

Advice to the local planning authority

Advice to the local planning authority (LPA) from the Health and Safety Executive (HSE) as a statutory consultee for developments that include a relevant building.

To LPA	Reading
LPA planning ref no	PL/24/0958
Our ref	pgo-6027
Site address	2 Norman Place, Reading RG1 8DA
Proposal description	Demolition of existing office and substation buildings and residential-led site redevelopment within 1-11 storey buildings comprising residential (Class C3) and ground floor commercial uses (Class E), together with various associated works including replacement pedestrian and vehicle access routes, car/cycle parking, hard and soft landscaping, and a public open space adjacent to the river.
Date on fire statement	22/07/2024
Date consultation received	09/10/2024
Date response sent	30/10/2024

1. Substantive response for the local planning authority

Thank you for consulting HSE about this application.

Headline response from HSE
Headline Response from HSE ('content')

Scope of consultation

1.1. The above planning application relates to a new mixed-use development which consists of two sections: residential (254 residential dwellings) and commercial (278 sqm. of flexible Class E floorspace at ground floor level). An open-sided/undercroft car park is proposed at the ground level, enclosed/surrounded by the rest of the building and the podium located above. No basement level is proposed for the development.

1.2. The Fire Statement confirms the height of the building is 31.5m, measured from the ground floor access level to the topmost occupied floor level of the building, and eleven storeys (Ground Floor, plus L1 to L10).

1.3. The development will be served by seven stair cores which consist of 4 firefighting shafts plus 3 protected/escape stairs. All upper storeys will be served by at least two stair cores (one representing a firefighting shaft). Each firefighting shaft will contain: a firefighting stair, firefighting lift, smoke ventilated firefighting lobby, and a dry riser within the stair. Additionally, three of four firefighting shafts, will be provided with an evacuation lift.

Consultation

1.4. Section 6 (e) (building schedule) of the fire statement confirms that the design standards used are: BS99991:2015 (*'Fire safety design, management, and use of residential buildings'*) and Approved Document B, Volume 1: (*'Dwellings'*) (2019 edition, incorporating 2020 and 2022 amendments). HSE has assessed this application on that basis.

1.5. Following a review of the information provided in the planning application, HSE is content with the fire safety design as set out in the project description, to the extent it affects land use planning considerations. However, HSE has identified matters that the applicant should try to address in advance of later regulatory stages.

2. Supplementary information

The following information does not contribute to HSE's substantive response and should not be used for the purposes of decision making by the local planning authority.

Means of escape

2.1. The proposed Ground Floor Plan drawing shows a direct connection/communication between 'B2 Amenity' room and the firefighting shaft (firefighting lobby). For multi-stair buildings, fire safety standards recommend that any connection with ancillary accommodation / amenity areas, should be by way of protected lobby.

2.2. In this instance, design changes by way of internal alterations, are unlikely to affect land use planning considerations. It will be for the applicant to demonstrate compliance at later regulatory stages.

Means of escape (roof terrace access)

2.3. The proposed Level 8 Floor Plan drawing shows that the *Roof Terrace* is connected directly with *B1-8-9 8th Floor Amenity* room. The cited fire safety standard states: "*a) Access to communal roof gardens and similar places should be from a protected stairway enclosure or a protected ventilated lobby/corridor.*"

2.4. Design changes by way of internal alterations to provide suitable roof terrace access, are unlikely to affect land use planning considerations. Accordingly, it will be for the applicant to demonstrate compliance at later regulatory stages.

Means of escape (travel distance)

2.5. The proposed Ground Floor Plan drawing shows for 'B1 Sprinkler tank / Plant' room, an excessive single direction travel distance (approx. 19.5m), between the furthest point and the exit door. The fire safety standards state that where the internal layout of partitions,

fittings, etc. is not known, direct distances may be used for assessment. The direct distances should be taken as two thirds of the travel distance.

2.6. Any design changes to provide a suitable travel distance, may affect land use planning considerations relating to design, layout, and appearance of the building. It will be for the applicant to demonstrate compliance at later regulatory stages.

Computational Fluid Dynamic (CFD) modelling analyses

2.7. Section 8 of the Fire Statement identifies the use of Computational Fluid Dynamics (CFD) analysis and states: *“Open plan apartments exceeding the dimensions described in BS 9991. A fire engineered approach will be developed using Computational Fluid Dynamics assessment comparing the proposed flat layouts to an NHBC research compliant arrangement. If it can be demonstrated that the conditions in the proposed open plan flats are equivalent, or better than, a design in line with that in guidance, then the layouts can be considered to meet the functional requirements of the Building Regulations.”*

2.8. This is noted, however, if the CFD analysis does not support the design, this may affect land use planning considerations such as the design, layout, and number of dwellings of the development. It will be for the applicant to demonstrate compliance at later regulatory stages.

Green Roof

2.9. The proposed Roof Plan drawing confirms the proposed installation of green roofs. A green roof may constitute a fire hazard as it requires a regular management and maintenance regime, and the external envelope of a building should not provide a medium for undue fire spread. Where a green roof is proposed, sufficient fire resistance to prevent fire spread to any adjoining roofs/wall(s) will be required. It will be for the applicant to demonstrate that the proposed green roof is viable in relation to fire safety at later regulatory stages.

2.10. Guidance for green roofs can be found in [Fire performance of green roofs and walls - GOV.UK \(www.gov.uk\)](https://www.gov.uk/government/publications/fire-performance-of-green-roofs-and-walls), published by the Department for Communities and Local Government. Where regulation 7(2) applies, that regulation prevails over all the provisions in this paragraph.

Photovoltaic (PV) panels

2.11. The proposed Roof Plan drawing confirms that the new proposal includes provision of photovoltaic panels. Where the roof top installation of PV panels is proposed, it should be noted that fire safety standards require suitable support of cabling to avoid obstruction of escape routes and firefighting access due to the failure of fixings and consideration should be given to ensure that all power supplies, electrical wiring, and control equipment is provided with appropriate levels of protection against fire.

Hydrants

2.12. Section 13 (Suitability of water supply for the scale of development proposed) of the Fire Statement, states: *“From existing map information it is understood that an existing hydrant is present on Norman place to the west of the proposed site location”*. However, the functional status (usable/operable) of the existing public hydrants is not confirmed, and the applicant states: *“This will be developed further at the next design stages. If no existing hydrant is available, a new hydrant will be provided in accordance with BS 9991.”*

2.13. Without confirmation that there is a suitable water supply, the development might be relying on a disused water main or faulty hydrant. Resolving this issue may affect land use planning considerations such as the landscaping around the development, should additional hydrant installations be required. This will be subject to later regulatory consideration.

Yours sincerely

S. Bucur

Sorin Bucur

Fire Safety Information Assessor

Guidance on Planning Gateway One is available on the Planning Portal: [Planning and fire safety - Planning Portal](#).

This response does not provide advice on any of the following:

- matters that are or will be subject to Building Regulations regardless of whether such matters have been provided as part of the application
- matters related to planning applications around major hazard sites, licensed explosive sites, and pipelines
- applications for hazardous substances consent
- London Plan policy compliance

