

Delivering Port of Liverpool-Associated Road freight Zero Emissions (*DePoLARiZE*): Non-Technical Summary

Background

Sefton Council and Lancaster University have been reviewing the opportunities for reducing carbon emissions from freight traffic associated with the Port of Liverpool. The project is part of the government funded Net Zero Innovation Programme (NZIP), which is run by the Local Government Association together with University College London. All the NZIP projects are collaborations between local authorities and universities.

The project looked at the steps that could be taken to reduce carbon emissions from freight transport. It also tried to start conversations with some of the people and organisations that need to be involved in the process of tackling the impacts of freight transport to and from the Port of Liverpool.



What is the issue?

The Port of Liverpool is the 3rd largest port in England (by volume of freight passing through it). It handles about 34 million tonnes of cargo each year, 20Mt through the Seaforth/Liverpool side and 14Mt through the Wirral side. It is the only Port in northern England with a deep-water berth capable of handling the largest modern container ships.



Growth at the Port and the planned Liverpool City Region Freeport are expected to result in increased shipping, port operations and freight traffic. These activities all affect the area around the Port and are all mainly fossil-fuelled, contributing to carbon emissions. The key issue for this project is that the majority of this freight is moved by road to or from the Port.



The A5036, the main road link between the Port and the motorways carries more than 5000 HGV journeys every weekday, and this is set to increase. However, this road passes through a densely populated and socio-economically deprived area, causing problems with traffic congestion, noise and air quality.

In common with industries across the country, the freight sector is thinking about how it can reduce carbon emissions from its operations, mainly in relation to how it transports goods. This is becoming increasingly important but much of the freight sector does not have the capacity to make meaningful and urgent progress in reducing carbon emissions. Many freight companies are small businesses with tight profit margins and are dealing with the impacts of factors outside their control, such as Brexit and fuel price rises.

What did we do?

The project involved two main activities:

- a review of the potential practical measures for reducing carbon emissions from freight transport; and
- to explore involving stakeholders in a new way that would open up discussion of the key issues and how to address them.

The university project team reviewed the latest literature on options for reducing carbon from freight transport. A series of three on-line workshops were arranged for people and organisations in the freight industry or from the local community. The workshops provided a safe space for people who would not normally have contact with each other to meet and to discuss their shared concerns and how they might be tackled. The challenge of climate change and the findings of the review of options for reducing carbon were used to provide a context for the workshops.

What did we learn? – Decarbonization Options

The main options currently available to reduce carbon emissions from freight transport are:

- Reducing the demand for freight
- Optimising vehicle use and loading
- Increasing the efficiency of conventional freight vehicles
- Reducing the carbon content of fuel/power
- Shifting freight to low carbon-intensity modes

It was clear that there is no single option that will solve the challenge of carbon emissions and a combination of measures will be needed.

Many of the people taking part in the workshops had not previously had the chance to discuss these issues together. Everyone was very positive about the workshop process as a way of providing for future discussion. Ongoing collaboration is particularly important because resolving the complex challenges involved is not going to be possible through a business-as-usual approach where everyone just takes care of their own concerns.

What did we learn? - Workshops

The workshop discussions confirmed that a new and different approach involving all the diverse stakeholders affected is needed to make meaningful progress.

The workshops also identified that there were shared values between the people taking part, despite very different backgrounds and responsibilities, particularly in relation to:

- Environmental protection and public well-being
- Innovation, leadership inspiring others (inc. youth) & efficiency
- Community participation, teamwork and local pride & heritage
- Shared economic prosperity

These values emerged from discussion involving all the stakeholders, including the freight sector (large & small operators, the port and its tenant businesses), local government (CA and Sefton) & residents and civic groups.



What happens next?

The workshops showed that there was a willingness and commitment across different organisations and individuals to find ways to improve the way freight is transported and to reduce its carbon emissions. Some key actions that would be applicable across the freight industry were proposed to enable progress to be made:

- *Evidence and data* – better information about freight operations and their local and wider impacts is needed.
- *Innovation* – new ideas, technology and ways of working will be needed to achieve the changes that people want to see.
- *Impetus* – the current impetus to make improvements and to work together needs to be maintained.
- *Relationships* – developing new relationships between people and organisations and involving people previously excluded from the debate will be important.
- *Decision making* – the people and organisations who can influence and make decisions are key to success and need to be part of these new relationships.
- *'Obliquity'* – there are opportunities to pursue win-win interventions that approach the issue obliquely but have potential to shake up existing stasis on the issue (e.g. building adequate facilities for drivers at or near the Port).



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<https://www.ucl.ac.uk/public-policy/home/collaborate/net-zero-innovation-programme>

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