

FLOOD RISK ASSESSMENT

REF: FRA-001

18 CHURCH ROAD, CAVERSHAM, READING, BERKSHIRE, RG4 6AD.

INTRODUCTION:

This flood risk assessment has been prepared to accompany the application for the construction of a single storey rear extension, a 1.5 storey side extension and associated alterations at no. 18 Church Road, Caversham.

DESCRIPTION:

18 Church Road is a 1.5 storey detached residential property located in Caversham, Berkshire, the property includes an attached boathouse at garden/lower ground floor level.

The existing ground floor sits at road level, significantly above the rear garden.

Existing ground levels slope down to the rear resulting in an existing internal ground floor level of over 2.2 metres above the existing garden.

FLOOD RISK ASSESMENT:

As can be seen from the attached flood risk map the house itself (including all habitable/risk rooms) sit outside the flood risk zone 2 & 3. The flood risk zones only cover the existing rear garden.

Risk rooms such as sleeping accommodation are to remain at first floor only with one existing ground floor bedroom being removed. This means no bedrooms are located on the ground floor, improving the current situation, which in any case is outside the flood risk zones.

Refuge could be taken on upper floors if required but would not be a likely requirement due to the house itself being out of the flood risk zones.

The proposed reduction of the lower ground floor level in the boathouse to provide a gym space will not provide a habitable room, it will be unfinished and unheated.

Flood risk in this location is primarily surface water from the river, as noted in the Local Authorities SFRA. Flooding from other sources including flooding from land, flooding from groundwater flooding from sewers and flooding from other geological features such as reservoirs is not expected in this locality.

SURFACE WATER RUN OFF:

There is no new drainage proposed at ground floor level.

It is proposed to install a sump pumped drain with non-return valve in the proposed gym conversion which could be activated after a flood event.

There is no additional displacement of flood waters during flood event due to the ground floor extensions being above the flood risk zone, meaning that flood risk is not increased elsewhere.

FLOOD RESILIENCE:

The proposed construction will consist of flood resilient materials such as masonry walls and concrete suspended ground floor. There will be no wall finishes such as plaster or additional electrics in the proposed boathouse to gym conversion.

Due to the existing ground levels the new electrical installation at ground floor will not be below 2.65 metres above external ground/garden level and out of the flood risk area.

CONCLUSION:

Risk to inhabitants has been appropriately assessed and managed, there is no sleeping accommodation proposed at ground or lower ground floor and the proposed extensions only provide additional living space outside the existing flood risk zones.

Risk to the building itself is to be appropriately managed by employing flood resistant construction within the lower ground floor with sump pumped drainage included to allow pumping of flood waters should flooding occur. Flood sacks are to be provided to manage potential flood waters entering the lower ground floor during a flood event.

There is no demonstrable risk to other properties from displaced flood waters due to no extensions being proposed in flood risk zones.

As such we invite the LPA to support these proposals.