

**Tottenham House & Estate,
Savernake,
Marlborough,
Wiltshire,
SN8 3BE.**

The Old Stables – Building 2 (on the approved masterplan)

Rev. V4 (06.05.26)

Justification for Proposed Internal Door Strategy.

1. This document has been produced to support application for the internal door package developed based on the material issued by ADAM Architecture.

2. Supporting Drawings:

200 - Rev A	Ground Floor General Layout
201	First Floor General Layout
202	Basement General Layout
221 - Rev A	Existing Historic doors to be re-used
221.1	Existing Ground Floor doors details
221.2	Existing Ground Floor doors details
222.2	New Ground Floor Fire Rated doors
222.3	New Ground Floor Fire Rated door details
222.4	New Ground Floor curved head doors
222.5	New Ground Floor curved head doors details
222.6	Ground Floor DG15 Jib door
222.7	Ground Floor DG21 Jib door
222.8	Typical First Floor Jib doors
223	New First Floor NFR doors
223.1	New First Floor FR doors
223.2	New First Floor En-Suite Doors
223.4	Clock tower door DF48
223.5	Ground Floor store door DG33A
223.6	Ground Floor store door DG31
223.7	Ground Floor store door DG35B
223.8	Ground Floor store door DG36

223.9	Ground Floor Guest Bar door DG21
223.10	Ground Floor Catering Kitchen door G13
223.11	Ground Floor Hammam and Shower doors DG03, DG04, DG07
224.1	First Floor Study arched door DF26
225	Lower Ground Floor cupboard door DB01
225.1	Lower Ground Floor Guest WC door DB02
225.2	Lower Ground Floor Lobby door ED24
SCH02A - Rev A	Photographic door survey of existing doors proposed to be re-used.
SCH04 - Rev H	Door Schedule

The Available Information

This justification has been prepared based on the following information produced by ADAM Architecture.

- THB002-ADA-XX-ZZ-SH-A-0022.
Archived Internal Door - Condition Survey, Survey Sheet 1 - 10, January 2025.
- THB002-ADA-XX-01-SH-A-0023
Archived Internal Door Type Elevations, January 2025.

The Existing Condition of Historic Doors:

The following door types and quantity have been identified:

- Six Panelled Flush Beaded Door
- Four Panelled Square and Beaded Door
- Four Panelled Square and Moulded Profile Door
- Four Panelled Square Profile Door
- Four Panel Flush Beaded and Panelled Door
- Six Panel Fielded Door
- Square Profiled Arched Door

There are no existing records identifying the original locations of individual doors, as confirmed. The analysis of the information contained within the *Tottenham House and Estate: Condition Survey & Schedule of Works for the Old Stables* by Adam Architecture indicates that six-panel doors were predominantly located at ground floor level and four-panel doors were generally on the first floor.

Survey:

Although a number of internal doors survive, many are in poor condition, having been subject to previous alterations. Following receipt of drawing information from ADAM Architecture, a further site inspection was undertaken in February 2025. The survey has highlighted that generally one-third of the archived doors are in poor condition.

Approach

The approach of the internal doors has been developed from a heritage and fire safety perspective. The proposed strategy adopts a balanced strategy to reconcile conservation principles and the fire strategy produced by the Fire Consultant, 3-FE.

In the first instance, the approach to internal doors has been to repair and restore existing doors wherever possible. There were 15 doors salvaged from the ground floor of the stables, in various states of repair ranging from fair to poor. The intention is to reuse 9 of the examples in fair condition within the ground floor proposals.

Fire Safety:

The Fire Safety design for the Stable is based on the following British Standards as guided by the Fire Consultant (3-FE) in line with the legislative framework:

- **BS 9991:2015.** *Fire Safety in the Design, Management and Use of Residential Buildings. Code Of Practice.* Where BS 9991 does not provide a guidance or make recommendations on a particular aspect of fire safety then alternative document is being used.
- **BS 9999:2017.** *Code of Practice for Fire Safety in the Design, Management, and Use of Buildings Suited for Non-Residential Buildings.*
- **BS 5839-1: 2017.** *Fire Detection and Fire Alarm Systems for Buildings – Part 1: Code Of practice for System Design, Installation, Commissioning and Maintenance.*

- **BS 5839-6: 2019.** *Fire Detection and Fire Alarm Systems for Buildings – Part 6: Code of Practice for the Design, Installation and Maintenance of Fire Detection and Fire Alarm Systems in Dwellings.*
- **BS 5266-1:2016.** *Emergency Lighting. Code of Practice for the Emergency Lighting of Premises.*
- **BS 5499-4:2013.** *Safety Signs. Code of Practice for Escape Route Signing.*
- **BS ISO 690:210.** *Information and Documentation – Guidelines for bibliographic References and Citations to Information Sources.*
- **BS 9990:2015.** *Non-Automatic Fire-Fighting Systems in Buildings – Code of Practice.*
- **BS 476-7:1997.** *Fire Tests on Building Materials and Structures. Method of Test to Determine the Classification of the Surface Spread of Flame.*
- *Approved Document Part B (ADB) Vol II. Buildings Other Than Dwellings*

A detailed survey of the two selected representative doors DG15/2 and DG19 (identified by ADAM Architectre as in fair condition) was undertaken by specialists; Smith & Brown and Kiwa Fire Safety Compliance' who highlighted further issues. The surveyed doors presented significant defects in the material that will negatively impact their fire resistance performance. This includes - but not limited to - increased rate of burn and door leaf deflection, applicable to remaining historic doors. Due to these findings, it is not possible to assess the fire resistance of historic doors without a live fire test. As a result, it is proposed to re-use as many of the historic doors as possible and where possible ensure their historic value has not been lost. It is proposed that the doors be re-used in openings excluding new walls in modern construction (as agreed by Wiltshire LPA on the first floor) and compartmentation walls.

The Fire Strategy provides an appropriate level of fire safety for both life safety and property protection. This approach reflects the Stables' function as an extension of the accommodation within the Main House. The residential floor layout of the Stables incorporates corridors providing access to four protected staircases rising from ground-floor level. These are separated by 60-minute fire-resisting compartmentation walls, forming enclosures to the protected staircases. Access is provided via 30-minute fire resistant doors fitted with smoke seals (FD30S). It is noted that the Main House has always been a single dwelling and, in this case, improvements are being sought as part of the refurbishment. The use of the Stables has changed for it to serve as residential building and, as a result, stricter and more

comprehensive fire safety and building regulation requirements apply. This triggers a legal duty to fully review the building's fire safety to meet modern standards.

The Stables building will be used for recreation with entertainment rooms located on the ground floor. These are supplemented with the sleeping accommodation that will be used for short-term stays by guests. The occupancy characteristic assigned to the ground floor areas fall under 'awake and familiar' while bedrooms on the first floor 'asleep and unfamiliar' in line with guidance of BS 9999. As the Building contains rooms designed for it mandates that doors along the fire escape routes and protected areas are certified to ensure safety for the occupants.

The Strategy:

It is proposed that number of archived historic internal doors will be reinstated in selected locations throughout the building to achieve coherence with the new function of the Stable as a residential building. The necessary repairs will be carried out on 'like-for-like' basis in respect of timber species (workmanship and detailing, unless a sustainable source cannot reasonably be obtained). The design of the proposed new doors will be informed by surviving historic fabric to match existing examples as best as possible and will be supervised by the joinery specialist sub-contractor, Edson & Company Limited.

The reinstatement of the existing historic doors has been assessed based on:

1. Condition survey produced by ADAM Architecture.
2. New door jamb details recreated based on Adam Architecture historic record.
3. Site survey of currently constructed and existing structural openings.
4. The agreement reached with Wiltshire LPA and Adam Architecture to use new doors in openings within new blockwork walls on the first floor.
5. Fire Safety Legislation and Fire Safety Strategy.

Fire safety was the primary consideration in the decision to reinstate the existing historic four-panel and six-panel doors in walls that are not fire compartmented. Non-fire-rated doors cannot achieve certified fire resistance based on their thickness alone and cannot be relied upon to prevent the spread of flames or smoke in the event of a fire, irrespective of their dimensions.

Upgrading historic doors without appropriate certification means that compliance with the FD30S standard cannot be assured during statutory inspections, as there

is no verifiable evidence that it would perform safely. Such interventions generally provide little or no measurable fire resistance and may result in premature failure, thereby posing a potential risk to life safety. The lack of performance of fire doors presents an irreconcilable issue for the building's compliance and for verification that it meets UK safety and building standards. The underperformance also poses a risk of fire spreading beyond what is 'necessary', thereby exacerbating damage, rather than containing the fire and limiting both fire and water damage upon the arrival of the fire brigade.

Fire performance is dependent upon numerous variables, including timber species, construction, and condition. The identified common failures of such interventions relate to distortion (wrapping), joint failure, and burn-through. The effectiveness of upgrades, especially on the ground floor, is constrained by door size and geometry and most likely will require intrusive alterations that will compromise the historic fabric. The over cladding (with fire resistant materials) of historic doors could potentially damage their integrity weakening the structure thus further impeding on their performance after upgrades.

A specimen of the existing four-panel door (first floor) and six-panel flush beaded door (ground floor) have been assessed by a testing, inspection and certification organization (KIWA) as approved by Wiltshire LPA. It is estimated that a char rate of 0.9mm/min means that doors would burn through in approx. 15 minutes however, this is not expected fire rating performance of the whole leaf. It is expected that the fire resistance would be less than this. In order to establish the specific fire rating of each historic door type (for ground and first floors), it would be subject to a destructive live-fire test conducted by an accredited independent laboratory. This approach was discounted by the Team on conservation grounds.

Ground Floor

It is proposed to reinstate as many historic six-panel flush-beaded and large six-panel fielded doors as practically possible. These will be installed in non-compartmentation walls to ensure that the historic doors are preserved without the need for overcladding, allowing their aesthetic value to be protected and fully appreciated. The proposed locations have been assessed based on a site survey of structural openings, historic door jamb details and door leaf sizes. An additional factor influencing the reinstatement of historic doors is the demolition of cross-bracing walls in the West and North Ranges.

Please refer to Ground Floor GA (DWG 200) indicating the proposed locations of reinstated historic doors.

No	Door Number	Condition	Re-use	Location
1	DG01	Fair	Yes	Lobby G08A
2	DG12	Fair	No	-
3	DG14	Fair	Yes	Housekeeping G01
4	DG18	Poor	No	-
5	DG19	Fair	No	-
6	DG30	Poor	No	-
7	DG37	Fair	Yes	Lobby G14A
8	DG41	Fair	Yes	Lobby G08A
9	GF Stable Door 1	Poor	No	-
10	SB DR15	Fair	Yes	Lobby G08A
11	SB DR17	Fair	No	-
12	ED03	Poor	Yes	Lobby G15
13	ED05	Poor	Yes	Lobby G03
14	D05	Fair	Yes	Games Room G04
15	DF41	Fair	Yes	Staff Area Store G14B

First Floor

The doors at first-floor level, which are predominantly four-panel, are generally proposed to be replaced with new. Where new blockwork partitions are introduced, new doors are proposed, which will be designed to replicate the originals in terms of species/materiality, proportions and detailing. This approach will also be applied to the fire-compartment walls on this floor, and which have been approved under a separate application. An existing historic arched door (DF42) will be retained and reused in the Study (G45/46).

Ironmongery:

Internal Ironmongery will form part of a separate planning submission.

Conclusion:

The internal doors strategy balances conservation principles with fire safety of the Stables' occupants and the building itself. The existing doors are reinstated where practically possible to minimise harmful interventions that are required for upgrading these to protect from both fire and smoke to minimum of 30 minutes.

Fire safety is the primary factor, with certified FD30S doors required in protected routes and compartment walls in accordance with relevant British Standards and Approved Document Part B. As existing historic doors cannot reliably achieve compliant fire performance without intrusive alteration, their use is limited to low-risk locations. This allows for safe evacuation of the occupants and the building to prevent any structural and water damage.

New doors are designed to match details of historic doors to achieve visual consistency whilst safeguarding the character of the building. This will ensure compliance with the Fire Safety and Fire Strategy delivering a safe, compliant and functional building. This is verified by the Building Regulation Officer (BCO), who issues the Completion Certificate based on the final, mandatory inspection confirming that all construction meets current legislation.

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