TRIAFIRE EW ▪

DESCRIPTION

TRIAFIRE EW120 is an Automatic Fire Curtain that in the case of fire, limits and controls the fire, reduces radiation emission less than 15 kW/m2.K at 1m of dis-tance from the fabric, with classification EW120.

The curtain is composed by: fiberglass fabric with Aluminum foil on both sides seamed with reinforced steel wire and fixed to a steel roller of 78mm of diameter; galvanized steel elements as head-box, side guides and bottom bar.

All the system is driven by a 24Vdc tubular motor and controlled by an electronic board, TRIA's CRM (Control and Regulation for Motor) with special gravity fail safe system.

The control panel for automatic curtains (CBM), with nominal input voltage of 115Vac or 220Vac and output voltage of 24Vdc.

Uninterruptible Power Supply (UPS System) with autonomy up to 6 hours exists in all control panels.

Tested and approved according to the European Standards UNE EN 1634-1 and UNE EN 1363-1.

OPERATION

The system can be activated by a SHEV, fire alarm contact, internal fire and smoke detection devices, or manual emergency buttons. In the event of a fire, the TRIA's Control Panel (CBM), receives the signal alarm, and the automatic curtain deploys automatically, with controlled and safe constant speed of descent even following total power loss on all curtains. If there is a false alarm the curtains return to stand-by position automatically after reset of alarm from main Fire Management Systems. In case of main power loss, the curtain will remain fully retracted up to 6 hours thanks to TRIA's battery back-up system.

FABRIC

The fiberglass fabric has low radiation properties and resists up to 1100°C. Radiation is less than 15 kW/m2.K at 1 meter distance. All seams are done with reinforced stainless steel wires with a coating of Kevlar.

HEADBOX

Galvanized Steel head-box 1,2mm thickness with different possibilities to adapt to different architectural spaces, and maintenance requirements.
Dimensions of the head-box varies depending on width and height of the curtain.

SIDE GUIDES

Galvanized Steel from 1,5 to 3mm thickness and different dimensions depending on width and height of the curtain.

ROLLER

Galvanized Steel of 1,5mm thickness and 78mm diameter. Special slide system for fixing the fabric.

BOTTOM BAR

Galvanized Steel of 1,5mm thickness. Two-parts system easy to mount.

ELECTRIC MOTOR

TRIA tubular motor 24Vdcc
Maximum power: 24 W/ 18,5Nm
Maximum current: 3 A
Average linear speed: 0.11 m/ s

CRM MOTOR REGULATION BOX

Polyester box IP56 with an electronic board inside to control the movement of the motor.
Dimensions (W x H x D): 120mm x 160mm x 75mm

CBM CONTROL PANEL

Receives the signal alarm from Fire Management System and controls the movement of curtains. Visual and acoustic alert system.
Dimensions (W x H x D): from 300 x 230 x 140mm to 400 x 500 x 210mm
Input: 115 or 220 Vac 50Hz
Output: 24Vcc
Battery: 2 x 12Vcc 7,5 Ah rechargeable (up to 6 hours autonomy)
Maximum capacity: up to 12 motors.

OPTIONAL EXTRAS

RAL coating: head-box, side guides, bottom bar and false ceiling extra accessories.
Stainless steel elements: head-box, side guides, bottom bar, screws, rivets.
Headbox: customized set-up for specific architectural or special operational requirements.
Side guides: customized set-up for specific architectural or special operational requirements.
Bottom bar: aluminum profile painted RAL 9003 (white) for using with false ceiling accessories.
False ceiling accessories: aluminum profiles painted RAL9003 to hide head-box over false ceiling.
Electric motor: special 24Vdc motors up to 80Nm without CRM; Special 230Vac motors up to 120Nm without CRM.
**CRM:** customized board for high speed deployment.
CBM control panel: special designs up to 48 motors in one control panel, additional information output, micro switches, communication with other devices, special battery backup, possibility of delaying curtain deployment.
Escape button: pushing this button the curtain goes up and the user can escape through the opening, the curtain deploys 30s later automatically.
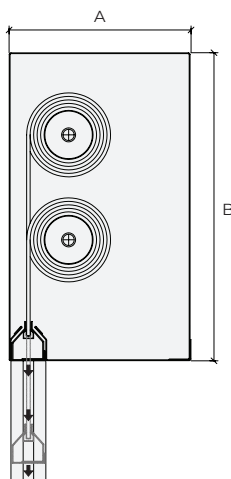**Emergency button:** pushing this button the curtain deploys immediately.

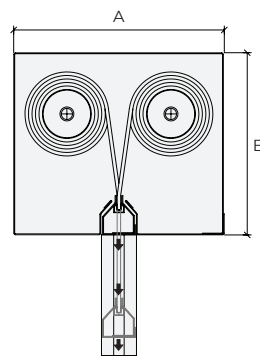**Note:** other requirements and customized solutions on demand.

HEADBOX
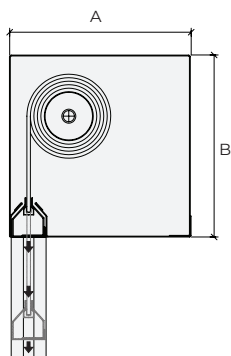
SINGLE ROLLER
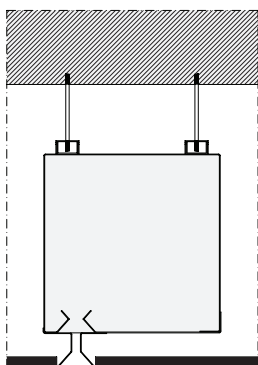
A: 180-260mm
B: 180-260mm
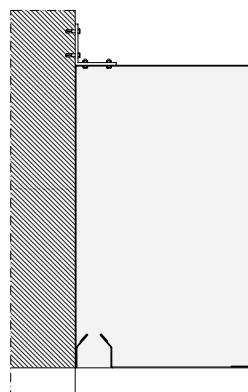
MULTI ROLLER VERTICAL

A: 190-270mm
B: 300-500mm
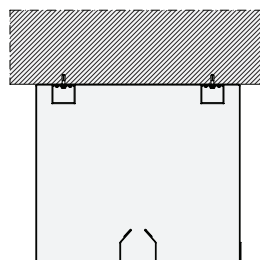
MULTI ROLLER HORIZONTAL

A: 250-400mm
B: 170-260mm
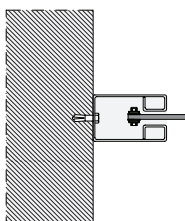
HEADBOX FIXING

HANGING/FALSE CEILING
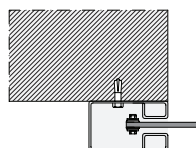
WALL

TOP CEILING

SIDE GUIDES FIXING
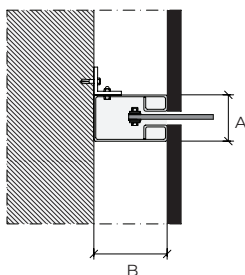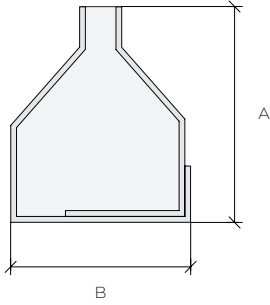
HIDDEN

A: 50-76mm
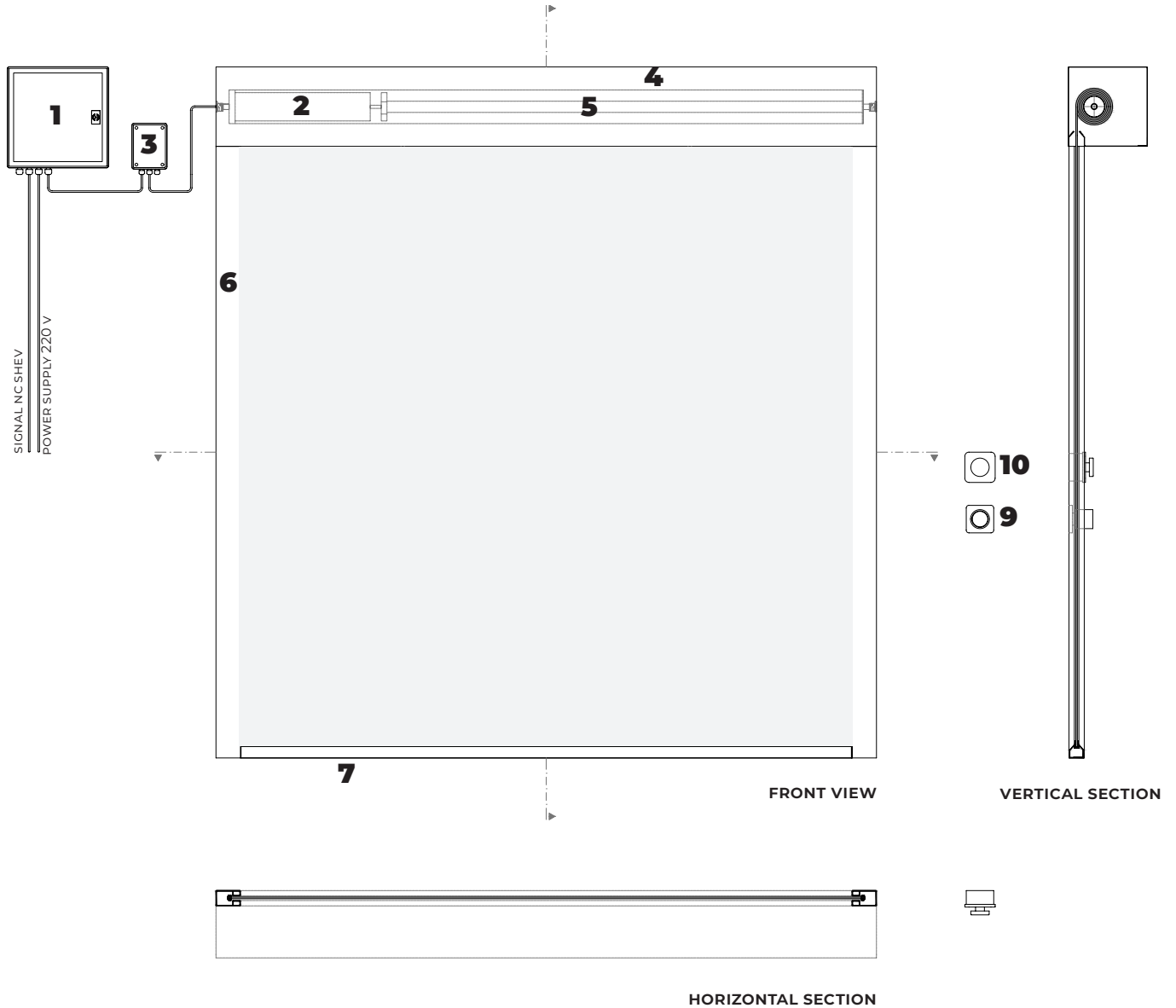B: 80-120mm

SIDE WALL

SCREW SIDE GUIDES
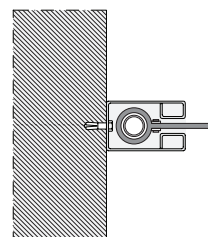
TUBE SIDE GUIDES

BOTTOM BAR

GALVANIZED STEEL

A: 55mm
B: 47mm

A

B

SIGNAL NC SHEV

POWER SUPPLY 220 V

1

3

2

4

5

6

7

10

9

FRONT VIEW

VERTICAL SECTION

HORIZONTAL SECTION

1. control panel CBM
2. TRIA tubular motor 24vdc
3. CRM electronic control board
4. galvanized steel head-box
5. galvanized steel roller

6. galvanized steel side guides
7. galvanized steel bottom bar
8. fire resistant fabric
9. escape button
10. emergency button