

Transition to Net Zero Carbon Resilient Economy

West Yorkshire Economic Recovery Board

June 2020



Summary

This proposition aims to ensure the recovery maximises the economic, social and environmental benefits that our transition to a net zero carbon economy can offer. It asks for £193m to support spade-ready low carbon and flood alleviation schemes, the development of a pipeline of zero carbon and nature recovery schemes, a new net zero carbon skills partnership and pilot workforce fund and a range low carbon business support projects. All will help protect existing jobs, businesses and communities; create new jobs, skills / retraining opportunities and new businesses; and help us tackle the Climate Emergency.

Background and context

Net Zero Carbon by 2038, with significant progress by 2030

The Combined Authority and the LEP are working alongside a wide range of partners to ensure the Leeds City Region is a net zero carbon economy by 2038 at the latest, with significant progress by 2030. We are also committed to everybody in the City Region being within easy reach of an outstanding and well used network of green and blue infrastructure that helps reduce carbon emissions, reduces flood risks and prepare us for a changing climate and supports health, the economy, the environment and a superb quality of life (Leeds City Region Green and Blue Infrastructure (GBI) strategy and Delivery Plan 2018).

Energy and GBI Delivery plans are in place to help achieve these ambitions. Some great projects are already being delivered including the Resource Efficiency Programme, Energy Accelerator, Better Homes Yorkshire, Clean Bus Technology Fund, Stourton low energy park and ride, and the Ultra Low Emission Capital Grant Scheme. This work starts the transition to net zero carbon. However, to meet our target and to comply with the Paris Agreement, emissions must be reduced by 14.5% year-on-year and halved every five years, saving 11 million tonnes of carbon dioxide emissions by 2038. We also need to prepare and build resilient businesses and communities as our climate changes.

Meeting this challenge is massive and will require urgent and collaborative action across all sectors of our economy. However, it will also empower our region to build a modern, sustainable economy supported by an efficient zero emission transport network and world class infrastructure. It will allow us to embrace new technologies such as hydrogen power improve the energy efficiency of our homes and other buildings, and upskill our people so they can excel in the careers of the future and create a thriving low carbon business sector. We will also have resilient communities at less risk from a changing climate, cleaner air, great access to high quality green spaces and healthier communities.

The Benefits of Tackling the Climate Emergency

There are a wide range of economic benefits that can be achieved if we tackle the climate emergency, and we want to maximise these benefits for our economy and local communities. We know we can create new jobs, skills and retraining opportunities, new markets and business opportunities, and if we were to deliver all our actions in the current City Region Energy Delivery Plan we could create **up to 100,000 more jobs and £11 billion- plus increase in annual economic output** (Carbon Trust 2018).

The Covid-19 crisis has had a range of impacts, both positive and negative, on the environment and tackling the Climate Emergency. Air quality has improved due to the reduction in road transport, people are walking and cycling more, people are connecting with nature and using their green spaces more, nature is recovering, and our energy consumption has reduced. It is likely that there will have been some temporary reduction in carbon emissions associated to lockdown. However, there is currently no live data available to confirm this. It is estimated that global carbon dioxide emissions fell by an average of about 17% in early April. As lockdowns are eased, the fall for the whole year is estimated to be between 4-7% compared to 2019. If emissions worldwide remain at this level until the end of the year, this annual drop would be comparable to amount of annual emission reductions needed year-on-year across decades to achieve the climate objectives of the UN Paris Agreement.

However, Covid-19 gives rise to new threats to delivering our zero-carbon goal. Measures to protect public health inevitably will affect the ability to deliver some climate measures (e.g. continued social distancing will hinder a movement towards public transport, and some low-carbon investments will be delayed). Short-term choices aimed at recovery, if poorly targeted, could also lock in higher emissions in the long-term.

This illustrates the huge challenge ahead of us in reaching the climate objectives internationally and locally in the City Region, whilst also recovering from the Covid-19 crisis. We have a long way to go, and it is a transition. This proposition is only part of the City Region's current and future plans to tackle the Climate Emergency. To fully achieve a net zero carbon economy by 2038 we will require system level changes and billions of pounds of investment.

The Offer in West Yorkshire

Accelerating the Zero-Carbon Transition to Support Economic Recovery

The steps that the region takes to rebuild from the Covid-19 pandemic and its economic damage can also accelerate the transition to low-carbon activities and improve our climate resilience. Climate investments can support the economic recovery and secure good jobs for the long term including **delivering 42,000 jobs in West Yorkshire rising to 71,291 by 2050** (LGA 2020). We can also develop opportunities from our emerging clean growth sectors such as clean low carbon transport, clean agri-tech, construction and circular economy. There is a unique opportunity to explore here in West Yorkshire.

There is strong evidence that many actions can be delivered quickly and have high economic multipliers (i.e. they in turn stimulate further boosts to economic activity), create high numbers of jobs (good and highly skilled), and boost spending in the UK. In the long term, a transition to a low-carbon, efficient and resilient economy will bring productivity benefits throughout the economy (Committee on Climate Change 2020).

Great collaborations

We also have a strong record of delivering integrated and aligned low carbon and flood resilience investment by working in partnership. This allows us to leverage our public and private local assets to deliver innovative schemes with strong value for money.

Unique Challenges and Opportunities

West Yorkshire also has some unique challenges and opportunities in tackling the climate emergency:

- Emissions are not falling at the rate we need them to. We can meet our target but we will have to be hugely ambitious in areas such as housing retrofit, the amount of land allocated to tree planting, generating a higher amount of electricity from large-scale solar farms, maintaining the levels of remote working seen throughout the Covid-19 pandemic, and providing funding / R&D support for innovative emission reduction technologies.
- c11m tonnes of carbon emitted annually, with 1m tonnes is produced by energy intensive industry in West Yorkshire. In North and West Yorkshire over 182,000 people are employed in this industry and its value is £9.2 billion in GVA. In addition, there is an emerging clean growth sector that could support over 40,000 jobs by 2036 (Clean Growth Audit 2019).
- A range of inefficient, hard to treat housing stock and high levels of fuel poverty
- Over 63,000 homes and more than 27,000 businesses at some degree of flood risk, of which 7,385 homes and 4,698 businesses have a high risk of flooding
- Less than 17 percent of City Region's blanket bog peatlands are in good condition
- Urban area with tree cover is lower than the national average of 10%
- Areas of deprivation with poor access to green and blue spaces
- City centres with a range of poor air quality and health related issues.

This offer focuses on addressing these unique challenges and proposes actions to start to address them and boost economic activity as part of our region's recovery. In some areas there is even the potential for the region to be leading the rest of UK. This is just the first initial ask as we will need much greater future levels of grant funding and finance to deliver our net zero carbon ambition by 2038, with significant progress by 2030.

Transition to Net Zero Carbon Resilient Economy Programme

In the Rescue stage, our programme will:

1. Capitalise on pro-environmental behaviours:

- Programmes that support walking and cycling initiatives – see Transport Plan
- Homeworking - See Digital proposition

2. Accelerate shovel ready tackling the climate emergency programmes:

- Deliver £50m of energy efficiency schemes improving 3500 homes and over 150 public buildings between 2020 - 2022.

3. Develop an initial pipeline of zero carbon and other nature recovery schemes

- £680,000 to develop a regional pipeline of climate / nature recovery investments and investment ready propositions by 2022 at the latest. Once complete this will result in investment ready propositions capable of attracting / applying for a range of funding sources to deliver the pipeline.
- The initial pipeline is likely to include to tackle: retrofit energy efficiency and zero-carbon homes and buildings, tree planting, peatland recovery, nature recovery,

flood alleviation (including Yorkshire Water projects), climate resilience, low carbon and energy generation (including opportunities to work with Northern Gas Networks and Northern Power Grid to develop Local Energy Action Plans and associated infrastructure) and zero emissions transport (see Transport plan).

- Whilst it is difficult to estimate the value of a new robust pipeline that can attract future investment, a similar pipeline that has been delivered through the region's Energy Accelerator resulted in the development of 15 projects worth over £100m.

4. Local Towards Net Zero Carbon Skills (STEM) Partnership (see below)

- Bringing together partners from education, skills and employers to assess needs to support the development of future skills and jobs required for a net zero carbon economy and to ensure a just transition for jobs at risk from decarbonisation.
- Coordinating a programmes of careers and inspiration activities with employers to raise awareness of the importance of STEM skills and to address the future demand for green jobs. To offset the gender stereotypes embedded by the age of 7 this activity would be for Early Years, primary and secondary aged students and their parents, carers and teachers.
- Working with SMEs to identify skills requirements and opportunities to retrain / upskill the existing workforce.

In Recovery / Re-imagining stage, our programme will:

1. Commence delivery of the pipeline and attract investment

2. Deliver £131.1m of flood alleviation schemes

3. Develop a Towards Net Zero Carbon Skills programme to support the pipeline (including Just Transition) and the wider plans to tackle the climate emergency, with a 'Workforce Fund' pilot in 2022 (£10m)

- Address locally identified skills gaps; supporting employers to recruit to hard to fill vacancies requiring specialist STEM skills
- Improve engagement between employers and training providers; building capacity to co-design & co-deliver training which can be sustainable
- Support West Yorkshire residents to enter/retrain into skilled digital jobs and progress their careers through gaining good quality work
- Diversify the net zero carbon jobs talent pipeline by embracing new methods of recruitment and flexible ways of delivering training
- This is similar to GMCA Digital Skills pilot and dependent on identifying the needs in year 1.

4. Develop a 3 year business opportunities and support programme to maximise the economic opportunities from tackling the Climate Emergency

- £750k top up funding to widen the support offered through Re-Biz to over 150 businesses
- £255k for resource to support carbon intensive businesses and supply chain development
- £300k Covid-19 gap funding support

Ask of Government

Activity	Ask
Stage 1 (Rescue) - 0-12 months	
Deliver over 25 Low Carbon Accelerated schemes between 2020 – 2022 <ul style="list-style-type: none"> 3500 domestic energy efficiency retrofit programmes 150+ public estate energy efficiency retrofit programme. 	£50m
Develop an initial pipeline of low carbon / climate investments and create an implementation plan (investment proposition within 2yrs); and including	£200k
Deliver the Great West Yorkshire Bog – Pre-feasibility support (Moors for the Future Partnership (MFFP))	£400k
Support the development of the White Rose Forest Delivery Pathway	£80k
Establish the Towards Net Zero Carbon Skills (STEM) Partnership	See below
Stage 2 (Recovery / Reimaging) – Year 2 onwards	
Deliver an initial pipeline of low carbon/ climate investments and create an implementation plan/ investment proposition (2yrs)	n/a
Fund 27 flood alleviation schemes and a NFM programme from 2021 (6years); and	£126.1m
6 Yorkshire Water Programmes	£5m
Develop a skills programme to support the initial pipeline and wider Tackling the Climate Emergency plan, including developing a Just Transition approach and to establish a partnership and pilot (2 yrs)	£10m
Deliver a green, net zero carbon business support package of measures (3 years) including: <ul style="list-style-type: none"> £750k Green business top up funding to widen the support offered through Re-Biz to over 150 businesses in 3 years £255k for 1 x ft officer for 3 years to support energy and carbon intensive businesses + supply chain development £300k Covid-19 gap funding support 	£1.3m
TOTAL (excluding flooding & energy efficiency capital schemes)	£193.1m