

Appendix 8 – Update on Fire Door Assessment

In February 2021, a fire risk assessment for the KGV pavilion, old pavilion and workshop was carried out by a qualified and experienced external contractor. The following issues were highlighted regarding a number of fire doors in the pavilion. They were as follows:

- The door to the kitchen off the George Room is not closing to latch and there are excessive gaps to the side of >15mm and >30mm to the bottom. The door should be adjusted to gaps all around to < 3mm +/- 1mm, and should be adjusted to close to latch
- The door to the toilets from the Regency Room is not closing to latch and should be adjusted
- Double smoke lobby doors appear to be 30 minute doors fitted with overhead self closer and intumescent strips and smoke seals. There are excessive gaps >10mm to the top of the double smoke lobby doors near changing rooms 2 and 7. The doors should be adjusted to reduce the gaps all around to < 3mm +/- 1mm.
- It is recommended that all works should be completed by companies with third party accreditation

In response to this, a second contractor specialising in the fitting and maintenance of fire doors was contacted and asked to review the issues identified above and make recommendations moving forward.

Below is their response:

Double fire doors in corridor by changing rooms 2 & 7:

- the doors installed are FD30s rated fire doors – they are 44mm thick, have fire rated hinges, intumescent strips and cold smoke seals, fire rated glass and good door closers, all those things the contractor would expect to find. However, they have not been installed very well.
- Essentially, to make the doors compliant with perimeter gaps of 3mm, the frames would need to be adjusted for two of them and remove the other three, resize the frame to suit and then reinstall the door/frame. While doing this work, the frame would be moved, which would in turn create a gap between the back of the frame and the wall substrate. This gap would then need filling with the relevant fire stopping materials dependant on the size of the resulting gap.
- There doesn't appear to be any hardwood lippings on the bottom edge of the door leaves, which restricts what can be done to rectify the threshold gap, which is where the automatic drop-down seals mentioned previously at the site visit come into play as they can cover up to 10mm of threshold gap. One thing to consider with these drop-down seals though is what looks like a metal bar added to the bottom of the door leaf, which is a shame on new doors. The only other real option-would be to remove all the doors, resize and reinstall – which pushes potential costs up.
- Another issue is the frame to the double doors in the corridor. The part of the frame was 20mm thick, as mentioned. This should be 32mm thick for a 30-minute fire rated door-set, and the lack of architraves is a concern because there is no more frame going into the wall. 20mm is also the thickness of a standard door frame you can buy from a builder's merchants. If this frame is found to be only 20mm thick, then the door-set with need to be replaced.

Ladies Toilet door:

- This needs to come out, be resized and reinstalled – but as the threshold slopes, a drop-down seal might also be required depending on the gap once reinstalled.

Other doors not referred to in the fire risk assessment:

- There is a concern the other frames are going to be standard frames too. It is recommended that all doors in the building are to be surveyed to identify any non-conformities. It is strongly recommended to remove the architrave on a couple/few doors to check the frames used. This intrusive inspection could be carried out on non-public facing doors – maybe the inside of the door with the missing handle? At survey stage architraves would be gently peeled back to give a line of sight to be able to measure the frame thickness and see if the fire stopping present is to BS8214:2016 or not – there will be some resultant damage, but this would be kept to a bare minimum. This would then give a much better overall picture and give the Committee more ammunition to go back to the installers.
- The charge for surveying all the doors in the building – the usual daily minimum for surveys £360+VAT plus £250+VAT for the resulting cost estimate and survey report. However the contractor has offered to £250+VAT for all doors surveyed including the resultant estimate/report.

General Advice:

- As part of the project handover, the Charity should have received various documents as part of the Operations & Maintenance Manual. The main document here would be the Fire Test Evidence for the doors used. This would highlight how much the door leaves could be cut down by without affecting the certification of the doors. If we take the perimeter and centre gaps of the double doors into account, this reduces the amount that would need to be trimmed off, but we're still looking at 18mm of door leaf to lose across the pair, and without Fire Test Evidence allowing this, we're limited to 3mm per edge under BM Trada Q-Mark.
- The Charity should also have received similar documents for the closers, locks, hinges etc. The closers fitted are fine. The Charity should have been given the data sheets for all ironmongery.
- A suggestion would be to contact the company who carried this work out and ask for their fire door accreditation and the handover documents for the Charity's O&M Manual. The Charity also has serious recall on their work; the contractor only looked at some doors, but they all had signs of being installed incorrectly and need a good amount of work to make them compliant fire doors.
- The contractor has asked for plans for the building, including the fire compartmentation plan for the building as this would show what fire rating each wall will have (the contractor can then gauge if the correct fire rating has been used with the doors and if a fire door is even required in each particular location).

Recommendations:

1. To instruct the second contractor to resolve the issues with the doors highlighted in the fire risk assessment (see estimate attached).
2. To consider instructing the second contractor to undertake a survey of all fire doors.
3. To agree a course of action against the contractor who installed the fire doors.

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