

Ecology response amended for F/22/94434 BARTON PEVERIL COLLEGE, CHESTNUT AVENUE, EASTLEIGH, SO50 5ZA

Construction of a two-storey building to accommodate the College's Art and Design school.

Clare Martin

1/3/23

I have read the email from Pete Badger at Stride Treglown (20/2/23).

SuDS

I have reviewed the Drainage Statement by Scott White and Hookins (Rev A, no date), the email thread from Kingspan, and the Drainage Strategy Layout (P03, February 2023).

The percolation test results reported were from investigations for buildings adjacent to this site with a variation in percolation test rates. The lowest infiltration rate was used to determine this design, which is a pragmatic solution. A 200m³ cellular crate soakaway has been proposed and there will be a separate assessment as part of the stage 3 works for this project. The report states that final network calculations will be produced prior to the commencement of construction and can be conditioned. Any changes to the size of the soakaway can be made at that time.

Surface water from areas of hard standing will be dealt with via combination of permeable paving (permeable sub-base to the pedestrian areas). It has been confirmed that rain gardens are not proposed.

A Kingspan Aqua Treat separator (A1ua Treat SWT002 model) has been proposed for filtration of the surface water drainage of the roof and permeable paving is proposed for the low traffic roads.

The table below shows the mitigation information from the Klargester AquaTreat data sheet which I found on the website, with my calculations. This is the information I was requesting to be provided.

Pollution hazard indices	TSS	metals	Hydrocarbons
Other roofs	0.3	0.2-0.8 (I will use 0.5 as an estimate)	0.05
SuDS mitigation indices			
Kingspan Aqua Treat Separator	0.76	0.56	0.99
Total (difference)	+0.46	+0.06	+0.94

Pollution hazard indices	TSS	metals	Hydrocarbons
Low traffic roads	0.5	0.4	0.4
SuDS mitigation indices			
Permeable pavement	0.7	0.6	0.7
Total (difference)	+0.2	+0.2	+0.3

The calculations show that these treatment methods will be sufficient.

The exceedance flows are shown on the amended drainage strategy layout, and it looks as if they would flow onto the playing field or the proposed surface water sewer or to the nearby planting areas, however this must be confirmed.

Ecology

I have reviewed the General Arrangement (3055_GA_1000 Rev D) and the Biodiversity and Habitat Management Plan by Ecosupport (February 2023). These documents confirm that the requested information has been provided and is satisfactory.

A post-development compliance check by a suitably qualified ecologist should be conditioned (as recommended) to ensure that the bat and swift bricks/boxes have been installed correctly. Integral bricks/boxes are preferred as they do not require maintenance and cannot fall off. If externally mounted boxes are used, they must be checked regularly by a bat licensed ecologist to ensure that they are safe and will not fall off.

I note that there is no lighting information provided with the biodiversity information and I don't see a separate lighting plan on Salesforce. Now that the positions of the bat and swift nest boxes have been provided, please could you supply a lighting diagram that demonstrates light levels of 1 lux or less on these two areas and on any vegetation which would support nesting birds (trees and hedgerow). This can be conditioned.

In summary, I am satisfied that the documents provided have addressed my previous concerns and that any additional information can be conditioned.

Lisa Malter

Ecologist