

Hull and East Yorkshire LEP Board

Report by Jonathan Oxley, HICP Manager Thursday 29th September 2022 Paper F

1. Summary

The Humber Industrial Cluster was identified by HM Government (BEIS) as the largest centre of industrial carbon dioxide (CO2) emissions in the UK – equivalent in size to the next two industrial cluster emissions added together. On the back of this, and to realise the UK Government's Net Zero ambition, UK Research and Innovation (UKRI) launched the Industrial Decarbonisation Challenge with £171M of funding to "support the development of low-carbon technologies that will increase the competitiveness of industry and contribute to the UK's drive for clean growth".

The Humber LEP and CATCH joined forces to lead a Humber-wide response to the Challenge in Phase 1 to scope the potential for decarbonisation of Humber Industry. This was well-received by UKRI, and a successful bid led to participation in Phase 2 of the Industrial Strategy Challenge Fund. Phase 2 of the Humber Industrial Cluster Plan (HICP) secured £1.7M of UKRI Innovate UK funding for Phase 2 and £0.9M of private sector funding to advance the development of a roadmap to decarbonise Humber Industry.

The private sector partners are as follows:

- British Steel
- Centrica
- Drax
- Equinor

- National Grid
- Philips 66
- SSE (Keadby)
- VPI Immingham (Vitol)

Since Phase 2 of the HICP began, five additional private sector supporters have come on board as "Strategic Observers":

- EP UK
- Harbour Energy
- Prax

- Singleton Birch
- Uniper

These companies join the HICP Steering Group as non-voting observers, but do not have any contractual financial obligations to the project (though some are committing co-funding in support of the project).

2. Recommendations

2.1. The board to acknowledge the progress made to date.



3. Report

Key Milestones and Outputs Humber Cluster Plan (HICP) will provide an evidence-based framework for identifying, understanding, prioritising and delivering the measures that will enable the Humber Industrial Cluster – the UK's largest by carbon emissions – to achieve net zero by 2040, whilst maximising strategic opportunities to drive the green recovery.

Co-developed with the active involvement of major industrial emitters and low carbon infrastructure providers, including the lead partners in the Humber's Deployment Projects (Humber Zero and Zero Carbon Humber) and other ISCF-funded initiatives, the plan will be informed by ongoing work on proposed industry-led decarbonisation investments and will have access to world-class industrial expertise. The Cluster Plan is also well-connected with decarbonisation projects which have emerged more recently, such as V Net Zero and East Coast Hydrogen.

HICP will enable a phased approach to be taken to decarbonisation – prioritising the implementation of near-term deliverable investments that will significantly reduce the Humber's emissions by 2030, mapping out how CCS, hydrogen infrastructure and other appropriate technologies can be scaled up over time, and identifying the full range of interventions required to achieve net zero by 2040.

HICP will also outline at a high level the potential for the Humber's industrial decarbonisation to support wider cross-economy decarbonisation, including clean maritime in the UK's largest ports complex, road/rail transport and decarbonisation of the gas supply (25% of the UK's supply passes through the Humber). Linked opportunities and implications for renewable energy, especially BECCS and offshore wind (both of which the Humber leads on and are integral to decarbonising industry), will also be identified.

Representation, Governance and Reporting

The HICP is a UKRI-funded (UK Research and Innovation) project, with a quarterly reporting cycle which is assessed and scored for progress against project milestones and objectives.

The Steering Group has been set-up to provide project governance and delivery of the HICP in line with the Collaboration Agreement between the lead partner (HEY LEP), CATCH and the eight other private sector partners. The HICP Steering Group comprises representatives of the project Partners within the HICP, with each Partner having one place and one vote. Industry supporters who are relevant to the Cluster but who are not signatories to the Collaboration Agreement also participate in the Steering Group as Strategic Observers. There are currently 5 Strategic Observers.

The Chair of the Steering Group is the LEP's nominated Project Director (HEY LEP COO, Teresa Chalmers), and the Vice Chair is CATCH's nominated Project Director (CATCH CEO, David Talbot).



The Steering Group is supported and advised by the Project Team, led by the Humber Cluster Plan Manager, with additional support provided by partners and independent experts as needed. UKRI and BEIS personnel may attend meetings of the Steering Group as observers.

The HICP is in month 21 of 27 and has successfully passed through six Quarterly Reviews with UKRI. The project is currently marginally behind the schedule (at submission), due to initial recruitment delays and time to realign procurement scope, but this is understood and accepted by UKRI and all partners. Successful conclusion of the project is still on target for 31-Mar-23.

The principal output of the HICP at conclusion in March 2023, will be a Cluster Plan which provides a detailed roadmap of the route to decarbonise Humber Industry by 2040. It will identify likely technologies needed, industrial emitters who need to take action, and key barriers to delivery, such as supply chain/skills issues, and regulatory and public acceptance aspects in bringing decarbonisation to life. It will also estimate likely economic impact through inward investment and job development opportunities.

The project has a successful track-record in delivery of twice-a-quarter network meetings attracting up to 120 participants, has produced a number of well-received pan-Humber Decarbonisation graphics (e.g., Humber Cluster Map) and been a key contributor to the CBI-led pan-Humber decarbonisation "prospectus" which will be launched during Autumn party conferences.

The systems model which will help shape the Cluster Plan is now reaching conclusion and has been shared with key stakeholders through a training session. Work on drawing the outputs together with other procured activity on technical aspects of decarbonisation deployment, skills, supply chain and inward investment is now well underway with lead contractor, Arup, with an early draft Cluster Plan of ca. 50 pages already extant.

Finally, the Cluster Plan work has attracted international attention from other potential industrial clusters and inward investors from Australia, Germany, Netherlands, Singapore, Switzerland, and is recognised by the World Economic Forum as an exemplar for other industrial clusters seeking to decarbonise.

4. Financial and resource implications

The most significant funding for the HICP is from UKRI as part of the Industrial Strategy Challenge Fund (£1.7M). Further funding comes from the private sector partners, mostly in the form of contributions in kind, ranging from the £357K (CATCH) to £28K (British Steel).



The HEY LEP, CATCH and British Steel all claim match funding from UKRI, whereas the remaining 7 private sector partners do not claim any match funding. The HEY LEP contribution to the HICP is fully funded by the grant from UKRI, amounting to £796K.

The HEY LEP grant predominately funds the 4 project personnel: Humber Cluster Plan Manager, Lead Analyst, Data Coordinator and Project Coordinator. These positions are for a fixed-term, coincident with the duration of the project (to March 2023). Additional support time for the COO and other LEP personnel is also included in the grant funding. Following protracted recruitment, the LEP-based team was fully in-post by 15-Nov-21.

Following resignation of the Data Coordinator (Aug-22), some repurposing of the funding for this role within the HEY LEP in service of the Cluster Plan is underway. Furthermore, the Cluster Plan Manager will be leaving the project at the end of September 2022, and discussions are in-hand to ensure the project is suitably resourced to safeguard delivery of the Cluster Plan.