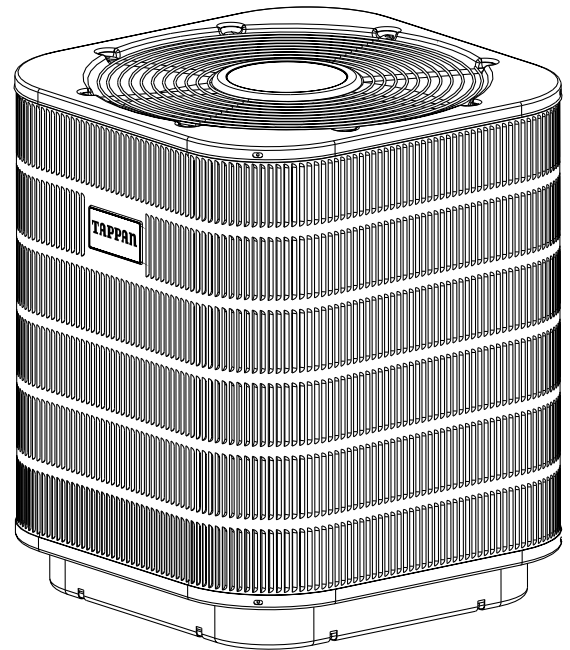


FT3BD Series Ultra High Efficiency Heat Pumps 13+ SEER Residential System 2, 2-1/2, 3, 3-1/2, & 4 Ton Capacity

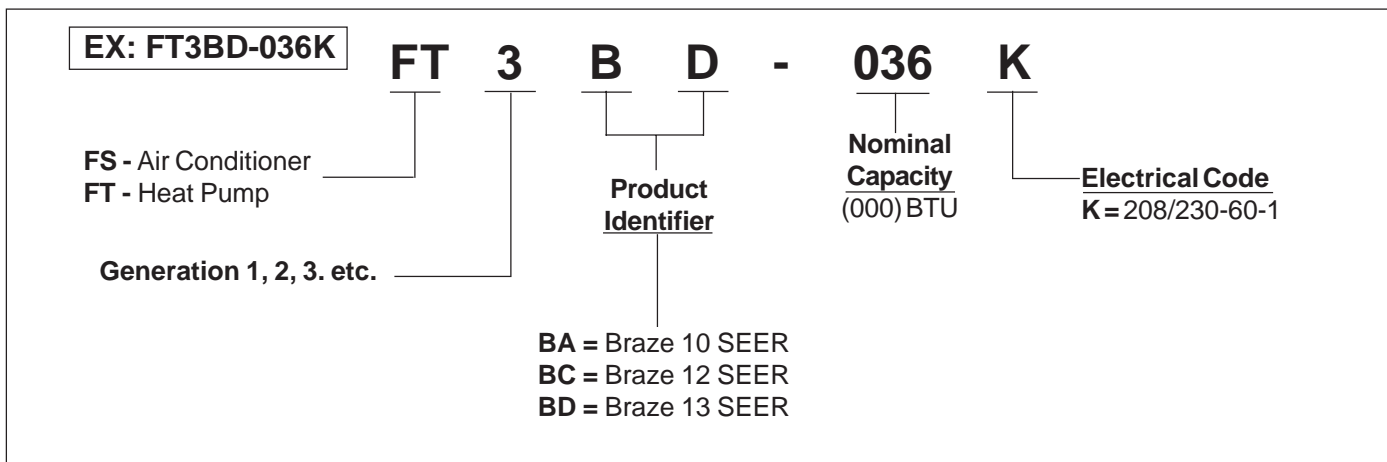
The FT3BD Series of heat pumps offers exceptional performance from a small, compact package. The heat pump, when combined with our engineered coils or air handlers, offers a line of quality, split system heating and cooling equipment. The FT3BD is rated at 13 SEER and 8.0 HSPF when matched with our air handlers. When matched with our variable speed air handler, or our variable speed blower kits, the FT3BD is rated up to 14 SEER and 8.5 HSPF. Units are ideally sized for slab or rooftop mounting in single, multifamily, and light commercial applications.



FEATURES and BENEFITS

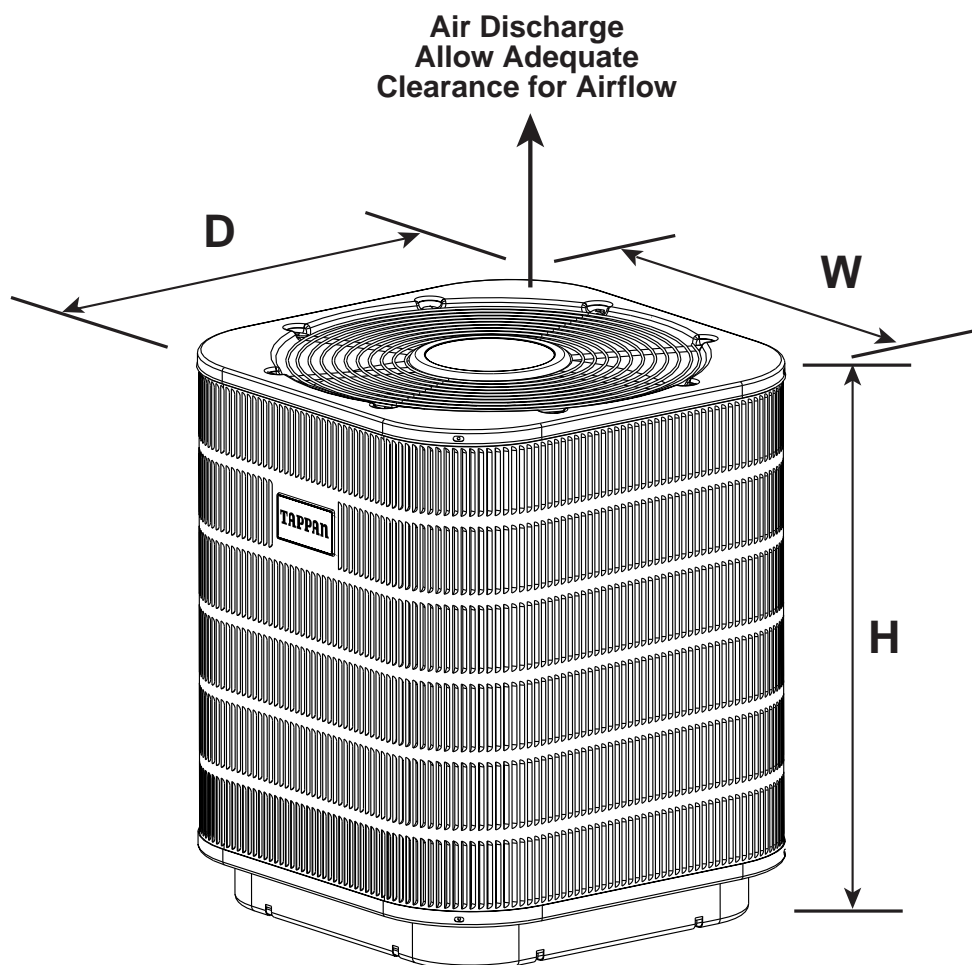
- **Quality Compressor** - State of the art Copeland scroll compressor is standard equipment.
- **Durable, Attractive Cabinet** – Designed using galvanized steel with a polyester urethane finish. The 950 hour salt spray finish is 1.5 mil thick and resists corrosion 50% better than comparable units.
- **Copper Tube / Aluminum Fin Coils** – Both indoor and outdoor coils are designed to optimize heat transfer, minimize size and cost, and increase durability and reliability.
- **Permanently Lubricated Motor** – A heavy duty PSC motor for long lasting reliability and quiet operation. Requires no maintenance and is completely protected from rain and snow.
- **Full Service Valves** – These brass valves are easily accessible and simplify servicing of the refrigeration system.
- **Louvered Condenser Guard** – Durable metal guard protects the coil from yard hazards and extreme weather.
- **Time/Temperature Defrost** – A reliable, industry standard control offers various time settings to meet any type climate.
- **Removable Top Grille Assembly** – Allows ease of service from the top without disconnecting fan motor leads.
- **Hail Guard** – Provided for coil protection.
- **One Piece Top/Orifice** – Designed for maximum airflow and quiet operation.
- **Common Suction Service Port** – This port allows the contractor to read the suction pressure in all modes of operation without removing any panels, saving time and increasing serviceability.
- **2-1/2" Pedestal Base** – The sturdy base keeps the bottom of the coil out of harms way. Secondly, the base has weep holes along the edge to allow the water from the defrosting coil and rain to flow away from the unit.
- **Five Minute Restart Time Delay** – When the unit shuts down, a five minute delay keeps the unit from restarting, eliminating the highest cause for compressor failure.
- **Suction Accumulator** – Protection from liquid flood back and future compressor failures.
- **Hot Gas Muffler** – Reduces compressor noise and vibration.
- **Easy Compressor and Control Access** – Designed to make servicing easier for the contractor, access panels are provided to all controls and the compressor from the side of the unit.
- **8 Year Limited All Parts Warranty, 5 Year Quality Pledge and 10 Year Parts Coverage on Compressor** – The best in the industry and has proven to be a major benefit to the consumer.

MODEL IDENTIFICATION CODES



DIMENSIONS HEAT PUMP OUTDOOR SECTION

FT3BD-	024K	030K	036K	042K	048K
H	34 1/2	38 1/2	42 1/2	38 1/2	42 1/2
W	30 1/2	30 1/2	30 1/2	30 1/2	30 1/2
D	30 1/2	30 1/2	30 1/2	30 1/2	30 1/2



PHYSICAL AND ELECTRICAL SPECIFICATIONS / OUTDOOR UNITS

13+ SEER — Ultra High Efficiency — Single Phase

Model No. FT3BD-		024K	030K	036K	042K	048K	
Electrical	Volts-Cycles-Phase (1)	208/230-60-1	208/230-60-1	208/230-60-1	208/230-60-1	208/230-60-1	
Data	Total Amps	11.6	13.6	16.2	17.5	19.8	
	Delay Fuse Max. (2)	20	25	30	35	40	
	Min. Circuit Ampacity	14.2	16.6	19.9	21.5	24.4	
Component Data	Coil	Area	20.4	23.0	25.5	23.0	25.5
		Rows-FPI	1-18	1-20	1-20	2-16	2-16
		Tube Dia.	3/8 O.D.	3/8 O.D.	3/8 O.D.	3/8 O.D.	3/8 O.D.
	Fan Motor	Type	PSC	PSC	PSC	PSC	PSC
		Amps	1.4	1.4	1.4	1.5	1.5
		Watts-HP	245	245	245	300	300
	Fan Blade	Dia.-#Blades	24 in. - 2	24 in. - 2	24 in. - 2	24 in. - 3	24 in. - 3
		SCFM	3300	3300	3300	4000	4000
	Compressor Data	RLA	10.2	12.2	14.7	16.0	18.3
		LRA	56	67	83	90	109
Refrigerant Suction Line-Length/O.D. (Liq. Line All Lengths - 3/8"O.D.)		0 - 24 ft.	3/4"	3/4"	3/4"	7/8"	
		25 - 39 ft.	3/4"	3/4"	7/8" (3)	7/8"	
		40 - 75 ft.	3/4"	7/8" (3)	7/8" (3)	7/8"	
Refrigerant Charge (Outdoor unit, Indoor Unit, 15' Line Set)							
R-22 Ounces		128	149	160	238	260	
Weight Approximate (lbs.)	Net	176	184	201	244	255	
	Ship	188	196	213	256	267	

(1) Operating Voltage Range: 198v min. — 253v max.

(2) HACR Type Circuit Breakers may be used.

(3) 7/8" to 3/4" reducer required.

ACCESSORIES - Condensing Unit

Start Assist Kit - 912933

Provides additional starting torque for the compressor motor when operating with low line voltage or high operating temperatures.

Snow Stand

Plastic-coated, molded wire stand which elevates units 7-1/4" above ground level.

913145 - (024 through 048) Shipped six (6) per box.

Outdoor Thermostat - 913235

Two-stage logic provides ability to lock out electric strips down to balance point and bring on in stages.

Time Delay Relay Kit (TDR) - 911758

COPPER WIRE SIZE — AWG (1% Voltage Drop)				
Supply Wire Length-Feet				Supply Circuit Ampacity
200	150	100	50	
6	8	10	14	15
4	6	8	12	20
4	6	8	10	25
4	4	6	10	30
3	4	6	8	35
3	4	6	8	40
2	3	4	6	45
2	3	4	6	50

Wire Size based on N.E.C. for 60° type copper conductors.

SYSTEM HEATING & COOLING CAPACITIES

13+ SEER — Ultra High Efficiency — Single Phase

Outdoor Unit Model Number FT3BD-	Indoor Unit Model Number C3BA-	Cooling Capacity Btuh	SEER	Heating Capacity BTUH @ 47°F	HSPF	Nominal SCFM	Required Indoor Orifice ⁽¹⁾
024K	030U/C-B/A	25,000	13.0	24,600	8.0	900	.065
030K	036U/C-B/A	30,000	13.0	28,200	8.0	1050	.069
036K	042U/C-B	35,400	13.0	34,400	8.0	1250	.077
042K	048U/C-B/C + TDR	40,500	13.0	40,000	8.0	1400	.080
048K	060U/C-C + TDR + LLS	47,000	13.0	46,000	8.0	1600	.090

Outdoor Unit Model Number FT3BD-	Indoor Unit Model Number B3B(M,V)-	Cooling Capacity Btuh	SEER	Heating Capacity BTUH @ 47°F	HSPF	Nominal SCFM	Required Indoor Orifice ⁽¹⁾
024K	030K-B/A	25,000	13.0	24,600	8.0	900	.065
030K	036K-B/A	30,000	13.0	28,200	8.0	1050	.069
036K	042K-B	35,400	13.0	34,400	8.0	1250	.077
042K	048K-B + TDR	40,500	13.0	40,000	8.0	1400	.080
048K	060K-C + TDR + LLS	47,000	13.0	46,000	8.0	1600	.090

Outdoor Unit Model Number FT3BD-	Indoor Unit Model Number C3BA-	Cooling Capacity Btuh	SEER	Heating Capacity BTUH @ 47°F	HSPF	Nominal SCFM	Required Indoor Orifice ⁽¹⁾
024K	030U/C-B + VSB	25,600	14.0	24,000	8.5	880	.065
030K	036U/C-B + VSB	30,400	14.0	27,600	8.5	1100	.069
036K	042U/C-B + VSB	36,000	14.0	34,000	8.5	1210	.077
036K	048U/C-B/C + VSB	36,000	14.0	34,000	8.5	1210	.077
042K	048U/C-B/C + VSB	41,000	14.0	40,000	8.5	1325	.080
048K	060U/C-C + VSB + LLS	47,500	14.0	45,000	8.5	1550	.090

Outdoor Unit Model Number FT3BD-	Indoor Unit Model Number B3VM-	Cooling Capacity Btuh	SEER	Heating Capacity BTUH @ 47°F	HSPF	Nominal SCFM	Required Indoor Orifice ⁽¹⁾
024K	036K-B	25,600	14.0	24,000	8.5	880	.065
030K	048K-B	30,400	14.0	27,600	8.5	1100	.069
036K	048K-B	36,000	14.0	34,000	8.5	1210	.077
042K	048K-B	41,000	14.0	40,500	8.5	1325	.080
048K	060K-C + LLS	47,500	14.0	45,000	8.5	1550	.090

(1) Orifice supplied with outdoor unit.

The ratings shown above are for the highest sales volume combination. Additional ratings, including mix-matches may be found in the current edition of the ARI Directory of Certified Unitary Equipment. Verification of ratings not printed in the current edition of the Directory may be obtained online at the ARI website (www.ari.org/).



CERTIFICATION APPLIES ONLY
WHEN THE COMPLETE
SYSTEM IS LISTED
WITH ARI

We Encourage
Professionalism



Through Technician
Certification by NATE

940A-1004 (Replaces 940A-0701)