
UKWIN response to Fichtner's Supplementary Inquiry Note entitled 'Response to third party statements'

20th December 2023 interested party submission to inquiry Ref 3327692

Introduction

On Thursday 14th December 2023 UKWIN provided oral evidence summarising and presenting our written evidence. As part of this process we provided the Inspector and the Appellant with an opportunity to ask any questions they had regarding our evidence. Whilst the Inspector had no questions for us, the Appellant indicated that they wished to raise some matters but that they would do so in the form of a note to the inquiry.

That note was submitted to the inquiry on 19th December 2023, and the following constitutes the replies to the matters raised by the Appellant that UKWIN would have given on 14th December had these matters been raised on the day.

Slide 7 – Biogenic / Biocarbon %

As shown on Slide 7 of UKWIN's presentation, the Government has set a target for 31st January 2028 to reduce food waste by 50% and plastic by 45% per person, indicating that by 2027 food waste would have fallen faster than plastic.

UKWIN's Slide 7 cites Mr Othen's PPF10 paragraph 3.5.14 evidence (regarding his view that the removal of plastics and food waste would tend to balance out) to make the point that even if they did balance out other biogenic waste streams, including paper and card, were also being targeted for removal from the residual waste stream.

UKWIN also notes that the Government's interim targets are minimum targets, and so there is a prospect that paper and card, having been targeted for reduction, could be reduced at a rate higher than 26% per person.

It remains the case that the precise current composition of ERF feedstock is uncertain, as are the impacts of current and future policies and efforts, so it remains important to consider the potential for lower rates of biocarbon in the waste that would be used as feedstock for the proposed Portland ERF.

As such, it remains the case that because the Appellant has not ruled out the prospect of lower rates of biogenic carbon in the current or future waste stream, it remains important to consider the impact of lower levels of biogenic carbon on the climate impacts of the proposed Portland ERF development.

UKWIN's evidence shows that lower rates of biocarbon in the feedstock would be sufficient to result in the proposed Portland ERF performing worse than landfill across a range of circumstances.

UKWIN stands by the conclusion set out on paragraph 45 of UKWIN's November 2023 Comments on the Appellant's Revised Carbon Assessment that our evidence "...highlights the high level of sensitivity of the proposed ERF to changes in feedstock composition".

Slide 10 – Credit for Carbon Sequestration

CD12.64 page 21 notes: “Where there are uncertainties regarding the climate impacts of waste in landfill this could justify the use of sensitivity analysis to show the impacts of using a range of modelling assumptions. It is not valid to use modelling uncertainties...to rationalise ignoring the way that landfill acts as a carbon sink. The impact of modelling uncertainties may be far less than the impact of failing to account for biogenic carbon sequestration, and it is possible that the central assumption about which there is uncertainty might prove to be correct and/or overly pessimistic about the fate of the material in landfill”.

As the evidence before this inquiry shows, the impact of properly accounting for the climate benefit of biogenic carbon sequestration in landfill far exceeds the circa 2.4 percentage point difference between the 50% sequestration rate described by Mr Othen as ‘conservative’ and the sequestration rate of 47.63% that Mr Othen applied to the design waste composition to which he refers in PPF10 paragraph 3.5.30.

As per Slide 9 of UKWIN’s presentation, this is confirmed by Mr Othen at PPF10 Table 2, where he acknowledges that if credit is given to biogenic carbon sequestration even at a 47.63% sequestration rate, as well as at a sequestration rate of 50%, the Portland ERF would perform worse than landfill both with and without shore power export.

The Appellant’s 47.63% sequestration figure is based on Mr Othen’s assumed composition for 2027, but as explored on UKWIN’s Slide 10, paragraphs 76-77 of UKWIN’s November 2023 Comments on Stephen Othen’s Climate Proof note that: “As food waste is being reduced, and a larger fraction of biodegradable (biogenic) waste can be expected to be paper, card and potentially waste wood, this [50% sequestration rate] assumption fails to be conservative within the context of a facility operating from 2027 at the earliest”.

That is to say, even if the 50% sequestration rate described by Mr Othen can be considered a conservative assumption for the material he assumed would be in the 2027 ERF feedstock, because food waste (which is associated with the highest DDOC and therefore the lowest sequestration rate) is expected to fall at a faster rate than other biogenic wastes (as noted by Fichtner in their comments on Slide 7) this means we can expect the sequestration rate to fall well below 47.63% within the decades-long operational lifetime of the Portland ERF.

Furthermore, as UKWIN noted in Slide 10 and on paragraph 86 of UKWIN’s Comments on Othen’s Proof: “...some of the waste is RDF and as such might have a higher sequestration rate than mixed waste due to stabilisation as part of the RDF production process”.

UKWIN stands by our conclusion, as expressed at paragraphs 88 and 83 of UKWIN’s Comments on Othen’s Proof, that: “...it does not appear that the Appellant’s choice of a 50% sequestration rate is ‘conservative’ within the context of the lifetime of the Portland ERF, and certainly not so conservative as to justify failing, in his carbon assessment document, to give any credit for biogenic carbon sequestration in landfill as part of the climate assessment”, and that: “...the most relevant assessment of sequestration modelled by Mr Othen is the 50% sequestration rate case in Table 2 of Mr Othen’s proof which shows the Portland ERF would have a net adverse GHG impact compared to landfill”.