

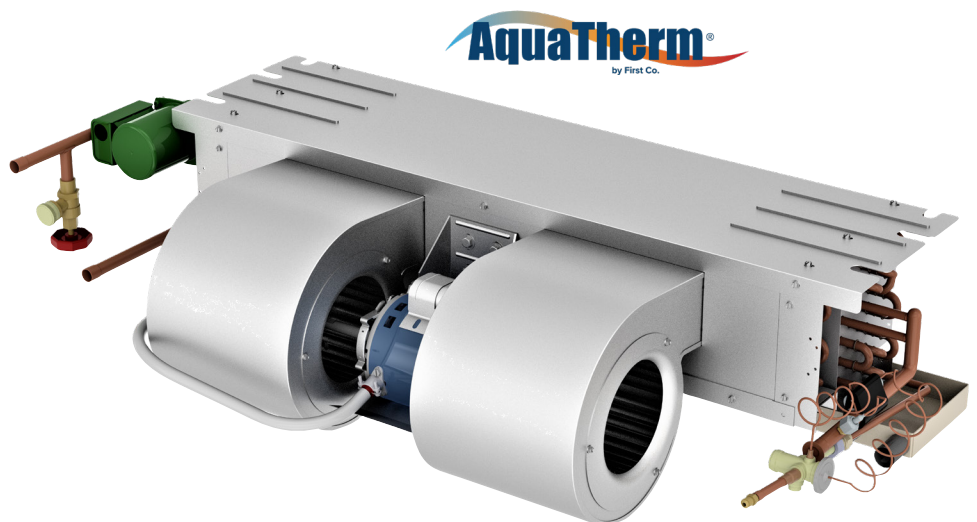
*First Co.*

# CDX SERIES

CDXW/X • CDXQ/X • CDXR/X  
Ceiling Fan Coils

**Compatible with R410A  
For Servicing Existing Equipment Only**

Horizontal Recessed  
HW Coils, Standard Pump, Hi Flow Pump  
1.5 thru 3 Tons Cooling  
Up to 51,700 BTUH HW Heat



**AHRI CERTIFIED**  
www.ahridirectory.org

Unitary Small AC  
AHRI Standard 210/240  
Certification applies only when the complete system  
is listed with AHRI.

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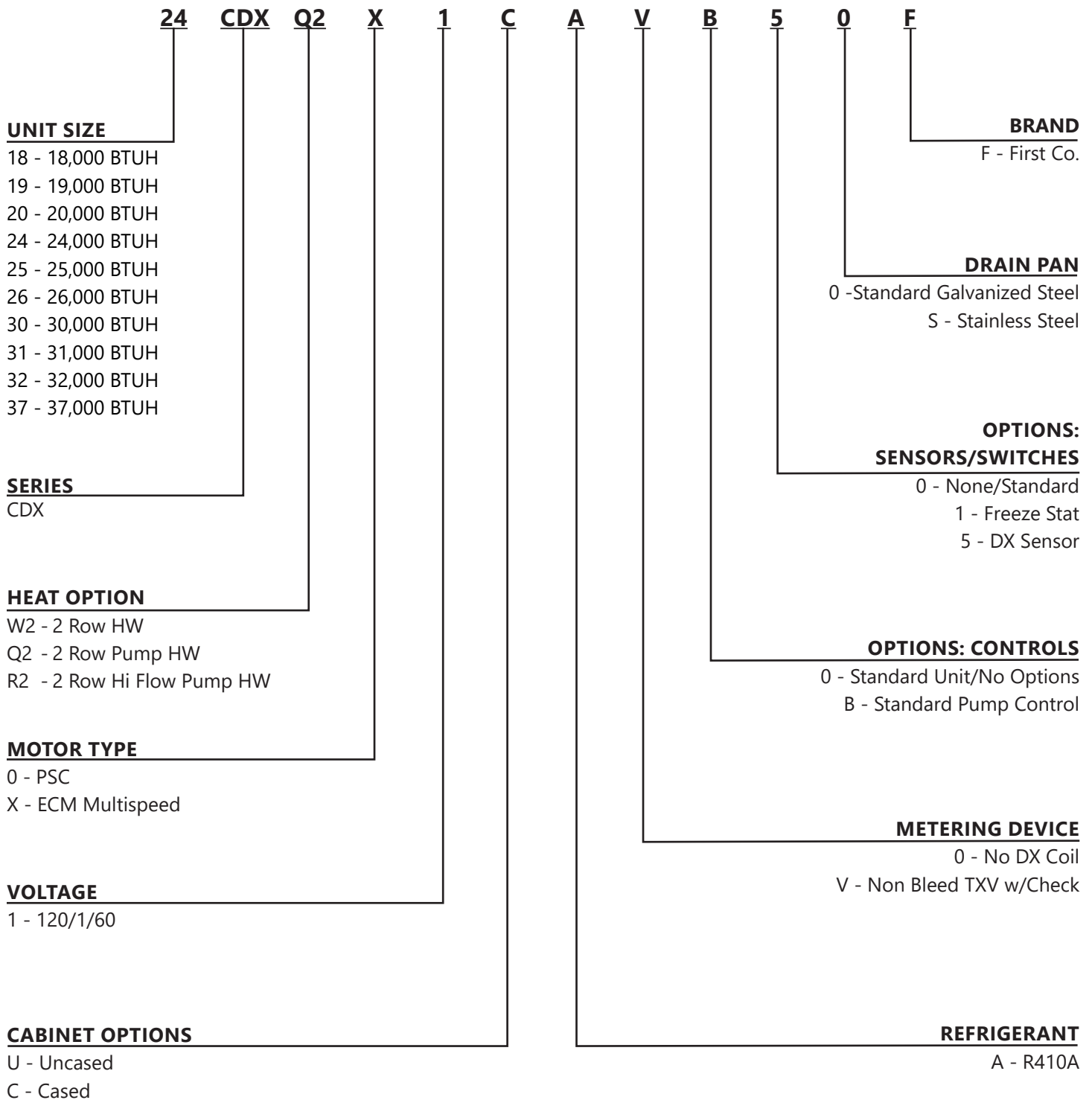
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First Co.'s customer is ultimately responsible for confirming which fan coil models are compatible with selected outdoor unit(s) and which expansion valves (if any) are required. To determine certified indoor/outdoor combinations, go to [www.firstco.com](http://www.firstco.com) or contact the factory.

In keeping with its policy of continuous progress and product improvement, First Co. reserves the right to make changes without notice.

# NOMENCLATURE

## FULL SERIES NOMENCLATURE



*Model specific nomenclature presented at each respective section of document.*

First Co.'s customer is ultimately responsible for confirming which fan coil models are compatible with selected outdoor unit(s) and which expansion valves (if any) are required. To determine certified indoor/outdoor combinations, go to [www.AHRInet.org](http://www.AHRInet.org).

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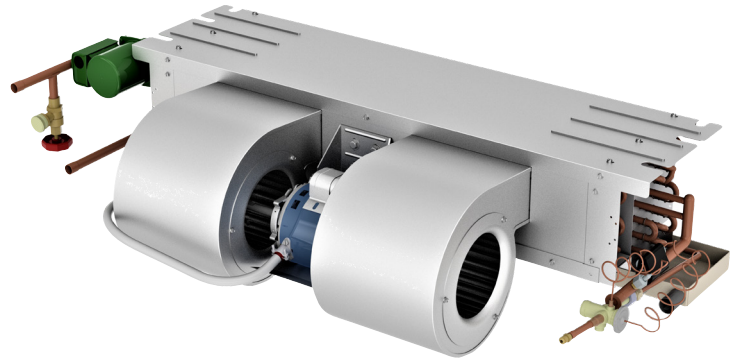
# CDX SERIES

## CEILING FAN COILS

The space-saving CDX fan coil is only 10" high (11" with enclosure) thus allowing it to recess in a ceiling. Recessed ceiling fan coils save valuable floor space and eliminate costly "equipment" closets.

All CDX fan coils include a 120/24V transformer and are completely prewired. A sloped drain pan allows positive drainage of condensate.

These fan coils are compatible with any source of hot water that does not exceed 180°F, and is NSF/ANSI certified for use with domestic water.



## STANDARD FEATURES

- Factory installed service switch
- Freeze protector on HW coil
- Freeze protector on DX coil
- Two-speed fan operation
- Drain pan has 3/4" NPT primary and secondary (overflow) fittings
- 120V motor, 24V controls
- Highly efficient copper tube/aluminum fin heating and cooling coils. Cooling coils are compatible with R454B, R32 using non-bleed TXVs or piston type metering devices.
- Units ordered for R454B (Option B) and R32 (Option C) are factory configured with TXV or piston and factory installed refrigerant sensor.
- Insulated and coated galvanized steel drain pan is sloped for proper drainage.
- Effective January 2016, cabinet air leakage is no more than 2% when tested in accordance with ASHRAE 193.

## OPTIONAL ACCESSORIES

- Attractive off-white return air / access panel with captive screws (panels can be field painted)
- IAQ filter panels
- Fully insulated enclosure with matching ceiling panel allows for ducted return air. Enclosure can be pre-installed.
- Condensate overflow switch (field installed) (# SS3)

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# CDX SERIES

## CEILING FAN COILS

### OPTIONAL ACCESSORIES (CONT'D)

| EXPANSION VALVE KITS (HEAT PUMP OR COOLING ONLY) |   |
|--|---|
| PART NUMBER                                      | DESCRIPTION   |
| 9EVR410-6  | CDX 410A TXV (For servicing existing 410A equipment only) |

**NOTES:**

1. Above expansion valve kits are approved for both cooling only (non heat pump) or heat pumps applications.
2. Valves are non-bleed type. Field added. Hard start kit may be required.
3. Valves have screw-on connections.

### CONTROL FEATURES

#### WHEN "B" IS SELECTED FOR STANDARD PUMP CONTROL

#### MULTI-FUNCTION MICRO-PROCESSOR CIRCUIT BOARD WITH:

- Automatic pump timer (heating mode) - purge mode (60 seconds every 6 hours)
- Blower-on fan delay (heating mode) - preheats HW coil for 45 seconds
- Blower-off fan delay (heating and cooling modes) Blower continues to operate for 15 seconds after thermostat is satisfied for increased efficiency.

# CDX SERIES

## CEILING FAN COILS

### CEILING ACCESS PANELS

| CEILING ACCESS PANELS |                  |                 |              |                       |        |                            |        |
|-----------------------|------------------|-----------------|--------------|-----------------------|--------|----------------------------|--------|
| FOR MODEL             | PANEL NO. (STD.) | PANEL NO. (IAQ) | DESCRIPTION  | CEILING PANEL OPENING |        | PANEL FRAME DIMS (OUTSIDE) |        |
| 18/19CDX              | 966              | 966-M8          | LOUVERED     | 24-1/2                | 46     | 27-1/2                     | 49     |
|                       | 966-1            | NA              | NON-LOUVERED | 24-1/2                | 46     | 27-1/2                     | 49     |
| 20/24/25CDX           | 967              | 967-M8          | LOUVERED     | 24-1/2                | 52-1/2 | 27-1/2                     | 55-1/2 |
|                       | 967-1            | NA              | NON-LOUVERED | 24-1/2                | 52-1/2 | 27-1/2                     | 55-1/2 |
| 26/30/31CDX           | 967-6            | 967-6-M8        | LOUVERED     | 24-1/2                | 60     | 27-1/2                     | 63     |
|                       | 967-7            | NA              | NON-LOUVERED | 24-1/2                | 60     | 27-1/2                     | 63     |
| 32/36/37CDX           | 967-8            | 967-8-MA        | LOUVERED     | 24-1/2                | 67     | 27-1/2                     | 70     |
|                       | 967-5            | NA              | NON-LOUVERED | 24-1/2                | 67     | 27-1/2                     | 70     |



**SOLID**  
# 965-1, 966-1, 967-1, 967-7

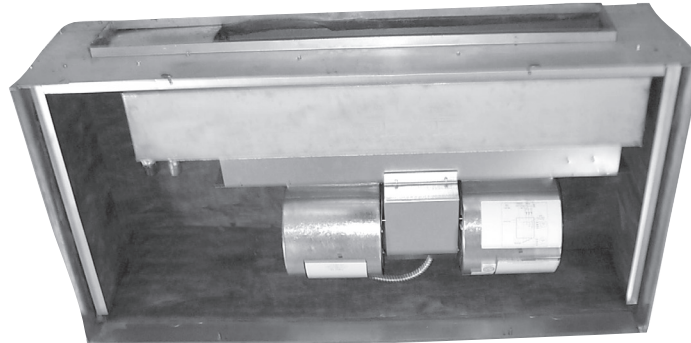
**LOUVERED**  
# 965, 966, 967, 967-6  
(Louvers may differ from picture).  
Louvered panels accept 20x20x1" filter  
(field supplied).

**# 966-M8, 967-M8**  
(accepts 2-20x20x1 filter)  
**# 967-6-M8**  
(accepts 2-20x25x1 filter)  
**# 967-8-M8**  
(accepts 2-20x30x1 filter)  
GlasFloss® Industries Series HV filter or  
equivalent is recommended.

# CDX SERIES

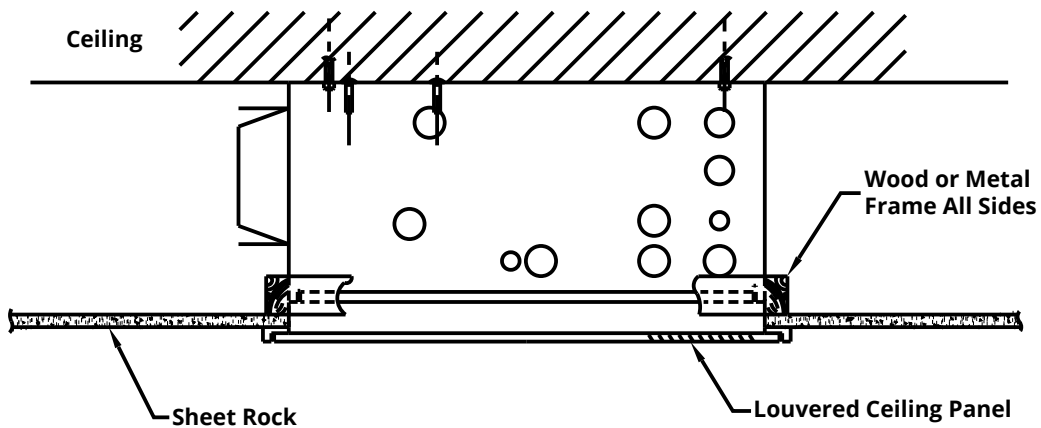
CEILING FAN COILS

## ENCLOSURE DATA

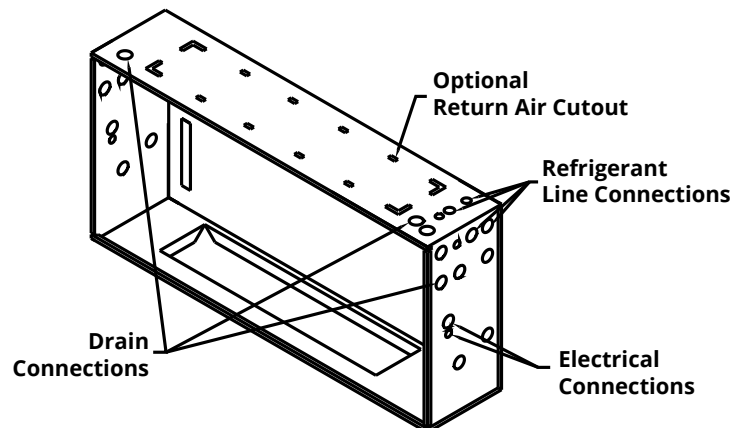


Picture shown is a CDX-C model (available from the factory as a complete unit).

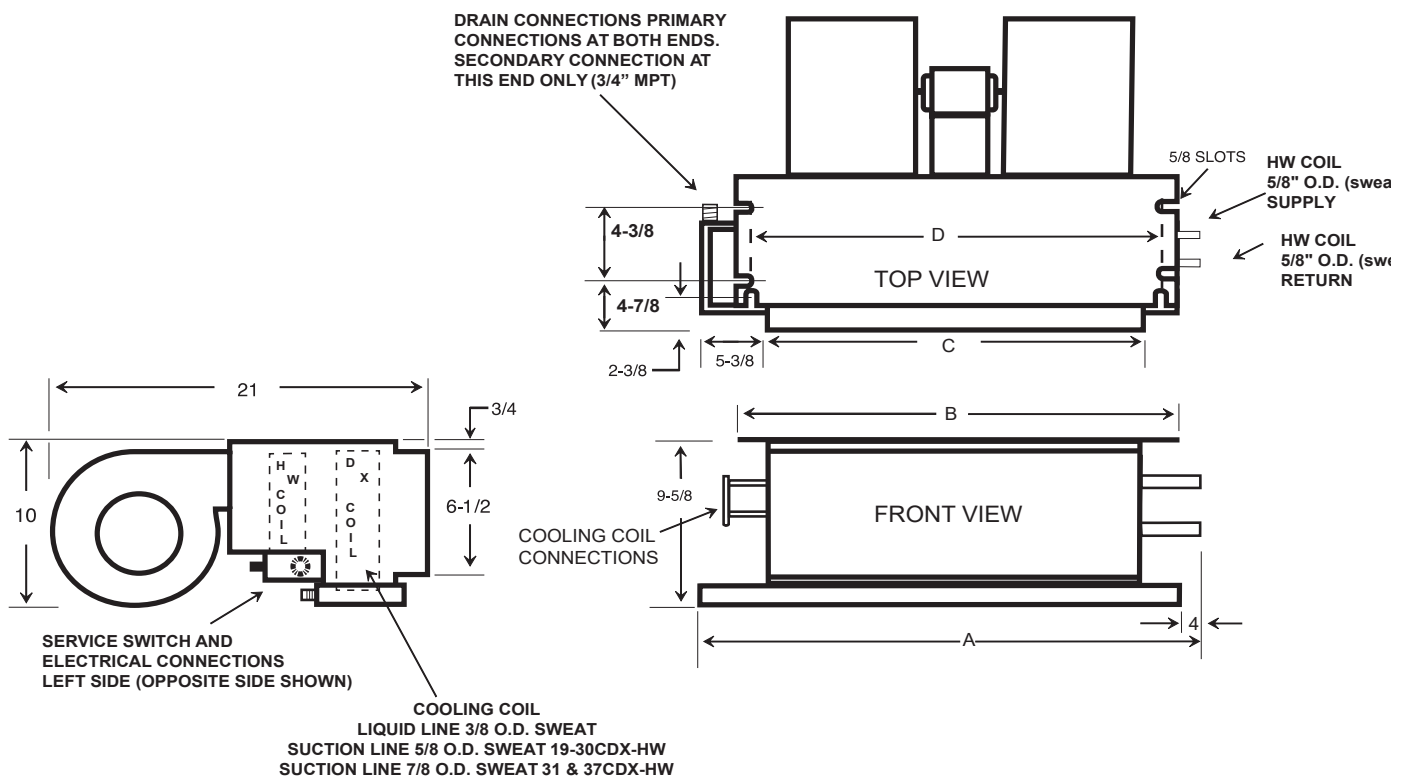
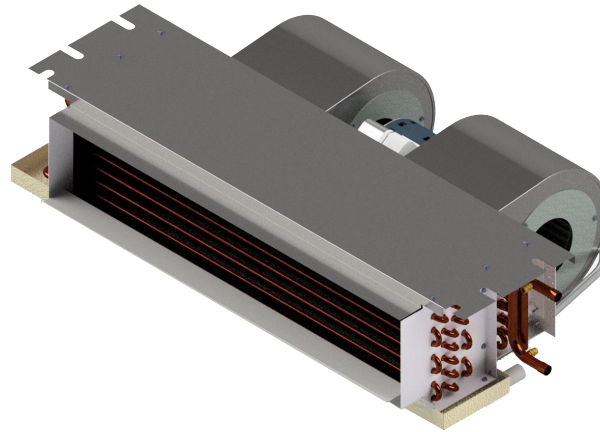
## ENCLOSURE INSTALLATION SUPPORT FRAMING



## ENCLOSURE CONNECTION LOCATIONS



## UNCASED VERSION

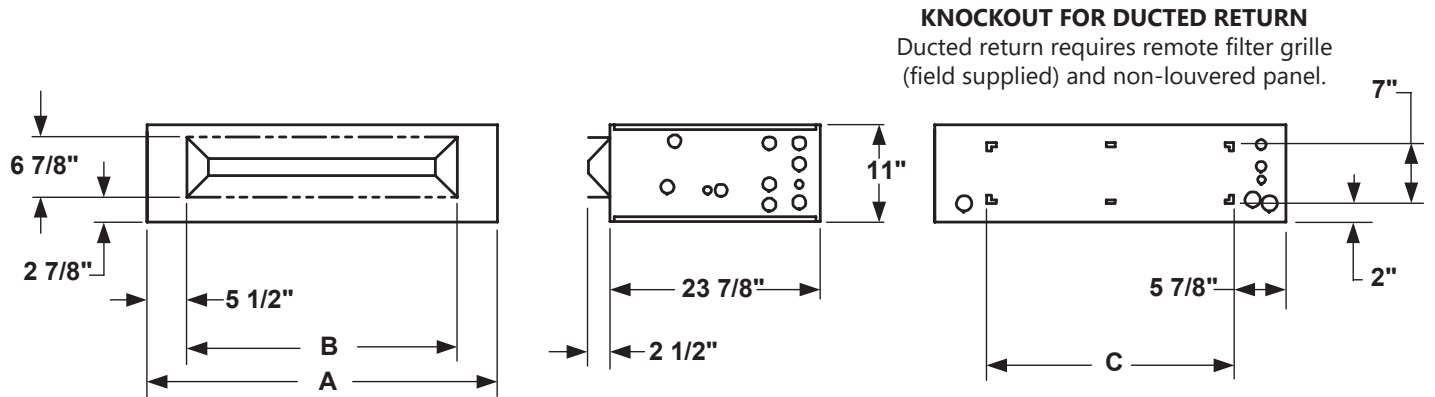


### PHYSICAL DIMENSIONS

| UNIT MODEL  | A      | B      | C      | D      |
|-------------|--------|--------|--------|--------|
| 18/19CDX    | 38-1/8 | 37-1/4 | 30-1/8 | 34-3/4 |
| 20/24/25CDX | 44-1/8 | 43-1/4 | 36-1/8 | 40-3/4 |
| 26/30/31CDX | 50-1/8 | 49-1/4 | 42-1/8 | 46-3/4 |
| 32/36/37CDX | 57-1/8 | 56-1/4 | 49-1/8 | 53-3/4 |



## CASED VERSION



| ENCLOSURE DIMENSIONS |             |        |        |        | PANEL NO. (STD.) | PANEL NO. (IAQ) | DESCRIPTION  | CEILING PANEL OPENING |        | PANEL FRAME DIMS (OUTSIDE) |        |
|----------------------|-------------|--------|--------|--------|------------------|-----------------|--------------|-----------------------|--------|----------------------------|--------|
| FOR MODEL            | ENCLOSURE   | A      | B      | C      |                  |                 |              | W                     | L      | W                          | L      |
| 18/19CDX             | 9ECDX01 (1) | 45-3/4 | 30-7/8 | 34     | 966              | 966-M8          | LOUVERED     | 24-1/2                | 46     | 27-1/2                     | 49     |
|                      |             |        |        |        | 966-1            | NA              | NON LOUVERED | 24-1/2                | 46     | 27-1/2                     | 49     |
| 20/24/25CDX          | 9ECDX02 (1) | 51-3/4 | 36-7/8 | 40     | 967              | 967-M8          | LOUVERED     | 24-1/2                | 52-1/2 | 27-1/2                     | 55-1/2 |
|                      |             |        |        |        | 967-1            | NA              | NON LOUVERED | 24-1/2                | 52-1/2 | 27-1/2                     | 55-1/2 |
| 26/30/31CDX          | 9ECDX03 (1) | 58-1/2 | 42-7/8 | 46-3/4 | 967-6            | 967-6-M8        | LOUVERED     | 24-1/2                | 60     | 27-1/2                     | 63     |
|                      |             |        |        |        | 967-7            | NA              | NON LOUVERED | 24-1/2                | 60     | 27-1/2                     | 63     |
| 32/36/37CDX          | 9ECDX04 (1) | 66-1/2 | 49-7/8 | 54-3/4 | 967-8            | 967-8-M8        | LOUVERED     | 24-1/2                | 67     | 27-1/2                     | 70     |
|                      |             |        |        |        | 967-5            | NA              | NON LOUVERED | 24-1/2                | 67     | 27-1/2                     | 70     |

## CDX SERIES – WITH PSC MOTOR

| BLOWER DATA - ALL CDX MODELS WITH PSC MOTOR |           |      |                 |                           |                      |                                      |      |      |      |      |      |      |      |
|---|-----------|------|-----------------|---------------------------|----------------------|--------------------------------------|------|------|------|------|------|------|------|
| UNIT MODEL                                  | MOTOR (1) |      | MOTOR HP (120V) | MIN. CKT. AMPACITY (120V) | MAX. CKT. PROTECTION | CFM vs. EXTERNAL STATIC PRESSURE (3) |      |      |      |      |      |      |      |
|   | RPM       | AMPS |                 |                           |                      | 0.05                                 | 0.10 | 0.15 | 0.20 | 0.25 | 0.30 | 0.35 | 0.40 |
| <b>18/19/20CDX</b>                          | 1550      | 2.3  | 1/5             | 3                         | 15                   | 710                                  | 680  | 650  | 620  | 590  | 560  | 530  | 500  |
| <b>24/25/26CDX</b>                          | 1550      | 3.6  | 1/4             | 5                         | 15                   | 880                                  | 840  | 800  | 760  | 720  | 680  | 640  | 600  |
| <b>30/31CDX</b>                             | 1550      | 4.6  | 1/5             | 6                         | 15                   | 1100                                 | 1060 | 1020 | 980  | 930  | 880  | 830  | 780  |
| <b>32CDX</b>                                | 1550      | 4.6  | 1/5             | 6                         | 15                   | 1160                                 | 1130 | 1095 | 1060 | 1025 | 990  | 950  | 910  |
| <b>36/37CDX</b>                             | 1550      | 4.6  | 1/5             | 6                         | 15                   | 1310                                 | 1260 | 1210 | 1160 | 1110 | 1060 | 1000 | 940  |

**NOTES:**

1. Units should not be applied to a system with less than 350 CFM/Ton airflow.
2. Motors are 120V and operate on high speed for cool and low speed for heating.
3. CFM vs. static at high motor speed.
4. Add .05 static when enclosure and/or ceiling panel is used.
5. 31, 32 and 37 CDXW have two motors and four blowers.

## CDX SERIES – WITH ECM MOTOR

| BLOWER DATA - ALL CDX MODELS WITH ECM MOTOR |          |               |           |      |            |                                  |      |      |      |      |      |      |
|---|----------|---------------|-----------|------|------------|----------------------------------|------|------|------|------|------|------|
| MODEL                                       | MOTOR HP | SPEED TAP     | TAP COLOR | BHP  | MOTOR AMPS | CFM vs. EXTERNAL STATIC PRESSURE |      |      |      |      |      |      |
|   |          |               |           |      |            | 0.10                             | 0.15 | 0.20 | 0.25 | 0.30 | 0.35 | 0.40 |
| 18/19/20CDX*X                               | 1/2      | OPTIONAL HIGH | GREEN     | 0.22 | 2.8        | 760                              | 745  | 730  | 715  | 700  | 685  | 670  |
|   |          | STD. HIGH     | ORANGE    | 0.17 | 2.1        | 670                              | 650  | 630  | 615  | 600  | 588  | 570  |
|   |          | STD. LOW      | YELLOW    | 0.14 | 1.6        | 570                              | 555  | 540  | 520  | 500  | 480  | ---  |
| 24/25/26CDX*X                               | 1/2      | OPTIONAL HIGH | WHITE     | 0.30 | 3.8        | 980                              | 960  | 940  | 920  | 900  | 875  | 850  |
|   |          | STD. HIGH     | GREEN     | 0.25 | 3.0        | 890                              | 870  | 850  | 830  | 810  | 790  | 770  |
|   |          | STD. LOW      | ORANGE    | 0.21 | 2.5        | 800                              | 775  | 750  | 725  | 700  | 675  | ---  |
|   |          | OPTIONAL LOW  | YELLOW    | 0.18 | 2.0        | 730                              | 710  | 690  | 670  | 650  | 630  | ---  |
| 30/31CDX*X                                  | 1/2      | OPTIONAL HIGH | WHITE     | 0.40 | 4.7        | 1160                             | 1145 | 1130 | 1115 | 1100 | 1080 | 1060 |
|   |          | STD. HIGH     | GREEN     | 0.33 | 3.8        | 1060                             | 1040 | 1020 | 1105 | 990  | 975  | 960  |
|   |          | STD. LOW      | ORANGE    | 0.28 | 3.2        | 970                              | 955  | 940  | 920  | 900  | 880  | 860  |
|   |          | OPTIONAL LOW  | YELLOW    | 0.23 | 2.6        | 870                              | 850  | 830  | 810  | 790  | 770  | ---  |
| 32CDX*X                                     | 1/2      | OPTIONAL HIGH | WHITE     | 0.39 | 4.8        | 1220                             | 1200 | 1180 | 1155 | 1125 | 1095 | 1065 |
|   |          | STD. HIGH     | GREEN     | 0.27 | 3.2        | 1030                             | 1005 | 985  | 960  | 940  | 920  | 900  |
|   |          | STD. LOW      | ORANGE    | 0.22 | 2.5        | 905                              | 885  | 860  | 840  | 820  | 800  | ---  |
|   |          | OPTIONAL LOW  | YELLOW    | 0.16 | 1.8        | 725                              | 705  | 685  | 670  | 650  | 630  | ---  |
| 36/37CDX*X                                  | 1/2 (2)  | OPTIONAL HIGH | WHITE     | 0.45 | 5.6        | 1380                             | 1360 | 1340 | 1320 | 1300 | 1280 | 1260 |
|   |          | STD. HIGH     | GREEN     | 0.38 | 4.7        | 1290                             | 1270 | 1250 | 1225 | 1200 | 1175 | 1150 |
|   |          | STD. LOW      | ORANGE    | 0.31 | 3.7        | 1130                             | 1105 | 1080 | 1055 | 1030 | 1010 | ---  |
|   |          | OPTIONAL LOW  | YELLOW    | 0.26 | 3.0        | 1000                             | 975  | 950  | 920  | 890  | 875  | ---  |

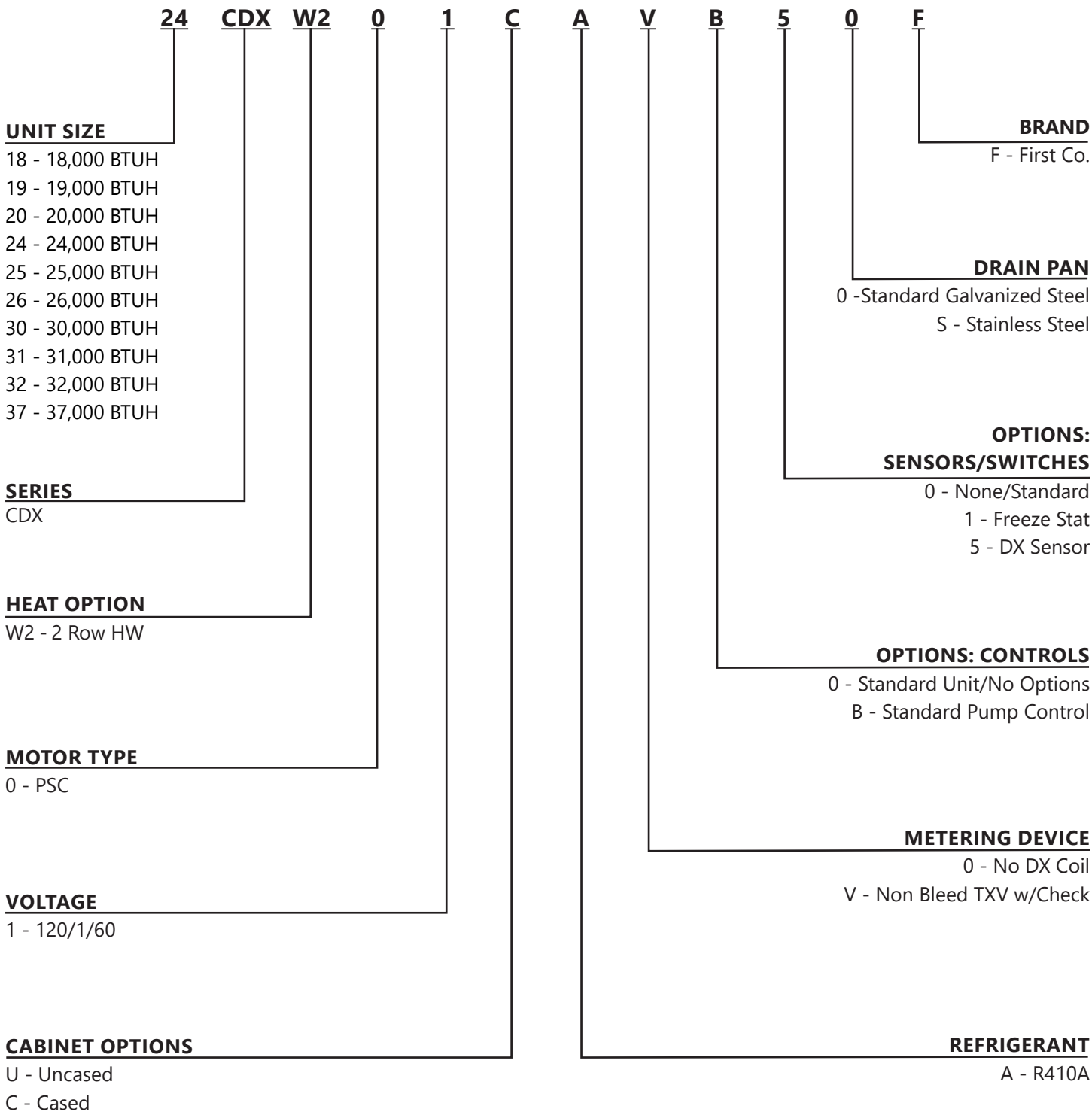
**NOTES:**

1. Units should not be applied to a system with less than 350 CFM/Ton airflow.
2. Shaded speeds are factory settings.
3. Add .05 static when enclosure and/or ceiling panel is used.
4. 37 CDXX has two motors and four blowers.

# CDX SERIES

HOT WATER COIL W/PSC MOTOR, NO PUMP

# CDXW



# CDX SERIES

HOT WATER COIL W/PSC MOTOR, NO PUMP

**CDXW**

DATA TABLE

## CDX SERIES – WITH HOT WATER COILS

PSC MOTOR WITH HOT WATER COILS, NO PUMP

| PERFORMANCE DATA CDXW |                      |                       |   |     |       |     |       |     |
|-----------------------|----------------------|-----------------------|---|-----|-------|-----|-------|-----|
| UNIT MODEL            | NOMINAL COOLING BTUH | PRESS. DROP (FT. WTR) | BTUH (1000) AT ENTERING WATER TEMPERATURE Delta -T 20°F & GPM |     |       |     |       |     |
|                       |                      |                       | 120°F   | GPM | 140°F | GPM | 180°F | GPM |
| 18/19CDXW             | 18,000               | 0.7                   | 10.3  | 1.0 | 14.4  | 1.4 | 22.6  | 2.3 |
|                       |                      | 2.0                   | 12.0  | 1.2 | 16.8  | 1.7 | 26.4  | 2.6 |
|                       |                      | 3.3                   | 12.9  | 1.3 | 18.0  | 1.8 | 28.3  | 2.8 |
| 20CDXW                | 18,000               | 0.8                   | 10.9  | 1.1 | 15.3  | 1.5 | 24.0  | 2.4 |
|                       |                      | 2.1                   | 12.9  | 1.3 | 18.0  | 1.8 | 28.3  | 2.8 |
|                       |                      | 4.1                   | 13.7  | 1.4 | 19.2  | 1.9 | 30.2  | 3.0 |
| 24/25CDXW             | 24,000               | 2.1                   | 14.7  | 1.5 | 20.6  | 2.1 | 32.4  | 3.2 |
|                       |                      | 4.1                   | 15.9  | 1.6 | 22.2  | 2.2 | 34.9  | 3.5 |
|                       |                      | 6.6                   | 16.5  | 1.7 | 23.1  | 2.3 | 36.3  | 3.6 |
| 26CDXW                | 24,000               | 2.2                   | 15.7  | 1.6 | 22.0  | 2.2 | 34.6  | 3.5 |
|                       |                      | 4.3                   | 17.0  | 1.7 | 23.8  | 2.4 | 37.4  | 3.7 |
|                       |                      | 6.8                   | 17.6  | 1.8 | 24.7  | 2.5 | 38.8  | 3.9 |
| 30/31CDXW             | 30,000               | 2.2                   | 17.3  | 1.7 | 24.2  | 2.4 | 38.0  | 3.8 |
|                       |                      | 4.3                   | 18.8  | 1.9 | 26.3  | 2.6 | 41.3  | 4.1 |
|                       |                      | 6.8                   | 19.6  | 2.0 | 27.5  | 2.8 | 43.2  | 4.3 |
| 32CDXW                | 30,000               | 2.8                   | 18.4  | 1.8 | 25.8  | 2.6 | 40.5  | 4.1 |
|                       |                      | 5.4                   | 20.1  | 2.0 | 28.2  | 2.8 | 44.3  | 4.4 |
|                       |                      | 8.5                   | 21.1  | 2.1 | 29.5  | 3.0 | 46.4  | 4.6 |
| 36/37CDXW             | 36,000               | 2.8                   | 19.7  | 2.0 | 27.6  | 2.8 | 43.4  | 4.3 |
|                       |                      | 5.4                   | 21.7  | 2.2 | 30.4  | 3.0 | 47.8  | 4.8 |
|                       |                      | 8.5                   | 22.8  | 2.3 | 31.9  | 3.2 | 50.1  | 5.0 |

**NOTES:**

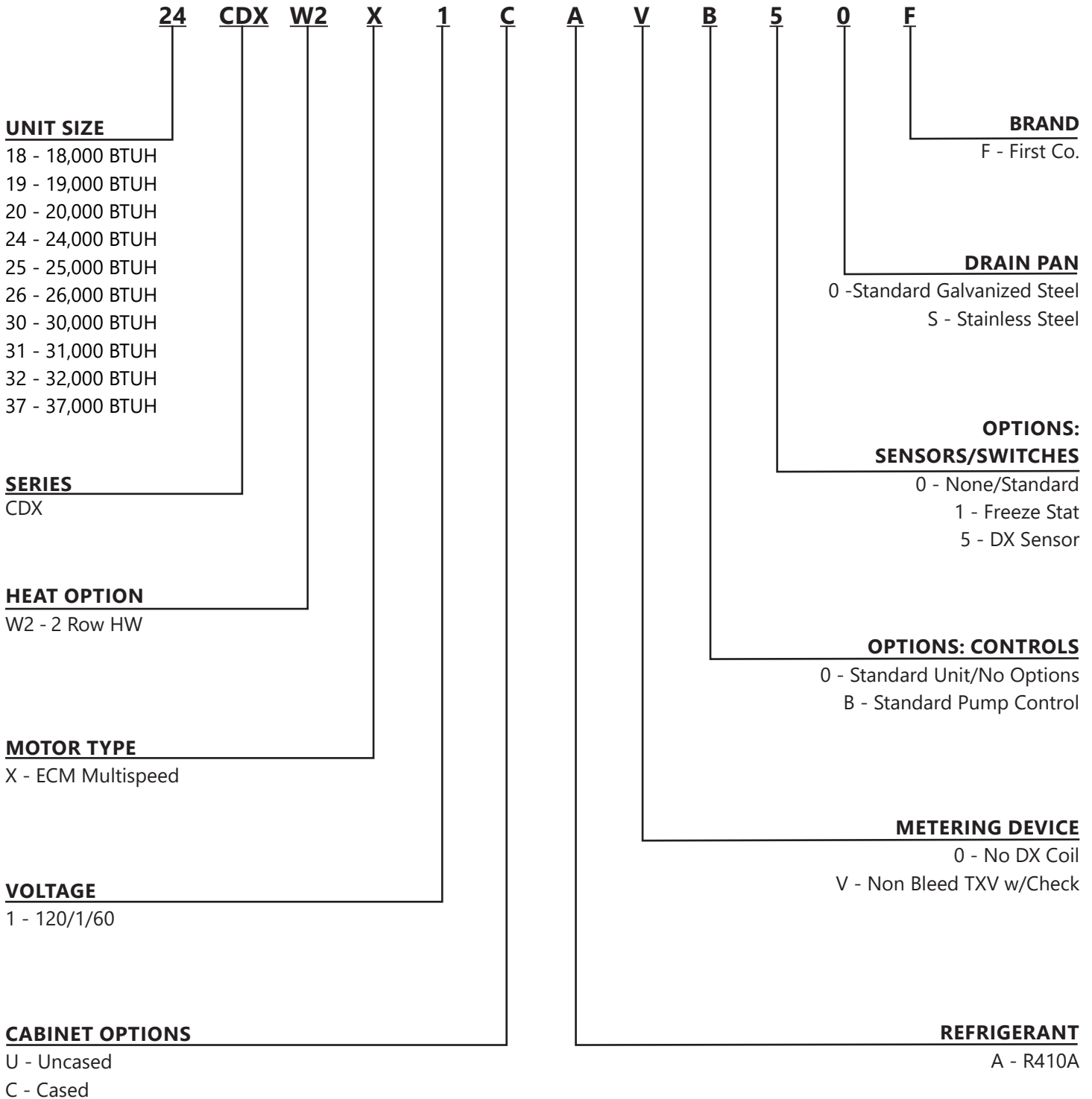
1. Heat BTUH is at 70° F EAT.
2. Based on 20°F Delta - T. Velocity not to exceed 4ft./sec.
3. 120 degree and 180 degree data is supplied for boiler applications.
4. Heating BTUH output will not exceed output of water heater.
5. Approved for installation with 0" clearance to combustible material.
6. Use capacities when First Co. "Flow Control Module" is used (# 940-3CV).
7. Freeze protection standard on hot water and DX coils.

| ELECTRICAL DATA CDXW |           |      |                 |                           |                      |
|----------------------|-----------|------|-----------------|---------------------------|----------------------|
| UNIT MODEL           | MOTOR (1) |      | MOTOR HP (120V) | MIN. CKT. AMPACITY (120V) | MAX. CKT. PROTECTION |
|                      | RPM       | AMPS |                 |                           |                      |
| 18/19/20CDXW         | 1550      | 2.3  | 1/5             | 3                         | 15                   |
| 24/25/26CDXW         | 1550      | 3.6  | 1/4             | 5                         | 15                   |
| 30/31CDXW            | 1550      | 4.6  | 1/5             | 6                         | 15                   |
| 32CDXW               | 1550      | 4.6  | 1/5             | 6                         | 15                   |
| 36/37CDXW            | 1550      | 4.6  | 1/5             | 6                         | 15                   |

# CDX SERIES

HOT WATER COIL W/ECM MOTOR, NO PUMP

# CDXWX



# CDX SERIES

HOT WATER COIL W/ECM MOTOR, NO PUMP

# CDXWX

DATA TABLES

## CDX SERIES - WITH HOT WATER COILS

ECM MOTOR WITH HOT WATER COILS, NO PUMP

| PERFORMANCE DATA CDXWX |                      |                       |   |     |       |     |       |     |
|------------------------|----------------------|-----------------------|---|-----|-------|-----|-------|-----|
| UNIT MODEL             | NOMINAL COOLING BTUH | PRESS. DROP (FT. WTR) | BTUH (1000) AT ENTERING WATER TEMPERATURE<br>Delta-T-20°F & GPM |     |       |     |       |     |
|                        |                      |                       | 120°F   | GPM | 140°F | GPM | 180°F | GPM |
| 18/19CDXWX             | 18,000               | 0.7                   | 10.3  | 1.0 | 14.4  | 1.4 | 22.6  | 2.3 |
|                        |                      | 2.0                   | 12.0  | 1.2 | 16.8  | 1.7 | 26.4  | 2.6 |
|                        |                      | 3.3                   | 12.9  | 1.3 | 18.0  | 1.8 | 28.3  | 2.8 |
| 20CDXWX                | 18,000               | 0.8                   | 10.9  | 1.1 | 15.3  | 1.5 | 24.0  | 2.4 |
|                        |                      | 2.1                   | 12.9  | 1.3 | 18.0  | 1.8 | 28.3  | 2.8 |
|                        |                      | 4.1                   | 13.7  | 1.4 | 19.2  | 1.9 | 30.2  | 3.0 |
| 24/25CDXWX             | 24,000               | 2.1                   | 14.7  | 1.5 | 20.6  | 2.1 | 32.4  | 3.2 |
|                        |                      | 4.1                   | 15.9  | 1.6 | 22.2  | 2.2 | 34.9  | 3.5 |
|                        |                      | 6.6                   | 16.5  | 1.7 | 23.1  | 2.3 | 36.3  | 3.6 |
| 26CDXWX                | 24,000               | 2.2                   | 15.7  | 1.7 | 22.0  | 2.4 | 34.6  | 3.8 |
|                        |                      | 4.3                   | 17.0  | 1.9 | 23.8  | 2.6 | 37.4  | 4.1 |
|                        |                      | 6.8                   | 17.6  | 2.0 | 24.7  | 2.8 | 38.8  | 4.3 |
| 30/31CDXWX             | 30,000               | 2.2                   | 17.3  | 1.7 | 24.2  | 2.4 | 38.0  | 3.8 |
|                        |                      | 4.3                   | 18.8  | 1.9 | 26.3  | 2.6 | 41.3  | 4.1 |
|                        |                      | 6.8                   | 19.6  | 2.0 | 27.5  | 2.8 | 43.2  | 4.3 |
| 32CDXWX                | 30,000               | 2.8                   | 18.4  | 1.8 | 25.8  | 2.6 | 40.5  | 4.1 |
|                        |                      | 5.4                   | 20.1  | 2.0 | 28.2  | 2.8 | 44.3  | 4.4 |
|                        |                      | 8.5                   | 21.1  | 2.1 | 29.5  | 3.0 | 46.4  | 4.6 |
| 36/37CDXWX             | 36,000               | 2.8                   | 19.7  | 2.0 | 27.6  | 2.8 | 43.4  | 4.3 |
|                        |                      | 5.4                   | 21.7  | 2.2 | 30.4  | 3.0 | 47.8  | 4.8 |
|                        |                      | 8.5                   | 22.8  | 2.3 | 31.9  | 3.2 | 50.1  | 5.0 |

**NOTES:**

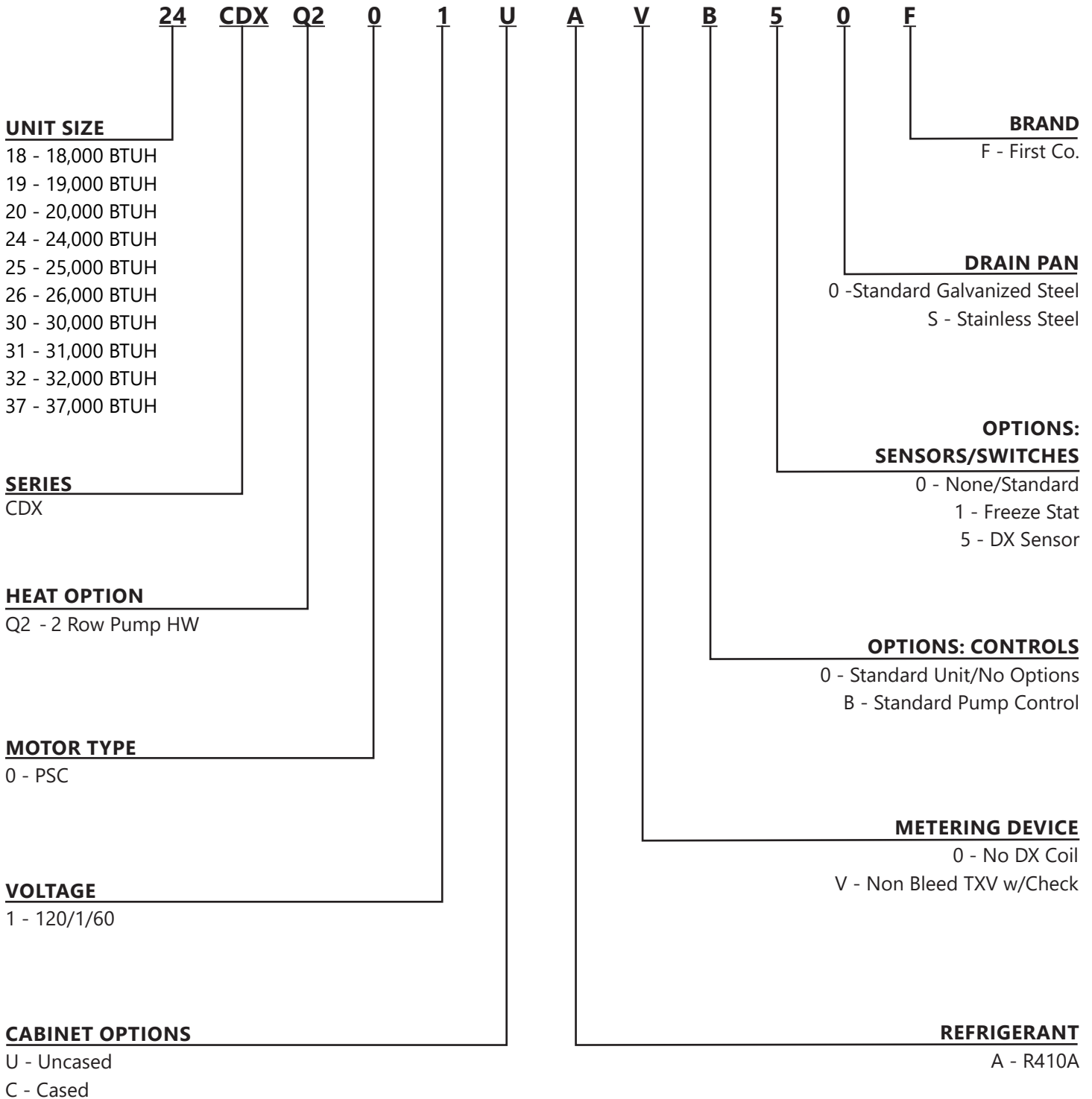
1. Heat BTUH is at 70° F EAT.
2. Based on 20°F Delta - T. Velocity not to exceed 4ft./sec.
3. 120 degree and 180 degree data is supplied for boiler applications.
4. Heating BTUH output will not exceed output of water heater.
5. Approved for installation with 0" clearance to combustibile material.
6. Use capacities when First Co. "Flow Control Module" is used (# 940-3CV).
7. Freeze protection standard on hot water and DX coils.

| ELECTRICAL DATA CDXWX |          |       |                   |                    |
|-----------------------|----------|-------|-------------------|--------------------|
| UNIT MODEL            | MOTOR HP | AMPS  | MIN. CIR AMPACITY | MAX CIR PROTECTION |
|                       |          | MOTOR |                   |                    |
| 18/19/20CDXWX         | 1/2      | 7.0   | 9                 | 15                 |
| 24/25/26CDXWX         | 1/2      | 7.0   | 9                 | 15                 |
| 30/31CDXWX            | 1/2      | 7.0   | 9                 | 15                 |
| 32CDXWX               | 1/2      | 7.0   | 9                 | 15                 |
| 36/37CDXWX            | 1/2 (2)  | 7.0   | 16                | 20                 |

# CDX SERIES

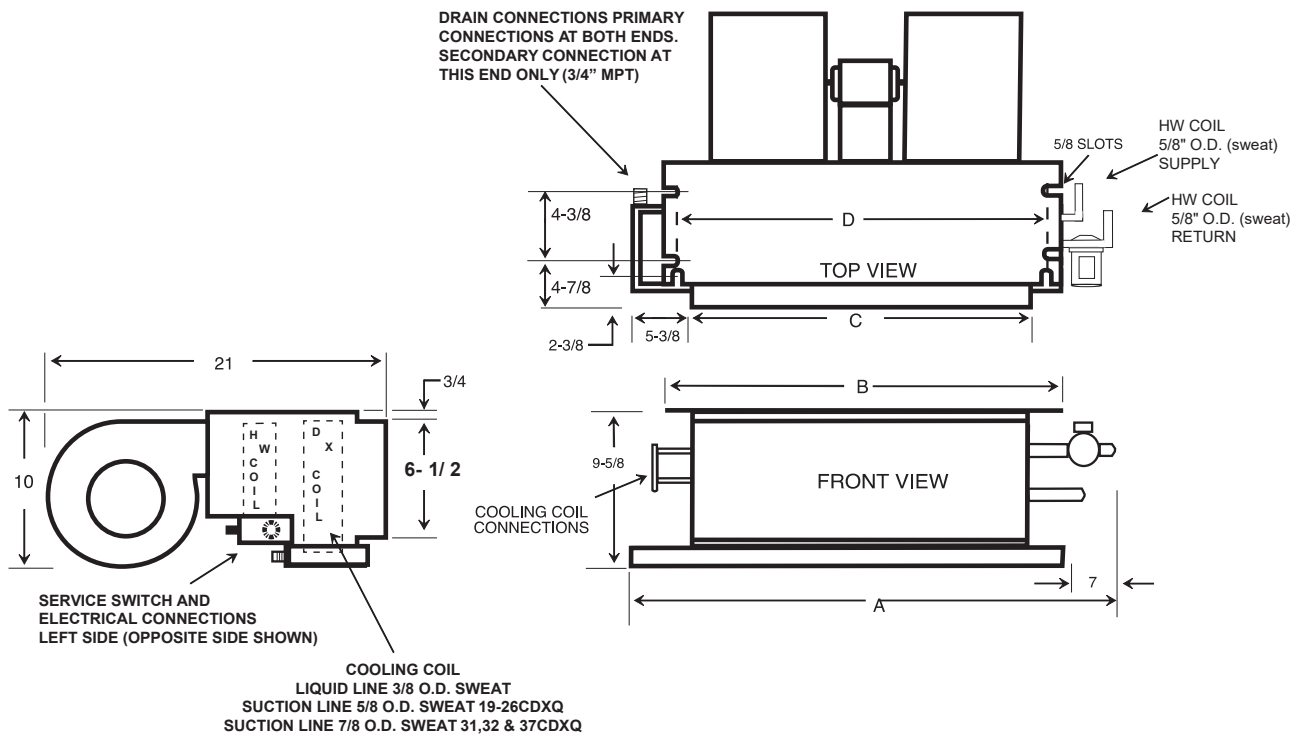
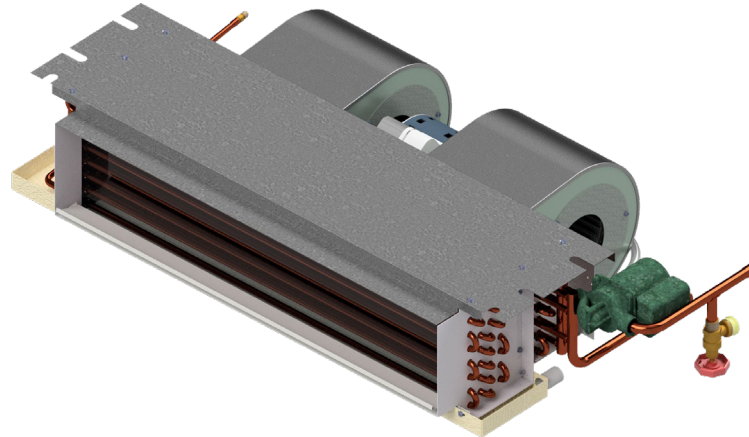
## HOT WATER HEATING W/STANDARD PUMP & PSC MOTOR

# CDXQ





### PHYSICAL DIMENSIONS UNCASED VERSION WITH STANDARD PUMP



| PHYSICAL DIMENSIONS |        |        |        |        |
|---------------------|--------|--------|--------|--------|
| UNIT MODEL          | A      | B      | C      | D      |
| 18/19CDXQ*          | 45-1/8 | 37-1/4 | 30-1/8 | 34-3/4 |
| 20/24/25CDXQ*       | 51-1/8 | 43-1/4 | 36-1/8 | 40-3/4 |
| 26/30/31CDXQ*       | 57-1/8 | 49-1/4 | 42-1/8 | 46-3/4 |
| 32/36/37CDXQ*       | 64-1/8 | 56-1/4 | 49-1/8 | 53-3/4 |

### CDXQ

#### PSC MOTOR AND STANDARD PUMP

| PERFORMANCE DATA CDXQ |                      |                       |  |     |       |     |       |     |       |     |
|-----------------------|----------------------|-----------------------|--|-----|-------|-----|-------|-----|-------|-----|
| UNIT MODEL            | NOMINAL COOLING BTUH | PRESS. DROP (FT. WTR) | BTUH (1000) AT ENTERING WATER TEMPERATURE Delta-T 20°F & GPM |     |       |     |       |     |       |     |
|                       |                      |                       | 120°F  | GPM | 130°F | GPM | 140°F | GPM | 180°F | GPM |
| 18/19CDXQ*            | 18,000               | 3.3                   | 12.9   | 1.3 | 15.4  | 1.5 | 18.0  | 1.8 | 28.3  | 2.8 |
| 20CDXQ*               | 18,000               | 4.1                   | 13.7   | 1.4 | 16.5  | 1.7 | 19.2  | 1.9 | 30.2  | 3.0 |
| 24/25CDXQ*            | 24,000               | 4.1                   | 15.9   | 1.6 | 19.0  | 1.9 | 22.2  | 2.2 | 34.9  | 3.5 |
| 26CDXQ*               | 24,000               | 4.3                   | 17.0   | 1.7 | 20.4  | 2.0 | 23.8  | 2.4 | 37.4  | 3.7 |
| 30/31CDXQ*            | 30,000               | 4.3                   | 18.8   | 1.9 | 22.5  | 2.3 | 26.3  | 2.6 | 41.3  | 4.1 |
| 32CDXQ*               | 30,000               | 5.4                   | 20.1   | 2.0 | 24.2  | 2.4 | 28.2  | 2.8 | 44.3  | 4.4 |
| 36/37CDXQ*            | 36,000               | 5.4                   | 21.7   | 2.2 | 26.1  | 2.6 | 30.4  | 3.0 | 47.8  | 4.8 |

**NOTES:**

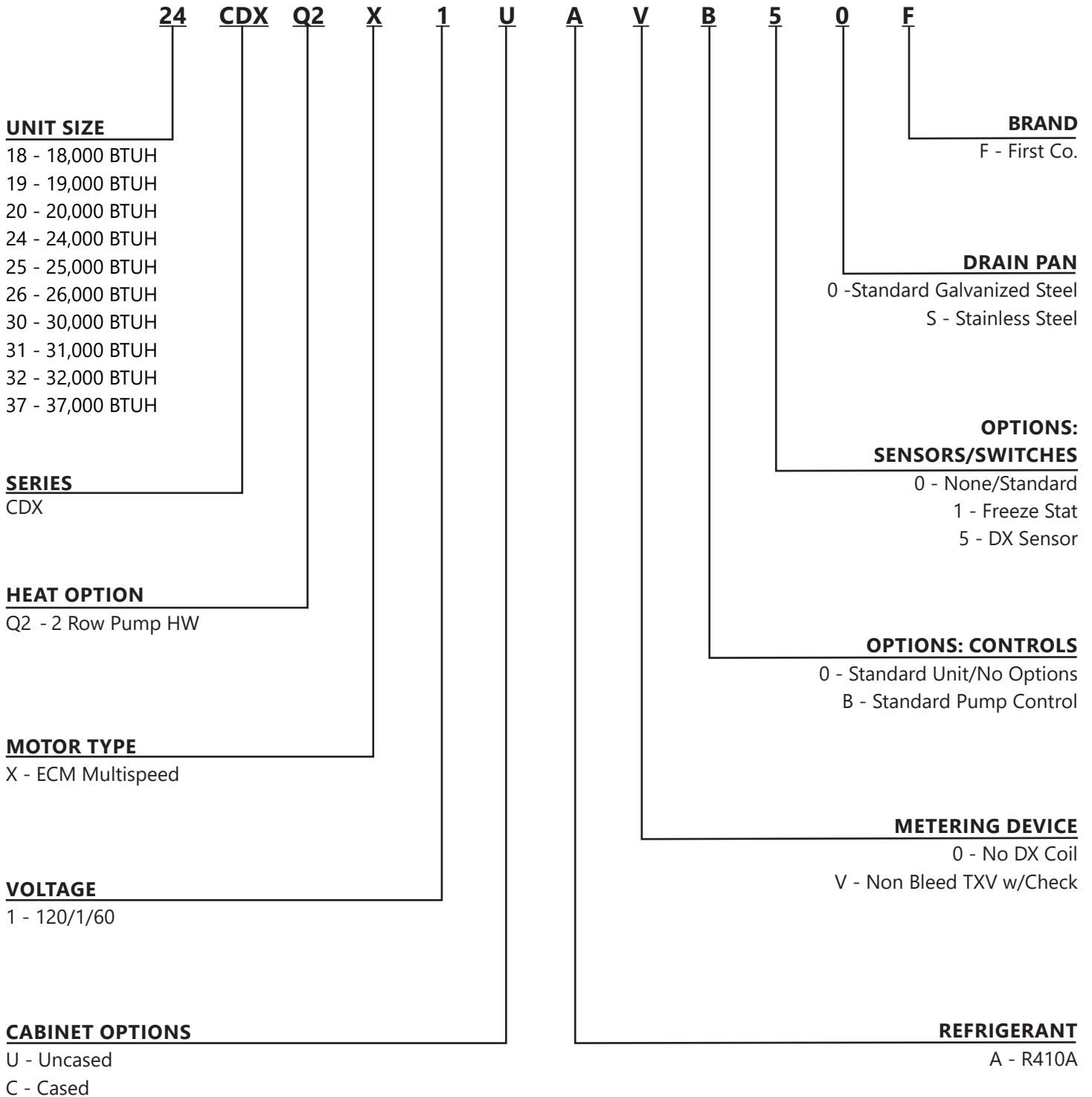
1. Heat BTUH is at 70° F EAT.
2. 120° F and 180° F data is supplied for boiler applications.
3. Heating BTUH output will not exceed output of water heater.
4. Approved for installation with 0" clearance to combustible material.
5. Freeze protection on hot water and DX coils.
6. Based on 20° F Delta-T, Velocity not to exceed 4ft./sec.

| ELECTRICAL DATA CDXQ |                 |             |      |                   |                    |
|----------------------|-----------------|-------------|------|-------------------|--------------------|
| UNIT MODEL           | MOTOR HP (120V) | AMPS (120V) |      | MIN. CIR AMPACITY | MAX CIR PROTECTION |
|                      |                 | MOTOR       | PUMP |                   |                    |
| 18/19/20CDXQ*        | 1/5             | 2.3         | 0.57 | 4                 | 15                 |
| 24CDXQ*              | 1/5             | 3.0         | 0.57 | 5                 | 15                 |
| 25/26CDXQ*           | 1/4             | 3.6         | 0.57 | 6                 | 15                 |
| 30/31CDXQ*           | 1/5             | 4.6         | 0.57 | 7                 | 15                 |
| 32CDXQ*              | 1/5             | 4.6         | 0.57 | 7                 | 15                 |
| 36/37CDXQ*           | 1/5             | 4.6         | 0.57 | 7                 | 15                 |

# CDX SERIES

## HOT WATER HEATING W/STANDARD PUMP & ECM MOTOR

# CDXQX



# CDX SERIES

HOT WATER HEATING W/STANDARD PUMP & ECM MOTOR

# CDXQX

DATA TABLES

## CDXQX

ECM MOTOR AND STANDARD PUMP

| PERFORMANCE DATA CDXQX |                      |                       |  |     |       |     |       |     |       |     |
|------------------------|----------------------|-----------------------|--|-----|-------|-----|-------|-----|-------|-----|
| UNIT MODEL             | NOMINAL COOLING BTUH | PRESS. DROP (FT. WTR) | BTUH (1000) AT ENTERING WATER TEMPERATURE Delta-T 20°F & GPM |     |       |     |       |     |       |     |
|                        |                      |                       | 120°F  | GPM | 130°F | GPM | 140°F | GPM | 180°F | GPM |
| 18/19CDXQ*X            | 18,000               | 3.3                   | 12.9   | 1.3 | 15.4  | 1.5 | 18.0  | 1.8 | 28.3  | 2.8 |
| 20CDXQ*X               | 18,000               | 4.1                   | 13.7   | 1.4 | 16.5  | 1.7 | 19.2  | 1.9 | 30.2  | 3.0 |
| 24/25CDXQ*X            | 24,000               | 4.1                   | 15.9   | 1.6 | 19.0  | 1.9 | 22.2  | 2.2 | 34.9  | 3.5 |
| 26CDXQ*X               | 24,000               | 4.3                   | 17.0   | 1.7 | 20.4  | 2.0 | 23.8  | 2.4 | 37.4  | 3.7 |
| 30/31CDXQ*X            | 30,000               | 4.3                   | 18.8   | 1.9 | 22.5  | 2.3 | 26.3  | 2.6 | 41.3  | 4.1 |
| 32CDXQ*X               | 30,000               | 5.4                   | 20.1   | 2.0 | 24.2  | 2.4 | 28.2  | 2.8 | 44.3  | 4.4 |
| 36/37CDXQ*X            | 36,000               | 5.4                   | 21.7   | 2.2 | 26.1  | 2.6 | 30.4  | 3.0 | 47.8  | 4.8 |

**NOTES:**

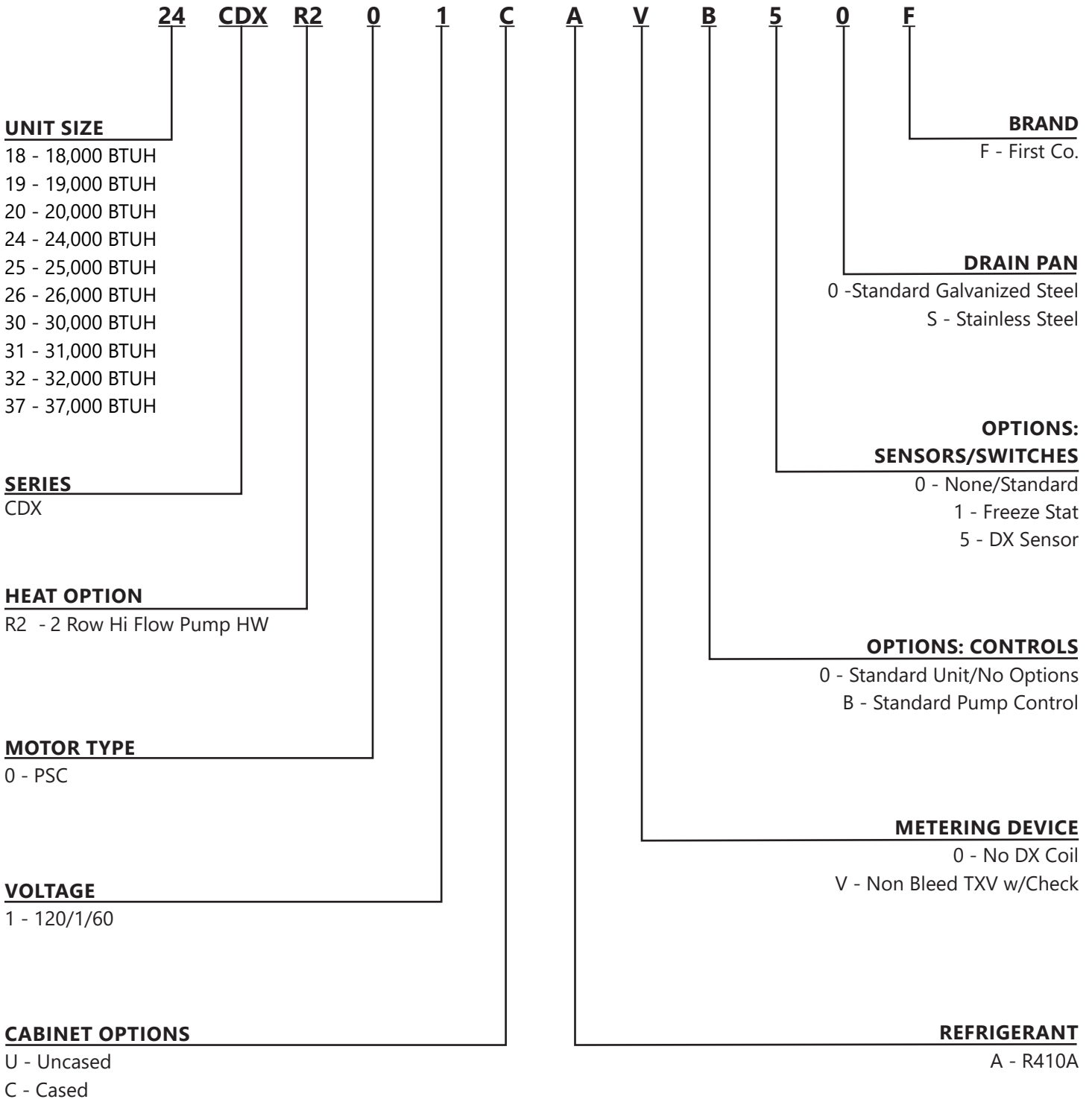
1. Heat BTUH is at 70° F EAT.
2. 120° F and 180° F data is supplied for boiler applications.
3. Heating BTUH output will not exceed output of water heater.
4. Approved for installation with 0" clearance to combustible material.
5. Freeze protection on hot water and DX coils.
6. Based on 20° F Delta-T, Velocity not to exceed 4ft./sec.

| ELECTRICAL DATA CDXQX |          |       |      |                   |                    |
|-----------------------|----------|-------|------|-------------------|--------------------|
| UNIT MODEL            | MOTOR HP | AMPS  |      | MIN. CIR AMPACITY | MAX CIR PROTECTION |
|                       |          | MOTOR | PUMP |                   |                    |
| 18/19/20CDXQ*X        | 1/2      | 7.0   | 0.57 | 10                | 15                 |
| 24/25/26CDXQ*X        | 1/2      | 7.0   | 0.57 | 10                | 15                 |
| 30/31CDXQ*X           | 1/2      | 7.0   | 0.57 | 10                | 15                 |
| 32CDXQ*X              | 1/2      | 7.0   | 0.57 | 10                | 15                 |
| 36/37CDXQ*X           | 1/2 (2)  | 7.0   | 0.57 | 17                | 20                 |

# CDX SERIES

## HI FLOW HEAT PUMP HOT WATER HEATING W/PSC MOTOR

# CDXR



# CDX SERIES

HI FLOW HEAT PUMP HOT WATER HEATING W/PSC MOTOR

**CDXR**  
DATA TABLES

## CDXR PSC MOTOR AND HI FLOW PUMP

The CDXR series fan coils are designed specifically for use with tankless water heaters. These fan coils allow high efficiency tankless water heaters to be used for two jobs instead of one.... providing domestic hot water and high efficiency space heating! They are compatible with most of today's higher efficiency split-systems heat pumps and condensing units .

The CDXR fan coils include a special circulating pump designed for tankless heaters, HW check valve, air purge valve, hot water coil, cooling coil, blower/motor, and multi-function circuit board. The fan coil with the -C is factory installed within an insulated enclosure or "case" and is shipped with your choice of either a solid or louvered access panel with attractive off-white powder coat finish. Solid panels must be used with ducted return air applications, while louvered panels (the default style) should be used with non-ducted return air applications. Louvered panels include filters, but solid panels require field supplied return-air filter/louvers.

| PERFORMANCE DATA CDXR* |                      |                       |  |     |       |     |       |     |       |     |
|------------------------|----------------------|-----------------------|--|-----|-------|-----|-------|-----|-------|-----|
| UNIT MODEL             | NOMINAL COOLING BTUH | PRESS. DROP (FT. WTR) | BTUH (1000) AT ENTERING WATER TEMPERATURE Delta-T 20°F & GPM |     |       |     |       |     |       |     |
|                        |                      |                       | 120°F  | GPM | 130°F | GPM | 140°F | GPM | 180°F | GPM |
| 18/19CDXR*             | 18,000               | 3.3                   | 12.9   | 1.3 | 15.4  | 1.5 | 18.0  | 1.8 | 28.3  | 2.8 |
| 20CDXR*                | 18,000               | 4.1                   | 13.7   | 1.4 | 16.5  | 1.7 | 19.2  | 1.9 | 30.2  | 3.0 |
| 24/25CDXR*             | 24,000               | 4.1                   | 15.9   | 1.6 | 19.0  | 1.9 | 22.2  | 2.2 | 34.9  | 3.5 |
| 26CDXR*                | 24,000               | 4.3                   | 17.0   | 1.7 | 20.4  | 2.0 | 23.8  | 2.4 | 37.4  | 3.7 |
| 30/31CDXR*             | 30,000               | 4.3                   | 18.8   | 1.9 | 22.5  | 2.3 | 26.3  | 2.6 | 41.3  | 4.1 |
| 32CDXR*                | 30,000               | 5.4                   | 20.1   | 2.0 | 24.2  | 2.4 | 28.2  | 2.8 | 44.3  | 4.4 |
| 36/37CDXR*             | 36,000               | 5.4                   | 21.7   | 2.2 | 26.1  | 2.6 | 30.4  | 3.0 | 47.8  | 4.8 |

### NOTES:

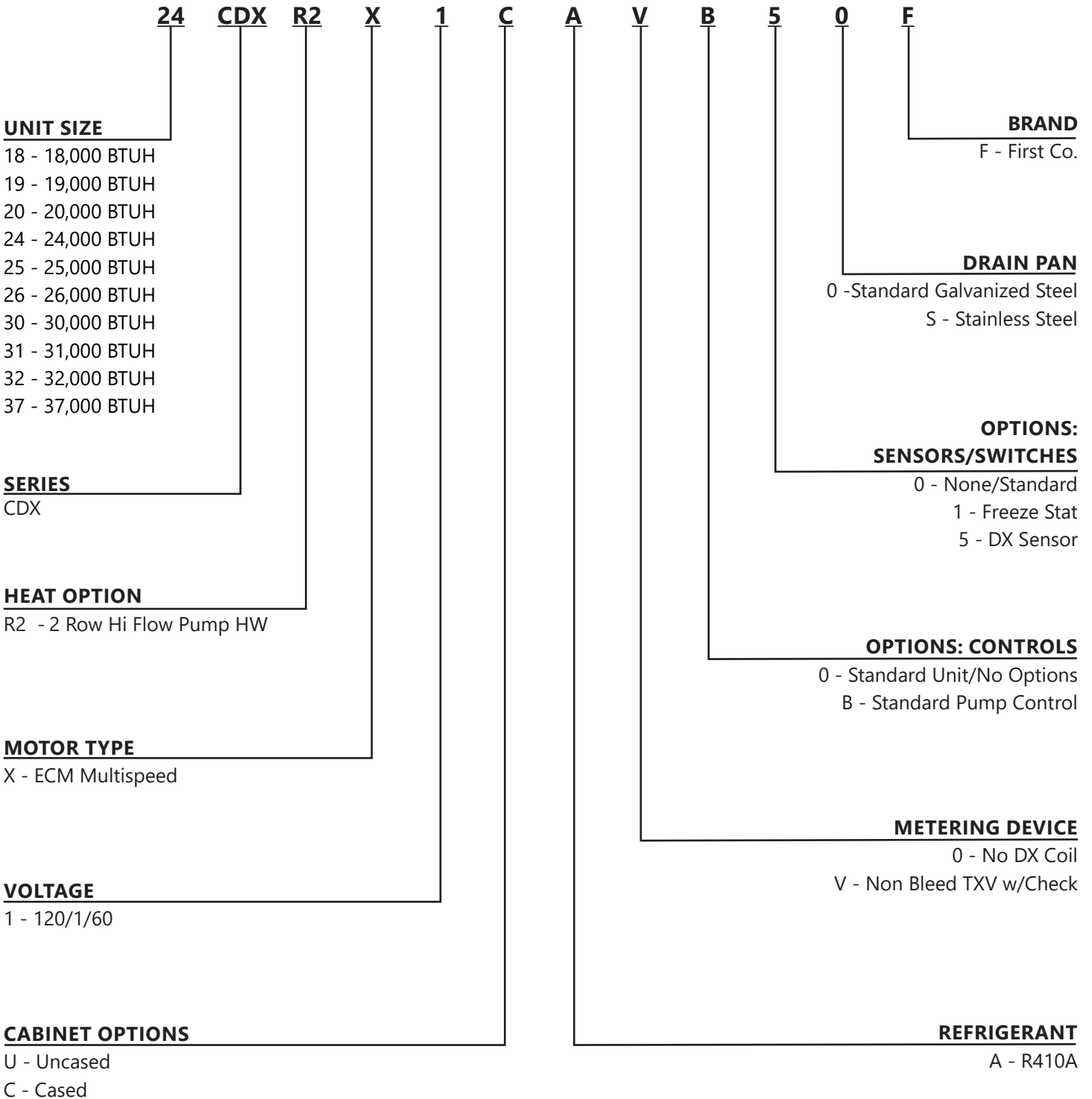
1. Heat BTUH is at 70° F EAT.
2. 120° F and 180° F data is supplied for boiler applications.
3. Heating BTUH output will not exceed output of water heater.
4. Approved for installation with 0" clearance to combustible material.
5. Freeze protection on hot water and DX coils.
6. Based on 20° F Delta-T, Velocity not to exceed 4ft./sec.

| ELECTRICAL DATA CDXR* |                 |             |      |                   |                    |
|-----------------------|-----------------|-------------|------|-------------------|--------------------|
| UNIT MODEL            | MOTOR HP (120V) | AMPS (120V) |      | MIN. CIR AMPACITY | MAX CIR PROTECTION |
|                       |                 | MOTOR       | PUMP |                   |                    |
| 18/19/20CDXR*         | 1/5             | 2.3         | 0.84 | 4                 | 15                 |
| 24/25/26CDXR*         | 1/4             | 3.6         | 0.84 | 6                 | 15                 |
| 30/31CDXR*            | 1/5 (2)         | 4.6         | 0.84 | 7                 | 15                 |
| 32CDXR*               | 1/5 (2)         | 4.6         | 0.84 | 7                 | 15                 |
| 36/37CDXR*            | 1/5 (2)         | 4.6         | 0.84 | 7                 | 15                 |

# CDX SERIES

## HI FLOW HEAT PUMP HOT WATER HEATING W/ECM MOTOR

# CDXRX



# CDX SERIES

HI FLOW HEAT PUMP HOT WATER HEATING W/ECM MOTOR

# CDXR<sup>X</sup>

DATA TABLES

## CDXR<sup>X</sup>

ECM MOTOR AND HI FLOW PUMP

| PERFORMANCE DATA CDXR* X |                      |                       |  |     |       |     |       |     |       |     |
|--------------------------|----------------------|-----------------------|--|-----|-------|-----|-------|-----|-------|-----|
| UNIT MODEL               | NOMINAL COOLING BTUH | PRESS. DROP (FT. WTR) | BTUH (1000) AT ENTERING WATER TEMPERATURE Delta-T 20°F & GPM |     |       |     |       |     |       |     |
|                          |                      |                       | 120°F  | GPM | 130°F | GPM | 140°F | GPM | 180°F | GPM |
| 18/19CDXR*X              | 18,000               | 3.3                   | 12.9   | 1.3 | 15.4  | 1.5 | 18.0  | 1.8 | 28.3  | 2.8 |
| 20CDXR*X                 | 18,000               | 4.1                   | 13.7   | 1.4 | 16.5  | 1.7 | 19.2  | 1.9 | 30.2  | 3.0 |
| 24/25CDXR*X              | 24,000               | 4.1                   | 15.9   | 1.6 | 19.0  | 1.9 | 22.2  | 2.2 | 34.9  | 3.5 |
| 26CDXR*X                 | 24,000               | 4.3                   | 17.0   | 1.7 | 20.4  | 2.0 | 23.8  | 2.4 | 37.4  | 3.7 |
| 30/31CDXR*X              | 30,000               | 4.3                   | 18.8   | 1.9 | 22.5  | 2.3 | 26.3  | 2.6 | 41.3  | 4.1 |
| 32CDXR*X                 | 30,000               | 5.4                   | 20.1   | 2.0 | 24.2  | 2.4 | 28.2  | 2.8 | 44.3  | 4.4 |
| 36/37CDXR*X              | 36,000               | 5.4                   | 21.7   | 2.2 | 26.1  | 2.6 | 30.4  | 3.0 | 47.8  | 4.8 |

**NOTES:**

1. Heat BTUH is at 70° F EAT.
2. 120° F and 180° F data is supplied for boiler applications.
3. Heating BTUH output will not exceed output of water heater.
4. Approved for installation with 0" clearance to combustible material.
5. Freeze protection on hot water and DX coils.
6. Based on 20° F Delta-T, Velocity not to exceed 4ft./sec.

| ELECTRICAL DATA CDXR*X |          |       |      |                   |                    |
|------------------------|----------|-------|------|-------------------|--------------------|
| UNIT MODEL             | MOTOR HP | AMPS  |      | MIN. CIR AMPACITY | MAX CIR PROTECTION |
|                        |          | MOTOR | PUMP |                   |                    |
| 18/19/20CDXR*X         | 1/2      | 7.0   | .84  | 10                | 15                 |
| 24/25/26CDXR*X         | 1/2      | 7.0   | .84  | 10                | 15                 |
| 30/31CDXR*X            | 1/2      | 7.0   | .84  | 10                | 15                 |
| 32CDXR*X               | 1/2      | 7.0   | .84  | 10                | 15                 |
| 36/37CDXR*X            | 1/2 (2)  | 7.0   | .84  | 17                | 20                 |



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# SPECIFICATION GUIDE

## UNIT

- All fan coils are manufactured with 20 to 22 gauge galvanized steel to resist corrosion.
- All units are approved for installation with "0" clearance to combustible material.
- Piping, drain, and wiring connections are readily accessible, and mounting holes and/or slots are predrilled to save installation time and field labor expense.
- Exposed units and/or panels have a baked on powder coat finish.

## COILS

- Coils have 3/8" O.D. copper tubing expanded to high efficiency aluminum fins.
- Each coil is factory tested to 450 psig.

## DRAIN PANS

- Drain pan is made from heavy gauge galvanized steel with "folded corner joints".
- Drain pan is insulated with a U.L. Listed, closed cell, fire retardant foam insulation to prevent sweating.

## BLOWER ASSEMBLIES

- All blower wheels are centrifugal, forward curved, and dynamically balanced for smooth, quiet operation.
- Blower assemblies can be easily removed for service.

## MOTORS

- Standard motors are PSC type with internal thermal overload protection. Motors have permanently lubricated sleeve bearings for long life. All motors are resiliently mounted with rubber bushings to assure quiet, vibration-free operation and are easily removed.
- ECM motors have multi-speed connections or a jumper to change speeds. Motors have permanently lubricated sleeve bearings for long life. All motors are resiliently mounted with rubber bushings to assure quiet, vibration-free operation and are easily removed.
- Water coils and pumps shall be NSF/ASNI 169:2016 certified for public health and should contain less than 2% lead. All water coils should have a check valve internal to the pump and have an air purge valve factory-installed.



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