

## TECHNICAL SPECIFICATIONS - AL SERIES OR MODELS EVAPORATIVE COOLERS

### GENERAL

AIRA AL Series units are an evaporative cooler appliance, capable of supplying cooled air and fresh air ventilation. AIRA units are produced in 4 different capacities to suit a wide variety of installation requirements.

### CABINET

The frame is a galvanised steel body and external cabinets are marine grade aluminium. Forklift tine channels and lifting lugs are provided within the frame to facilitate transport and lifting of the AL18, 25 and 30. For lifting requirements for the AL36 contact Seeley International. Components are effectively treated to ensure corrosion resistance and mechanical fasteners are zinc coated, stainless steel or aluminium. Connection surfaces are provided for outlet supply air, to be fitted using established industry practices.

### FAN & MOTOR

The standard fan is a forward curved blower constructed from steel. Blower housings are powder coated steel as standard. Fan motors are mounted externally to the blower and connect via a set of pulleys. All units are available at order with 3 different pulley combinations to meet flow and pressure requirements. Units may be fitted with a larger motor at additional cost. Contact Seeley International for further advice.

Axial fans are specified for the F configuration and designed to be installed indoors generally as an air curtain.

### PULLEYS

Upon order the customer will be given the options of one of three pulley kits to meet their flow and pressure requirements. Variations in external pressure drop outside of the standard product range require pulley and belt combinations to be supplied by the customer.

All pulleys are of steel construction with taper lock mounting.

### ELECTRICAL CONTROL

All units have an electrical starter box housed inside the unit. Units may be controlled by Wall Switch or BMS (customer supplied).

Units will require single or 3 phase power depending on required motor size. Electrical circuit breakers must be a minimum of a "D curve" motor start circuit breaker. Electrical circuit breakers must be sized according to the total load requirements.

### CONFIGURATION OPTIONS

1. Cooler Size/Model
2. Pad Type (Pad Covers/ No Covers)
3. Control Type (Wall Switch/BMS)
4. Discharge Orientation (Top, Side or Down)
5. Drain Type (Normal/Auto drain)
6. Roof Stand

### COOLING PADS

Pad options available upon request.

### WATER SUPPLY AND DRAINAGE

Water consumption rates vary with weather conditions.

Units have a non-corrosive low content water reservoir.

Units use a float valve to shut off incoming supply once required capacity is reached.

Units require a bleed rate depending on the hardness of the water. Incorrectly setting the bleed rate will reduce the lifetime of the unit.

Drainage must be connected to the unit to allow for bleed rate. Auto-drain kits are available.

### USER CONTROL

Units can be fitted with either an ON/OFF wall switch or connected to a BMS system.

Interface for BMS:

Fan: ON/OFF or LOW/HIGH

Cool: ON/OFF

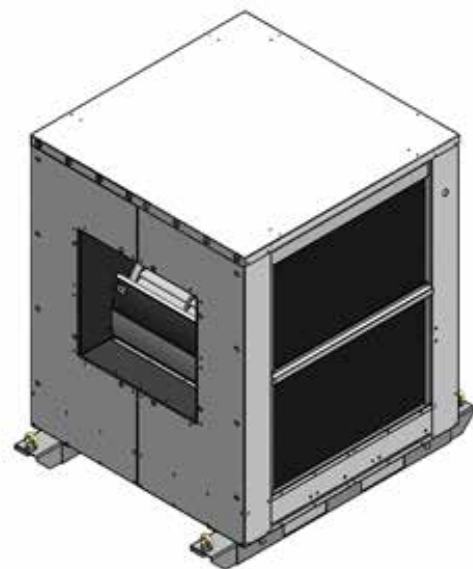
Control: 0-10VDC

Wall Switch

Power: ON/OFF

Fan: ON/OFF or LOW/HIGH

Cool: ON/OFF

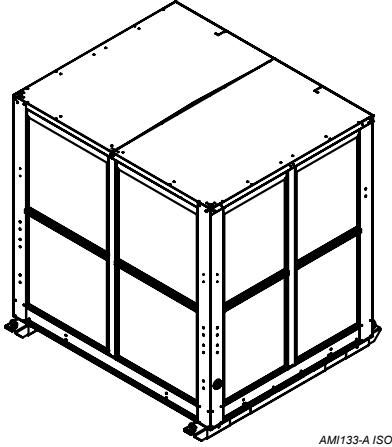


AM/098-A

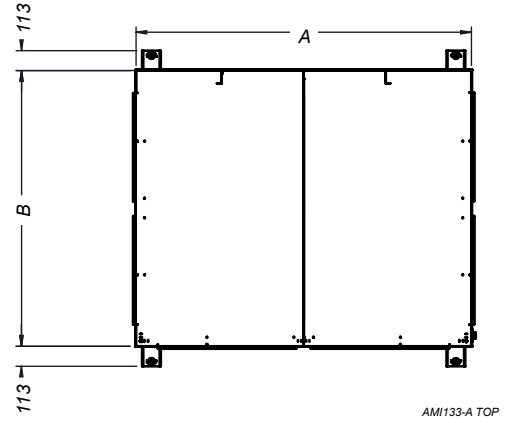
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AL SERIES COOLERS

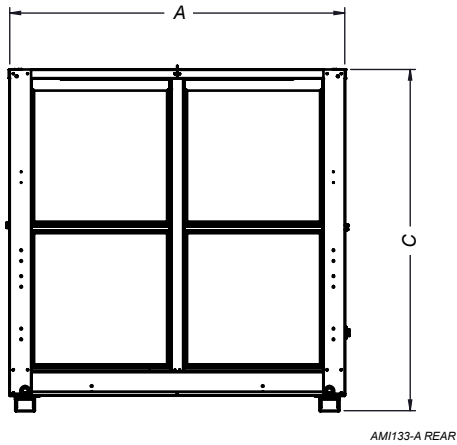
ISOMETRIC (AL18, AL25, AL30)



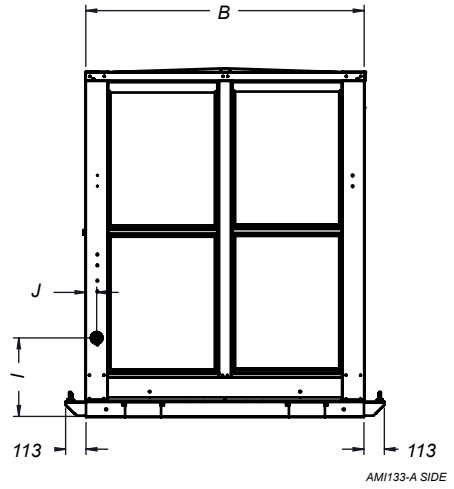
TOP (AL18, AL25, AL30)



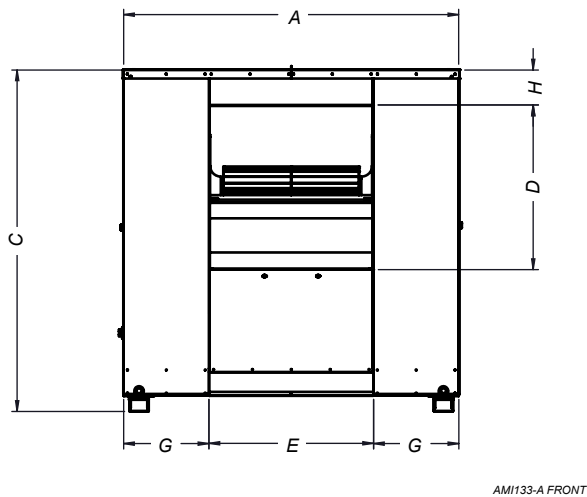
REAR (AL18, AL25, AL30)



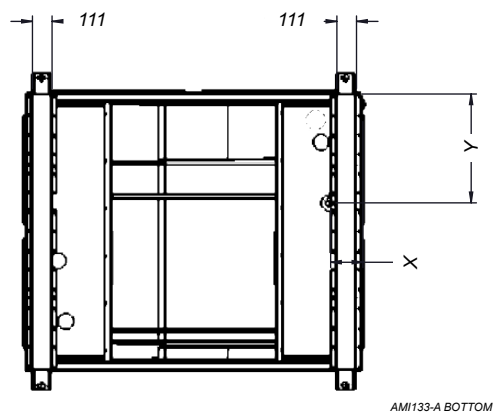
SIDE (AL18, AL25, AL30)



FRONT (AL18, AL25, AL30)



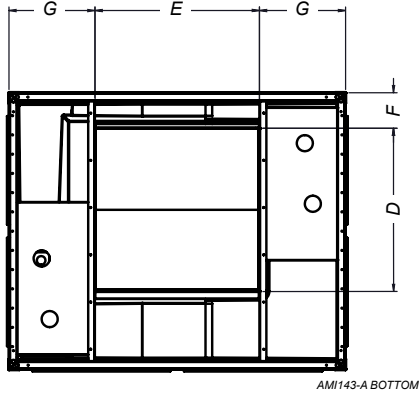
BOTTOM (AL18, AL25)



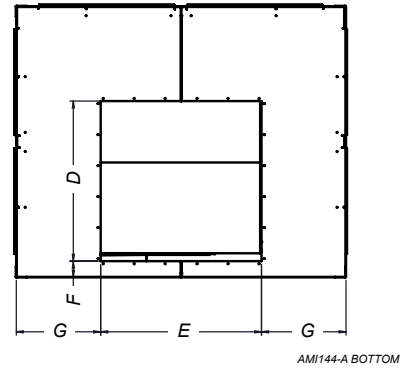
Dimensions are in mm.

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BOTTOM (AL18, AL25, AL30) DOWN DISCHARGE



BOTTOM (AL18, AL25, AL30) TOP DISCHARGE

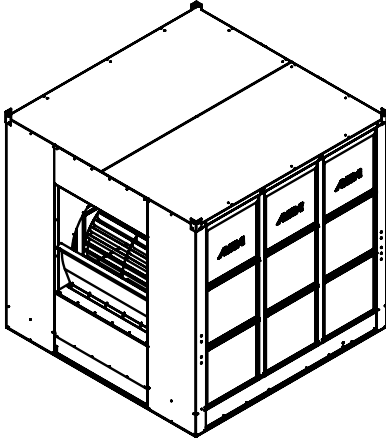


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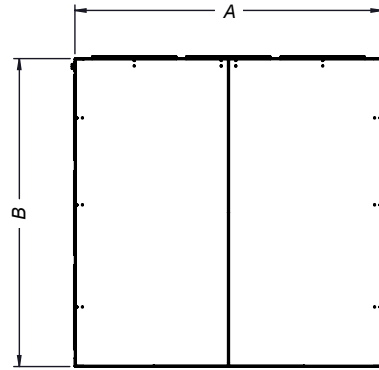
AL SERIES COOLERS

TOP (AL36)

ISOMETRIC (AL36)



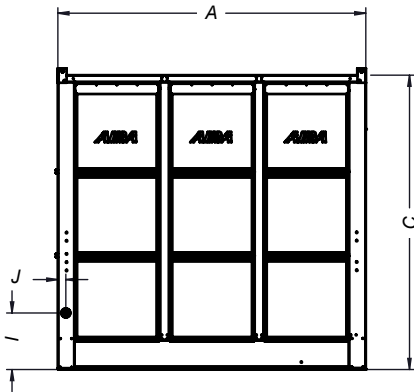
AMI145-A ISO



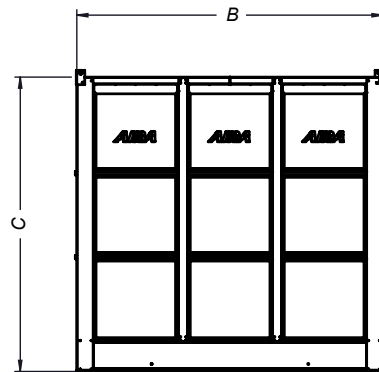
AMI145-A TOP

REAR (AL36)

SIDE (AL36)



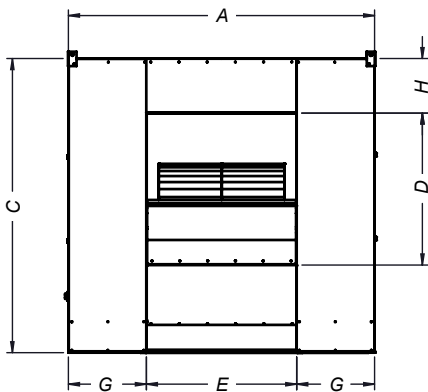
AMI145-A REAR



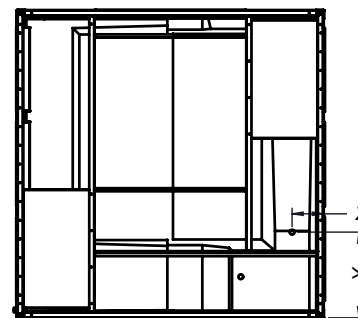
AMI145-A SIDE

FRONT (AL36)

BOTTOM (AL36)



AMI145-A FRONT



AMI145-A BOTTOM

Dimensions are in mm.

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COOLER DIMENSIONS (AL18, AL25, AL30, AL36)

DIM	AL18	AL25	AL30	AL36
A	990	1550	1890	2230
B	990	1550	1550	2240
C	1250	1570	1920	2135
D	500	795	920	1090
E	545	795	920	1090
F	135	195	195	200
G	222	377	483	570
H	270	160	200	395
I	440	440	440	440
J	70	70	70	70

DRAIN LOCATION DIMENSIONS (AL18, AL25, AL30, AL36)

Model	AL18	AL25	AL30	AL36
X	150	200	240	N/A
Y	500	650	650	650
Z	N/A	N/A	N/A	315

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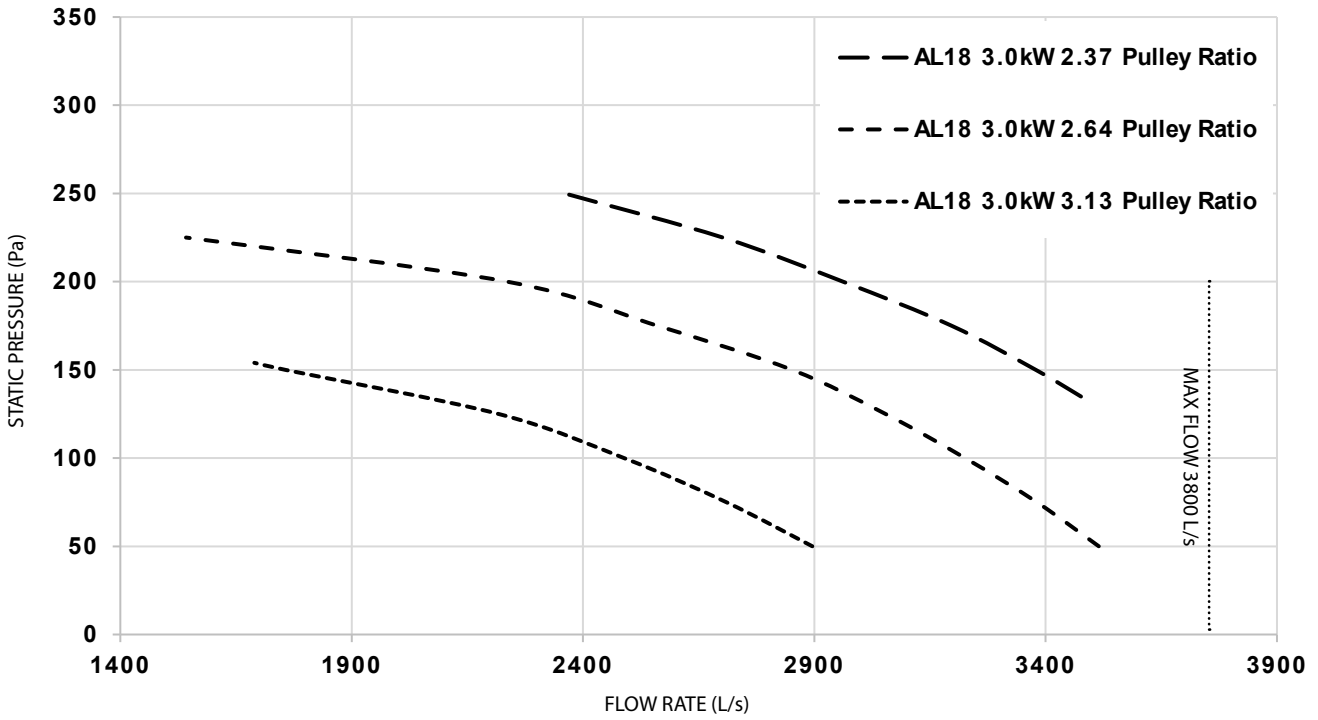
MODEL:			AL18	AL25	AL30	AL36	
COOLING PERFORMANCE	Max Airflow @ 2.5m/s across pads	(L/s)	4650	10100	14450	22650	
	Max Airflow @ 2.0m/s across pads	(L/s)	3800	8400	12000	18100	
SERVICES	Electrical Supply	Voltage V/Ph/Hz	415/3/50	415/3/50	415/3/50	415/3/50	
		Max Power	3.2	5.7	7.7	15.2	
	Water Supply	Supply	20 L/min @ 100 - 800 kPa	20 L/min @ 100 - 800 kPa	20 L/min @ 100 - 800 kPa	20 L/min @ 100 - 800 kPa	
		Max Temp	40 °C	40 °C	40 °C	40 °C	
		Inlet	1/2" (15mm) Male BSP	1/2" (15mm) Male BSP	1/2" (15mm) Male BSP	1/2" (15mm) Male BSP	
	Drain	1 1/2" (40mm) Male BSP	1 1/2" (40mm) Male BSP	1 1/2" (40mm) Male BSP	1 1/2" (40mm) Male BSP		
Duct Connections	Orientation	Side, Top and Down Discharge	Side, Top and Down Discharge	Side, Top and Down Discharge	Side, Top and Down Discharge		
CONTROLLER	Type	Standard	Wall Switch	Wall Switch	Wall Switch	Wall Switch	
FAN	Type		Blower	Blower	Blower	Blower	
	Diameter	Inch	18	25	30	36	
	Capacity		High	High	High	High	
MOTOR	Type		3 Phase	3 Phase	3 Phase	3 Phase	
	Speed	RPM	1440	1440	1440	1440	
	Output*	(kW)	3.0	5.5	7.5	15.0*	
	Rated	(A)	6.41	11.2	14.6	27.4	
	Rating	IP	55	55	55	55	
PUMP	Type		Centrifugal	Centrifugal	Centrifugal	Centrifugal	
	Motor		Synchronous	Synchronous	Synchronous	Synchronous	
	Power	(W)	30	30	30	30	
	Max Flow Rate	(L/min)	21	21	21	21	
	Voltage	V/Ph/Hz	230/1/50	230/1/50	230/1/50	230/1/50	
COOLINGPADS	Rating		IPX4	IPX4	IPX4	IPX4	
	Size	(mm)	700 x 900 (3 Pads)	575 x 1175 (6 Pads)	575 x 1530 (4 Pads) 745 x 1530 (2 Pads)	575 x 1750 (9 Pads)	
DIMENSIONS	Pad Area	(m <sup>2</sup> )	1.89	4.05	5.80	9.06	
	Shipping	(mm)	1250 Length 1200 Width 1400 Height	1700 Length 1650 Width 1745 Height	2500 Length 1800 Width 2060 Height	2300 Length 2300 Width 2275 Height	
		Operating inc. Acc	(mm)	990 Length 990 Width 1250 Height	1550 Length 1550 Width 1570 Height	1890 Length 1550 Width 1920 Height	2230 Length 2240 Width 2135 Height
		Service Clearance All Sides	(mm)	1200	1200	1200	1200
WEIGHT	Shipping	(kg)	150	335	410	685	
	Operating inc. Water / Acc	(kg)	159	353	434	738	

\*Motor power may change dependant on required airflow and pressure.

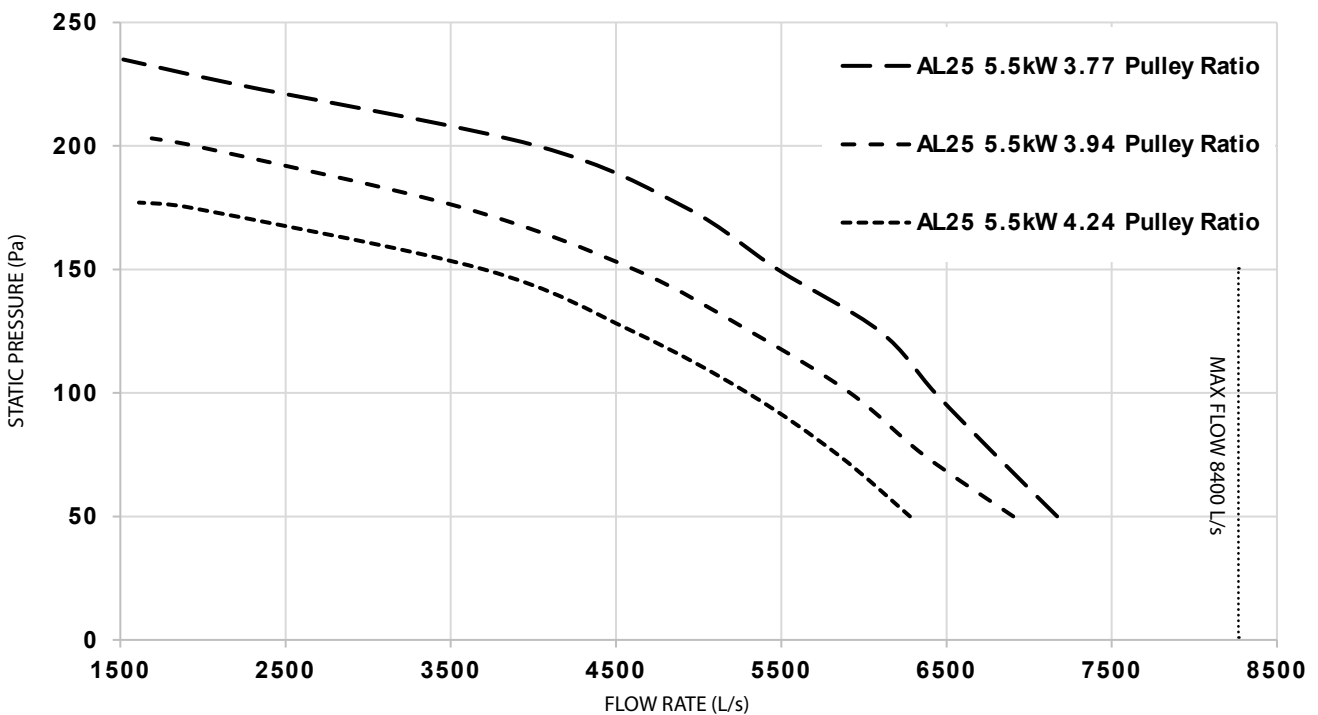


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FAN CURVES AL18

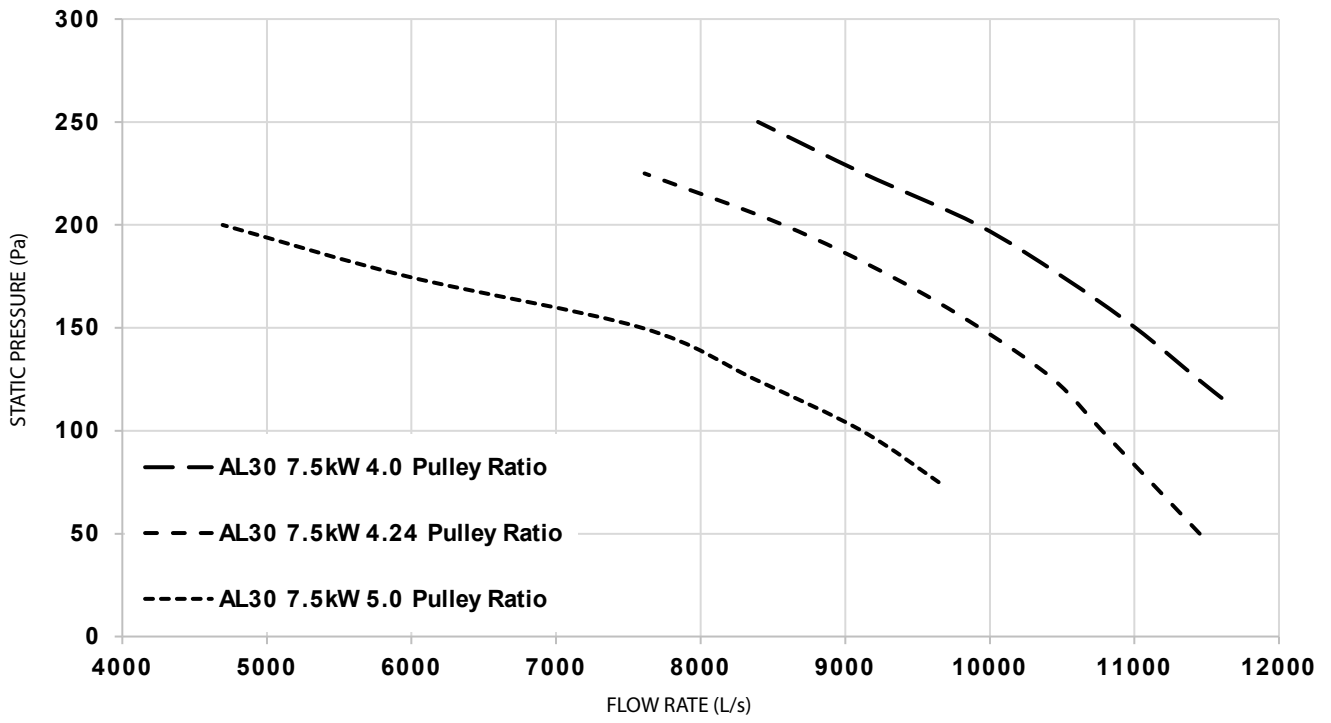


FAN CURVES AL25



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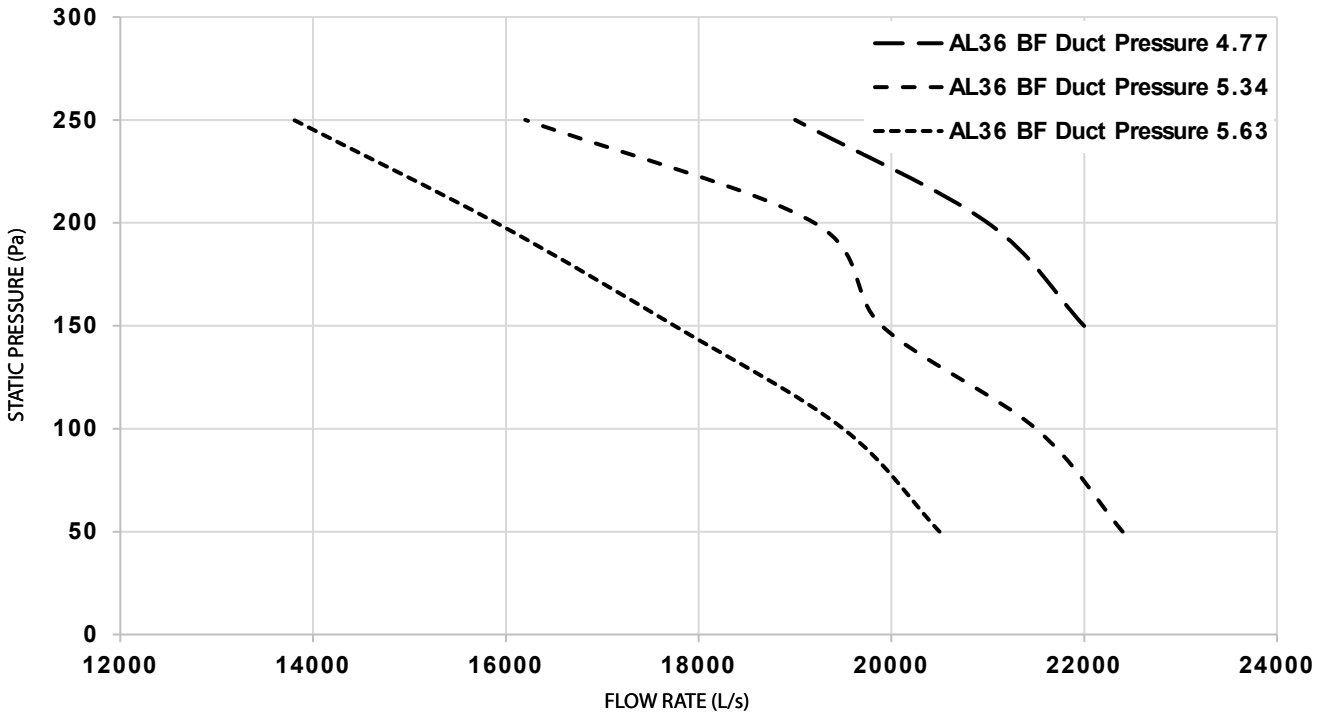
FAN CURVES AL30



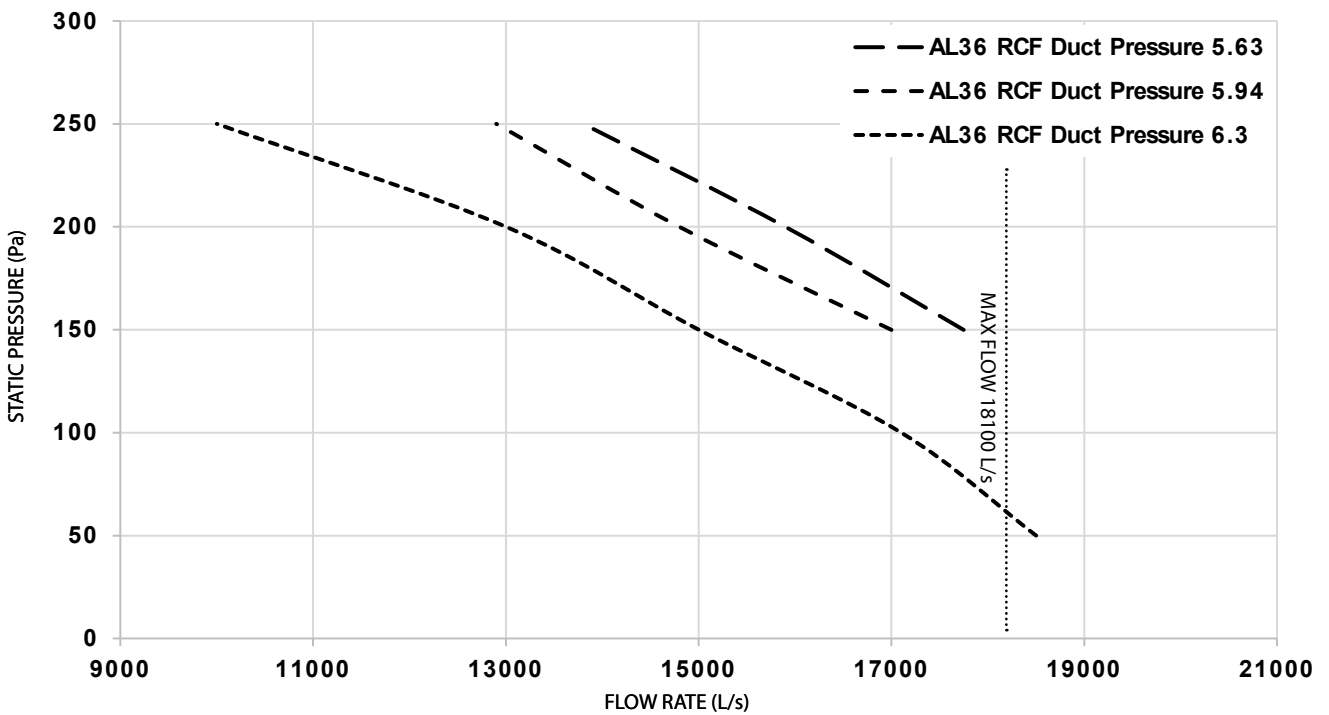


TECHNICAL SPECIFICATIONS - AL SERIES OR MODELS EVAPORATIVE COOLERS

FAN CURVES AL36 (BEST FLOW)



FAN CURVES AL36 (RECOMMENDED COOLING FLOW)



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