CASED/UNCASED COILS FOR GAS AND OIL FURNACES



(TXV Metering Device Shown)



TCF- SERIES

featuring Industry Standard R-410A Refrigerant Airflow Capacity
600-1,900 CFM [283-897 L/s]

Features

- WeatherKing® Indoor Furnace cased coils and replacement uncased coils are designed for use with WeatherKing outdoor units and are available for vertical upflow or downflow, and horizontal left or horizontal right airflow. When matched with WeatherKing outdoor units, the coils provide a nominal capacity range from 18,000 BTU/HR [5.24 kW] to 60,000 BTU/HR [17.6 kW].
- Constructed of aluminum fins bonded to internally grooved aluminum tubing.
- Coils are tested at the factory with an extensive refrigerant leak check.
- Coils have copper sweat refrigerant connections.
- Feature two sets of 3/4" [14.1 mm] N.P.T. Condensate drain connections for ease of connection.
- Chatleff metering device connections, at inlet and outlet of TXV or EEV and equalizer connections (TXV only).
- Approved for system application with variety of WeatherKing outdoor units.
- Condensate drain pan is constructed of high grade, heat resistant, corrosion free thermal-set material.
- Compatible with Germicidal Light System (UV resistant)
- Bi-Directional airflow eliminates the need to switch any internal components from horizontal left to right.
- Unique drain pan design maximizes application flexibility and condensate removal.
- N-Coil design maximizes performance and minimizes height required at installation.
- Coils are AHRI certified for system application with a variety of WeatherKing outdoor units.

Accredited by the RvA
ABS Quality Evaluations, Inc. Management System Certification
ANAB ACCREDITED
ISO 9001:2008
Certificate Number: 30164

c UL us LISTED

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Model Number Identification

T C F 24 17 S T A M U A *

Option Code
*TBD

Minor Series**
Component Change
Cost Reduction
Non-performance Changes

Casing
C = Cased

Orientation
M = Multipoise

Major Series*
Feature Set Change
Performance Change

Metering Device
T = TEV

Efficiency
S = Standard Efficiency
M = Mid. Efficiency
H = High Efficiency

Width
14 = 14" [356 mm]
17 = 17.5" [431.8 mm]
21 = 21" [533.4 mm]
24 = 24.5" [609.6 mm]

Capacity
24 – 2 Ton
36 – 3 Ton
48 – 4 Ton
60 – 5 Ton

Type
F = Furnace Coil

Product Category
C = Evaporator Coil

WeatherKing

[ ] Designates Metric Conversions

AVAILABLE MODELS
TCF2414STAMCA
TCF2417STAMCA
TCF2417MTAMCA
TCF2421MTAMCA
TCF3617STAMCA
TCF3621STAMCA
TCF3621MTAMCA
TCF3624MTAMCA
TCF4821STAMCA
TCF4821MTAMCA
TCF4824STAMCA
TCF6021STAMCA
TCF6024STAMCA
TCF2417HTAMCA
TCF2421HTAMCA
TCF3621HTAMCA
TCF3624HTAMCA
TCF4824HTAMCA
TCF6024HTAMCA

Table 1: Coil Specifications/Airflow Pressure Drop

Coil Model TCF	Approx. Design Cooling Air Flow Range CFM [L/s]	Face Area Sq. Ft. [m²]	Fins Per Inch / Rows Deep	Width	Nominal Capacity	Wet Coil Static Pressure Drop (Inches W.C.) [kPa] @ CFM [L/s] – (Coil Only)													
						600 [283]	700 [330]	800 [378]	900 [425]	1000 [472]	1100 [519]	1200 [566]	1300 [614]	1400 [661]	1500 [708]	1600 [755]	1700 [802]	1800 [850]	1900 [897]
TCF2414STAM	600/900 [283/425]	4.56 [0.42]	16/2	14	1.5 – 2	0.165	0.209	0.262	0.325	—	—	—	—	—	—	—	—	—	—
TCF2417STAM	600/900 [283/425]	4.56 [0.42]	16/2	17		0.120	0.157	0.199	0.246	—	—	—	—	—	—	—	—	—	—
TCF2417MTAM	600/900 [283/425]	5.70 [.052]	16/2			0.113	0.145	0.181	0.222	—	—	—	—	—	—	—	—	—	—
TCF3617STAM	700/1300 [330/614]	5.70 [0.52]	16/2		2.5 – 3	0.113	0.145	0.181	0.222	0.266	0.315	0.368	—	—	—	—	—	—	—
TCF2421MTAM	600/900 [283/425]	5.70 [0.52]	16/2	21	1.5 – 2	0.113	0.145	0.181	0.222	—	—	—	—	—	—	—	—	—	—
TCF2421HTAM	600/900 [283/425]	5.70 [0.52]	16/2			0.113	0.145	0.181	0.222	—	—	—	—	—	—	—	—	—	—
TCF3621STAM	700/1300 [330/614]	5.70 [0.52]	16/2		2.5 – 3	0.113	0.145	0.181	0.222	0.266	0.315	0.368	—	—	—	—	—	—	—
TCF3621MTAM	700/1300 [330/614]	8.55 [0.79]	16/2			0.062	0.086	0.112	0.140	0.170	0.202	0.236	—	—	—	—	—	—	—
TCF3621HTAM	700/1300 [330/614]	7.60 [0.70]	13/3			0.106	0.125	0.146	0.169	0.194	0.221	0.251	—	—	—	—	—	—	—
TCF4821MTAM	1100/1800 [519/850]	7.60 [0.70]	13/3		3.5 – 4	0.106	0.125	0.146	0.169	0.194	0.221	0.251	0.282	0.315	0.350	0.386	0.425	0.466	—
TCF4821STAM	1100/1800 [519/850]	8.55 [0.79]	16/2			0.062	0.086	0.112	0.140	0.170	0.202	0.236	0.272	0.309	0.349	0.391	0.434	0.480	0.527
TCF6021STAM	1400/1600 [661/755]	7.60 [0.70]	13/3		5	0.036	0.050	0.065	0.081	0.098	0.117	0.137	0.158	0.180	0.203	0.228	0.254	—	—
TCF3624MTAM	700/1300 [330/614]	8.55 [0.79]	16/2	24	2.5 – 3	0.062	0.086	0.112	0.140	0.170	0.202	0.236	0.272	0.309	—	—	—	—	—
TCF3624HTAM	700/1300 [330/614]	9.98 [0.93]	14/3			0.036	0.050	0.065	0.081	0.098	0.117	0.137	0.158	0.180	—	—	—	—	—
TCF4824STAM	1100/1800 [519/850]	8.55 [0.79]	16/2		3.5 – 4	0.062	0.086	0.112	0.140	0.170	0.202	0.236	0.272	0.309	0.349	0.391	0.434	0.480	—
TCF4824HTAM	1100/1800 [519/850]	9.98 [0.93]	14/3			0.036	0.050	0.065	0.081	0.098	0.117	0.137	0.158	0.180	0.203	0.228	0.254	0.281	—
TCF6024STAM	1400/1800 [661/755]	9.98 [0.93]	14/3		5	0.036	0.050	0.065	0.081	0.098	0.117	0.137	0.158	0.180	0.203	0.228	0.254	0.281	—
TCF6024HTAM	1400/1800 [661/755]	9.98 [0.93]	14/3			0.036	0.050	0.065	0.081	0.098	0.117	0.137	0.158	0.180	0.203	0.228	0.254	0.281	—

Important Note: Gas furnace heating CFM can exceed the design cooling CFM. Ductwork and coil selection must accommodate the higher of the cooling or gas heating CFM to prevent furnace limit tripping, excessive noise, and coil freeze-up.

[ ] Designates Metric Conversions

Table 1: Coil Specifications/Airflow Pressure Drop (con't.)

Coil Model TCF	Approx. Design Heating Air Flow Range CFM [L/s]	Face Area Sq. Ft. [m^2]	Fins Per Inch / Rows Deep	Width	Nominal Capacity	Dry Coil Static Pressure Drop (Inches W.C.) [kPa] @ CFM [L/s] – (Coil-Only)													
						600 [283]	700 [330]	800 [378]	900 [425]	1000 [472]	1100 [519]	1200 [566]	1300 [614]	1400 [661]	1500 [708]	1600 [755]	1700 [802]	1800 [850]	1900 [897]
TCF2414STAM	600/1600 [283/755]	4.56 [0.42]	16/2	14	1.5 – 2	0.118	0.118	0.145	0.176	0.210	0.247	0.288	0.332	0.379	0.429	0.483	—	—	—
TCF2417STAM	600/1500 [283/707]	4.56 [0.42]	16/2	17		0.116	0.116	0.151	0.190	0.235	0.284	0.338	0.397	0.461	0.530	—	—	—	—
TCF2417MTAM	600/1600 [283/755]	5.70 [.052]	16/2			0.101	0.101	0.129	0.161	0.196	0.235	0.277	0.323	0.373	0.425	0.482	—	—	—
TCF3617STAM	600/1600 [283/755]	5.70 [0.52]	16/2		2.5 – 3	0.101	0.101	0.129	0.161	0.196	0.235	0.277	0.323	0.373	0.425	0.482	—	—	—
TCF2421MTAM	600/1600 [283/755]	5.70 [0.52]	16/2	21	1.5 – 2	0.101	0.101	0.129	0.161	0.196	0.235	0.277	0.323	0.373	0.425	0.482	—	—	—
TCF2422HTAM	600/1600 [283/755]	5.70 [0.52]	16/2			0.101	0.101	0.129	0.161	0.196	0.235	0.277	0.323	0.373	0.425	0.482	—	—	—
TCF3621STAM	600/1600 [283/755]	5.70 [0.52]	16/2		2.5 – 3	0.101	0.101	0.129	0.161	0.196	0.235	0.277	0.323	0.373	0.425	0.482	—	—	—
TCF3621MTAM	600/1900 [283/896]	8.55 [0.79]	16/2			0.039	0.039	0.056	0.075	0.095	0.117	0.141	0.166	0.193	0.222	0.252	0.284	0.318	0.353
TCF3621HTAM	600/1900 [283/896]	7.60 [0.70]	13/3			0.043	0.043	0.053	0.066	0.080	0.096	0.115	0.135	0.158	0.182	0.208	0.237	0.267	0.299
TCF4821MTAM	600/1900 [283/896]	7.60 [0.70]	13/3		3.5 – 4	0.043	0.043	0.053	0.066	0.080	0.096	0.115	0.135	0.158	0.182	0.208	0.237	0.267	0.299
TCF4821STAM	600/1900 [283/896]	8.55 [0.79]	16/2			0.039	0.039	0.056	0.075	0.095	0.117	0.141	0.166	0.193	0.222	0.252	0.284	0.318	0.353
TCF6021STAM	600/1900 [283/896]	7.60 [0.70]	13/3		5	0.080	0.080	0.092	0.106	0.121	0.136	0.153	0.171	0.190	0.211	0.232	0.254	0.278	0.302
TCF3624MTAM	600/1900 [283/896]	8.55 [0.79]	16/2	24	2.5 – 3	0.039	0.039	0.056	0.075	0.095	0.117	0.141	0.166	0.193	0.222	0.252	0.284	0.318	0.353
TCF3624HTAM	600/1900 [283/896]	9.98 [0.93]	14/3			0.023	0.023	0.038	0.055	0.074	0.095	0.119	0.144	0.171	0.200	0.231	0.264	0.300	0.337
TCF4824STAM	600/1900 [283/896]	8.55 [0.79]	16/2		3.5 – 4	0.039	0.039	0.056	0.075	0.095	0.117	0.141	0.166	0.193	0.222	0.252	0.284	0.318	0.353
TCF4824HTAM	600/1900 [283/896]	9.98 [0.93]	14/3			0.023	0.023	0.038	0.055	0.074	0.095	0.119	0.144	0.171	0.200	0.231	0.264	0.300	0.337
TCF6024STAM	600/1900 [283/896]	9.98 [0.93]	14/3		5	0.023	0.023	0.038	0.055	0.074	0.095	0.119	0.144	0.171	0.200	0.231	0.264	0.300	0.337
TCF6024HTAM	600/1900 [283/896]	9.98 [0.93]	14/3			0.023	0.023	0.038	0.055	0.074	0.095	0.119	0.144	0.171	0.200	0.231	0.264	0.300	0.337

Important Note: Gas furnace heating CFM can exceed the design cooling CFM. Ductwork and coil selection must accommodate the higher of the cooling or gas heating CFM to prevent furnace limit tripping, excessive noise, and coil freeze-up.

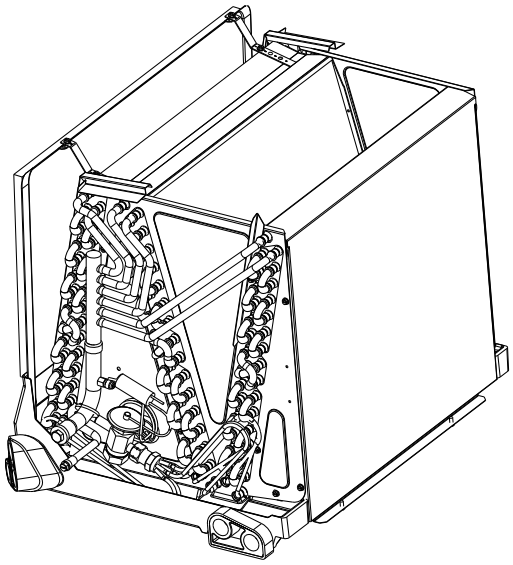
[ ] Designates Metric Conversions

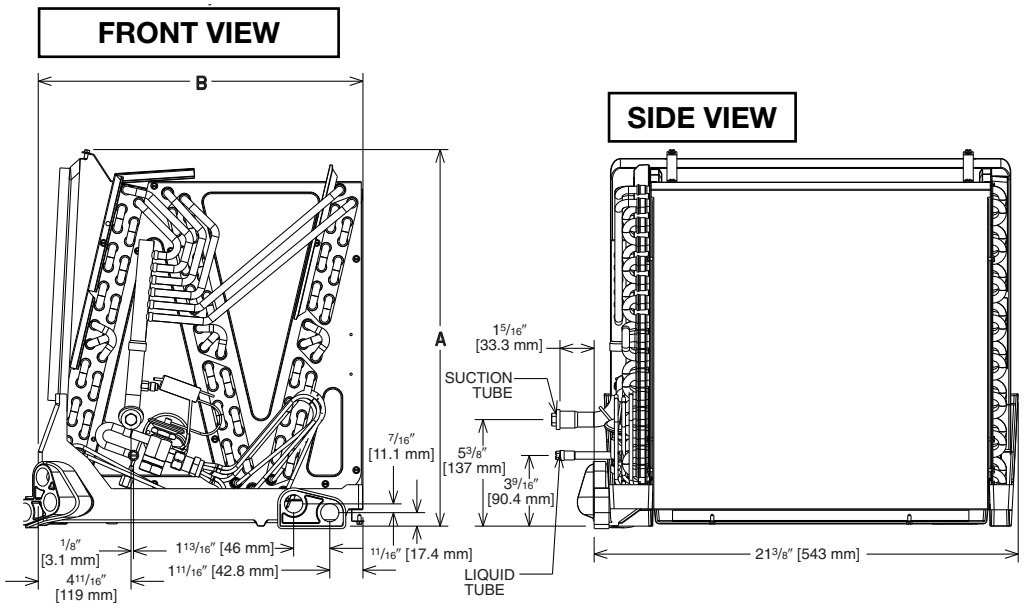
Table 2: Coil Dimensions and Weights

Coil Model TCF	Connections Sweat (in.) [mm]		Uncased Coil Dimensions (in) [mm]		Weight	
	Liquid I.D.	Suction I.D.	A	B	Coil Weight (lbs.) [Kg.]	Shipping Weight (lbs.) [Kg.]
2414ST	3/8 [9.53]	3/4 [19.05]	21 3/4 [552]	12 7/8 [327]	43 [19]	47 [21]
2417ST	3/8 [9.53]	3/4 [19.05]	15 3/8 [390]	16 3/8 [416]	43 [19]	48 [22]
2417MT/2417HT/3617ST	3/8 [9.53]	3/4 [19.05]	18 3/4 [476]	16 3/8 [416]	49 [22]	54 [24]
2421MT/2421HT/3621ST	3/8 [9.53]	3/4 [19.05]	18 3/4 [476]	19 7/8 [505]	51 [23]	60 [27]
3621MT/4821ST/4821SP	3/8 [9.53]	3/4 [19.05]	26 5/8 [676]	19 7/8 [505]	71 [32]	78 [35]
3621HT/4821MT/6021ST	3/8 [9.53]	7/8 [22.23]	33 [838]	19 7/8 [505]	76 [34]	86 [39]
3624MT/4824ST/4824ST	3/8 [9.53]	3/4 [19.05]	26 11/16 [678]	23 3/8 [594]	83 [37]	93 [42]
3624HT/4824HT/6024ST/6024HT	3/8 [9.53]	3/4 [19.05]	30 15/16 [786]	23 3/8 [594]	100 [45]	108 [48]

*The 14 inch, 2 ton TCF coil (2414) is part of the "N-Coil" design series, even though the coil shape resembles an "A" coil design.

FIGURE 1: DIMENSIONS UNCASED





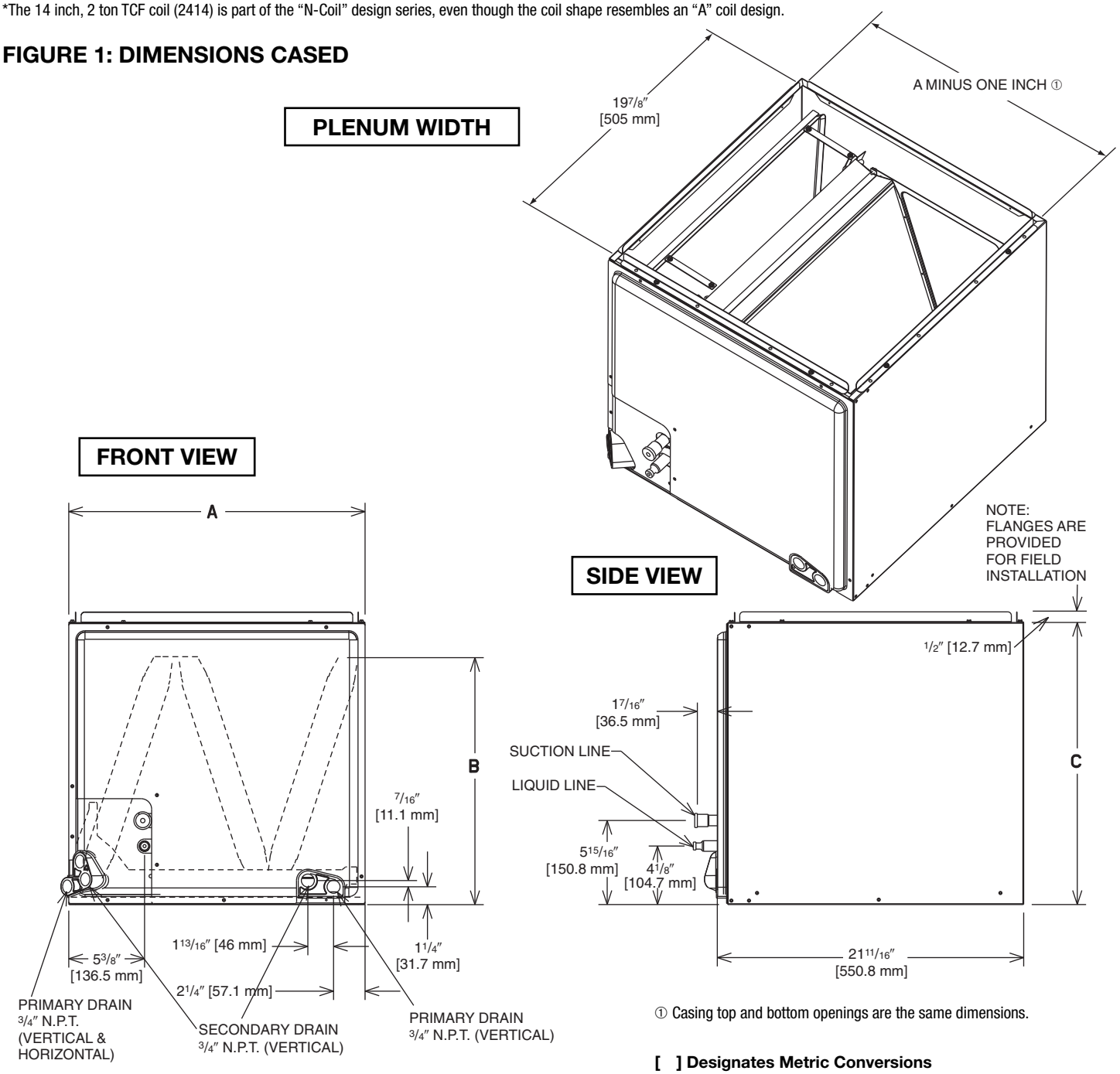
[ ] Designates Metric Conversions

Table 2: Coil Dimensions and Weights

Coil Model TCF	Connections Sweat (in.) [mm]		Cased Coil Dimensions (in) [mm]			Weight	
	Liquid I.D.	Suction I.D.	A	B	C	Coil Weight (lbs.) [Kg.]	Shipping Weight (lbs.) [Kg.]
2414ST	3/8 [9.53]	3/4 [19.05]	14 [356]	21 [533]	23 3/16 [584]	43 [19]	47 [21]
2417SP/2417ST	3/8 [9.53]	3/4 [19.05]	17 1/2 [445]	14 1/2 [368]	20 [508]	43 [19]	48 [22]
2417MT/2417HT/3617ST	3/8 [9.53]	3/4 [19.05]	17 1/2 [445]	17 7/8 [454]	20 [508]	49 [22]	54 [24]
2421MT/2421HT/3621ST	3/8 [9.53]	3/4 [19.05]	21 [533]	17 1/2 [445]	20 [508]	51 [23]	60 [27]
3621MT/4821ST	3/8 [9.53]	3/4 [19.05]	21 [533]	25 7/8 [657]	28 [711]	71 [32]	78 [35]
3621HT/4821MT/6021ST	3/8 [9.53]	7/8 [22.23]	21 [533]	32 [813]	34 1/2 [876]	76 [34]	86 [39]
3624MT/4824ST/4824ST	3/8 [9.53]	3/4 [19.05]	24 1/2 [622]	25 3/8 [645]	32 [812]	83 [37]	93 [42]
3624HT/4824HT/6024ST/6024HT	3/8 [9.53]	3/4 [19.05]	24 1/2 [622]	30 1/4 [768]	32 [812]	100 [45]	108 [48]

*The 14 inch, 2 ton TCF coil (2414) is part of the "N-Coil" design series, even though the coil shape resembles an "A" coil design.

FIGURE 1: DIMENSIONS CASED



① Casing top and bottom openings are the same dimensions.

[ ] Designates Metric Conversions

Table 3: Coil Application

Coils can be matched to heating products as listed in table below.

Coil Model TCF	Furnace Width (In.) (mm)	
	Oil	Gas
2414ST 2417ST 2417HT/2417MT 3617ST	—	14 [356]
2417ST 2417MT/2417HT 3617ST	17½ [431]	17½ [444]
		14 [356]
2421MT/2421HT 3621ST 3621MT/4821ST/3621ME/6021ST/6021ST	21 [533]	21 [533]
		17½ [444]
3624MT/3624HT 4824ST/4824HT 6024ST/6024HT	24½ [622]	24½ [622]
		21 [533]

Accessories

• PLENUM ADAPTER ACCESSORY RXBA-AE

This plenum adapter accessory is for use with the 24½" wide cased indoor cooling and heat pump coils. This allows a 24½" wide cased coil to be installed on a 28" wide oil furnace. This is a field-installed accessory only.

• RXBA-AC (Upflow/Horizontal)

These plenum adapter accessories are for use when a cooling coil is matched with a gas furnace of one smaller size.

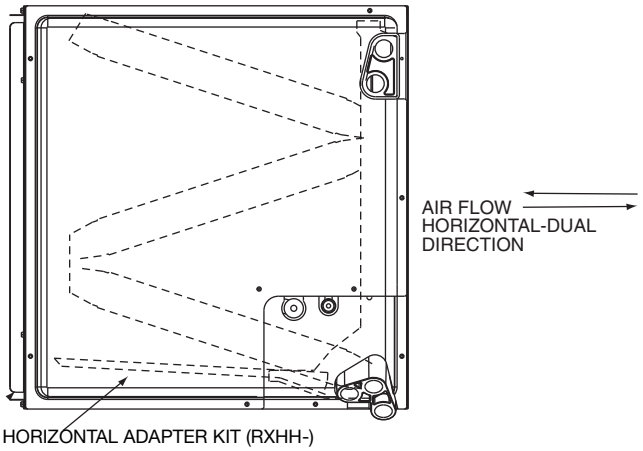
• HORIZONTAL ADAPTER KIT RXHH

This horizontal adapter kit is used to convert a upflow or downflow only models to horizontal flow. See following table to order the proper horizontal adapter kit.

Table 4: Horizontal Adapter Kit Model No.

Coil Model	Horizontal Adapter Kit Model Number (Single Qty)	Horizontal Adapter Kit Model Number (10-Pack Qty)
2414	RXHH-A01	RXHH-A01 X 10
2417	RXHH-A02	RXHH-A02 X10
3617/3621	RXHH-A03	RXHH-A03 X10
3821/4821/4824	RXHH-A04	RXHH-A04 X10
6024	RXHH-A05	RXHH-A05 X 10

FIGURE 2: HORIZONTAL ADAPTER KIT ILLUSTRATION



• INDOOR COIL CASING- RXBC (See Table 5)

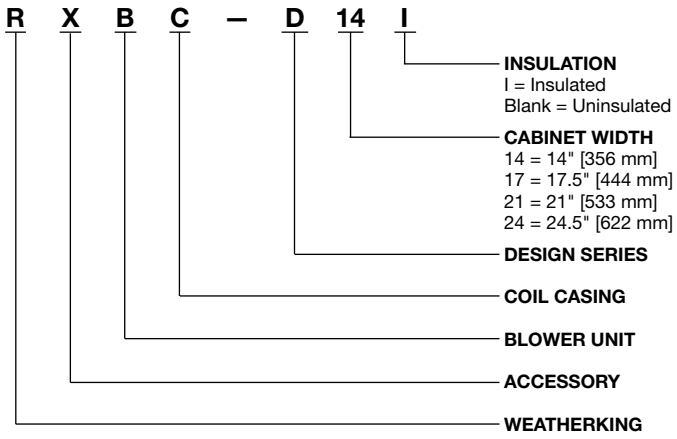


Table 5: Unit Dimensions and Weights- RXBC Indoor Coil Casings

Model Number	Width (in.) [mm]	Height (in.) [mm]	Depth (in.) [mm]	Unit Weight		Supply Air/Return Air Openings	
				Weight (lbs.) [Kg.]	Ship. Wt. (lbs.) [Kg.]	Width (in.) [mm]	Depth (in.) [mm]
RXBC-D14AI	14 [356]	23 3/16 [589]	21 5/8 [549]	19 [9]	23 [10]	13 [330]	19 31/32 [508]
RXBC-D17AI	17½ [445]	20 [508]		18 [8]	23 [10]	16½ [419]	
RXBC-D21AI	21 [533]	20 [508]		20 [9]	26 [12]	20 [508]	
RXBC-D21BI	21 [533]	28 [711]		27 [12]	36 [17]	20 [508]	
RXBC-D24AI	24½ [622]	32½ [826]		34 [16]	44 [20]	23½ [597]	

Table 6: Uncased Coil Adapter Kit

Uncased Coil Adapter Model Number RXBA	A Width (in.) [mm]	Uncased Coil Model RCFP
B14x20	13 1/8 [333]	-HUxx14
B17x20	16 5/8 [422]	-HUxx17
B21x20	20 1/8 [511]	-HUxx21
B24x20	23 5/8 [599]	-HUxx24

[ ] Designates Metric Conversions

Accessories (cont.)

- **UNCASED COIL ADAPTER KIT**
  RXBA- (See Figure 3 & 4)

This uncased coil adapter kit is used to adapt the coil to a furnace or ductwork. See Table 6 to order the proper adapter kit. Each kit contains a quantity of 20 adapters.

FIGURE 3: UNCASED COIL ADAPTER KIT ILLUSTRATION

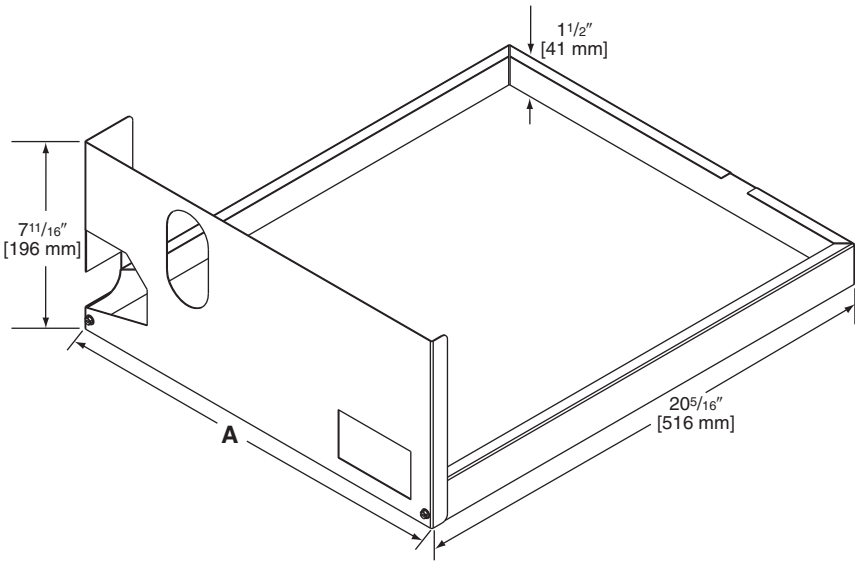
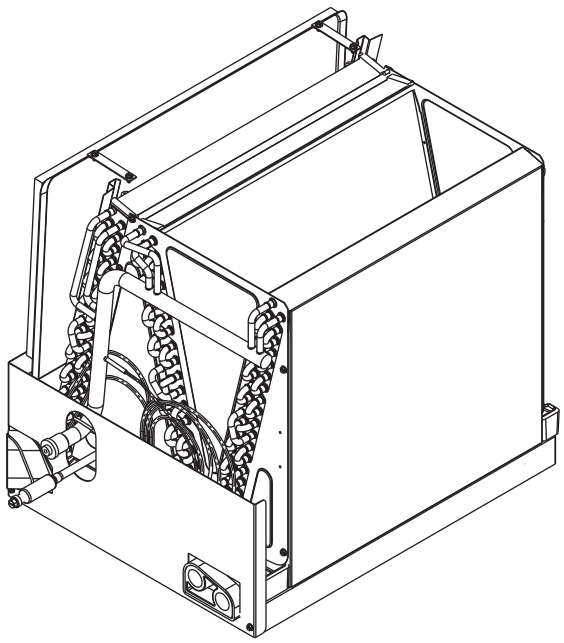


FIGURE 4: UNCASED COIL ADAPTER KIT ASSEMBLED



Note: Sliding the coil into the coil rail before attaching coil rack front.

[ ] Designates Metric Conversions

R-22 TXV Conversion Kits

To be used to convert R410-A coil to operate with R-22

FURNACE COIL CROSS REFERENCE CHART		
ORIGINAL COIL	**RECOMMENDED ALUMINUM TUBE REPLACEMENT COIL**	**R-22 TXV CONVERSION KIT MODEL NO.**
RCFA-**2414	TCF2414STAT	RXCT-HBA
RCFA-**2417	TCF2417STA	RXCT-HBA
RCFA-**3617	TCF3617STA, TCF2417MTA, or TCF2417HTA	RXCT-HBB
RCFA-**3621	TCF3621STA, TCF2417MTA, or TCF2421HTA	RXCT-HBB
RCFA-**4821	TCF4821STA or TCF3621MTA	RXCT-HBC
RCFA-**4824	TCF4824STA or TCF3624MTA	RXCT-HBC
RCFA-**6024	TCF6024STA, TCF6024HTA, TCF4824HTA, or TCF3624HTA	RXCT-HBD

**= AU, HM, or HU

GENERAL TERMS OF LIMITED WARRANTY*

WeatherKing will furnish a replacement for any part of this product which fails in normal use and service within the applicable periods stated, in accordance with the terms of the limited warranty.

***For complete details of the Limited and Conditional Warranties, including applicable terms and conditions, contact your local contractor or the Manufacturer for a copy of the product warranty certificate.**

Parts.....Five (5) Years

Before proceeding with installation, refer to installation instructions packaged with each model, as well as complying with all Federal, State, Provincial, and Local codes, regulations, and practices.

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

PRINTED IN U.S.A. 12-15 QG FORM NO. C66-224