

Chief Executives' Group – North Yorkshire and York

8 February 2018

Briefing note: YNYER LEP - Energy Strategy work update January 2018

1.) Energy Strategy

Work stream 1: Establish a robust energy baseline

Final report now available.

Work stream 2: Technology options appraisal

Final report now available.

Work stream 3: Energy opportunity areas.

This work stream will identify and spatially map current energy assets and energy resources as well as network constraints in the LEP area. It will assess opportunities for developing new renewable / low carbon energy infrastructure and nationally significant infrastructure projects (NSIPs), including transport, as well as replacement and substitution opportunities of current assets / infrastructure, and barriers to implementation. Sources of finance to support the development of opportunities will be included.

This area of work is currently under review.

Work stream 4: Energy Strategy

The work will develop regionally specific energy and carbon accounts that review baseline trends and evaluate the economic case for investment in a range of cost and carbon effectiveness of options. Work currently carried out by the University of Leeds includes:

- **Baseline analysis:** collection of baseline data and assessment of trends (energy, economy, population, housing, transport, infrastructure, etc.) back cast to the baseline year and forecast to 2036, leading to a 'business as usual' baseline and relevant scenarios / sensitivities.
- **Options appraisal:** Assessment of options – identification of all energy and low carbon measures that could potentially be applied in the region, with assessment of performance and costs and benefits of each measure over their lifetime.

Workshop 1 took place on 18th December '17 to assess a provisional list of options and to identify relevant data sources. Discussions included:

- Spatially, focus on the LEP area (both aggregated and disaggregated to local authority areas) plus the city of Hull.
- Focus on micro (e.g. household, building or firm level) and meso (e.g. distributed and embedded generation) rather than macro (e.g. large scale energy generation) options.
- Evaluate available energy and low carbon options, but also flag 'horizon ideas' that will be needed to close gap between forecast and target emissions levels.
- Consider and at least flag the significance of land-use issues, although cost and carbon evaluation of land-use related options outside of project scope.
- Pay particular attention to rural areas and villages – assess economics of 'Low carbon villages'.

- Consider spatial variability of the costs of some options (e.g. proximity to network or heat source) – to be discussed with the network generator (Northern Power Grid).
- Also consider ‘pinchpoint’ areas where a network is near capacity and where demand side options or distributed generation would reduce need for investment in upgrading grid - to be discussed with the network generator (Northern Power Grid).
- Specific options to be analysed (both, under current and future conditions) at different scales: anaerobic digestion, sewage sludge advanced gasification, solar farms, hydrogen for transport, modular housing, car clubs, and energy storage.
- Different costs of house-by-house vs street-by-street retrofit to be considered (latter may be 40% cheaper?).

Workshop 2 - Assessment of the scope for deployment and of the economic case of options - refine draft outputs and direct business case analysis – is currently developed with dates in February and March being circulated.

2.) BEIS Energy Hub

BEIS has made £4.7m available to create 4 Energy Hubs in England, including a pan Northern Energy Hub, covering all 11 LEP areas of the North. The hubs are to:

- Identify and prioritise local energy projects
- Undertake the initial stages of development for priority projects and programmes (e.g. feasibility studies and business cases), up to a point where investment can be secure
- Take a collaborative and coordinated approach across multiple LEP areas.

At a meeting in November '17, BEIS outlined its pan Northern Hub Proposal to North East, Yorkshire and Humber (NEYH) LEP representatives, however, consensus could not be formed and consequently a new proposal to create two hubs (NW and NEYH hubs) was submitted to BEIS.

The NEYH Energy Hub would include Tees Valley Combined Authority, Leeds City Region / West Yorkshire Combined Authority, North East LEP, Sheffield City Region, Humber LEP and York, North Yorkshire and East Riding LEP

Tees Valley Combined Authority (TVCA) is to act as accountable body and manage the total budget of £747k over two years. The NEYH Hub will contain a core team consisting of:

- A Programme Manager
- Six local Project Managers employed directly by each LEP through a Service Level Agreement with TVCA to embed local capacity within the individual LEPs, ensure full integration and effective joint working.

Call-off contracts for specific expertise, including but not limited to financial, commercial, legal, and technical support, will be part of the support provided by the Hub.

The Programme will be overseen by the NEYH LEP Chairs; a management group consisting of officers from each LEP will meet regularly to agree:

- Recruitment of the Programme Manager and Project Managers
- Procurement of the call-off contract
- Allocation of the budget
- Projects to take forward for call-off support
- Progress management of the project managers

The group will make final recommendations to TVCA who will then enact these recommendations using the Combined Authority's assurance framework.

The NEYH Energy Hub proposal was signed off by all the Managing Directors of the six LEP areas, and submitted to BEIS who is currently reviewing the proposal. It is anticipated that the NEYH Hub will be established from March 2018.

3.) North East, Yorkshire and Humber Energy Partnership

An Energy Proposal for the use by NEYH LEP Chairs is to be presented as draft at the Chairs' meeting in March '18. The proposal will present the NEYH area as one region rather than specifying the assets of each LEP. The aim is to produce a well-designed, attractive report no longer than 10 pages focusing on major assets and investments in the North. It will use the DIT energy pitch document as a source of reference and will have central government as its key audience.

The document is likely to follow the following headings / topics:

- Forward signed by the LEP chairs outlining support for the Partnership and vision for the region.
- National challenges the region is seeking to resolve.
- LEPs' proposal to government including big proposals / projects.
- The story of the regions UK / World leading energy assets:
 - Oil, gas and LNG imports, storage and distribution for NTS
 - Conventional energy generation (gas and coal)
 - Low Carbon energy generation (large biomass, offshore wind, nuclear, both generation and investment in manufacturing capability, and import of fuel, e.g. biomass)
 - Novel fuels (biofuels, batteries, hydrogen, including crop and biomass sources)
 - Energy storage
 - Energy Intensive Industry including private wires and heat networks
 - Design engineering and supply chain for UK and global energy projects
 - Decommissioning of oil and gas assets
 - Technology development and deployment (AMRC, Offshore Wind Catapult, specific technologies developed in the region and impact, etc.)
 - Community energy, decentralised opportunities, off gas communities and national parks
- Major energy related investments which have happened in the past 5 years and UK impact.
- Investments expected in the 2020s.
- Longer term transformational projects (such as hydrogen for heating, CCS, large scale offshore wind to hydrogen, large scale energy storage, small modular reactors, lithium from sea water, interconnectors, hydrogen transport).
- Restatement of the vision and proposal.
- How LEPs will work together to maximise the impact of their assets and how this fits with other geographies such as the Northern Powerhouse, Midlands, Scotland, etc.

LEP officers are to provide TVCA, who leads on this activity, with details in line with the above headings by 29th January.