10 WAYBORNE GROVE, RUISLIP, HA4 7DU

PLANNING APPLICATION FOR SINGLE STOREY SIDE AND TWO STOREY REAR EXTENSION

FLOOD RISK ASSESSMENT

According to the Environment Agency mapping tool, the subject site is within fluvial Flood Zone 1, resulting in a low probability of flooding from nearby rivers.

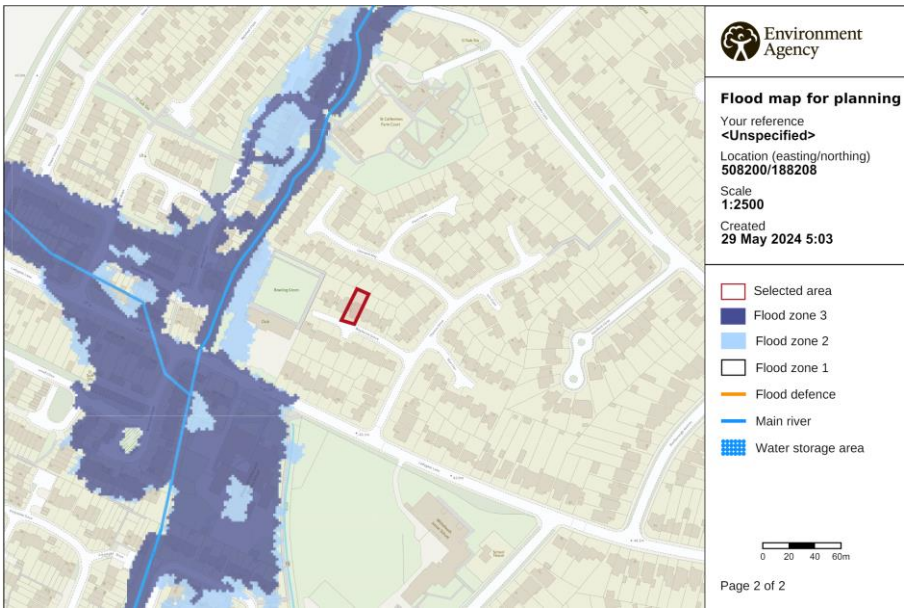

Figure 1- The environment agency map for surface water flooding at 10 Wayborne Grove, accessed via the government website.

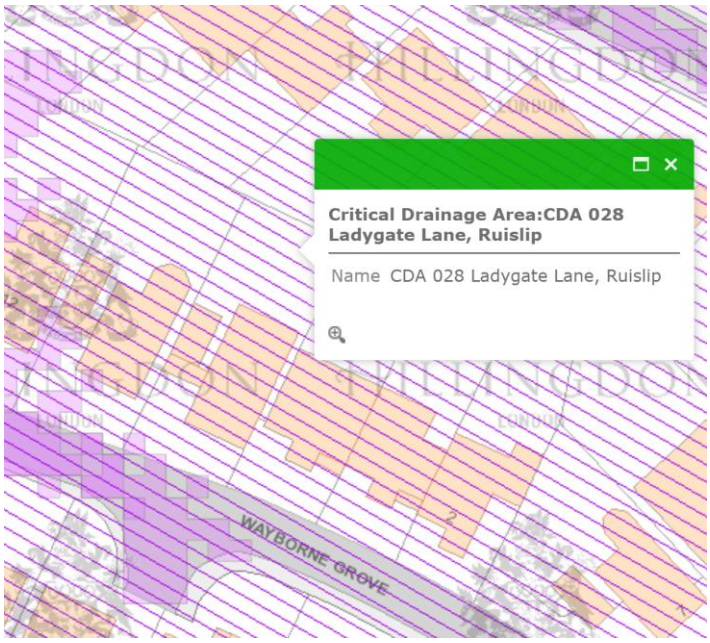

Figure 2- image taken from the ArcGis mapping tool, which shows the site is within a critical drainage area.

The proposed side infill extension of 3.6 m2 to the existing house sits between the existing garage and house and will replace both permeable and non-permeable paving.

Figure 3- Image taken of existing gap between house and garage where new infill side extension will be located.

The proposed rear extension has an area of 25.6m2 and replaces an existing conservatory and area of non-permeable hardstanding. The existing patio area will be increased by 9.6m2.

Figure 4- image showing the rear of the existing house where the rear extension is proposed.

Critical Drainage Area 028

The maps below have been taken from the Hillingdon website, and depict the flood depth and surface water flood hazard rating of the critical drainage area 028 which is edged with a red line.

In essence, the maps show that the flood depth of the existing site is **less than 0.1m**. and a **very low** critical flood hazard.

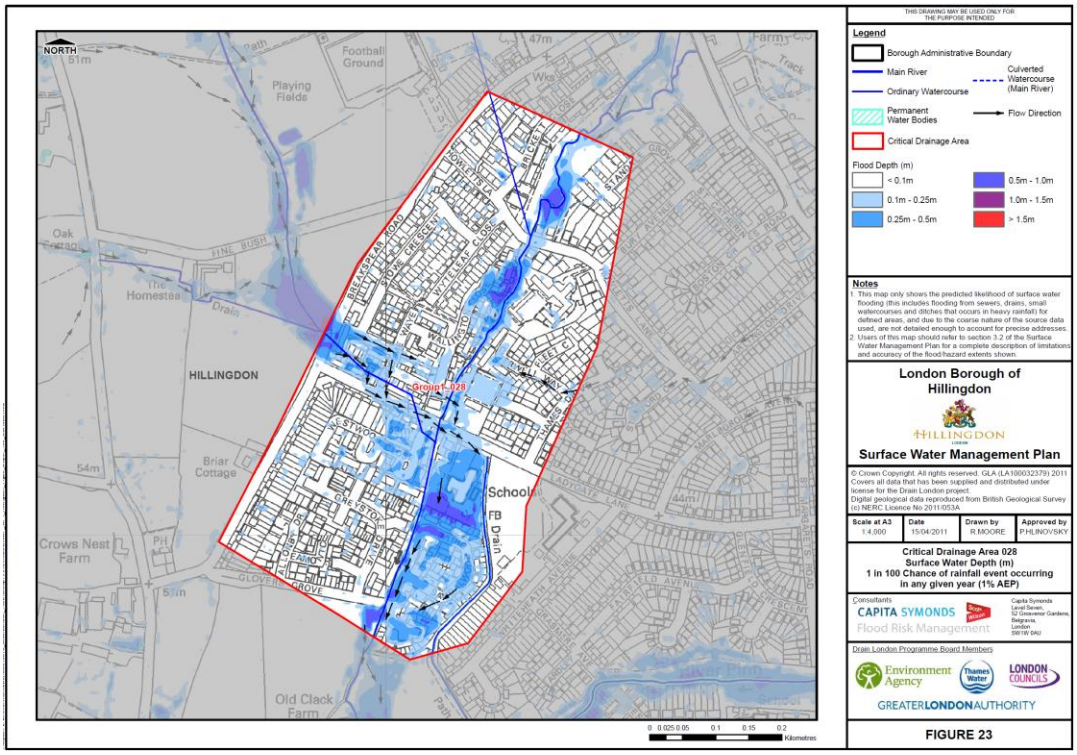

FIGURE 23

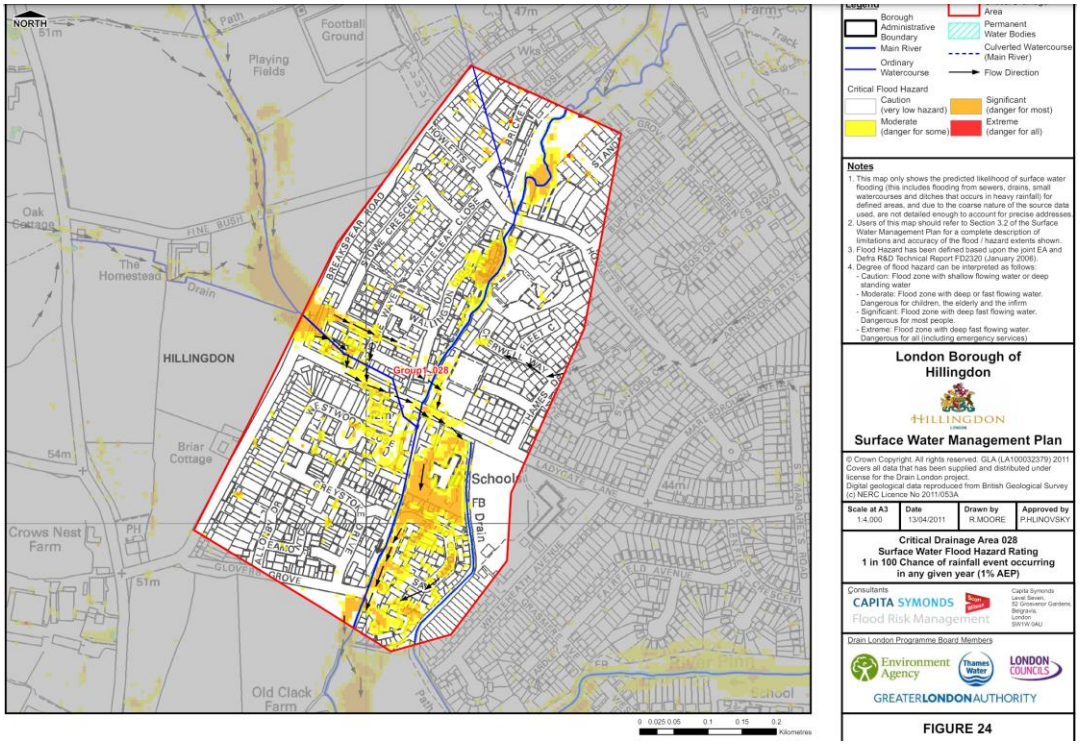

FIGURE 24

<u>Construction and Surface Water Drainage Proposals</u>

Given the probability of flooding on the site is low, we are not proposing to utilise flood resilient construction methods for the extension. The extension will however be set to match the existing finished floor level at ground floor, which is around 300mm above the existing external ground levels. This will be adequate to protect the property from any flooding that does exist.

The probability of surface water flooding is very low and according to the maps provided, the flood depth would be no more than 0.1m. The proposed extensions predominantly cover existing non-permeable hardstanding and it is not therefore considered that our proposal does not worsen the surface water flooding issues in the road.

Despite this, we are set out some measures that can be taken to eliminate the risk of surface water flooding occurring on the site. These include: -

- Use of water butts to limit discharge of the rainwater into the ground;
- Use of a sustainable drainage system such as a soakaway with crates; and
- No new surface water connections to the existing sewer.

Conclusion

Although our proposal sits within a critical drainage area, the maps provided clearly indicate that the site itself is at low risk from flooding from nearby rivers and very low risk of surface water flooding. Even if surface water flooding were to occur, it is though that the flood depth level will not be more than 0.1m which would not impact the existing house or proposed extensions.

In our opinion, the methods proposed for dealing with surface water and rainwater will be adequate to ensure that any small increases in surface water flooding risk will be alleviated.

Jack Dusek & Co
29-05-24