

NBS Equivalent Technical Specification

Martin Roberts Capital⁴⁵ Range of Doors & Frames

Summary:

A complete multipurpose range of premium inward and outward single or double doorsets.

Doorsets are single swing only.

Fire rating up to 4 hours, tested in accordance with BS EN 1634:1.

Smoke seals tested in accordance with BS EN 1634-3.

Door leaves 45mm thick and manufactured from 1.5mm thick Zintec steel.

Door frames manufactured from 1.5mm thick Zintec steel, in a 160mm double rebate profile, with the option of other frame profiles available on request to suit customer requirements.

Vision panels are available, with a 5mm Firelite as standard glazing. Standard sizes in mm are 203x356, 203x762, 254x457 & 254x813.

Louvre panels are available, using a Fire Block cartridge system. Standard size in mm is 203x203.

Door Leaf Construction:

45mm thick and manufactured from 1.5mm thick Zintec steel.

The leaf is constructed with a double pan construction which is fully enclosed and welded all the way around the leaf. Minimum of 6 no dog bolts rising to 9 once the structural height exceeds 2200mm. Internal reinforcing as required dependant on hardware requirements.

Infilled with mineral wool and bonded to both door skins using a heated power press, thus ensuring maximum adhesion and a flat warp and distortion free panel.

Fully integrated pry strip on external face of the single door which overlaps the lock post, the double door also incorporates an additional internal folded pry strip on the inactive leaf.

Frame Profiles:

Standard jamb and head profile – double rebate profile – 160mm x 65mm overall.

Standard head, jamb, sill corner construction to be bolted together for ease of assembly on site.

Welded frames are an added extra. Frames to be fully finished, ready for painting.

Frames to be fully filled with mineral wool.

Frame to incorporate factory preparation for flush mounting hinge plates and strike plates for locking mechanism.

Second fix – frames installed with a minimum of 6 through bolt type anchors per jamb. Single frame head members to generally have 3 fixings, double frame head members to generally have 5 fixings. Fixed through the adjustable frame adjusters which compensate for most irregularities in the structural opening.

Frame fixing holes to be plugged with snap-fit steel bungs supplied by the manufacturer. The steel bungs are painted as per the colour of the frame.

Frame Seals:

Silicone self-adhesive tear drop gasket black in colour fitted on frame rebate and down all pry strips. Suitable for smoke seal applications tested in accordance with BS EN 1634-3.

Sizing:

Variant	Min Height	Max Height	Min Width	Max Width
Single outward opening doorsets	1500	2950	600	1470
Double outward opening doorsets	1500	2950	1050	2830
Single inward opening doorsets	1500	2950	600	1470
Double inward opening doorsets	1500	2950	1050	2830

Fire Rating:

Capital⁴⁵ doors are available with a fire integrity rating of up to 240 minutes with a Hexacomb infill, or up to 180 minutes with a mineral wool infill, certified by Exova under the CERTIFIRE scheme.

Acoustic Rating:

Tested by UKAS-accredited BRE to BS EN ISO 10140-2:2010, Capital⁴⁵ doors are certified to provide up to 36dB of noise reduction.

Thermal Rating:

Tested by UKAS accredited Exova to BS EN ISO 10077-1:2006.

Variant	U Value (W/m ² K)	
	Mineral Wool Infill	Hexacomb Infill
Single doorsets without vision panel	1.9	3.3
Double doorsets without vision panel	2.0	3.3
Single doorsets with vision panel	2.0 – 2.8	3.4 – 3.8
Double doorsets with vision panel	2.1 – 2.8	3.4 – 3.8

Threshold Options:

No threshold as standard, but are available on request.

Maximum bottom door gap for fire rated doors is 20mm. Surface mounted drop seal supplied as standard.

Vision Panels (Fire Rated):

Frames used are Zero Seals Lo-PRO Range. Made from cold rolled steel which is then galvanised grey primed as standard and polyester powder coated as required. Folded frames which create a low profile flush to the door look. Special security fasteners are used to fix both sides of the vision panels.

5mm thick Firelite glass supplied by the door manufacturer or by others to match fire rating specification. Method of fixing in accordance with the manufacturer's instructions, using fire resistant gaskets supplied.

Any size vision panel can be used as long as it fits within the below:

- Height of the cut out not to exceed 1524mm.
- Width of the cut out not to exceed 610mm.
- The permissible maximum area of the cut out should not exceed 0.46m².

Louvres (Fire Rated):

Louvres to door leaves only, providing fire performance ratings up to 4 hours in accordance with BS EN 1634-1. Manufactured from intumescent material and supplied with non-vision steel cover grilles. Cover grilles secured to door leaf with self-tapping screws. Cover grilles available in primer only or top coat finished as per door leaf.

Ironmongery Sets:

General purpose locks:

- Mortice sashlock
- Mortice deadlock
- Solenoid lock

Panic escape hardware:

- 3 point panic bar

Finish:

Polyester powder coated, as standard. Factory applied from a selection of 58 standard top coat colours. Other colours available on request at additional cost.

OR

Epoxy powder coat primer. Suitable for the majority of site applied top coat finishes. Consult the manufacturer for compatibility.