Flood Risk Assessment

June 2024

49 Palewell Park, London Borough of Richmond upon Thames, SW14 8JQ

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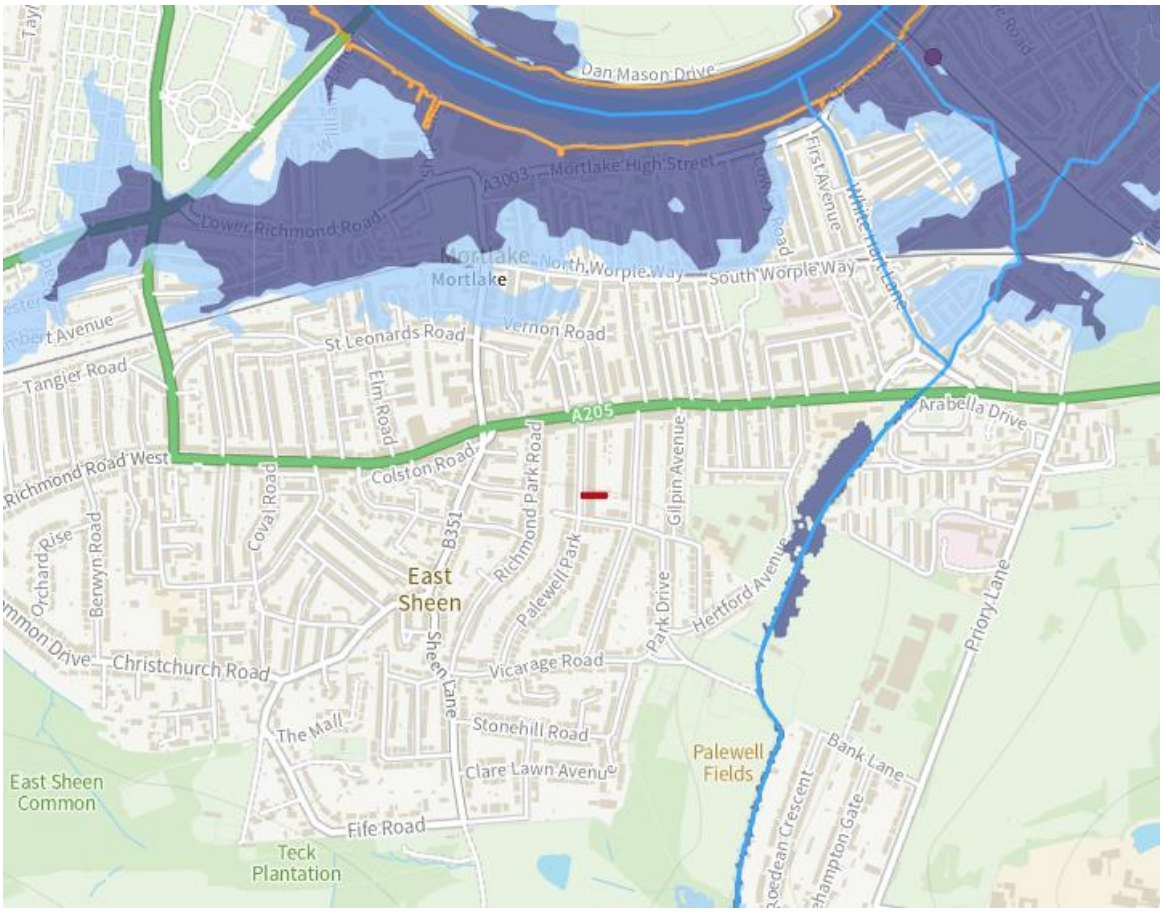
1. Introduction

This Flood Risk Assessment is submitted in support for the works to 49 Palewell Park and should be read in conjunction with the submitted drawings, Design & Access statement and photographic documentation.

2. Site & Surroundings

The site is located on the east side of Palewell Park, to the south of Upper Richmond Road. The property comprises 3 storeys all above ground, with a stepped threshold up into the front door and a driveway that slopes away from the threshold, making the property inherently resistant to flooding.

The site is approximately 0.5 miles south of the River Thames.



Environment Agency Flood Map for Planning

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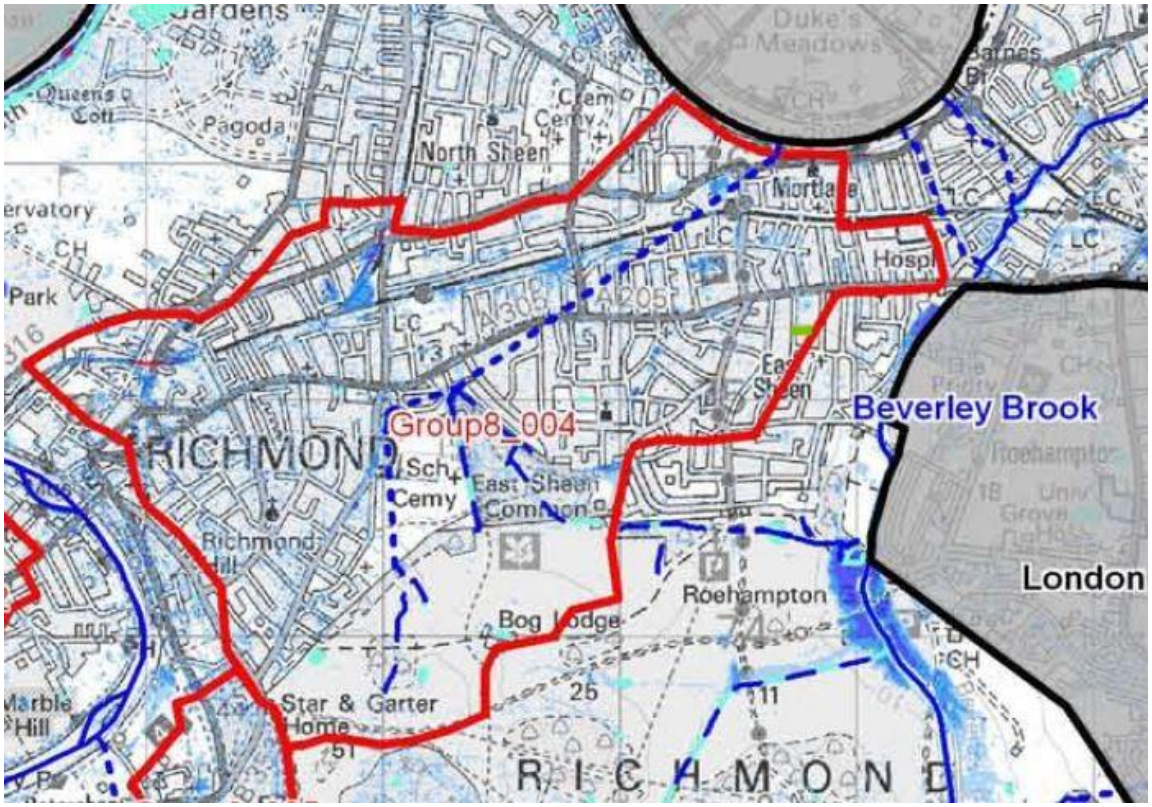
3. Existing Flood Conditions

The site is in FZ1 with a low probability of flooding. In addition the area benefits from flood defences and the Thames' defences are in generally good condition along this stretch, as classified by the Environment Agency (EA).

Although the proposal will have no impact on the flood risk profile of the property it is necessary to provide appropriate mitigation and where possible improve upon the existing condition, as the EA has identified critical drainage problems in the area.

The site is on the very eastern boundary of Group8_004, as highlighted in green on the map below.



Environment Agency Critical Drainage Area Map

4. Outline Proposal & Finished Floor Levels (FFLs)

The proposal is for a side and rear ground floor extension to replace the existing conservatory. Please refer to submitted drawings for further information.

No change to the parent building FFL is being proposed, where the 150mm step up into the property will be maintained. The internal floor level of the rear extension is to be lowered by 270mm to achieve a comfortable internal ceiling height and level threshold to the existing rear garden FFL.

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5. Flood Mitigation & Surface Water Drainage

Currently rainwater from the roofs and surface water from the ground are directed from the property drains into the surface water sewer. Proposals to reduce surface water run-off and mitigate flood risk include:

Green roof
The new flat roof extension that replaces the existing conservatory will have 5sqm of green roof, which will absorb rainwater and reduce water run-off.

Water Butts
Rainwater from the existing rear roofs, the new glazed side extension roof and any excess rainwater from the green roof will be directed into water butts located to the rear of the property and in the central courtyard. The water butts will collect rainwater for use in the garden, reducing surface water run-off and also the demand for potable water supply.

Permeable Paving
New areas of paving in the garden and courtyard will be permeable to allow run-off to soak into the ground. This will result in a 6sqm net increase in permeable area across the site, further reducing the rainwater run-off from the site.

Surface Water Drainage
The existing on site surface water drainage will be maintained as existing, though with a reduced demand from water run-off due to the flood mitigation measures mentioned above.

6. Conclusion

The flood mitigation measures will reduce surface water run-off from the property, in turn reducing the flood risk both on this site and to the neighbouring area.

We are of the opinion that this Flood Risk Assessment addresses the requirements of the Authority and that the proposal complies fully with the 2023 NPPF/2022 PPG.

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