ambassadors) is currently in development with the aim to reduce Aberdeen's carbon emissions by 30% by 2021 (in line with the Aberdeen City LOIP), with proposed revised improvement project aim of 5% carbon emissions reduction by 2023.

Utilising the public sector workforce to promote, encourage and engage low carbon living and working initiatives, the Green Champions scheme is a volunteer led staff scheme that can identify areas of improvement, drive change towards sustainable and resource efficient behaviour and opportunities that can have the potential for long-term cost and carbon efficiencies.

Green Champions can help to instigate change, provide education, and create a platform for a sustainable culture and practice through engagement, enthusiasm, passion, and motivation.

Phase 1 (Green Pioneers) will be recruited/invited to develop the roles of Green Champions and plan, develop, test, and implement carbon reducing actions.

Phase 1 is to kick off the last quarter of 2020 with the aim to implement actions in early 2021.

#### **Teacher upskilling**

In addition to work with students of all ages, pre-school to adult, the Countryside Ranger Service has developed a locally accredited training programme for teachers in the safe use of fire with young people.

This was developed in collaboration with staff from the Council's Education Service and external facilitators.

The course develops the teacher's skills and confidence to use tealight lanterns, storm kettles and fires in a fire bowl with their students in a safe, sustainable and 'leave no trace' manner as part of their routine outdoor learning to connect their students closer to nature through outdoor learning.

A close collaboration with the Early Years Team and the Countryside Ranger Service has seen the continual growth in early years settings taking some, or all of, their sessions outdoors using local greenspaces on a regular basis.

This started off with a pilot project called Wee Green Spaces which proved popular and successful.

Now there is a network of over 50 early years practitioners across the city who share ideas and successes on a regular basis and support each other in taking more learning outdoors.

A training course for early years practitioners is also being delivered to enable and empower them to undertake simple, low impact site maintenance and habitat management to support their outdoor learning through the Wee Green Spaces project. Further training courses are under development.

#### Sustainable Urban Drainage Systems (SuDS) training

In April and May 2019, two events took place to raise awareness of the function and benefits of SuDS. In April, Council staff from Roads, Flooding, Environmental Policy, Masterplanning, Local Development Plan and Development Management teams along with staff from Angus Council attended a training workshop with speakers from Scottish Environment Protection Agency (SEPA) and NatureScot covering SuDS, natural flood management and environmental enhancements.

The workshop also covered the topic of what can be achieved in those areas through integrated design and joint-working. The first part of the event consisted of presentations on SuDS and flood management. The second part of the event was a workshop based on Cordyce School which is a current bid site for the proposed LDP.

In facilitated groups, the site constraints and opportunities, required surveys and assessments were identified as well as which teams that should be involved in a future planning consultation.

Any potential issues that need to be addressed early such as factoring of SuDS maintenance and the extend and quality of submitted surveys, were also highlighted.

In May, a site visit with participants from both the City and Aberdeenshire Council to the large development at Countesswells was undertaken to see some of the design and environmental enhancements of SuDS in practice.

#### **Development Management training**

In April 2019, the Environmental Policy team hosted a training event by Scottish Badgers on badgers and development. This workshop was attended by Environmental Policy, Masterplanning, Local Development Plan and Development Management teams and aimed to enhance the awareness of badgers, their biology and the impact from development.

In June 2019, to tie in with the introduction of templates and new guidance being produced for internal use (see further details under section 3: Mainstreaming biodiversity), a multi-departmental training session was held covering Habitat Regulations Appraisal and Appropriate Assessment with a specialist trainer from NatureScot.

In March 2020 the six-monthly cross agency working group meeting for NatureScot and SEPA planners with City and Aberdeenshire Environmental Planning/ Development Management/ Local Development Plan/ Masterplanning teams was hosted by Aberdeen City Council Environmental Policy team at Marischal College.



Sustainable urban drainage (SuDS) can be a multi-functional way to deal with surface water run-off. This SuDS at the RGU campus serves to remove surface water from their car park and is home to 3 species of amphibian and at least 5 species of damselfly, one of which is rare. Its planted edge provides habitat for pollinators and the reeds provide shelter for water fowl. Photo credit: Lina-Elvira Back

#### **SECTION 6: RESEARCH AND MONITORING**

#### **Review of Tree Preservation Orders**

Aberdeen City Council is currently in the process of reviewing the City's 259 Tree Preservation Orders to ensure they are legally robust and enforceable. Trees sustain and enhance urban biodiversity and help reduce biodiversity loss. The trees and woodland protected by TPO's amounts to a total of 270 hectares with many of the areas linked or situated close by to each other. This valuable, protected natural resource makes a significant contribution to biodiversity and habitat connectivity.

#### **Sea Mammal Research Unit University of St Andrews**

The Sea Mammal Research Unit has been studying the movements of the harbour seals that haul out at Donmouth Local Nature Reserve. This has involved tagging some individuals to track their movements and identifying individuals by their facial colour patterns from photographs. The Council's Countryside Rangers have helped by providing photographs and assisting with access requirements for the team.

#### Input to Buglife B-lines project

The Council have been working with Buglife and other partner organisations to identify good, connected pollinator habitat across the NE of Scotland to link into the UK wide B-Lines Project. In Aberdeen these have focussed mainly along the River Dee and Don corridors. Once agreed, these 3km corridors will be highlighted as areas where additional work to improve the pollinator habitats could be focussed and recognised in any planning decisions for future developments.

#### Involvement with higher education research

The Council assists the local higher education institutions with BSc/MSc/PhD studies, student placements and other collaborative work. In the reporting period, some MSc projects our staff has assisted with which centred on biodiversity and related topics are detailed below.

#### **MSc project: Biodiversity Net Gain assessment**

One of our Environmental Planners assisted a student from University of Aberdeen during January-July 2019 with her MSc project on "Implementation of Biodiversity Net Gain (BNG) policies in the North East of Scotland".

The project compared two local projects and extrapolated a baseline from data available from planning applications and calculated the proposed biodiversity gain/loss using the recognised DEFRA metric 2.0.

The findings showed that to improve biodiversity during the development process it is beneficial to view the natural resources on site as a material asset. Using BNG methodology, the magnitude and importance of the losses can be conveyed to stakeholders in a quantitative and transparent way and its management and conservation can have a more positive outcome.

### **MSc project: Community food-growing and allotments in Aberdeen**

One of our Sustainability officers co-supervised a University of Aberdeen student from April- September 2020. His MSc Environmental Partnerships dissertation was titled "Are the environmental risks and opportunities posed by community food-growing and allotments in Aberdeen being addressed to maximise sustainability?"

He used a questionnaire aimed at allotment-holders and community gardeners to capture their level of awareness and what actions they are currently taking to protect and enhance biodiversity. The report's conclusions were used to create a 2020 baseline for the Granite City Growing implementation plan by measuring 'the number of known community food-growing spaces including environmental considerations in their site design and management'. It is an intention to repeat the questionnaire before the refresh of the food-growing strategy to measure progress and shape future actions.

### MSC Project: Quantifying mapping and analysing ecosystem services distribution

One of our Environmental Planners oversaw a study conducted by a MSc student at Aberdeen University as a part of a MSc dissertation on "Quantifying Mapping and analysing ecosystem services distribution in relation to population and the role in climate change adaptation and future urban developments". The outcome of the study highlighted the need to promote biodiversity. This study will help to inform the updated Open Space Strategy scheduled for 2021.

What follow-up actions or monitoring have you undertaken to assess the impacts of the actions you have taken? How have you measured this? If you do not carry out any monitoring activities, please explain why.

#### **Monitoring of Tree Preservation Orders**

The Councils TPO's will be continually monitored and reviewed as part of a rolling program to ensure they continue to make a significant contribution to biodiversity; replacement planting will generally be required if trees are removed.

#### Monitoring and use of biological records

The Council is an active contributor to the North East Scotland Biological Records Centre as a member of its Advisory Group and contributing biological records. The Countryside Ranger Service submits biological records from casual observations from site visits etc.



These contribute to a database of over 1.5 million records for the NE of Scotland which are used to inform planning decisions, site management plans and strategic plans as well as demonstrating the value of local greenspaces.

Does your monitoring show any significant trends or highlight any areas of concern?

Have you added any data collected to the National Biodiversity Network or your Local Records Centre?

Yes, all records which go to our partnership NESBReC from our Countryside Rangers service go on to NBN. Our Countryside Rangers Service contribute records to NESBReC on an annual basis.

#### **Saving Scotland's Red Squirrels**

Aberdeen City Council has been collaborating with the Saving Scotland's Red Squirrels project for 11 years to bring one of Scotland's iconic species, the red squirrel, back to Aberdeen with the **Saving Scotland's Red Squirrel "Return of the Red Squirrels** campaign.

It provides a good example of how local biological records can show that a partnership is bearing fruit; records show an increase in red squirrel sightings increase from the last reporting period to this one; 362 records in 2016 to 520 records in 2019.



The Red Squirrel has successfully returned to the City through the 'Saving Scotland's Red Squirrel' project. Photo credit: Ian Talboys

### SECTION 7: BIODIVERSITY HIGHLIGHTS AND CHALLENGES

The report showcases so many good bits of work achieved through the reporting period, such as the Den of Maidencraig flood alleviation project (page x), the great outreach work by the Council's Countryside Ranger service and the higher level policy work such as the proposed new local development plan, our climate change route map and the open space audit, but we felt we would like to detail a few stand-out pieces achieved through this reporting period.

Aberdeen City Council was honoured to receive the *RSPB Nature of Scotland Award for 2020* in the Nature and Climate Action Category. The nomination was called "Working Wetlands, Working with Wildlife and Nature". It was relating to the work over the last five years or so developing wetlands and restoring watercourses to help manage surface water sustainably and reduce flood risks at St Fitticks Park and Seaton Wetland, both of which were featured in our 2017 Biodiversity Duty report, and Den of Maidencraig, which is our case study featured in this report on page x. Our partnership project with Saving Scotland's Red Squirrel was shortlisted for the Forest and Woodland award. The award was announced at an online ceremony hosted by presenters Steve Backshall and Fuan McIlwraith on 25 November 2020.

#### **CASE STUDIES**

#### **CASE STUDY 1:**

### DEN OF MAIDENCRAIG FLOOD ALLEVIATION PROJECT 2018-2020

#### Actions to protect biodiversity and connect people with nature

The Maidencraig Flood Alleviation project has been developed to address flooding issues in the City centre where the Denburn is largely culverted with short open sections. Where it is above ground the culverts are prone to being overwhelmed at times of high rainfall causing significant flooding of property and roads.

#### Phase 1

The first phase of the project sought to prevent flooding downstream of the Den of Maidencraig Local Nature Reserve and control flows in the Denburn corridor by creating additional water storage. In 2018 a low bund was constructed across the flood plain at Maidencraig to expand the area available for flooding whilst still protecting the neighbouring properties. This bund has a dual purpose in that it also has created a new "safe route to school" for the new housing developments in the area. Work in phase 1 included;

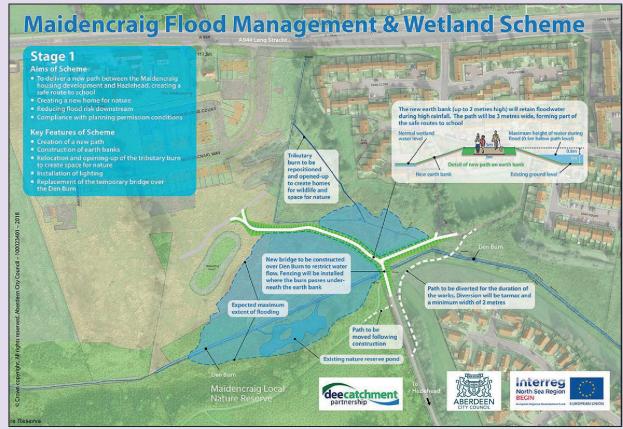
- The replacement of the existing temporary footbridge over the Denburn with a piped culvert construction of an earth bund including culverts,
- Diversion via a new open channel of a tributary to the Denburn including formation of a new lined cascade,
- Creation of a joint footpath/cycleway including edging, paving, vehicle barriers, fencing and street lighting in line with safe routes to schools.

#### Phase 2

The second phase worked to improve the amenity of the Denburn valley by providing improved travel links between schools (Hazlehead Academy, Fernielea School and Hazlehead School), between community areas (Summerhill, Hazlehead and Sheddocksley), to Woodend General Hospital off the public highway, to the Den of Maidencraig Local Nature Reserve and to the site as a greenspace itself. The core paths of the nature reserve were upgraded with improved drainage. Work in Phase 2 included:

- Access improvements to paths,
- Interpretation panels, waymarkers and sign posts,
- Ecological enhancements such as a sand martin nesting wall, a cascade channel from a de-culverted tributary, a new wetland wildflower area and a pond dipping platform for outdoor education purposes.

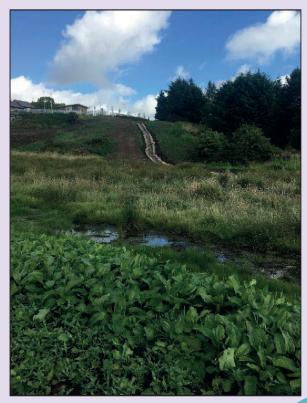
**Construction costs approx. £630k** This project was jointly funded by SUSTRANS, BEGIN and developer contributions.











#### **CASE STUDIES**

#### **CASE STUDY 2:**

### New Schools Programme: Outdoor play and learning for new schools

#### **Mainstreaming biodiversity**

Our New Schools Programme has presented us an opportunity to rethink how we design and create outdoor play and learning spaces to ensure we focus on natural and sustainable elements for play and learning.

Our landscaping brief has evolved from delivering large play equipment and artificial surfacing in the past, to a complete focus on natural play items and a landscape that enhances biodiversity and sustainability to support our pupils learning and play time.

Our new school landscaping designs seeks to support and enhance developing physical skills, creative thinking, improving behaviour and social skills and provides Teacher free learning.

These evolving designs create a sustainable platform which engenders a culture of awareness around biodiversity and climate change from a very early age.

Our landscape plans focus on the inclusion of sensory gardens, planting, growing opportunities, orchard planting and wildflower meadows all of which helps contribute to the importance of sustainability.

The new replacement Riverbank School is to provide an early learning setting and primary school provision for up to 750 pupils. Due to the size of the accommodation to be provided, the building will be split over two levels.

This means the building has a smaller footprint on the ground and allows for an increase of outdoor space to accommodate the role.

The site benefits from many mature trees, a lot of which will be retained. The main playground has several sensory areas, pathways and options for the children to explore. More trees are proposed in strategic positions across the site.

There are large sections of wildflower meadow seeding, ornamental and structural planting. Earth mounding is proposed to encourage climbing and help with the development of motor skills. Some of these mounds will have slides built into the natural environment.

Where there may be high activity on grassed areas, we have asked for these to be reinforced, so that the grass has a chance undergo natural development. Large boulders for playing, climbing and sitting along with sand pits to provide a range of activities within the grounds.

Orchard trees are to be provided around the all-weather pitch. Hardstanding areas are proposed to allow for running and cycling, and a stretch of this is dedicated to sprinting.

Other areas will have natural play mulch where children can engage in imaginative play. The early years garden is located on the roof of one of the teaching wings.

As the early year's playrooms are located on the upper ground floor level, this is the best way to provide free flow access to the outdoors.

We have also identified an area of the roof which can be turned into a dedicated growing opportunity. This can be accessed by all pupils and there is scope to include a glasshouse (as it is on the roof and difficult to be vandalised out with school hours).

Stoneywood School was replaced in 2018 and relocated on the former Bankhead Academy site. We had the benefit of acquiring an established, mature wooded area to incorporate as part of the playground.

The existing woodland trees and woodland floor was retained. A woodland walk was created within the woodland area and included bark chip sections, trim trail stepping logs, timber clatter bridges and a living willow dome.

The children love this natural environment for play and exploration, but it is also used as an outdoor classroom to study the natural habitats so close to them.



#### **CASE STUDIES**

#### **CASE STUDY 3:**

**Granite City Growing: Aberdeen Growing Food Together** 

Autumn 2017-February 2020

#### **Mainstreaming biodiversity**

The Community Empowerment (Scotland) Act 2015 gave local authorities the duty to prepare a food-growing strategy for their areas. Granite City Growing was approved at committee in February 2020. Key stakeholders were brought together initially in workshops with the help of Greenspace Scotland, who went on to develop a learning note to help inform the food-growing strategy process in other local authorities. With the ambition to create a city-wide strategy, a cross disciplinary approach was adopted throughout, bringing together internal colleagues and external stakeholders with skills and knowledge in, for example, contaminated land, biodiversity, allotments, community engagement, planning, asset transfer and food-growing.

Development of the strategy assimilated the learning from: two online surveys (which had response rates of 394 and 870 people respectively) and a city-wide consultation process; a Strategic Environmental Assessment and Habitats Regulations Appraisal screening; and a Community Food Growing programme which has funded 26 projects to date, including school gardens, educational materials, supply of waterbutts, city bee project, raised beds in sheltered housing, mini allotment plots, edible walls and community growing spaces.

The biodiversity value of food-growing spaces is expressed throughout Granite City Growing, Aberdeen's food-growing strategy. Outcome two is to 'increase biodiversity, contribute to a Low Carbon Scotland, encourage climate change adaptation and mitigation (through changed behaviours) and improve the condition and carbon retention in the soil'. The supporting objective is to 'Embed the requirement to increase biodiversity and climate change adaptation and mitigation within growing spaces through the choice of plants, heritage varieties, site design and management'. A baseline has been captured for 2020 and progress will be measured by expressing the number of known community food-growing spaces including environmental considerations in their site design and management.

The next stage will be delivery of an implementation plan. Key delivery partners are the Operations, Environmental Policy and Community teams within Aberdeen City Council in partnership with Community Planning partners, educational establishments, CFINE, community councils and wider community stakeholders.

The evolving Granite City Growing Implementation Plan includes actions to:

- Add foraging opportunities to ACC parks and gardens where appropriate
- Encourage developers through the planning process to include biodiversity gain and climate adaptation aspects of food-growing and foraging opportunities within their plans
- Improve information, advice and support regarding foodgrowing enquiries to include contaminated land advice and biodiversity advice at an early stage in the identification of sites and projects

 Create and signpost allotment holders and community gardeners to best practice to maximise the environmental and social benefits of food-growing

The current local Allotment Regulations also support biodiversity by setting out that:

- Invasive non-native plant species are not allowed to be grown and if found, will require to be controlled by the Tenant.
- The Council encourages Tenants to improve biodiversity within their Allotment Plot.
- The Council encourages Tenants to follow organic gardening methods. Tenants shall be responsible for ensuring that appropriate pest and disease control is carried out on their Allotment Plot. If Tenants choose to use pesticides or herbicides, then they should use products which avoid impacts to health and wildlife. Tenants must adhere to the manufacturer's product label if using pesticides or herbicides. Spraying equipment and products must be stored in an enclosed locked unit and must not be left unattended when not in the locked unit.











### Looking ahead, what do you think will be the main challenges over the next three years?

#### **Enhanced partnership working**

Within Aberdeen, the competing pressures on space for people and nature will continue. Encouraging and supporting enhanced partnership working to explore, define and deliver new cross-cutting approaches and actions, such as natural flood management, across the public, private and third sector will likely be part of a successful way forward. A strong partnership approach can also help to alleviate some of the human and economic resource pressures associated with the scale of the challenges faced. Education is also key to delivering change. Engaging and inspiring the public and partners through citizen science, projects and events to support lifestyle changes in the individual will become more important to ensure that sustainable changes are achieved. Additional resources from government and partners could help to support stronger partnerships to ensure that crosscutting actions can be delivered on a wider scale.

#### Climate change and natural flood management (NFM)

Climate change is a key driver of biodiversity loss. Flooding is a particular problem within the Council area and set to become an even bigger issue with climate change. The Council and its partners have actively been working to come up with nature-based solutions to alleviate flooding whilst at the same time add benefits for biodiversity, climate change adaptation and mitigation. These solutions also carry benefits for people's health and wellbeing.

However, these require large capital inputs. Therefore, in addition to enhanced partnership working, continued and additional human and financial resources from governments and other partners for NFM solutions are required to ensure we can continue to deliver more good work, bringing further projects with multi-benefits to fruition.

#### **Leadership for change**

The uncertainty surrounding Brexit/post Covid-19 recovery, with potential new legislation arising, will need strong leadership from national governments to ensure favourable outcomes for biodiversity in the long-term. Whilst it is not likely much will change in terms of protected sites and species in the short-term, natural areas which are not protected should be regarded the same way as protected areas in policy and law. These areas are often local and small, but their contribution to local biodiversity, health and wellbeing of local people and role in local climate change adaptation and mitigation is crucial. Strong leadership at national level will support and create capability for the current environmental non-governmental bodies so that they in turn can support the policies, partnerships and land manager and those with an interest in land. Stronger national policies on monitoring outcomes in land use planning is also required.

#### **Biodiversity Net Gain – Resourcing and Monitoring**

A lot of benefit can be delivered through the land use planning process, and support for biodiversity net gain within the Scottish planning system could deliver benefits above and beyond the current enhancements and protection mechanisms.

Hand in hand with net gain, there also needs to be increased support at national level for monitoring of environmental outcomes; this may include introducing a new organisation for monitoring for example development mitigation and enhancement to ensure there is evidence of successful outcomes or enhanced support for existing NGOs to undertake this type of monitoring.

#### Opportunities for change at a local level

The Aberdeen Local Outcome Improvement Plan (LOIP) framework governs everything that the Council is doing, but it has no specific objectives for protecting or enhancing biodiversity built in. Now is the time for incorporating changes to this framework to improve local outcomes for biodiversity. There is also an opportunity for the Council, its partners and private organisations to implement policy and operational change to meet the biodiversity and climate change challenge.

#### **Invasive Non-Native Species Control**

Managing invasive non-native species (INNS) will become increasingly important. Protecting spaces for native species from INNS can vastly improve the outcome for local biodiversity but requires considerable resources to do so. Partnership working has proven effective in the Council area.



Caption: Aberdeen City Council was honoured to receive the RSPB Nature of Scotland Award for 2020 in the Nature and Climate Action Category. The nomination was called "Working Wetlands, Working with Wildlife and Nature". *Photo credit: lan Talboys* 

