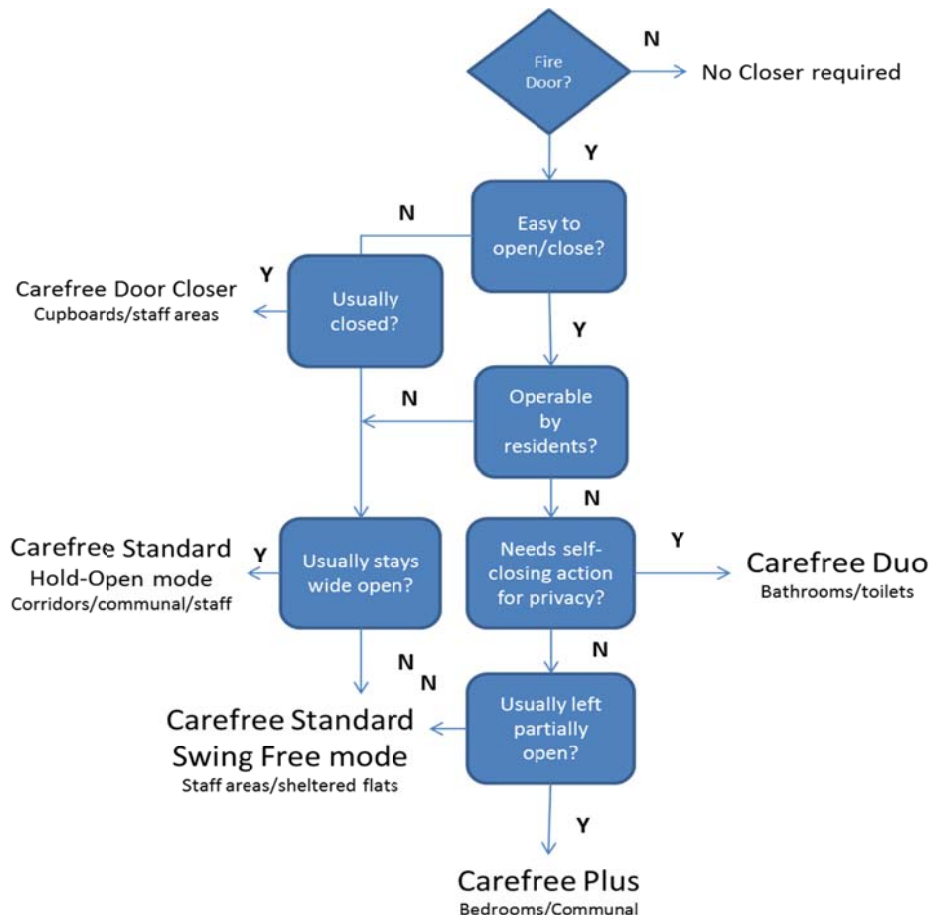


Design Guide notes

Product Selection

The key questions to be answered when selecting the correct system can be traced through the decision tree below:



Positioning

When designing for a care facility the preference should always be ensure a non-institutional look and positioning the door closers behind to door largely hides them from view.

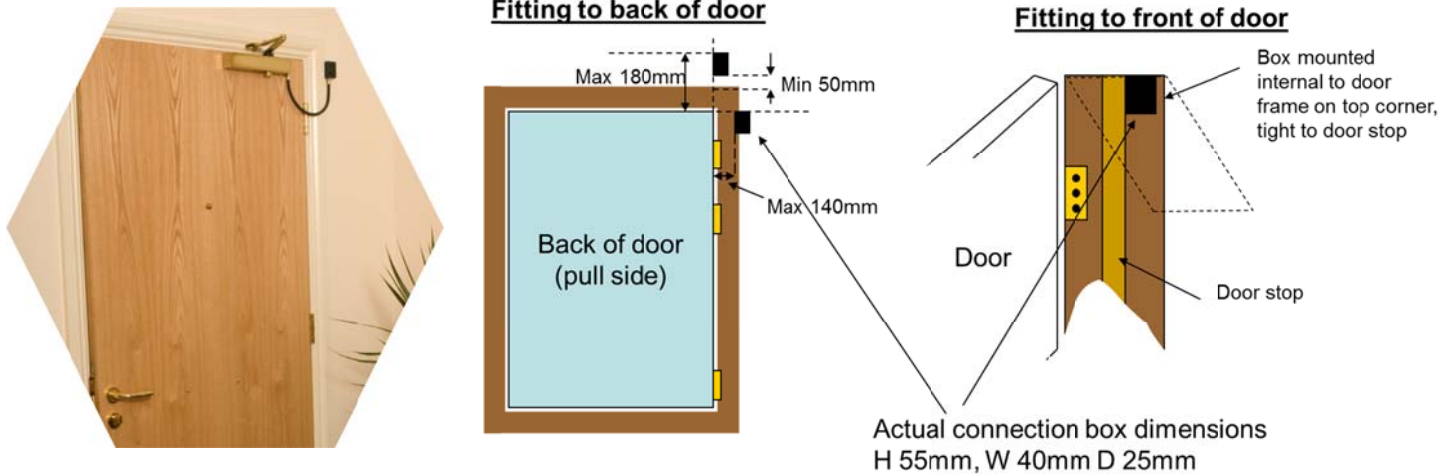
The Carefree Range only requires 50mm clearance between the back of the door and any adjacent wall so for most buildings, positioning the unit behind the door should not be a problem.

Wiring system

Provided the overall system has been correctly designed, the Carefree devices will all failsafe and therefore fire protected cable should not be used. The Carefree units would normally be daisy-chained in radial circuits. For easy fault management we would recommend that circa 15 doors on any one radial circuit is a reasonable limit. The cable size should be selected to ensure the nominal voltage does not drop below 21.5V. For cable sizes above 1.5mm, terminating into the wire loop junction box may become difficult. As a low voltage safety circuit, an earth should not be connected.

Termination points

The wiring to the door frame is best concealed inside the walls and brought directly into the back of the terminating box on our wire loops. The diagram below shows the box positions.



Power and interfacing

The Carefree units require a supply of 24VDC smoothed. The units fail to safe (doors close) when the power is removed.

Holdfire offer power supplies in two sizes, 16 door (PS2E) or 32 door (PS4E). Both have control inputs for interfacing to the fire system. In premises with an addressable fire system, the most usual arrangement would be to position the power unit in a cupboard or riser and arrange an Addressable Interface Unit on the fire system loop to be adjacent.

For non-addressable systems, the fire panel will have volt-free contacts that open on fire condition. These contacts are usually not rated to switch heavy loads and it is good practice to use these only for controlling power units with internal relays or the coil of a separate fire relay.

Note that to meet the requirements of BS7273 Category A or B, the door system must not be driven by sounder circuits or sound activated.

Contact

If this note does not answer all your questions, try the FAQ page on the website or give us a call on **0800 1116104**