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Date 15 November 2024

Dear Anne

RE: 24/02300/DOC – Details reserved by Condition 6 (Surface water drainage) of planning permission reference 23/01420/FP granted on 5 December 2023 – Newsells Park Winery, Whiteley Hill, Barkway, Royston, Hertfordshire, SG8 8DY

Thank you for your consultation on the above site, received on 24 October 2024. We have reviewed the application as submitted and wish to make the following comments.

We advise that there **isn't sufficient technical information** to support the application in relation to the wording of Condition 6 (Surface Water Drainage). For reference, Condition 6 is worded as follows:

'Prior to commencement of the development, details of a scheme for the disposing of surface water by a means of sustainable drainage system shall be submitted to and approved in writing by the Local Planning Authority in accordance with the approved drainage strategy (Newsells Park Estate - Whiteley Hill Winery Proposed Drainage Strategy by Solution Consulting Civil and Structural Engineers Ref 1315 no date).

The scheme shall be implemented in full in accordance with the approved details prior to first use of the development. The submitted details shall:

- *Provide supporting calculations, using a CV value of 1, for all the drainage infrastructure (storage features and conveyance network) contained within the drawing "Underground drainage and externals plan" Sheets 1 of 2 and 2 of 2, drawing number 1315/100 dated 3 April 2023 by Solution Consulting Civil and Structural Engineers.*
- *An infiltration rate of 1.4 m/s shall be used to design the infiltration features using appropriate safety factors in accordance with Table 25.2 of the SuDS Manual 2015.*

- *Demonstrates that the proposed surface water drainage system does not surcharge in the 100% AEP (1 in 1 year) critical storm duration, flood in the 3.33% AEP (1 in 30 year) plus climate change critical storm duration or the 1% AEP (1 in 100 year) critical storm duration.*
- *Demonstrates that any flooding that occurs when taking into account climate change for the 1% AEP (1 in 100 year) critical storm event in accordance with NPPF does not leave the site uncontrolled via overland flow routes.*
- *Details of how all surface water management features to be designed in accordance with The SuDS Manual (CIRIA C753, 2015), including appropriate treatment stages for water quality prior to discharge.*
- *Show how water would be managed in the event of failure of the pumped system for 24 hours and how flood resilience and resistance will ensure that flood impacts to vulnerable parts of the development will be minimised'.*

We have concerns that the submitted information does not meet with NPPF, PPG or the LLFA Flood Risk Management Strategy policies and the proposal will either increase the risk of flooding elsewhere or to the proposed development. We provide the following technical review for your consideration.

The main issues include;

- Limited information has been provided on the 24-hour pump failure assessment. This should show how flood resilience and resistance will be employed to ensure flood impacts to vulnerable parts of the development will be minimised.

The LLFA technical review includes;

1. In relation to **Point 1** of Condition 6, the supporting calculations utilise a CV value of 1 for all drainage infrastructure calculations. The drainage infrastructure from the original application (Underground drainage and externals plan" Sheets 1 of 2 and 2 of 2, drawing number 1315/100 dated 3 April 2023 by Solution Consulting Civil and Structural Engineers) mirrors the drawing submitted under this reference. **No further information is required.**
2. In relation to **Point 2** of Condition 6, an infiltration rate of $1.4 \times 10^{-5} \text{m/s}$ has been used in designing infiltration features with a Factor of Safety of 2. We cannot find that the network for S14 and impermeable area has been included in the drainage modelling hence, on review the Factor of Safety should be increased (likely to be FoS 3, as it will be over the 100m^2 area for FoS 2). **Further information is required.**
3. In relation to **Point 3** of Condition 6, the supporting calculations show no surcharging in the 50% AEP event, no flooding in the 3.33% plus 40% climate change AEP event and no water leaving the boundary in the 1% AEP plus 40% climate change event. The calculations are sufficient but should be reviewed following the update to the factor of safety as above. **Further information is required.**

4. In relation to **Point 4** of Condition 6, there is no flooding in the 1% AEP event, but should be reviewed following the update to the factor of safety as above. **Further information is required.**
5. In relation to **Point 5** of Condition 6, a water quality assessment has been provided (Simple Index Approach) for all required features. There is one for the car park, building roof water and winery hardstanding, covering all areas of impermeability. **No further information is required.**
6. In relation to **Point 6** of Condition 6, evidence on how water would be managed in the event of failure of the pump system for 24-hours needs to be provided. Currently, there is only a small amount of information stating the horizontal pump station has 24-hours of storage factored in. We would expect to see supporting evidence on to ensure that any failure of the pump (due to interruption of power supply) would show that flood water would remain onsite. **Further information is required.**

Yours sincerely

Ellie

Ellie Miller
SuDS and Watercourses Support Officer
Environment & Transport and Sustainable Growth

Annex

The following documents have been reviewed, which have been submitted to support the application;

- Report: Whitely Hill Winery – Surface Water Drainage Planning Condition, 23 May 2024, prepared by Solution Consulting Civil and Structural Engineers, REF 1315
- Report: Cover Letter for Newsells Park Winery, prepared by PDA, 17 October 2024