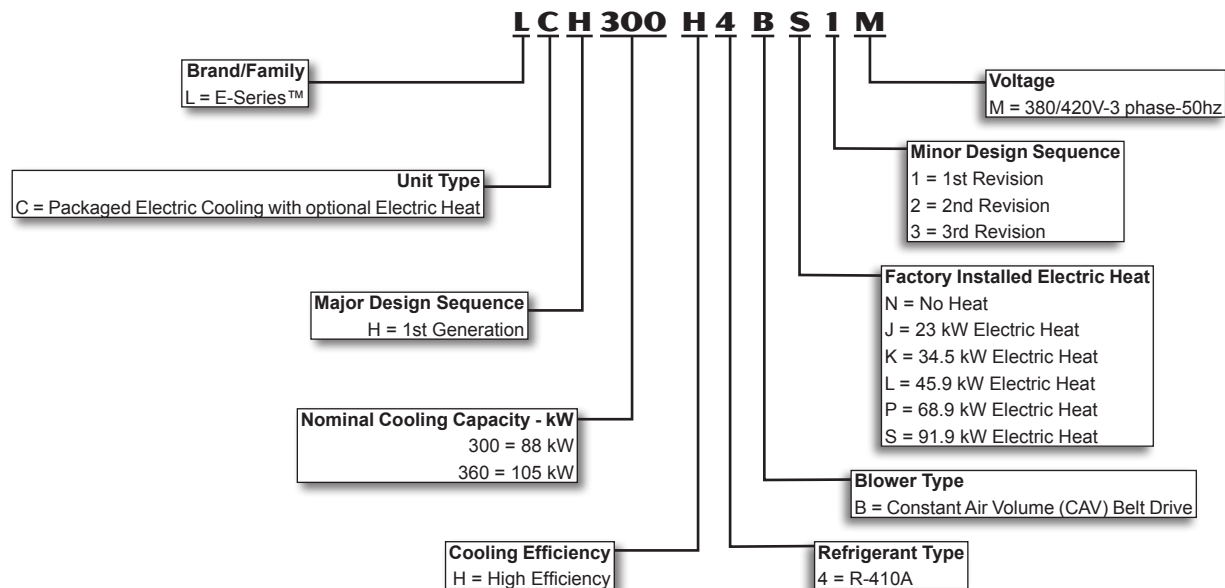


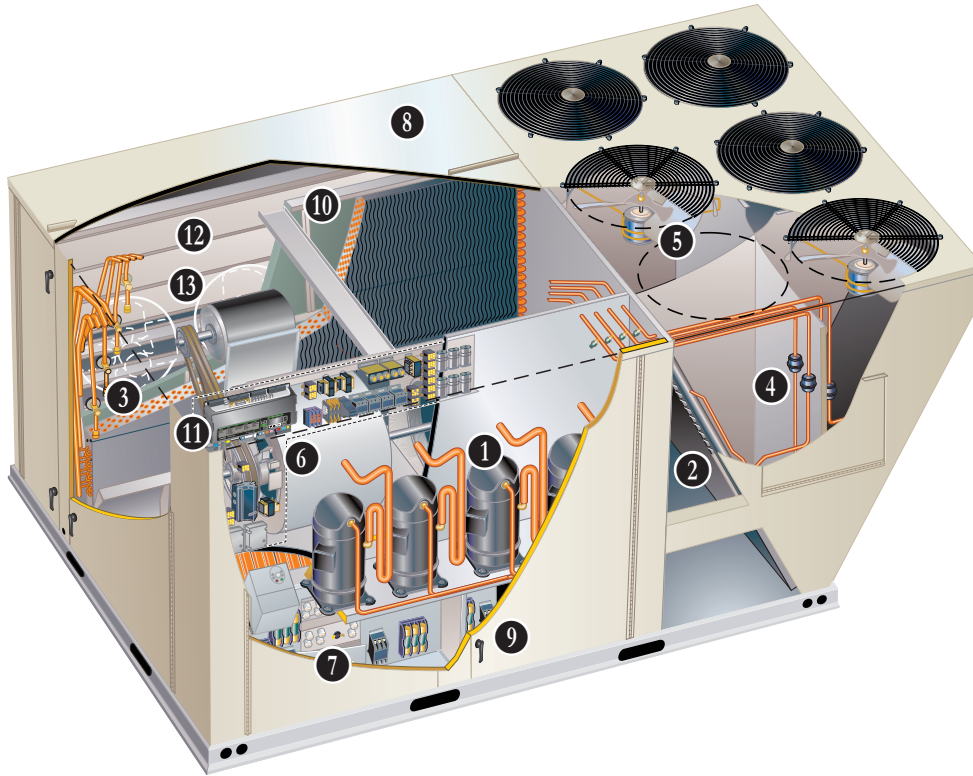


**88 to 105 kW (25 to 30 Tons)**  
**Net Cooling Capacity – 74.4 to 88.5 kW (254 000 to 302 000 Btuh)**  
**Optional Electric Heat - 23 to 91.9 kW**

## MODEL NUMBER IDENTIFICATION



## FEATURES AND BENEFITS



E-Series™ packaged rooftop unit product line was created to save energy with intelligence by offering some of the highest energy efficiency ratings available with a powerful, easy to use unit controller.

This makes rooftop units perfect for business owners looking for an Heating/Ventilation/Air Conditioning (HVAC) product with the lowest total cost of ownership. rooftop units feature:

- **Hinged Access Panels** - Provides quick access to components and protect panels and roof from damage during servicing.
- **Isolated Compressor Compartment** - Allows performance check during normal compressor operation without disrupting airflow.
- **Corrosion-Resistant Removable Drain Pan** - End or bottom drain connection capability. Provides application flexibility, durability and improved serviceability.
- **Thermostatic Expansion Valves** - Provides peak cooling performance across the entire application range.
- **Scroll Compressors** - Standard on all units for reliable, long-term operation.
- **Eco-last™ Coil System** - Smaller, lighter condenser coil.
- **Constant Air Volume (CAV) Blower** - Allows constant air delivery.
- **Auto-Tensioner for Blower Belt** - Factory option ensures blower is delivering the proper airflow for comfort, while maximizing efficiency and belt life.
- **MERV 13 (Minimum Efficiency Reporting Value) Filters** - Available as factory or field option, provides an enhanced level of indoor air quality (IAQ).
- **Foil-Faced Insulation** - Insulation on all internal surfaces that have contact with airflow helps minimize airborne fibers and improve indoor air quality (IAQ).
- **Common Components** - Many maintenance items are standard throughout the entire product line, reducing the need to carry different parts to the job or maintain in inventory.

### Intelli-guide™ Control System

Standard on every E-Series™ rooftop unit, the new Intelli-guide™ unit controller is the heart of the Allied controls offering. The intuitive user interface makes setup, troubleshooting and service easier than ever. Each unit tracks the runtime of every major component and records the date and time when service or maintenance is performed.



### WireRight™ System

The **WireRight™** system simplifies field sensor or thermostat installation through advanced connectors that are keyed and color-coded to help prevent miswiring. Not only is the wire coloring scheme standardized across all models, each connection is intuitively labeled to make troubleshooting and servicing quick and easy.

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### PERFORMANCE/QUALITY

Components bonded for grounding to meet safety standards for servicing required by Underwriters Laboratories (UL) and the International Electrotechnical Commission (IEC).

Cooling performance is rated at test conditions included in Air-Conditioning, Heating and Refrigeration (AHRI) Standard 340/360-2007 while operating at rated voltage and air volumes. International Organization for Standardization (ISO) 9001

Registered Manufacturing Quality System.

### COOLING SYSTEM

Designed to maximize sensible and latent cooling performance at design conditions.

System can operate from  $-18^{\circ}\text{C}$  to  $52^{\circ}\text{C}$  without any additional controls.

#### R-410A Refrigerant

Non-chlorine, ozone friendly, R-410A.

Unit pre-charged with refrigerant. See Specification table.

#### 1 Scroll Compressors

Scroll compressors on all models for high performance, reliability and quiet operation.

Resiliently mounted on rubber grommets for quiet operation.

#### Compressor Crankcase Heaters

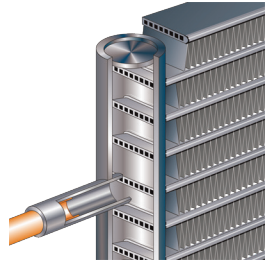
Protects against refrigerant migration that can occur during low ambient operation.

#### 2 Eco-last™ Coil System

Condenser coil features lightweight, all aluminum brazed fin construction.

Constructed of three components:

a flat extrusion tube, fins in-between the flat extrusion tube and two refrigerant manifolds.



#### Eco-last™ Coil System Features:

- Improved heat transfer performance due to high primary surface area (flat tubes) versus secondary surface (fins).
- Smaller internal volume (reduced refrigerant charge).
- High durability (all aluminum construction).
- Fewer brazed joints.
- Compact design (reduces unit weight).
- Easy maintenance/cleaning.

Face split design.

Mounting brackets with rubber inserts secure coil to unit providing vibration dampening and corrosion protection.

Angled design in cabinet helps protect coil from possible contact or hail damage.

#### Evaporator Coil

Copper tube construction, enhanced rippled-edge aluminum fins, flared shoulder tubing connections, silver-soldered construction for improved heat transfer. Factory leak tested. Cross row circuiting with rifled tubing optimizes both sensible and latent cooling capacity. Low fin per inch count minimizes air pressure drop.

All models have face-split evaporator coils designed to keep condensate water off of an inactive part of the coil so the condensate will not re-enter the air stream.

## FEATURES AND BENEFITS

### **COOLING SYSTEM** **(continued)**

- 3 **Thermal Expansion Valves**  
Assures optimal performance throughout the application range.  
Removable element head.

- 4 **Filter/Driers**  
High capacity filter/drier protects the system from dirt and moisture.

**High Pressure Switches**  
Protects the compressors from overload conditions such as dirty condenser coils, blocked refrigerant flow, or loss of outdoor fan operation. Automatic reset.

**Low Pressure Switches**  
Protects the compressors from low pressure conditions such as low refrigerant charge, or low/no airflow.

**Condensate Drain Pan**  
Plastic, sloped drain pan.  
Side drain connections.

Stainless steel drain pan available as a factory installed option.

**Freezestats**  
Protects the evaporator coil from damaging ice build-up due to conditions such as low/no airflow, or low refrigerant charge.

- 5 **Outdoor Coil Fan Motors**  
Thermal overload protected, totally enclosed, permanently lubricated ball bearings, shaft up, wire basket mount.

**Outdoor Coil Fans**  
Polyvinyl chloride (PVC) coated fan guard furnished.

### **Required Selections**

**Cooling Capacity**  
Specify nominal cooling capacity of the unit.

### **Options/Accessories**

#### **Factory Installed**

**Discharge Air Temperature Sensor**  
Sensor sends information to the unit controller to cycle up to 2 stages of heating or 4 stages of cooling to maintain the discharge air setpoints for heating or cooling. Optional for units with single zone or bypass zoning control. Sensor is shipped with the unit for remote field installation in the supply duct.

#### **Factory or Field Installed**

**Condensate Drain Trap**  
Field installed only, may be factory enclosed to ship with unit.  
Available in copper or Polyvinyl chloride (PVC).

**Drain Pan Overflow Switch**  
Monitors condensate level in drain pan, shuts down unit if drain becomes clogged.

**Stainless Steel Drain Pan**  
Non-corrosive drain pan.

### **6 BLOWER**

A wide selection of supply air blower options are available to meet a variety of airflow requirements.

#### **Motor**

Overload protected, equipped with ball bearings.

Belt drive motors are offered on all models and are available in several different sizes to maximize air performance.

#### **Supply Air Blower**

Forward curved blades, double inlet, blower wheel is statically and dynamically balanced. Belt drive motors with adjustable pulley for speed change.

Blower assembly slides out of unit for servicing.

Grease fittings furnished.

### **Required Selections**

Specify motor output and drive kit number when base unit is ordered, see Drive Kit Specifications tables.  
Order one drive kit, see Drive Kit Specifications Table.

### **Options/Accessories**

#### **Factory Installed**

#### **Blower Belt Auto-Tensioner**

Provides proper tension to belt drive blower belt without the need for regular adjustments. Maintains airflow and proper performance.

#### **Field Installed**

#### **Supply Static Limit Switch**

Field installed manual reset switch for supply static high pressure limit. Prevents exceeding pressure limit in supply air duct. Optional Mounting Kit includes tubing and adaptors.

## FEATURES AND BENEFITS

### **ELECTRICAL**

All units include terminal block and fuse block in power entry junction box for single power entry application.

#### **WireRight System**

Advanced wiring connectors are keyed and color-coded to prevent miswiring. Wire coloring scheme is standardized across all models. Each connection is intuitively labeled to make troubleshooting and servicing quick and easy.

### **Required Selections**

#### **Voltage Choice**

Specify when ordering base unit.

### **Options/Accessories**

#### **Factory or Field Installed**

#### **7 Electric Heat**

Electric heat is CE marked.

Helix wound nichrome elements, individual element limit controls, wiring harness. Unit fuse block is furnished as standard. See Options / Accessories tables for ordering information.

### **CABINET**

#### **8 Construction**

Heavy-gauge steel panels and full perimeter heavy-gauge galvanized steel base rail provides structural integrity for transportation, handling, and installation.

Base rails have rigging holes.

Three sides of the base rail have forklift slots.

Raised edges around duct and power entry openings in the bottom of the unit provide additional protection against water entering the building.

#### **Airflow Choice**

Units are available in downflow (vertical) or horizontal return air flow configuration.

Horizontal air flow requires Horizontal Roof Curb.

Horizontal Return Air Panel Kit is also required if converting a downflow configured unit to horizontal air flow.

#### **Power Entry**

Electrical lines can be brought through the unit base or through horizontal access knock-outs.

#### **Exterior Panels**

Constructed of heavy-gauge, galvanized steel with a two-layer enamel paint finish.

#### **Insulation**

All panels adjacent to conditioned air are fully insulated with non-hygroscopic fiberglass insulation.

Unit base is fully insulated. The insulation also serves as an air seal to the roof curb, eliminating the need to add a seal during installation.

#### **9 Hinged Access Panels**

Hinged tool-less access panels are provided for the filter section, the blower section and compressor/controls section.

All hinged panels have seals and quarter-turn latching handles to provide a tight air and water seal.

### **Options/Accessories**

#### **Factory Installed**

#### **Corrosion Protection**

A completely flexible immersed coating with an electrodeposited dry film process (AST ElectroFin E-Coat). Meets Mil Spec MIL-P-53084, ASTM B117 Standard Method Salt Spray Testing.

Indoor Corrosion Protection:

- Coated coil
- Painted blower housing
- Painted indoor base

Outdoor Corrosion Protection:

- Coated coil
- Painted outdoor base

#### **Field Installed**

#### **Combination Coil/Hail Guards**

Heavy gauge steel frame painted to match cabinet with expanded metal mesh to protect the outdoor coil from damage.

#### **Grille Guards**

Protects the space between outdoor coils and main cabinet.

#### **Horizontal Return Air Panel Kit**

Required for horizontal applications with Horizontal Roof Curb, contains panel with return air opening for field replacement of existing unit panel and panel to cover bottom return air opening in unit, see dimension drawings.

### **INDOOR AIR QUALITY**

#### **10 Air Filters**

Disposable 51 mm filters furnished as standard.

### **Options/Accessories**

#### **Factory or Field Installed**

#### **High Efficiency Air Filters**

Disposable MERV 8 or MERV 13 (Minimum Efficiency Reporting Value based on ASHRAE 52.2) efficiency 51 mm pleated filters.

#### **Replacement Filter Media Kit With Frame**

Replaces existing pleated filter media. Includes washable metal mesh screen and metal frame with clip for holding replaceable non-pleated filter.

#### **Field Installed**

#### **Indoor Air Quality (CO<sub>2</sub>) Sensors**

Monitors CO<sub>2</sub> levels, reports to the Intelli-guide™ Unit Controller, which adjusts economizer dampers as needed.



## 11 INTELLI-GUIDE™ UNIT CONTROLLER



The Intelli-Guide™ unit controller is a microprocessor-based controller that provides flexible control of all unit functions.

### Features:

**LCD Display** - Easy to read menu with buttons for menu navigation. during setup and diagnostics. 4 lines x 20 character display.

**Menu LEDs** - Four LEDs (*Data, Setup, Service, Settings*) aid in menu navigation.

**Main Menu and Help Buttons** - Quick navigation to home screen and built-in help functions.

**Scroll, Value Adjustment Select and Save Buttons**

**Simplified Setup Procedure** - SETUP menu insures proper installation and setup of the rooftop unit.

**Profile Setup** - Copy key settings between units with the same configuration greatly reducing setup time.

**USB Port** - Allows a technician to download and transfer unit information to help verify service was performed.

USB drive will also allow updating software on the Intelli-Guide Control System to obtain enhanced functionality without the need to change components.



### Unit Controller Software

**Unit Self-Test** - Unit Controller can perform a rooftop unit self-test to verify individual critical component and system performance. Included is an economizer test function that helps assure the economizer is operating correctly.

**Time Clock with Run-time Information**

### Built-In Functions Include:

**Adjustable Blower On/Off Delay**

**Built-in Control Parameter Defaults**

**Compressor Time-Off Delay**

**DDC Compatible**

**Dirty Filter Switch Input**

**Discharge Air Temperature Control**

**Display/Sensor Readout**

**Economizer Control Options** -

See Economizer / Outdoor Air / Exhaust Options.

**Fresh Air Tempering**

**Extensive Unit Diagnostics** -

Over 100 diagnostic and status messages in English.

**Exhaust Fan Control Modes** -

Fresh air damper position, differential pressure transducer or pressure switches.

**Permanent Diagnostic Code Storage**

**Field Adjustable Control**

**Parameters** - Over 200 different control settings.

**Indoor Air Quality Input** -

Demand Control Ventilation ready

**Low Ambient Controls** - Cooling operation down to -18°C.

**Gas Valve Time Delay Between First and Second Stage**

**Minimum Compressor Run Time**

**Network Capable** - Can be daisy chained to other units or controls.

**Night Setback Mode**

**Return Air Temperature Limit Control**

**Safety Switch Input** - Allows Controller to respond to a external safety switch trip.

**Service Relay Output**

**Smoke Alarm Mode** - Four choices (unit off, positive pressure, negative pressure, purge).

**Staging** - Up to 2 heat/2 cool (standard Intelli-Guide unit controller thermostat input). Up to 3 cool with additional relay. Up to 4 cool with room sensor or network operation.

**“Strike Three” Protection**

**Gas Reheat Control** -

Simultaneous heating and cooling operation for controlling humidity for process air applications such as supermarkets.

**On Demand Dehumidification** -

Monitors and controls condenser hot gas reheat operation with Dehumidification option.

**Thermostat Bounce Delay**

**Warm Up Mode Delay**

**LED Indicators**

**PC Interface** - Connect to the Intelli-Guide unit controller from a PC with the Unit Controller Software.

**Room Sensor Operation** -

Controls temperature.

## Controls Options

### Factory or Field Installed

#### Fresh Air Tempering

Used in applications with high outside air requirements. The Controller energizes the first stage heat as needed to maintain a minimum supply air temperature for comfort, regardless of the thermostat demand. When ordered as a factory option, the sensor ships with the unit but must be field installed.

#### Smoke Detector

Photoelectric type, installed in supply air section, return air section or both sections. Available with power board and single sensor (supply or return) or power board and two sensors (supply and return). Power board located in unit control compartment.

### Interoperability via BACnet® or LonTalk® Protocols

Communication compatible with third-party automation systems that support the BACnet Application Specific Controller device profile, LonMark® Space Comfort Controller functional profile, or LonMark Discharge Air Controller functional profile.

NOTE - Intelli-Guide™ Control System features shown vary with the type of rooftop unit the control is installed in.

### 12 **ECONOMIZER OPTIONS**

Economizer operation is set and controlled by the Intelli-guide™ Unit Controller.

Simple plug-in connections from economizer to unit controller for easy installation.

Optional sensors may be used instead of unit sensors to determine whether outdoor air is suitable for free cooling. See Options/Accessories table.

#### **Factory or Field Installed**

##### **Economizer Features**

Outdoor air hoods for economizer dampers furnished.

Outdoor Air Hood is included when economizer is factory installed and is furnished with economizer when ordered for field installation.

##### **High Performance**

##### **Economizer Features**

Gear-driven action, high torque 24-volt fully-modulating spring return damper motor, return air and outdoor air dampers, plug-in connections to unit, stainless steel bearings, enhanced neoprene blade edge seals and flexible stainless steel jamb seals to minimize air leakage.

Refer to Installation Instructions for complete setup information.

Low leakage dampers are Air Movement and Control Association International (AMCA) Class 1A Certified - Maximum 3 CFM per sq. ft. leakage at 1 in. w.g.

##### **Differential Sensible Control**

Factory setting. Uses outdoor air and return air sensors that are furnished with the unit. The Intelli-guide Unit Controller compares outdoor air and return air and using setpoints, enables the economizer when the outdoor air temperature is below the configured setpoint and cooler than return air.

*NOTE - Differential Sensible Control can be configured in the field to provide Offset Differential Sensible Control or Single Sensible Control.*

*In Offset Differential Sensible Control mode, the economizer is enabled if the temperature differential (offset) between outdoor air and return air reaches the configured setpoint.*

*In Single Sensible Control mode, the economizer is enabled when outdoor air temperature falls below the configured setpoint.*

*NOTE: The Free Cooling default setting for outdoor air temperature sensor is 13°C.*

##### **Global Control**

The unit controller communicates with a DDC system with one global sensor (enthalpy or sensible) to determine whether outside air is suitable for free cooling on all units connected to the control system. Sensor must be field provided.

#### **Factory or Field Installed**

##### **Single Enthalpy Temperature Control**

Outdoor air enthalpy sensor enables Economizer if the outdoor enthalpy is less than the setpoint of the control.

##### **Differential Enthalpy Control**

Order two Single Enthalpy Controls. One is field installed in the return air section, the other in the outdoor air section. Allows the economizer control to select between outdoor air or return air, whichever has lower enthalpy.

## OPTIONS / ACCESSORIES

### EXHAUST OPTIONS

#### 13 Downflow Barometric Relief Dampers

Allow relief of excess air, aluminum blade dampers prevent blow back and outdoor air infiltration during off cycle, bird screen furnished.

Hood for downflow barometric relief dampers is factory installed when dampers are factory installed with economizer. Hood is furnished with dampers when ordered for field installation.

#### Factory or Field Installed

##### Standard Static Power Exhaust Fans

Three, 0.25 kW motors with 508 mm, five blade propeller-type fans with a total power input of 1125 W and a total air volume of 6040 L/s at 0 Pa.

Motor is inherently protected and enclosed for maximum protection from weather, dust and corrosion. Installs internal to unit for downflow applications only with economizer option, provides exhaust air pressure relief, interlocked to run when return air dampers are closed and supply air blower is operating, fan runs when outdoor air dampers are 50% open (adjustable), motor is overload protected, steel cabinet and hood painted to match unit, requires optional Downflow Economizer Barometric Relief Dampers. See Standard Static Power Exhaust Blower Tables.

##### Horizontal Barometric Relief Dampers

For use when unit is configured for horizontal applications requiring an economizer.

Allows relief of excess air.

Aluminum blade dampers prevent blow back and outdoor air infiltration during off cycle.

Field installed in return air duct.

Bird screen and hood furnished.

Horizontal Economizer Conversion kit is available for field installation.

### OUTDOOR AIR OPTIONS

#### Factory or Field Installed

##### Outdoor Air Damper - Downflow or Horizontal With Air Hood

Linked mechanical dampers, 0 to 25% (fixed) outdoor air adjustable, installs in unit. Includes outdoor air hood.

Automatic model features fully modulating spring return damper motor with plug-in connection.

Manual model features parallel blade, gear-driven dampers with adjustable fixed position.

Minimum mixed air temperature in heating mode is -1°C. Maximum mixed air temperature in cooling mode is 32°C.

### ROOF CURBS

Nailer strip furnished, mates to unit, US National Roofing Contractors Approved, shipped knocked down.

#### Downflow

##### Hybrid Roof Curbs

Roof curb can be assembled using interlocking tabs to fasten corners together. No tools required.

Curb can also be fastened together with furnished hardware.

Available in 356, 457, and 610 mm heights.

See Options/Accessories table.

#### Horizontal

Converts unit from downflow to horizontal (side) air flow, return air is on unit, supply air is on curb, see dimension drawings.

Requires Horizontal Return Air Panel Kit.

Available in 940 mm and 1041 mm heights.

Optional Insulation Kit is available to help prevent sweating.

### CEILING DIFFUSERS

#### Ceiling Diffusers (Flush or Step-Down)

Aluminum grilles, large center grille, insulated diffuser box with flanges, hanging rings furnished, interior transition (even air flow), internally sealed (prevents recirculation), adapts to T-bar ceiling grids or plaster ceilings.

#### Transitions (Supply and Return)

Used with diffusers, installs in roof curb, galvanized steel construction, flanges furnished for duct connection to diffusers, fully insulated.



## OPTIONS / ACCESSORIES

Item Description	Model Number	Catalog Number	Unit Model No	
			300	360
COOLING SYSTEM				
Condensate Drain Trap	Polyvinyl chloride (PVC) - C1TRAP20AD2	76M26	OX	OX
	Copper - C1TRAP10AD2	76W27	OX	OX
Corrosion Protection		Factory	O	O
Drain Pan Overflow Switch	E1SNSR71AD1	68W88	OX	OX
Efficiency	High	Factory	O	O
Refrigerant Type	R-410A	Factory	O	O
Plastic Condensate Drain Pan		Factory	O	O
Stainless Steel Condensate Drain Pan	C1DPAN10D-1-	83W42	OX	OX
BLOWER - SUPPLY AIR				
Motors	Belt Drive - 3.7 kW	Factory	O	O
	Belt Drive - 5.6 kW	Factory	O	O
	Belt Drive - 7.5 kW	Factory	O	O
Drive Kits See Blower Data Tables for usage and selection	Kit #1 615-745 rev/min	Factory	O	O
	Kit #2 725-870 rev/min	Factory	O	O
	Kit #3 595-730 rev/min	Factory	O	O
	Kit #4 640-805 rev/min	Factory	O	O
	Kit #5 550-675 rev/min	Factory	O	O
	Kit #6 640-805 rev/min	Factory	O	O
	Kit #7 475-600 rev/min	Factory	O	O
	Kit #8 400-525 rev/min	Factory	O	
	Blower Belt Auto-Tensioner	Factory	O	O
CABINET				
Combination Coil/Hail Guards	C1GARD52D-1	13T16	X	X
Grille Guards	C1GARD39D-1-	86K30	X	X
Horizontal Return Air Panel Kit		38K48	X	X
CONTROLS				
Blower Proving Switch	C1SNSR35FF1	53W65	OX	OX
	Intelli-guide™ Control System - BACnet® Module - C0CTRL60AE1L	59W51	OX	OX
	Intelli-guide™ Control System - LonTalk® Module - C0CTRL65FF1	54W27	OX	OX
	Novar® LSE	Factory	O	O
Dirty Filter Switch	E1SNSR55C-1	53W68	OX	OX
Discharge Air Temperature Sensor		Factory	O	O
Fresh Air Tempering	C1SNSR75AD1	58W63	OX	OX
Smoke Detector - Supply or Return (Power board and one sensor)	C1SNSR44C-1	83W40	OX	OX
Smoke Detector - Supply and Return (Power board and two sensors)	C1SNSR43C-1	83W41	OX	OX
Supply Static Limit Switch	C0SNSR11AE1	79M80	X	X
Supply Static Limit Switch - Mounting Kit	C0SNSR12AE1	79M81	X	X
Supply Static Transducer	C0SNSR20AE1	78M19	X	X

NOTE - Catalog and model numbers shown are for ordering field installed accessories.

OX - Configure To Order (Factory Installed) or Field Installed

O = Configure To Order (Factory Installed)

X = Field Installed

## OPTIONS / ACCESSORIES

Item Description	Model Number	Catalog Number	Unit Model No	
			300	360
INDOOR AIR QUALITY				
Air Filters				
High Efficiency Air Filters 508 x 508 x 51 mm - order 12 per unit	MERV 8 - C1FLTR15D-1-	54W21	OX	OX
	MERV 13 - C1FLTR40D-1-	52W39	OX	OX
Replaceable Media Filter with Metal Mesh Frame (includes Non-Pleated Filter Media) 508 x 508 x 51 mm - order 12 per unit	C1FLTR30D-1-	44N60	X	X
Indoor Air Quality (CO <sub>2</sub> ) Sensors				
Sensor - Wall-mount, off-white plastic cover with LCD display	C0SNSR50AE1L	77N39	X	X
Sensor - Wall-mount, off-white plastic cover, no display	C0SNSR52AE1L	87N53	X	X
Sensor - Black plastic case with LCD display, rated for plenum mounting	C0SNSR51AE1L	87N52	X	X
Sensor - Wall-mount, black plastic case, no display, rated for plenum mounting	C0MISC19AE1	87N54	X	X
CO <sub>2</sub> Sensor Duct Mounting Kit - for downflow applications	C0MISC19AE1-	85L43	X	X
Aspiration Box - for duct mounting non-plenum rated CO <sub>2</sub> sensors (87N53 or 77N39)	C0MISC16AE1-	90N43	X	X
ELECTRICAL				
Voltage 50 hz with neutral	380/420V - 3 phase	Factory	O	O
ELECTRIC HEAT				
23 kW	380/420V-3ph - C1EH0230C21M	67W98	OX	OX
34.5 kW	380/420V-3ph - C1EH0345C21M	68W00	OX	OX
45.9 kW	380/420V-3ph - C1EH0459C21M	68W02	OX	OX
68.9 kW	380/420V-3ph - C1EH0689C-1M	68W03	OX	OX
91.9 kW	380/420V-3ph - E1EH0900D-1M	74W01	OX	OX
ECONOMIZER				
High Performance Economizer				
High Performance Economizer Downflow or Horizontal Applications - Includes Outdoor Air Hood. Order Downflow or Horizontal Barometric Relief Dampers separately.	E1ECON17D-2	18X87	OX	OX
Economizer Controls				
Differential Enthalpy	Order 2 - C1SNSR64FF1	53W64	OX	OX
Sensible Control	Sensor is Furnished	Factory	O	O
Single Enthalpy	C1SNSR64FF1	53W64	OX	OX
Global, Enthalpy	Sensor Field Provided	Factory	O	O
Differential Sensible	Sensor is Furnished	Factory	O	O
Barometric Relief Dampers With Exhaust Hood				
Downflow Barometric Relief Dampers	E1DAMP60D-1	76W17	OX	OX
Horizontal Barometric Relief Dampers	LAGEDH30/36	33K78	OX	OX
OUTDOOR AIR				
Outdoor Air Dampers With Outdoor Air Hood				
Motorized	E1DAMP25D-2-	18X89	OX	OX
Manual	E1DAMP15D-2-	18X88	OX	OX

NOTE - Catalog and model numbers shown are for ordering field installed accessories.

OX - Configure To Order (Factory Installed) or Field Installed

O = Configure To Order (Factory Installed)

X = Field Installed

## OPTIONS / ACCESSORIES

Item Description	Model Number	Catalog Number	Unit Model No	
			300	360
POWER EXHAUST				
Standard Static	380/420V - E1PWRE40D-1M	74W24	OX	OX
ROOF CURBS				
Hybrid Roof Curbs, Downflow				
356 mm height	C1CURB71D-1	11F62	X	X
457 mm height	C1CURB72D-1	11F63	X	X
610 mm height	C1CURB73D-1	11F64	X	X
Standard Roof Curbs, Horizontal - Requires Horizontal Air Panel Kit				
762 mm height - slab applications	C1CURB15C-1	11T90	X	X
1041 mm height - rooftop applications	C1CURB17C-1	11T97	X	X
Horizontal Return Air Panel Kit (Required)		38K48	X	X
Insulation Kit For Standard Horizontal Curbs				
	for C1CURB15C-1	73K33	X	X
	for C1CURB17C-1	73K35	X	X
CEILING DIFFUSERS				
Step-Down - Order one	LARTD30/36S	45K74	X	X
Flush - Order one	LAFD30/36S	45K75	X	X
Transitions (Supply and Return) - Order one	LASRT30/36	33K80	X	X

NOTE - Catalog and model numbers shown are for ordering field installed accessories.

OX - Configure To Order (Factory Installed) or Field Installed

O = Configure To Order (Factory Installed)

X = Field Installed

## SPECIFICATIONS

General Data		Nominal kW (Tons)	88 (25)	105 (30)
		Model Number	LCH300H4B	LCH360H4B
		Efficiency Type	High	High
		Blower Type	Constant Air Volume (CAV)	Constant Air Volume (CAV)
Cooling Performance	Gross Cooling Capacity - kW (Btuh)		76.8 (262 000)	92.0 (314 000)
	<sup>1</sup> Net Cooling Capacity - kW (Btuh)		74.4 (254 000)	88.5 (302 000)
	AHRI Rated Air Flow - L/s (cfm)		3825 (8100)	4530 (9600)
	Total Unit Power - kW		21.1	27.5
	<sup>1</sup> EER (Btuh/Watt) at 35°C (95°F)		12.0	11.0
	<sup>2</sup> EER (Btuh/Watt) at 46°C (115°F)		8.6	8.6
	<sup>1</sup> IEER (Btuh/Watt)		12.5	11.5
	Refrigerant Type		R-410A	R-410A
	Refrigerant Charge	Circuit 1	4.2 kg (9 lbs. 4 oz.)	4.1 kg (9 lbs. 0 oz.)
		Circuit 2	4.1 kg (9 lbs. 0 oz.)	3.6 kg (8 lbs. 0 oz.)
		Circuit 3	4.0 kg (8 lbs. 12 oz.)	4.1 kg (9 lbs. 0 oz.)
		Circuit 4	3.9 kg (8 lbs. 8 oz.)	3.4 kg (7 lbs. 8 oz.)
Electric Heat Available - See page 19				
Compressor Type (number)			Scroll (4)	Scroll (4)
Outdoor Coils	Net face area - m <sup>2</sup> (sq. ft.) total		6.3 (68.3)	6.3 (68.3)
	Number of rows		1	1
	Fins per m (Fins per inch)		906 (23)	906 (23)
Outdoor Coil Fans	Motor - (No.) W (hp)		(6) 249 (1/3)	(6) 249 (1/3)
	Motor rev/min		900	900
	Total Motor watts		1775	1775
	Diameter - mm (in.)		(6) 610 (24)	(6) 610 (24)
	Number of blades		3	3
	Total Air volume - L/s (cfm)		8450 (17 900)	8450 (17 900)
Indoor Coils	Net face area - m <sup>2</sup> (sq. ft.) total		2.9 (31.40)	2.9 (31.40)
	Tube diameter - mm (in.)		9.5 (3/8)	9.5 (3/8)
	Number of rows		4	4
	Fins per m (Fins per inch)		551 (14)	(551) 14
	Drain connection - No. and size		(1) 1 in. NPT	(1) 1 in. NPT
<sup>3</sup> Indoor Blower and Kit Selection	Expansion device type		Balance port Thermostatic Expansion Valve (TXV), removable head	
	Nominal motor output		3.7 kW (5 hp) - 5.6 kW (7.5 hp) - 7.5 kW (10 hp)	
	Maximum usable motor output		4.3 kW (5.75 hp) - 6.4 kW (8.63 hp) - 8.6 kW (11.5 hp)	
	Motor - Drive kit		3.7 kW (5 hp) Kit 5 - 550-675 rev/min Kit 6 - 640-805 rev/min Kit 7 - 475-600 rev/min Kit 8 - 400-525 rev/min	3.7 kW (5 hp) Kit 5 - 550-675 rev/min Kit 6 - 640-805 rev/min Kit 7 - 475-600 rev/min
			5.6 kW (7.5 hp) Kit 3 - 595-730 rev/min Kit 4 - 640-805 rev/min	5.6 kW (7.5 hp) Kit 3 - 595-730 rev/min Kit 4 - 640-805 rev/min
			7.5 kW (10 hp) Kit 1 - 615-745 rev/min Kit 2 - 725-870 rev/min	7.5 kW (10 hp) Kit 1 - 615-745 rev/min Kit 2 - 725-870 rev/min
	Blower wheel nominal diameter and width - mm (in.)		(2) 457 x 381 (18 x 15)	
Filters	Type of filter		Fiberglass, disposable	
	Number and size - mm (in.)		(12) 508 x 508 x 51 (20 x 20 x 2)	
Electrical characteristics			380/420V - 50 hertz - 3 phase with neutral (No neutral on CE marked models)	

NOTE - Net capacity includes evaporator blower motor heat deduction. Gross capacity does not include evaporator blower motor heat deduction.

<sup>1</sup> Tested at conditions based on AHRI Standard 340/360; 35°C (95°F) outdoor air temperature and 27°C (80°F) db/19°C (67°F) wb entering evaporator air; minimum external duct static pressure while operating at rated voltage and air volumes.

<sup>2</sup> Rated at 46°C (115°F) outdoor air temperature and 27°C (80°F) db/19°C (67°F) wb entering evaporator air (T3 Conditions).

<sup>3</sup> Using total air volume and system static pressure requirements determine from blower performance tables rev/min and motor output required. Maximum usable output of motors furnished are shown. See Belt Drive Specification Table for maximum usable motor output. If motors of comparable output are used, be sure to keep within the service factor limitations outlined on the motor nameplate.

## RATINGS

NOTE – For Temperatures and Capacities not shown in tables, see bulletin – Cooling Unit Rating Table Correction Factor Data in Miscellaneous Engineering Data section.

### 88 kW - LCH300H4 (1ST STAGE)

Entering Wet Bulb Temperature	Total Air Volume	Outdoor Air Temperature Entering Outdoor Coil																							
		18.3°C						23.9°C						29.4°C						35°C					
		Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)			Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)			Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)			Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)						
				Dry Bulb					Dry Bulb					Dry Bulb					Dry Bulb						
L/s	kW	kW	24°C	27°C	29°C	kW	kW	24°C	27°C	29°C	kW	kW	24°C	27°C	29°C	kW	kW	24°C	27°C	29°C					
17.2°C	3775	43.1	6.21	0.74	0.87	0.99	41.1	6.92	0.74	0.88	1	39	7.72	0.75	0.9	1	36.9	8.63	0.76	0.92	1				
	4720	45.2	6.31	0.79	0.95	1	43.2	7.01	0.79	0.96	1	41.1	7.81	0.81	0.98	1	39	8.73	0.83	1	1				
	5665	47.1	6.4	0.84	1	1	45.3	7.11	0.85	1	1	43.2	7.91	0.87	1	1	41.2	8.83	0.89	1	1				
19.4°C	3775	45.7	6.33	0.58	0.71	0.84	43.7	7.04	0.58	0.72	0.85	41.6	7.83	0.58	0.73	0.87	39.4	8.75	0.58	0.74	0.89				
	4720	47.9	6.43	0.61	0.77	0.92	45.7	7.13	0.62	0.78	0.93	43.5	7.92	0.62	0.79	0.95	41.2	8.83	0.63	0.8	0.97				
	5665	49.4	6.51	0.65	0.82	0.98	47.2	7.2	0.65	0.83	0.99	45	7.99	0.67	0.85	1	42.6	8.89	0.66	0.87	1				
21.7°C	3775	48.8	6.47	0.44	0.57	0.69	46.7	7.18	0.44	0.57	0.7	44.5	7.97	0.43	0.57	0.71	42.2	8.87	0.43	0.57	0.72				
	4720	50.9	6.58	0.45	0.6	0.75	48.7	7.28	0.45	0.61	0.76	46.5	8.06	0.44	0.61	0.77	44	8.97	0.44	0.62	0.78				
	5665	52.4	6.66	0.46	0.64	0.8	50.2	7.35	0.46	0.64	0.82	47.9	8.14	0.46	0.66	0.83	45.3	9.03	0.46	0.66	0.85				

### 88 kW - LCH300H4 (2ND STAGE)

Entering Wet Bulb Temperature	Total Air Volume	Outdoor Air Temperature Entering Outdoor Coil																							
		26.7°C						35°C						43.3°C						46°C					
		Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)			
				Dry Bulb						Dry Bulb						Dry Bulb						Dry Bulb			
				L/s	kW	kW	24°C			27°C	29°C	kW	kW			24°C	27°C	29°C	kW			kW	24°C	27°C	29°C
17.2°C	3775	77.6	14.59	0.76	0.91	1.00	71.7	17.27	0.77	0.93	1.00	64.9	20.63	0.79	0.97	1.00	62.5	21.88	0.81	0.99	1.00				
	4720	81.6	14.79	0.82	0.98	1.00	75.6	17.46	0.84	1.00	1.00	69.3	20.84	0.87	1.00	1.00	67.6	22.11	0.89	1.00	1.00				
	5665	85.8	14.99	0.87	1.00	1.00	79.9	17.68	0.90	1.00	1.00	73.2	21.02	0.94	1.00	1.00	71.2	22.26	0.96	1.00	1.00				
19.4°C	3775	82.9	14.85	0.59	0.74	0.88	76.7	17.51	0.59	0.75	0.90	69.5	20.84	0.60	0.77	0.93	66.9	22.05	0.61	0.80	0.92				
	4720	86.5	15.03	0.63	0.80	0.96	80.1	17.68	0.63	0.82	0.98	72.7	20.99	0.65	0.85	1.00	69.8	22.20	0.66	0.89	1.00				
	5665	89.4	15.17	0.67	0.86	1.00	82.6	17.80	0.68	0.88	1.00	75.0	21.12	0.70	0.92	1.00	72.2	22.32	0.71	0.96	1.00				
21.7°C	3775	88.3	15.12	0.44	0.58	0.72	81.9	17.77	0.43	0.58	0.73	74.7	21.10	0.42	0.59	0.75	71.9	22.30	0.42	0.60	0.72				
	4720	92.2	15.32	0.45	0.62	0.78	85.4	17.95	0.45	0.63	0.80	77.7	21.26	0.44	0.64	0.83	75.0	22.47	0.44	0.67	0.80				
	5665	94.8	15.46	0.47	0.66	0.84	87.9	18.08	0.47	0.68	0.86	79.9	21.37	0.47	0.69	0.90	77.0	22.58	0.47	0.72	0.87				
Entering Wet Bulb Temperature	Total Air Volume	Outdoor Air Temperature Entering Outdoor Coil																							
		48°C						50°C						51.7°C											
		Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)			
				Dry Bulb						Dry Bulb						Dry Bulb						Dry Bulb			
				L/s	kW	kW	24°C			27°C	29°C	kW	kW			24°C	27°C	29°C	kW			kW	24°C	27°C	29°C
17.2°C	3775	60.4	22.87	0.81	0.99	1.00	58.4	23.89	0.82	1.00	1.00	56.9	24.80	0.83	1.00	1.00									
	4720	65.1	23.09	0.89	1.00	1.00	63.1	24.10	0.91	1.00	1.00	61.5	25.02	0.92	1.00	1.00									
	5665	68.6	23.24	0.97	1.00	1.00	66.6	24.27	0.98	1.00	1.00	64.8	25.16	0.99	1.00	1.00									
19.4°C	3775	64.7	23.05	0.60	0.79	0.96	62.5	24.08	0.61	0.80	0.97	60.6	24.95	0.61	0.81	0.98									
	4720	67.6	23.17	0.65	0.87	1.00	65.3	24.20	0.66	0.89	1.00	63.4	25.10	0.67	0.90	1.00									
	5665	69.8	23.29	0.71	0.95	1.00	67.5	24.31	0.72	0.96	1.00	65.4	25.19	0.73	0.97	1.00									
21.7°C	3775	69.6	23.27	0.41	0.60	0.77	67.2	24.29	0.41	0.60	0.78	65.3	25.20	0.41	0.60	0.78									
	4720	72.4	23.43	0.44	0.65	0.85	69.9	24.42	0.44	0.66	0.86	67.8	25.32	0.44	0.66	0.87									
	5665	74.4	23.54	0.46	0.71	0.93	72.0	24.55	0.46	0.72	0.94	69.8	25.44	0.47	0.73	0.95									



## RATINGS

NOTE – For Temperatures and Capacities not shown in tables, see bulletin – Cooling Unit Rating Table Correction Factor Data in Miscellaneous Engineering Data section.

### 105 kW - LCH360H4 (1ST STAGE)

Entering Wet Bulb Temperature	Total Air Volume	Outdoor Air Temperature Entering Outdoor Coil																							
		18.3°C						23.9°C						29.4°C						35°C					
		Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)			Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)			Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)			Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)						
				Dry Bulb					Dry Bulb					Dry Bulb					Dry Bulb						
				L/s	kW	kW			24°C	27°C	29°C			kW	kW	24°C			27°C	29°C	kW	kW	24°C	27°C	29°C
17.2°C	4455	51.5	8.07	0.73	0.86	0.99	49.2	8.94	0.73	0.88	1	46.9	9.92	0.74	0.89	1	44.6	11.06	0.75	0.91	1				
	5569	54	8.2	0.78	0.94	1	51.5	9.06	0.79	0.96	1	49.2	10.04	0.8	0.98	1	46.8	11.18	0.81	0.99	1				
	6683	56	8.31	0.83	1	1	53.7	9.18	0.85	1	1	51.5	10.16	0.86	1	1	49.1	11.32	0.88	1	1				
19.4°C	4455	54.5	8.23	0.57	0.71	0.83	52.1	9.09	0.58	0.71	0.85	49.7	10.07	0.58	0.72	0.86	47.2	11.21	0.58	0.73	0.88				
	5569	56.8	8.35	0.61	0.76	0.91	54.3	9.21	0.61	0.77	0.93	51.8	10.18	0.62	0.78	0.95	49.2	11.32	0.62	0.8	0.96				
	6683	58.5	8.44	0.64	0.82	0.98	56	9.3	0.65	0.83	0.99	53.4	10.29	0.65	0.85	1	50.8	11.42	0.66	0.86	1				
21.7°C	4455	57.9	8.41	0.44	0.56	0.69	55.4	9.27	0.43	0.57	0.69	52.9	10.25	0.43	0.57	0.7	50.3	11.39	0.42	0.57	0.71				
	5569	60.3	8.54	0.45	0.6	0.75	57.6	9.4	0.45	0.6	0.75	55.1	10.38	0.44	0.61	0.76	52.4	11.51	0.44	0.61	0.77				
	6683	62	8.64	0.46	0.64	0.8	59.2	9.49	0.46	0.64	0.81	56.6	10.46	0.46	0.64	0.83	53.9	11.6	0.46	0.66	0.84				

### 105 kW - LCH360H4 (2ND STAGE)

Entering Wet Bulb Temperature	Total Air Volume	Outdoor Air Temperature Entering Outdoor Coil																							
		26.7°C						35°C						43.3°C						46°C					
		Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)			
				Dry Bulb						Dry Bulb						Dry Bulb						Dry Bulb			
L/s	kW	kW	24°C	27°C	29°C	kW	kW	24°C	27°C	29°C	kW	kW	24°C	27°C	29°C	kW	kW	24°C	27°C	29°C					
17.2°C	4455	94.0	18.85	0.75	0.90	1.00	86.8	22.11	0.76	0.92	1.00	78.7	26.17	0.78	0.96	1.00	75.9	27.62	0.80	0.99	1.00				
	5569	98.4	19.09	0.81	0.97	1.00	91.1	22.35	0.83	1.00	1.00	83.3	26.45	0.86	1.00	1.00	81.2	27.97	0.88	1.00	1.00				
	6683	102.7	19.33	0.87	1.00	1.00	95.6	22.63	0.89	1.00	1.00	87.7	26.73	0.93	1.00	1.00	85.2	28.22	0.96	1.00	1.00				
19.4°C	4455	99.9	19.17	0.58	0.73	0.87	92.3	22.44	0.58	0.74	0.89	83.8	26.48	0.59	0.76	0.93	80.5	27.92	0.60	0.79	0.92				
	5569	104.0	19.41	0.62	0.79	0.95	96.0	22.66	0.63	0.81	0.98	87.2	26.70	0.64	0.84	1.00	83.9	28.15	0.66	0.88	1.00				
	6683	107.1	19.58	0.66	0.85	1.00	98.9	22.83	0.67	0.88	1.00	89.7	26.85	0.68	0.91	1.00	86.5	28.32	0.70	0.96	1.00				
21.7°C	4455	105.9	19.51	0.43	0.57	0.71	98.0	22.77	0.43	0.57	0.72	89.4	26.84	0.42	0.59	0.74	86.2	28.31	0.42	0.61	0.72				
	5569	110.2	19.77	0.45	0.62	0.77	102.0	23.01	0.44	0.62	0.79	92.8	27.05	0.44	0.63	0.82	89.4	28.51	0.44	0.66	0.80				
	6683	113.2	19.95	0.46	0.65	0.83	104.8	23.19	0.46	0.67	0.86	95.1	27.22	0.46	0.68	0.89	91.6	28.65	0.47	0.71	0.87				

Entering Wet Bulb Temperature	Total Air Volume	Outdoor Air Temperature Entering Outdoor Coil																		
		48°C						50°C						51.7°C						
		Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				Total Cool Cap.	Comp. Motor Input	Sensible To Total Ratio (S/T)				
				Dry Bulb						Dry Bulb						Dry Bulb				
L/s	kW	kW	24°C	27°C	29°C	kW	kW	24°C	27°C	29°C	kW	kW	24°C	27°C	29°C	kW	kW	24°C	27°C	29°C
17.2°C	4455	73.2	28.80	0.80	0.98	1.00	70.7	29.99	0.81	0.99	1.00	68.6	31.08	0.82	1.00	1.00				
	5569	78.2	29.13	0.88	0.91	1.00	75.8	30.34	0.89	1.00	1.00	73.7	31.43	0.91	1.00	1.00				
	6683	82.0	29.38	0.96	1.00	1.00	79.5	30.59	0.97	1.00	1.00	77.2	31.69	0.98	1.00	1.00				
19.4°C	4455	77.9	29.10	0.60	0.78	0.95	75.2	30.30	0.60	0.79	0.97	72.8	31.38	0.60	0.80	0.98				
	5569	81.0	29.32	0.65	0.86	1.00	78.2	30.50	0.65	0.87	1.00	75.9	31.60	0.66	0.89	1.00				
	6683	83.4	29.48	0.70	0.94	1.00	80.5	30.69	0.71	0.95	1.00	78.1	31.76	0.72	0.97	1.00				
21.7°C	4455	83.1	29.45	0.41	0.59	0.76	80.4	30.67	0.41	0.59	0.77	77.9	31.73	0.41	0.60	0.78				
	5569	86.4	29.69	0.44	0.65	0.84	83.3	30.90	0.44	0.65	0.85	80.5	31.93	0.44	0.66	0.87				
	6683	88.5	29.82	0.46	0.70	0.92	85.5	31.03	0.46	0.71	0.94	82.7	32.09	0.46	0.72	0.95				

## BLOWER DATA

BLOWER TABLE INCLUDES RESISTANCE FOR BASE UNIT ONLY WITH DRY INDOOR COIL & AIR FILTERS IN PLACE  
FOR ALL UNITS ADD:

- 1 - Wet indoor coil air resistance of selected unit.
- 2 - Any factory installed options air resistance (electric heat, economizer, etc.)
- 3 - Any field installed accessories air resistance (electric heat, duct resistance, diffuser, etc.)

Then determine from blower table blower motor output and drive required.

See page 17 for wet coil and option/accessory air resistance data.

See page 17 for factory installed drive kit specifications.

### MINIMUM AIR VOLUME REQUIRED FOR USE WITH OPTIONAL ELECTRIC HEAT

All units require 4955 L/s (10 500 cfm) minimum air with electric heat.

Air Volume		TOTAL STATIC PRESSURE - Pa (Inches Water Gauge)																	
		100 (0.40)			150 (0.60)			200 (0.80)			250 (1.00)			300 (1.20)			350 (1.40)		
L/s	cfm	rev/ min	kW	BHP	rev/ min	kW	BHP	rev/ min	kW	BHP	rev/ min	kW	BHP	rev/ min	kW	BHP	rev/ min	kW	BHP
1890	4000	433	0.49	0.66	497	0.74	0.99	565	0.95	1.27	630	1.15	1.54	687	1.33	1.78	738	1.52	2.04
2125	4500	441	0.59	0.79	506	0.83	1.11	574	1.05	1.41	638	1.26	1.69	694	1.45	1.94	744	1.65	2.21
2360	5000	451	0.7	0.94	516	0.93	1.25	584	1.16	1.55	646	1.38	1.85	702	1.58	2.12	751	1.79	2.40
2595	5500	462	0.81	1.09	527	1.04	1.39	594	1.28	1.72	655	1.51	2.02	710	1.72	2.31	758	1.95	2.61
2830	6000	473	0.93	1.25	539	1.16	1.55	605	1.42	1.90	665	1.65	2.21	718	1.87	2.51	766	2.11	2.83
3070	6500	486	1.06	1.42	551	1.3	1.74	616	1.56	2.09	675	1.8	2.41	727	2.04	2.73	774	2.29	3.07
3300	7000	499	1.19	1.60	565	1.44	1.93	628	1.73	2.32	685	1.97	2.64	737	2.22	2.98	782	2.49	3.34
3540	7500	513	1.34	1.80	579	1.6	2.14	641	1.9	2.55	696	2.15	2.88	747	2.42	3.24	792	2.71	3.63
3775	8000	528	1.49	2.00	593	1.78	2.39	653	2.1	2.82	708	2.35	3.15	757	2.63	3.53	801	2.95	3.95
4010	8500	544	1.66	2.23	608	1.98	2.65	667	2.31	3.10	720	2.57	3.45	768	2.87	3.85	812	3.21	4.30
4245	9000	561	1.85	2.48	624	2.2	2.95	681	2.54	3.40	733	2.8	3.75	780	3.13	4.20	823	3.5	4.69
4480	9500	578	2.05	2.75	640	2.44	3.27	696	2.78	3.73	746	3.06	4.10	792	3.42	4.58	834	3.81	5.11
4720	10 000	596	2.28	3.06	657	2.69	3.61	711	3.04	4.08	760	3.34	4.48	805	3.73	5.00	845	4.15	5.56
4955	10 500	615	2.53	3.39	674	2.95	3.95	727	3.31	4.44	775	3.65	4.89	817	4.07	5.46	857	4.52	6.06
5190	11 000	634	2.79	3.74	692	3.22	4.32	744	3.61	4.84	789	3.99	5.35	830	4.44	5.95	869	4.91	6.58
5425	11 500	653	3.07	4.12	711	3.51	4.71	760	3.93	5.27	803	4.36	5.84	843	4.84	6.49	881	5.32	7.13
5660	12 000	674	3.38	4.53	729	3.83	5.13	776	4.29	5.75	818	4.77	6.39	857	5.27	7.06	894	5.75	7.71
5900	12 500	695	3.72	4.99	748	4.2	5.63	792	4.69	6.29	832	5.21	6.98	870	5.72	7.67	906	6.21	8.32
6130	13 000	715	4.1	5.50	766	4.61	6.18	808	5.14	6.89	847	5.68	7.61	883	6.21	8.32	918	6.7	8.98
6370	13 500	736	4.52	6.06	784	5.06	6.78	824	5.62	7.53	861	6.18	8.28	896	6.72	9.01	930	7.21	9.66
6605	14 000	757	4.98	6.68	801	5.55	7.44	839	6.14	8.23	875	6.71	8.99	909	7.25	9.72	943	7.74	10.38
6840	14 500	777	5.48	7.35	818	6.08	8.15	854	6.69	8.97	889	7.27	9.75	922	7.81	10.47	955	8.3	11.13
7075	15 000	797	6.02	8.07	834	6.66	8.93	868	7.28	9.76	902	7.86	10.54	935	8.4	11.26	---	---	---

CONTINUED ON NEXT PAGE

## BLOWER DATA

BLOWER TABLE INCLUDES RESISTANCE FOR BASE UNIT ONLY WITH DRY INDOOR COIL & AIR FILTERS IN PLACE  
FOR ALL UNITS ADD:

- 1 - Wet indoor coil air resistance of selected unit.
- 2 - Any factory installed options air resistance (electric heat, economizer, etc.)
- 3 - Any field installed accessories air resistance (electric heat, duct resistance, diffuser, etc.)

Then determine from blower table blower motor output and drive required.

See page 17 for wet coil and option/accessory air resistance data.

See page 17 for factory installed drive kit specifications.

### MINIMUM AIR VOLUME REQUIRED FOR USE WITH OPTIONAL ELECTRIC HEAT

All units require 4955 L/s (10 500 cfm) minimum air with electric heat.

Air Volume		TOTAL STATIC PRESSURE - Pa (Inches Water Gauge)																	
		400 (1.60)			450 (1.80)			500 (2.00)			550 (2.20)			600 (2.40)			650 (2.60)		
L/s	cfm	rev/min	kW	BHP	rev/min	kW	BHP	rev/min	kW	BHP	rev/min	kW	BHP	rev/min	kW	BHP	rev/min	kW	BHP
1890	4000	784	1.72	2.31	824	1.91	2.56	861	2.1	2.82	897	2.31	3.10	932	2.54	3.40	---	---	---
2125	4500	790	1.86	2.49	831	2.07	2.77	868	2.28	3.06	903	2.5	3.35	938	2.73	3.66	974	2.99	4.01
2360	5000	796	2.01	2.69	837	2.24	3.00	874	2.46	3.30	909	2.69	3.61	944	2.94	3.94	980	3.21	4.30
2595	5500	802	2.18	2.92	843	2.42	3.24	880	2.66	3.57	916	2.9	3.89	951	3.15	4.22	987	3.43	4.60
2830	6000	809	2.36	3.16	850	2.62	3.51	887	2.87	3.85	922	3.12	4.18	957	3.38	4.53	994	3.66	4.91
3070	6500	817	2.56	3.43	857	2.83	3.79	894	3.1	4.16	929	3.35	4.49	964	3.62	4.85	1001	3.91	5.24
3300	7000	825	2.78	3.73	864	3.07	4.12	901	3.34	4.48	937	3.6	4.83	971	3.87	5.19	1008	4.17	5.59
3540	7500	833	3.02	4.05	872	3.32	4.45	909	3.61	4.84	945	3.88	5.20	979	4.15	5.56	1016	4.45	5.97
3775	8000	843	3.28	4.40	881	3.6	4.83	918	3.89	5.21	953	4.17	5.59	988	4.45	5.97	1025	4.75	6.37
4010	8500	852	3.56	4.77	890	3.89	5.21	927	4.2	5.63	962	4.49	6.02	997	4.77	6.39	1034	5.08	6.81
4245	9000	862	3.87	5.19	900	4.22	5.66	936	4.53	6.07	972	4.82	6.46	1007	5.11	6.85	1044	5.43	7.28
4480	9500	873	4.21	5.64	910	4.56	6.11	946	4.88	6.54	982	5.17	6.93	1018	5.47	7.33	1055	5.8	7.77
4720	10 000	884	4.57	6.13	921	4.93	6.61	957	5.24	7.02	992	5.54	7.43	1028	5.86	7.86	1066	6.2	8.31
4955	10 500	895	4.94	6.62	932	5.31	7.12	967	5.63	7.55	1003	5.93	7.95	1039	6.27	8.40	1077	6.63	8.89
5190	11 000	907	5.34	7.16	943	5.71	7.65	978	6.03	8.08	1013	6.35	8.51	1050	6.7	8.98	1089	7.08	9.49
5425	11 500	918	5.75	7.71	954	6.13	8.22	989	6.46	8.66	1025	6.78	9.09	1062	7.15	9.58	1101	7.55	10.12
5660	12 000	930	6.19	8.30	965	6.57	8.81	1000	6.9	9.25	1036	7.24	9.71	1073	7.62	10.21	1112	8.03	10.76
5900	12 500	941	6.65	8.91	976	7.03	9.42	1011	7.37	9.88	1048	7.72	10.35	1085	8.1	10.86	1124	8.52	11.42
6130	13 000	953	7.13	9.56	988	7.51	10.07	1023	7.85	10.52	1059	8.21	11.01	---	---	---	---	---	---
6370	13 500	965	7.64	10.24	1000	8.01	10.74	1035	8.35	11.19	---	---	---	---	---	---	---	---	---
6605	14 000	977	8.16	10.94	1012	8.53	11.43	---	---	---	---	---	---	---	---	---	---	---	---

## BLOWER DATA

### FACTORY INSTALLED BELT DRIVE KIT SPECIFICATIONS

Nominal kW	Nominal hp	Maximum kW	Maximum hp	Drive Kit Number	Rev/min Range
3.7	5	4.3	5.75	5	550 - 675
3.7	5	4.3	5.75	6	640 - 805
3.7	5	4.3	5.75	7	475 - 600
3.7	5	4.3	5.75	8	400 - 525
5.6	7.5	6.4	8.63	3	595 - 730
5.6	7.5	6.4	8.63	4	640 - 805
7.5	10	8.6	11.50	1	615 - 745
7.5	10	8.6	11.50	2	725 - 870

NOTE - Using total air volume and system static pressure requirements determine from blower performance tables rev/min and motor output required. Maximum usable output of motors furnished as shown. If motors of comparable output are used, be sure to keep within the service factor limitations outlined on the motor nameplate.

### FACTORY INSTALLED OPTIONS/FIELD INSTALLED ACCESSORY AIR RESISTANCE

Air Volume		Wet Indoor Coil		Electric Heat		Economizer		Filters				Horizontal Roof Curb	
								MERV 8		MERV 13			
L/s	cfm	Pa	in. w.g.	Pa	in. w.g.	Pa	in. w.g.	Pa	in. w.g.	Pa	in. w.g.	Pa	in. w.g.
1890	4000	10	0.04	2	0.01	0	0.00	0	0.00	0	0.00	10	0.04
2125	4500	10	0.04	2	0.01	0	0.00	0	0.00	0	0.00	12	0.05
2360	5000	12	0.05	2	0.01	0	0.00	0	0.00	0	0.00	15	0.06
2595	5500	15	0.06	5	0.02	2	0.01	0	0.00	2	0.01	17	0.07
2830	6000	17	0.07	5	0.02	2	0.01	0	0.00	5	0.02	20	0.08
3070	6500	20	0.08	5	0.02	2	0.01	2	0.01	5	0.02	22	0.09
3300	7000	22	0.09	7	0.03	5	0.02	2	0.01	7	0.03	25	0.10
3540	7500	25	0.10	7	0.03	5	0.02	2	0.01	10	0.04	27	0.11
3775	8000	27	0.11	7	0.03	5	0.02	2	0.01	10	0.04	32	0.13
4010	8500	30	0.12	10	0.04	7	0.03	2	0.01	10	0.04	37	0.15
4245	9000	32	0.13	10	0.04	10	0.04	2	0.01	10	0.04	42	0.17
4480	9500	35	0.14	12	0.05	10	0.04	5	0.02	15	0.06	47	0.19
4720	10 000	37	0.15	12	0.05	12	0.05	5	0.02	15	0.06	52	0.21
4955	10 500	40	0.16	15	0.06	15	0.06	5	0.02	15	0.06	60	0.24
5190	11 000	45	0.18	15	0.06	17	0.07	5	0.02	17	0.07	67	0.27
5425	11 500	47	0.19	17	0.07	20	0.08	5	0.02	20	0.08	75	0.30
5660	12 000	50	0.20	17	0.07	25	0.10	5	0.02	20	0.08	82	0.33
5900	12 500	52	0.21	20	0.08	27	0.11	7	0.03	25	0.10	92	0.37
6130	13 000	57	0.23	20	0.08	32	0.13	7	0.03	25	0.10	100	0.40
6370	13 500	60	0.24	22	0.09	35	0.14	7	0.03	27	0.11	110	0.44
6605	14 000	65	0.26	25	0.10	40	0.16	7	0.03	30	0.12	122	0.49
6840	14 500	67	0.27	25	0.10	45	0.18	10	0.04	32	0.13	132	0.53
7075	15 000	72	0.29	27	0.11	52	0.21	10	0.04	32	0.13	144	0.58

## BLOWER DATA

### CEILING DIFFUSER AIR RESISTANCE

Air Volume		Step-Down Diffuser - LARTD30/36S						Flush Diffuser - LAFD30/36S	
		2 Ends Open		1 Side/2 Ends Open		All Ends & Sides Open			
L/s	cfm	Pa	in. w.g.	Pa	in. w.g.	Pa	in. w.g.	Pa	in. w.g.
3540	7500	92	0.37	77	0.31	62	0.25	72	0.29
3775	8000	104	0.42	90	0.36	72	0.29	85	0.34
4010	8500	119	0.48	102	0.41	85	0.34	97	0.39
4245	9000	137	0.55	117	0.47	97	0.39	109	0.44
4485	9500	154	0.62	132	0.53	112	0.45	127	0.51
4720	10000	174	0.70	149	0.60	127	0.51	142	0.57
4955	10 500	194	0.78	169	0.68	144	0.58	162	0.65
5190	11 000	216	0.87	190	0.76	162	0.65	179	0.72
5425	11 500	241	0.97	211	0.85	182	0.73	201	0.81
5665	12 000	269	1.08	234	0.94	204	0.82	223	0.90
5900	12 500	296	1.19	259	1.04	226	0.91	246	0.99
6135	13 000	323	1.30	286	1.15	249	1.00	274	1.10
6370	13 500	356	1.43	313	1.26	374	1.10	298	1.20
6605	14 000	388	1.56	343	1.38	298	1.20	326	1.31
6845	14 500	420	1.69	373	1.50	326	1.31	356	1.43
7080	15 000	457	1.84	405	1.63	356	1.43	388	1.56

### CEILING DIFFUSER AIR THROW DATA

Air Volume		<sup>1</sup> Effective Throw Range			
		Step-Down		Flush	
L/s	cfm	m	ft.	m	ft.
4245	9000	12 - 14	40 - 47	8 - 11	29 - 35
4485	9500	13 - 15	43 - 50	10 - 12	33 - 41
4720	10 000	14 - 16	46 - 54	11 - 14	37 - 46
4955	10 500	15 - 18	50 - 58	13 - 15	42 - 51
4190	11 000	16 - 19	53 - 61	14 - 17	46 - 56
5425	11 500	17 - 20	55 - 64	15 - 19	50 - 61
5665	12 000	18 - 20	58 - 67	16 - 20	54 - 66
5900	12 500	19 - 22	61 - 71	18 - 22	58 - 71
6135	13 000	20 - 23	64 - 74	19 - 23	62 - 75
6370	13 500	20 - 23	67 - 77	20 - 24	66 - 79

<sup>1</sup> Throw is the horizontal or vertical distance an airstream travels on leaving the outlet or diffuser before the maximum velocity is reduced to 15 m (50 ft.) per minute. Four sides open.

### POWER EXHAUST FAN PERFORMANCE - STANDARD STATIC

Return Duct Negative Static Pressure		Air Volume Exhausted	
Pa	in. w.g.	L/s	cfm
0	0	6040	12 800
12	0.05	5760	12 200
25	0.10	5430	11 500
37	0.15	5100	10 800
50	0.20	4670	9900
62	0.25	4250	9000
75	0.30	3730	7900
87	0.35	3190	6750
100	0.40	2570	5450
112	0.45	1960	4150
125	0.50	1370	2900



## ELECTRICAL/ELECTRIC HEAT DATA

		LCH300H4B			LCH360H4B		
<sup>1</sup> Voltage - 50hz 3 Phase with neutral		380/420V			380/420V		
Compressor 1	Rated Load Amps	10.6			12.2		
	Locked Rotor Amps	74			101		
Compressor 2	Rated Load Amps	10.6			12.2		
	Locked Rotor Amps	74			101		
Compressor 3	Rated Load Amps	10.6			12.2		
	Locked Rotor Amps	74			101		
Compressor 4	Rated Load Amps	10.6			12.2		
	Locked Rotor Amps	74			101		
Outdoor Fan Motors (6)	Full Load Amps	1.3			1.3		
	(total)	(7.8)			(7.8)		
Standard Power Exhaust (3) 0.25 kW	Full Load Amps	1.3			1.3		
	(total)	(3.9)			(3.9)		
Indoor Blower Motor	kW	3.7	5.6	7.5	3.7	5.6	7.5
	Full Load Amps	8.2	11.7	16.3	8.2	11.7	16.3
<sup>2</sup> Maximum Overcurrent Protection	Unit Only	70	70	80	80	80	90
	With (3) 0.25 kW Standard Power Exhaust	70	80	90	80	80	90
<sup>3</sup> Minimum Circuit Ampacity	Unit Only	62	65	71	68	72	77
	With (3) 0.25 kW Standard Power Exhaust	65	69	75	72	76	81

## ELECTRIC HEAT DATA

Electric Heat Voltage				420V	420V	420V	420V	420V	420V
<sup>2</sup> Maximum Overcurrent Protection	<sup>4</sup> Electric Heat	Unit+ 23 kW		70	70	80	80	80	90
		34.5 kW		70	80	80	80	80	90
		45.9 kW		80	80	90	80	80	90
		68.9 kW		110	110	125	110	110	125
		91.9 kW		150	150	150	150	150	150
<sup>3</sup> Minimum Circuit Ampacity	<sup>4</sup> Electric Heat	Unit+ 23 kW		62	65	71	68	72	77
		34.5 kW		70	74	80	70	74	80
		45.9 kW		74	78	84	74	78	84
		68.9 kW		105	110	116	105	110	116
		91.9 kW		137	141	147	137	141	147
<sup>2</sup> Maximum Overcurrent Protection	<sup>4</sup> Electric Heat and Standard Power Exhaust (3) 0.25 kW	Unit+ 23 kW		70	80	90	80	80	90
		34.5 kW		80	80	90	80	80	90
		45.9 kW		80	90	90	80	90	90
		68.9 kW		110	125	125	110	125	125
		91.9 kW		150	150	175	150	150	175
<sup>3</sup> Minimum Circuit Ampacity	<sup>4</sup> Electric Heat and Standard Power Exhaust (3) 0.25 kW	Unit+ 23 kW		65	69	75	72	76	81
		34.5 kW		75	79	85	75	79	85
		45.9 kW		79	83	89	79	83	89
		68.9 kW		110	115	120	110	115	120
		91.9 kW		142	146	152	142	146	152

<sup>1</sup> Extremes of operating range are plus and minus 10% of line voltage.

<sup>2</sup> Heating, Air Conditioning, Refrigeration (HACR) type breaker or fuse.

<sup>3</sup> Refer to local electrical code to determine wire, fuse and disconnect size requirements.

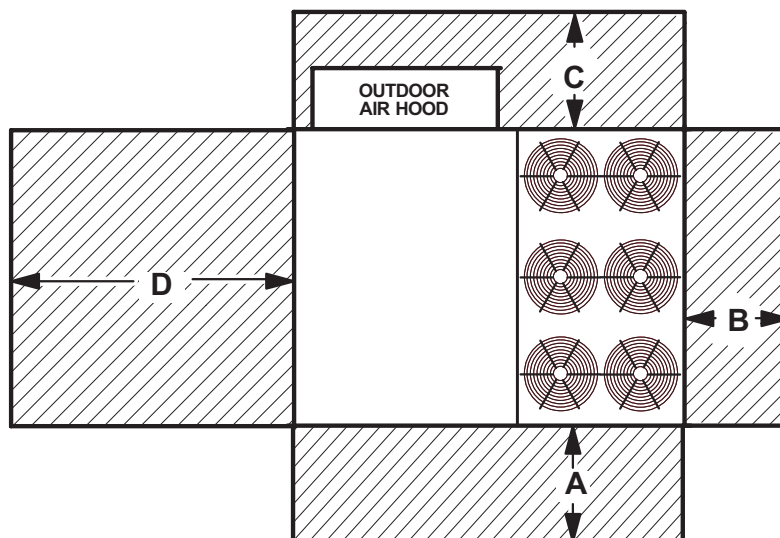
<sup>4</sup> Nominal kW based on 420V-3ph-50hz.

## ELECTRIC HEAT CAPACITIES

Volts Input	23 kW			34.5 kW			45.9 kW			68.9 kW			91.9 kW		
	kW Input	Btuh Output	No. of Stages	kW Input	Btuh Output	No. of Stages	kW Input	Btuh Output	No. of Stages	kW Input	Btuh Output	No. of Stages	kW Input	Btuh Output	No. of Stages
380	18.8	64 200	1	28.2	93 600	2	37.6	128 400	2	56.4	192 500	2	75.2	236 700	2
400	20.8	71 100	1	31.2	106 700	2	41.6	142 200	2	62.5	213 200	2	83.4	261 000	2
420	23.0	78 400	1	34.4	117 600	2	45.9	156 800	2	68.9	235 100	2	91.9	313 700	2

## UNIT CLEARANCES

### Unit With Economizer



<sup>1</sup> Unit Clearance	A		B		C		D		Top Clearance
	mm	in.	mm	in.	mm	in.	mm	in.	
<b>Service Clearance</b>	1524	60	914	36	914	36	1676	66	Unobstructed
<b>Minimum Operation Clearance</b>	1143	45	914	36	914	36	1041	41	

NOTE - Entire perimeter of unit base requires support when elevated above the mounting surface.

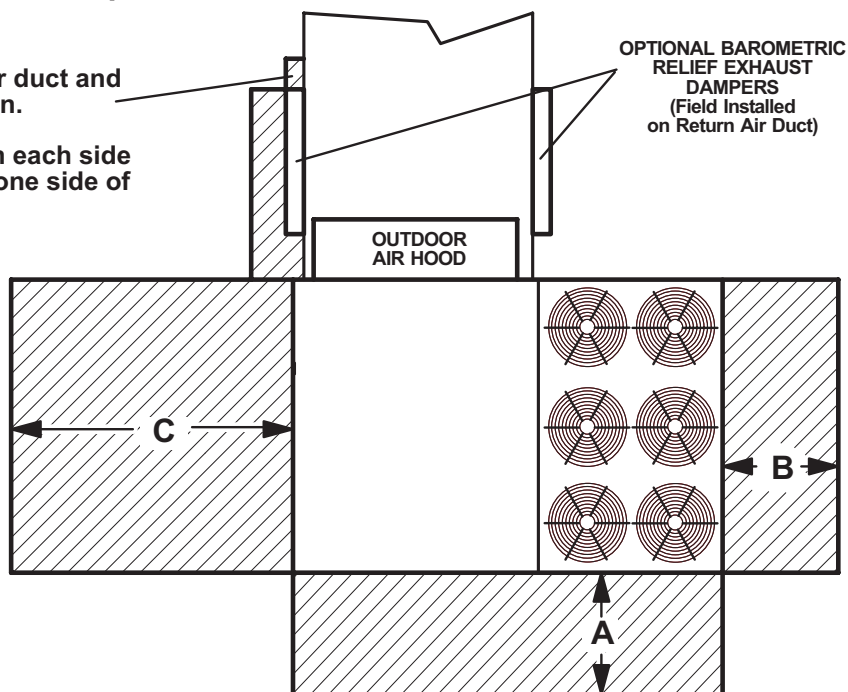
<sup>1</sup> **Service Clearance** - Required for removal of serviceable parts.

**Minimum Operation Clearance** - Required clearance for proper unit operation.

### Unit With Horizontal Barometric Relief Dampers

NOTE Allow adequate clearance for duct and barometric relief damper installation.

NOTE Dampers may be installed on each side of return air duct or end to end on one side of return air duct.



<sup>1</sup> Unit Clearance	A		B		C		Top Clearance
	mm	in.	mm	in.	mm	in.	
<b>Service Clearance</b>	1524	60	914	36	1676	66	Unobstructed
<b>Minimum Operation Clearance</b>	1143	45	914	36	1041	41	

NOTE - Entire perimeter of unit base requires support when elevated above the mounting surface.

<sup>1</sup> **Service Clearance** - Required for removal of serviceable parts.

**Minimum Operation Clearance** - Required clearance for proper unit operation.

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## OUTDOOR SOUND DATA

Unit Model Number	Octave Band Sound Power Levels dBA, re 10 <sup>-12</sup> Watts Center Frequency - HZ							1 Sound Rating Number (dBA)
	125	250	500	1000	2000	4000	8000	
300/360	84	85	90	90	85	80	72	95

Note - The octave sound power data does not include tonal corrections.

<sup>1</sup> Sound Rating Number according to AHRI Standard 370-2001.

## WEIGHT DATA

Model Number	Net		Shipping	
	kg	lbs.	kg	lbs.
300 Base Unit	1359	2997	1455	3207
300 Max. Unit	1546	3409	1642	3619
360 Base Unit	1359	2997	1455	3207
360 Max. Unit	1546	3409	1642	3619

## OPTIONS / ACCESSORIES

Description		Shipping Weight	
		kg	lbs.
<b>ECONOMIZER / OUTDOOR AIR / EXHAUST</b>			
<b>Economizer</b>		54	119
<b>Barometric Relief</b>			
Downflow Barometric Relief Dampers		20	45
Horizontal Barometric Relief Dampers		9	20
<b>Outdoor Air Dampers</b>			
Damper Section (downflow)	Motorized	33	72
Damper Section (downflow)	Manual	31	68
<b>Outdoor Air Hood (downflow)</b>		34	76
<b>Power Exhaust</b>			
		45	99
<b>ELECTRIC HEAT</b>			
23 kW		27	59
34.5 kW		34	76
45.9 kW		34	76
68.9 kW		38	84
91.9 kW		44	98
<b>ROOF CURBS</b>			
<b>Hybrid Roof Curbs, Downflow</b>			
356 mm height		52	115
457 mm height		64	140
610 mm height		77	170
<b>Standard Curbs, Horizontal</b>			
356 mm height		202	445
610 mm height		329	725
<b>CEILING DIFFUSERS</b>			
Step-Down	LARTD30/36S	625	283
Flush	LAFD30/36S	625	283
Transitions	LASRT30/36	39	85
<b>PACKAGING</b>			
LTL Packaging (less than truck load)		136	300

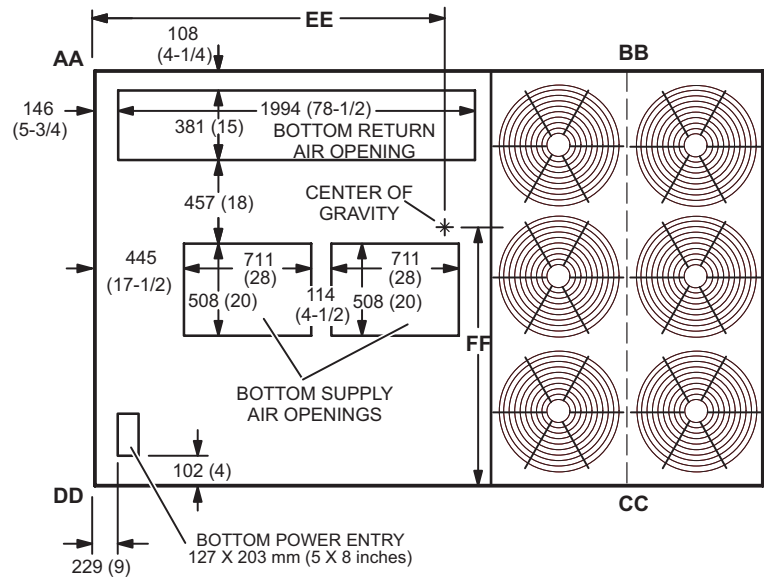


## DIMENSIONS - UNIT

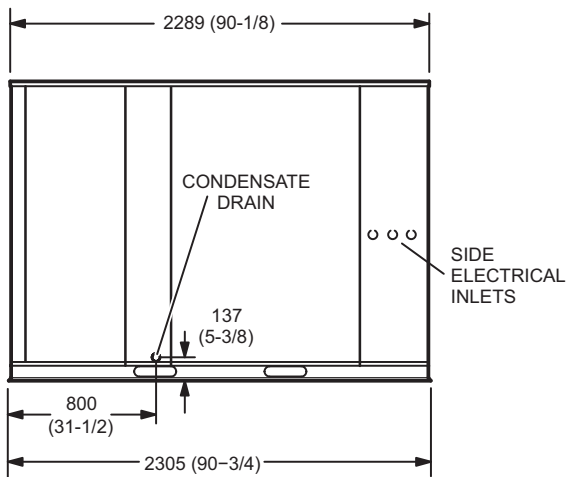
Model No.	CORNER WEIGHTS								CENTER OF GRAVITY			
	AA		BB		CC		DD		EE		FF	
	kg	lbs.	kg	lbs.	kg	lbs.	kg	lbs.	mm	in.	mm	in.
LCH300 Base Unit	277	610	278	612	399	880	406	895	1524	60	940	37
LCH300 Max. Unit	315	693	316	696	454	1001	462	1018	1524	60	940	37
LCH360 Base Unit	277	610	278	612	399	880	406	895	1524	60	940	37
LCH360 Max. Unit	315	693	316	696	454	1001	462	1018	1524	60	940	37

Base Unit - The unit with NO INTERNAL OPTIONS.

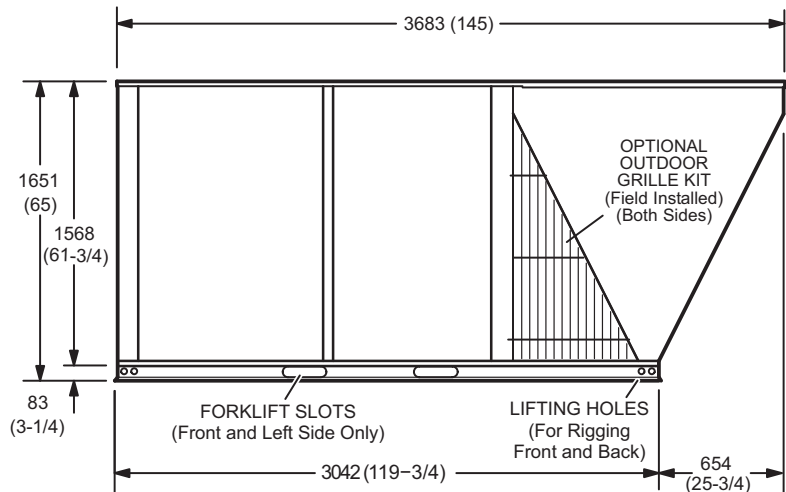
Max. Unit - The unit with ALL INTERNAL OPTIONS Installed. (Economizer, Standard Static Power Exhaust Fans, Controls, etc.). Does not include accessories external to unit or high static power exhaust.



TOP VIEW

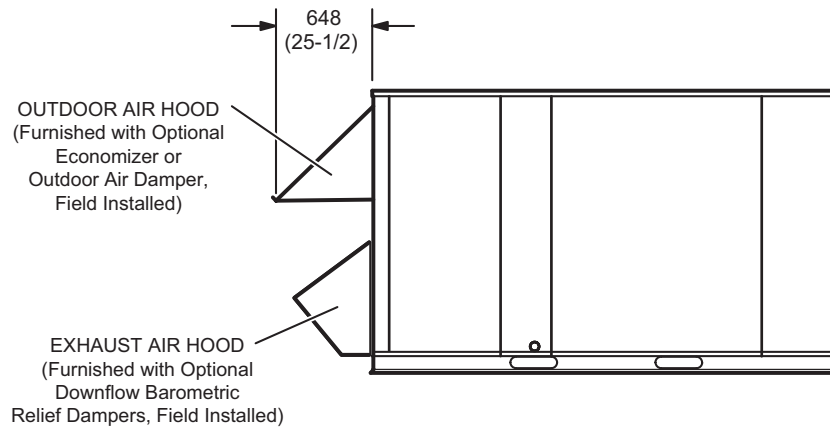


END VIEW



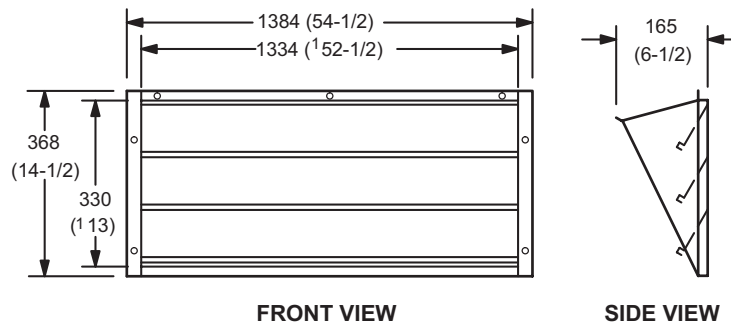
SIDE VIEW

## OUTDOOR AIR HOOD DETAIL



## OPTIONAL HORIZONTAL BAROMETRIC RELIEF DAMPERS WITH HOOD

(Field installed in horizontal return air duct adjacent to unit)

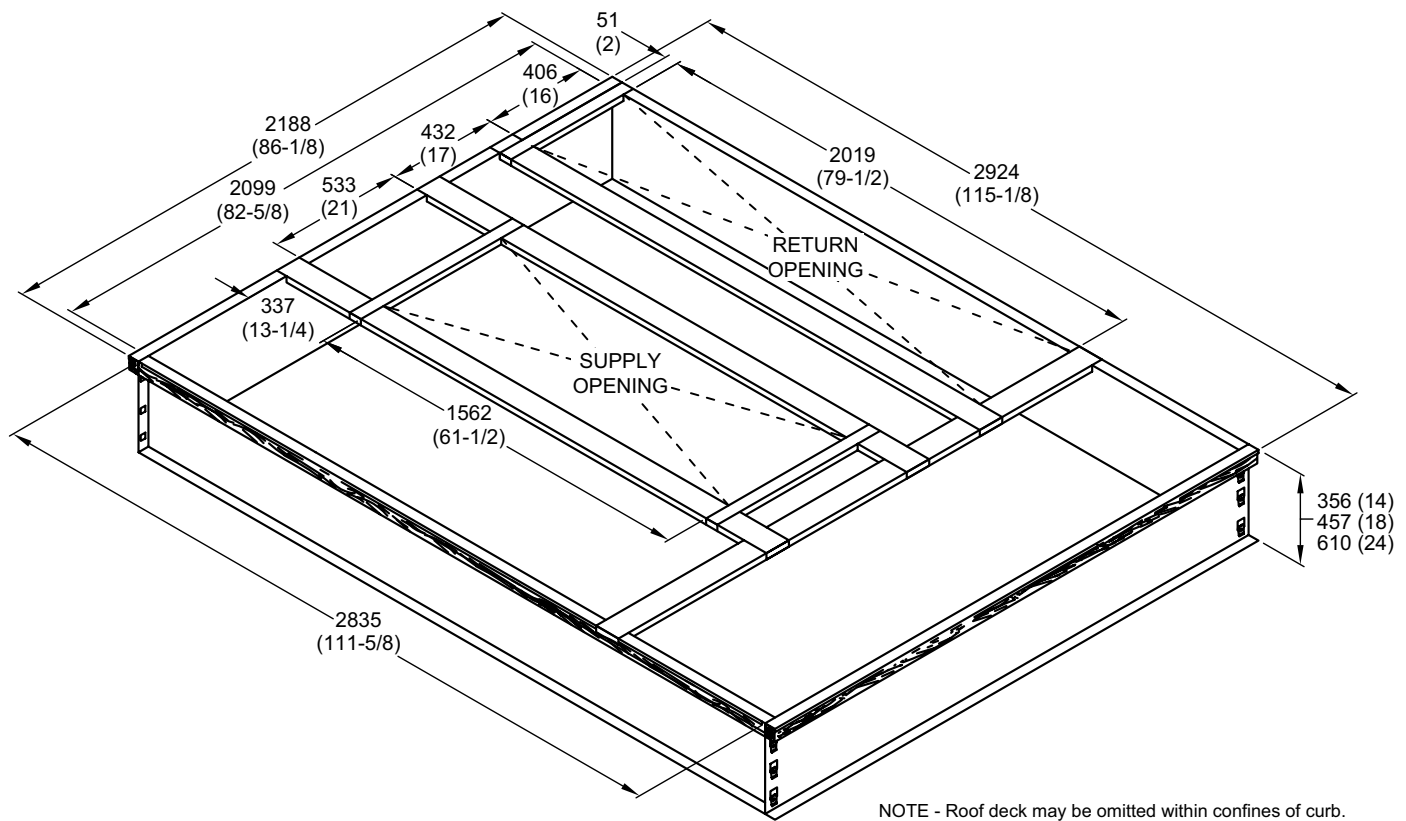


NOTE - Two furnished per order no.

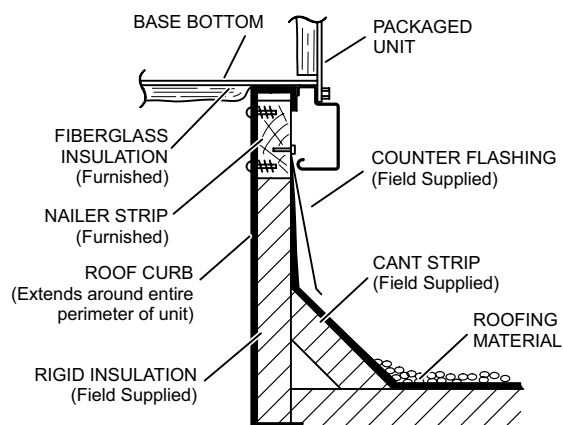
<sup>1</sup> NOTE - Opening size required in return air duct.

## DIMENSIONS - ACCESSORIES

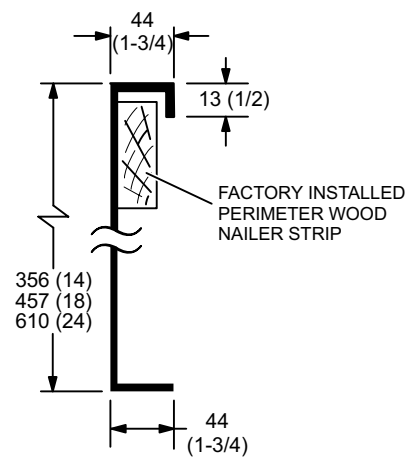
### HYBRID ROOF CURBS - DOUBLE DUCT OPENING



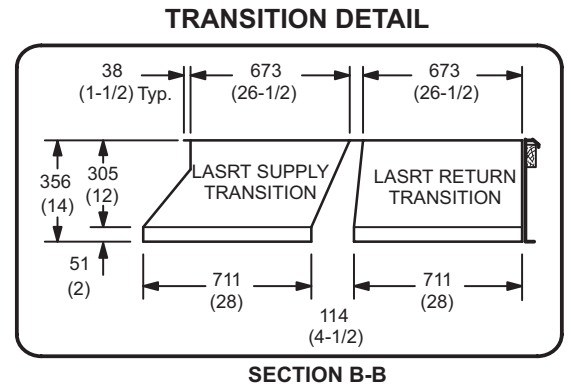
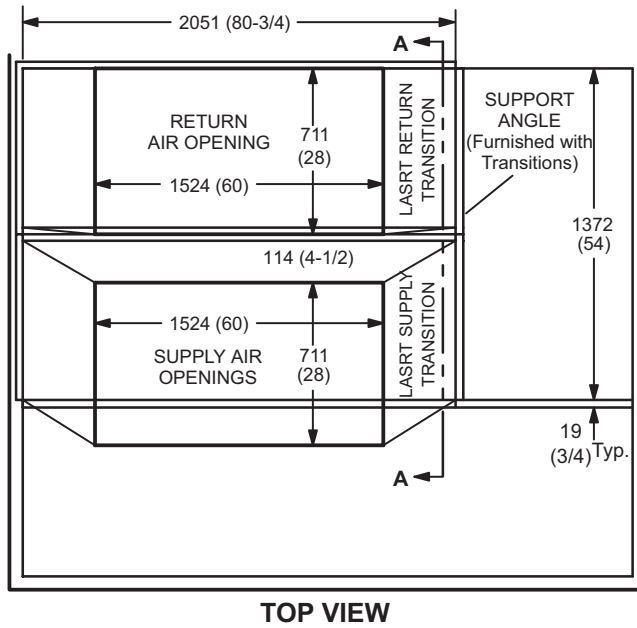
#### TYPICAL FLASHING DETAIL FOR ROOF CURB



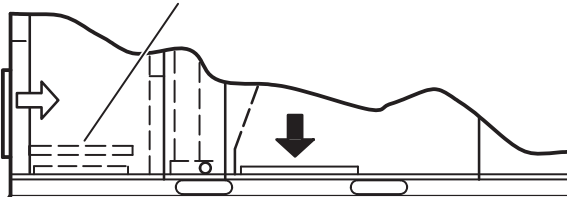
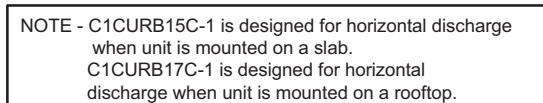
#### DETAIL ROOF CURB



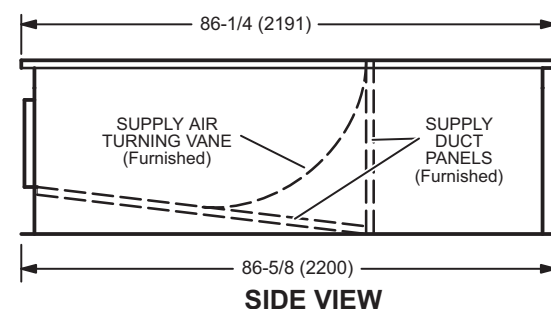
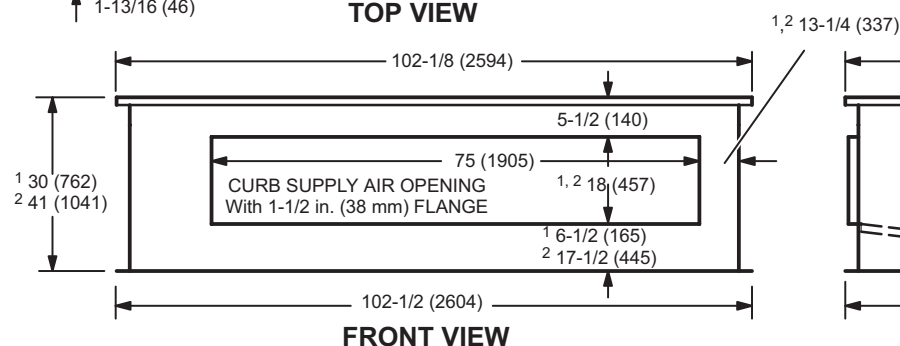
## ROOF CURBS WITH SUPPLY & RETURN AIR TRANSITIONS FOR CEILING DIFFUSERS



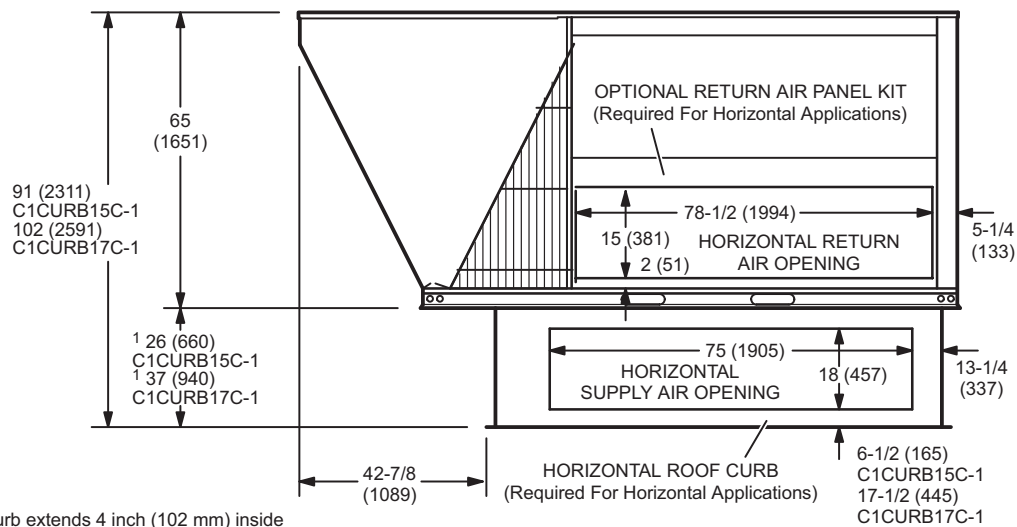
### HORIZONTAL ROOF CURBS – Requires Optional Horizontal Return Air Panel Kit



**SIDE VIEW**  
**(PACKAGED UNIT)**

<sup>1</sup> C1CURB15C-1      <sup>2</sup> C1CURB17C-1

## HORIZONTAL SUPPLY AND RETURN AIR OPENINGS ROOFTOP UNIT WITH HORIZONTAL ROOF CURB



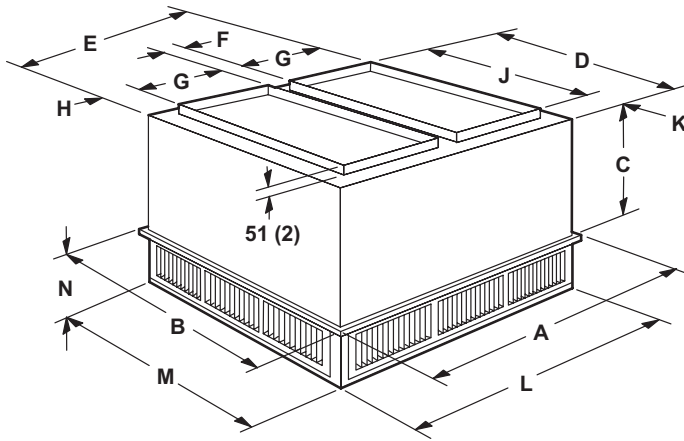
<sup>1</sup> NOTE – Top of Curb extends 4 inch (102 mm) inside bottom of unit base. See Typical Flashing Detail.

### SIDE VIEW (Horizontal Openings)

## DIMENSIONS - ACCESSORIES

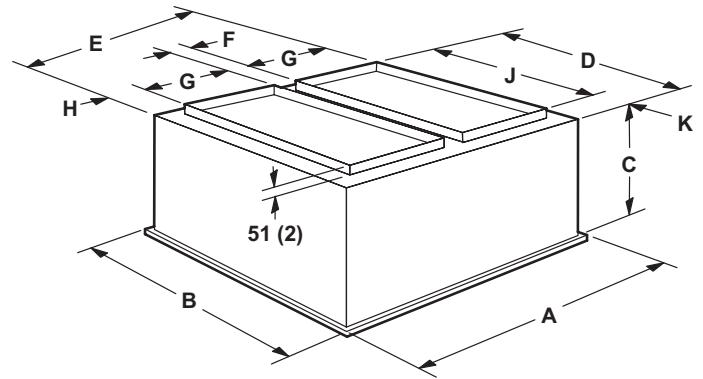
### COMBINATION CEILING SUPPLY AND RETURN DIFFUSERS

#### STEP-DOWN CEILING DIFFUSER



Model Number		LARTD30/36S
A	mm	1667
	in.	65-5/8
B	mm	1667
	in.	65-5/8
C	mm	1029
	in.	40-1/2
D	mm	1613
	in.	63-1/2
E	mm	1613
	in.	63-1/2
F	mm	114
	in.	4-1/2
G	mm	711
	in.	28
H	mm	38
	in.	1-1/2
J	mm	1524
	in.	60
K	mm	44
	in.	1-3/4
L	mm	1613
	in.	63-1/2
M	mm	1613
	in.	63-1/2
N	mm	308
	in.	12-1/8
Duct Size	mm	711 x 1524
	in.	28 x 60

#### FLUSH CEILING DIFFUSER



Model Number		LAFD30/36S
A	mm	1667
	in.	65-5/8
B	mm	1667
	in.	65-5/8
C	mm	1016
	in.	40
D	mm	1613
	in.	63-1/2
E	mm	1613
	in.	63-1/2
F	mm	108
	in.	4-1/4
G	mm	711
	in.	28
H	mm	32
	in.	1-5/8
J	mm	1524
	in.	60
K	mm	44
	in.	1-3/4
Duct Size	mm	711 x 1524
	in.	28 x 60







## REVISIONS

Section	Description
Optional Accessories	Removed Standard Efficiency Economizer option. Added new catalog and model numbers for the High Efficiency Economizer. Added new catalog and model numbers for the Outdoor Air Dampers. Removed Novar 2051 option.



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