SECTION 1 - PROFILE OF REPORTING BODY

1a Name of Reporting Body

Aberdeen City Council

• 1b Type of body

Local Government

• 1c Highest number of full-time equivalent staff in the body during the report year.

7310.99 (782.22 Temporary and 6528.77 Permanent)

1d Metrics used by the body.

Drop down options aren't relevant, so nothing noted.

1e Overall budget of the body (£).

457,650,000. These are net figures. - Budget comments – This is the opening position. Note this question will not allow using any symbols e.g. £

If Specify the report year type.

Financial (1st of April 2017 to 31st of March 2018) Reporting year 2017/18

• 1g Provide a summary of the body's nature and functions that are relevant to climate change reporting.

Aberdeen City Council has a strong role to play as follows:

- Leading and acting as an example to others through its services, planning and decision making.
- Reducing emissions from its own estate and services within its influence including buildings, transport, land use and waste.
- Managing risks and building resilience through the development of an Aberdeen Adapts Framework.
- Promoting city wide emission reduction through our Sustainable Energy Action Plan Powering Aberdeen.
- o Helping to shape and inform legislation through consultation responses.
- Alleviating fuel poverty through ACC owned properties and working with the private/third sectors to improve standards in those areas.
- Ensuring compliance with building standards and influencing the planning process to take into consideration climate change mitigation and adaptation measures.
- Through the school systems and lifelong learning educate the citizen about the implications of climate change and principles of sustainability.
- Deliver projects that help mitigate/adapt to a changing climate and fulfil multiple plans, policies and strategies; e.g. wetland development, sustainable urban drainage, expansion of the EV network, energy efficiency retrofitting, renewables etc.
- o Piloting the development of blue/green infrastructure.
- Procuring sustainably.
- o Partnership working.

SECTION 2 - GOVERNANCE, MANAGEMENT AND STRATEGY

2a - How is climate change governed in the body?

- Aberdeen City Council's structure during the reporting period 2017 to 2018 was based upon four directorates, as
 per below. These are managed by a corporate management team with overall responsibility resting with the
 Chief Executive. Please see the corporate management diagram attached.
 - 1) Communities, Housing and Infrastructure
 - 2) Corporate Governance
 - 3) Education and Children's Services
 - 4) Aberdeen City Health and Social Care Partnership

All directorates have a part to play in considering climate change through their decision making and operations in line with corporate policy and risk management. Progress on any plans, policies and strategies is reported through the committee reporting structures predominantly to:

- 1) Finance, Policy and Resources
- 2) Communities, Housing and Infrastructure, and
- 3) Full Council.

There is no specific group that oversees responsibility for climate change. Please refer to the diagram attached that illustrates internal and external parties involved with climate change. Most activity is undertaken through topic areas e.g. transport, waste, energy etc. and then reported independently through their own reporting structures; most of these sit within Communities, Housing and Infrastructure. The only consolidated report that is produced is this. Some information is provided annually through statutory performance indicators. Information on these is available here

https://www.aberdeencity.gov.uk/services/strategy-performance-and-statistics/council-performance/statutory-performance-indicators

It is important to note that Aberdeen City Council is currently undergoing a Transformation Programme which will result in a change in the Organisational Structure. The new organisational structure is expected to be fully functional by March 2019¹ and will likely be reported on in the next submission.

Link to ACC structure diagram in separate pdf.

2b - How is climate change action managed and embedded by the body?

The Environmental Policy Team, in Planning and Sustainable Development, has a specific remit for climate change and plays a role in advising upon mitigation and adaptation measures and promoting that these measures are embedded into both corporate and city-wide plans, policies and strategies.

The team coordinated the Carbon Management Plan, until work ceased on this activity to concentrate on wider emissions in the form of a Sustainable Energy Action Plan (SEAP). Powering Aberdeen: Aberdeen's SEAP was approved in May 2016 by Full Council. It contains information on baseline emissions for the entire city, reduction targets and details actions setting out how the reductions will be achieved. Powering Aberdeen encapsulates the Council's own corporate responsibility in emission reduction. Such responsibility is spread across relevant council services, as indicated in the diagram within the previous answer.

Corporate Landlord oversee building conditions and undertake surveys, working closely with the Energy Management Team and Building Services/Maintenance to bring buildings up to standard and perform better in

¹ https://transformationzoneblog.com/transformation-and-target-operating-model/

relation to energy efficiency. They also are obliged to comply with the corporate Buildings Performance Policy. This work is done on an ongoing basis.

The Energy Management Team is responsible for overseeing collation of the data behind the 'Carbon Reduction Commitment' and report on this externally on an annual basis. They are also partially responsible for energy efficiency measures across corporate assets.

Internal waste is managed by many with responsibilities spread among various service areas as set out in the Internal Waste Minimisation policy.

- The Trade Waste Team, sitting in Public Infrastructure and Environment, are responsible for the collection of waste and recycling containers from most corporate buildings.
- Facilities, sitting within Properties and Assets, are responsible for the implementation and provision of the waste and recycling services from main office buildings.
- The IT Help-desk and Transformation Team, sitting within Corporate Governance, are responsible for the collection/liaison with external companies for the reuse and recycling of Waste Electronic and Electric Equipment (WEEE).
- Members of the Environmental Policy Team have been responsible for the development and reporting of the Internal Waste Minimisation policy, though aren't responsible for implementation.

The Local Development Plan Team is responsible for providing the strategic direction for city development, including incorporation of sustainability principles into strategic plans and supplementary guidance. The Local Development Plan is reviewed on a five yearly cycle and is reported to the Communities, Housing and Infrastructure Committee.

Many corporate plans, policies and strategies undergo Strategic Environmental Assessment to assess their environmental impact, this includes addressing climate change. Climate change considerations are featured within a risk register, service plans, business cases and development management consultations.

Activities to develop a Flood Risk Management Plan are done in partnership, to meet the Flood Risk Management (Scotland) Act 2009.

Work is ongoing to further embed sustainability across organisation decision making, processes and training. Some examples of how sustainability has been incorporated are illustrated below:

- a) Environmental considerations are included in business case templates to assess if projects contribute to a reduction in emissions, build resilience to climate change, deliver resource efficiency and reduce impacts on the environment.
- b) Environmental considerations incorporated into the committee reporting structure and accompanying guidance document.
- c) A range of environmental indicators have been developed with the aim to improve management of environmental information and performance reporting.
- d) Environmental considerations incorporated within planning consultation responses, with regular cross service meetings with Development Management.
- e) Embedding sustainability into emerging city development in preparation for the next Aberdeen Local Development Plan.
- f) Think GREAT Pit Stop development which is training to encourage sustainability principles within decision making.
- g) Awareness raising stalls relating to sustainability at the new managers induction, new members induction and the CHI conference.

h) Development of a Building Performance Policy for corporate assets. This sets standards for sustainable construction, digital connectivity and future proofing for district heating connectivity.

Link to diagram in separate word document.

2c - Does the body have specific climate change mitigation and adaptation objectives in its corporate plan or similar document?

Wording of objective	Name of document	Weblink
Themes, priorities and drivers:	Local Outcome	http://communityplanninga
- Prosperous Economy	Improvement Plan	berdeen.org.uk/wp-
Prosperous People	(LOIP) 2016-2026.	content/uploads/2016/08/F
- Prosperous Place	(Page 12)	NAL-LOIP-22-AUG-16.pdf
- Enabling Technology	LOIP replaces the	
	single outcome	and
	agreement	
		https://communityplanning
	Works towards this	berdeen.org.uk/wp-
	can be noted in the	content/uploads/2016/05/A
	"Aberdeen City -	berdeen-CPP-Strategic-
	Strategic Assessment	Assessment-2016.pdf
	2016" (page 22)	
- We will design and construct all new infrastructures to be energy efficient by	Strategic Business	https://aberdeencity.gov.uk
maximising the use of low carbon technology and materials. We will use	Plan Refresh	sites/default/files/2018-
recycled materials where possible.	2017/2018.	06/Strategic%20Business%2
We will increase energy efficiency and introduce carbon reduction measures in		OPlan%20Refresh%202017-
our processes and our housing and non-housing assets to reduce our carbon		<u>18.pdf</u>
footprint, save money and to bring people out of fuel poverty.		
- To provide and promote a sustainable transport system which reduces our		
carbon emissions.		
- We will manage waste effectively and in line with UK and European legislative		
requirements by maximising recycling and reducing waste to landfill, thereby		
reducing our costs and carbon footprint.		
- We will provide a clean, safe and attractive street-scape and promote		
biodiversity and nature conservation.		
- We will encourage wider access to green space in our streets, parks and		
countryside.		
-Aberdeen City Council will model the standards expected from all public service	Stronger Together:	Only available on the
providers for sustainable procurement.	Prosperity for	intranet
-We will work to improve outcomes and the life chances of our citizens by	Aberdeen 2017 -2022	
addressing a range of poverty indicators including income maximisation, child	(whole document)	
poverty, fuel poverty, food poverty, and housing and health inequalities.		
-We will continue to invest in green energy transport projects in order to realise		
our aspiration to become a world leading city for low carbon technology.		
-We will lobby the Scottish Government and Transport Scotland to work in		
partnership with us to allow Aberdeen City Council to introduce Low Emission		
Zones in Aberdeen		
-We will reduce fuel poverty across our most deprived communities through		
combined heat and power schemes including the Energy from Waste Plant		
el	A1 1 0:: 1	10.11
The main aims of the plan are to:	Aberdeen City and	http://www.aberdeencityar
- provide a strong framework for investment decisions which help to grow and	Shire Strategic	dshire-
diversify the regional economy, supported by promoting the need to use	Development Plan.	sdpa.gov.uk/AboutUs/Publi
resources more efficiently and effectively; and	March 2014	<u>ations.aspx</u>
take on the urgent challenges of sustainable development and climate change.	(currently under	
To support these main aims, the plan also aims to:	review)	
protect and improve our valued assets and resources, including the built and	(Page 6)	
natural environment and our cultural heritage;		
help create sustainable mixed communities, and the associated infrastructure,		
which meet the highest standards of urban and rural design and cater for the		
needs of the whole population; and		
- make the most efficient use of the transport network, reducing the need for		
people to travel and making sure that walking, cycling and public transport are		

Key goals and growth sectors.	Shaping Aberdeen -	https://committees.aberdee
	Strategic	ncity.gov.uk/documents/s33
	Infrastructure Plan.	119/Strategic%20Infrastruct
	Covers mitigation	ure%20Plan.pdf
	and adaptation.	<u></u>
	(Page 12)	
Objectives:	Powering Aberdeen –	https://www.aberdeencity.g
- Leadership and behaviour change.	Aberdeen's	ov.uk/sites/default/files/201
- Energy Efficiency.	Sustainable Energy	<u>7-</u>
- Resource Efficiency.	Action Plan (whole	09/Powering%20Aberdeen.p
- Increase the share of alternative technologies.	document)	<u>df</u>
- Low emission society.		
In a wider context we need to ensure we	Regional Economic	https://www.aberdeencity.g
mitigate against climate change emissions	Strategy 2015	ov.uk/sites/default/files/Reg
and adapt to impacts.	Page 22	ional Economic Strategy 0.
		<u>pdf</u>
The masterplan needs to ensure that the	City Centre	https://www.aberdeencity.g
energy sector is sustained and remains	Masterplan and	ov.uk/sites/default/files/201
at the core of Aberdeen's economy	Delivery Programme	<u>8-</u>
including the transition in coming years	Page 12	06/Aberdeen%20City%20Ce
to a low carbon economy, enabling skills		ntre%20Masterplan%20and
and knowledge in the oil and gas sector		%20Delivery%20Programme.
to transfer to the renewable energy.		<u>pdf</u>

2d - Does the body have a climate change plan or strategy?

Powering Aberdeen, the city's Sustainable Energy Action Plan was approved in May 2016. This SEAP details steps that can be taken to reduce emissions across the city, including those from corporate activities. Further information on Powering Aberdeen is available here:

• https://www.aberdeencity.gov.uk/services/environment/powering-aberdeen

Work is ongoing to develop an accompanying Adaptation Framework that can guide decision making processes over the long term and build city resilience. Further information on this is available here:

http://www.adaptationscotland.org.uk/get-involved/our-projects/aberdeen-adapts https://www.aberdeencity.gov.uk/services/environment/climate-change/adapting-climate-change

As highlighted within section 2e, there is a cross over with many plans, policies and strategies.

2e - Does the body have any plans or strategies covering the following areas that include climate change?

Topic area	Name of document	Link	Time period covered	Comments
Adaptation	Aberdeen Adapts	http://www.adaptationscotla nd.org.uk/get-involved/our- projects/aberdeen-adapts and https://www.aberdeencity.go v.uk/services/environment/cl imate-change/adapting- climate-change	Ongoing	Aberdeen Adapts, which is our future Adaptation Framework for the city is currently under development. A Strategic Environmental Assessment is currently being carried out.
Business travel				This is incorporated within the travel plan under four policy areas as opposed to a having a specific individual plan.
Staff travel	Council travel plan	This is only available via the intranet.	2001	Surveys have been conducted every 2 years since 2008. With the latest results available for 2016. The Council Travel Plan is due to be updated later in 2018.
Energy Efficiency	Aberdeen Local Housing Strategy (page 10)	This is only available via the intranet.	2012-2017	Outlines housing strategy approach to fuel poverty, energy efficiency and climate change. Increase energy efficiency and introduce carbon reduction measures in our processes and our housing and non-

				housing assets to reduce our carbon footprint, save money and to bring people out of fuel poverty. An updated version covering 2018 -2023 is currently being developed.
Fleet transport	Fleet Asset Management Plan	This is only available via the intranet.	2013	Emissions reduction and alternative fuels. The fleet replacement program continues. In 2017/2018 ACC had 27% of vehicles under 5 years of age. Fleet continue to add Hydrogen vehicles with the addition of and RCV and a Sweeper.
Information and Communicati on Technology	ICT Asset Management Plan	This is only available via the intranet.	2013	Redundant IT equipment is collected by the closest IT disposal company to reduce carbon footprint. All IT waste is disposed off within the WEEE regulations compliance with an audit report produced detailing how much was refurbished or recycled. IT support is done remotely as much as possible. Suppliers of IT equipment use more environmentally friendly packaging. Ongoing 'Recycle IT' in place.
Renewable energy	Alternative Energy Strategy for Council Owned Buildings (Section 1, page 3)	https://www.aberdeencity.go v.uk/sites/default/files/altern ative_energy_strategy.pdf		Reduce energy consumption and associated carbon emissions/enable low/zero carbon technologies. No update provided.
Sustainable / renewable heat	Alternative Energy Strategy for Council Owned Buildings (Section 1, page 3)	https://www.aberdeencity.go v.uk/sites/default/files/altern ative_energy_strategy.pdf		Reduce energy consumption and associated carbon emissions/enable low/zero carbon technologies. No update provided.
Waste Management	Internal Waste Minimisation Policy	This is only available via the intranet.	2013	Discusses internal waste in relation to the waste hierarchy. No update provided.
Water and sewerage	Not applicable			
Land Use	Local Development Plan 2017	https://www.aberdeencity.go v.uk/services/planning-and- building/local-development- plan/aberdeen-local- development-plan#1658	2017 and for the next 5 years, plus transition period to new Local Development Plan	Helps deliver sustainable communities. There is on-going work to produce an Aberdeen Landscape Study. Work is underway to produce an updated Local Development Plan.
Other – city wide emissions.	Powering Aberdeen	https://www.aberdeencity.go v.uk/services/environment/p owering-aberdeen	2016-2030	Covers city wide emissions and various themes. No update provided.
Other – nature conservation	Nature Conservation Strategy (page 4 and 15)	https://www.aberdeencity.go v.uk/sites/default/files/Natur e_Strategy_Dec2015_extend ed_0.pdf	Currently under review	Biodiversity, which touches upon aspects of climate change. Within the objectives of the strategy and also sections on sustainable development and climate change. There are many aspects to consider for truly sustainable development and climate change is one of them. A shift in species populations, ranges, migration patterns and reproductive behaviour are already evident both on land and at sea as a result of climate change.
Land Use	Open Space Strategy	https://www.aberdeencity.go v.uk/sites/default/files/open space_strategy_2011_2016. pdf	2011-2016. Ongoing open space audit which will feed into the review of the open space strategy.	Covers open space across the city, assists with climate adaptation. Recognise the economic, environmental and social value of open spaces. Maximise opportunities to mitigate and adapt to climate change and further biodiversity.
Other – sustainable construction	Building Performance Policy	https://committees.aberdeen city.gov.uk/documents/s6904 5/CHI.17.063%20Appendix%2 01%20NewBuildingsPerforma	2017 (to be reviewed on an annual basis)	The Buildings Performance Policy and accompanying guidance and checklist covers sustainable construction activity at a corporate level. Is not a plan or strategy

		ncePolicy.pdf		but an internal policy that sets building standards for refurbishments and new build projects. The policy states clearly an intention to deliver against energy performance, digital connectivity, future proofing for district heating and attaining certain BREEAM standards. Since its approval training has been provided across various Council staff to raise awareness of the implications of this new policy.
Other - various	Local Outcome Improvement Plan	https://communityplanninga berdeen.org.uk/aberdeen- city-local-outcome- improvement-plan-2016-26/	2016-2026	Themes, priorities and drivers: - Prosperous Economy - Prosperous People - Prosperous Place - Enabling Technology
Other – economy	Regional Economic Strategy (page 13)	https://www.aberdeencity.go v.uk/sites/default/files/Regio nal Economic Strategy 0.pdf		Covers many topic areas.
Other – economy	Aberdeen City Regional Deal - Powering Tomorrow's World. (Page 6)	https://www.gov.uk/govern ment/uploads/system/uploa ds/attachment data/file/498 891/Signed Heads of Terms January 2016.pdf		Theme 7 - Actively promote our offer and the transition to a low carbon economy.
Waste management	Aberdeen Waste Strategy. (Page 7- 8)	https://www.aberdeencity.go v.uk/sites/default/files/2018- 04/Aberdeen%20City%20Was te%20Strategy%202014- 2025.pdf	2014-2025	The ACWS has been designed to ensure Aberdeen works towards meeting national and international legislative targets: Target 1: Waste growth will be eliminated by 2015. Target 2: We will work towards the targets set in the Scottish Government's Zero Waste Plan 2010 Target 3: Introduce an organic waste collection for all households by 2016. Target 4: Develop facilities within the Aberdeen area to recover our resources. Target 5: No more than 5% of household waste should be landfilled by 2025.
Other – transport	Sustainable Urban Mobility Plan. (Page 1)	http://w12.aberdeencity.gov. uk/transport_streets/roads_p avements/transport_projects /txt_roa_sustainable_urban_ mobility_plan.asp		Varying transport options. Reduces air and noise pollution, greenhouse gas emissions and energy consumption; improves the efficiency and cost-effectiveness of the transportation of people and goods.
Land use	City Centre Masterplan and delivery programme. (Executive summary, page 9)	https://aberdeencitycentremasterplan.com/	June 2015	Technologically advanced and environmentally responsible. Providing the capacity, quality and reliability of infrastructure required by businesses and residents and utilising resources responsibly.
Other - hydrogen	Aberdeen City Region Hydrogen Strategy and Action Plan 2015- 2025 (Part 2, page 16)	http://archive.northsearegio n.eu/files/repository/201509 18111637 AberdeenHydroge nStrategy March2015.pdf	2015-2025	Hydrogen; to reinforce our place, now and in the future as the energy city by further enhancing the region's economic competitiveness, maximising the capacity and value of renewable energy and giving greater energy security by being at the forefront of a hydrogen economy. The aim of this strategy is to maintain and build on Aberdeen's expertise in hydrogen in order to achieve the long-term goals associated with hydrogen rollout and being the leading hub in Scotland. This strategy and action plan outlines how these aims can be achieved in the short, medium and long term. The action plan identifies a series of measures required to achieve this, across seven key objectives.
Other – air quality	Air Quality Action Plan. (Page 2)	https://www.aberdeencity.go v.uk/sites/default/files/air_q uality_action_plan_2011.pdf	2011	An annual Progress Report showing the most recent air quality monitoring information, new/proposed developments

				that may impact on air quality and progress in meeting the objectives of the Action Plan. The 2018 Progress Report is available from. https://www.aberdeencity.gov.uk/sites/default/files/2018-07/Air%20Quality%20Annual%20Progress%
Other – transport	Local Transport Strategy. (Page 5)	https://www.aberdeencity.go v.uk/sites/default/files/Local %20Transport%20Strategy%2 0%282016-2021%29.pdf	2016-2021	20Report%202018.pdf Varying transport options.

2f - What are the body's top 5 priorities for climate change governance, management and strategy for the year ahead?

In no specific order, the top 5 climate change priorities for the year ahead are:

- 1. Approve and begin to implement the Aberdeen Adapts Framework to help assess potential climate risks and identify adaptation measures.
- 2. Develop a Local Heat and Energy Efficiency Strategy Pilot to help shape Aberdeen's approach to tackling carbon emissions, fuel poverty and the Scottish Government's 'Scottish Energy Efficiency Programme'.
- 3. Ensure that the Council's procurement activities, in line with the Procurement Reform (Scotland) Act 2014, including Community Benefits, contribute to its vision of achieving a sustainable city.
- 4. Improve air quality and reduce per capita carbon emissions through the deployment of low carbon transport and active (e.g. cycling, walking etc.) networks.
- 5. Develop robust internal systems for monitoring and reporting of carbon emissions and other sustainability indicators.

2g - Has the body used the Climate Change Assessment Tool (a) or equivalent tool to self-assess its capability / performance?

The CCAT Tool was first used in March 2015 in preparation for the pilot reporting year 2014/2015 of the Public Bodies Climate Change Reporting Duties. This provided an assessment of Council progress with action on climate change, giving recommendations to improve performance. The CCAT gave an assessment score for 5 topic areas, for the Council. These were:

- Governance 36%
- Emissions 27%
- Adaptation 36%
- Behaviour 20%
- Procurement 19%
- Overall result 29%.

Comparison CCAT workshops were undertaken in November/December 2016. The results from this were as follows:

- -Governance 32%
- -Emissions 27%
- -Adaptation 75%
- -Behaviour 20%
- -Procurement 19%
- -Overall result 39%

No further CCAT workshops have been undertaken since then.

• 2h - Supporting information and best practice.

Reference should be made to the Powering Aberdeen literature review showing how this programme aligns to the multiple plans, policies, strategies and legislation applicable to Aberdeen City. The literature review was accurate in relation to dated documents/legislation at the time of compilation. Information is available here: https://www.aberdeencity.gov.uk/sites/default/files/2017-09/LiteratureReviewv3.pdf

Work is still being done by colleagues with the Council to take forward Adaptation. This is further detailed within section 4 of this submission. It should be noted that we've had active involvement within the Adaptation Learning Exchange co-ordinated through Adaptation Scotland and supported student placements within this field through direct collaboration with the University of Aberdeen. Further information is available here: https://www.adaptationscotland.org.uk/get-involved/our-projects/aberdeen-adapts
https://www.aberdeencity.gov.uk/services/environment/climate-change/adapting-climate-change

SECTION 3 – EMISSIONS, TARGETS AND PROJECTS

3a - Emissions from start of the year which the body uses as a baseline (for its carbon footprint) to the end of the report year.

Reference year	Year	Scope 1	Scope 2	Scope 3	Total	Units	Comments
Baseline carbon footprint	2014/2015	14953	26433	3607	44993	tCO₂e	The Baseline differs from the one presented at the Climate Change Report 14/15 (34,052.2 tCO2e) . Updates: - added Grid Electricity (transmissions and losses) for Estate/Assets/Buildings - added Grid Electricity (generation) and Grid Electricity (transmissions and losses) for street lighting as available - added Water - Treatment (95% of Water - Supply) - domestic, short-haul, long-haul flights and railway journey (National rail) moved from Scope 1 to Scope 3. Emission factors used: Defra/DECC 2014.
Year 1 carbon footprint	2015/2016	22020	21664	2687	46371	tCO₂e	Change in the building estate boundaries removing ALEO's (Sport Aberdeen, Aberdeen Performing Arts, Bon Accord Care) and removing householders/domestic properties as multistoreys. and housing estate. Fleet information available for year 1 and not available for baseline 2014/2015.
Year 2 carbon footprint	2016/2017	17704.90	18347.31	3173.58	39255	tCO₂e	Changes in estate and provision and accuracy of data account for the significant changes in relation to the total footprint.
Year 3 Carbon footprint	2017/2018	17867.11.	15767.82	2257.46	35892.39	tCO₂e	Changes in emission factors and provision and accuracy of data account for changes in relation to the total footprint. Biomass from wood chips has been included as a scope 1 emission source because it is not 100% renewable.

• 3b – Breakdown of emission sources.

Emission source	S c o p	Consump tion data	Unit s	Emissio n factors	Units	Emissions	Comments	Status
Average car – unknown fuel	3	1835610. 55	km	0.1824 2	kg CO₂e/k m	334.85	Essential and casual car users, using their own vehicles.	Completed
Average car – unknown fuel	3	311053.1 0	km	0.1824 2	kg CO₂e/k m	56.74	Car hire through corporate account. Use of various vehicles from Kia Ceed to BMW 52.	Completed
Car – petrol (average)	3	13626	km	0.1856 8	kg CO₂e/k m	2.53	Co-wheels car club information. All distance data is captured using telematics from Co-	Completed
Car- diesel (average – unknown engine size)	3	1931	km	0.1788 7	kg CO₂e/k m	0.35	wheels and itemised by each Council staff booking so is reliable. One vehicle didn't have working telematics for 4	Completed
Car – hybrid (medium)	3	5922	km	0.1179	kg CO₂e/k m	0.70	months so we looked at the average number of miles per booking for the 8 months we had data for and applied this to the number of bookings received by the vehicle for the missing months.	Completed
Grid electricity (transmission and distribution losses)	3	49496	kW h	0.3287	kg CO₂e/k Wh	1.63	For Grid electricity, we know that a Nissan leaf has a 24kWh battery which is good for 144km, meaning 1kWh = 6km. Electric vehicles travelled 53,248km so we divided this by 6 to get the kWh figure.	Completed
Grid Electricity (Gen)	2	49496	kW h	0.3515 6	kg CO₂e/k Wh	17.40	Car travel. SNN guidance states to include as two lines both for generation and transmission and distribution losses because the emissions from electricity are made up of those two parts.	
Rail (national rail)	3	437201	Pas sen ger km	0.0467 8	kg CO ₂ e/ passeng er km	20.45	Some information is provided here based upon data from an external contractor. This information is not an accurate reflection of rail usage. Procedures/processes to capture information from external contractor, staff expense claims and the corporate credit card system will need to be improved and updated to allow the easy retrieval of data in an appropriate format.	Completed
Short-haul flights (economy class)	3	94172.37	Pas sen ger km	0.1584 5	kg CO₂e/ passeng er km	14.92	All flights are economy class.	Completed
Long-haul flights (economy class)	3	62418.41	Pas sen ger km	0.1511 9	kg CO₂e/ passeng er km	9.44	All flights are economy class	Completed
Grid electricity (transmission and	3	1393939 5	kW h	0.0328 7	kg CO₂e/k Wh	458.19	Street lighting.	Completed

distribution losses)								
Grid electricity (gen)	2	1393939 5.00	kW h	0.3515 6	kg CO₂e/k Wh	4900.53	Street Lighting. SNN guidance states to include as two lines both for generation and transmission and distribution losses because the emissions from electricity are made up of those two parts.	Completed
Paper and board (mixed) recycling	3	185.77	Ton nes	21.8	kg CO₂e/to nne	4.05	Estimated weights of confidential paper collected for recycling through locked console system.	Completed
Organic food and drink composting	3	0.03	Ton nes	6.0	kg CO₂e/to nne	0.00	Food waste composting within the 3R schools, done through the contract of the school.	Completed
Organic food and drink composting	3	226	Ton nes	6.0	kg CO₂e/to nne	1.36	Food waste composting through Council premises.	Completed
Refuse Commercial and Industrial sent to landfill	3	426	Ton nes	100.1	kg CO₂e/to nne	42.64	Refuse collections through Council premises.	Completed
Glass recycling	3	31	Ton nes	21.8	kg CO₂e/to nne	0.68	Glass collections through Council premises.	Completed
Mixed recycling	3	343	Ton nes	21.8	kg CO₂e/to nne	7.48	Mixed recycling through Council premises.	Completed
Other	3	10	Kg	0	kg CO₂e	0	No emissions created as these WEEE items were reused by facilities and their contract	Competed
WEEE (mixed recycling)	3	16.23	Ton nes	21.8	kg CO₂e/to nne	0.35	WEEE waste recycled through IT services. Information obtained through reports from external contractors.	Completed
Other	3	6753.35	Kg	0	kg CO₂e	0	No emissions created as these WEEE items were reused by IT and their contractors. Information obtained through reports from external contractors.	Completed
Refuse Commercial and Industrial sent to Iandfill	3	0.12	Ton nes	100.1	kg CO₂e/to nne	0.01	Refuse to landfill through the 3R schools.	Completed
Other	3	0.04	Ton nes	218	kg CO₂e/to nne	0.97	Recycling through 3R schools.	Completed

Emission	Scop	Consump	Unit	Emissio	Units	Emissions	Comments	
source	е	tion data	S	n factors				
Natural gas	1	7380712 5	kW h	0.1841 6	kg CO₂e/k Wh	13592.32	Usage through corporate assets.	Completed
Gas oil	1	3394554	kW h	0.2763 1	kg CO₂e/k Wh	936.49	Usage through corporate assets.	Completed
Water Supply	3	281026	m³	0.344	kg CO₂e/m³	96.67	Usage through corporate assets.	Completed
Grid electricity (transmis sion and distributi on losses)	3	3086211	kW h	0.0328 7	kg CO₂e/k Wh	1014.44	Usage through corporate assets.	Completed
Grid electricity Gen	2	3086211	kW h	0.3515 6	kg CO₂e/k Wh	10849.88	Usage through corporate assets SNN guidance states to include as two lines both for generation and transmission and distribution losses because the emissions from electricity are made up of those two parts	Completed
Diesel (average biofuel blend)	1	1258345	Litr es	2.60	kg CO₂e/litr e	3271.90	Used within fleet services.	Completed
Petrol (average biofuel blend)	1	23647	Litr es	2.20	kg CO₂e/litr e	51.98	Used within fleet services.	Completed
Grid electricity (transmis sion and distributi on losses)	1	53210	km		kg CO₂e/k m	0	km driven in an electric vehicle. Used within fleet services. There would be no tailpipe emissions from this.	Completed
Other - hydrogen	Unk now n – outs ide of scop e	48389	km		kg CO₂e/k m	0	km driven in a hydrogen vehicle used within fleet services and those in Co-wheels. There would be no tailpipe emissions from this.	Completed
Biomass Chips	1	1135000 0	kW h	0.012	kg CO2e/k Wh	14.41	Wood-chip biomass boiler at Duthie Park.	Completed
					Total	35892.39		

3c - Generation, consumption and export of renewable energy

Technology	Renewabl	e electricity	Renewa	able heat	Comments
	Total consumed by the organisation (kWh)	Total exported (kWh)	Total consumed by the organisation (kWh)	Total exported (kWh)	
Solar PV	818965				Solar PV's installed
					on corporate assets
					through Rent a Roof
					scheme.
Biomass			11350000		Wood-chip biomass
					boiler at Duthie Park.
					This includes Duthie
					Park Winter Gardens
					941,000 kWh and
					estimated 89,480
					kWh for Duthie Park
					Depot.

• 3d – Targets

Name of target	Type of target	Target	Units	Boundary / scope of target	Progress against target	Year used as baseline	Baseline figure	Units of baseline	Target completion year	Comments
Waste minimisation - reuse, recycling and composting of corporate waste.	%	65	Total % reduction	Waste		2011/2012	23589	Tonnes	2018/2019	Internal Waste Minimisation Policy (2013). No resource assigned for dealing with this area of
Reduce waste to landfill from corporate buildings.	%	28		Waste		2011/2012	7771			work. Estimated - not actual weight data for most waste streams.
Energy	%	2	Annual % reduction	Energy use in buildings		2014/2015		kWh/m ³		Continue to reduce emissions by undertaking energy audits, on-going upgrade and maintenance of our non-domestic building stock and raising awareness campaigns of energy/carbon saving actions.
Enhanced recycling	%	56	Total % of recycled	Household waste	44% achieved in 2017			Tonnes		Recycled household waste by 2025.
Enhanced recycling	%	5	% sent to landfill	Household waste	26% achieved in 2017			Tonnes		No more than 5% household waste

• 3e - Estimated total annual carbon savings from all projects implemented by the body in the report year

Emissions source	Total estimated annual carbon savings (tCO₂e)	Comments
Electricity	0	818965kWh of energy generated from Renewable Energy from Solar Panel used by the building through a "Rent a Roof" Scheme.
Natural Gas	0	There will be natural gas savings arising from the use of wood chip biomass at Duthie Park, however this figure has not been provided for this reporting period.
Other heating fuels	0	Unknown. No information is collated upon this.
Waste	0	Unknown. No information is collated upon this.
Water and sewerage	0	Unknown. No information is collated upon this.
Business travel	0	Staff travel has been limited as part of a wider programme to reduce revenue costs. There has been an expansion of the pool car fleet to accommodate greater volume of electric and hydrogen vehicles, as well as utilisation of economy cars. Further measures have been taken to encourage smarter working arrangements to negate the need to travel.
Fleet transport	0	Unknown. No information is collated upon this.
Other		

• 3f - Detail the top 10 carbon reduction projects to be carried out by the body in the report year

(please note that this relates to corporate emissions and not city wide)

Project name	Funding source	First full year of CO₂e savings	Are these savings figures estimated or actual?	Capital cost (£)	Operational cost (£/annum)	Project lifetime (years)	Primary fuel / emission source saved	Estimated carbon savings per year (tCO ₂ e/annum)	Estimated cost savings (£/annum)	Behaviour change aspects including use of ISM	Comments
On-going replacement of high output with lower energy LED units as per maintenance and new lantern programme	Aberdeen City Council		Estimated				Grid electricity				From 2016-2023. Estimated 4,366 tCO2e over 7 years. Over one third of the city's street lighting stock has been converted to LED. Project expected to be completed end of 2019.
Implementation of energy efficiency measures on buildings on an on-going basis through the maintenance and upgrade programme.	Aberdeen City Council	2015/2016	Estimated				Other				There is an ongoing programme to reduce energy efficiency in public buildings by 2.5% per year. It is projected that the 2017/18 target of 2.5% reduction has been met.
On-going expansion of the use of hydrogen vehicles within our fleet.	HyTrEc Interreg IVB funding (European), private partners and Aberdeen City Council		Estimated				Other				10 hydrogen- fuelled vehicles currently in operation. Estimated carbon savings in 2017/18 was 460tCO2.
On-going expansion of the	Aberdeen City	2012	Estimated				Other				Currently, there are 40 fleet cars and 3

Co- Wheels car club network with more vehicles available, with greater diversity and range of low carbon vehicles available to staff.	Council, Transport Scotland, Cowheels Car Club						25 al' ve ve W ac Tr m 88 cc	ens consisting of 5 electric or ternatively fuelled chicles, 5 hybrid chicles and 1 /heelchair ccessible vehicle. the car-club tembership was 87 in 2017/18 tompared to 677 in 016/17.
Expansion of electric vehicles charging points available within the city.	Transport Scotland, Energy Saving Trust Scotland, Office for Low Emission Vehicles	2012	Estimated		Other		ch be in 20 ra po	1 electric vehicle narging points ecoming available Aberdeen in 217 and 2 further upid recharging bints were stalled in 2018.
Over cladding at Seaton	Aberdeen City Council		Estimated		Other		7 bl be im ef pe Ai tC re as he bu pr	multi-storey locks in Seaton to e over-clad to hiprove energy fficiency. Covers eriod 2016-2018. hiticipated 477 co2e saving. Will educe emissions esociated with eating the uilding. The roject is estimated be on track for completion in 2018.
Enhanced recycling	Aberdeen City Council and Zero waste Scotland	2013	Estimated	£1,429,517 over the length of the project	Other	657	47 ar cc w Fc cc fr st W	pproximately 7,000 properties re now served by ommunal food aste bins. bod waste is ollected separately om other waste reams. /ork continues to nprove

participation and capture rates.

• 3g - Estimated decrease or increase in the body's emissions attributed to factors (not reported elsewhere in this form) in the report year

Emission source	Total estimated annual emissions (tCO₂e)	Increase or decrease in emissions	Comments
This section has not been populated due to lack of			
information.			

• 3h - Anticipated annual carbon savings from all projects implemented by the body in the year ahead

Emission source	Total estimated annual carbon savings (tCO ₂ e)	Comments
Electricity	0	Ongoing implementation of energy efficiency measures on buildings through maintenance and upgrade programmes. Ongoing replacement of high output fixtures with lower energy LED units as per maintenance and new lantern programme.
Natural gas	0	Ongoing implementation of energy efficiency measures on buildings through maintenance and upgrade programmes.
Other heating fuels	0	Unknown.
Waste	0	Unknown.
Water and sewerage	0	Unknown.
Business Travel	0	Continued expansion of co-wheels scheme providing access to electric, hybrid and hydrogen pool cars. Embargo on travel. Continued encouragement of smarter working.
Fleet transport	0	A collaboration with Ultra Low Emission Mileage Company Limited (ULEMCo) and ACC delivered the world's first hydrogen dual fuel road sweeper for Aberdeen. The vehicle uses hydrogen fuel for around a third of the energy used to drive and operate conventional road sweeper vehicles, making valuable reductions in CO2 emissions.

• 3i - Estimated decrease or increase in the body's emissions attributed to factors (not reported elsewhere in this form) in the year ahead

Emissions source	Total estimated annual emissions (tCO₂e)	Increase or decrease in emissions	Comments
Estate changes	Unknown	No change	Overall Gross Internal Floor Area (GIFA) remained relatively static as new assets become operational and others closed
Service provision	Unknown	Decrease	It is likely that some areas of work will no longer continue and automation/digitisation of practices will be considered to become more resource efficient.
Staff numbers	Unknown	Decrease	Likely to be a decrease in staff numbers due to ongoing voluntary severance and early retirement schemes, a recruitment freeze and Council restructuring.
Other			

• 3j - Total carbon reduction project savings since the start of the year which the body uses as a baseline for its carbon footprint

Total savings	Total estimated emissions savings (tCO2e)	Comments
		Unknown as data is not captured.

3k - Supporting information and best practice

This section has not been filled in.

4a - Has the body assessed current and future climate-related risks?

Aberdeen carried out an LCLIP (2014) to assess the vulnerability of services to weather over a 5-year period.

Link: https://www.aberdeencity.gov.uk/sites/default/files/Aberdeen City LCLIP.pdf

An assessment of current and future climate risks was carried out for the Council, in line with the Adaptation Scotland "5 Steps to Managing Your Climate Risks" guidance. The risks come under the overarching heading "Risk that processes to manage and benefit from the effects of severe weather and climate change are not effective". This was approved by the Communities, Housing and Infrastructure Committee in 2016, with progress on control measures for this risk reported to the Senior Management Team.

Work began on a corporate restructuring in this reporting period and Climate Risk Guidance for the Council and climate risk infographics are in development, to align climate risks for the Council with the new corporate structure, when it is in place in 2018. Further work will need to take place during the next reporting period to embed climate risk in updated corporate procedures and processes, following corporate restructuring.

An assessment of flood risk has been carried out for Aberdeen under work in the north east for the Local Flood Risk Management Plan 2016- 2022 and this has mapped areas potentially vulnerable to flood risk. The plan forms part of the statutory obligations placed on Aberdeen City Council (ACC) and partners SEPA, Moray Council, Aberdeenshire Council and Scottish Water, under the Flood Risk Management (Scotland) Act 2009.

The plan contains the statutory duties that ACC will be required to undertake during Cycle 1 of the Flood Risk Management Plan. It will be reviewed every 6 years, with an interim report at 3 years. An Integrated Catchment Study was developed, working with Scottish Water, to inform flood risk management.

Link: http://apps.sepa.org.uk/FRMStrategies/north-east.html

A Strategic Flood Risk Assessment was undertaken for the Aberdeen Local Development Plan. This is to satisfy the requirements placed on local authorities under the Flood Risk Management (Scotland) Act 2009, requiring local authorities to exercise their flood risk related functions with a view to reducing overall flood risk and promoting sustainable flood risk management. The Assessment looked at potential sources of flood risk, relevant for development in Aberdeen.

Link: https://www.aberdeencity.gov.uk/sites/default/files/aldp 2016 strategic flood risk assess 032015.pdf

4b - What arrangements does the body have in place to manage climate-related risks?

Adaptation is embedded in many Council and partnership policies and strategies including:

The **Aberdeen Local Development Plan**, includes policies on:

- Greenspace network policy NE1 (p67)
- Trees and woodlands policy NE5 (p72)
- Flooding, drainage and water quality policy NE6 (p74)
- Coastal planning policy NE7 (p77)
- Low and zero carbon buildings and water efficiency policy R7 (p87)
- Supplementary guidance on open space and green infrastructure (p71) and flooding drainage and water quality (p75) with arrangements for Flood Risk Management Planning in Scotland, Flood Risk Assessment, Drainage Impact Assessment, Sustainable Drainage Systems (SuDS), Regional SuDS and Waste and Foul Drainage.

Link: https://www.aberdeencity.gov.uk/services/planning-and-building/local-development-plan/aberdeen-local-development-plan

and https://www.aberdeencity.gov.uk/services/planning-and-building/local-development-plan/aberdeen-local-development-plan/supplementary-guidance-and-advice

Aberdeen City and Shire Strategic Development Plan (2014) (p31) – Has targets including:

- To avoid having to increase the amount of water Scottish Water are licensed to take from the River Dee, as a result of the new developments proposed in the plan.
- For all new developments to use water-saving technology.
- To avoid developments on land which is at an unacceptable risk from coastal or river flooding (as defined by the 'Indicative River and Coastal Flood Map for Scotland' or through a detailed flood risk assessment), except in exceptional circumstances.

Link: http://www.aberdeencityandshire-sdpa.gov.uk/AboutUs/Publications.aspx

The **North of Scotland Community Risk Register** is produced by the North of Scotland Regional Resilience Partnership, highlights risks that have the highest likelihood and potential to have significant impact, causing disruption to the North of Scotland region and its communities. It includes potential risks which will have increased impacts under climate change including severe weather, flooding, interruptions to utilities, transport disruptions, pollution & contamination.

Link: http://www.firescotland.gov.uk/media/864538/north crr version 1.2.pdf

Grampian Emergency Planning Unit, is a joint team based in Aberdeen City Council (ACC). Delivery of the council's response to the effects of major emergencies is contained within the document the ACC Emergency Planning Policy and Procedures. The unit produces and maintains emergency plans in conjunction with the emergency services and other agencies to address specific potential emergencies. These include a Flood Warning and Response Plan.

Link: https://www.aberdeencity.gov.uk/services/people-and-communities/community-safety/major-emergency-incident-planning

The **Aberdeen Nature Conservation Strategy 2010 – 2015**, considers the future impacts of climate change and highlights the links between biodiversity and climate change. Specifically, the strategy recognises that biodiversity loss and climate change are interlinked and that both threaten the availability of the natural resources. The strategy covers the period 2010-2015 and is now currently an interim strategy while work takes place on updating it. (p15). Link: https://www.aberdeencity.gov.uk/sites/default/files/Nature Strategy Dec2015 extended 0.pdf

The **Aberdeen Open Space Strategy 2011-2016**, contains a key objective and series of actions to, "Maximise opportunities to mitigate and adapt to climate change and further biodiversity." This is through encouraging SUDS, protecting open spaces for the role they play in flood management, planting native and wildlife friendly species. This strategy will be updated following the Open Space Audit review which is currently in progress. Surveying the extent, type, function and quality of open spaces in urban and peri-urban parts of Aberdeen

Link: https://www.aberdeencity.gov.uk/sites/default/files/open_space_strategy_2011_2016.pdf

The **Local Transport Strategy 2016 - 2021** states and "we therefore need to build infrastructure which is more sustainable, climate resilient and adapted to our environment, ecological conditions and landscape setting". It includes the objectives:

- To ensure that the transport network is as resilient as possible in case of flooding from extreme weather conditions. (P28)
- To contribute to Aberdeen's carbon emissions targets and develop climate resilient infrastructure. (P43)

Link: https://www.aberdeencity.gov.uk/services/roads-transport-and-parking/local-transport-strategy

Approval of the **North East Local Flood Risk Management Plan (NELFRMP)** which contains the statutory duties that Aberdeen City will be required to undertake during Cycle 1 of the plan. The obligations will start on 1 July 2016. The Plan has been produced in partnership with SEPA, Moray Council, Aberdeenshire Council and Scottish Water to meet the requirement of the Flood Risk Management (Scotland) Act 2009.

The flooding team is currently working on the delivery of the Glashie Burn flood study with particular emphasis on the Jesmond Drive issues.

A Business Continuity Policy is in place to show how the Council intends to continue to provide critical services after a disruptive event. Service Level Business Continuity Plans are in place for "critical" public facing aspects of Services in support of the Civil Contingencies Act 2004.

Link: http://thezone/job_zone/app/Business_Continuity/BC_business_continuity.asp

The Community Planning Aberdeen, Local Outcome Improvement Plan was approved in 2016, this acknowledges "climate change and extreme weather events also pose a significant risk of harm to our communities" and states "We will develop community and business resilience awareness as well as enhancing ability to respond" and will "raise awareness of Community Resilience across a range of community groups" and "assist Communities and Businesses to develop and maintain effective Resilience Plans." (p37) It includes, "Safe and resilient communities - Aberdeen is a place where people are safe from harm" and includes the Primary Driver "We will develop community and business resilience awareness as well as enhancing ability to respond" and "We will maintain resilient and effective Category 1 and Category 2 Responders (as defined by Civil Contingencies Act 2004)" (P48).

Link: https://communityplanningaberdeen.org.uk/aberdeen-city-local-outcome-improvement-plan-2016-26/

The Council has worked with Community Planning Partners and members of the Community to develop **Locality Plans** for areas in Aberdeen. The draft Locality Plans acknowledge climate impacts and vulnerability to flooding.

Link:

Wider Northfield Locality plan https://committees.aberdeencity.gov.uk/documents/s67721/Locality%20Plan%20-%20wider%20Northfield.pdf

Torry Locality plan - https://committees.aberdeencity.gov.uk/documents/s67720/Locality%20Plan%20-%20Torry.pdf

Woodside, Tillydrone & Seaton Locality plan - https://communityplanningaberdeen.org.uk/wp-content/uploads/2017/09/Woodside-Tillydrone-and-Seaton.pdf

Proposed **Trees and Woodlands Strategy** – ACC is developing a Tree and Woodland strategy in collaboration with partners including SNH and Forestry Commission Scotland. The strategy is themed around 5 topic areas and one of these is climate change. The strategy aims to encourage tree planting and woodland expansion.

Link: https://www.aberdeencity.gov.uk/sites/default/files/2017-12/ACC%20Biodiversity%20Duty%20Report%202017.pdf

4c - What action has the body taken to adapt to climate change?

Building Adaptive Capacity

Further work took place in the development of **Aberdeen Adapts**, a partnership project to develop a city-wide approach to climate resilience.

A stakeholder workshop for Aberdeen Adapts was held in June 2017 was an opportunity to review the draft goals, objectives and actions for the project. Screening and Scoping processes for the Strategic Environmental Assessment for Aberdeen Adapts were carried out in 2017/18.

A student from the University of Aberdeen, MSc course in Environmental Partnership Management worked with the Council on a summer placement project for Aberdeen Adapts in 2017 looking at community resilience. This project used research and interviews to develop **community resilience** steps and a local Household Emergency Plan template.

A placement project with a group of third year students from the Robert Gordons University in 2018 led to the development of a **case study template** that could be used to raise awareness of adaptation projects in Aberdeen. This placement developed a case study for an edible green wall pilot taking place in the city.

Link: https://www.adaptationscotland.org.uk/get-involved/our-projects/aberdeen-adapts

An **Arts and Climate Change Mini-Festival** developed by Creative Carbon Scotland working with Adaptation Scotland, RGU and Aberdeen City Council was held in Aberdeen on 22 April 2017. These involved workshops run by four artists from across Scotland, exploring how climate change will impact on Aberdeen's communities.

Link: https://www.adaptationscotland.org.uk/get-involved/our-projects/aberdeen-adapts-engaging-communities-through-art

Deliver Adaptation Action

The Council is a partner in the EU project **BEGIN**: **Blue-green Infrastructure through Social Innovation project.** Public consultation took place and work commenced on the development of the Maidencraig Flood Management and Wetland Scheme in Aberdeen, forming part of work in the BEGIN project. The work includes the construction of earth banks, relocation and opening-up of the tributary burn to create space for nature. The scheme is designed to help save houses and businesses in the neighbourhood and further downstream from being flooded. The work stems from computer modelling carried out after the city Den Burn flooded in previous years which pinpointed several areas which could be used to capture the extra water and hold it safely.

Planning is also taking place for several additional blue green infrastructure schemes as part of the BEGIN project. Including Summerhill Swale and Miniature Wetland and Fernielea School Sustainable Drainage (SuDS) Scheme and the Kincorth Sustainable Drainage programme

Link: https://news.aberdeencity.gov.uk/schemes-to-help-stop-flooding-in-the-city/

The Council is developing a **Green Walls** project. Several streams of potential projects are currently being investigated including: testing out different potential types of moss; lichen and plant species; edible green walls for school gardening and small-scale DIY options. Two wooden pallets were successfully adapted for growing in Duthie Park last autumn. The instruction manual produced is being circulated to local community groups who have shown an interest in vertical growing. In addition, 7 edible green walls using recycled plastic bottles are currently on-going in four schools across the city to pilot the vertical growing of small fruits, herbs and vegetables.

A **Property level flood protection grant** remains in place. The Council runs a 50% funded grant scheme to assist protecting property from flooding. The grant is for private residences that have either been previously flooded and have sustained damage; are located on a vulnerable area shown on the SEPA Flooding Maps; or are shown on the Integrated Catchment Study Model.

Link: https://aberdeencity.gov.uk/services/environment/information-about-flooding/property-level-protection-flood-grant

Further work continues in the implementation of the **North East Flood Risk Management Plan**. Construction work took place to install flood gates at Bridge of Dee Court, as part of the Dee View Court Flood Protection Scheme. This aims to significantly reduce the flood risk.

Work commenced on the **Middlefield Project**, raising the Scatterburn from underground to above ground to work as a flood alleviation scheme. This aims to reduce the flood risk in the Middlefield area and downstream. The work will be combined with paths and landscaping to make the area an accessible, multifunctional community park area. The project received funding from the SNH Green Infrastructure Fund.

Link: https://news.aberdeencity.gov.uk/start-of-project-to-create-a-user-friendly-community-park-area/

A flood study has been carried out to determine the flood risk at Footdee, an old fishing village at the start of Aberdeen's harbour. The study considered the potential for flooding as a result from wave overtopping, the local drainage system, the River Dee, extreme tidal events and pluvial sources. The study involved 2 stages:

- A desktop study to identify and collate all currently available information on flood risk in the Footdee area, determine flood hazard extents where possible, based on the existing information, complete a visual condition assessment of the sea defences at Footdee and develop recommendations for any repairs required.
- A detailed assessment of the impact of wave overtopping at Footdee. This stage involved modelling and simulation of flood water propagation under both present day and future conditions, with allowance for climate change. Options for the future management of this risk were developed and assessed.
- 4d Where applicable, what progress has the body made in delivering the policies and proposals referenced N1, N2, N3, B1, B2, B3, S1, S2 and S3 in the Scottish Climate Change Adaptation Programme(a) ("the Programme")?

Objective	Ref	Theme	Policy/ Proposal reference	Information required	Delivery progress made during 2017/2018
Understand the effects of climate change and their impacts on the natural environment.	N1	Natural Environment	N1-8	Understand the risks associated with coastal flooding through development and implementation of local flood risk plans.	The North East Local Flood Risk Management Plan (NELFRMP) was approved in 2016. The plan contains the statutory duties that the Council will be required to undertake during Cycle 1 of the Flood Risk Management Plan 2016-2022. This is to meet statutory requirements under the Flood Risk Management (Scotland) Act 2009. The Plan was produced in partnership with SEPA, Moray Council, Aberdeenshire Council and Scottish Water. A coastal study was completed for the Footdee area of Aberdeen, which is situated at the end of the harbour. This involved a detailed assessment of the current flood risk for the area and a visual assessment of the existing sea defences. The study looked at the flood risk due to wave overtopping and a rise in sea level. The results of this are currently being understood. https://www.aberdeenshire.gov.uk/me
					dia/17174/north-east-local-flood-risk- management-plan-2016-2022-web-

					version.pdf
Understand the effects of climate change and their impacts on the natural environment.	N1	Natural Environment	N1-10	Developing datasets to support flood risk, river and coastal management. A requirement of the Flood Risk Management (Scotland) Act is to develop a programme to integrate necessary data.	The Council worked with Scottish Water on the development of an Integrated Catchment Study, surveying sewers and watercourses, measuring flows and rainfalls and building a computer model of the integrated catchment. This catchment model is now complete, and the needs assessment done. ACC is now working on a Surface Water Management Plan, to look at the detailed surface water flood risk.
Support a healthy and diverse natural environment with capacity to adapt.	N2	Natural Environment	N2-2	The Scottish Planning Policy includes green networks, green space, street trees and other vegetation, green roofs, wetlands and other water features, and coastal habitats in helping Scotland to mitigate and adapt to climate change.	A Green Space Network identifies threats and opportunities in relation to the natural and built environment across Aberdeen. This strategic network connects various habitats and species, urban and rural green spaces to each other and the communities around them. The network aims to protect and enhance designated sites; to improve connectivity between habitats and open spaces; and to promote opportunities for access to the outdoors. It also takes into account climate change adaptation opportunities and flood risk or alleviation. The Green Space Network and the Green Space Network (GSN) GIS Tool promotes, enhances and protects the environment, and identifies threats / opportunities to the city's natural and built environment. Focus on green infrastructure practices and enhancing the green space network. https://www.aberdeencity.gov.uk/services/environment/green-space-network#
					The development of green infrastructure including wetland areas in support of the Council's Nature Conservation Strategy and Open Space Strategy. https://www.aberdeencity.gov.uk/site/default/files/Nature_Strategy_Dec20_5_extended_0.pdf https://www.aberdeencity.gov.uk/senices/environment/open-space-audit The Council is a partner in the BEGIN project; Blue-Green Infrastructure through Social Innovation, taking place from 2016 to 2020. It aims to drive the development of blue-green infrastructure (BGI) in urban areas through social innovation. This is a collaborative project working with ten cities and six scientific partners from across the North Sea region. It focuses on developing an approach to climate resilience for cities, that mimics nature's potential to

deal with flooding. BGI can support urban areas to cope with extreme weather events and can improve urban liveability. The project is also designed

					to help cities overcome BGI's implementation barriers through social innovation. Empowering multiple stakeholders to contribute to the design, construction and maintenance of BGI. http://northsearegion.eu/begin/about-us/
Support a healthy and diverse natural environment with capacity to adapt.	N2	Natural Environment	N2-11	Embed climate change adaptation considerations, and potential responses such as habitat networks and green networks, into wider land use planning decisions through the use of Forestry and Woodland Strategies, regional land use strategies, and Strategic and Local Development Plans and development master-plans.	The Aberdeen Local Development Plan includes supplementary guidance on: • Green Space Network and Open Space • Natural Heritage https://www.aberdeencity.gov.uk/sites/default/files/6.4.PolicySG.OpenSpace.pdf https://www.aberdeencity.gov.uk/sites/default/files/6.1.PolicySG.NaturalHeritage.pdf
Support a healthy and diverse natural environment with capacity to adapt.	N2	Natural Environment	N2-20	Assess and manage coasts, promoting adaptive coastal management that works with natural processes.	The Council assess and manage coasts through the development of the North East Local Flood Risk Management Plan (NELFRMP). The Aberdeen Local Development Plan includes "Policy NE7 Coastal Planning", that states development will not be permitted in areas at risk from coastal erosion and flooding. https://www.aberdeencity.gov.uk/sites/default/files/LDP_WS_20170328.pdf

Objective	Ref	Theme	Policy/ Proposal reference	Information required	Delivery progress made during 2017/2018
Understand the effects of climate change and their impacts on buildings and infrastructure networks.	B1	Buildings and infrastructure networks	B1-13	Flood Risk Management Plans - The Flood Risk Management (Scotland) Act 2009 requires the development of Flood Risk Management Strategies (FRMS) and Local Flood Risk Management Plans (LFRMP).	The North East Local Flood Risk Management Plan (NELFRMP) contains the statutory duties that the Council will be required to undertake during Cycle 1 of the Flood Risk Management Plan 2016-2022. This is to meet statutory requirements under the Flood Risk Management (Scotland) Act 2009. The Plan was produced in partnership with SEPA, Moray Council, Aberdeenshire Council and Scottish Water. https://www.aberdeenshire.gov.uk/medi a/17174/north-east-local-flood-risk- management-plan-2016-2022-web- version.pdf
Increase the resilience of buildings and infrastructure networks to sustain and enhance the benefits and services provided	B3	Buildings and infrastructure networks	B3-2	Planning Advice Notes (PAN) provides advice and information on technical planning matters. As part of the modernisation of the planning system, the planning advice notes are being reviewed and consolidated. Revised PANs are to be underpinned by the principles of sustainable flood risk management.	The Aberdeen Local Development Plan (ALDP) 2017 was adopted on 20 January 2017. https://www.aberdeencity.gov.uk/sites/default/files/LDP_WS_20170328.pdf Adoption of supplementary guidance on 18 April 2017 including: Flooding, Drainage & Water Quality https://www.aberdeencity.gov.uk/sites/default/files/6.3.PolicySG.Flooding.pdf and Resources for New Development: https://www.aberdeencity.gov.uk/sites/default/files/7.1.PolicySG.ResourcesForNewDevelopmentTC.P.4.8.9.12.13.pdf The ALDP 2017 includes a specific policy
					on Flooding, Drainage and Water Quality (policy NE6) and it is further supported by newly adopted Supplementary Guidance (SG). The aim of the policy and SG are to manage and reduce flood risk by ensuring that new development does not take place on areas that are susceptible to flooding, and incorporates appropriate and sustainable surface water management measures. The policy and SG also seek to protect land and green infrastructure, with the potential to contribute to natural flood risk management from developments. The SG provides guidance on statutory roles and responsibilities, arrangements for flood risk management planning in Scotland, Flood Risk Assessments, Drainage Impact Assessments, Sustainable Urban Drainage Systems (SuDS), Regional SuDS and Waste and Foul Drainage. Further to this, Policy R7 and its associated SG focus on water efficiency, all new buildings are required to use water saving technologies and techniques.

Ref	Theme	Policy/ Proposal reference	Information required	Delivery progress made during 2017/2018
B3	Buildings and infrastructure networks	B3-3	Scottish Planning Policy (SPP) (Climate Change) identifies that short and long term impacts of climate change should be taken into account in all decisions throughout the planning system. Scottish Planning Policy is the statement of the Scottish Government's policy on nationally important land use planning matters.	The Aberdeen Local Development Plan (ALDP) 2017 was adopted on 20 January 2017. https://www.aberdeencity.gov.uk/sites/default/files/LDP WS 20170328.pdf Adoption of supplementary guidance on 18 April 2017 https://www.aberdeencity.gov.uk/servic es/planning-and-building/local-development-plan/aberdeen-local-development-plan/supplementary-guidance-and-advice The adoption of the ALDP 2017 and its associated supplementary guidance will ensure short and long term impacts of climate change will be taken into account in all decisions throughout the planning system. Use of relevant policies in 2017-18 reporting period was: NE1: Green Space Network – 41 NE6: Flooding, Drainage and Water Quality – 76 NE7: Coastal Planning – 5 NE8: natural heritage – 25 R7 Low and Zero Carbon Buildings and Water Efficiency - 43 The figures reported identify the number of times the policy has been discussed in development management officer
B3	Buildings and infrastructure networks Buildings and infrastructure networks	B3-6	Home Energy Efficiency Programme for Scotland. Delivering heating and insulation measures across Scotland to help improve energy efficiency and reduce energy demands of existing housing stock in the most fuel poor areas. The Energy Efficiency Standard for Social Housing sets a minimum standard for energy efficiency in social housing. All	The return for this year's Energy Efficiency Standard for Social Housing (EESSH) once again showed a slight improvement, with a further 964
В3	Buildings and infrastructure networks	B3-8	social housing will be expected to meet the standard by 2020. Improve Housing Quality by ensuring all houses meet the tolerable standard, and that all social housing meets the Scottish Housing Quality	properties improved to meet the standard. The number of properties meeting EESSH for the reporting year 2017/18 is 85.56%. As with the previous reporting year, at this time there are no properties in the Aberdeen City Council, Housing Revenue Account that are failing to meet SHQS, under the criteria set in Tolerable
	B3 B3	B3 Buildings and infrastructure networks B3 Buildings and infrastructure networks B3 Buildings and infrastructure networks	B3 Buildings and infrastructure networks	B3 Buildings and infrastructure networks B3 Buildings and infrastructur

4e - What arrangements does the body have in place to review current and future climate risks?

Question 4(a) and adaptation strategies, plans and policies in Question 4(b).

• Progress with climate risk mitigation measures and controls for the ACC, Communities, Housing and Infrastructure climate risk, "Risk processes to manage and benefit from the effects of severe weather and

climate change are not effective", which is included in the Directorate Risk Register, were provided to the Senior Management Team in May 2017. Work commenced on corporate restructuring during this period and new systems for risk reporting are still emerging. Further work is due to take place during the next reporting period to embedded climate risk in Risk Registers for the new corporate structure.

- Progress with the Nature Conservation Strategy is reviewed, as part of Biodiversity Reporting Duties. This is required every three years under the Wildlife and Natural Environment (Scotland) Act 2011. This was last reported in 2017.
- A review of current and future flood risks for the city took place for the North East Flood Risk Management Plan 2016-2022. The plan covers the North East Local Plan District and will be reviewed at 6 yearly intervals.
- A Strategic Environment Assessment (SEA) for Aberdeen Adapts is currently being carried out.

Link: https://www.aberdeencity.gov.uk/sites/default/files/2017-12/ACC%20Biodiversity%20Duty%20Report%202017.pdf

4f - What arrangements does the body have in place to monitor and evaluate the impact of the adaptation actions?

- The monitoring and evaluation of adaptation actions will be taken into consideration under Aberdeen Adapts.
- Biodiversity actions are monitored through implementation of the Aberdeen Nature Conservation Strategy.
- Open space actions are monitored through the implementation of the Aberdeen Open Space Strategy.
- Ongoing flood monitoring helps to assess the delivery and effectiveness of flood alleviation studies and schemes.
- 4g What are the body's top 5 priorities for the year ahead in relation to climate change adaptation?
- Completion and approval of the Aberdeen Adapts, a Climate Adaptation Framework for the city and progress with implementation of the adaptation actions for Aberdeen.
- Embedding adaptation and climate risks into reviewed procedures under the new corporate structure.
- Embedding adaptation into new and revised strategic documents, such as the development of the new Aberdeen Local Development Plan.
- Implementing priority measures for Aberdeen under the North East Flood Risk Management Plan.
- Progress with the BEGIN project, developing green, blue infrastructure in Aberdeen.

• 4h - Supporting information and best practice

The East Tullos Burn Environmental Improvement Project won a Highly Commended Award at the UK River Restoration Awards in April 2017, the third award that this project has won. The awards recognise the best practice of river restoration and catchment management projects from across the UK. The aim of the project was to look at ways to transform the burn into a more natural water feature with a wetland area. http://www.therrc.co.uk/uk-river-prize-2017

The Seaton Park Wetland Project won the Herald Society Award 2017, Best Environmental Initiative. The award recognises projects that deliver real environmental improvements that respond to climate change issues and involve local people. The project transformed a flooded area of the park into a wetland area providing a space for wildlife and the local community. http://newsquestscotlandevents.com/events/societyawards/

A number of public information sessions were held in January 2018, giving members of the public the opportunity to find out about the Phase 1 development of the Maidencraig Flood Management and Wetland Scheme.

http://www.deepartnership.org/userfiles/file/suds/MAIDENCRAIG-A3-VISUAL.pdf

As part of the community growing spaces project, a pilot initiative has involved planting of an interactive Edible Green Wall at 6 city schools. The project aims to create an easy way to instruct children on how to grow food and develop sustainable habits. The project is raising awareness and increase knowledge about sustainable matters, as well as encouraging engagement between schools and local community groups.

SECTION 5 - PROCUREMENT

5a - How have procurement policies contributed to compliance with climate change duties?

The following policies guide sustainable procurement activity at a strategic and operational level, contributing directly to Council commitments under the Climate Change (Scotland) Act 2009. Overarching policies provide strategic and practical guidance at every stage of the procurement process i.e. identification of need, specification development, selection/award and contract management. These policies assist procuring officers to proactively address the three key aspects of the duties i.e. **mitigation** (ensuring a reduction in greenhouse gases/enhancing carbon storage), **adaptation** (e.g. flood prevention schemes) in addition to **maximising added social, economic and environmental value** in the Council's own procurements and call offs from national frameworks.

The Commercial and Procurement Shared Service

The Commercial and Procurement Shared Service (C&PSS) embraces the procurement function in: Aberdeen City Council, Aberdeenshire Council and The Highland Council. The 2017-2022 Joint Procurement Strategy is fully aligned to: i) The Scottish Model of Procurement (emphasising quality, cost and sustainability) ii) National Outcomes iii) the Public Service Reform Agenda and iv) Scottish Government aspirations to:

"...support Scotland's economic growth by delivering social and environmental benefits, supporting innovation and promoting public procurement processes and systems which are transparent, streamlined, standard, proportionate, fair and business-friendly"

Procurement Mission Statement

The Procurement Mission Statement commits to delivery of "ethical and sustainable value for money solutions that support the operational needs and wider strategic aims of the councils and the communities they service to further local and national priorities to the fullest extent possible." In particular, the following National Outcomes guide procurement activity at a strategic and operation level:

"We value and enjoy our built and natural environment and protect it and enhance it for future generations" and

"We reduce the local and global environmental impact of our consumption and production."

Policy/strategy/guidance emphasises a commitment (beyond mandatory and regulated thresholds) to identify: "leverage opportunities (including social, economic and environmental value) aligned to the needs and priorities of our communities"

Policy Statement

"The partner councils aim to act as a role model within the public sector by carrying out activities in a responsible and sustainable manner, considering how the economic, social and environmental wellbeing of

the area can be improved and working with all sectors of the business community in order to achieve increased prosperity. As responsible and ethical buyers, the partner councils aim to embed the key principles of sustainability into procurement activity for the benefit of society, the economy and the environment."

The above statement features in sourcing strategies (to guide procurers) and tender documentation (to guide bidders). Communication of these priorities leads to climate change; adaptation/mitigation and sustainable procurement initiatives receiving considered, proactive focus at the sourcing stage. This is turn leads to higher quality, innovative responses from bidders aligned to local priorities and climate change/adaptation duties.

Specifications/Statements of Requirements

Policy and guidance explain that not all sustainability measures are best achieved through community benefits. Certain measures (particularly environmental/energy efficiency related measures) can be specified as contractual conditions e.g. that a product is made of particular materials or manufactured to a particular eco/industry standard. Methods of production, lifecycle costing, environmental performance measures and reduction of packaging (particularly single use plastic) are suggested in guidance. The following specific examples are provided in this context:

- Environmental/emissions/climate performance levels
- Legislation or regulatory standards (e.g., equalities Climate Change Scotland Act 2009 etc.)
- Waste water standards/accreditation
- Production processes and methods at any stage of the life cycle of the supply or service.

Zero Waste Scotland Specification Development guidance has been incorporated into guidance. Sustainable procurement measures achieved in the specification are regarded as "community benefits" and procurers are encouraged to consider utilising community benefits and the specification to maximise the environmental wellbeing of our communities.

Policy and Guidance

A Sustainable Procurement Policy (PGN 10) has been developed, with input from colleagues in Economic Development, Community Planning and Sustainable Development. Policy and guidance links to and strongly recommends usage of the following sustainability tools: i) The Sustainability Test, ii) The Prioritisation Tool and iii) Lifecycle Impact Mapping. As with procurement strategy, there are linkages to The Scottish Model of Procurement; National Outcomes and Local Outcome Improvement Plans. Sustainable procurement themes have been distilled into the following table to guide procurers and bidders.

Improve (Wellbeing)	Promote	Facilitate (Involve)
Social	Innovation	SMEs
Economic	Equalities/reduce Inequality	3 rd Sector organisations
Environmental	Ethical trading and social	Supported Businesses
	justice	
Health	Fair Work Practices/The	Prompt Payment throughout
	Living Wage	the supply chain
Food poverty/fuel	Resource efficiency and the	
poverty/energy efficiency	circular economy	and community
		empowerment; community
		projects
Air quality/reduction of	Education; employability and	Collaboration and
harmful emissions/reduction	skills training	collaborative working
of waste and packaging		

To aid compliance with climate change duties, policy and guidance covers demand management extensively and defines and explains key terms such as "sustainable procurement", "whole of life costing" and "the circular economy." Guidance has been condensed into a 2-page summary... the summary states that:

"Value for money remains as important as ever but our procurements must look to generate wider benefits to society and improve the local environment/minimise environmental damage.

Policy and guidance identifies that councils have influence and responsibilities beyond the geographic areas they serve. Sustainable procurement measures/community benefits can be captured at the following levels: **Local** (Council/area specific); **National** (Scotland/UK) or **Global** (e.g. fairly traded and ethically sourced goods/carbon emission reduction.) Guidance prompts that many national strategic objectives can be addressed locally (e.g. employment & skills, Living Wage, health and wellbeing, poverty, biodiversity, reduced road miles/reduced carbon emissions etc.)

To simplify the subject, policy and guidance link sustainable procurement as a means of increasing **prosperity**.

- Prosperity of the (local) economy;
- Prosperity of (local) people;
- Prosperity of (local) places and
- Prosperity of the (local) environment

Fair Trade/Trading Labels

The Sustainable Procurement Policy supports the promotion of the FairTrade Resolution. "FairTrade" can be specified as representing a standard without further enquiries. As with the use of any trading label, to avoid inadvertent discrimination, procurers must offer alternatives to meet the standard without accreditation. Guidance covers compliant use of trading labels and guides where "equivalents" must be offered.

5b - How has procurement activity contributed to compliance with climate change duties?
 The following represents an illustrative sample of procurement activity i) delivering a reduction in CO2 emissions ii) improving energy efficiencies and iii) incorporating meaningful sustainability criteria:

The following represents an illustrative sample of procurement activity i) delivering a reduction in CO2 emissions ii) improving energy efficiency and iii) incorporating meaningful sustainability criteria:

- 1. **Construction Procurements** follow industry terms/best practice (NEC3, SBCC ICE etc.), Building Standards/Building Performance polices. Specifications incorporate sustainability, energy and environmental considerations to a challenging but proportionate and relevant extent per project. Strong ethos that value for money is demonstrated by whole of life costing/best price-quality ratio. Current and future climate change risks factored into procurement processes where proportionate and relevant to safeguard assets/infrastructure /communities to ensure business continuity.
- 2. **Maidencraig Flood Management Wetland Scheme** Contract Notice published in December 2017 and creates a new path between a housing development and the Den Burn, creating a safe route to schools, a new habitat for nature and reduces the flood risk to homes and properties downstream. The scheme involves creating a new path, constructing earth bunds, relocating a small burn to create a space for nature, installation of lighting and replacing the temporary bridge over the Den Burn.
- 3. **Scatterburn Flood Alleviation Scheme** Contract Notice published November 2017. A collaborative multi-benefit project with Scottish Natural Heritage and NESTRANS to provide sustainable urban drainage, deculverting and address flood alleviation by raising the Scatterburn from underground to above ground. The project will also create new pedestrian and cycle-friendly paths, improve

pavements on two streets and install new landscaping to create an attractive park area which will be user-friendly to the residents living in the surrounding areas.

4. Managed Print Contract (Aberdeen City/Aberdeenshire) — "Print Smart" power saving models embedded. The contract systematically eliminates the use of small, inefficient desktop printers requiring regular replacement of peripherals. 3994 devices were replaced by power saving models in 2017/2018. Print policies designed to reduce volumes, eliminate waste, reduce resources & energy consumed strongly promote the environment benefits of scanning, duplex, mono and reduced archiving. The new models default to the preferred environmental options where it is possible to do so. The contractor's Sustainability Calculator reports a 30% reduction in: Energy: (annualised BTUs), Greenhouse Gas Emissions (Annualised Pounds GHG) and Solid Waste (annualised Pounds SW.) In terms of user behaviour, evidence supports that print volumes have reduced significantly. Due to the fact that a calculation of print volumes is (for the reporting period) based on a combination of accurate information from Print Smart devices and an estimation from print cartridge replacement it is not possible to accurately quantify a percentage reduction in volume. It is hoped that an accurate picture of reducing print volumes can be provided in the course of 2018/2019.

The contract embraces hybrid mail (less road miles for deliveries/less paper etc.) and ensures used print cartridges recycled responsibly. Hybrid mail will be strategically deployed and the benefits captured during 2018/2019.

5. **Energy From Waste** (Aberdeen City, Aberdeenshire and Moray) Development of an ambitious project working towards fulfilling Zero Waste Plan requirements. It is anticipated that following the conclusion of a competitive dialogue process, the contract can be awarded in in 2019 with the facility targeted to be operational by 2022. The project provides a long-term solution for non-recyclable waste produced in the north east of Scotland. The facility will provide a viable solution for residual waste that will generate significant, wider benefits to the community — such as electricity generation and heat for local residents which is a sustainable means to reduce fuel poverty. Forecasts indicate the plant will process circa 150,000 tonnes of non-recyclable waste per annum.

Modern combustion technology utilises flexible, future-proof, cutting-edge process control. High temperature combustion provides electricity and heat from the production of steam. The project has the potential to heat 10,000 homes otherwise reliant on fossil fuels. Forecasts show around 10MW of electricity, and/or 20MW of heat as steam or hot water will be produced.

- 6. **Aberdeen Hydrogen Bus Project** In the reporting period, the fleet travelled 477,655 km carrying 542,598 passengers. 10 diesel buses replaced and only emit water vapour so reduce carbon emissions/air pollution. In 2017/2018, CO2 emissions savings were 460 tCO2.
- 7. **Supply Chain Mapping Hydrogen Sector -** In Dec 17 a procurement exercise addressed the establishment of a specific hydrogen supply chain map for the region identifying any gaps in provision and specific recommendations for how gaps could be addressed in the local/ regional/ national area consistent with the aim to develop a hydrogen economy in Aberdeen including hydrogen storage/grid balancing and production of green hydrogen through connection to renewables. The Hydrogen Strategy helps to fulfil the aims of the Regional Economic Strategy and contributes to local air quality improvement and climate change targets through reduction of emissions.

8. **Fuel Cell Vehicles/Electric Vehicles** — with car club partner "Co Wheels", additional electric vehicle Charge point network continues to expand. Charging infrastructure has a further 11 charging points becoming available in Aberdeen in 2017, and 2 further rapid recharging points installed in 2018.

National Frameworks

The Council works in close collaboration with Scotland Excel (centre of procurement expertise for the local government sector in Scotland) http://www.scotland-excel.org.uk/home/Resources/Publications.aspx. Sustainability criteria is aligned to the Scottish Sustainable Procurement Action Plan which takes a holistic view of the social, economic and environmental implications of product and service choices.

- **Asbestos** hazardous waste requires specialist landfills. Suppliers only able to direct minimal waste to landfill. Commitment to reducing carbon footprint, producing survey reports electronically and use of Euro 5 and 6 emission standard vehicles + commitments to reuse, recycle and reduce waste.
- **Building and Timber materials** per UK Government Timber Procurement Policy only use legal and sustainable timber used.
- Catering Sundries range of reusable/recycled products, packaging assisting councils to reduce waste. Euro VI engines in delivery vehicles.
- **Domestic Furniture and Furnishings** reuse options on key items. Supports transition to a circular economy ... environmental impacts of deliveries minimised.
- **Electrical Materials** meet the Government Buying Standards for energy efficiency ratings (per DEFRA)
- Energy Efficient Contractors for services/works required across Scotland's Energy Efficiency Programme (SEEP)
- Engineering and Technical Consultancy –Environmental Impact Assessments, Environmental Surveys, Noise & Vibration, Water Quality, Ecology & Biodiversity Studies, Habitat Surveys, Air Quality and Landscape Architecture
- **Frozen Foods** effective route planning, fuel efficiency and dual temperature vehicles to minimise deliveries. 2% increase in sustainably sourced products
- **Groceries and Provisions** reduced food waste including demand planning systems and forecast accuracy models, tasking supply chains to reduce case/pack sizes, food waste passed to local farmers as animal feed.
- Vehicle Purchase Framework supports Clean and Energy Efficient Vehicles Directive 2009-33-EC flexibility for sustainable vehicle procurement
- **Janitorial Products** reduce waste through products and processes improvements. Paper products 100% recycled.
- Plumbing and Heating Materials meet the Government Buying Standards
- Recycle/Refuse Containers maximise recycling opportunities through bin refurbishment and takeback schemes. Redundant bins treated to produce new products. Environmental credentials demonstrated through investment in production efficiencies to reduce emissions/increase use of recycled materials.
- Road Maintenance Materials- reduces environmental impact, including fleet reviews, raw material reviews and product recycling.
- **Roadstone** initiatives to reduce the impact to the environment sustainable methods of recycling/disposing of products at the end of life reduced vehicle emissions.
- Street Lighting Materials compliance with W.E.E.E. directive emphasis on recyclable materials and end-of-life disposal. Lighting columns/projection brackets meet standards for 50 years min carbon neutral columns
- Street Lighting Bulk Renewal of Luminaires allows for accelerated LED replacement converting to LED luminare = 50% reduction in energy usage compared to traditional lights.

- Trade Materials (ironmongery, trade tools, paint) reduced vehicle emissions/energy use, materials recycling, community schemes to use leftover paint - waste reduction through innovative packaging
- Tyres re-used or recycled, retreads, re-cycling as fuel for use in cement kilns and as planters for community projects. Euro V emissions plans to upgrade older vehicles –efficient route planning to minimise road miles.

Utilities (Scottish Procurement)

- Electricity Promoting greener power: addresses emissions from energy use mitigation through a range of energy efficiency measures, access to renewable generation sources promoted and opportunities to sell energy back to the grid.
- Natural Gas sustainable measures and energy performance guarantee option to ensure a range of energy conservation measures.

• 5c - Supporting information and best practice

In the reporting period, C&PSS has continued to develop the themed approach to community benefits. The approach provides procurers and suppliers with a clear, compliant, ideas-driven framework to work within. In the reporting period, a definitive list of 14 community benefit types has been developed to ensure meaningful, proportionate and relevant community benefits are incorporated and maximised. Considerable care has been taken to ensure that community benefit requirements do not inadvertently create discrimination contrary to treaty principles and that proposals can be evaluated fairly on a "like for like" basis. The list of 14 benefits complements the table of themes referenced in previous returns.

During the reporting period, there has been increased incorporation of meaningful community benefits promoting the Council's leadership role, climate change duties and a general obligation to co-operate as required.

Community Benefit Clause Example

"In accordance with Scotland's Climate Change Declaration, local authorities are expected to assume a leadership role at a local level in terms of responding to the challenges presented by climate change.

The Council will not require any information not already routinely produced by the Bidder. However, Bidders are strongly encouraged to volunteer good practice and co-operate with The Council in terms of environmental/emissions/climate performance levels and any measures (e.g. production processes and methods at any stage of the life cycle of the works) that serve to reduce harmful emissions during the life of the contract, demonstrate good practice in terms of sustainability/waste water standards/accreditation etc.

Requirement: As and when called upon to do so, co-operate with the Council in terms of Climate Change reporting."

Draft Construction Charter

In the reporting period, the Council developed a draft Construction Charter reflective of local/national priorities, compliant with the current legal framework.

The Construction Charter aims to communicate standards and aspirations concisely to Bidders. The Charter aims to encourage contractors to exceed basic legal compliance but is not intended to be disproportionately onerous on smaller, more recently established local employers working in the sector. The Draft Construction Charter is split into five distinct areas: i) Fair Work Practices including "Real" Living Wage ii) Health and Safety iii) Responsibilities to the Community iv) Responsibilities to the Environment and v) Sustainability and Community

Benefits. CE Marking in all construction materials, Modern Slavery/ human trafficking and meaningful environmental credentials is covered and the Considerate Contractor's Scheme.

Effective Collaboration/Partnership Working

C&PSS has strengthened close partnerships with community planning partners, local third sector interface organisations and Senscot in order to raise awareness of and capability within the 3rd sector re sustainable procurement/community benefits.

Closer ties with the 3rd sector will identify areas where there might be an active role for community planning partners; 3rd sector organisations and our communities to shape, support or deliver requirements. The Councils' approach to community benefits relies on identifying potential sources of financial and practical support to assist suppliers in the delivery of social value. If this converges with the social purposes of a 3rd sector organisation (including supported businesses) or the interests of a community group, a key objective is to engage early and make this information available to bidders.

This approach ensures that as far as possible, social value is aligned to community priorities. If social/economic value can be supported by the 3rd sector, this allows increased scope for procurers and suppliers to address "environmental wellbeing".

Sustainable Food City Partnership Procurement Group

C&PSS is an active participant in the above subgroup of the Sustainable Food City Partnership Aberdeen (SFCPA), driving its work around sustainable food procurement.

Partners include representatives from: Aberdeen City Council; NHS Grampian; University of Aberdeen; Robert Gordon University and Sport Aberdeen.

The group advocates for change at national level, shares best practice and furthers the overarching aims of the SFCPA: 1 Promoting healthy and sustainable food to the public 2 Tackling food poverty, diet-related ill health and access to healthy food 3 Building community food knowledge, skills, resources and projects 4 Promoting a vibrant and diverse sustainable food economy 5 Transforming catering and food procurement and 6 Reducing waste and the ecological footprint of the food system.

The group aspires to localise the Scottish Government's expectations in terms of making Scotland a "Good Food Nation" not only in what we as a nation produce but in what we buy, serve and eat. Public expenditure on food has the potential to unlock benefits for community health, wellbeing and social justice through access to good nutrition including access to fresh and seasonal produce; markets, employment and training opportunities in this key sector where there are a high number of SMEs.

It is recognised that Scotland produces some of the highest quality food and drink available although the people of Scotland have one of the poorest diet-related health record globally. Contracting authorities have opportunities to implement a food policy that is integrated into overall strategy affording a wide range of benefits to the people of Scotland by promoting a healthier, more resilient and sustainable food system which is accessible and affordable to all, and uses the power of public spend to deliver genuine public value in purchasing.

Food for Life Bronze Accreditation Award

In partnership with the SFCPA, C&PSS secured bronze accreditation recognition under the "Food for Life" Scheme

SECTION 6 – VALIDATION AND DECLARATION

• 6a – Internal validation process.

Representatives from the Council's Environmental Policy team collated the information to populate the Climate Change Report template. The information was gathered across multiple service areas. It is expected that those service areas have provided accurate data and have gained verification of this by their senior management. The Climate Change Report is checked by the Environmental Policy team that all areas have been completely where reasonably practicable to do so.

• 6b – Peer validation process

Senior management have been asked to validate information provided by relevant Officers. The following information has been validated in this way.

- Adaptation
- o Car club
- Trade waste
- o Domestic waste
- Street Lighting
- o Procurement
- o Co-Wheels
- o Travel
- Fleet

It is anticipated that further engagement will take place to ensure full corporate validation from Chief Officers in future. This will also allow the information gaps present in the current report to be filled and identify areas for improvement.

The Climate Change Report 2017/2018 would be submitted to the City Growth and resources Committee on the 27th of November for Approval. During the committee reporting process consultation is undertaken with all stakeholders involved for final comments and suggestions.

• 6c – External validation process

The Climate Change Report 2017/18 has not undertaken any external validation due to time and resource constraints.

• 6d – No validation process

Not applicable.

• 6e - Declaration

Angela Scott, Chief Executive