Halton SCS

CE marked Smoke Control Damper for single compartment



- CE marked according to the product standard EN 12101-8:2011
- · Fire resistance class
 - o E600 120(hodw-i↔o) S 1500C10000 AAsingle
 - o E600 120(hodw)-i↔o) S 1500C10000 MAsingle
 - o E600 120 (Vew-i↔o) S 1500C10000 AAsingle
 - o E600 120 (Vew-i↔o) S 1500C10000 MAsingle
- Certificate of constancy of performance 0809-CPR-1018
- Classification of casing leakage EN 1751 class C
- Manufacturing in accordance with the ISO 9001 quality standard.
- Third party certification product audit by VTT, the Technical Research Centre of Finland.
- Suitability for use in smoke extraction ducts with a maximum of 1500 Pa under pressure
- Suitability for use in ducts with a maximum air speed of 15 m/s.
- Suitability for rectangular smoke extraction ducts from size 200 mm x 200 mm to 1250 mm x 1000 mm

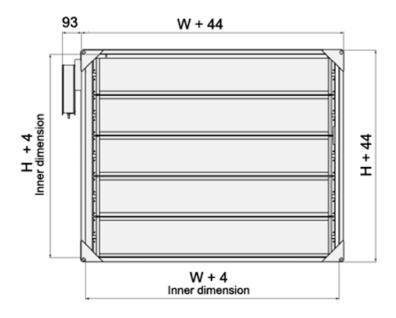
Product Models & Accessories

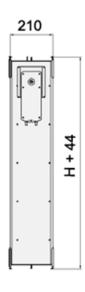
- Suitable for the automatically activated fire alarm systems (AA)
- Suitable for the manual activated fire alarm systems (MA)
- Models equipped with electric actuator (no fuse, no spring return)
- Model with stainless steel (AISI 316) material also available
- Actuator with a visual position indicator
- Circular duct connections
- Modular damper casing extension for optional protecting mesh (L+210 mm)



Dimensions

Rectangular connections (R)



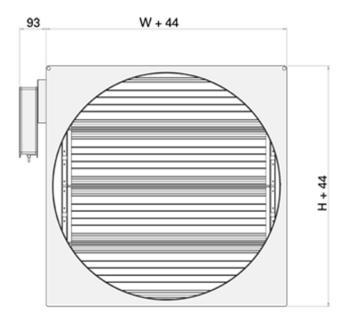


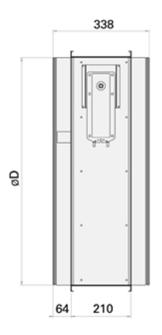
H/W	200-1000	1050	1100	1150	1200	1250
200	Х	Н	Н	Н	Н	Н
300	Х	Н	Н	Н	Н	Н
350	Х	Н	Н	Н	Н	Н
400	Х	Н	Н	Н	Н	Н
450	Х	Н	Н	Н	Н	Н
500	Х	Н	Н	Н	Н	Н
550	Х	Н	Н	Н	Н	Н
600	Х	Н	Н	Н	Н	Н
650	Х	Н	Н	Н	Н	Н
700	Х	Н	Н	Н	Н	Н
750	Х	Н	Н	Н	Н	Н
800	Х	Н	Н	Н	Н	Н
850	Х	Н	Н	Н	Н	Н
900	Х	Н	Н	Н	Н	Н
950	Х	Н	Н	Н	Н	Н
1000	Х	Н	Н	Н	Н	Н

- X Both horizontal and vertical blade direction allowed
- **H** Horizontal blade direction only



Circular connections (C)

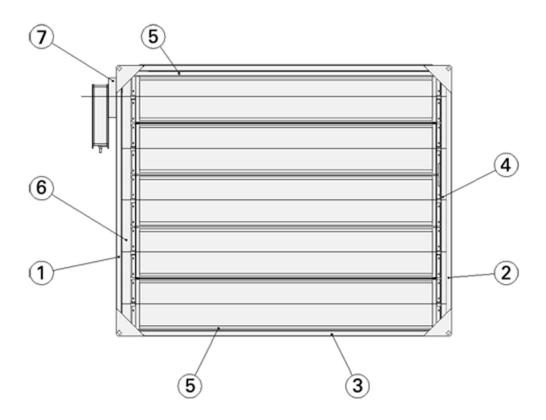




ØD	WxH
100	150x150
125	150x150
160	200x200
200	200x200
250	250x250
315	300x300
400	400x400
500	500x500
630	600x600
800	800x800
1000	1000x1000



Material



Number	Part	Material	Note
1, 2, 3	Casing	Galvanised steel	Stainless steel (AISI 316) also available
4	Blade stopper	Stainless steel (AISI 316)	
5	Support beam, W sides	Galvanised steel	Stainless steel (AISI 316) also available
6	Bearing list, form actuator side	Galvanised steel	Stainless steel (AISI 316) also available
7	Actuator mounting bridge	Galvanised steel	Stainless steel (AISI 316) also available



Accessories

Accessory	Code	Description
Damper casing extension	CE	Lenght 210 mm
E600 120 (hodw-i↔o) S 1500C10000 AAsingle E600 120 (Vew-i↔o) S 1500C10000 AAsingle	Α	Non insulated actuator
E600 120 (hodw)-i↔o) S 1500C10000 MAsingle E600 120 (Vew-i↔o) S 1500C10000 MAsingle	M	Actuator with heat insulated box

Electric actuator options

R1	BLE24 HL, operating voltage AC/DC 24 V	(no fuse, includes limit switch)
	(H or W < 400 mm)	
R2	BLE230 HL, operating voltage AC 230 V	(no fuse, includes limit switch)
	(H or W < 400 mm)	
R3	BE24 HL, operating voltage AC/DC 24 V	(no fuse, includes limit switch)
R4	BE230 HL, operating voltage AC 230 V	(no fuse, includes limit switch)



Halton SCS, model M = Actuator with heat insulated box, for automatic activation system.



Function

The Halton SCS is a motorised rectangular smoke control damper that allows smoke to be extracted from the single compartment space by dedicated smoke extraction system.

The smoke damper is made of fireproof materials with incombustible glass fiber blade gaskets. They are preventing the air to infiltrate the extraction ducts to collect smoke from closed dampers.

The Halton SCS smoke control damper shall be connected to the control and testing system delivered by Halton or to common building automation systems. The smoke control damper can be used in fully automatic (SCS/A) or manual activation (SCS/M) systems.

In case of fire sequence of operation is important, smoke extract fans should not be started before the smoke control dampers are opened.

Installation

Smoke control damper Halton SCS can be installed on the certified single compartment ducts. Damper can be also installed on the wall or floor surface. The blade direction may be either horizontal or vertical.

The correct operation of the smoke control damper must be ensured before and after installation.

After fixing the smoke control damper check the diagonal dimension. The damper should be cleaned after installation.

Detailed installation instructions, as well as an installer's installation certificate form, are supplied with each product.

See also the section Documents for detailed installation guidance.

Installation on the single compartment duct

All dampers are delivered with an installation flange, which is used to fasten the fire damper with screws to the surface of steel duct or to a connection.

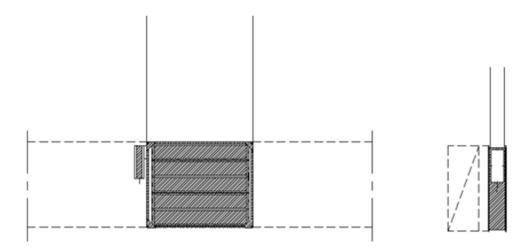
The gap between the damper and the supporting structure is filled with fireproof seal rock wool or firestop mastic, after fixing of the damper.

When Halton SCS is used as manual activated (MA) smoke control damper, connect the connection cables for electrical actuator inside of heat insulated box. Use nonflammable cables

Use M10 threaded rod for supporting the smoke control damper. See drawings below.

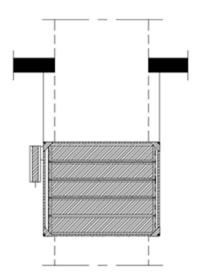


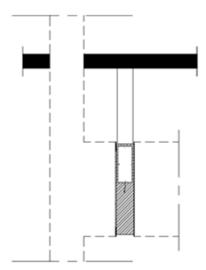
Installed to side of horisontal duct



Installed to side of vertical duct

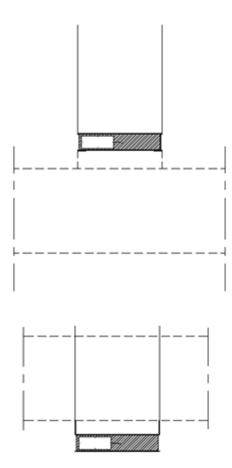
Note! Need to use CE marked smoke ducts.



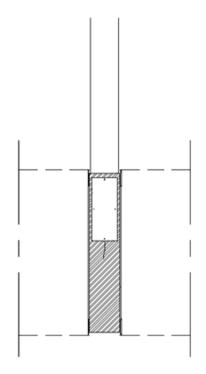




Installed on the top and bottom of duct

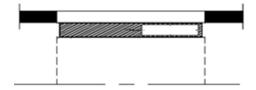


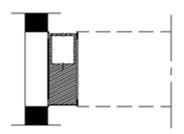
Installed in the horisontal duct





Installed on the wall or floor surface

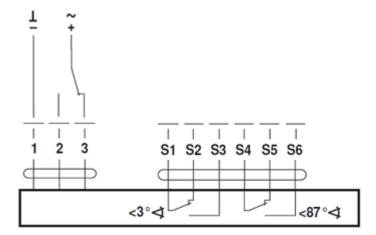




Electric actuator wiring diagram

Diagram below is used for actuators:

R1 BLE24 HL R3 BE24 HL R2 BLE230 HL R4 BE230 HL





Servicing

No regular maintenance is required for the product.

Regular testing with the separate testing system is recommended twice a year.

Upon failure during testing of the smoke damper, a Halton representative shall be connected to ensure appropriate operation of the product

Specification

Multi-blade-type single zone smoke control damper Halton SCS for rectangular and circular ducts with electric actuator and position indicator.

Damper has to fulfill the requirements from harmonised product standard EN 12101-8 and tested according to demands in standard EN 1366-10 and be labeled with CE Mark.

Smoke control damper has to be classified as:

E600 120(hodw-i↔o) S 1500C10000 AAsingle

E600 120(hodw)-i↔o) S 1500C10000 MAsingle

E600 120 (Vew-i↔o) S 1500C10000 AAsingle

E600 120 (Vew-i↔o) S 1500C10000 MAsingle

The casing and blades of the smoke control damper shall be made of galvanised or stainless steel and the blade gaskets made of incombustible material.

The smoke control damper shall be installed horizontal and vertical position, CE Marked, single compartment duct with incombustible sealing mass to ensure tightness of the connection



Product code

SCS-W-H

S = Type of connection

R Rectangular

C Circular

D = Connection size (if circular connection)

100, 125, 160, 200, 250, 315, 400, 500, 630, 800, 1000

W = Width (if rectangular connection)

200, +50, ..., 1250

H = Height (if rectangular connection)

200, 300, +50, ..., 1000

Other options and accessories

CM = Model

A Actuator without heat insulated box (for automatic activation system)

M Actuator with heat insulated box (for manual activation system)

MA = Material

CS Galvanised Steel

AS Stainless steel (AISI 316)

CT = Type of circular connection

D2 Circular connections on both sides

D1 Circular connection only on actuator side

SF = Flange option

NA Standard

L1 Standard + flange connection

L2 Flange connection on both sides

R2 Flange connection on both sides, with holes

RE = Release type

R1 BLE24 HL (electric) (H or W < 400 mm)

R2 BLE230 HL (electric) (H or W < 400 mm)

R3 BE24 HL (electric) R4 BE230 HL (electric)

AC = Accessories

CE Casing extension of 210 mm, for structural thickness < 200mm

ZT = Tailored product

N No

Code example

SCS/R-200-200, CM=A, MA=CS, CT=D2, SF=NA, RE=B3, AC=NA, ZT=N

