North Yorkshire County Council

Business and Environmental Services

Executive Member for Open to Business

28 February 2023

Report of the Assistant Director - Travel, Environment and Countryside

Request to bid for Net Zero Living 'Fast Followers' Fund for a 'decarbonisation of waste programme'

1.1 Purpose of Report

- 1.2 To request approval from the Executive Member for Open to Business to authorise the submission of an application by NYCC for grant funding of up to £300K covering two financial years 2023/24 and 2024/25 to the Net Zero Living Fast Followers Fund.
- 1.3 If the application is successful, delegation be then for acceptance of the funding, subject to acceptable Memorandum of Understand and terms and conditions being reviewed.

2.0 Background Information

- 2.1 Innovate UK is the United Kingdom's innovation agency, which provides money and support to organisations to make new products and services. It is a non-departmental public body operating at arm's length from the Government as part of the United Kingdom Research and Innovation organisation.
- 2.2 The new funding programme from the Innovate UK provides support of up to £300K over two years to local authorities, their partners and communities to overcome non-technical systemic barriers to the scaling and adoption of net zero solutions. These include:
 - financing
 - capacity, capability and skills
 - consumer engagement and behaviour change
 - policy and regulation
 - system governance
 - common data standards for open source and interoperability
 - ability to influence strategic grid reinforcement,
- 2.3 The Fast Followers awards aim to equip local authorities with the experience and skills to overcome non-technical barriers and help to accelerate progress towards net zero. The programme will fund up to 20 Fast Followers. The awards will be used to fund a resource within each Local Authority over an 18-24 month period which includes both officer and funding to pilot new ideas. The officer post will be recruited to either as a secondment or on a fixed term contract. The officer will form part of a Net Zero Living innovation cohort; have access to training and resources provided by Innovate UK and partners and apply these skills to turn their ambitions into deliverable plans. Applications are made via an online portal and the closing date for submissions is 11am on 1 March 2023.
- 2.4 The North Yorkshire Council Climate Change Strategy Consultation Draft is currently out for public consultation. The Draft document includes:

- increase access to 'alternative fuels' for vehicles. Implement the NYCC EV Charging Strategy, investigate the feasibility of green hydrogen and other low carbon fuels as technology develops
- we will investigate how NYC Assets such as land and buildings can best be used to generate low carbon energy to 'offset' Council carbon emissions. This includes opportunities at the jointly owned assets Energy From Waste plant and closed landfill sites, and for vegetation management and food waste for Anaerobic Digestion.

3.0 Decarbonising Waste Collection and Disposal

- 3.1 Waste management is a resource intensive service, particularly in a rural county where distances travelled by residual and recycling collection vehicles are high. Local Government Reorganisation brings the opportunity to implement consistent collection and disposal to gain efficiencies both for the customer and for the Council.
- 3.2 Residual waste is collected from across North Yorkshire and taken to Allerton Waste Recovery Park (AWRP) for processing. After recyclates and organic materials have been extracted, the remaining residual waste is incinerated in an Energy from Waste facility which generates heat and power. Currently the electricity is sold to the National Grid and the heat is underutilised. Approximately 70 refuse vehicles visit the site on a daily basis.
- 3.3 Decarbonising both the AWRP and the vehicles that transport waste to the site is technically possible, but extremely challenging due to the technological change required, systems change and the costs to deploy. The proposed programme for the 'Fast Followers' fund is to investigate the business plan options and address barriers for generating low carbon fuel sources on site, either as biomethane or green hydrogen. This would be predominantly to use as a transport fuel for residual and recycling waste vehicles as an alternative to fossil fuels, but the options for income generation will also be explored. Potential co-benefits include improved energy security, releasing grid capacity for other renewable energy sources at the sub station currently utilised and implications for the Emissions Trading Scheme for which the Energy from Waste facility will be liable in future.

3.4 The non-technical barriers include -

- Knowledge: Review of Government policy regarding hydrogen and biomethane as transport fuel and of academic research and current use
- Skills required to install, service and maintain low carbon fuels generation and storage on site and for vehicles utilising the fuel.
- Financial review; short medium and long term costs and for capital and revenue development and potential for income generation and raising finance.
- Regulation regarding the production and storage of hydrogen and biomethane and development control requirements and costs, including planning requirements.
- Contract requirements for long term waste treatment
- Governance arrangements required for the generation and use of low carbon fuels
- Community and citizen engagement to understand public perception regarding the use of hydrogen and biomethane as transport fuels
- 3.5 It may be possible, once the market analysis has been undertaken, to extend this concept to the closed landfill sites and waste transfer stations and to investigate the use of renewable energy to generate green hydrogen for similar purposes.

3.6 It is anticipated that a programme steering team will be established to oversee the programme which will include both NYCC officers and external stakeholders including representatives from the York and North Yorkshire Local Enterprise Partnership and Allerton Waste Recovery Park management.

4.0 Risks

- 4.1 This is a relatively low risk project. These include:
 - a. Recruitment of an officer to undertake the role for NYCC and also to join the 'Fast Followers' cohort by 1 July 2023 is an essential time dependent element. A job description will be prepared in advance of funding award to ensure that recruitment process is efficiently progressed, and permission is given by the funder to recruit a consultant if required to fill the gap prior to an officer commencing in post
 - b. **Procurement** it is anticipated that procurement of subcontractors will be required to deliver feasibility research outcomes for each of the non-technical barriers identified. Sufficient project planning will be required to ensure this can be completed within the required timeframes.
 - c. **Capacity** the fund will provide funding for an officer to lead this project. However, additional capacity of a steering team will be required to support this work and ensure that the outcomes are met, and the skills are embedded within the Council. The grant funding can cover existing posts that are committed to the management of the project.
 - d. **Financial** –The grant covers 100% of costs and claims are made monthly in arrears. Budgets may be moved between headings after grant approval as the project develops utilising a change mechanism.
 - e. **Reputational –** The project will seek to open up a new area of technology innovation for the Council to support its decarbonisation ambitions. Citizen engagement will be included as part of the non-technical barriers to bringing forward this technology solution.

5.0 Financial Implications

5.1 The bid will be for up to £300,000 revenue for a two year period from grant offer. There is no requirement for match funding for this application. Financial Services support will be required to support the management of quarterly claims in arrears to Innovate UK and to ensure NYCC financial procedures are followed.

6.0 Legal Implications

- 6.1 There are no legal implications arising from the submission of an outline application for grant funding from the Fast Followers programme.
- 6.2 If the bid is successful, acceptance of the funding may require NYCC to enter into a Memorandum of Understanding or other formal grant agreement. Any legal agreement required to be signed, will be reviewed by Legal Services and if any of the terms and conditions present unacceptable risk for the Council then the grant offer would be declined.

7.0 Climate Change Implications

7.1 A climate change impact assessment is attached at Appendix A. The bid will support NYC draft climate change ambitions as outlined in 2.4 above.

8.0 Equalities Implications

8.1 An equalities screening assessment has been undertaken and is attached at Appendix B. No equalities issues are raised by the decision to submit an application for funding for this programme, and it is concluded that a full Equalities Impact Assessment is not required.

9.0 Conclusion

9.1 The chance to apply to the Fast Followers programme provides NYCC with a great opportunity to take forward an area of work which would not otherwise have resource attached to it. It will enable waste decarbonisation to take a great stride forward in terms of taking feasibility concepts to the investment grade business plan level.

10.0 Recommendation

- 10.1 To request that the Executive Member for Open to Business:
 - i. Authorises the submission of an application by NYCC for grant funding of up to £300K covering two financial years 2023/24 and 2024/25 to the Net Zero Living Fast Followers Fund in consultation with the Corporate Director Business and Environmental Services and Corporate Director Strategic Resources and:
 - ii. If the application is successful the Executive Member, after consultation with the Corporate Director Business and Environmental Services and the Assistant Chief Executive (Legal & Democratic Services) authorises the Corporate Director Strategic Resources to accept the funding.

MICHAEL LEAH
Assistant Director – Travel, Environmental and Countryside

Author – Jos Holmes, NYCC Climate Change Policy Officer

Background papers relied upon in the preparation of this report: <u>Competition overview - Net Zero Living: Fast Followers - Innovation Funding Service (apply-for-innovation-funding.service.gov.uk)</u>



Climate change impact assessment

The purpose of this assessment is to help us understand the likely impacts of our decisions on the environment of North Yorkshire and on our aspiration to achieve net carbon neutrality by 2030, or as close to that date as possible. The intention is to mitigate negative effects and identify projects which will have positive effects.

This document should be completed in consultation with the supporting guidance. The final document will be published as part of the decision making process and should be written in Plain English.

If you have any additional queries which are not covered by the guidance please email beyond.carbon@northyorks.gov.uk

Version 2: amended 11 August 2021

Please note: You may not need to undertake this assessment if your proposal will be subject to any of the following:

Planning Permission

Environmental Impact Assessment Strategic Environmental Assessment

However, you will still need to summarise your findings in the summary section of the form below.

Please contact beyond.carbon@northyorks.gov.uk for advice.

Title of proposal	Request to submit application for Innovation UK Net Zero Living Fast Followers programme - Decarbonising waste collection and disposal		
Brief description of proposal	To indicate proposed project for submission to the above fund		
Directorate	Business and Environment		
Service area	Environment		
Lead officer	Jos Holmes		
Names and roles of other people involved in			
carrying out the impact assessment			
Date impact assessment started	14.02.23		

Options appraisal

Were any other options considered in trying to achieve the aim of this project? If so, please give brief details and explain why alternative options were not progressed.

A discussion at officer level has been held regarding the potential projects that NYCC could submit given the timescale and priorities.

What impact will this proposal have on council budgets? Will it be cost neutral, have increased cost or reduce costs?

Please explain briefly why this will be the result, detailing estimated savings or costs where this is possible.

The project will be fully funded by the grant. It will investigate the business plan options to bring forward low carbon fuels generation for use by residual waste vehicles and the potential impact on Council budgets.

How will this proposal impact on the environment? N.B. There may be short term negative impact and longer term positive impact. Please include all potential impacts over the lifetime of a project and provide an explanation.		Positive impact (Place a X in the box below where	No impact (Place a X in the box below where	Negative impact (Place a X in the box below where	Explain why will it have this effect and over what timescale? Where possible/relevant please include: • Changes over and above business as usual • Evidence or measurement of effect • Figures for CO ₂ e • Links to relevant documents	Explain how you plan to mitigate any negative impacts.	Explain how you plan to improve any positive outcomes as far as possible.
Minimise greenhouse gas	Emissions from travel	X			Projects outlined include move to low emission vehicles		
emissions e.g. reducing emissions from travel, increasing energy efficiencies etc. Emiss from constr Emiss from runnin	Emissions from construction		X				
		X			This will review the use of waste heat to contribute towards low carbon heating of the AWRP buildings		
	Emissions from data storage		X				
	Other		X				
Minimise waste: Recrecycle and compost reducing use of single	e.g.	X			The Decarbonising Waste Management proposal will outline options for decarbonising the collection and disposal of waste and for the reuse of heat and power resources		

How will this proposal impact on the environment? N.B. There may be short term negative impact and longer term positive impact. Please include all potential impacts over the lifetime of a project and provide an explanation.	Positive impact (Place a X in the box below where	No impact (Place a X in the box below where	Negative impact (Place a X in the box below where	Explain why will it have this effect and over what timescale? Where possible/relevant please include: • Changes over and above business as usual • Evidence or measurement of effect • Figures for CO ₂ e • Links to relevant documents	Explain how you plan to mitigate any negative impacts.	Explain how you plan to improve any positive outcomes as far as possible.
Reduce water consumption		Χ				
Minimise pollution (including air, land, water, light and noise)	Х			The proposal includes the transition to low emission vehicles which will reduce air pollution.		
Ensure resilience to the effects of climate change e.g. reducing flood risk, mitigating effects of drier, hotter summers	Х			The project will test the feasibility of producing transport fuels thereby improving resilience of supply chain.		
Enhance conservation and wildlife		Х				
Safeguard the distinctive characteristics, features and special qualities of North Yorkshire's landscape		X				
Other (please state below)		X				

Are there any recognised good practice environmental standards in relation to this proposal? If so, please detail how this proposal meets those standards.

The proposals will identify existing best practice from academic institutions and real lived experiences.

Summary Summarise the findings of your impact assessment, including impacts, the recommendation in relation to addressing impacts, including any legal advice, and next steps. This summary should be used as part of the report to the decision maker.

The proposals are aimed at reducing emissions to contribute towards the Y&NY Routemap to Carbon Negative ambitions.

Sign off section

This climate change impact assessment was completed by:

Name	Jos Holmes
Job title	NYCC Climate Change Policy Officer
Service area	Waste
Directorate	Business and Environment Services
Signature	Michael Leah
Completion date	20.02.23

Authorised by relevant Assistant Director (signature): Michael Leah

Date: 20.02.23

Initial equality impact assessment screening form

This form records an equality screening process to determine the relevance of equality to a proposal, and a decision whether or not a full EIA would be appropriate or proportionate.

Directorate	BES
	_
Service area	Environment
Proposal being screened	Bid for Net Zero Living Fast Followers Fund
Officer(s) carrying out screening	Jos Holmes
What are you proposing to do?	Bid for funding to investigate opportunities for generating low carbon fuel sources for residual waste vehicles at Allerton Waste Recovery Park and Seamer Carr
Why are you proposing this? What are	To reduce greenhouse gas emissions and improve
the desired outcomes?	fuel security
Does the proposal involve a	We are bidding for £300,000
significant commitment or removal of	
resources? Please give details.	

Impact on people with any of the following protected characteristics as defined by the Equality Act 2010, or NYCC's additional agreed characteristics

As part of this assessment, please consider the following questions:

- To what extent is this service used by particular groups of people with protected characteristics?
- Does the proposal relate to functions that previous consultation has identified as important?
- Do different groups have different needs or experiences in the area the proposal relates to?

If for any characteristic it is considered that there is likely to be an adverse impact or you have ticked 'Don't know/no info available', then a full EIA should be carried out where this is proportionate. You are advised to speak to your Equality rep for advice if you are in any doubt.

Protected characteristic	Potential	Don't know/No	
	Yes	No	info available
Age		Х	
Disability		Х	
Sex		Х	
Race		Х	
Sexual orientation		Х	
Gender reassignment		Х	
Religion or belief		Х	
Pregnancy or maternity		Х	
Marriage or civil partnership		Х	
People in rural areas		x	
People on a low income		Х	
Carer (unpaid family or friend)		Х	
Does the proposal relate to an area where there are known inequalities/probable impacts (e.g.	No		
disabled people's access to public transport)? Please give details.			

Will the proposal have a significant effect on how other organisations operate? (e.g. partners, funding criteria, etc.). Do any of these organisations support people with protected characteristics? Please explain why you have reached this conclusion.	No			
Decision (Please tick one option)	EIA not		Continue to	
	relevant or	√?	full EIA:	
	proportionate:			
Reason for decision	This is a feasibility study where the outcome is not			
	likely to impact on individuals.			
Signed (Assistant Director or	Michael Leah			
equivalent)				
Date	20.02.23		_	