

<h1>BRIEFING</h1>	TO:	BDR Joint Waste Board.
	DATE:	06/02/25.
	LEAD OFFICER:	Paul Hutchinson BDR PFI Waste Manager 07824 350753 Paul.hutchinson@rotherham.gov.uk
	TITLE:	Potential Emissions Trading Scheme (ETS) Change in Law liability at Ferrybridge – financial implications
1. Background		
1.1	In 2023 The Department for Energy Security and Net Zero (DESNZ) announced that Energy from Waste plants (EfWs) will be brought within the scope of the existing UK Emissions Trading Scheme (UK ETS) by 2028.	
1.2	The BDR Waste Partnership currently send RDF from their PFI Waste Treatment Facility (operated by Biffa Ltd) to the Ferrybridge EfW, This Briefing Note aims to identify the potential impacts on the partnership from this change in law and provide a high-level understanding of the position, analyse the potential implications of these potential liabilities, and give an early, broad assessment of the potential financial implications of the scheme.	
1.3	A more detailed Technical note produced by Stantec for the BDR partnership is available, giving a deeper detailed analysis of ETS, outlining the Council's potential carbon tonnage liabilities under ETS, exploring potential mitigation routes, and analyses' options from Enfinium (Ferrybridge's owner) announcing that they intend to develop Carbon Capture and Storage (CCS) infrastructure at their Ferrybridge EfWs.	
1.4	Please note that the UK ETS is still under consultation and development and the CCS Business Model is being refined through the development of model contracts. Information within this Briefing Note and the Technical Note can only be based on the position at the time of writing and may be subject to change.	
2. Key Issues		
2.1	The scale of ETS impact will be influenced by the tonnage of waste sent to EfW, and the carbon content of the material (fossil/biogenic split).	
2.2	Of the total CO2 potential, a proportion will be biogenic fraction (food & garden waste, paper & card, wood, etc) and the remainder fossil fraction (plastics, mineral oils, etc.). The biogenic and fossil split in post-kerbside waste is approximately 50% to each fraction.	
2.3	It is a broadly accepted market assumption that, when combusted, post-kerbside residual waste typically produces carbon dioxide at a rate of 97% of the input tonnage.	
2.4	The cost of compliance applies to the operator of the Facilities. However, as a change in law, an increase in gate fee could be expected being passed on to the waste producers such as (BDR) Waste Partnership.	

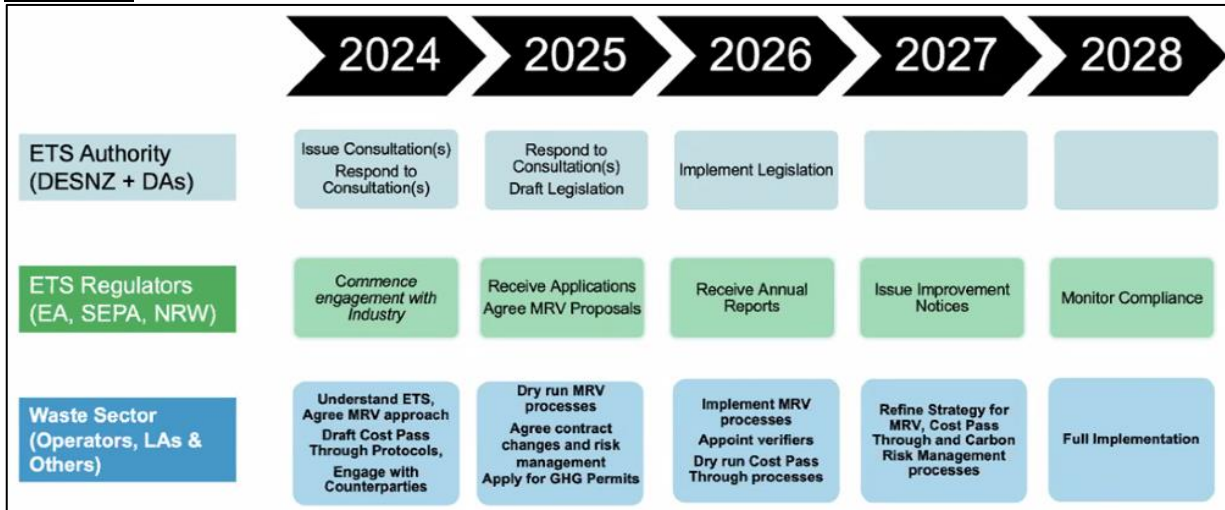
- 2.5** Enfinium as the emitter will need to have secured an allowance for every tonne of fossil CO₂ they emit within one calendar year; either through trading or enacting measures to reduce their emissions. If Enfinium intend to pass the ETS liabilities on to the fuel suppliers, they will need to be able to measure and monitor the different fossil carbon intensities. They will then need to apply this to the incoming tonnages to calculate the ETS impact related to each supplier and reconcile this to the emissions recorded from the stack.
- 2.6** Assuming the current collection schemes and treatment approaches within the MBT, the RDF produced by BDR would generate 93,500 Tonnes of fossil CO₂ which would be liable for the ETS once combusted. Whilst this is not a significant reduction in the total fossil CO₂ content, the effective total carbon and fossil composition is significantly increased within the RDF due to the moisture loss.
- 2.7** Current ETS allowance costs are around £37 per tonne but do fluctuate week by week. Since the UK ETS was implemented in May 2021, allowance costs have been as high as £80 to £90 per tonne.
- 2.8** For the future, some forecasts being used by government agencies suggesting a gentle increase to further incentivise carbon reduction to about £100 per tonne, while others suggest a more rapid increase towards £150 per tonne.

ETS Cost P/T (range)	Total ETS Liability (Tonnage into Ferrybridge). This is BDR liability (split circa 30/40/30 – B/D/R)	MBT Gate Fee Impact (Around 50% moisture and recycle removed from input into Bolton road v's tonnage into Ferrybridge)
£37 p/t	<u>£3.6m - (£1.08m / £1.44m / £1.08m)</u>	£17 p/t
£100 p/t	<u>£9.4m - (£2.82m / £3.76m / £2.82m)</u>	£46 p/t
£150 p/t	<u>£14.0m - (£4.2m / £5.6m / £4.2m)</u>	£68 p/t

- 2.9** Should the Council be liable for this additional cost, it will impact budgets in 2028/29

3. Key Actions and Timelines

3.1 Timeline



3.2 Impact on PFI Contract

Enfinium will seek to flow its liabilities down the supply chain. The ability to pass these costs through to Biffa will be controlled by their sub-contract position. It is anticipated this will then be sought to be passed on to BDR as a Qualifying Change in Law (QCIL)

Where Enfinium opts to trade ETS allowances, the impact would likely be reflected in a per tonne increase on the gate fee for the RDF from the implementation of the scheme in 2028.

If Enfinium are successful in securing CCS funding through the DESNZ ICC (Waste) contract model, there may be reduced (or zero) costs associated with meeting ETS (Covered by grants), although we still may see costs from trading allowances from implementation in 2028 until implementation/go-live of the CCS.

If Enfinium seeks to implement CCS without DESNZ support then the approach to recovering costs could be either a wrapped gate fee uplift or as a contribution to the CapEx and then a smaller uplift to gate fees to reflect the increased OpEx through QCIL.

3.3 Potential Carbon Mitigation Strategies

There is an expectation that Local Authorities will decarbonise their **residual** waste through the implementation of the requirements of the Resources and Waste Strategy. This would include implementing reduction and reuse measures and providing comprehensive and efficient **residual** and **recycling** kerbside collections, particularly for collections of rigid and film plastics.

The implementation of Deposit Return Schemes and Extended Producer Responsibility may also contribute to waste reduction.

Waste reduction is key to reducing the amount of waste sent to EFW. BDR may seek to minimise the financial impact of ETS carbon allowances on its operations by:-

- Arranging minimisation or extraction of fossil carbon sources from the residual waste prior to combustion.
- Resident engagement or pre-treatment to reduce the fossil carbon percentage and limit the carbon allowance exposure.

Reduced tonnage of residual waste equal reduced exposure to liabilities.

4. Recommendations

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| 4.1 | That Steering Committee be aware of the upcoming changes in ETS legislation to include the waste sector and the potential implications. |
| 4.2 | The BDR Manager and team will continue due diligence, dialog with other Councils and Defra/WIDP and its contractor to narrow down the understanding of potential liability. |
| 4.3 | That Steering Committee give steer to the BDR manager on this matter if they feel an alternative course of action be required. |