RUTLAND

An architect's practical guide to

SPECIFYING DOOR CLOSERS

You want to ensure your projects are delivered on schedule, within budget and fulfil your clients' expectations.

'There are various industry considerations you need to take into account.'

When working on a project from start to finish, it can be easy to overlook smaller details such as door closers. But what many architects and specifiers don't realise is that door closers play a central role in contributing to the overall safety and security of your project.

Specifying door closers involves more than simply making sure they complement your design vision. There are various industry considerations you need to take into account.

Read on for details of what they are. They'll help you make sure you select efficient and compliant door closers that provide exceptional lifetime value.

Compliance

The Equality Act 2010

Formerly the Disability Discrimination Act, The Equality Act 2010 makes it unlawful in the UK for:

1. **Employers to discriminate against disabled employees, and**
2. **Service providers to treat disabled people less favourably.**

In October 2004, the Act was toughened to make sure service providers offer disabled access.

The Equality Act relates to services rather than premises, which means, strictly speaking, that buildings and products (such as door closers) can't actually be classed as being 'Equality Act compliant.' However, that doesn't mean you can ignore it.

You're still required to meet your Equality Act obligations by making sure your closers comply with Building Regulations and British and European standards, in particular, British Standard 8300.

(To read the UK Government's full guidance on The Equality Act visit: **www.gov.uk/equality-act-2010-guidance**).

Ideally, your closers should have an efficiency of 65% or higher.

Compliance cont'd

British Standard BS 8300

Traditional heavy manual doors can be difficult for people with disabilities to open and close. However, the efficiency of your door closer makes all the difference between hindering and improving accessibility.

The efficiency of a door closer is the closing force expressed as a percentage of the opening resistance. Ideally, your closers should have an efficiency of 65% or higher.

According to BS 8300:

> **....the force required to open a door should not exceed 30N between from 0° to 30°, and must fall below 22.5N between 30° to 60°.**

Many door closers are specifically designed to be BS 8300 compliant. Your supplier should be able to advise you on which products meet British Standard requirements.

For instance, The Wellington Hospital in London is the largest private acute hospital in the UK. They approached us because they needed a door closer that would prevent their doors from being a barrier for less able visitors and patients, and easier for hospital staff to open when they had equipment with them.

We recommended our TS.9205 high usage architectural door closer because of its high efficiency ratings:

- **Standard arm** - 73% (pull side) efficiency
- **Parallel arm** - 83% (push side) efficiency

CE marking

CE marking is a clear sign that products meet EU safety standards and comply with EU legislation. On July 1, 2013 the Construction Products Regulation came into force, making CE marking mandatory for door closers that are used on fire/smoke compartmental doors.

EN 1154 and 1155

In the case of door closers, all fire and smoke control doors (other than those locked to cupboards and service ducts) must be fitted with fire door closers that conform to EN 1154.

This particular British Standard is the global standard for controlled door closing devices and is a mandatory requirement for CE marking. In order to comply with EN 1154, door closers must be subjected to rigorous performance testing.

For instance, we endurance test our closers for high-traffic applications to the equivalent of 2 million open/close cycles.

Are you looking to specify door closers with electrical components, such as electromagnetic hold open devices? Then you'll need to make sure they meet the requirements of EN 1154 and the supplementary standard, EN 1155.

EN 1155 relates to electrically powered hold-open devices for swing doors and the associated requirements and test methods.

Compliance cont'd

Fire rating

Ironmongery such as door closers, hinges, locks and latches can all impact a door's fire resistance performance.

To ensure your closers meet the relevant fire safety standards, ask yourself:

- Are the door and frame fire rated?
- What fire rating does your closer need to have: 30, 60 or 120 minute?

For example, our TS.3204 Contract Closers are tested to 120 minutes in successful EN 1634 fire tests as part of our Firecat™ global accreditation, which is designed to promote higher standards and greater durability in door controls.

Materials and finishes

Look for closers that feature slimline characteristics, high quality finishes and are available in a range of materials and metal finishes, such as satin stainless steel, polished nickel plate and polished aluminium.

Concealed closers can also help enhance aesthetics and create homely and less institutionalised environments.

Certain applications also require certain materials. For instance, if you're working within a swimming pool or sea front environment, it's imperative you specify a solid stainless steel cover and arm with solid, stainless steel fixings to help prevent corrosion. Some suppliers use the code SSS (Simulated Stainless Steel), which is actually a satin nickel finish on a steel base material that may look good, but isn't as effective as withstanding corrosion resistance as solid stainless steel.

Safety is always top priority, but you also need to specify door closers that match the décor and style of your design space.

Installation

It's all very well opting for a beautifully designed door closer, but how practical is it to fit?

It goes without saying, but there's little point in specifying a door closer that ticks all of the design boxes but is complex to install (especially if you have multiple units to fit within a tight timescale!).

The more complex the closer is to install, the greater the overall cost to the project. And there is an increased risk of future malfunction due to installation error.

The best way to counteract this issue is to look for door closers that have been specifically designed to be fast and easy to fit. This saves everyone involved in a particular project a lot of time (and frustration) in the long run.

An example of this is our TS.9205 Architectural Door Closer. With its easy-to-read instructions and adjustable power EN 2-5 mechanism, it can save approximately 12.5 minutes on fitting time from opening the box to walking away.

Look for door closers that are fast and easy to fit.

CHECKLIST

Here's a summary of what to look out for next time you specify door closers.

- The Equality Act 2010
- British Standard BS 8300
- CE marking (EN 1154 and 1155)
- Fire rating
- Materials and finishes
- Installation

Notes

It's the little things that make a big difference

As easy as it might be to treat finer design details, such as your door closers, as an afterthought, considering them sooner rather than later will help you maintain compliance and specify the right closer for the job, first time around.

Do you have any door closer specification queries?

We also run RIBA standard seminars on door closer specification.
Call us on **01246 261491** or email **support@rutlanduk.co.uk**.

About Rutland

Our cleverly designed, durable door controls contribute to safe and attractive building environments. Optimised for design, performance and reliability, our products feature on millions of doors worldwide, from hospitals and schools to manufacturing facilities, skyscrapers and historic buildings.

Contact us

To find out more visit **www.rutlanduk.co.uk**

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