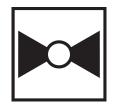






5-year warranty



#### **Technical data**

#### **Functional data**

Valve Size	2.5" [65]		
Fluid	chilled or hot water, up to 60% glycol, steam		
Fluid Temp Range (water)	32350°F [0176°C]		
Fluid Temp Range (steam)	32280°F [0138°C]		
Body Pressure Rating	ANSI Class 250, up to 280 psi below 350°F		
Flow characteristic	equal percentage		
Servicing	repack/rebuild kits available		
Rangeability Sv	85:1		
Max Differential Pressure (Steam)	15 psi [103 kPa]		
Flow Pattern	2-way		
Leakage rate	ANSI Class III		
Controllable flow range	stem up - open A – AB		
Cv	65		
Maximum Inlet Pressure (Steam)	35 psi [241 kPa]		
ANSI Class	250		
Body pressure rating note	up to 280 psi below 350°F		
Valve body	Cast iron - ASTM A126 Class B		
Valve plug	bronze		
Stem seal	NLP EPDM (no lip packing)		
Seat	Stainless steel AISI 316		
Pipe connection	250 lb flanged		
Non-Spring	EVB(X)		

### Safety notes



Electronic fail-safe

Suitable actuators

Materials

 WARNING: This product can expose you to lead which is known to the State of California to cause cancer and reproductive harm. For more information go to www.p65warnings.ca.gov

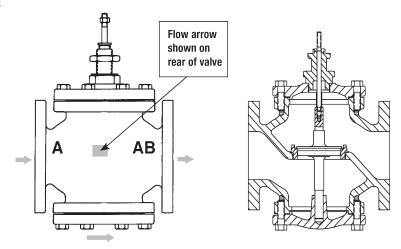
AVKB(X)

- The valve has been designed for use in stationary heating, ventilation and air-conditioning systems and
  must not be used outside the specified field of application, especially in aircraft or in any other airborne
  means of transport.
- Only authorised specialists may carry out installation. All applicable legal or institutional installation regulations must be complied during installation.
- The valve does not contain any parts that can be replaced or repaired by the user.
- When determining the flow rate characteristic of controlled devices, the recognised directives must be observed.

#### **Product features**

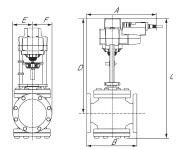


### Flow/Mounting details

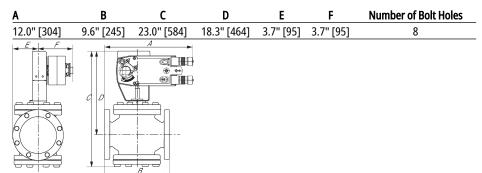


# **Dimensions**

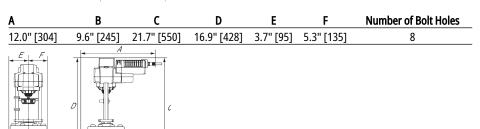
# **Dimensional drawings**



EVB, EVX, RVB, RVX



AFB, AFX



AVKB, AVKX

A	В	C	D	E	F	Number of Bolt Holes
12.0" [304]	9.6" [245]	23.0" [584]	18.3" [464]	3.7" [95]	3.7" [95]	8



#### **Technical data sheet AFBUP-X1**



echnical data				
Electrical data	Nominal voltage	AC 24240 V / DC 24125 V		
	Nominal voltage frequency	50/60 Hz		
	Power consumption in operation	7 W		
	Power consumption in rest position	3.5 W		
	Transformer sizing	7 VA @ AC 24 V (class 2 power source), 8.5 VA @ AC 120 V, 18 VA @ AC 240 V		
	Electrical Connection	18 GA appliance cable, 3 ft [1 m], with 1/2" conduiconnector		
	Overload Protection	electronic throughout 095° rotation		
Functional data	Direction of motion motor	selectable by ccw/cw mounting		
	Direction of motion fail-safe	reversible with cw/ccw mounting		
	Manual override	5 mm hex crank (3/16" Allen), supplied		
	Angle of rotation	95°,		
	Running Time (Motor)	75 s		
	Running time fail-safe	<20 s		
	Noise level, motor	50 dB(A)		
	Noise level, fail-safe	62 dB(A)		
	Position indication	Mechanical		
Safety data	Degree of protection IEC/EN	IP54		
	Degree of protection NEMA/UL	NEMA 2 UL Enclosure Type 2		
	Agency Listing	cULus acc. to UL60730-1A/-2-14, CAN/CSA E60730-1:02, CE acc. to 2014/30/EU and 2014/35/ EU; Listed to UL 2043 - suitable for use in air plenums per Section 300.22(c) of the NEC and Section 602.2 of the IMC		
	Quality Standard	ISO 9001		
	Ambient temperature	-22122°F [-3050°C]		
	Storage temperature	-40176°F [-4080°C]		
	Ambient humidity	max. 95% r.H., non-condensing		
	Servicing	maintenance-free		
Weight	Weight	4.6 lb [2.1 kg]		
Materials	Housing material	Galvanized steel and plastic housing		

# **Electrical installation**



# Warning! Live Electrical Components!

During installation, testing, servicing and troubleshooting of this product, it may be necessary to work with live electrical components. Have a qualified licensed electrician or other individual who has been



Technical data sheet AFBUP-X1

properly trained in handling live electrical components perform these tasks. Failure to follow all electrical safety precautions when exposed to live electrical components could result in death or serious injury.

UP) Universal Power Supply (UP) models can be supplied with 24 VAC up to 240 VAC, or 24 VDC up to 125 VDC.

A Actuators with appliance cables are numbered.

Apply only AC line voltage or only UL-Class 2 voltage to the terminals of auxiliary switches. Mixed or combined operation of line voltage/safety extra low voltage is not allowed.

Meets cULus requirements without the need of an electrical ground connection.

A Provide overload protection and disconnect as required.

Actuators may be powered in parallel. Power consumption must be observed.

As Parallel wiring required for piggy-back applications.

