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Our Ref: GBC/2025/107047
Date: 6 October 2025

Application No: 20250874

Location: Land At 7 To 39 , Rose Avenue, Gravesend, Kent DA12 2LN

Proposal: Demolition of the existing residential buildings on the site and the erection of 29no. new affordable homes, with associated vehicular parking and landscaping.

Thank you for your consultation on the above referenced planning application.

Kent County Council as Lead Local Flood Authority have reviewed the Below Ground Drainage Strategy Report prepared by Ridge and Partners LLP (August 2025) and have the following comments:

It is proposed to manage surface water for the site via a new piped network discharging into two deep borehole soakaways. Roof drainage will be separated from road and footpath runoff, which will infiltrate through permeable surfaces. If infiltration proves inadequate, a backup connection to the surface water sewer in Rose Avenue is planned.

While are accepting of the drainage designs general principles, we require the following to be addressed:

1. As of the 10th of May 2022, the Environment Agency's climate change allowances have been updated. As part of this update, revisions have been made to the 'Peak Rainfall Intensity Allowances' that are used in applying climate change percentages to new drainage schemes.
   The LLFA would now seek the 'upper end' allowance is designed for both the 30 (3.3%) and 100 (1%) year storm scenarios. The latest information on the allowances and map can be found at the following link:

   https://www.gov.uk/guidance/flood-risk-assessments-climate-change-allowances

   This analysis must determine if the impacts of the greater allowance are significant and exacerbate any flood risk. The design may need to be minimally modified but may also need additional mitigation allowances, for example attenuation features or provision of exceedance routes. This will tie into existing designing for exceedance principles.

2. Please provide a copy of the Analysis Criteria and Catchment Area settings for the hydraulic calculations in Info Drainage, so we can review the simulation settings.

3. We note that FSR rainfall data has been used for the design. In accordance with the latest SuDS Technical standards "3.34 The most up to date rainfall data for drainage design shall be used" we would therefore expect for FEH22 to be used.

4. The borehole tests undertaken do not reflect the proposed location of the deep bore soakaways but we could accept, at this stage, the results being used as indicative of possible rates to be found at the locations proposed this being $2*10^{-6}$m/s. However, the rate used for the design is an assumed rate of $5*10^{-4}$m/s, no explanation for the use of this considerably higher figure has been provided, we would expect as a maximum for the lowest rate found in situ to be used in the design.

5. In addition to this we note that a factor of safety of 2 has been used for the design, we would expect for this to match the requirements of DEFRAs latest technical standards as given in table s3.1 and be set to 5

This response has been provided using the best knowledge and information submitted as part of the planning application at the time of responding and is reliant on the accuracy of that information.

Yours faithfully,

Ahaura Keighley
Graduate Flood Risk Officer
Flood and Water Management