

# TABULAR DATA SHEET

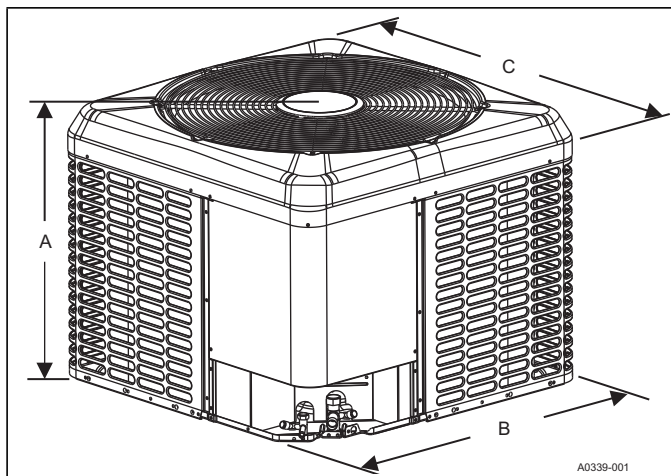
## LX SERIES SPLIT SYSTEM AIR CONDITIONERS 13.0 SEER – R-410A – 1 PHASE – 1.5 THRU 5 NOMINAL TONS MODELS: YCD18 THRU 60

### PHYSICAL AND ELECTRICAL DATA

MODEL	TC3B18 B21(H,S)	TC3B24 B21(H,S)	TC3B30 B21(H,S)	TC3B36 B21(H,S)	TC3B42 B21(H,S)	TC3B48 B21S	TC3B60 B21S	
Unit Supply Voltage	208-230V, 1 $\phi$ , 60Hz							
Normal Voltage Range <sup>1</sup>	187 to 252							
Minimum Circuit Ampacity	9.6	12.3	14.2	19.9	21.9	28.5	34.3	
Max. Overcurrent Device Amps <sup>2</sup>	15	20	20	30	35	50	60	
Min. Overcurrent Device Amps <sup>3</sup>	15	15	15	20	25	30	35	
Compressor Type	Recip	Recip	Recip	Recip	Recip	Scroll	Scroll	
Compressor Amps	Rated Load	7.0	9.2	10.7	14.7	16.5	21.8	26.4
	Locked Rotor	45.0	45.0	57.0	78.0	88.0	117	134
Crankcase Heater	No	No	No	No	No	No	No	
Factory External Discharge Muffler	No	No	No	No	Yes	No	No	
HS Kit Required with TXV <sup>4</sup>	Yes*	Yes*	Yes*	Yes*	Yes*	No	No	
Fan Diameter Inches	18	18	18	18	22	22	22	
Fan Motor	Rated HP	1/8	1/8	1/8	1/4	1/4	1/4	
	Rated Load Amps	0.80	0.80	0.80	1.50	1.30	1.30	
	Nominal RPM	1075	1075	1075	1100	850	850	
	Nominal CFM	1925	1950	2150	2575	2925	3225	
Coil	Face Area Sq. Ft.	8.26	9.78	11.07	12.37	12.22	13.83	
	Rows Deep	1	1	1	1	1	1	
	Fins / Inch	23	23	23	23	23	23	
Liquid Line Set OD (Field Installed)	3/8	3/8	3/8	3/8	3/8	3/8	3/8	
Vapor Line Set OD (Field Installed) <sup>5</sup>	3/4	3/4	3/4	3/4	7/8	7/8	1-1/8 <sup>‡</sup>	
Unit Charge (Lbs. - Oz.) <sup>6</sup>	2 - 15	3 - 4	3 - 13	4 - 1	4 - 6	4 - 8	5 - 6	
Charge Per Foot, Oz.	0.62	0.62	0.62	0.62	0.67	0.67	0.75	
Operating Weight Lbs.	125	130	140	140	175	165	175	

Models with "H" on the end of the model number are shipped with a Hard Start Kit installed at the factory.

1. Rated in accordance with AHRI Standard 110-2012, utilization range "A".
2. Dual element fuses or HACR circuit breaker. Maximum allowable overcurrent protection.
3. Dual element fuses or HACR circuit breaker. Minimum recommended overcurrent protection.
4. See Hard Start Kit Accessory Installation Manual for Hard Start Kit part number for each model.
5. For applications with non-standard vapor line sizes, see the "Applications & Accessories" section of this Technical Guide.
6. The Unit Charge is correct for the outdoor unit, smallest matched indoor unit, and 15 feet of refrigerant tubing. For tubing lengths other than 15 feet, add or subtract the amount of refrigerant, using the difference in actual lineset length (not the equivalent length) multiplied by the per foot value.



### DIMENSIONS

Unit Model	Dimensions (Inches)			Refrigerant Connection Service Valve Size	
	A	B	C	Liquid	Vapor
TC3B18B21(H,S)	23-1/2	24	24	3/8	3/4
TC3B24B21(H,S)	26-3/4	24	24		
TC3B30B21(H,S)	30	24	24		
TC3B36B21(H,S)	33-1/4	24	24		7/8
TC3B42B21(H,S)	26-3/4	29-1/4	29-1/4		
TC3B48B21S	30	29-1/4	29-1/4	7/8 <sup>‡</sup>	
TC3B60B21S	36-1/4	29-1/4	29-1/4		

<sup>‡</sup> Adapter fitting must be field installed for the required 1-1/8" line set.  
All dimensions are in inches and are subject to change without notice.  
Overall height is from bottom of base pan to top of fan guard.  
Overall length and width include screw heads.

## SYSTEM CHARGE FOR VARIOUS MATCHED SYSTEMS

Outdoor Unit	TC3B18 B21(H,S)	TC3B24 B21(H,S)	TC3B30 B21(H,S)	TC3B36 B21(H,S)	TC3B42 B21(H,S)	TC3B48 B21S	TC3B60 B21S
Required Orifice or TXV <sup>1,2</sup>	0.047 / BA1	0.057 / BA1	0.063 / BA1	0.067 / BC1	0.073 / BC1	0.077 / BC1	0.084 / BD1
Indoor Unit <sup>3,4,5</sup>	Additional Charge, oz						
AP18B	0	–	–	–	–	–	–
AP24B	3	0	–	–	–	–	–
AP30B	10	7	2	–	–	–	–
AP36B	10	7	2	0	–	–	–
AP36C	–	11	2	2	–	–	–
AP42C	–	11	2	2	0	–	–
AP48(C,D)	–	–	–	5	2	0	–
AP60(C,D)	–	–	–	–	9	2	0
AE18B	0	–	–	–	–	–	–
AE24B	3	0	–	–	–	–	–
AE30B	8	5	0	–	–	–	–
AE36(B,C)	10	7	2	0	–	–	–
AE42C	–	–	–	5	2	–	–
AE48(C,D)	–	–	–	5	2	0	–
AE60C	–	–	–	–	9	2	0
AE60D	–	–	–	–	29 oz TXV ONLY	22 oz TXV ONLY	20 oz TXV ONLY
AVC18B	0	–	–	–	–	–	–
AVC24B	3	0	–	–	–	–	–
AVC30B	8	5	0	–	–	–	–
AVC36(B,C)	10	7	2	0	–	–	–
AVC42C	–	–	–	5	2	–	–
AVC48(C,D)	–	–	–	5	2	0	–
AVC60C	–	–	–	–	9	2	0
AVC60D	–	–	–	–	29 oz TXV ONLY	22 oz TXV ONLY	20 oz TXV ONLY
CF/CM/CU18(A,B)	0	–	–	–	–	–	–
CF/CM/CU24(A,B)	3	0	–	–	–	–	–
CF/CM/CU30(A,B,C)	8	5	0	–	–	–	–
CF/CM/CU36(A,B,C)	10	7	2	0	–	–	–
CF/CM/CU42(B,C,D)	–	11	2	2	0	–	–
CF/CM/CU48(C,D)	–	–	–	5	2	0	–
CF/CM/CU60(C,D)	–	–	–	–	9	2	0
CF/CM64D	–	–	–	–	29 oz TXV ONLY	22 oz TXV ONLY	20 oz TXV ONLY

Some of the combinations shown in the above System Charge table require Advanced Main Air Circulating Fan indoor product. For approved coil only matches, please see the "COOLING CAPACITY - Upflow, Downflow & Horizontal Furnaces and Coils" table.

### FOOTNOTES:

- For applications requiring a TXV, use S1-1TVM\*\*\* series kit.
- Approved orifice(s) shipped with outdoor unit.
- Systems matched with furnaces or air handlers not equipped with blower-off delays may require blower Time Delay Kit S1-2FD06700224.
- CF coils cannot be used in horizontal applications.
- Charge adders shown above do not indicate that coils are rated for every application. Refer to Performance Data Tables for actual performance for specified system matches. Obtain certified system ratings from [www.ahridirectory.org](http://www.ahridirectory.org).

### CHARGING PROCEDURES:

- Check the Factory Unit Charge listed on the unit nameplate to verify the refrigerant charge for the outdoor unit, the smallest matched indoor unit, and the 15 feet of interconnecting lineset.
- Verify the indoor metering device and additional charge required for the specific matched indoor unit in the system using the above table.
- Add additional charge for the amount of interconnecting lineset greater than 15 feet at the rate specified in the Physical and Electrical Table.
- For installations requiring additional charge, weigh in refrigerant for the specific matching indoor unit and actual lineset length.
- Once the charge adders for matched indoor unit and for lineset have been weighed in, verify the system operation against the temperatures and pressures in the Charging Chart for the outdoor unit. Locate Charging Charts on the outdoor unit and also in the Service Data Application Guide on [www.upgnet.com](http://www.upgnet.com). Follow the Subcool or the Superheat charging procedure in the Installation Manual according to the type of indoor metering device in the system, and allow ten minutes after each charge adjustment for the system operation to stabilize. Record the charge adjustment made to match the Charging Chart.
- Permanently stamp the unit data plate with the TOTAL SYSTEM CHARGE defined as follows: TOTAL SYSTEM CHARGE = Base Charge (as shipped) + charge adder for matched indoor unit + charge adder for actual lineset length + charge adjustments to match the Charging Chart.