

8.4 ` Given the nature of Hydrology and Hydrogeology it is difficult to define a study area with confidence`. A very telling statement, especially with regard to separating the functional floodplain Zone 3b from Zone 3a.

8.13 Why does this have to be in flood Zone 2 and 3, use good BMV land AND be in a Drinking Water Protected Area?

8.15 It may be fluvially dominant but not exclusively. Heavy rain and high tides do coincide.

8.17 Ref. map Fig 8.5 `It is worth noting the drone survey was undertaken AFTER the peak flow of the flooding and the extent illustrated may not be the maximum that occurred.` So the map on its own is misleading, as there is no mention of this.

8.23 All these factors are unpredictable so how can there be certainty of minimal changes?

8.27 There is no combined map of the surface water and fluvial, as surface water has not been modelled. So there is no ref. to a map of the combined effect.

8.34 Given all the uncertainties around hydrology there is no guarantee that the panels will be in areas where flood levels are less than 1.5mtrs, so calculations may be inaccurate.

8.35 Having acknowledged point 8.34 how many is a `small portion`, so calculations could be accurate?

8.41 ` Where possible`. Again an indeterminate number.

8.42 The assertion that rain behaves as if the panels were not there is challenged by other research, with much greater predicted flow and erosion rates.

8.52 Conclusion again `No likely significant effects`. Significant is never quantified.

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Planning Statement
Ref. EN010159/APP/5.5

10. Hydrology and Hydrogeology

10.1.15 Capacity at High Marnham was the primary driver. This is not available, yet an unexplained distance of 10 km from there was chosen.

10.1.16 Large areas to the west of Marnham, within 10 kms and in flood zone 1 were identified.

10.1.17 Landowners were unwilling to surrender the land. It was the applicant's choice to secure voluntarily.

This land was discounted due to being `predicted` land of higher value but this was not tested. Why was this not investigated or the search area widened?

Further west there were more settlements. It was argued visual and amenity impact would be greater there. It could be said that this urbanised area would have been less impacted by further urbanisation than the selected, very rural, flood prone area chosen.

10.1.2 It is arguably not possible to safely manage flood flow routes at the time of flooding if there are restrictions / debris on the floodplain.

10.1.9 `Will not impede water flow`. How is it possible to have structures on a floodplain with no effect on flow.

10.1.11 Not certain to `not increase flood risk elsewhere` as the total accumulation of debris /damage scenarios or even structures on the floodplain have been included.

10.1.12 Flood zone 3b `The order limits include no electrical infrastructure, enhancements and mitigation only`. This is the functional floodplain. This is the mitigation. What enhancements are the applicants adding?

10.1.26 `Majority of inverters`. How many is majority?

10.1.33 No certainty over location of equipment, merely 'wherever possible', 'small localised areas'.

Negligible impact is acknowledged on the floodplain storage as a result of the panel upstands but there is no allowance for possible submerged panels or fencing and as the size of panels has yet to be decided that is another unknown quantity.

10.1.34 Concludes' that the proposed development will not increase flood risk from any sources'. How can this be such an absolute conclusion when all the information ref. upstands, panels and debris calculations are not available?

Does the Environment Agency's Tidal Trent Modelling include the structures, panels and fencing as possible debris? Floating debris in water suggests more power and potential for damage. Having lived 600mtrs from the Trent for ■■■ yrs I have seen trees going past !

Is the flood modelling based around flood defences built in the 1950's, when there was no expectation of structures being allowed on the floodplain?

National Policy Statement for Renewable Energy EN 1

5.8.7. Operational during a flood. This is not certain and possibly out of action during winter when demand is highest.

5.8.11 Where are the calculations for reducing flood risk overall and not increasing flood risk elsewhere?

5.8.12 How will constriction of flow rates be managed during a flood? It is not possible to clean up during a flood unless NSIP's are immune from health and safety regulations?

5.8.15 Flood arising from the project itself. Where is consideration for failure of the structures, leading to dislodgement and ensuing debris.

5.8.36 'Land that is likely to be needed for present or future flood risk management infrastructure has been appropriately safeguarded from development'. Has it?

Consultation Report EN010159/APP/5.1

6.2.38 The applicant states they have included the questions and responses from the meeting on 1st August 2024 between themselves and North Clifton Parish and South Clifton Parish Council in appendix J-2. They are not in the Consultant Report or in any of the appendices. Correspondence with One Earth and a sequence of events would appear to suggest that this is a deliberate omission. One Earth is either incompetent or not fit to have their proposal approved.

Since the Statutory Consultees and the Inspectorate were presented with a report with a material omission, I would submit that the process of examination should be put on hold until this is investigated.

The omission would suggest that those who approved the report and the Inspectorate have not paid attention to the substance of the report before passing it and allowing it to proceed to examination. What recourse is there for this?

Miscellaneous.

Will there be any alert system for warning of weakened structures?

Has any thought been given to the salinity level of the Trent, ref. contact with metal, glass and cables.

Panel positioning in relation to contours affects the runoff and erosion. Which way will they be aligned?

What number of panel detachments have been included in the calculations?

If structures become detached what precautions have been taken to protect the flood defences?

What is the plan if significant numbers of panels are detached and thoughts as to where this debris would collect?

What assessments have been made for increased turbulence as the water passes from the front of one structure to the next?

Where have the drain gates in North Clifton been included in the flood risk assessments for the village?

Similarly, the natural spring at the top of the sloping field to the north of the village? This has panels planned on it and it drains down into the already compromised drainage system of North Clifton.

Who verifies all the calculations in the report?

Effect of Micro and Nano plastics on Soil Health and Plant Growth.

This is in relation to the cabling deterioration over the 60-yr period.

Micro and nano plastics can negatively impact both. They can hinder root growth, reduce nutrient uptake and disrupt photosynthesis., leading to stunted growth, and reduced yield. MNP's also affect soil microbes, impacting nutrient cycling and therefore soil fertility.

Applied Soil Ecology Vol194 Feb 2024

Meta- analysis revealed diverse effects of micro and nano plastics on EDIBLE crops.

Exposure affected root and shoot growth. Plant species, polymer type, particle size and contamination level, defined the crop's response.

These plastics accumulate in eco systems and persist for decades. Recent estimates suggest their content could be higher in soils than aquatic environments. Micro plastic quantities appear to be higher in agricultural soils. Existing research indicates that MP's have the potential to alter various physiochemical and biological soil characteristics, including porosity, aggregate size and formation, water holding capacity, evaporation rate, acidity and nutrient availability. Something to think about when suggesting the soil will be healthier after 60 yrs.

Consultation process

If I had submitted documents in a professional capacity that elicited a response

`wholly insufficient` from the receiving local authority I would have been humiliated. This was a response from to part of the applicant's report. I asked the local authority if this was the standard to be expected of an enquiry as I had no previous experience. Another example was the suggestion to put bird boxes on the south side of a tree.the authority pulled them up on this too. If they can't get bird box placement right what confidence should I have in the complexity of their flood risk assessments?

Are we to be grateful for the proposed 2.5km of entirely fenced permissive paths, when we already enjoy 12 km of unfettered PROW's, of which some will then be fenced. (East side of the Trent)

To claim` Existing hedgerows will be retained `as a benefit EN010159 /APP/5.5 4.3.1 is an affront to the local population and an indication of the attitude of the applicant.