



**EL17XP1**  
**ELITE® Series**  
**R-410A - 60 Hz**

**RESIDENTIAL**  
**PRODUCT SPECIFICATIONS**

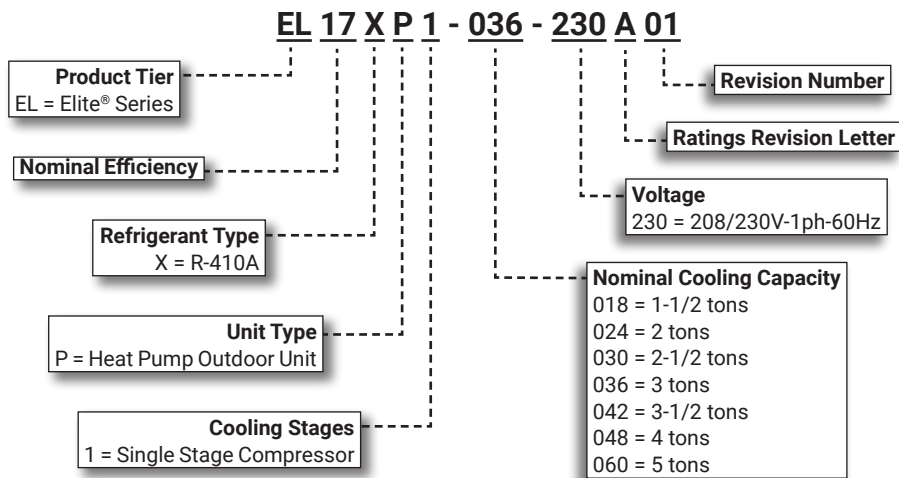
Bulletin No. 211008  
 October 2023  
 Supersedes January 2023

**ELITE®**  
 SERIES

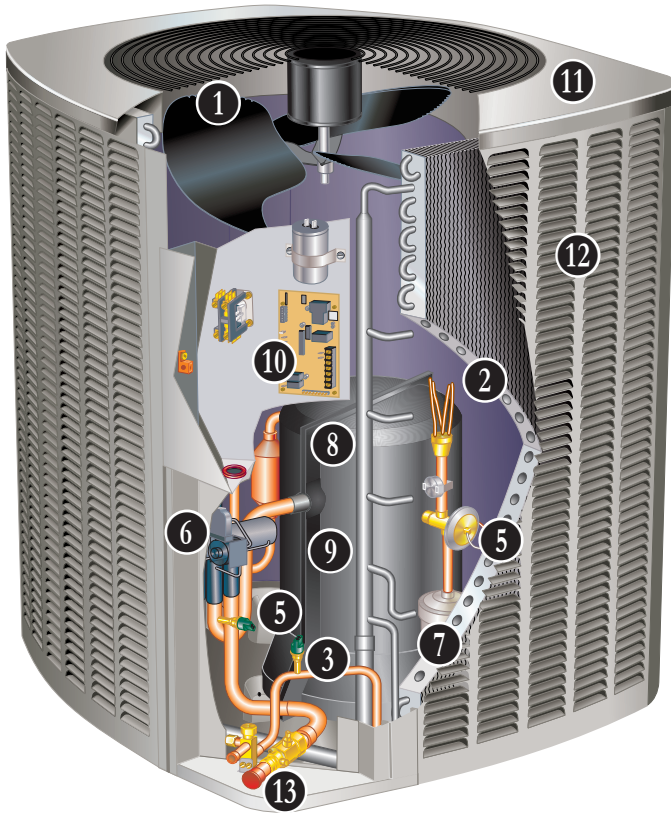


**SEER2 up to 17.0 / SEER up to 18.6**  
**HSPF2 up to 8.5 / HSPF up to 10.6**  
**1.5 to 5 Tons**  
**Cooling Capacity - 18,000 to 58,000 Btuh**  
**Heating Capacity - 16,200 to 54,500 Btuh**

**MODEL NUMBER IDENTIFICATION**



## FEATURE HIGHLIGHTS



1. Outdoor Coil Fan
2. Quantum™ Coil
3. High Pressure Switch
4. Low Pressure Switch
5. Expansion Valve - Outdoor Unit
6. Four-Way Reversing Valve
7. Hi-Capacity Liquid Line Drier
8. Scroll Compressor
9. Compressor Sound Dampening System
10. Defrost Control
11. Heavy Gauge Steel Cabinet
12. SmartHinge™ Louvered Coil Protection
13. Refrigerant Line Connections

## CONTENTS

|   |    |
|---|----|
| Approvals And Warranty . . . . .                  | 3  |
| Dimensions . . . . .                              | 10 |
| Electrical Data . . . . .                         | 7  |
| Features . . . . .                                | 3  |
| Field Wiring . . . . .                            | 9  |
| Installation Clearances . . . . .                 | 9  |
| Model Number Identification. . . . .              | 1  |
| Optional Accessories - Order Separately . . . . . | 7  |
| Sound Data . . . . .                              | 9  |
| Specifications . . . . .                          | 7  |
| TXV Substitution . . . . .                        | 11 |
| TXV Usage. . . . .                                | 11 |

## APPROVALS AND WARRANTY

### APPROVALS

- AHRI Certified to AHRI Standard 210/240-2023
- For AHRI Certified system match-ups and expanded ratings, visit [www.LennoxPros.com](http://www.LennoxPros.com)
- ENERGY STAR® certified
- Sound rated to AHRI Standard 270-2008 test conditions
- Tested in the Lennox Research Laboratory environmental test room
- Rated according to U.S. Department of Energy (DOE) test procedures
- Units and components UL, NEC, and CEC bonded for grounding to meet safety standards for servicing
- ETL certified (U.S. and Canada)
- ISO 9001 Registered Manufacturing Quality System

### WARRANTY

- Compressor:
  - Limited ten years in residential installations
  - Limited five years in non-residential installations
- All other covered components:
  - Limited five years in residential installations
  - Limited one year in non-residential installations

**NOTE** - Refer to Lennox® Basic Limited Warranty at [www.Lennox.com](http://www.Lennox.com) for additional details.

## FEATURES

### APPLICATIONS

- 1.5 through 5 tons
- Sound levels as low as 71 dBA
- Single phase power supply
- Vertical air discharge
- Applicable to indoor air handlers or gas furnaces with indoor add-on coils
- Shipped completely factory assembled, piped and wired
- Factory test operated

**NOTE** - When heat pumps are used with gas furnaces, a dual-fuel compatible thermostat or a zone control system with dual-fuel capabilities must be used (order separately)

**NOTE** - Installer must set outdoor unit, connect refrigerant lines and make electrical connections to complete job

### REFRIGERATION SYSTEM

#### R-410A Refrigerant

- Non-chlorine, ozone friendly
- Unit is factory pre-charged

**NOTE** - Total system refrigerant charge is dependent on outdoor unit size, indoor unit size and refrigerant line length

**NOTE** - Refer to the unit-mounted charging sticker to determine correct amount of charge required

#### 1 Outdoor Coil Fan

- Direct drive fan
- Vertical air discharge
- Totally enclosed fan motor
- PSC motor (018, 024, 030 and 036 models)
- ECM motor (042, 048 and 060 models)
- Inherently protected
- Fan guard constructed of corrosion-resistant PVC (polyvinyl chloride) coated steel

#### 2 Quantum™ Coil

- Lennox designed and fabricated coil
- Enhanced aluminum alloy tube/enhanced fin coil
- Ripple-edged aluminum fins
- Aluminum tube construction
- Lanced fins for maximum fin surface exposure
- Fin collars grip tubing for maximum contact area
- Flared shoulder tubing connections
- Factory tested under high pressure
- Entire coil is accessible for cleaning

#### 3 High Pressure Switch

- Protects the system from high pressure conditions that can be a result of fan failure or a blocked/dirty coil
- Automatic reset

#### 4 Low Pressure Switch

- Shuts off unit if suction pressure falls below setting
- Provides loss of charge and freeze-up protection
- Automatic reset

## FEATURES

### REFRIGERATION SYSTEM (continued)

- 5 Expansion Valve - Outdoor Unit**
  - Designed and sized for heat pump systems
  - Sensing bulb senses evaporator suction temperature during heating cycle
- 6 Four-Way Reversing Valve**
  - Rapid changeover of refrigerant flow direction from cooling to heating and vice versa
  - Operates on pressure differential between outdoor unit and indoor unit of the system
  - Factory installed
- 7 High-Capacity Liquid Line Drier**
  - Factory installed in the liquid line
  - Drier traps moisture or dirt
  - 100% molecular-sieve, bead type, bi-flow drier

### Optional Accessories

#### Check/Expansion Valve Kits

- Field installed on certain indoor units
- See TXV Usage table
- Chatleff style fitting

#### Freezestat

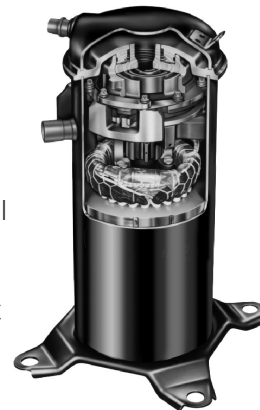
- Senses suction line temperature
- Cycles compressor off when suction line temperature falls below it's setpoint
- Opens at 29°F and closes at 58°F
- Installs on or near the discharge line of the evaporator or on the suction line

#### Refrigerant Line Kits

- Refrigerant lines are shipped refrigeration clean.
- Lines are cleaned, dried, pressurized and sealed at factory
- Suction line fully insulated
- Lines are stubbed at both ends

### COMPRESSOR

- 8 Scroll Compressor**
  - High efficiency with uniform suction flow
  - Constant discharge flow, high volumetric efficiency and quiet operation
  - Low gas pulses during compression reduces operational sound levels
  - Compressor motor is internally protected from excessive current and temperature
  - Compressor is installed in the unit on resilient rubber mounts for vibration free operation



#### Scroll Compressor Operation

- Two involute spiral scrolls matched together generate a series of crescent-shaped gas pockets between them
- During compression, one scroll remains stationary while the other scroll orbits around it
- Gas is drawn into the outer pocket, the pocket is sealed as the scroll rotates
- As the spiral movement continues, gas pockets are pushed to the center of the scrolls. Volume between the pockets is simultaneously reduced
- When the pocket reaches the center, gas is now at high pressure and is forced out of a port located in the center of the fixed scrolls
- During compression, several pockets are compressed simultaneously resulting in a smooth continuous compression cycle
- Continuous flank contact, maintained by centrifugal force, minimizes gas leakage and maximizes efficiency
- Compressor is tolerant to the effects of slugging and contaminants. If this occurs, scrolls separate, allowing liquid or contaminants to be worked toward the center and discharged

#### Crankcase Heater (036, 042, 048, 060 models)

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

- 9 Compressor Sound Dampening System**

- Polyethylene compressor cover
- 2-inch thick batt of fiberglass insulation
- Hook and loop fastening tape on all open edges

### Optional Accessories

#### Compressor Crankcase Heater (018, 024, 030 models)

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

## FEATURES

### CONTROLS

#### 10 Defrost Control

- Time/temperature defrost control is furnished as standard equipment
- Control initiates a defrost cycle every 30, 60 or 90 minutes of compressor "on" time at outdoor coil temperatures below 42°F
- Factory setting is 90 minutes
- Anti-short cycle, timed-off control (5 minutes)
- Compressor delay (30 seconds, field selectable) for cycling the compressor in and out of the defrost mode
- High and low pressure switch monitoring with five-trip lockout
- Two diagnostic LEDs furnished as an aid in troubleshooting.
- Conveniently located in control box

### Optional Accessories

#### E30 Smart Wi-Fi Thermostat

- Wi-Fi enabled, electronic 7-day, universal, multi-stage, programmable, touchscreen thermostat
- 3 Heat/2 Cool
- Auto-changeover
- Controls dehumidification during cooling mode and humidification during heating mode
- Offers enhanced capabilities including humidification / dehumidification / dewpoint measurement and control, Humiditol® control, and equipment maintenance reminders
- Easy to read 7 in. color touchscreen (measured diagonally)
- LCD display with backlight shows the current and set temperature, time, inside relative humidity, system status (operating mode and schedules) and outside temperature (optional outdoor sensor required)
- Smooth Setback Recovery starts system early to achieve setpoint at start of program period
- Compressor short-cycle protection (5 minutes)
- Up to four separate schedules are available plus Schedule IQ™
- One-Touch Away Mode - A quick and easy way to set the cooling and heating setpoints while away
- Smart Away™ - Uses geo-fencing technology to determine when the homeowner is within a predetermined distance from the home to operate the system when leaving, away and arriving
- Wi-Fi remote monitoring and adjustment through a home wireless network for desktop PCs, laptops and apps for smartphones or tablets
- Smart home automation compatible with Apple HomeKit™, Amazon Alexa®, Google Assistant and IFTTT
- Service Dashboard features online real-time monitoring of installed Lennox® smart thermostats



- High Definition Color Display with Subbase, Smart Hub Controller, wallplate (for retrofit installations) furnished for easy installation

**NOTE** - See the Lennox® E30 Smart Wi-Fi Thermostat Product Specifications bulletin for more information

#### Remote Outdoor Temperature Sensor

- Used with the Lennox® E30 Smart Thermostat
- Outdoor sensor allows thermostat to display outdoor temperature
- Sensor is auto-detected when connected to thermostat



**NOTE** - Sensor is required for high and low balance points option.

**NOTE** - Sensor is required for Enhanced Dehumidification Accessory (EDA) applications.

#### Thermostat

- Thermostat is not furnished with unit
- See Lennox Price Book for selection

#### Compressor Hard Start Kit

- Single-phase units are equipped with a PSC compressor motor
- This type of motor normally does not need a potential relay and start capacitor
- In conditions such as low voltage, kit may be required to increase the compressor starting torque

#### Compressor Low Ambient Cut-Off

- Non-adjustable switch (low ambient cut-out) prevents compressor operation when outdoor temperature is below 35°F

#### Indoor Blower Off Delay Relay

- Delays the indoor blower-off time during the cooling cycle

#### Low Ambient Kit

- Heat pump in the cooling mode will operate satisfactorily down to 45°F outdoor air temperature without any additional controls
- Allows unit to operate properly down to 30°F in the cooling mode

**NOTE** - Crankcase heater (optional for -018-024-030 models) and freezestat should be installed on compressors equipped with a low ambient kit

**NOTE** - A compressor lock-out thermostat should be added to terminate compressor operation below recommended operation conditions

#### Mild Weather Kit

- Heat pump units operate satisfactorily in the heating mode at outdoor air temperatures up to 75°F
- Allows heating operation above 75°F

#### Monitor Kit - Service Light

- Ambient compensating thermistor
- Service light thermostat
- For thermostats requiring indicator light inputs

## FEATURES

### **CONTROLS (continued)**

#### Optional Accessories (continued)

##### Outdoor Thermostat Kit

- Outdoor thermostat locks out some of the electric heating elements on indoor units where two-stage control is applicable
- Outdoor thermostat maintains the heating load on the low power input as long as possible before allowing the full power load to come on the line
- Thermostat kit and Mounting Box must be ordered separately

### **11 CABINET**

- Heavy-gauge steel construction
- Pre-painted cabinet finish
- Control box is conveniently located with all controls factory wired
- Corner patch plate allows compressor access
- Drainage holes are provided in base section
- High density polyethylene unit support feet raise the unit off of the mounting surface

##### PermaGuard™ Unit Base

- Durable zinc-coated base section resists rust and corrosion

### **12 SmartHinge Louvered Coil Protection**

- Steel louvered panels provides complete coil protection
- Panels are hinged to allow easy cleaning and servicing of coils
- Panels may be completely removed
- Interlocking tabs and slots assure tight fit on cabinet



##### Refrigerant Line Connections, Electrical Inlets and Service Valves

- ### **13**
- Sweat connection vapor and liquid lines
  - Vapor valve can be fully shut off, while liquid valve may be front seated to manage refrigerant charge while servicing system
  - Refrigerant line connections and field wiring inlets are located in one central area of the cabinet
  - See dimension drawing

#### Optional Accessories

##### Snow Guard

- For use in locations where the possibility of heavy snow or freezing rain accumulation may occur
- Heavy gauge powder coated steel guard
- Deflects snow and ice away from the outdoor fan

## SPECIFICATIONS

| General Data                |                         | Model No.               | EL17XP1-018   | EL17XP1-024   | EL17XP1-030  | EL17XP1-036  |
|-----------------------------|-------------------------|-------------------------|---------------|---------------|--------------|--------------|
| Nominal Tonnage             |                         |                         | 1.5           | 2             | 2.5          | 3            |
| Connections (sweat)         | Liquid line OD - in.    |                         | 3/8           | 3/8           | 3/8          | 3/8          |
|                             | Suction line OD - in.   |                         | 3/4           | 3/4           | 3/4          | 7/8          |
| <sup>1</sup> Refrigerant    |                         | R-410A charge furnished | 5 lbs. 12 oz. | 5 lbs. 10 oz. | 6 lbs 15 oz. | 8 lbs. 3 oz. |
| Outdoor Coil                | Net face area - sq. ft. | Outer coil              | 24.5          | 24.5          | 18.7         | 22.2         |
|                             |                         | Inner coil              | ---           | ---           | 18.0         | 21.5         |
|                             | Tube diameter - in.     |                         | 5/16          | 5/16          | 5/16         | 5/16         |
|                             | No. of rows             |                         | 1             | 1             | 2            | 2            |
|                             | Fins per inch           |                         | 22            | 22            | 22           | 22           |
| Outdoor Fan                 | Diameter - in.          |                         | 22            | 22            | 22           | 26           |
|                             | No. of blades           |                         | 2             | 2             | 2            | 3            |
|                             | Motor hp                |                         | 1/8           | 1/8           | 1/6          | 1/5          |
|                             | Cfm                     |                         | 2840          | 2840          | 2670         | 3590         |
|                             | Rpm                     |                         | 825           | 825           | 825          | 825          |
|                             | Watts                   |                         | 127           | 127           | 162          | 200          |
| Shipping Data - lbs. 1 pkg. |                         |                         | 220           | 220           | 220          | 250          |

## ELECTRICAL DATA

| Line voltage data - 60Hz                                | 208/230V-1ph      | 208/230V-1ph | 208/230V-1ph | 208/230V-1ph |      |
|---|-------------------|--------------|--------------|--------------|------|
| <sup>2</sup> Maximum overcurrent protection (MOCP) amps | 20                | 25           | 25           | 30           |      |
| <sup>3</sup> Minimum circuit ampacity (MCA)             | 13.6              | 15.1         | 15.6         | 17.8         |      |
| Compressor  | Rated load amps   | 10.3         | 11.5         | 11.7         | 13.1 |
|   | Locked rotor amps | 45.7         | 59.5         | 71.3         | 83.1 |
| Outdoor Fan Motor                                       | Full load amps    | 0.7          | 0.7          | 1.0          | 1.4  |

## CONTROLS - ORDER SEPARATELY

|                                   |       |   |   |   |   |
|-----------------------------------|-------|---|---|---|---|
| E30 Smart Wi-Fi Thermostat        | 20A65 | • | • | • | • |
| Remote Outdoor Temperature Sensor | X2658 | • | • | • | • |

## OPTIONAL ACCESSORIES - ORDER SEPARATELY

|  |                                |   |   |   |   |
|--|--------------------------------|---|---|---|---|
| Compressor Crankcase Heater                      | 93M04                          | • | • | • | • |
| Compressor Hard Start Kit                        | LG 88M91                       | • | • |   | • |
|  | Copeland 10J42                 |   |   | • |   |
| Compressor Low Ambient Cut-Off                   | 45F08                          | • | • | • | • |
| Freezestat                                       | 3/8 in. tubing 93G35           | • | • | • | • |
|  | 5/8 in. tubing 50A93           | • | • | • | • |
| Indoor Blower Off Delay Relay                    | 58M81                          | • | • | • | • |
| <sup>4</sup> Low Ambient Kit                     | 54M89                          | • | • | • | • |
| Mild Weather Kit                                 | 11B97                          | • | • | • | • |
| Monitor Kit - Service Light                      | 76F53                          | • | • | • | • |
| Outdoor Thermostat Kit                           | Thermostat 10Z23               | • | • | • | • |
|  | Mounting Box 31461             | • | • | • | • |
| Refrigerant Line Sets                            | 3/8 x 3/4 x 3/8 - 20 ft. 89J56 |   |   |   |   |
| (Liq. x Suc. OD x Insulation Thickness - Length) | 3/8 x 3/4 x 3/8 - 30 ft. 89J57 | • | • | • |   |
|  | 3/8 x 3/4 x 3/8 - 40 ft. 89J58 |   |   |   |   |
|  | 3/8 x 3/4 x 3/8 - 50 ft. 89J59 |   |   |   |   |
|  | 3/8 x 7/8 x 3/8 - 30 ft. 89J60 |   |   |   |   |
|  | 3/8 x 7/8 x 3/8 - 40 ft. 89J61 |   |   |   | • |
|  | 3/8 x 7/8 x 3/8 - 50 ft. 89J62 |   |   |   |   |
| <sup>5</sup> Snow Guard                          | 35-1/2 x 31 in. X8780          | • | • | • |   |

NOTE - Extremes of operating range are plus 10% and minus 5% of line voltage.

<sup>1</sup> Refrigerant charge sufficient for 15 ft. length of refrigerant lines. For longer line set requirements see the Installation Instructions for information about line set length and additional refrigerant charge required.

<sup>2</sup> HACR type breaker or fuse.

<sup>3</sup> Refer to National or Canadian Electrical Code manual to determine wire, fuse and disconnect size requirements.

<sup>4</sup> Crankcase Heater and Freezestat are recommended with Low Ambient Kit.

<sup>5</sup> Adds 11-1/2 inches (292 mm) to unit height.

## SPECIFICATIONS

| General Data                |                         | Model No.               | EL17XP1-042         | EL17XP1-048   | EL17XP1-060   |
|-----------------------------|-------------------------|-------------------------|---------------------|---------------|---------------|
|                             |                         | Nominal Tonnage         | 3.5                 | 4             | 5             |
| Connections (sweat)         | Liquid line OD - in.    |                         | 3/8                 | 3/8           | 3/8           |
|                             | Suction line OD - in.   |                         | 7/8                 | 7/8           | 1-1/8         |
| <sup>1</sup> Refrigerant    |                         | R-410A charge furnished | 9 lbs. 12 oz.       | 8 lbs. 12 oz. | 9 lbs. 14 oz. |
| Outdoor Coil                | Net face area - sq. ft. |                         | Outer coil<br>24.93 | 24.93         | 29.09         |
|                             |                         |                         | Inner coil<br>24.13 | 24.13         | 28.16         |
|                             | Tube diameter - in.     |                         | 5/16                | 5/16          | 5/16          |
|                             | No. of rows             |                         | 2                   | 2             | 2             |
|                             | Fins per inch           |                         | 22                  | 22            | 22            |
| Outdoor Fan                 | Diameter - in.          |                         | 26                  | 26            | 26            |
|                             | No. of blades           |                         | 3                   | 3             | 3             |
|                             | Motor hp                |                         | 1/3                 | 1/3           | 1/3           |
|                             | Cfm                     |                         | 4110                | 4110          | 4060          |
|                             | Rpm                     |                         | 825                 | 825           | 825           |
|                             | Watts                   |                         | 213                 | 213           | 224           |
| Shipping Data - lbs. 1 pkg. |                         |                         | 285                 | 285           | 300           |

## ELECTRICAL DATA

|   |                   |                |              |              |              |
|---|-------------------|----------------|--------------|--------------|--------------|
| Line voltage data - 60Hz                                |                   |                | 208/230V-1ph | 208/230V-1ph | 208/230V-1ph |
| <sup>2</sup> Maximum overcurrent protection (MOCP) amps |                   |                | 40           | 50           | 50           |
| <sup>3</sup> Minimum circuit ampacity (MCA)             |                   |                | 25.9         | 33.9         | 32.5         |
| Compressor  | Rated load amps   |                | 18.6         | 25           | 23.9         |
|   | Locked rotor amps |                | 110          | 120          | 124.5        |
| Outdoor Fan Motor                                       |                   | Full load amps | 2.4 - 2.6    | 2.4 - 2.6    | 2.4 - 2.6    |

## CONTROLS - ORDER SEPARATELY

|                                   |       |   |   |   |
|-----------------------------------|-------|---|---|---|
| E30 Smart Wi-Fi Thermostat        | 20A65 | • | • | • |
| Remote Outdoor Temperature Sensor | X2658 | • | • | • |

## OPTIONAL ACCESSORIES - ORDER SEPARATELY

|  |                            |                           |   |   |   |
|--|----------------------------|---------------------------|---|---|---|
| Compressor Hard Start Kit                        | Copeland                   | 10J42                     | • | • |   |
|  | LG                         | 88M91                     | • |   | • |
| Compressor Low Ambient Cut-Off                   |                            | 45F08                     | • | • | • |
| Freezestat                                       | 3/8 in. tubing             | 93G35                     | • | • | • |
|  | 5/8 in. tubing             | 50A93                     | • | • | • |
| Indoor Blower Off Delay Relay                    |                            | 58M81                     | • | • | • |
| <sup>4</sup> Low Ambient Kit                     |                            | 54M89                     | • | • | • |
| Mild Weather Kit                                 |                            | 11B97                     | • | • | • |
| Monitor Kit - Service Light                      |                            | 76F53                     | • | • | • |
| Outdoor Thermostat Kit                           | Thermostat                 | 10Z23                     | • | • | • |
|  | Mounting Box               | 31461                     | • | • | • |
| Refrigerant Line Sets                            | 3/8 x 7/8 x 3/8 - 30 ft.   | 89J60                     |   |   |   |
|  | 3/8 x 7/8 x 3/8 - 40 ft.   | 89J61                     | • | • |   |
|  | 3/8 x 7/8 x 3/8 - 50 ft.   | 89J62                     |   |   |   |
| (Liq. x Suc. OD x Insulation Thickness - Length) | 3/8 x 1-1/8 x 3/8 - 30 ft. | X0570                     |   |   | • |
|  | 3/8 x 1-1/8 x 3/8 - 50 ft. | 73P91                     |   |   |   |
| <sup>5</sup> Snow Guard                          |                            | 39-1/2 X 35-5/8 in. Y1033 | • | • | • |

NOTE - Extremes of operating range are plus 10% and minus 5% of line voltage.

<sup>1</sup> Refrigerant charge sufficient for 15 ft. length of refrigerant lines. For longer line set requirements see the Installation Instructions for information about line set length and additional refrigerant charge required.

<sup>2</sup> HACR type breaker or fuse.

<sup>3</sup> Refer to National or Canadian Electrical Code manual to determine wire, fuse and disconnect size requirements.

<sup>4</sup> Crankcase Heater and Freezestat are recommended with Low Ambient Kit.

<sup>5</sup> Adds 11-1/2 inches (292 mm) to unit height.

## SOUND DATA

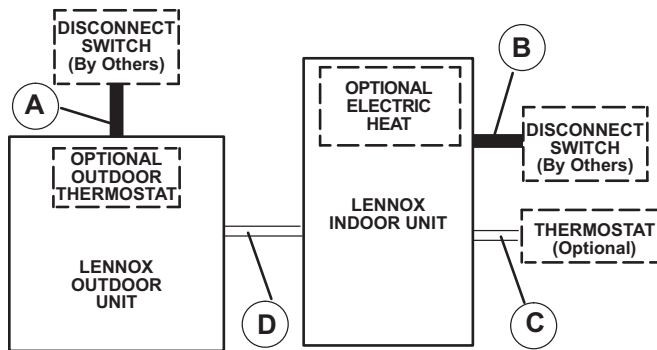
| 1 Model | Octave Band Sound Power Levels dBA, re 10 <sup>-12</sup> Watts<br>Center Frequency - HZ |      |      |      |      |      |      | 1 Sound<br>Rating<br>Number<br>(dBA) | 2 Estimated Sound Pressure Level at<br>Distance From Unit (dBA at distance in ft.) |    |    |    |    |
|---------|---|------|------|------|------|------|------|--------------------------------------|--|----|----|----|----|
|         | 125   | 250  | 500  | 1000 | 2000 | 4000 | 8000 |                                      | 3  | 5  | 10 | 15 | 50 |
| 018     | 56  | 58   | 64.5 | 62.5 | 61.5 | 55   | 49   | 71                                   | 64   | 59 | 53 | 50 | 39 |
| 024     | 55.5  | 58   | 63   | 63.5 | 59   | 55   | 51   | 71                                   | 64   | 59 | 53 | 50 | 39 |
| 030     | 60  | 60   | 65   | 67.5 | 64   | 57   | 49.5 | 71                                   | 64   | 59 | 53 | 50 | 39 |
| 036     | 62  | 61   | 66   | 66.5 | 63   | 57   | 48   | 72                                   | 65   | 60 | 54 | 51 | 40 |
| 042     | 55  | 60   | 66   | 66.5 | 63   | 57   | 50.5 | 72                                   | 65   | 60 | 54 | 51 | 40 |
| 048     | 56  | 61.5 | 67.5 | 68.5 | 63   | 56   | 50   | 73                                   | 66   | 61 | 55 | 52 | 41 |
| 060     | 57  | 64   | 68   | 67   | 65   | 60   | 56   | 73                                   | 66   | 61 | 55 | 52 | 41 |

NOTE - the octave sound power data does not include tonal correction.

<sup>1</sup> Tested according to AHRI Standard 270-2008 test conditions.

<sup>2</sup> Estimated sound pressure level at distance based on AHRI Standard 275-2010 method for equipment located on the ground, roof, or on side of building wall with no adjacent reflective surface within 9.8 feet. Sound pressure levels will increase based on changes to assumptions. For other applications, refer to AHRI Standard 275.

## FIELD WIRING



A - Two Wire Power (see Electrical Data)

B - Two or Three Wire Power (size to heater capacity)

C - Twelve Wire Low Voltage 18 ga. minimum  
Fourteen Wire Low Voltage with Optional Outdoor  
Thermostat

D - Eight Wire Low Voltage 18 ga. minimum  
Ten Wire Low Voltage with Optional Outdoor Thermostat

*NOTE - Field Wiring Not Furnished*

All wiring must conform to NEC or CEC and local  
electrical codes.

## INSTALLATION CLEARANCES

**NOTE** - Service clearance of 30 in. (762 mm) must be maintained on one of the sides adjacent to the control box.

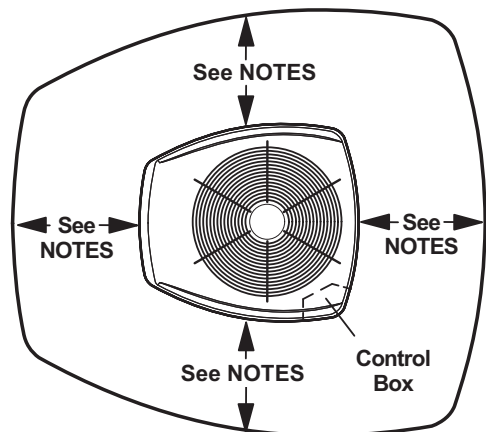
Clearance to one of the other three sides must be 36 in. (914 mm)

Clearance to one of the remaining two sides may be 12 in.

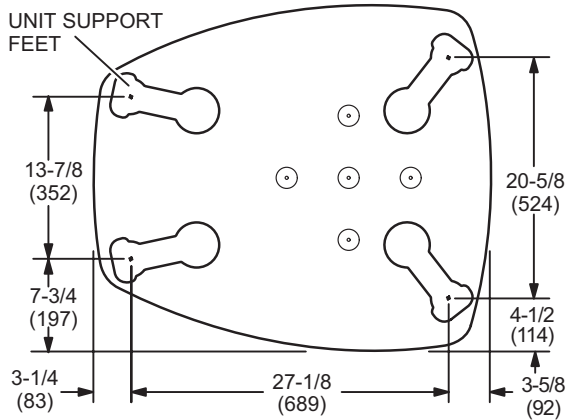
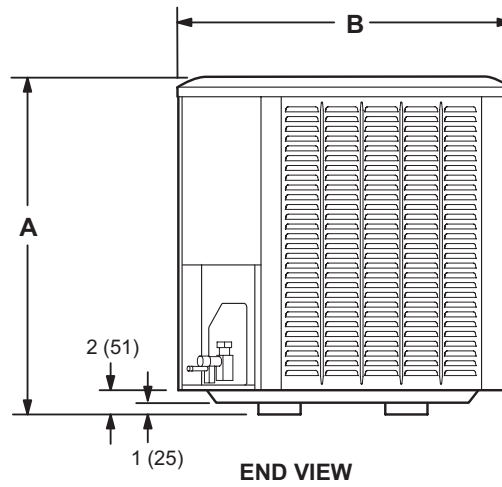
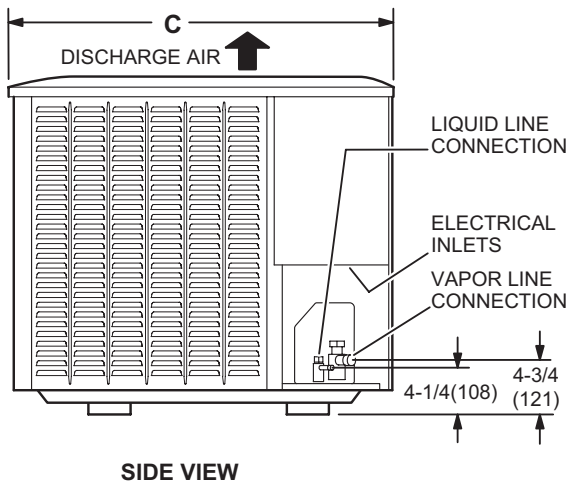
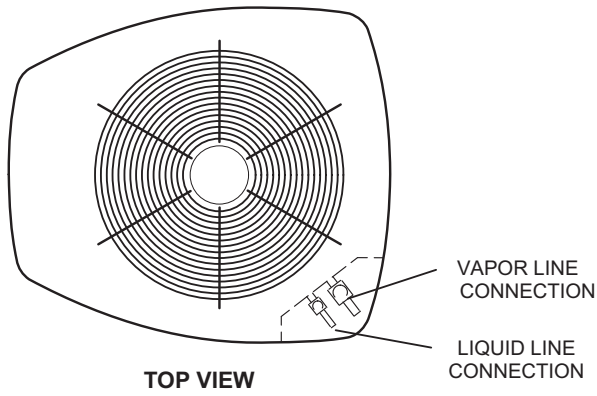
(305 mm) and the final side may be 6 in. (152 mm).

A clearance of 24 in. (610 mm) must be maintained between two units.

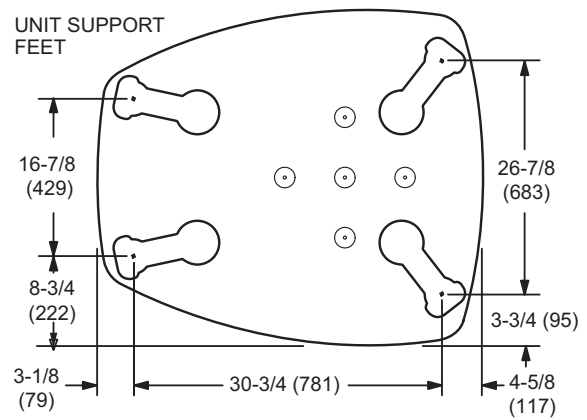
48 in. (1219 mm) clearance required on top of unit.



# DIMENSIONS



**EL17XP1-018 TO -030 BASE SECTION  
(Medium Base)**



**EL17XP1-036 TO -060 BASE SECTION  
(Large Base)**

| Model      | A<br>(Height) |      | B<br>(Width) |     | C<br>(Depth) |      |
|------------|---------------|------|--------------|-----|--------------|------|
|            | in.           | mm   | in.          | mm  | in.          | mm   |
| <b>018</b> | 45            | 1143 | 30-1/2       | 775 | 35           | 889  |
| <b>024</b> | 45            | 1143 | 30-1/2       | 775 | 35           | 889  |
| <b>030</b> | 35            | 889  | 30-1/2       | 775 | 35           | 889  |
| <b>036</b> | 35            | 889  | 35-1/2       | 902 | 39-1/2       | 1003 |
| <b>042</b> | 39            | 991  | 35-1/2       | 902 | 39-1/2       | 1003 |
| <b>048</b> | 39            | 991  | 35-1/2       | 902 | 39-1/2       | 1003 |
| <b>060</b> | 45            | 1143 | 35-1/2       | 902 | 39-1/2       | 1003 |

## TXV USAGE

Use this table for C35, CH23 and CR33 Field Installed TXV Match-Ups

| Model | Order No. |
|-------|-----------|
| 018   | 12J18     |
| 024   | 12J18     |
| 030   | 12J18     |
| 036   | 12J19     |
| 042   | 12J20     |
| 048   | 12J20     |
| 060   | 12J20     |

CX35 and CHX35 coils and all Lennox air handlers are shipped with a factory installed TXV.

C35 coils - Replace the factory installed RFC orifice with the expansion valve listed.

CR33 and CH23 - Use the expansion valve listed.

## AHRI STANDARD 210/240-2023

Standard Ratings relating to cooling or heating capacities shall be net values, including the effects of circulating-fan heat, but not including supplementary electric heat. Power input used for calculating efficiency shall be the Total Power.

Standard Ratings of units which do not have indoor air-circulating fans furnished as part of the model, i.e., Coil-only System, shall be established by subtracting from the total cooling capacity 1,505 Btu/h per 1,000 SCFM, and by adding the same amount to the heating capacity for non-mobile-home, non-Space Constrained units. Total Power for both heating and cooling shall be increased by 441 W per 1,000 SCFM of indoor air circulated.

## TXV SUBSTITUTION

A general guide for replacing the factory installed TXV if the indoor unit (coil/air handler) is larger or smaller than the outdoor unit.

| Outdoor Unit |      | Indoor Unit |       | TXV Furnished | TXV Replacement |
|--------------|------|-------------|-------|---------------|-----------------|
| Size         | Tons | Size        | Tons  |               |                 |
| 018          | 1.5  | 30/36       | 2.5/3 | 12J19         | 12J18           |
| 018          | 1.5  | 36          | 3     | 12J19         | 12J18           |
| 018          | 1.5  | 42          | 3.5   | 12J20         | 12J18           |
| 018          | 1.5  | 48          | 4     | 12J20         | 12J18           |
| 018          | 1.5  | 49          | 4     | 12J20         | 12J18           |
| 018          | 1.5  | 50/60       | 4/5   | 12J20         | 12J18           |
| 018          | 1.5  | 51/61       | 4/5   | 12J20         | 12J18           |
| 018          | 1.5  | 60          | 5     | 12J20         | 12J18           |
| 024          | 2    | 42          | 3.5   | 12J20         | 12J18           |
| 024          | 2    | 48          | 4     | 12J20         | 12J18           |
| 024          | 2    | 49          | 4     | 12J20         | 12J18           |
| 024          | 2    | 50/60       | 5     | 12J20         | 12J18           |
| 024          | 2    | 51/61       | 5     | 12J20         | 12J18           |
| 024          | 2    | 60          | 5     | 12J20         | 12J18           |
| 030          | 2.5  | 42          | 3.5   | 12J20         | 12J18           |
| 030          | 2.5  | 43          | 3.5   | 12J20         | 12J18           |
| 030          | 2.5  | 48          | 4     | 12J20         | 12J18           |
| 030          | 2.5  | 49          | 4     | 12J20         | 12J18           |
| 036          | 3    | 24          | 2     | 12J18         | 12J19           |
| 036          | 3    | 30          | 2.5   | 12J18         | 12J19           |
| 042          | 3.5  | 24          | 2     | 12J18         | 12J20           |
| 042          | 3.5  | 30          | 2.5   | 12J18         | 12J20           |
| 042          | 3.5  | 30/36       | 3     | 12J19         | 12J20           |
| 042          | 3.5  | 36          | 3     | 12J19         | 12J20           |
| 048          | 4    | 30/36       | 2.5/3 | 12J19         | 12J20           |
| 048          | 4    | 36          | 3     | 12J19         | 12J20           |

### TXV Ranges:

**12J18** - 1.5 to 2.5 ton systems - Use on 2.5 ton (030) and lower systems.

**12J19** - 3 ton systems - Use down to 2 ton (024) systems.

**12J20** - 3.5 to 5 ton systems - Use down to 3 ton (036) systems.

## REVISIONS

| Sections       | Description of Change       |
|----------------|-----------------------------|
| Specifications | Updated Refrigerant values. |



Visit us at [www.Lennox.com](http://www.Lennox.com)

For the latest technical information, [www.LennoxPros.com](http://www.LennoxPros.com)

Contact us at 1-800-9-LENNOX

NOTE - Due to Lennox' ongoing commitment to quality, Specifications, Ratings and Dimensions subject to change without notice and without incurring liability. Improper installation, adjustment, alteration, service or maintenance can cause property damage or personal injury. Installation and service must be performed by a qualified installer and servicing agency.

©2023 Lennox Industries, Inc.