

# Product specification sheet Metacon-Next

## RGS EW 90

fire rated roller shutter



## FEATURES

|                                          |                                                                                                                                   |
|------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------|
| Tested according                         | EN 1634-1                                                                                                                         |
| Classified according                     | EN 13501-2                                                                                                                        |
| CE marked according                      | EN 13241, EN 16034                                                                                                                |
| Fire classification according EN 13501-2 | EW 30, EW 60, EW 90                                                                                                               |
| CE certificate number                    | 1812-CPR-1736                                                                                                                     |
| Min. dimensions (opening measures)       | width 800 mm, height 500 mm, opening $\pm 0,4$ m <sup>2</sup>                                                                     |
| Max. dimensions (opening measures)       | width 9.000 mm, height 9.000 mm, opening $\pm 18$ m <sup>2</sup> (square opening) - $\pm 29$ m <sup>2</sup> (rectangular opening) |
| Cycles max. per day                      | 5 cycles (version with chain wheel motor)<br>1 cycle (version with tubular motor)                                                 |
| Cycle test                               | C2 (> 10.000 cycles) (chain wheel motor)<br>C1 (> 500 cycles) (tubular motor)                                                     |
| Opening speed                            | $\pm 90$ mm/sec                                                                                                                   |
| Closing speed                            | $\pm 90$ mm/sec                                                                                                                   |

# RGS EW 90

## *Slats*

|           |                                                 |
|-----------|-------------------------------------------------|
| Height    | 100 mm                                          |
| Thickness | 22 mm                                           |
| Weight    | 22,5 kg/m <sup>2</sup>                          |
| Material  | shells galvanized steel, fire-resistant filling |

## *Side guides*

|          |                                           |
|----------|-------------------------------------------|
| Measures | width 130 or 160 mm per side, depth 55 mm |
| Material | galvanized steel                          |

## *Consoles/brackets*

|          |                                                                                                                    |
|----------|--------------------------------------------------------------------------------------------------------------------|
| Types    | UNP S-80, S-100 (version with chain wheel motor)<br>square 350, 400, 450, 500, 550 mm (version with tubular motor) |
| Material | electro galvanized (UNP consoles)<br>galvanized steel (square plate consoles)                                      |

## *Safety*

|        |                     |
|--------|---------------------|
| Safety | safety catch device |
|--------|---------------------|

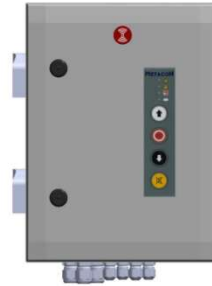
## *Installation surfaces*

|                                   |                                                                                         |
|-----------------------------------|-----------------------------------------------------------------------------------------|
| Permitted installation substrates | aerated concrete, sand-lime brick, concrete, masonry, fire-resistant steel construction |
|-----------------------------------|-----------------------------------------------------------------------------------------|

## OPTIONS

|                                           |                                                                                            |
|-------------------------------------------|--------------------------------------------------------------------------------------------|
| Indoor/outdoor application possible       | yes                                                                                        |
| Wind class                                | till wind class 5 (> 1.000 Pa)                                                             |
| Cover box, galvanized, for roll and motor | yes                                                                                        |
| Optional color parts by coating           | various RAL, NCS, Sikkens colors (gloss level $\pm$ 40%, layer thickness 80 to 100 $\mu$ ) |
| Optional parts in stainless steel         | INOX 304 or 316; only side guides, cover box                                               |

## OPERATION (chain wheel motors and control box)



Self-closing chain wheel motors

Choice in type of limit switch

Control box

Required power supply

Cable length between control box and motor

Maximum cycles per day

Standard

Optional

Accumulator/batteries

Signaling

External switches

GFA FSN 15.20, FSN 25.20, FSN 50.20, FSN 110.18

DES (digital, most common), NES (mechanical)

Metacon-Next FirePro V4

3N~400 Vac +/- 10%, 50/60 Hz

3, 5, 7, 9, 11, 15, 25 meters

25 cycles

deadman's mode (hold switch, release to stop the door)

automatically operated (takeover contact), possible in conjunction with a set of light curtains

integrated battery in control box, prevents automatic closing in case of power failure, depending on condition of batteries  $\pm$  4 hours

optical (LED) / acoustic (85 dB) signal integrated in control cabinet

push button switch up-down

key switch up-down

hand-held transmitter, 2-4 channel

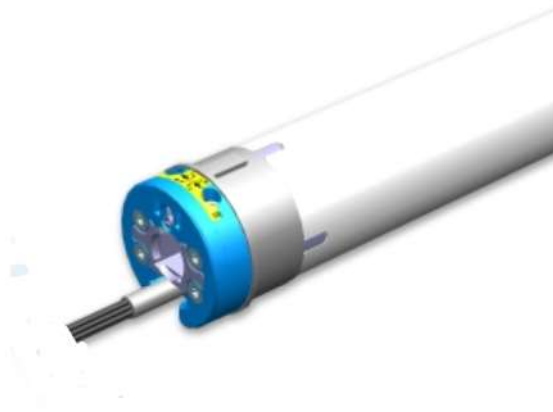
## Specifications of GFA FSN motors

|                                 | FSN 15.20               | FSN 25.20       | FSN 50.20       | FSN 110.18      |
|---------------------------------|-------------------------|-----------------|-----------------|-----------------|
| Rated torque                    | 150 Nm                  | 250 Nm          | 500 Nm          | 1100 Nm         |
| Drive speed (min <sup>1</sup> ) | 20 rpm                  | 20 rpm          | 20 rpm          | 18 rpm          |
| Limit switch range              | 20 (60)                 |                 |                 |                 |
| Connection voltage              | 3~230 / 400 V           |                 |                 |                 |
| Connecting power                | 0,30 kW                 | 0,45 kW         | 0,90 kW         | 1,10 kW         |
| Locking torque                  | 15 Nm                   | 15 Nm           | 22 Nm           | 30 Nm           |
| Operating current               | 1,5 A                   | 2,0 A           | 2,7 A           | 4,1 A           |
| Operating frequency             | 50 Hz                   |                 |                 |                 |
| Shaft diameter                  | 25 mm                   | 30 mm           | 40 mm           | 50 mm           |
| Max. cycles per hour            | 14                      | 12              | 11              | 10              |
| Power cable                     | 5 x 1.5 mm <sup>2</sup> |                 |                 |                 |
| Fuse                            | 10 A (slow)             |                 |                 |                 |
| Protection class                | IP 54                   |                 |                 |                 |
| Operating temperature           | - 10 °C ... + 40 °C     |                 |                 |                 |
| Measures (w x d x h)/mm         | 167 x 558 x 340         | 210 x 651 x 382 | 257 x 750 x 408 | 320 x 897 x 464 |
| Weight                          | 26 kg                   | 45 kg           | 70 kg           | 105 kg          |

## Specifications control box Metacon-Next FirePro V4

| type                    | specification                                                                                                                                  |
|-------------------------|------------------------------------------------------------------------------------------------------------------------------------------------|
| Weight                  | 10 kg                                                                                                                                          |
| Measures (w x d x h)    | 300 mm x 150 mm x 400 mm                                                                                                                       |
| Electricity consumption | max. 2.2 kW                                                                                                                                    |
| Power supply            | 3N~400Vac +/- 10%, 50/60 Hz<br>3~230Vac +/- 10%, 50/60 Hz<br>1N~230Vac +/-10%, 50/60 Hz                                                        |
| Fuse                    | max. 6.3 A slow                                                                                                                                |
| Engine power            | max. 2.2 kW                                                                                                                                    |
| Power                   | max. 8.3 A                                                                                                                                     |
| Brake                   | 24 Vdc                                                                                                                                         |
| Control voltage         | 24 Vdc                                                                                                                                         |
| Control current         | 300 mA                                                                                                                                         |
| External power supply   | 24 Vdc                                                                                                                                         |
| Power external power    | 500 mA max                                                                                                                                     |
| Relay outputs           | potential-free changeover contacts                                                                                                             |
| Load                    | max. ohmic load = 1 A / max. inductive load = 1 A                                                                                              |
| Battery                 | voltage, 12 Vdc / capacity, 5.2 Ah / l x w x h, 90 x 70 x 106 mm<br>/ brand, CSB battery / type, HR1221W / weight, 1.8 kg /<br>technology, AGM |
| Protection class        | IP 40                                                                                                                                          |
| Ambient temperature     | + 5 °C ... + 40 °C                                                                                                                             |
| Relative humidity       | max. 93% (non-condensing)                                                                                                                      |
| Vibration               | vibration-free mounting (e.g. masonry wall)                                                                                                    |

## OPERATION (tubular motors and control box)



Self-closing tubular motors

Control box

Required power supply

Cable length at tubular motor

Cable length at control box

Maximum cycles per day

Standard

Batteries

Signaling

External switches

Becker XL 60, XL 120, XL 200 - SIMU T8300/8F

Metacon-Next MO 710 AZFNZNBW

1N~230 Vac

2.700 mm

1.500 mm

2 cycles

deadman's mode (hold switch, release to stop the door)

integrated batteries in the control box for backup system

signals

externally connectable optical (white/red) / acoustic (100

dB) signals

push button switch up-down

key switch up-down

## Specifications tubular motors Becker, SIMU

|                                 | Becker XL 60            | Becker XL 120 | Becker XL 200 | SIMU T830/8F    |
|---------------------------------|-------------------------|---------------|---------------|-----------------|
| Rated torque (Nm)               | 60                      | 120           | 200           | 300             |
| Drive speed (min <sup>1</sup> ) | 11                      | 11            | 3             | 8               |
| Limit switch range              | 36 revolutions          |               |               | 21 Rev.         |
| Connection voltage              | 230V AC / 50Hz          |               |               |                 |
| Connecting power (W)            | 265                     | 435           | 435           | 855             |
| Rated current consumption (A)   | 1,2                     | 1,9           | 1,9           | 3,9             |
| Protection class                | IP 44                   |               |               |                 |
| Motor cable                     | 3 mtr. 7 cores          |               |               | 1 mtr. 10 cores |
| Operating temperature           | Between -10°C and +40°C |               |               | +5°C and +40°C  |

## Specifications of the Metacon-Next MO 710 AZFNZNBW control box

| type                                                                                                                               | specification                                                                                                   |
|------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------|
| Dimensions housing                                                                                                                 | 300 x 230 x 90mm (l x w x h)                                                                                    |
| Dimensions print / circuit board                                                                                                   | 144,5 x 133 mm (l x w)                                                                                          |
| Power consumption in standby at 230V-50Hz.                                                                                         | ± 1 Watt calculated with ZS7 receiver and display, excluding any externally connected loads                     |
| Mains voltage                                                                                                                      | 230 Vac ± 10%, 50 Hz                                                                                            |
| Weight print without housing                                                                                                       | 250 grams                                                                                                       |
| Storage temperature                                                                                                                | - 20 °C to + 70 °C                                                                                              |
| Operating temperature                                                                                                              | - 10 °C to + 50 °C                                                                                              |
| Relative humidity                                                                                                                  | max. 95% non-condensing                                                                                         |
| Connected load motor                                                                                                               | one 230V AC motor max. 10A, a 230V motor reversing relay for a three-phase motor or a relay box with 230V coils |
| Protection class                                                                                                                   | with G503 grommets IP67, with PG grommets IP65                                                                  |
| Voltages available for external users                                                                                              | 12Vdc - 100 mA and 24Vdc - 200 mA                                                                               |
| Current measurement at the motor output                                                                                            | < 3mA is not detected, > 6mA is detected.<br>Max. permissible motor current 10A at 230V.                        |
| Noise exposure in free air                                                                                                         | < 70 dB (A)                                                                                                     |
| Terminating resistor protections                                                                                                   | 8.2 kΩ ± 5% for fuses with resistance measurement                                                               |
| Voltage measurement at the transmitter and receiver signals of a Fraba safety device with light transmission in the rubber profile | 5V ± 10%, 500Hz to 2000Hz, 40% to 60% if no object is detected                                                  |