



## **ELiS and Slim**

Modern air  
curtains

## FLOWAIR R&D lab



FLOWAIR – expert and manufacturer of HVAC equipment is a member of the EUROVENT Europe's Industry Association for Indoor Climate. This organisation brings together the largest companies in the industry, which jointly create new guidelines and recommendations that are eventually presented to the European Commission. The Association is looking for solutions related to energy savings inside buildings and the use of air curtains is one of recommended solutions.

The use of air curtains allows for thermal protection of the room. Curtains create an air barrier in the door opening and reduce heat losses / heat gains resulting from the inflow of cold air from outside in the winter, as well as inflow of warm air into the air-conditioned rooms during the summer. Presently, the regulations regarding energy losses when the doors are opened are not very clear.

A special project group at EUROVENT is currently developing a methodology for testing and describing air curtains in terms of their effectiveness to get a reliable comparison of their parameters. FLOWAIR – the only Polish producer participating in the project group has created a test to measure the effectiveness of air curtains. Based on the tests carried out and subsequent results, new tools will be created to simplify making informed investment decisions. Simply put, to help the end clients choose a proper solution.



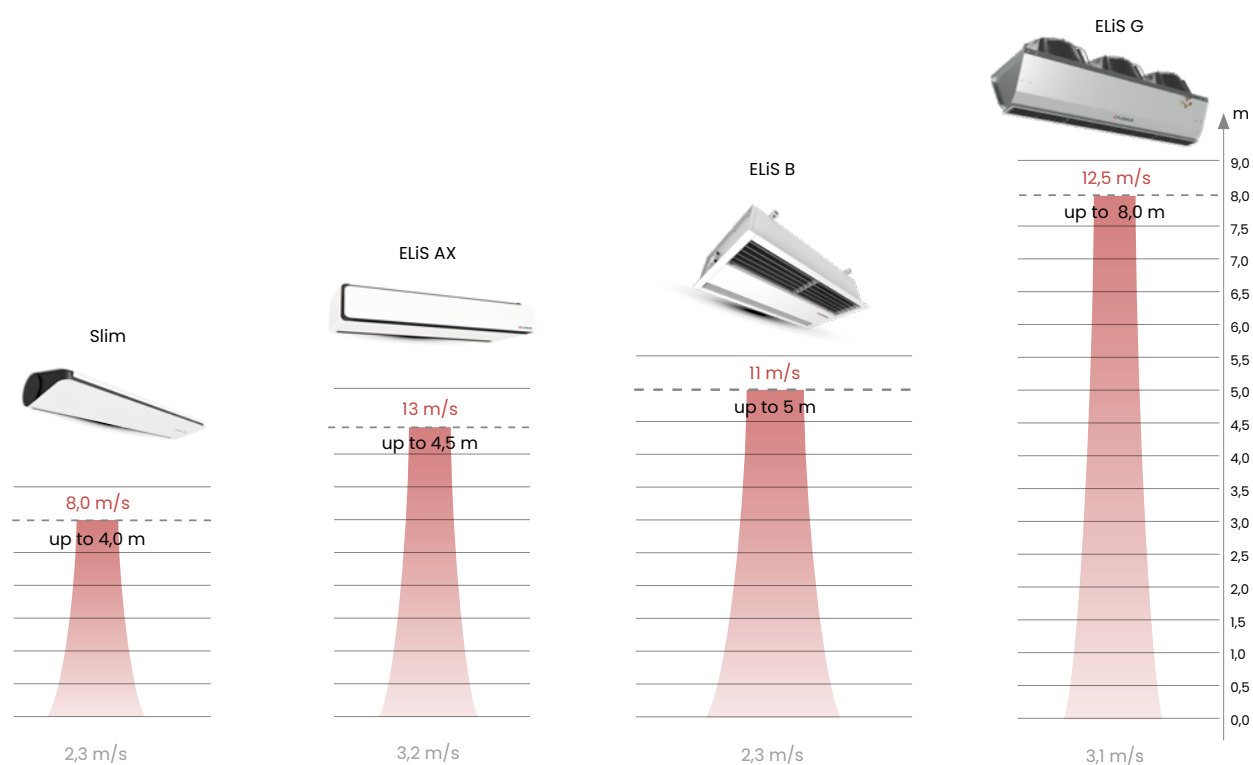
### Advantages of laboratory testing for the client

At FLOWAIR, we constantly undertake activities aimed at increasing the quality of our products and services. A laboratory test is yet another step on the way to continuous product improvement and greater customer satisfaction.

- Confirmed parameters
- Reliable comparison
- Energy-saving
- Lower risk of investment

# Compare ELiS solutions

Air curtains FLOWAIR is a wide range group of units adapted to various types of commercial and industrial facilities. Depending on the characteristics of the building, it is possible to select a device to individual needs.



N – without heating elements („ambient“)

W – water heat exchanger

E – electric heaters

– speed limit at the floor level

– outlet air velocity

|                        | Slim                       | ELiS AX                      | ELiS B                      | ELiS G                       |
|------------------------|----------------------------|------------------------------|-----------------------------|------------------------------|
| Version                | W/E/N                      | W                            | W/E/N                       | W/E/N                        |
| Height of installation | up to 4,0 m                | up to 4,5 m                  | up to 5 m                   | up to 8,0 m                  |
| Air flow               | 770–3050 m <sup>3</sup> /h | up tp 6100 m <sup>3</sup> /h | 2000–6600 m <sup>3</sup> /h | 4100–12800 m <sup>3</sup> /h |
| Noise                  | 33,5–58 dB(A)              | up to 65 dB(A)               | 55–66 dB(A)                 | 44–69 dB(A)                  |
| BMS                    | via DRV Slim               | as standard                  | as standard                 | via DRV ELiS                 |

The sound pressure level measured in a room with an average sound absorption capacity, 1500 m<sup>2</sup>; directivity factor Q = 2



## The new ELiS AX air curtain



### Range

up to 4,5 m



### Air flow

up to 6100 m<sup>3</sup>/h



### Fan

Highly-efficient EC



### Heating capacity

up to 81 kW



### Acoustic pressure level

up to 65,0 dB(A)\*



### Casing

powder coated steel

## Device types available

- 4 lengths: 1 m, 1.5 m, 2 m, 2.5 m
- 2 versions: air curtain with a 3-row water heat exchanger (3R) and air curtain with a 4-row water heat exchanger (4R)
- range: AX36 – maximum range 3.6 m and AX45 – maximum range 4.5 m

## Dimensions

CAD drawings, Revit files and other documents for all models are available at [www.flowair.com](http://www.flowair.com)



ELiS AX W-100



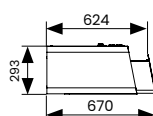
ELiS AX W-150



ELiS AX W-200



ELiS AX W-250



\*acoustic pressure level is given for a 1500 m<sup>3</sup> room with an average sound absorption capacity, at a distance of 5 m from the device



## Application

The AX air curtains are used both in commercial buildings and in smaller industrial buildings, such as:

- shopping malls
- shops
- restaurants
- car showrooms
- public-use facilities
- small-scale production floors and warehouses

# Technical data

|                                                | ELiS AX36-<br>W3R-100 | ELiS AX36-<br>W3R-150 | ELiS AX36-<br>W3R-200 | ELiS AX36-<br>W3R-250 | ELiS AX36-<br>W4R-100 | ELiS AX36-<br>W4R-150 | ELiS AX36-<br>W4R-200 | ELiS AX36-<br>W4R-250 |
|------------------------------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
| Power supply [V/Hz]                            | 230/50                | 230/50                | 230/50                | 230/50                | 230/50                | 230/50                | 230/50                | 230/50                |
| Max. power consumption [kW]                    | 0,27                  | 0,40                  | 0,67                  | 0,81                  | 0,27                  | 0,40                  | 0,67                  | 0,81                  |
| Max. current consumption [A]                   | 2,3                   | 3,3                   | 5,6                   | 6,4                   | 2,2                   | 3,2                   | 5,5                   | 6,3                   |
| IP                                             | 21                    | 21                    | 21                    | 21                    | 21                    | 21                    | 21                    | 21                    |
| Connection ["]                                 | 3/4                   | 3/4                   | 3/4                   | 3/4                   | 3/4                   | 3/4                   | 3/4                   | 3/4                   |
| Air flow <sup>(1)</sup> [m³/h]                 | 900 - 1800            | 1200-2700             | 2000-4300             | 2300-5300             | 800-1700              | 1100-2600             | 1900-4200             | 2200-5200             |
| Acoustic pressure level <sup>(2)</sup> [dB(A)] | 42-60                 | 43-61                 | 45-63                 | 46-64                 | 41-59                 | 42-60                 | 44-62                 | 45-63                 |
| Acoustic power level <sup>(3)</sup> [dB(A)]    | 58-76                 | 59-77                 | 61-79                 | 62-80                 | 57-75                 | 58-76                 | 60-78                 | 61-79                 |
| Heating capacity <sup>(4)</sup> [kW]           | 8,1-12,9              | 11,8-20,5             | 17,1-29,0             | 21,4-38,0             | 8,7-15,2              | 12,7-24,1             | 20,6-36,7             | 24,7-46,6             |
| Max. temperature of heating water [°C]         | 60                    | 60                    | 60                    | 60                    | 60                    | 60                    | 60                    | 60                    |
| Max. operating pressure [MPa]                  | 1,6                   | 1,6                   | 1,6                   | 1,6                   | 1,6                   | 1,6                   | 1,6                   | 1,6                   |
| Max. temperature of operation [°C]             | 50                    | 50                    | 50                    | 50                    | 50                    | 50                    | 50                    | 50                    |
| Temperature rise <sup>(4)</sup> (ΔT) [°C]      | 26-21                 | 29-22                 | 25-20                 | 27-21                 | 32-26                 | 34-27                 | 31-26                 | 33-26                 |
| Device weight [kg]                             | 38,5                  | 53,3                  | 71,7                  | 86,8                  | 40,0                  | 55,6                  | 74,8                  | 90,3                  |
| Range <sup>(1)</sup> [m]                       | 3,6                   | 3,6                   | 3,6                   | 3,6                   | 3,6                   | 3,6                   | 3,6                   | 3,6                   |
|                                                | ELiS AX45-<br>W3R-100 | ELiS AX45-<br>W3R-150 | ELiS AX45-<br>W3R-200 | ELiS AX45-<br>W3R-250 | ELiS AX45-<br>W4R-100 | ELiS AX45-<br>W4R-150 | ELiS AX45-<br>W4R-200 | ELiS AX45-<br>W4R-250 |
| Power supply [V/Hz]                            | 230/50                | 230/50                | 230/50                | 230/50                | 230/50                | 230/50                | 230/50                | 230/50                |
| Max. power consumption [kW]                    | 0,49                  | 0,65                  | 0,99                  | 1,15                  | 0,49                  | 0,65                  | 0,99                  | 1,15                  |
| Max. current consumption [A]                   | 3,3                   | 4,6                   | 6,4                   | 7,6                   | 3,2                   | 4,5                   | 6,3                   | 7,5                   |
| IP                                             | 21                    | 21                    | 21                    | 21                    | 21                    | 21                    | 21                    | 21                    |
| Connection ["]                                 | 3/4                   | 3/4                   | 3/4                   | 3/4                   | 3/4                   | 3/4                   | 3/4                   | 3/4                   |
| Air flow <sup>(1)</sup> [m³/h]                 | 1100-2500             | 1500-3500             | 2200-5000             | 2400-6100             | 1000-2400             | 1400-3400             | 2100-4900             | 2300-6000             |
| Acoustic pressure level <sup>(2)</sup> [dB(A)] | 43-61                 | 44-62                 | 45-64                 | 46-65                 | 42-60                 | 43-61                 | 44-63                 | 45-64                 |
| Acoustic power level <sup>(3)</sup> [dB(A)]    | 59-77                 | 60-78                 | 61-80                 | 62-81                 | 58-76                 | 59-77                 | 60-79                 | 61-80                 |
| Heating capacity <sup>(4)</sup> [kW]           | 9,3-15,7              | 13,9-24,1             | 18,4-31,8             | 22,1-41,4             | 10,3-19,1             | 15,3-28,9             | 22,2-40,6             | 25,6-51,3             |
| Max. temperature of heating water [°C]         | 60                    | 60                    | 60                    | 60                    | 60                    | 60                    | 60                    | 60                    |
| Max. operating pressure [MPa]                  | 1,6                   | 1,6                   | 1,6                   | 1,6                   | 1,6                   | 1,6                   | 1,6                   | 1,6                   |
| Max. temperature of operation [°C]             | 50                    | 50                    | 50                    | 50                    | 50                    | 50                    | 50                    | 50                    |
| Temperature rise <sup>(4)</sup> (ΔT) [°C]      | 25-18                 | 27-20                 | 24-19                 | 27-20                 | 30-23                 | 32-25                 | 31-24                 | 33-25                 |
| Device weight [kg]                             | 40,8                  | 55,5                  | 73,7                  | 88,8                  | 42,3                  | 57,8                  | 76,8                  | 92,3                  |
| Range <sup>(1)</sup> [m]                       | 4,5                   | 4,5                   | 4,5                   | 4,5                   | 4,5                   | 4,5                   | 4,5                   | 4,5                   |

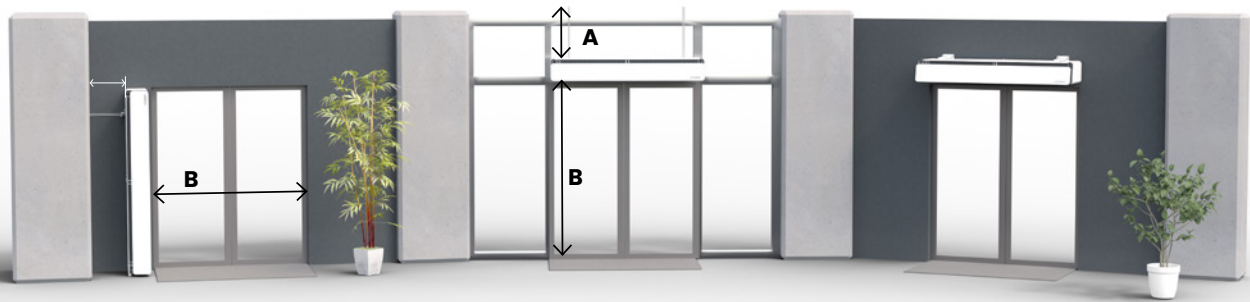
<sup>(1)</sup> In accordance with ISO 27327-1, air flow is given for fan speeds between 25% and 100%.

<sup>(2)</sup> Acoustic pressure level is given for a 1500 m³ room with an average sound absorption capacity, directivity factor Q=2, at a distance of 5 m from the curtain

<sup>(3)</sup> In accordance with ISO 27327-2, acoustic power level is given for fan speeds between 25% and 100%

<sup>(4)</sup> The range of powers and temperatures is given for the following parameters: fan speed 25%, temperature of the heating medium 60/40°C, temperature of air at the inlet to the device 18°C – fan speed 100%, temperature of the heating medium 60/40°C, temperature of air at the inlet to the device 18°C.

## Installation ELiS AX



**A** – min. 10 cm

**B** – max. 3,6 m (ELiS AX36), max. 4,5 m (ELiS AX45)

## Installation elements

### Installation brackets enable vertical mounting

Brackets for vertical mounting. Air curtains may not be mounted vertically on top of each other. Available in white.

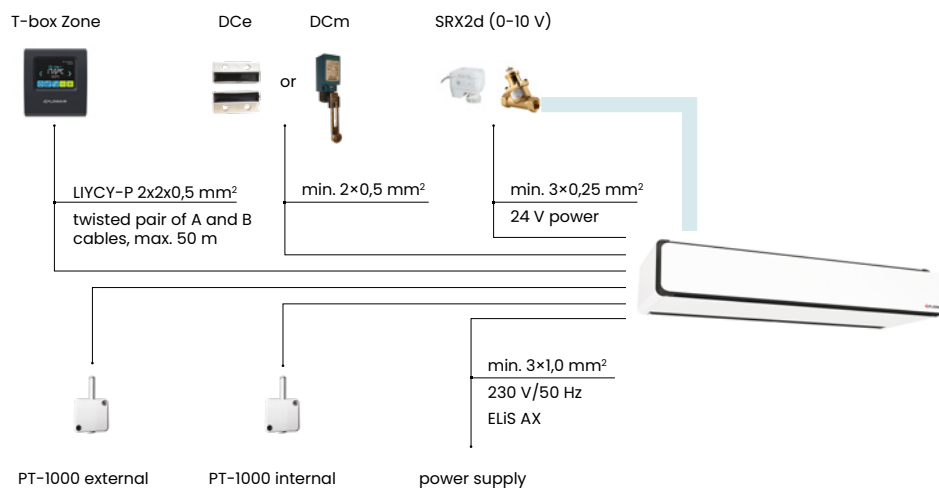


### Consoles and threaded rods enable horizontal mounting

Consoles enable horizontal mounting (air curtains with a length of up to 2 m are mounted using two consoles, while curtains with a length of 2.5 m are mounted using three consoles). Available in white.



## Connection diagrams ELiS AX





## Intelligent control system

The ELiS AX air curtain has a built-in DRV ELiS EC module that enables intelligent managing operation the T-box Zone controller. It is possible to control the operation of the device using two types of BMS:

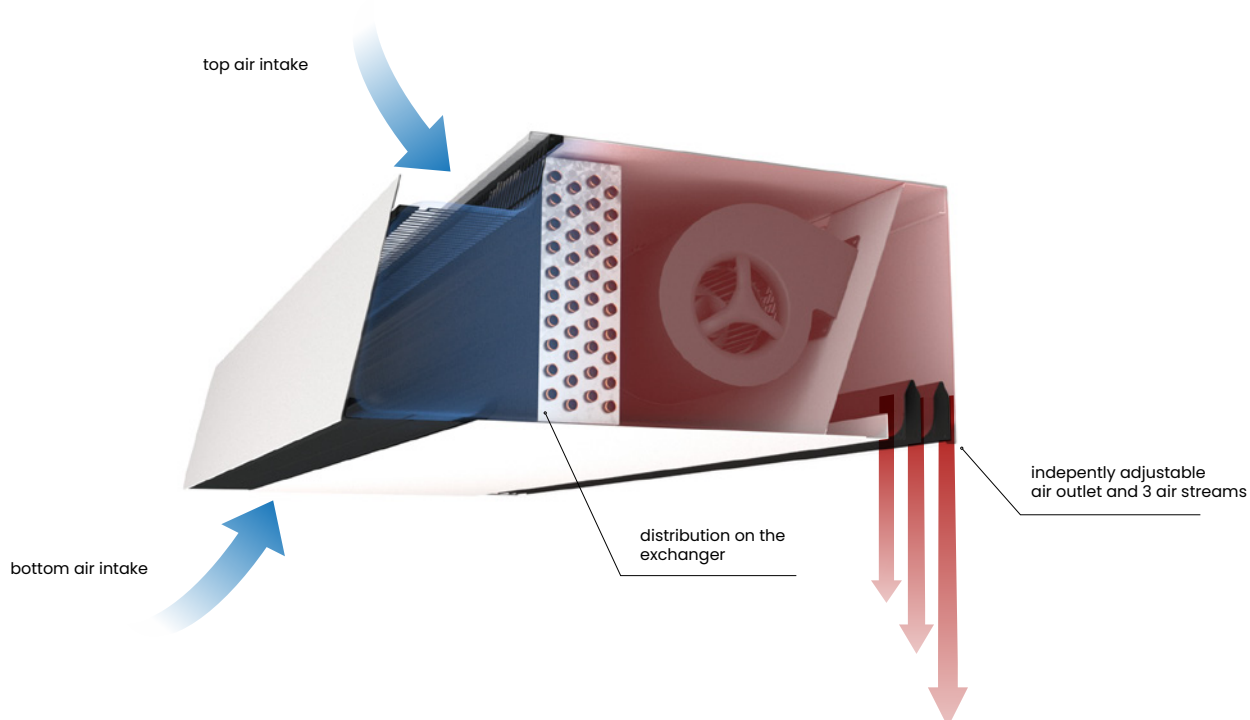
- simple control signals: start-stop-failure
- control automation with output to the BMS system (Modbus RTU) or SYSTEM FLOWAIR



## ELiS AX device features

### OPTiflow technology

The OPTiflow technology involves directing the air flowing through the curtain in the right way, thus creating an even more effective air barrier during draughts in commercial buildings. Three outlet air streams create a highly efficient barrier against external factors, such as hot and cold air, dust and airborne contaminants. Even and matched airflow throughout the entire exchanger ensures a comfortable temperature and reduced energy consumption



### OPTismart technology

This technology involves advanced smart automation, which enables precise temperature adjustment. It changes the mode of operation depending on external conditions. It adjusts the air flow of the air curtain depending on the difference in temperatures and intelligently adapts the operating time of the device depending on how often the door is opened.

#### Air filter

The ELiS AX air curtain can be used in buildings which require installation of devices equipped with a replaceable air filter. It is equipped with a replaceable ISO Coarse 30% filter which improves the air quality, and the device is protected against the ingress of dirt and other contaminants.

#### EC fan

The device is equipped with silent and energy-efficient EC fans, which enable smooth adjustment of the curtain's air flow.

# Heating capacities

## ELiS AX

| Tw1/Tw2 = 60/40°C                    |      |      |      |      | Tw1/Tw2 = 50/40°C |      |      |       |      | Tw1/Tw2 = 45/35°C |      |      |      |      | Tw1/Tw2 = 40/30°C |      |      |      |      |
|--------------------------------------|------|------|------|------|-------------------|------|------|-------|------|-------------------|------|------|------|------|-------------------|------|------|------|------|
| Tp1                                  | PT   | Qw   | Δpw  | Tp2  | Tp1               | PT   | Qw   | Δpw   | Tp2  | Tp1               | PT   | Qw   | Δpw  | Tp2  | Tp1               | PT   | Qw   | Δpw  | Tp2  |
| °C                                   | kW   | l/h  | kPa  | °C   | °C                | kW   | l/h  | kPa   | °C   | °C                | kW   | l/h  | kPa  | °C   | °C                | kW   | l/h  | kPa  | °C   |
| <b>ELiS AX36-W3R-100</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| <b>Air flow: 100%, V = 1800 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| 0,0                                  | 21,0 | 915  | 8,7  | 34,0 | 0,0               | 19,2 | 1675 | 26,9  | 31,5 | 0,0               | 17,0 | 1474 | 21,7 | 27,5 | 0,0               | 14,7 | 1273 | 16,8 | 24,0 |
| 10,0                                 | 16,5 | 721  | 5,6  | 37,0 | 10,0              | 14,9 | 1295 | 16,8  | 34,0 | 10,0              | 12,6 | 1095 | 12,6 | 30,5 | 10,0              | 10,3 | 893  | 8,8  | 26,5 |
| 20,0                                 | 11,9 | 520  | 3,1  | 39,5 | 20,0              | 10,4 | 909  | 8,8   | 37,0 | 20,0              | 8,1  | 706  | 5,6  | 33,0 | 20,0              | 5,7  | 497  | 3,0  | 29,5 |
| <b>ELiS AX36-W3R-150</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| <b>Air flow: 100%, V = 2700 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| 0,0                                  | 32,8 | 1432 | 25,1 | 35,5 | 0,0               | 29,7 | 2583 | 75,0  | 32,0 | 0,0               | 26,2 | 2281 | 60,8 | 28,5 | 0,0               | 22,8 | 1980 | 47,8 | 24,5 |
| 10,0                                 | 26,1 | 1137 | 16,5 | 38,0 | 10,0              | 23,1 | 2008 | 47,3  | 35,0 | 10,0              | 19,7 | 1708 | 35,8 | 31,5 | 10,0              | 16,2 | 1406 | 25,6 | 27,5 |
| 20,0                                 | 19,1 | 835  | 9,4  | 40,5 | 20,0              | 16,4 | 1424 | 25,3  | 37,5 | 20,0              | 12,9 | 1121 | 16,6 | 34,0 | 20,0              | 9,4  | 812  | 9,4  | 30   |
| <b>ELiS AX36-W3R-200</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| <b>Air flow: 100%, V = 4300 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| 0,0                                  | 49   | 2136 | 3,8  | 33,5 | 0,0               | 45,7 | 3983 | 12,4  | 31,0 | 0,0               | 40,1 | 3489 | 9,8  | 27,5 | 0,0               | 34,5 | 2992 | 7,5  | 23,5 |
| 10,0                                 | 38   | 1659 | 2,4  | 36,0 | 10,0              | 35,1 | 3059 | 7,6   | 34,0 | 10,0              | 29,5 | 2565 | 5,5  | 30,0 | 10,0              | 23,8 | 2061 | 3,7  | 26,0 |
| 20,0                                 | 26,7 | 1163 | 1,2  | 38,0 | 20,0              | 24,3 | 2116 | 3,8   | 36,5 | 20,0              | 18,5 | 1611 | 2,3  | 32,5 | 20,0              | 12,3 | 1070 | 1,1  | 28,5 |
| <b>ELiS AX36-W3R-250</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| <b>Air flow: 100%, V = 5300 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| 0,0                                  | 62,6 | 2732 | 6,8  | 34,5 | 0,0               | 57,7 | 5026 | 21,5  | 32,0 | 0,0               | 50,8 | 4417 | 17,2 | 28,0 | 0,0               | 43,9 | 3806 | 13,2 | 24,0 |
| 10,0                                 | 49,1 | 2142 | 4,3  | 37,0 | 10,0              | 44,5 | 3877 | 13,3  | 34,5 | 10,0              | 37,6 | 3270 | 9,8  | 31,0 | 10,0              | 30,6 | 2655 | 6,8  | 27,0 |
| 20,0                                 | 35,1 | 1532 | 2,3  | 39,5 | 20,0              | 31,1 | 2709 | 6,8   | 37,0 | 20,0              | 24,1 | 2093 | 4,3  | 33,5 | 20,0              | 16,7 | 1450 | 2,2  | 29   |
| <b>ELiS AX36-W4R-100</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| <b>Air flow: 100%, V = 1700 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| 0,0                                  | 24,1 | 1051 | 14,2 | 41,5 | 0,0               | 21,6 | 1884 | 41,9  | 37,0 | 0,0               | 19,2 | 1666 | 34,1 | 33,0 | 0,0               | 16,7 | 1448 | 26,9 | 28,5 |
| 10,0                                 | 19,2 | 836  | 9,4  | 43,0 | 10,0              | 16,8 | 1466 | 26,5  | 39,0 | 10,0              | 14,4 | 1249 | 20,2 | 34,5 | 10,0              | 11,9 | 1031 | 14,5 | 30,5 |
| 20,0                                 | 14,1 | 616  | 5,4  | 44,5 | 20,0              | 12,0 | 1044 | 14,3  | 40,5 | 20,0              | 9,5  | 824  | 9,5  | 36,5 | 20,0              | 6,9  | 597  | 5,4  | 32   |
| <b>ELiS AX36-W4R-150</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| <b>Air flow: 100%, V = 2600 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| 0,0                                  | 37,8 | 1648 | 41,2 | 42,5 | 0,0               | 33,6 | 2926 | 119,1 | 38,0 | 0,0               | 29,8 | 2594 | 97,4 | 33,5 | 0,0               | 26,1 | 2262 | 77,5 | 29,5 |
| 10,0                                 | 30,2 | 1319 | 27,5 | 44,0 | 10,0              | 26,2 | 2285 | 76    | 39,5 | 10,0              | 22,5 | 1955 | 58,3 | 35,5 | 10,0              | 18,7 | 1623 | 42,4 | 31,0 |
| 20,0                                 | 22,6 | 984  | 16,2 | 45,5 | 20,0              | 18,8 | 1638 | 41,5  | 41,0 | 20,0              | 15,0 | 1304 | 28,0 | 37,0 | 20,0              | 11,1 | 963  | 16,5 | 32,5 |
| <b>ELiS AX36-W4R-200</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| <b>Air flow: 100%, V = 4200 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| 0,0                                  | 58,4 | 2546 | 20   | 40,5 | 0,0               | 52,5 | 4569 | 60,1  | 36,5 | 0,0               | 46,5 | 4039 | 48,5 | 32,5 | 0,0               | 40,5 | 3510 | 38,0 | 28,0 |
| 10,0                                 | 46,4 | 2024 | 13,1 | 42,5 | 10,0              | 40,8 | 3554 | 37,7  | 38,5 | 10,0              | 34,8 | 3027 | 28,4 | 34,5 | 10,0              | 28,8 | 2497 | 20,2 | 30,0 |
| 20,0                                 | 34,2 | 1491 | 7,4  | 44,0 | 20,0              | 29,0 | 2528 | 20,1  | 40,0 | 20,0              | 22,9 | 1994 | 13,1 | 36,0 | 20,0              | 16,7 | 1446 | 7,4  | 31,5 |
| <b>ELiS AX36-W4R-250</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| <b>Air flow: 100%, V = 5200 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |      |      |                   |      |      |      |      |
| 0,0                                  | 73,6 | 3211 | 35   | 41,5 | 0,0               | 65,8 | 5728 | 103,7 | 37,0 | 0,0               | 58,3 | 5072 | 84,1 | 33,0 | 0,0               | 50,9 | 4416 | 66,2 | 28,5 |
| 10,0                                 | 58,7 | 2562 | 23,1 | 43,0 | 10,0              | 51,3 | 4465 | 65,4  | 39,0 | 10,0              | 43,9 | 3813 | 49,6 | 34,5 | 10,0              | 36,4 | 3157 | 35,7 | 30,5 |
| 20,0                                 | 43,6 | 1901 | 13,3 | 44,5 | 20,0              | 36,6 | 3190 | 35,2  | 40,5 | 20,0              | 29,1 | 2530 | 23,3 | 36,5 | 20,0              | 21,4 | 1855 | 13,4 | 32   |

| Tw1/Tw2 = 60/40°C                    |      |      |      |      | Tw1/Tw2 = 50/40°C |      |      |       |      | Tw1/Tw2 = 45/35°C |      |      |       |      | Tw1/Tw2 = 40/30°C |      |      |       |      |
|--------------------------------------|------|------|------|------|-------------------|------|------|-------|------|-------------------|------|------|-------|------|-------------------|------|------|-------|------|
| Tp1                                  | PT   | Qw   | Δpw  | Tp2  | Tp1               | PT   | Qw   | Δpw   | Tp2  | Tp1               | PT   | Qw   | Δpw   | Tp2  | Tp1               | PT   | Qw   | Δpw   | Tp2  |
| °C                                   | kW   | l/h  | kPa  | °C   | °C                | kW   | l/h  | kPa   | °C   | °C                | kW   | l/h  | kPa   | °C   | °C                | kW   | l/h  | kPa   | °C   |
| <b>ELiS AX45-W3R-100</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| <b>Air flow: 100%, V = 2500 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| 0,0                                  | 25,7 | 1123 | 12,7 | 30,0 | 0,0               | 23,8 | 2068 | 39,7  | 28,0 | 0,0               | 20,9 | 1818 | 31,8  | 24,5 | 0,0               | 18,1 | 1569 | 24,7  | 21,0 |
| 10,0                                 | 20,2 | 883  | 8,2  | 33,5 | 10,0              | 18,4 | 1598 | 24,7  | 31,5 | 10,0              | 15,5 | 1348 | 18,4  | 28,0 | 10,0              | 12,6 | 1097 | 12,8  | 25,0 |
| 20,0                                 | 14,5 | 635  | 4,5  | 37,0 | 20,0              | 12,8 | 1117 | 12,8  | 35,0 | 20,0              | 10,0 | 865  | 8,2   | 31,5 | 20,0              | 7,0  | 608  | 4,4   | 28,0 |
| <b>ELiS AX45-W3R-150</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| <b>Air flow: 100%, V = 3500 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| 0,0                                  | 38,7 | 1688 | 33,9 | 32,5 | 0,0               | 35,1 | 3060 | 102,2 | 29,5 | 0,0               | 31,1 | 2701 | 82,8  | 26,0 | 0,0               | 27,0 | 2342 | 65,0  | 22,5 |
| 10,0                                 | 30,7 | 1339 | 22,2 | 35,5 | 10,0              | 27,3 | 2377 | 64,4  | 33,0 | 10,0              | 23,2 | 2019 | 48,6  | 29,5 | 10,0              | 19,1 | 1659 | 34,6  | 26,0 |
| 20,0                                 | 22,5 | 980  | 12,6 | 39,0 | 20,0              | 19,3 | 1680 | 34,2  | 36,0 | 20,0              | 15,2 | 1320 | 22,4  | 32,5 | 20,0              | 11,0 | 953  | 12,6  | 29,0 |
| <b>ELiS AX45-W3R-200</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| <b>Air flow: 100%, V = 5000 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| 0,0                                  | 53,8 | 2349 | 4,6  | 31,5 | 0,0               | 50,5 | 4394 | 14,9  | 29,5 | 0,0               | 44,3 | 3847 | 11,8  | 26,0 | 0,0               | 38,0 | 3297 | 9,0   | 22,0 |
| 10,0                                 | 41,8 | 1823 | 2,8  | 34,5 | 10,0              | 38,7 | 3371 | 9,1   | 32,5 | 10,0              | 32,5 | 2824 | 6,6   | 29,0 | 10,0              | 26,1 | 2267 | 4,5   | 25,5 |
| 20,0                                 | 29,3 | 1278 | 1,5  | 37,0 | 20,0              | 26,7 | 2328 | 4,5   | 35,5 | 20,0              | 20,4 | 1770 | 2,8   | 32,0 | 20,0              | 13,6 | 1180 | 1,3   | 28,0 |
| <b>ELiS AX45-W3R-250</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| <b>Air flow: 100%, V = 6100 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| 0,0                                  | 68,5 | 2987 | 8,1  | 33,0 | 0,0               | 63,3 | 5512 | 25,6  | 30,5 | 0,0               | 55,7 | 4841 | 20,4  | 26,5 | 0,0               | 48,1 | 4169 | 15,6  | 23,0 |
| 10,0                                 | 53,8 | 2339 | 5,1  | 35,5 | 10,0              | 48,8 | 4249 | 15,7  | 33,5 | 10,0              | 41,2 | 3582 | 11,6  | 30,0 | 10,0              | 33,5 | 2905 | 8,0   | 26,0 |
| 20,0                                 | 38,3 | 1672 | 2,7  | 38,5 | 20,0              | 34,0 | 2965 | 8,1   | 36,5 | 20,0              | 26,3 | 2287 | 5,1   | 32,5 | 20,0              | 18,3 | 1584 | 2,6   | 29,0 |
| <b>ELiS AX45-W4R-100</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| <b>Air flow: 100%, V = 2400 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| 0,0                                  | 30,6 | 1334 | 21,9 | 37,5 | 0,0               | 27,7 | 2408 | 65,7  | 33,5 | 0,0               | 24,5 | 2126 | 53,2  | 30,0 | 0,0               | 21,3 | 1844 | 41,8  | 26,0 |
| 10,0                                 | 24,2 | 1057 | 14,4 | 39,5 | 10,0              | 21,5 | 1870 | 41,4  | 36,0 | 10,0              | 18,3 | 1590 | 31,3  | 32,5 | 10,0              | 15,1 | 1307 | 22,3  | 28,5 |
| 20,0                                 | 17,8 | 775  | 8,2  | 41,5 | 20,0              | 15,2 | 1325 | 22,1  | 38,5 | 20,0              | 12,0 | 1041 | 14,5  | 34,5 | 20,0              | 8,7  | 751  | 8,1   | 30,5 |
| <b>ELiS AX45-W4R-150</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| <b>Air flow: 100%, V = 3400 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| 0,0                                  | 45,6 | 1989 | 58   | 39,0 | 0,0               | 40,8 | 3551 | 169,5 | 35,0 | 0,0               | 36,2 | 3144 | 138,3 | 31,0 | 0,0               | 31,6 | 2738 | 109,6 | 27,0 |
| 10,0                                 | 36,4 | 1588 | 38,5 | 41,5 | 10,0              | 31,8 | 2769 | 107,7 | 37,5 | 10,0              | 27,2 | 2365 | 82,4  | 33,5 | 10,0              | 22,6 | 1959 | 59,7  | 29,5 |
| 20,0                                 | 27,0 | 1178 | 22,4 | 43,0 | 20,0              | 22,7 | 1977 | 58,4  | 39,5 | 20,0              | 18,1 | 1569 | 39,1  | 35,5 | 20,0              | 13,3 | 1154 | 22,8  | 31,5 |
| <b>ELiS AX45-W4R-200</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| <b>Air flow: 100%, V = 4900 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| 0,0                                  | 64,9 | 2832 | 24,4 | 39,0 | 0,0               | 58,6 | 5099 | 73,7  | 35,0 | 0,0               | 51,8 | 4505 | 59,4  | 31,0 | 0,0               | 45,1 | 3911 | 46,4  | 27,0 |
| 10,0                                 | 51,5 | 2248 | 15,9 | 41,0 | 10,0              | 45,5 | 3963 | 46,1  | 37,0 | 10,0              | 38,8 | 3372 | 34,7  | 33,0 | 10,0              | 32,0 | 2777 | 24,6  | 29,0 |
| 20,0                                 | 37,9 | 1651 | 9,0  | 42,5 | 20,0              | 32,3 | 2812 | 24,4  | 39,5 | 20,0              | 25,5 | 2215 | 15,9  | 35,0 | 20,0              | 18,5 | 1603 | 8,9   | 31,0 |
| <b>ELiS AX45-W4R-250</b>             |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| <b>Air flow: 100%, V = 6000 m³/h</b> |      |      |      |      |                   |      |      |       |      |                   |      |      |       |      |                   |      |      |       |      |
| 0,0                                  | 81,3 | 3547 | 42,1 | 39,5 | 0,0               | 72,9 | 6348 | 125,4 | 35,5 | 0,0               | 64,6 | 5616 | 101,5 | 31,5 | 0,0               | 56,3 | 4886 | 79,8  | 27,5 |
| 10,0                                 | 64,8 | 2826 | 27,7 | 41,5 | 10,0              | 56,8 | 4944 | 79    | 37,5 | 10,0              | 48,5 | 4217 | 59,8  | 33,5 | 10,0              | 40,2 | 3488 | 42,8  | 29,5 |
| 20,0                                 | 47,9 | 2091 | 15,9 | 43,5 | 20,0              | 40,5 | 3524 | 42,3  | 39,5 | 20,0              | 32,1 | 2790 | 27,9  | 35,5 | 20,0              | 23,5 | 2041 | 16,0  | 31,5 |

V – Air flow  
 PT – Heat capacity  
 Tp1 – Air temperature at the inlet to the device  
 Tp2 – Air temperature at the outlet of the device  
 Tw1 – Heating medium temperature at the inlet to the heat exchanger  
 Tw2 – Heating medium temperature at the return from the heat exchanger  
 Qw – Heating medium flow rate in the heat exchanger  
 Δpw – Pressure drop in the heat exchanger

Select units for other parameters using ours selection programs  
available at [www.flowair.com](http://www.flowair.com)





## Air curtains Slim



### Range

up to 4,0 m



### Airflow

770 - 3050 m<sup>3</sup>/h



### Weight

14,7 - 28,4 kg



### Heating capacity

1,2 - 47,7 kW



### Colors

White with black elements  
and deep black



### Casing

Steel

## Device types available

- 3 lengths - 1 m; 1,5 m or 2 m
- 3 versions: W - water heat exchanger, N - without heating elements („ambient“), E - electric heaters

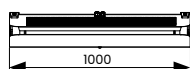
## Application

The Slim curtain will work wherever doors are often opened, in shops, restaurants, service salons. Slim fits 99% of door openings. The curtain is designed for horizontal installation

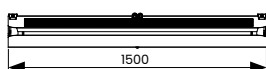
directly above the door opening and for vertical installation at the side parts of the opening.

## Dimensions

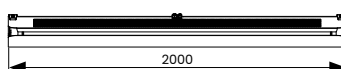
CAD drawings, Revit files and other documents for all models are available at [www.flowair.com](http://www.flowair.com)



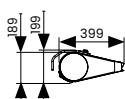
SLIM N|W|E-100



SLIM N|W|E-150



SLIM N|W|E-200



## Technical data

|                                                         | SLIM E-100             | SLIM W-100 | SLIM W-100-2R | SLIM N-100 | SLIM E-150             | SLIM W-150 | SLIM W-150-2R | SLIM N-150 | SLIM E-200             | SLIM W-200 | SLIM W-200-2R | SLIM N-200 |
|---------------------------------------------------------|------------------------|------------|---------------|------------|------------------------|------------|---------------|------------|------------------------|------------|---------------|------------|
| Power supply [V/Hz]                                     | 230 / 50 or 3x400 / 50 | 230 / 50   | 230 / 50      | 230 / 50   | 230 / 50 or 3x400 / 50 | 230 / 50   | 230 / 50      | 230 / 50   | 230 / 50 or 3x400 / 50 | 230 / 50   | 230 / 50      | 230 / 50   |
| Max. power consumption [kW]                             | 5,1                    | 0,12       | 0,1           | 0,14       | 9,2                    | 0,17       | 0,15          | 0,12       | 12,2                   | 0,22       | 0,19          | 0,23       |
| Max. current consumption [A]                            | 8,5                    | 0,5        | 0,4           | 0,6        | 13,0                   | 0,7        | 0,7           | 0,8        | 17,3                   | 1,0        | 0,9           | 1          |
| IP                                                      | 20                     | 20         | 20            | 20         | 20                     | 20         | 20            | 20         | 20                     | 20         | 20            | 20         |
| Connection [°]                                          | –                      | 1/2        | 1/2           | –          | –                      | 1/2        | 1/2           | –          | –                      | 1/2        | 1/2           | –          |
| Air flow <sup>(1)</sup> [m³/h]                          | 800–1300               | 770–1100   | 770–1050      | 800–1400   | 1250–2200              | 1200–1940  | 1150–1830     | 1300–2300  | 1900–3000              | 1760–2910  | 1730–2670     | 1790–3050  |
| Acoustic pressure level <sup>(2)</sup> [dB(A)] – 5 m    | 43–56                  | 45–55      | 45–55         | 43–57      | 40–54                  | 44–56      | 44–56         | 41–56      | 42–57                  | 37–58      | 37–58         | 34–56      |
| Acoustic power level <sup>(3)</sup> [dB(A)]             | 59–72                  | 61–70      | 61–70         | 59–73      | 56–70                  | 59–72      | 59–72         | 56–72      | 60–73                  | 53–74      | 53–74         | 49,5–72    |
| Heating capacity <sup>(4)</sup> [kW]                    | 2–5                    | 1,2–12,1   | 1,9 – 20,4    | –          | 3–9                    | 2,6–21,0   | 4,3–35,3      | –          | 4–12                   | 3,7–29,3   | 6,4 – 47,7    | –          |
| Max. water temperature [°C]                             | –                      | 110        | 110           | –          | –                      | 110        | 110           | –          | –                      | 110        | 110           | –          |
| Max. operating pressure [MPa]                           | –                      | 1,6        | 1,6           | –          | –                      | 1,6        | 1,6           | –          | –                      | 1,6        | 1,6           | –          |
| Curtain's air temperature rise <sup>(4)</sup> (ΔT) [°C] | 5,0–19,0               | 3,0–32,5   | 5,2 – 57,4    | –          | 4,0–21,0               | 4,0–32,0   | 6,8 – 57      | –          | 4,0–19,0               | 4,0–35,0   | 6,9 – 55      | –          |
| Unit weight [kg]                                        | 15,1                   | 16,2       | 17,3          | 14,7       | 19,6                   | 21,5       | 22,7          | 19         | 24,6                   | 26,9       | 28,4          | 23,8       |
| Range <sup>(1)</sup> [m]                                | 3,5                    | 3,5        | 3,5           | 4,0        | 3,5                    | 3,5        | 3,5           | 4,0        | 3,5                    | 3,5        | 3,5           | 4,0        |

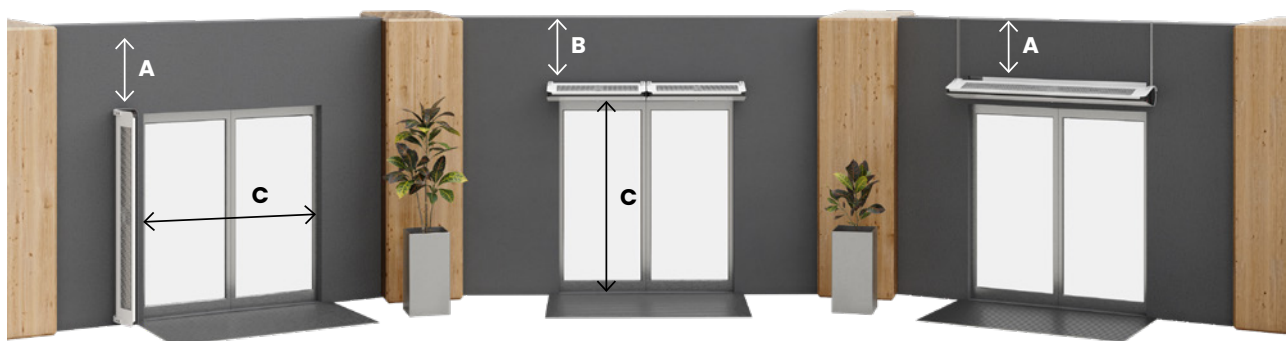
(1) according to ISO 27327-1

(2) the sound pressure level measured in a room with an average sound absorption capacity, 1500 m³; directivity factor Q = 2

(3) sound power level according to ISO 27327-2

(4) Slim W power and temperature range specified for the parameters: fan speed III, heating medium temperature 40/30°C air temperature at the inlet to the device 20°C – fan speed III, heating medium temperature 110/90°C air temperature at the inlet to the device 0°C; Slim E power range for operation at IN 230/50 to operation at 3N 400/50

## Installation Slim



**A** – min. 10 cm

**B** – min. 9 cm

**C** – max. 4.0 m

## Installation elements

### Brackets for Slim

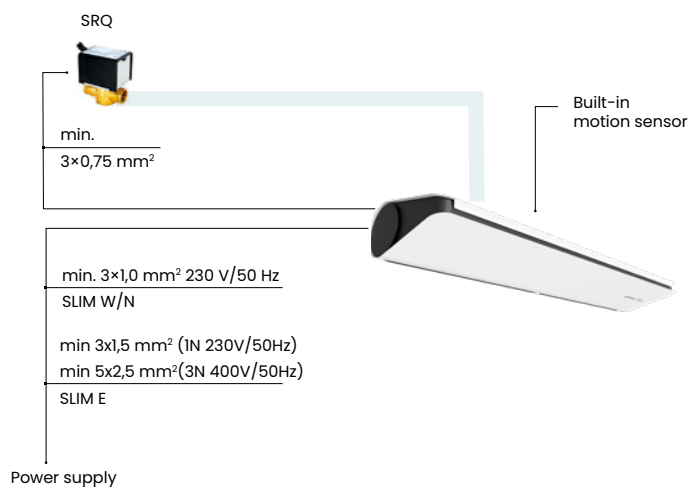
For horizontal or vertical installation of the Slim air curtain.  
Available in white or black.

### Rods

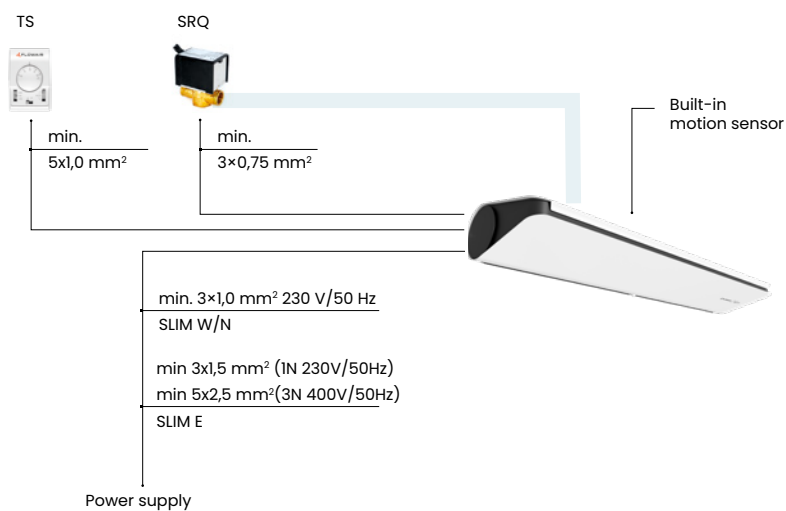
In standard Slim air curtains have special mounting holes for installation with threaded rods.

# Connection diagrams Slim

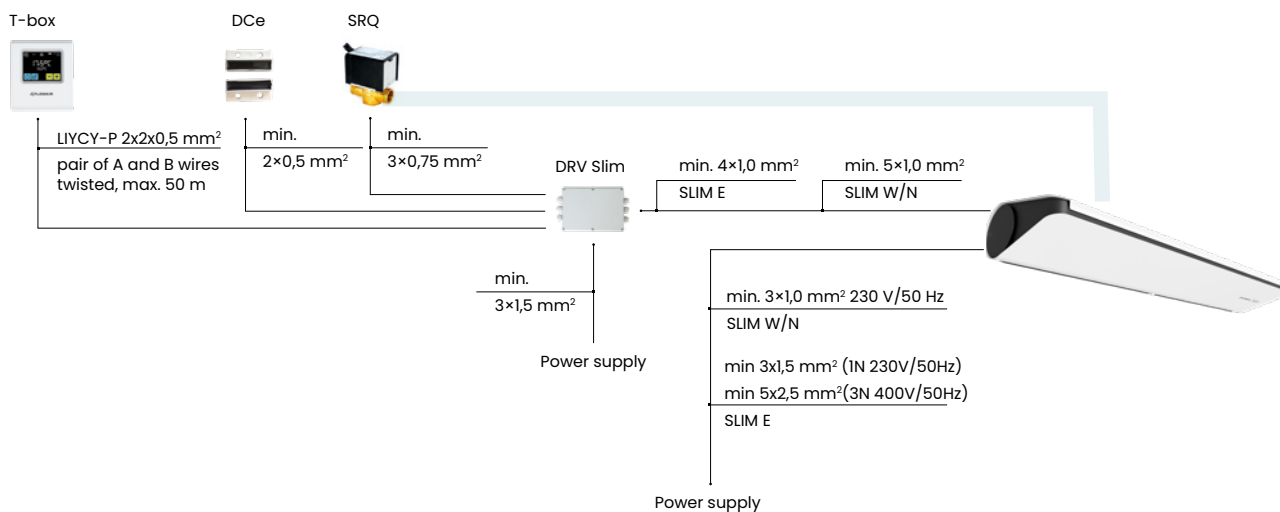
## Plug&Play control



## TS controller



## T-box controller



## Available options upon request

### TS + motion sensor

The solution will prove useful if you frequently change the curtain's settings and want to have the controller at your fingertips. Select the TS controller, which is as a thermostat and switches on the heating elements.



### TS + door sensor

This solution will prove useful when the motion sensor cannot operate freely due to some obstacles (e.g. a suspended element under the air curtain). In this case the devices' control depends on the signal from door sensor.



### T-box

This solution will be useful when you want to connect the curtain to an intelligent building management system BMS. Choose this option if you need a weekly programmer or remote supervision over the operation of devices.



## Heating capacities Slim

| Tw1/Tw2 = 90/70°C               |      |       |       |      | Tw1/Tw2 = 80/60°C |      |       |       |      | Tw1/Tw2 = 70/50°C |      |       |       |      | Tw1/Tw2 = 60/40°C |      |       |       |      |
|---------------------------------|------|-------|-------|------|-------------------|------|-------|-------|------|-------------------|------|-------|-------|------|-------------------|------|-------|-------|------|
| Tp1                             | PT   | Qw    | Δpw   | Tp2  | Tp1               | PT   | Qw    | Δpw   | Tp2  | Tp1               | PT   | Qw    | Δpw   | Tp2  | Tp1               | PT   | Qw    | Δpw   | Tp2  |
| [°C]                            | [kW] | [l/h] | [kPa] | [°C] | [°C]              | [kW] | [l/h] | [kPa] | [°C] | [°C]              | [kW] | [l/h] | [kPa] | [°C] | [°C]              | [kW] | [l/h] | [kPa] | [°C] |
| <b>SLIM W-100</b>               |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 1100 m³/h</b> |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                             | 9.4  | 414   | 5.2   | 25.5 | 0,0               | 8.1  | 354   | 4.0   | 22.0 | 0,0               | 6.7  | 293   | 3.0   | 18.0 | 0,0               | 5.3  | 231   | 2.0   | 14.5 |
| 10,0                            | 8.2  | 362   | 4.1   | 32.0 | 10,0              | 6.8  | 301   | 3.0   | 28.5 | 10,0              | 5.5  | 239   | 2.1   | 24.5 | 10,0              | 4.1  | 177   | 1.3   | 21.0 |
| 20,0                            | 7.0  | 309   | 3.1   | 38.5 | 20,0              | 5.6  | 247   | 2.1   | 35.0 | 20,0              | 4.2  | 185   | 1.3   | 31.5 | 20,0              | 2.8  | 120   | 0.6   | 27.5 |
| <b>SLIM W-150</b>               |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 1950 m³/h</b> |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                             | 16.5 | 726   | 19.2  | 25.0 | 0,0               | 14.2 | 624   | 15.0  | 21.5 | 0,0               | 11.9 | 522   | 11.3  | 18.0 | 0,0               | 9.6  | 420   | 7.9   | 15.0 |
| 10,0                            | 14.4 | 637   | 15.2  | 32.0 | 10,0              | 12.2 | 534   | 11.4  | 28.5 | 10,0              | 9.9  | 431   | 8.0   | 25.0 | 10,0              | 7.5  | 328   | 5.1   | 21.5 |
| 20,0                            | 12.4 | 547   | 11.5  | 38.5 | 20,0              | 10.1 | 443   | 8.1   | 35.0 | 20,0              | 7.7  | 339   | 5.2   | 31.5 | 20,0              | 5.4  | 234   | 2.8   | 28.0 |
| <b>SLIM W-200</b>               |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 2850 m³/h</b> |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                             | 23.0 | 1016  | 42.2  | 24.0 | 0,0               | 19.9 | 874   | 33.1  | 21.0 | 0,0               | 16.8 | 734   | 24.9  | 17.5 | 0,0               | 13.6 | 594   | 17.6  | 14.5 |
| 10,0                            | 20.2 | 892   | 33.3  | 31.0 | 10,0              | 17.1 | 750   | 25.0  | 27.5 | 10,0              | 13.9 | 608   | 17.7  | 24.5 | 10,0              | 10.7 | 467   | 11.5  | 21.0 |
| 20,0                            | 17.4 | 768   | 25.3  | 38.0 | 20,0              | 14.2 | 624   | 17.9  | 34.5 | 20,0              | 11.0 | 480   | 11.6  | 31.5 | 20,0              | 7.7  | 336   | 6.4   | 28.0 |

V – Air flow  
PT – Heat capacity  
Tp1 – Air temperature at the inlet to the device  
Tp2 – Air temperature at the outlet of the device

Tw1 – Heating medium temperature at the inlet to the heat exchanger  
Tw2 – Heating medium temperature at the return from the heat exchanger  
Qw – Heating medium flow rate in the heat exchanger  
Δpw – Pressure drop in the heat exchanger



## Air curtains ELiS B



### Range

5 m



### Air flow

2000 – 6600 m<sup>3</sup>/h



### Weight

31,7 – 53,2 kg



### Heating capacity

0,9 – 59,0 kW



### Color

White



### Casing

Steel, plastic, aluminium

## Device types available

- 3 lengths – 1 m; 1,5 m or 2 m
- 3 versions: W – water heat exchanger (1- or 2-rows), N – without heating elements („ambient“), E – electric heaters

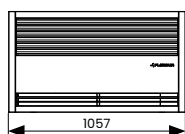
## Application

ELiS B air curtains are dedicated for shops, restaurants, exhibition rooms. Units are designed for installation in the

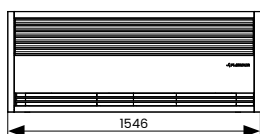
ceilings. Advantage is the possibility to install in the existing ceiling without cutting additional holes.

## Dimensions

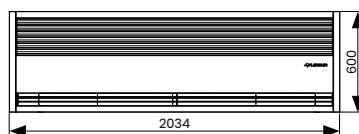
CAD drawings, Revit files and other documents for all models are available at [www.flowair.com](http://www.flowair.com)



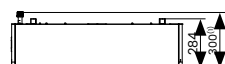
B-NIW/E-100



B-NIW/E-150



B-NIW/E-200



## Technical data

|                                                         | ELiS<br>B-W-<br>100 | ELiS<br>B-W-<br>100 2R | ELiS<br>B-N-<br>100 | ELiS<br>B-E-<br>100 | ELiS<br>B-W-<br>150 | ELiS<br>B-W-<br>150 2R | ELiS<br>B-N-<br>150 | ELiS<br>B-E-<br>150 | ELiS<br>B-W-<br>200 | ELiS<br>B-W-<br>200 2R | ELiS<br>B-N-<br>200 | ELiS<br>B-E-<br>200 |
|---------------------------------------------------------|---------------------|------------------------|---------------------|---------------------|---------------------|------------------------|---------------------|---------------------|---------------------|------------------------|---------------------|---------------------|
| Power supply [V/Hz]                                     | 230 / 50            | 230 / 50               | 230 / 50            | 3 x 400 / 50        | 230 / 50            | 230 / 50               | 230 / 50            | 3 x 400 / 50        | 230 / 50            | 230 / 50               | 230 / 50            | 3 x 400 / 50        |
| Max. power consumption [kW]                             | 0,34                | 0,34                   | 0,42                | 7,5                 | 0,36                | 0,36                   | 0,42                | 11,5                | 0,38                | 0,38                   | 0,49                | 15,5                |
| Max. current consumption [A]                            | 1,5                 | 1,5                    | 1,9                 | 11                  | 1,6                 | 1,6                    | 2                   | 16,6                | 1,7                 | 1,7                    | 2,2                 | 22,4                |
| IP                                                      | 21                  | 21                     | 21                  | 21                  | 21                  | 21                     | 21                  | 21                  | 21                  | 21                     | 21                  | 21                  |
| Connection ["]                                          | 1/2                 | 1/2                    | –                   | –                   | 1/2                 | 1/2                    | –                   | –                   | 1/2                 | 1/2                    | –                   | –                   |
| Air flow <sup>(1)</sup> [m³/h]                          | 2200–2600           | 2000–2400              | 2300–3500           | 2200–2600           | 3200–4000           | 3000–3800              | 3200–4800           | 3200–4000           | 4000–5200           | 3800–4900              | 3600–6600           | 4000–5200           |
| Acoustic pressure level <sup>(2)</sup> [dB(A)]          | 55–58               | 55–57                  | 61–65               | 55–58               | 57–62               | 56–60                  | 58–65               | 57–62               | 58–63               | 56–61                  | 59–66               | 58–63               |
| Acoustic power level <sup>(3)</sup> [dB(A)]             | 70–73               | 70–72                  | 76–80               | 70–73               | 72–77               | 71–75                  | 73–80               | 72–77               | 73–78               | 71–76                  | 74–81               | 73–78               |
| Heating capacity <sup>(4)</sup> [kW]                    | 0,9–13,8            | 3,5–26,7               | –                   | 7,1–7,5             | 2,6–23,6            | 6,9–44,6               | –                   | 11,0–11,5           | 4,4–31,8            | 9,5–59,0               | –                   | 14,9–15,5           |
| Max. water temperature [°C]                             | 95                  | 95                     | –                   | –                   | 95                  | 95                     | –                   | –                   | 95                  | 95                     | –                   | –                   |
| Max. operating pressure [MPa]                           | 1,6                 | 1,6                    | –                   | –                   | 1,6                 | 1,6                    | –                   | –                   | 1,6                 | 1,6                    | –                   | –                   |
| Curtain's air temperature rise <sup>(4)</sup> (ΔT) [°C] | 1–16                | 4–33                   | –                   | 11–12               | 2–18                | 5–35                   | –                   | 12–13               | 3–18                | 6–36                   | –                   | 13–14               |
| Unit weight [kg]                                        | 32,3                | 33,7                   | 31,7                | 34,5                | 41,2                | 43,7                   | 38,9                | 42,4                | 50                  | 53,2                   | 47,2                | 53,2                |
| Range <sup>(1)</sup> [m]                                | 5                   | 5                      | 5                   | 5                   | 5                   | 5                      | 5                   | 5                   | 5                   | 5                      | 5                   | 5                   |

(1) according to ISO 27327-1

(2) the sound pressure level measured in a room with an average sound absorption capacity, 1500 m²; direction factor Q = 2

(3) sound power level according to ISO 27327-2

(4) B-W power and temperature range specified for the parameters: fan speed III, heating medium temperature 40/30°C air temperature at the inlet to the device 20°C – fan speed III, heating medium temperature 90/70°C air temperature at the inlet to the device 0°C; B-E power range for operation at fan speed I – fan speed III

## Installation

### ELiS B



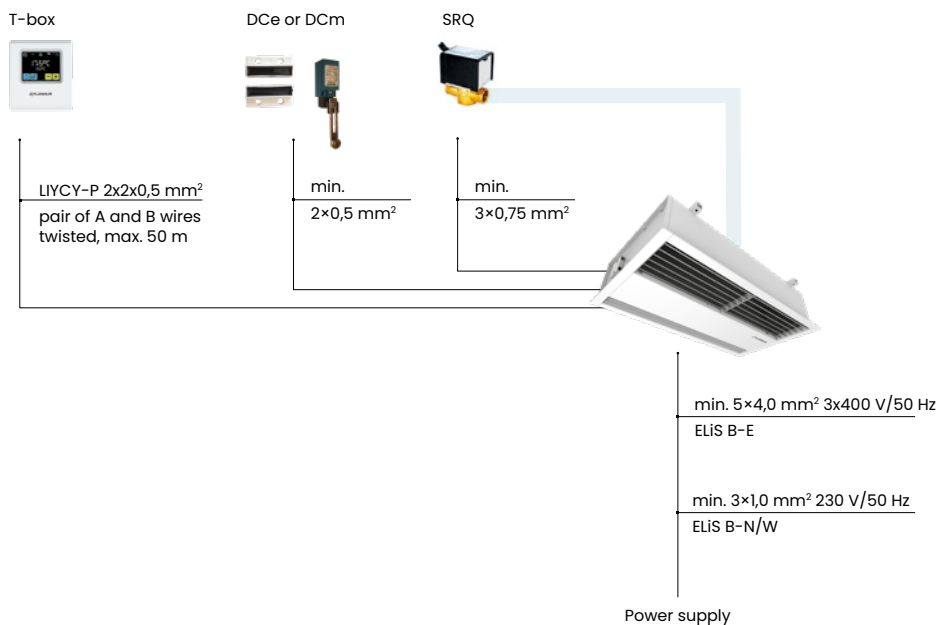
## Installation elements

### Brackets

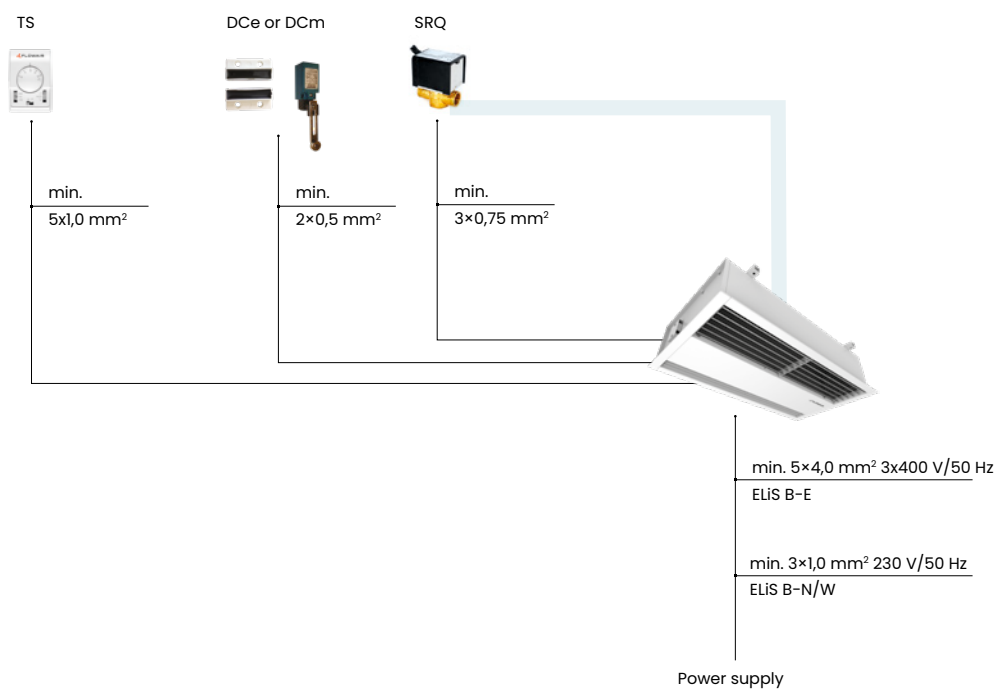
Brackets with mounting holes for installation using threaded rods are included.

# Connection diagrams ELiS B

## T-box controller



## TS controller



# Heating capacities

## ELiS B

| Tw1/Tw2 = 90/70°C               |      |       |       |      | Tw1/Tw2 = 80/60°C |      |       |       |      | Tw1/Tw2 = 70/50°C |      |       |       |      | Tw1/Tw2 = 60/40°C |      |       |       |      |
|---------------------------------|------|-------|-------|------|-------------------|------|-------|-------|------|-------------------|------|-------|-------|------|-------------------|------|-------|-------|------|
| Tp1                             | PT   | Qw    | Δpw   | Tp2  | Tp1               | PT   | Qw    | Δpw   | Tp2  | Tp1               | PT   | Qw    | Δpw   | Tp2  | Tp1               | PT   | Qw    | Δpw   | Tp2  |
| [°C]                            | [kW] | [l/h] | [kPa] | [°C] | [°C]              | [kW] | [l/h] | [kPa] | [°C] | [°C]              | [kW] | [l/h] | [kPa] | [°C] | [°C]              | [kW] | [l/h] | [kPa] | [°C] |
| <b>ELiS B-W-100</b>             |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 2600 m³/h</b> |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                             | 13,8 | 609   | 2,3   | 15,5 | 0,0               | 11,5 | 507   | 1,7   | 13,0 | 0,0               | 9,2  | 404   | 1,2   | 10,5 | 0,0               | 6,8  | 295   | 0,7   | 7,5  |
| 10,0                            | 11,9 | 524   | 1,7   | 24,5 | 10,0              | 9    | 395   | 1,1   | 21,5 | 10,0              | 7,2  | 316   | 0,7   | 18,0 | 10,0              | 4,6  | 198   | 0,3   | 15,0 |
| 20,0                            | 9,9  | 438   | 1,2   | 31,0 | 20,0              | 7,6  | 334   | 0,8   | 28,5 | 20,0              | 5,1  | 225   | 0,4   | 25,0 | 20,0              | 1,7  | 74    | 0,1   | 22,0 |
| <b>ELiS B-W-150</b>             |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 4000 m³/h</b> |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                             | 23,5 | 1039  | 7,4   | 17,5 | 0,0               | 20,0 | 881   | 5,6   | 15,0 | 0,0               | 16,5 | 723   | 4,0   | 12,5 | 0,0               | 13,0 | 563   | 2,7   | 9,5  |
| 10,0                            | 20,5 | 904   | 5,7   | 25,0 | 10,0              | 17,0 | 745   | 4,1   | 22,5 | 10,0              | 13,4 | 585   | 2,8   | 20,0 | 10,0              | 9,7  | 423   | 1,6   | 17,0 |
| 20,0                            | 17,4 | 767   | 4,2   | 32,5 | 20,0              | 13,8 | 607   | 2,8   | 30,0 | 20,0              | 10,2 | 445   | 1,7   | 27,5 | 20,0              | 6,3  | 276   | 0,7   | 24,5 |
| <b>ELiS B-W-200</b>             |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 5200 m³/h</b> |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                             | 31,8 | 1402  | 14,7  | 18,0 | 0,0               | 27,7 | 1195  | 11,3  | 15,5 | 0,0               | 22,5 | 990   | 8,3   | 13,0 | 0,0               | 18,0 | 784   | 5,6   | 10,5 |
| 10,0                            | 27,7 | 1223  | 11,5  | 25,7 | 10,0              | 23,1 | 1016  | 8,4   | 22,5 | 10,0              | 18,5 | 809   | 5,7   | 20,5 | 10,0              | 13,8 | 601   | 3,5   | 18,0 |
| 20,0                            | 23,6 | 1043  | 8,8   | 33,0 | 20,0              | 19,0 | 834   | 5,9   | 30,5 | 20,0              | 14,3 | 625   | 3,6   | 28,0 | 20,0              | 9,5  | 412   | 1,8   | 25,0 |
| <b>ELiS B-W-100 2R</b>          |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 2400 m³/h</b> |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                             | 24,5 | 1080  | 1,82  | 30   | 0,0               | 20,5 | 900   | 1,34  | 27,0 | 0,0               | 11,8 | 716   | 0,91  | 20   | 0,0               | 12   | 521   | 0,53  | 15   |
| 10,0                            | 21   | 928   | 1,38  | 36   | 10,0              | 17   | 747   | 0,95  | 31   | 10,0              | 12,8 | 560   | 0,58  | 26   | 10,0              | 7,8  | 341   | 0,25  | 20   |
| 20,0                            | 17,6 | 776   | 0,99  | 41   | 20,0              | 13,5 | 592   | 0,63  | 36   | 20,0              | 9    | 395   | 0,31  | 31   | 20,0              | 3,3  | 142   | 0,05  | 24   |
| <b>ELiS B-W-150 2R</b>          |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 3800 m³/h</b> |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                             | 42,2 | 1863  | 6,1   | 33   | 0,0               | 36   | 1580  | 4,6   | 28   | 0,0               | 29,6 | 1296  | 3,3   | 23   | 0,0               | 23,2 | 1010  | 2,2   | 18   |
| 10,0                            | 39,4 | 1618  | 4,7   | 38,5 | 10,0              | 30,4 | 1334  | 3,4   | 33,5 | 10,0              | 24   | 1049  | 2,3   | 28,5 | 10,0              | 17,4 | 758   | 1,3   | 23,5 |
| 20,0                            | 31,1 | 1373  | 3,5   | 44   | 20,0              | 24,7 | 1086  | 2,3   | 39   | 20,0              | 18,2 | 797   | 1,4   | 34   | 20,0              | 11,3 | 492   | 0,6   | 28,5 |
| <b>ELiS B-W-200 2R</b>          |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 4900 m³/h</b> |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                             | 57,2 | 2524  | 12,2  | 34   | 0,0               | 49   | 2153  | 9,37  | 29   | 0,0               | 40,8 | 1783  | 6,85  | 24   | 0,0               | 32,4 | 1413  | 4,64  | 19   |
| 10,0                            | 49,9 | 2200  | 9,49  | 39   | 10,0              | 41,6 | 1828  | 6,95  | 34   | 10,0              | 33,3 | 1456  | 4,74  | 30   | 10,0              | 24,8 | 1082  | 2,87  | 25   |
| 20,0                            | 42,5 | 1876  | 7,09  | 45   | 20,0              | 34,2 | 1501  | 4,85  | 40   | 20,0              | 25,7 | 1125  | 2,97  | 35   | 20,0              | 17   | 741   | 1,46  | 30   |

V – Air flow  
 PT – Heat capacity  
 Tp1 – Air temperature at the inlet to the device  
 Tp2 – Air temperature at the outlet of the device  
 Tw1 – Heating medium temperature at the inlet to the heat exchanger  
 Tw2 – Heating medium temperature at the return from the heat exchanger  
 Qw – Heating medium flow rate in the heat exchanger  
 Δpw – Pressure drop in the heat exchanger

Select units for other parameters using ours selection programs  
available at [www.flowair.com](http://www.flowair.com)



## Air curtains ELiS G



**Range**  
8 m



**Air flow**  
2400 – 12800 m³/h



**Weight**  
43,0 – 77,9 kg



**Heating capacity**  
7,8 – 71,9 kW



**Color**  
Grey, silver



**Casing**  
Galvanized steel

## Device types available

- 3 lengths – 1,5 m; 2 m or 2,5 m
- 3 versions: W – water heat exchanger (1- or 2-rows), N – without heating elements („ambient”), E – electric heaters

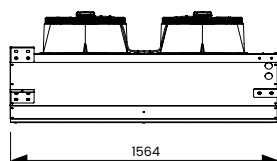
## Application

Warehouses, halls, logistics centers. ELiS G devices are intended for horizontal and vertical installation. They create an air barrier that reduces the various losses associated

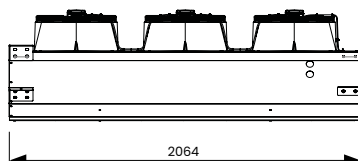
with the exchange of air between the room and the outside area.

## Dimensions

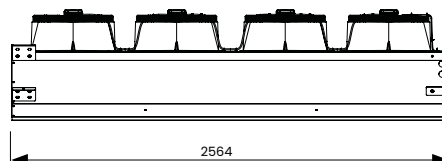
CAD drawings, Revit files and other documents for all models are available at [www.flowair.com](http://www.flowair.com)



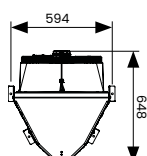
G-150



G-200



G-250



## Technical data

|                                                         | G-E-150     | G-N-150   | G-W-150   | G-W-150 2R | G-E-200     | G-N-200   | G-W-200   | G-W-200 2R | G-E-250    | G-N-250    | G-W-250    |
|---------------------------------------------------------|-------------|-----------|-----------|------------|-------------|-----------|-----------|------------|------------|------------|------------|
| Power supply [V/Hz]                                     | 3x400 / 50  | 230 / 50  | 230 / 50  | 230 / 50   | 3x400 / 50  | 230 / 50  | 230 / 50  | 230 / 50   | 3x400 / 50 | 230 / 50   | 230 / 50   |
| Max. power consumption [kW] <sup>(1)</sup>              | 13,5 + 0,68 | 0,67      | 0,67      | 0,67       | 20,5 + 1,05 | 1,05      | 1,05      | 1,05       | 24,5 + 1,4 | 1,4        | 1,4        |
| Max. current consumption [A] <sup>(1)</sup>             | 19,5 + 3,0  | 3         | 3         | 3          | 29,5 + 4,5  | 4,5       | 4,5       | 4,5        | 36,0 + 6,0 | 6          | 6          |
| IP                                                      | 20/F        | 54/F      | 54/F      | 54/F       | 20/F        | 54/F      | 54/F      | 54/F       | 20/F       | 54/F       | 54/F       |
| Connection                                              | -           | -         | 3/4       | 3/4        | -           | -         | 3/4       | 3/4        | -          | -          | 3/4        |
| Air flow [m³/h] <sup>(2)</sup>                          | 2600-6300   | 2800-6550 | 2500-6200 | 2400-6100  | 3400-9400   | 3900-9700 | 3300-9100 | 3100-8800  | 4900-12400 | 4900-12800 | 4300-12000 |
| Acoustic pressure level [dB(A)] - 5 m <sup>(3)</sup>    | 44-65       | 44-65     | 45-66     | 46-67      | 45-66       | 45-66     | 46-68     | 47-69      | 46-68      | 46-68      | 47-69      |
| Acoustic pressure level [dB(A)] - 3 m <sup>(3)</sup>    | 45-66       | 45-66     | 46-67     | 47-68      | 46-67       | 46-67     | 47-69     | 48-70      | 47-69      | 47-69      | 48-70      |
| Acoustic power level [dB(A)] <sup>(4)</sup>             | 60-81       | 60-81     | 61-82     | 62-83      | 61-82       | 61-82     | 62-84     | 63-85      | 62-84      | 62-84      | 63-85      |
| Heating capacity [kW] <sup>(5)</sup>                    | 13,5        | -         | 7,8-27    | 18,7-62,9  | 20,5        | -         | 8,7-30,0  | 21,4-71,9  | 24,5       | -          | 15,0-49,6  |
| Max. water temperature [°C]                             | -           | -         | 120       | 120        | -           | -         | 120       | 120        | -          | -          | 120        |
| Max. operating pressure [MPa]                           | -           | -         | 1,6       | 1,6        | -           | -         | 1,6       | 1,6        | -          | -          | 1,6        |
| Curtain's air temperature rise (ΔT) [°C] <sup>(5)</sup> | 7,0-16,0    | -         | 4,0-13,0  | 9,0-30,0   | 7,0-18,0    | -         | 3,0-11,0  | 8-27       | 7,5-16,5   | -          | 4,0-12,0   |
| Unit weight [kg]                                        | 47          | 43        | 47,4      | 51,8       | 62,2        | 58        | 62        | 66,4       | 77,9       | 71,5       | 78,3       |
| Range [m] <sup>(2)</sup>                                | 7,5         | 8         | 7,5       | 7,5        | 7,5         | 8         | 7,5       | 7,5        | 7,5        | 8          | 7,5        |

(1) for G-E, the parameters of heating elements powered by 3N 400V and fans powered by 1N 230V are given, respectively

(2) in accordance with ISO 27327-1

(3) acoustic pressure level has been measured in a 1500m³ space with a medium sound absorption coefficient, directional factor: Q=2

(4) acoustic power level according to ISO 27327-2

(5) G-W range of heating powers and temperatures specified for the parameters: III fan speed, heating medium temperature 40/30 0 °C inlet temperature 20 °C - III fan speed, heating medium temperature 110/90 °C at the device inlet 0 °C; G E power range for operation at 1N 230/50 to operation at 3N 400/50

## Installation ELiS G



**A** – max. 8 m

**B** – max. 14 m

## Installation elements

### Brackets

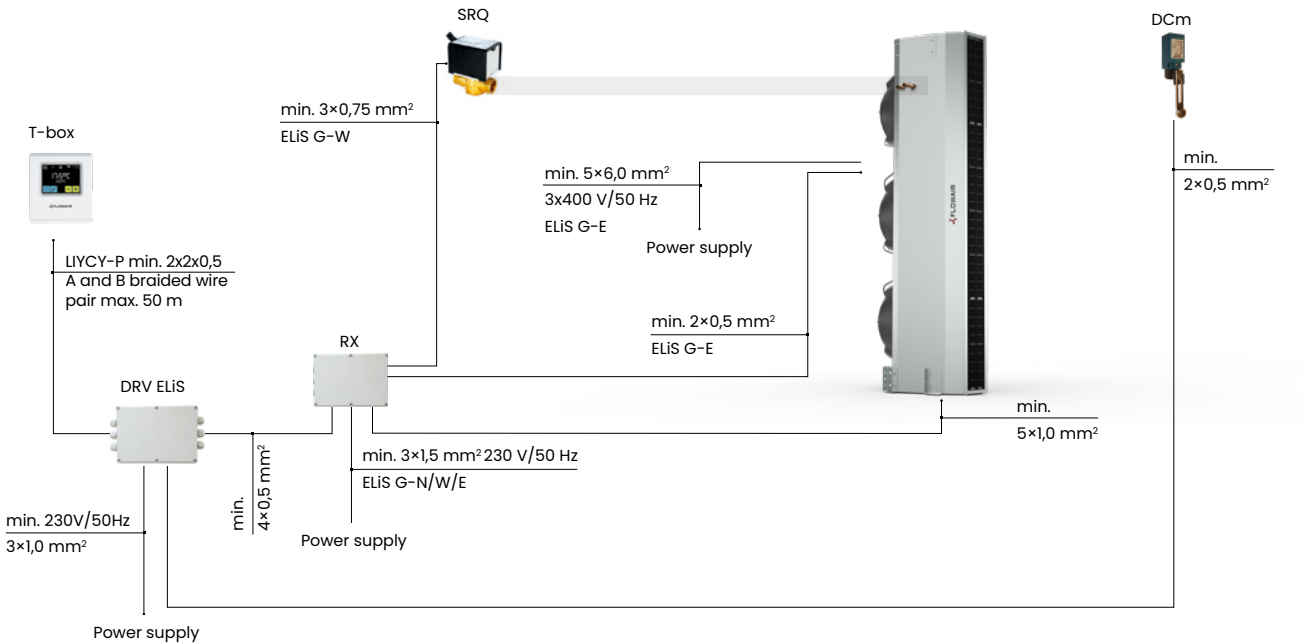
Possibility of vertical and horizontal installation using mounting brackets.

### Rods

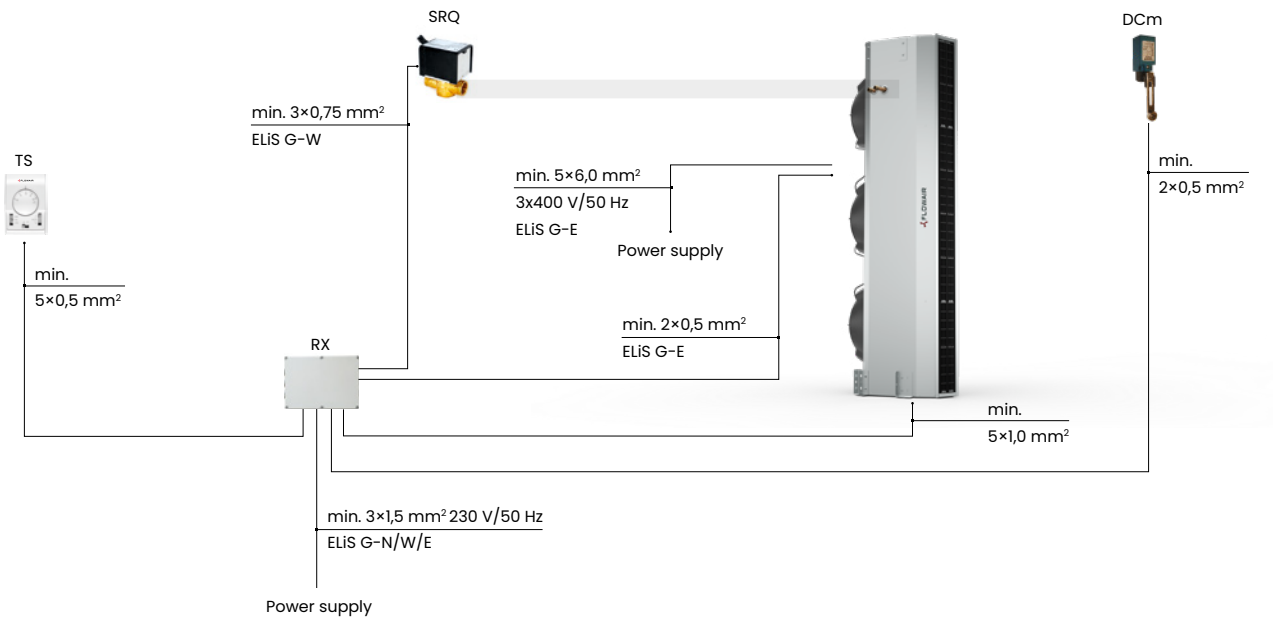
ELiS G air curtains have special mounting holes for installation using threaded rods.

# Connection diagrams air curtain ELiS G

## T-box controller



## TS controller



# Heating capacities

## ELiS G

| Tw1/Tw2 = 90/70°C                |      |       |       |      | Tw1/Tw2 = 80/60°C |      |       |       |      | Tw1/Tw2 = 70/50°C |      |       |       |      | Tw1/Tw2 = 60/40°C |      |       |       |      |
|----------------------------------|------|-------|-------|------|-------------------|------|-------|-------|------|-------------------|------|-------|-------|------|-------------------|------|-------|-------|------|
| Tp1                              | PT   | Qw    | Δpw   | Tp2  | Tp1               | PT   | Qw    | Δpw   | Tp2  | Tp1               | PT   | Qw    | Δpw   | Tp2  | Tp1               | PT   | Qw    | Δpw   | Tp2  |
| [°C]                             | [kW] | [l/h] | [kPa] | [°C] | [°C]              | [kW] | [l/h] | [kPa] | [°C] | [°C]              | [kW] | [l/h] | [kPa] | [°C] | [°C]              | [kW] | [l/h] | [kPa] | [°C] |
| <b>ELiS G-W-150</b>              |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 6200 m³/h</b>  |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                              | 27   | 1 190 | 4,5   | 12,5 | 0,0               | 23,2 | 1 020 | 3,5   | 11   | 0,0               | 19,4 | 848   | 2,5   | 9    | 0,0               | 15,5 | 674   | 1,7   | 7,5  |
| 10,0                             | 23,6 | 1 043 | 3,5   | 21   | 10,0              | 19,8 | 871   | 2,6   | 19,5 | 10,0              | 15,9 | 697   | 1,8   | 17,5 | 10,0              | 11,9 | 519   | 1,1   | 15,5 |
| 20,0                             | 20,1 | 887   | 2,6   | 29,5 | 20,0              | 16,3 | 714   | 1,8   | 27,5 | 20,0              | 12,3 | 539   | 1,1   | 26   | 20,0              | 8,1  | 353   | 0,5   | 24   |
| <b>ELiS G-W-200</b>              |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 9100 m³/h</b>  |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                              | 29,9 | 1 321 | 5,5   | 11   | 0,0               | 25,8 | 1 132 | 4,2   | 9,5  | 0,0               | 21,5 | 941   | 3,1   | 8    | 0,0               | 17,2 | 749   | 2,1   | 6,5  |
| 10,0                             | 26,2 | 1 158 | 4,3   | 19,5 | 10,0              | 22   | 966   | 3,1   | 18   | 10,0              | 17,7 | 774   | 2,1   | 16,5 | 10,0              | 13,2 | 578   | 1,3   | 15   |
| 20,0                             | 22,3 | 985   | 3,2   | 28   | 20,0              | 18   | 793   | 2,2   | 26,5 | 20,0              | 13,7 | 599   | 1,3   | 25   | 20,0              | 9    | 394   | 0,7   | 23,5 |
| <b>ELiS G-W-250</b>              |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 12000 m³/h</b> |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                              | 49,6 | 2 191 | 18,6  | 12   | 0,0               | 43   | 1 889 | 14,5  | 10,5 | 0,0               | 36,2 | 1 586 | 10,8  | 9    | 0,0               | 29,4 | 1 284 | 7,6   | 7    |
| 10,0                             | 43,6 | 1 926 | 14,7  | 20,5 | 10,0              | 36,9 | 1 621 | 11    | 19   | 10,0              | 30,1 | 1 316 | 7,7   | 17,5 | 10,0              | 23,2 | 1 011 | 4,9   | 15,5 |
| 20,0                             | 37,3 | 1 647 | 11    | 29   | 20,0              | 30,5 | 1 341 | 7,7   | 27,5 | 20,0              | 23,6 | 1 035 | 5     | 26   | 20,0              | 16,6 | 724   | 2,7   | 24   |
| <b>ELiS G-W-150 2R</b>           |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 6100 m³/h</b>  |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                              | 62,9 | 2776  | 21,2  | 30,0 | 0,0               | 54,4 | 2391  | 16,5  | 26,0 | 0,0               | 45,9 | 2010  | 12,3  | 22,0 | 0,0               | 37,3 | 1628  | 8,5   | 18,0 |
| 10,0                             | 55,0 | 2427  | 16,5  | 36,5 | 10,0              | 46,5 | 2046  | 12,3  | 32,5 | 10,0              | 38,0 | 1664  | 8,6   | 28,0 | 10,0              | 29,3 | 1277  | 5,4   | 24,0 |
| 20,0                             | 46,7 | 2063  | 12,2  | 42,5 | 20,0              | 38,3 | 1683  | 8,6   | 38,5 | 20,0              | 29,7 | 1301  | 5,5   | 34,0 | 20,0              | 20,9 | 912   | 2,9   | 30,0 |
| <b>ELiS G-W-200 2R</b>           |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| <b>step III : V = 8800 m³/h</b>  |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |                   |      |       |       |      |
| 0,0                              | 71,9 | 3171  | 27,2  | 27,0 | 0,0               | 62,1 | 2729  | 21,2  | 23,5 | 0,0               | 52,4 | 2293  | 15,6  | 19,5 | 0,0               | 42,5 | 1856  | 10,9  | 16,0 |
| 10,0                             | 62,8 | 2773  | 21,2  | 33,5 | 10,0              | 53,2 | 2337  | 15,8  | 30,0 | 10,0              | 43,3 | 1897  | 11,0  | 26,5 | 10,0              | 33,4 | 1456  | 6,9   | 22,5 |
| 20,0                             | 53,4 | 2355  | 15,6  | 40,0 | 20,0              | 43,7 | 1919  | 11    | 36,5 | 20,0              | 33,9 | 1483  | 7,0   | 32,5 | 20,0              | 23,8 | 1039  | 3,7   | 29,0 |

- V – Air flow  
 PT – Heat capacity  
 Tp1 – Air temperature at the inlet to the device  
 Tp2 – Air temperature at the outlet of the device  
 Tw1 – Heating medium temperature at the inlet to the heat exchanger  
 Tw2 – Heating medium temperature at the return from the heat exchanger  
 Qw – Heating medium flow rate in the heat exchanger  
 Δpw – Pressure drop in the heat exchanger

Select units for other parameters using ours selection programs  
available at [www.flowair.com](http://www.flowair.com)



# Control elements

## TS controller – basic version

Simplest regulation of 3-step fans. Fan heater operation is controlled by 3-step fan speed controller with thermostat.



## T-box controller – BMS version

Intelligent regulation system of 3-step fans. Speed regulation of energy-efficient fan via T-box controller.



## T-box Zone controller – BMS version with zones

T-box is an advanced intelligent touch screen controller with zoning function..

- controls up to 31 units or zones
- weekly programmer for each zone
- individual temperature setting for each zone



|                                                    | Controller <b>TS</b>           | Controller <b>T-box</b>                             | Controller <b>T-box Zone</b>                                  |
|----------------------------------------------------|--------------------------------|-----------------------------------------------------|---------------------------------------------------------------|
| <b>Controlling options</b>                         |                                |                                                     |                                                               |
| Type of devices                                    | Slim, ELiS B, ELiS G           | Slim <sup>(1)</sup> , ELiS B, ELiS G <sup>(1)</sup> | Slim <sup>(1)</sup> , ELiS B, ELiS G <sup>(1)</sup> , ELiS AX |
| Manual 3-step air flow regulation                  | ✓                              | ✓                                                   | ✓                                                             |
| <b>Modes</b>                                       |                                |                                                     |                                                               |
| Heating/Ventilation                                | ✓                              | ✓                                                   | ✓                                                             |
| Operation depending on door sensor and temperature | ✓                              | ✓                                                   | ✓                                                             |
| Weekly programmer                                  |                                | ✓                                                   | ✓                                                             |
| BMS                                                |                                | ✓                                                   | ✓                                                             |
| Switch-off delay                                   |                                | ✓                                                   | ✓                                                             |
| Idle speed mode                                    |                                | ✓                                                   | ✓                                                             |
| Integration with FLOWAIR SYSTEM                    |                                | ✓                                                   | ✓                                                             |
| Weekly programmer for each zone                    |                                |                                                     | ✓                                                             |
| Individual setting for each zone                   |                                |                                                     | ✓                                                             |
| Individual naming of each zone                     |                                |                                                     | ✓                                                             |
| Antifreeze for each zone                           |                                |                                                     | ✓                                                             |
| <b>Max. number of connected units</b>              |                                |                                                     |                                                               |
| Via controller                                     | ELiS B – 5,<br>Slim/ELiS G – 1 | 31                                                  | 31                                                            |
| Via additional splitters                           | ELiS G – 9, Slim/ELiS T – 18   | n/a                                                 | n/a                                                           |

(1) External control module DRV Slim required

(2) External control module DRV ELiS required

## Control elements for air curtains

### Door sensors

Door sensors inform the control system about the opening / closing of the door.



Compatibility of sensors with ELiS air curtains

| Sensor | ELiS AX | Slim | ELiS B | ELiS G |
|--------|---------|------|--------|--------|
| DCet   |         | ✓    |        |        |
| DCe    | ✓       |      | ✓      |        |
| DCm    | ✓       |      | ✓      | ✓      |

### Valves

Two or three-way valves with an electric actuator are available to control the flow of the heating medium.



Compatibility of valves with ELiS air curtains

| Valve        | ELiS AX | Slim | ELiS B | ELiS G |
|--------------|---------|------|--------|--------|
| SRQ2d 1/2"   |         | ✓    | ✓      |        |
| SRQ2d 3/4"   |         |      |        | ✓      |
| SRQ3d 1/2"   |         | ✓    | ✓      |        |
| SRQ3d 3/4"   |         |      |        | ✓      |
| SRX (0-10 V) | ✓       |      |        |        |

### RX splitters

Control signal distributor for connecting several ELiS G air curtains with 3-stage fans to one controller



The maximum number of devices supported by one controller

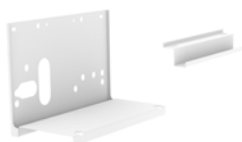
| Splitter  | Slim              | ELiS G |
|-----------|-------------------|--------|
| 1 szt. RX | 6 <sup>(1)</sup>  | 3      |
| 2 szt. RX | 12 <sup>(1)</sup> | 6      |
| 3 szt. RX | 18 <sup>(1)</sup> | 9      |

(1) maksymalna ilość urządzeń dotyczy kurtyn o tej samej lengths

## Installation elements for air curtains

### Brackets ELiS AX

Console for vertical installation up to 2,5 meters . No possibility of joining curtains together.



White brackets for horizontal installation.

– up to 2 meters curtains - 2 brackets

– 2,5 meter curtain - 3 brackets



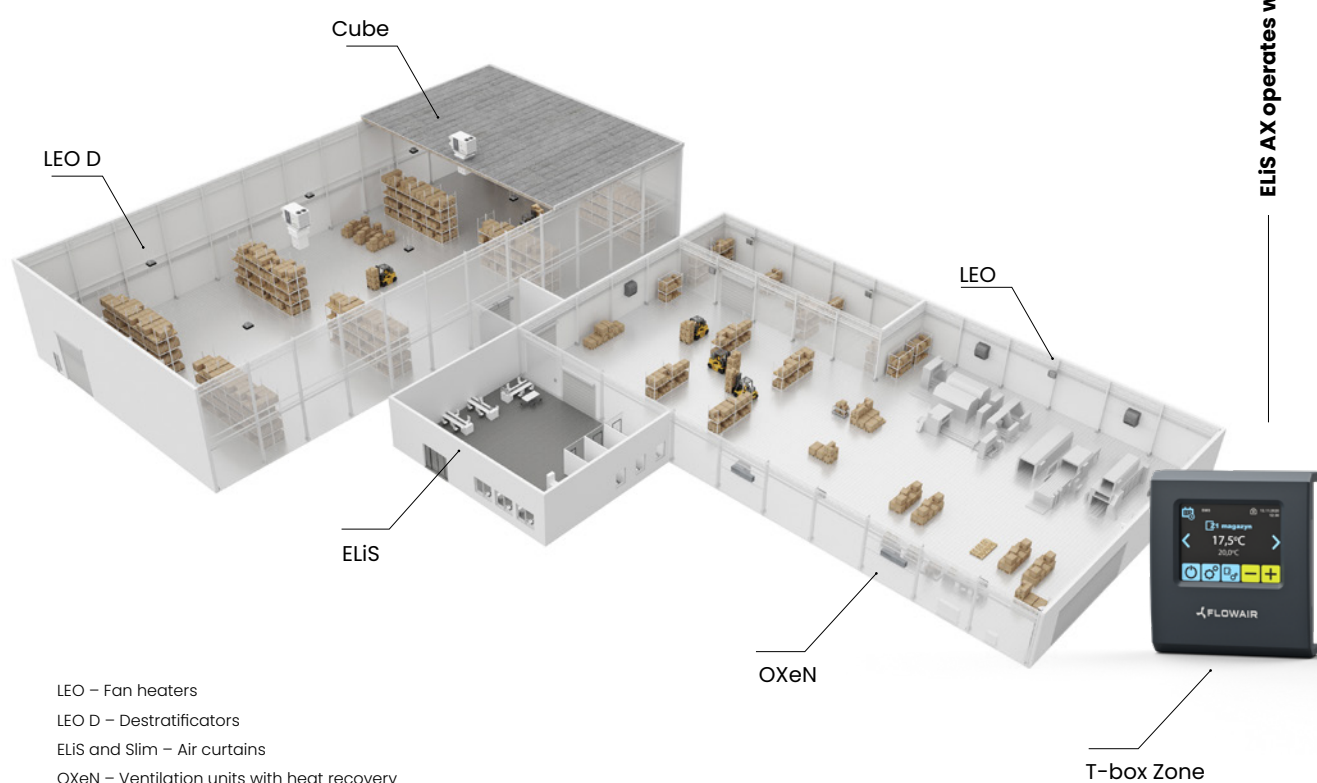
### Brackets Slim

For horizontal or vertical installation of the Slim air curtain. Available in white or black.



## SYSTEM FLOWAIR

The SYSTEM FLOWAIR is a complete range of heating and ventilation devices integrated by a single controller. The T-box Zone controller allows up to 31 devices from the range to work together in 31 independent zones.



LEO – Fan heaters  
LEO D – Destratifiers  
ELiS and Slim – Air curtains  
OXeN – Ventilation units with heat recovery  
Cube – Rooftop devices



Control of device operation



Local adjustment of device operation



Advanced control of ventilation and heating devices



Adjustment of device operation schedule to individual needs

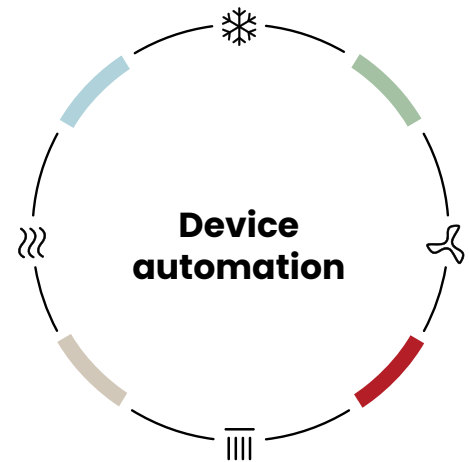


Antifreeze – protection of the building and equipment against excessively low temperatures

## Integration and interoperability of devices

The T-box Zone smart touch controller has a number of functions necessary to effectively manage the operation of the heating and ventilation system that until now were restricted to extensive Building Management Systems (BMS).

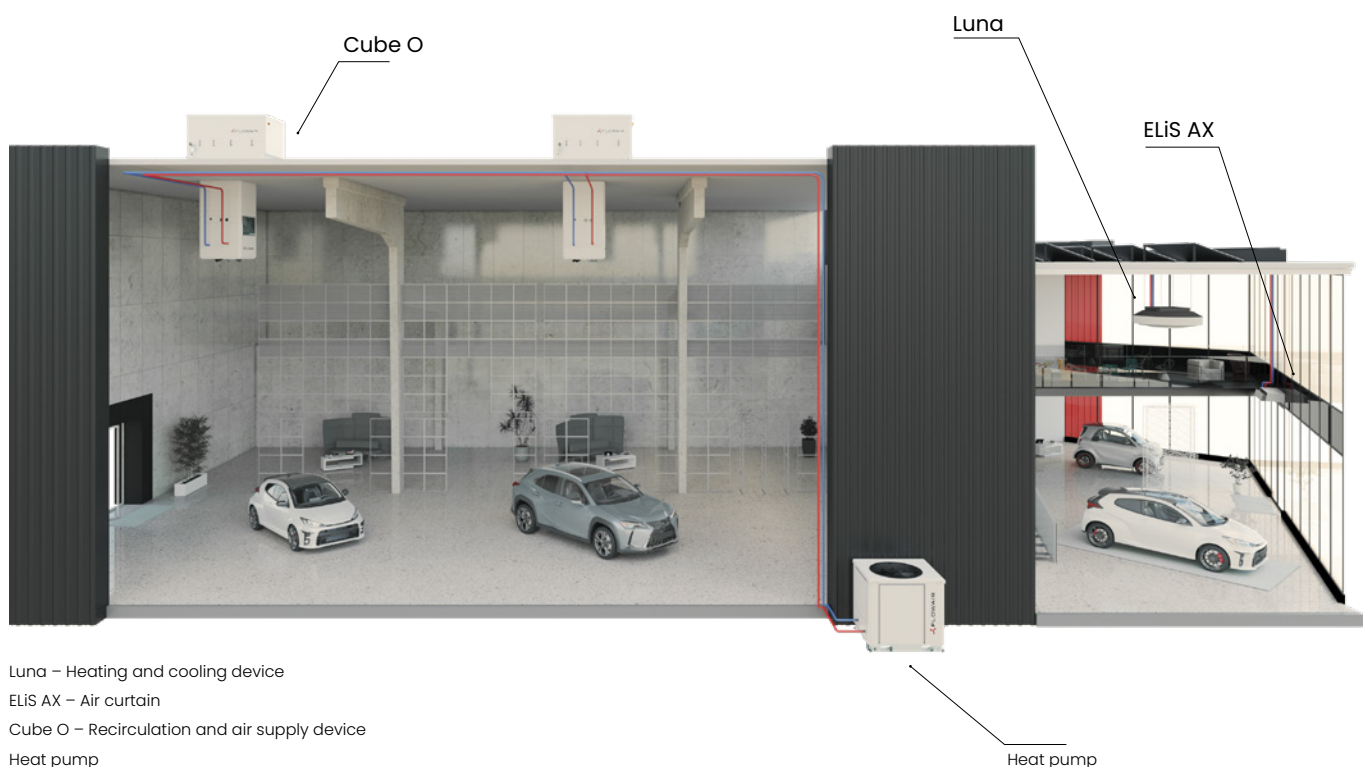
The SYSTEM enables devices to work together to ensure a higher thermal comfort and improve energy efficiency. The combined operation of heaters and destratifiers makes it possible to effectively utilise heat from the upper parts of the room, while saving the heat energy supplied by the heaters.



## Interoperability with heat pumps

The ELiS AX air curtain is an energy efficient solution, in line with the green trends and the zero-emission policy. It is equipped with a 3- or 4-row water heat exchanger, which works together with low-temperature heat sources. It can be supplied with a low-temperature heating medium (60–40°C).

Advanced control ensures service-free interoperability with heat pumps. Another advantage of the solution is that it uses water as the heating or cooling medium, which increases safety and decreases the impact on the environment compared to air conditioning systems which use CFCs.





Manufacturer:

**FLOWAIR Sp. z o.o.**  
Chwaszczyńska 135,  
81-571 Gdynia

[www.flowair.com](http://www.flowair.com)

