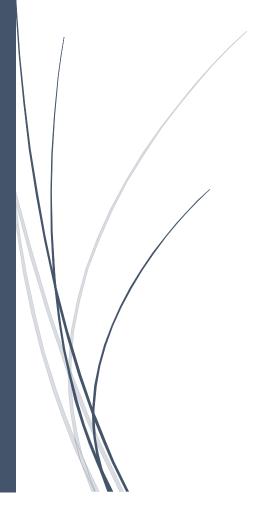
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## Fire Statement

89 Holmes Road: London



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GF FIRE SAFETY ENGINEERING

### **Fire Statement**

# 89 Holmes Road London NW5 3AU



#### Document control and notes

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#### **Notes:**

This statement is prepared for the exclusive use of Archit-development Ltd and their appointed contractors for the project at 89 Holmes Road London NW5 3AU and a third party shall not rely upon the information that it contains. GF FSE will not accept any responsibility for matters arising because of use by a third party. This statement should not be applied to any other building and may not be relevant if there are significant changes to the design.

The submission of this Fire Statement constitutes neither a warranty of future results by GF FSE, nor an assurance against risk. The Statement represents only the best judgement of the consultant involved in its preparation, and is based, in part, on information provided by others. No liability whatsoever is accepted for the accuracy of such information.

The contents of this Statement is confidential and privileged, and all parties are required to keep information received by them confidential and any "Report" (includes written or verbal, formal or informal) and its recommendations are without prejudice to all parties' obligations under the legal agreements existing between them.

Issue	Date	Amendment Details	Author	Checked
Draft V1	22/08/22	Draft for Technical QA and client comment	GF	
V1	26/8/22	Final	GF	
V2	30/08/22	Updated plans added	GF	
V3	6/9/22	Update to include Assembly point ref and fire appliance locality	GF	
V4a	9/9/22	Updated KSR general layout plan	GF	

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#### 1. INTRODUCTION

The New London Plan Policy D12 requires development proposals to achieve the highest standards of fire safety, embedding these at the earliest possible stage. Policy D5 also requires specific attention to the requirements of inclusive design and features such as evacuation lifts, albeit these do not form part of the design features for this project. In addition, D11 requires specific attention to the requirements for safety, security and resilience to an emergency within a premises.

All major development proposals should be submitted with a fire statement, which is a standalone document that defines the fire safety objectives and performance requirements of the development and the methods by which these objectives will be provided/ satisfied. This is based on the fire safety guidance provided by the GLA for the New London Plan with regards to fire safety.

The fire statement should evidence the provisions made for the safety of occupants and protection of property as well as the provision of suitable access and equipment for fire-fighting in light of the New London Plan fire safety policy requirements and the justification for these measures.

As this is an existing premises and the application is purely to extend its current use there are generally no significant changes proposed to the building fabric or the manner in which it is to be used. The extension vertically is the area to which this Statement relates. A fire strategy for the whole property will be developed to ensure that the fire safety measures within the area relevant to this application are in line with the existing and proposed configurations, occupancy and overall uses.

GF Fire Safety Engineering (GF FSE) have been appointed by Archit Development to produce this fire statement to support the planning application process.

This Fire Statement follows the principles required for Fire Statements as required by certain planning application processes.

#### 2. COMPETENCY STATEMENT

The New London plan, Paragraph 3.12.9 of Policy D12 explains that Fire Statements should be produced by someone who is: third party independent and suitably qualified. GF FSE competency information is detailed below.

#### **Fire Engineer**

Guy Foster BEng (Hons) Fire Engineering, BSc, PgDip Fire Engineering Member of the Institution of Fire Engineers (MIFireE)

Guy has over 30 years' experience in fire safety, which is supported by an Honours Degree in Fire Engineering. His extensive experience includes assessment and development of fire strategies utilising complex fire engineered solutions, including Computational fluid dynamics (CFD) and evacuation modelling reviews, supporting clients and project teams, from design stages through to occupation. He carries out site inspections to monitor compliance with building regulations and standards.

Guy has delivered conferences to London Fire Brigade and organisations within the UK and overseas on matters concerning Fire Engineering and its role in the built environment. He has extensive knowledge of the aspects of designs which are required to meet both premises occupant fire safety as well as those required for the assistance of the fire service to carry out their search, rescue and firefighting abilities.

He has served on a number Committees as technical advisor and support including British Standards (e.g; BS5839, BS5266, BS8524), Chief Fire Officers Association (Fire Engineering Technical Standards), Tall Buildings Fire Safety Network, Smoke Control Association and Institution of Fire Engineers.

Guy's experience spans a diverse range of sectors, from mixed use high rise residential developments to historic buildings. Guy has worked as the Group Commander, Head of Fire Engineering Group and Fire Investigation for the London Fire Brigade as well as Senior and Principal Fire Engineer roles for a range of fire safety consultancies and building control body.

#### 3. Building Description

89 Holmes Road is an existing building currently used as a public house (but not in use) and a house of multiple occupation (HMO) on the upper two floors providing sleeping accommodation as a licensed HMO. There is also a separate basement apartment. It is within the Inkerman Conservation area and is noted as a positive contributor.

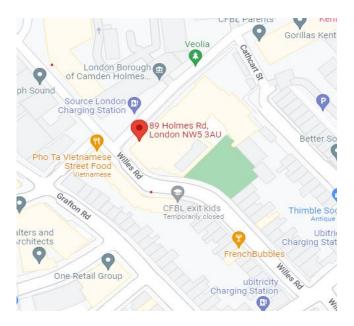
The property is of traditional construction of masonry and timber and is very typical of its age. The premises is believed to have been constructed circa 1868-1875. Access to the main premises is from Holmes Road with a separate entrance on Willes Road to the basement apartment. See Plan below.

**Note:** The premises will not be of a purpose group or scale which results in it being considered a 'building in scope' under recent regulatory changes. That is, it is <u>not classified as a block of flats</u>, and is not >18m in height.

For the purpose of Building regulations, the alterations are being classed as sitting within Residential (other), Group 2(b), purpose group as defined in Approved Document B, Fire Safety. HMOs are not however listed in the Approved document and therefore it is necessary to consider where suitable guidance prevails. Although 'other' residential purpose group does not list within it HMO, it does state that the Group 2(b) ..... or' any other residential purpose not described above'. This therefore suggest guidance in AD-B volume 2 is followed. However, as an alternative approach other guidance can be considered and this can be, for example BS9991, or BS 7974 (fire safety engineering). BS9991 suggests that guidance from LACORs can be utilised and as such the relevant guidance to be followed here will primarily be BS 9991 and the LACORs guidance.

The Premises, once occupied, will be subject to

- a. The Regulatory Reform (fire safety) order
- b. Local Authority HMO licensing standards



Location plan

The intent is to extend the premises vertically adding a third and fourth floor level which will also be used as part of the HMO provision.

#### Site layout and plan

The following plans have been provided by KSR Architects and interior designers Ltd indicating the proposals.



Early discussions on the intended use of the premises extension have taken place with the design team and their appointed architects. The extended part of the premises is to be used as part of the HMO accommodation.

It is NOT intended to design the use of the upper levels as stand-alone apartments/ flats but as an HMO facility as per the existing. This will place the onus on the fire strategy to adopt a specific fire safety protocol which will not rely on a stay-put evacuation strategy in the event of fire which blocks of flats would require. As such on detection of fire ANYWHERE in the premises all occupants will evacuate immediately. (i.e., simultaneous evacuation principle). The detailed design supporting this strategic approach will be developed as the design progresses.

#### 4. PRINCIPLE FIRE SAFETY CONCEPTS

The principles of the functional requirements to the building regulations, Part B, Fire, will be met.

Each regulatory requirement is identified below

#### a. Means of warning and escape

Schedule 1 of the Building Regulations requires the following functional requirements to be met in respect of B1, Means of warning and escape:

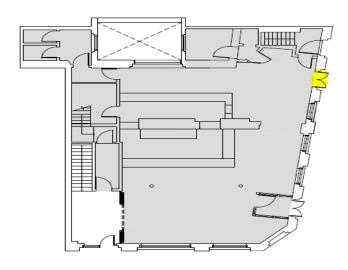
"The building shall be designed and constructed so that there are appropriate provisions for the early warning of fire, and appropriate means of escape in case of fire from the building to a place of safety outside the building capable of being safely and effectively used at all material times."

The existing public house area is not being altered as part of this application. However, its use and therefore its impact on the new areas, will be considered and fire safety features /measures will support the overall intent in providing safe egress from all parts of the property in the event of fire.

The new sleeping accommodation is being provided on the 3rd and 4th floors and these will utilise the existing single escape route provided. Access to the single escape stair will be via protected corridors and the existing protected staircase (as where necessary extended) giving occupants a route of safe egress to a final place of safety outside the property.

Travel distances within the rooms and to the storey exit will be within the limits of standard guidance. Where this cannot be achieved mitigating measures will be implemented to support any deviation, this may include, for example, an enhancement to the fire detection and alarm system. This will be detailed in the next stages.

\*Note: The public house area on the ground floor is to be provided with an additional exit as a secondary means of escape in order to improve and future proof the fire safety arrangements to the area. This is shown indicatively below.



\*Plan provided by KSR Architects

Fire detection and alarm – principle.

An automatic fire detection and alarm system will be provided <u>throughout</u> the premises to provide the earliest warning of fire to all occupants allowing them to access the protected corridors and stairs to make their escape. No reliance will be made for evacuation by the fire service and all occupants will be able to make their escape without assistance from the fire service subject to the measures set out in the fire strategy being adequately built, maintained, and managed.

Protection to escape routes. All escape routes (corridors, stairs) will be adequately fire separated from the accommodation areas. In general, the strategy will require all rooms to be separated from the escape corridor by fire resisting construction, this includes kitchen and other ancillary use areas. To enhance the fire protection each room may be separated from the adjoining by 30-minute fire rated construction. This will be determined at the next design stage.

The escape staircase will be suitably protected from accommodation at all levels, this may include the provision of a fire resisting lobby or other suitable fire resisting passive or active arrangement.

The premises will be provided with suitable emergency lighting to illuminate all escape routes and circulation areas in line with standard guidance. Fire exit signage and other fire safety signs will be provided in accordance with the relevant guidance in place at this time.

All exit routes will remain available at all material times. All escape route doors will be easily openable without reliance on keys, digital locks/ pads etc.

Suitable means of fire-aid firefighting equipment (handheld extinguishers for example) will be provided on completion of the development in suitable positions and numbers and of the appropriate type for the risk to which they will be associated.

#### b. Internal fire spread (Linings)

Schedule 1 of the Building Regulations requires the following functional requirements to be met in respect of B2, Internal fire spread (linings):

- (1) To inhibit the spread of fire within the building the internal linings shall-
  - (a) adequately resist the spread of flame over their surfaces; and
  - (b) have, if ignited, a rate of heat release which is reasonable in the circumstances.
- (2) In this paragraph 'internal linings' means the materials lining any partition, wall, ceiling or other internal structure.

All areas will be required to meet the provision set out above following standard guidance. Wall and ceiling linings will meet the recommendations as set out in BS 9991 or AD-B

#### c. Internal fire spread (Structure).

Schedule 1 of the Building Regulations requires the following functional requirements to be met in respect of B3, Internal fire spread (structure):

- (1) The building shall be designed and constructed so that, in the event of fire, its stability will be maintained for a reasonable period.
- (2) A wall common to two or more buildings shall be designed and constructed so that it adequately resists the spread of fire between those two buildings.
- (3) Where reasonably necessary to inhibit the spread of fire within the building, measures shall be taken, to an extent appropriate to the size and intended use of the building, comprising either or both of the following
  - a. sub-division of the building with fire resisting construction:
  - b. installation of suitable automatic fire suppression systems.
- (4) The building shall be designed and constructed so that the unseen spread of fire and smoke within concealed spaces in its structure and fabric is inhibited.

In this case the new structure will be as per for a building >5m but less than 18m. i.e., all elements of structure will be required to be a minimum fire resistance of 60 minutes.

Fire stopping and cavity barrier provision will be assessed and be in line with the principles of the guidance used.

#### d. External fire spread

The external walls of the building shall adequately resist the spread of fire over the walls and from one building to another, having regard to the height, use and position of building.

(2) The roof of the building shall adequately resist the spread of fire over the roof and from one building to another, having regard to the use and position of the building.

Regulation 7 - Materials and workmanship

- (1) Building work shall be carried out -
  - (a) With adequate and proper materials which
    - (i) Are appropriate for the circumstances in which they are used
    - (ii) Are adequately mixed or prepare, and
    - (iii) Are applied, used and fixed so as to adequately to perform the functions for which they were designed and
  - (b) In a workmanlike manner.

NOTE: From December 2022 all residential buildings of Purpose groups 1 and 2; which includes Residential (other), with a top storey greater than 11m in height will be required to have an external wall construction of no less than the standard of A2-s1,d0 materials. As such all new areas of external wall will utilise materials which meet the appropriate standard as stated above and can be demonstrated by certification / test to meet this regulatory requirement. The mansard roof is 80 degrees and therefore will need to be considered as an external wall (not a roof) and thus the design will require consideration in meeting the A2-s1-d0, or better, standard.

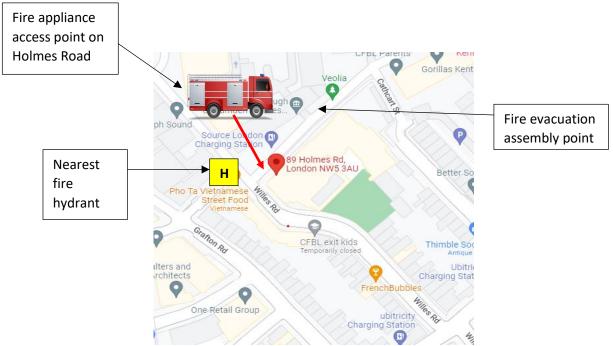
Fire resisting spread over the new walls will be assessed to ensure compliance. External boundary conditions will also be assessed, and measures taken to ensure compliance where necessary with the B4 functional requirement regarding boundary conditions.

#### e. Fire service access and facilities

Schedule 1 of the Building Regulations requires the following functional requirement to be met in respect of B5, Access and facilities for the fire service:

- (1) The building shall be designed and constructed so as to provide reasonable facilities to assist fire fighters in the protection of life.
- (2) Reasonable provisions shall be made within the site of the building to enable fire appliances to gain access to the building.

The building is not fitted with a fire-fighting shaft or a fire main (dry riser) as existing. The extended premises does not impact on the existing arrangements and all rooms can be accessed from within 45m of where a fire appliance can park outside the property on Holmes Road. (See plan below).



Fire appliance access point, nearest fire hydrant and proposed assembly point

There is a fire hydrant in the street located junction Willes Road and Spring place (see above). This is within 90m of where a fire appliance would need to park and is considered compliant.

Assembly point for evacuation. Recommended assembly point would be outside 78/79 Holmes Road near entrance to Holmes road depot. This can be assessed further as part of fire risk assessment when premises are occupied

#### 5. FIRE SAFETY MANAGEMENT

Fire safety management in buildings is a balance between the technical systems in place and how the building is then used and managed. It is not possible to rely solely on the technical provisions in the building in most cases and an active role on the part of management is essential.

Where properties are of a mixed use it is essential that all persons co-operate and co-ordinate to maintain both passive and active fire safety systems which protect the means of escape for all. As such at the point of occupation a suitable fire risk assessment must be carried out in line with the Regulatory reform (fire safety) order to identify any fire safety risks and look to eliminate or control these to an acceptable level. The responsible persons for the premises must ensure this is undertaken and any actions identified will be required to acted upon in a suitably timely manner as identified. Some of the key areas of management responsibilities are listed below (this list is not exhaustive here)

- Where necessary a fire safety management plan will be produced and kept under review
- Fire evacuation plans will be in place
- Suitable assembly points will be identified
- Testing and maintenance of all fire safety measures will be carried out, for example fire
  resisting doors will be checked to ensure they remain self-closing or kept locked shut when
  not in use.

- Any staff required for the premises will be suitably trained
- Suitable premises information will be made available for attending fire crews. As such a
  premises information pack will be provided in a suitable location (to be identified) but
  readily accessible for fire service use.

#### 6. SUMMARY

The premises is an existing public house with licensed HMO accommodation at above ground levels. The intention is to extend the accommodation facilities to a 3<sup>rd</sup> and 4<sup>th</sup> floor whilst maintaining the character of the property as a listed building.

Work undertaken will be carried out following the principles of an agreed and approved fire strategy which should show how any relevant functional requirement to the building regulations is being met.

The building is not being considered as a block of flats requiring a 'stay-put' fire evacuation strategy but is adopting the efficient simultaneous evacuation of all persons from any part of the premises on notification of fire within the building.

This fire Statement is provided to demonstrate the key concept principles that are to be adopted in the development of the site in respect of fire safety measures.

#### **REFERENCES**

- 1. Building Regulations 2010 as well as regulations 6(3), 7(2) and 38. Approved document B Vol 1: Dwellings 2019 ed, for use in England
- BS 9991 Fire safety in the design management and use of residential building Code of practice .
   2105
- LACoRS Housing -Fire Safety. Guidance on the fire safety provisions for certain types of existing housing 2008