Halton Sec Fit Rectangular (SFR) – Smoke control damper (AAsingle)



Overview

This smoke control damper is one of the lightest in the market. Light construction makes installation easy. It is suitable for installation to smoke extract ducts. Fire resistence class for all installation options is provided up to E_{600} 90 S requirements.

Features

- Supplied with electrical non-spring return actuator (24 V or 230 V)
- Installation to single zone fire compartment with automatically activated systems (AA)
- Sizes from 200×200 mm up to 1600×1000 mm are available
- Maximum air velocity through smoke control damper in open position is 15 m/s
- Suitability for use in smoke extraction ducts with a maximum of 1500 Pa under pressure
- Frame construction is galvanised steel
- No spare parts or additional installation frames needed, regardless of installation method

Installation options

- Suitability for installation to the sides of the the horizontal smoke extract duct or directly to the end of the smoke extract duct

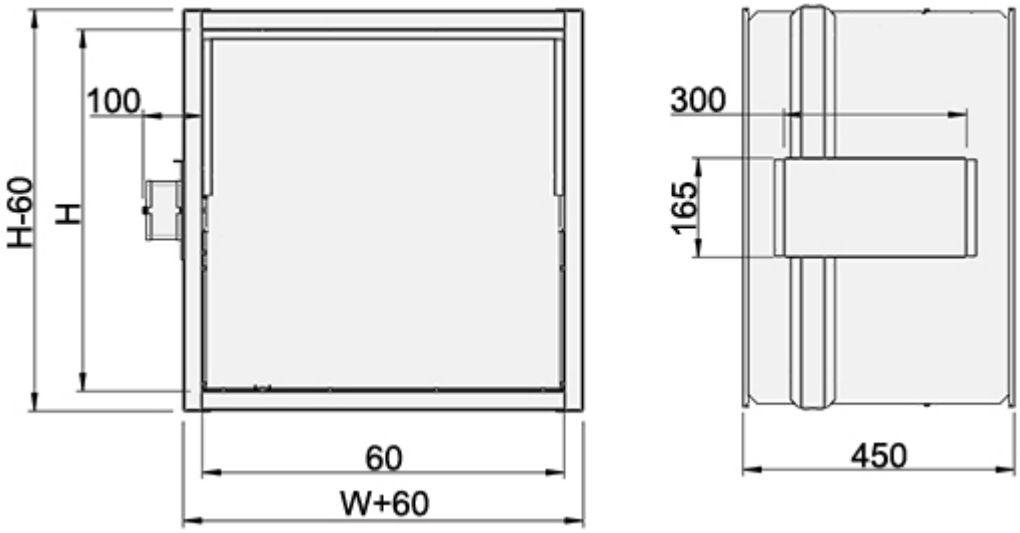
Halton reserves the right to alter products without notice.

Standards

This product complies with the following standards:

- CE certified according to product standard EN 12101-8
- Fire classification according to EN 13501-4 standard
  E_{600} 90 (v_{ed}-i↔o) S 1000C_{300} AAsingle
- Fire testing according to EN 1366-10
- CE certificate of constancy of performance No: 1391-CPR-2018/0209
- Declaration of Performance No: 10036-SFR-2019/01/01
- Smoke control damper casing tightness class C according to EN 1751
- Leakage through closed damper blade fulfils class 2 according to EN 1751

Dimensions and Weight



W = Width (mm)	H = Height (mm)
200, 250, 300, 350, 400, 450, 500, 550, 600, 700, 800, +100, ... 1600	200, 250, 300, 350, 400, 450, 500, 550, 600, 700, 800, 900, 1000

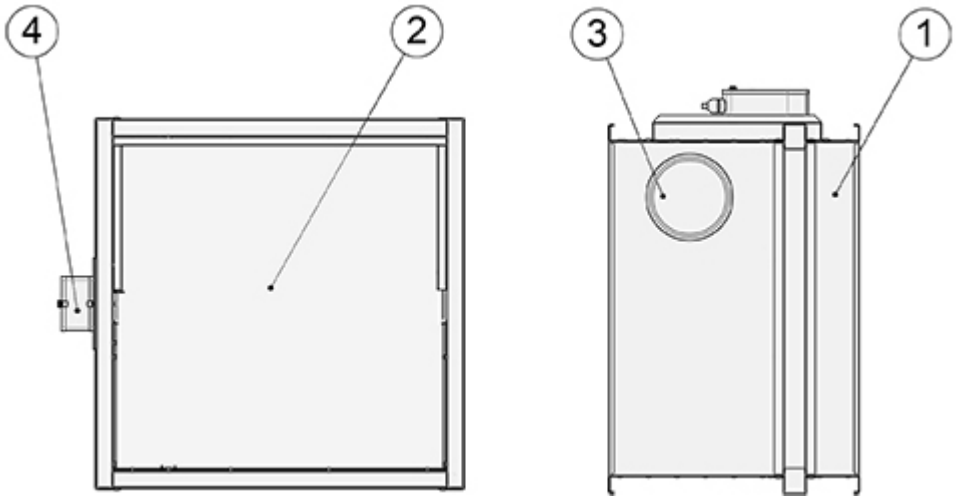
Weight (kg)

H	W											
	200	250	300	350	400	450	500	550	600	700	800	900
200	13.3	14.2	15.1	16.1	16.9	17.7	20.7	21.7	22.7	24.8	26.8	28.9
250	14.2	15.2	16.1	17.2	18.1	19.1	22.2	23.3	24.5	26.7	28.9	31.2
300	15.1	16.1	17.2	18.4	19.3	20.4	23.8	25.0	26.2	28.6	31.0	33.4
350	16.1	17.2	18.4	19.7	20.7	21.9	25.5	26.8	28.1	30.7	33.3	35.9
400	16.9	18.1	19.3	20.7	21.8	23.0	26.9	28.3	29.7	32.4	35.2	37.9
450	19.7	21.1	22.6	24.2	25.5	27.0	28.5	29.9	31.4	34.3	37.3	40.2
500	20.7	22.3	23.8	25.5	26.9	28.5	30.0	31.6	33.1	36.2	39.3	42.4
550	21.8	23.4	25.0	26.8	28.3	30.0	31.6	33.2	34.9	38.1	41.4	44.7
600	22.8	24.5	26.3	28.2	29.7	31.4	33.2	34.9	36.6	40.1	43.5	47.0
700	–	–	–	–	–	–	–	–	40.1	43.9	47.7	52.5
800	–	–	–	–	–	–	–	–	43.6	48.7	52.9	57.0
900	–	–	–	–	–	–	–	–	48.0	52.5	57.0	61.5
1000	–	–	–	–	–	–	–	–	51.5	56.4	61.2	66.0

H	W						
	1000	1100	1200	1300	1400	1500	1600
200	31.0	–	–	–	–	–	–
250	33.4	–	–	–	–	–	–
300	35.8	–	–	–	–	–	–
350	38.5	–	–	–	–	–	–
400	40.7	–	–	–	–	–	–
450	43.1	–	–	–	–	–	–
500	45.6	–	–	–	–	–	–
550	48.0	–	–	–	–		–
600	50.4	–	–	–	–	–	–
700	56.3	60.1	65.8	68.6	71.5	75.3	79.1
800	61.2	65.3	71.5	74.5	77.7	81.9	86.0
900	66.0	70.5	77.2	83.9	90.8	95.3	99.8
1000	70.9	75.7	89.8	93,3	97.0	101.9	106.7

– = Size not available as standard

Material



Number	Part	Material	Note
1	Casing	Galvanised steel	–
2	Blade	Galvanised steel	–
3	Inspection hatch covering	Galvanised steel	–
4	Operating model (actuator)	–	–

Operating Models

Electric actuator

The Halton Sec Fit Rectangular smoke control damper is equipped with an electric actuator, 24 V or 230 V (no spring return or fuse aloud). The actuator is equipped with a visual position indicator and built-in limit switches both open and closed positions.

The smoke control damper must be connected to a common fire alarm or building automation system. It can be used in fully automatic (AA) activation systems.

Order code	Operating model	Damper sizes (WxH, mm)	Operating Voltage	Limit switch
R1	BLE 24 15 Nm	200×400 – 1000×600	AC/DC 24 V	✓
R2	BLE 230 15 Nm	200×400 – 1000×600	AC 230 V	✓
R3	BE 24 40 Nm	600×900 – 1600×800	AC/DC 24 V	✓
R4	BE 230 40 Nm	600×900 – 1600×800	AC 230 V	✓
I1	Schischek InMax 50.75-s 72 Nm	1200×1000 – 1600×1000	24 V / 230 V	✓

Function

The Halton Sec Fit Rectangular single compartment smoke control damper is CE certified for horizontal duct orientation. It fulfils the fire resistance class up to **E_{600} 90 (V_{ed}-i↔o) S 1000C_{300} AAsingle** requirements.

Smoke control dampers allow smoke to be extracted from the single compartment smoke zone by dedicated smoke extraction system. In case of fire sequence of operation is important, smoke extract fans should not be started before the smoke control dampers are opened.

The smoke control damper must be connected to common fire alarm or building automation system. It can be used in fully automatic (AA) activation systems.

The smoke control damper is equipped with an electric actuator 24 V or 230 V (no spring return or fuse aloud). The actuator is equipped with built-in limit switches for both open and closed position.

The actuator has visual position indicator.

Installation

Please see/download Installation Guide for this smoke control damper from section Downloads.

Servicing

No regular maintenance is required for the product.

To ensure proper operation of smoke control dampers, an inspection must be carried out regularly according to local building codes. The minimum recommended inspection period is **every 6 months**.

Documentation of testing must be saved for future needs.

The smoke control damper must be connected to a common fire alarm or building automation system.

The smoke control damper is equipped with two inspection hatches, enabling the possibility to check the position of the damper blade.

Upon failure during testing of the fire damper, maintenance service shall be ordered from an authorised Halton representative to ensure appropriate operation of the product.

Specification

The single compartment smoke control damper is CE certified and marked according to the standard EN 12101-8 and fire tested according to the EN 1366-10 standard.

A smoke control damper of maximum fire resistence class **E_{600} 90 (v_{ed}-i↔o) S 1000C_{300} AAsingle** requirements.

The smoke control damper casing complies with the tightness requirements for EN 1751 class C. Leakage through closed damper blade fulfils class 2 according to EN 1751.

The smoke control damper can be installed to horizontal smoke extract duct or directly to the end of the smoke extract duct.

The casing of the smoke control damper is made of galvanised steel.
The blade of the smoke control damper is made of fire resistant asbestos free board (mineral fibre).

The actuator is equipped with visual position indicator and built-in limit switches for both open and closed positions.

The smoke control damper is equipped with two inspection hatches.

Order code

SFR-W-H; MA-OP-ZT

W = Width of duct connection (mm)
200, 250, 300, 350, 400, 450, 500, 550, 600, 700, +100, ..., 1250

H = Height of duct connection (mm)
200, 250, 300, 350, 400, 450, 500, 550, 600, 700, 800, 900, 1000

Other options and accessories

MA = Material
GS Galvanised Steel

OP = Operating Models
R1 BLE24 HL, 24 V, 15 Nm
R2 BLE230 HL, 230 V, 15 Nm
R3 BE24 HL, 24 V, 40 Nm
R4 BE230 HL, 230 V, 40 Nm
I1 Inmax 50.75-S, 75 Nm

ZT = Tailored product
N No
Y Yes (ETO)

Code example

SFR-300-300, MA=GS, OP=R2, ZT=N