

ZR36K3E-PFJ

HFC, R-407C, 50 Hz, 1 - Phase, 220/240 V

Air Conditioning

Production Status: Available for sale to all U.S. customers. Please check with your local Emerson Climate Technologies Representative for international availability.

| Performance | | | Mechanical | |
|----------------------------|------------|---------|--|---------------------|
| Evaporator Temp. (°C) | 7 | 7 | Displacement (cm ³ /Rev): | 49.49 |
| Condensing Temp. (°C) | 54 | 38 | Displacement (m ³ /Hr): | |
| Return Gas Temp. (°C) | 18 | 18 | Overall Length (mm): | 246.13 |
| Liquid Temp. (°C) | 46 | 29 | Overall Width (mm): | 246.13 |
| Capacity (Watts) | 8440 | 10287 | Overall Height (mm): | 399.54 |
| Power (W): | 2740 | 1840 | Mounting Length (mm): | 190.50 |
| Current (Amps): | 13.1 | 9.2 | Mounting Width (mm): | 190.50 |
| EER(BTU/Wh): | 17.84 | 32.28 | Mounting Height (mm): | 405.64 |
| Mass Flow (lbs/hr): | 52.79 | 54.94 | Suction Size (mm),Type: | 76.20 / 101.60 Stub |
| Sound Data @ | | | Discharge Size (mm),Type: | 25.40 / 50.80 Stub |
| Sound Power (dBA): | 68 Avg | 73 Max | Initial Oil Charge (ml): | 1242.11 |
| Vibration mils(peak-peak): | 2.0 Avg | 3.0 Max | Oil Recharge (ml): | 1123.81 |
| Record Date: | 2005-04-15 | | Net Weight (kg): | 29.48 |
| | | | Internal Free Volume (cm ³): | 2638.31 |
| | | | Horse Power: | 3.0 |

*Overall compressor height on Copeland Brand Product's specified mounting grommets.

| Electrical | | Capacitors | | | | | |
|---|------------|---------------|-------------|---------|----------|--------|------------------|
| | | Type | Part No | Low MFD | High MFD | Volt s | User Description |
| LRA High* (Amps): | 82.0 | | | | | | |
| LRA Low*(Amps): | 75.0 | Run Capacitor | 014-0054-40 | 50.0 | 0.0 | 370 | ALTERNATE MOTOR |
| LRA Half Winding (Amps): | | | | | | | |
| MCC (Amps): | 23 | Run Capacitor | 014-0064-16 | 50.0 | 0.0 | 440 | |
| Max Operating Current (Amps): | 19.3 | | | | | | |
| RLA, MCC/1.4(use for contactor selection)(Amps): | 16.4 | Run Capacitor | 014-0064-29 | 50.0 | 0.0 | 370 | |
| RLA, MCC/1.56(use for breaker & wire size selection)(Amps): | 14.7 | | | | | | |
| RPM: | 2900 | | | | | | |
| Box IP : | 21 | | | | | | |
| UL File No: | | | | | | | |
| UL File Date: | 1994-06-14 | | | | | | |

*Low and High refer to the low and high nominal voltage ranges for which the motor is approved.

Rating Conditions

11.1 K Superheat
8.3 K Subcooling
35 °C Ambient Air Over

50 Hz Operation

AIR CONDITIONING

ZR36K3E-PFJ

HFC-407C - Dew Pt.
COPELAND SCROLL®
PFJ 220/240-1-50

Condensing Temperature °C
(Sat. Dew Pt. Pressure, bar) Evaporating Temperature °C (Sat. Dew Pt. Pressure, bar)

| | -20.0 (2.1) | -15.0 (2.6) | -10.0 (3.2) | -5.0 (3.9) | 0.0 (4.6) | 5.0 (5.5) | 7.0 (5.8) | 10.0 (6.4) | 12.0 (6.9) |
|--|-------------|-------------|-------------|------------|-----------|-----------|-----------|------------|------------|
| 65.0 (28.4) C P A M E % | | | | | | 6,500 | 7,050 | 7,950 | 8,600 |
| | | | | | | 3,570 | 3,560 | 3,550 | 3,540 |
| | | | | | | 16.6 | 16.6 | 16.6 | 16.5 |
| | | | | | | 46 | 50 | 56 | 60 |
| | | | | | | 1.8 | 2.0 | 2.2 | 2.4 |
| | | | | | 55.6 | 57.5 | 60.2 | 61.9 | |
| 60.0 (25.3) C P A M E % | | | | | 5,750 | 7,100 | 7,700 | 8,650 | 9,350 |
| | | | | | 3,170 | 3,160 | 3,150 | 3,130 | 3,120 |
| | | | | | 14.9 | 14.9 | 14.8 | 14.8 | 14.7 |
| | | | | | 39 | 48 | 51 | 57 | 61 |
| | | | | | 1.8 | 2.3 | 2.4 | 2.8 | 3.0 |
| | | | | 55.1 | 60.0 | 61.8 | 64.2 | 65.7 | |
| 55.0 (22.5) C P A M E % | | | | 5,050 | 6,250 | 7,700 | 8,300 | 9,300 | 10,000 |
| | | | | 2,820 | 2,810 | 2,790 | 2,780 | 2,760 | 2,750 |
| | | | | 13.4 | 13.4 | 13.3 | 13.3 | 13.2 | 13.1 |
| | | | | 33 | 40 | 49 | 52 | 58 | 62 |
| | | | | 1.8 | 2.2 | 2.8 | 3.0 | 3.4 | 3.6 |
| | | | 54.0 | 59.2 | 63.7 | 65.4 | 67.5 | 68.7 | |
| 50.0 (19.9) C P A M E % | | | 4,350 | 5,450 | 6,750 | 8,250 | 8,900 | 9,950 | 10,700 |
| | | | 2,520 | 2,510 | 2,500 | 2,480 | 2,460 | 2,450 | 2,430 |
| | | | 12.1 | 12.1 | 12.0 | 11.9 | 11.9 | 11.8 | 11.8 |
| | | | 27 | 34 | 41 | 49 | 53 | 59 | 63 |
| | | | 1.7 | 2.2 | 2.7 | 3.3 | 3.6 | 4.1 | 4.4 |
| | | 52.2 | 57.8 | 62.7 | 66.7 | 68.1 | 69.7 | 70.6 | |
| 45.0 (17.5) C P A M E % | | 3,700 | 4,700 | 5,850 | 7,200 | 8,750 | 9,450 | 10,550 | 11,300 |
| | | 2,250 | 2,250 | 2,240 | 2,220 | 2,200 | 2,190 | 2,170 | 2,150 |
| | | 11.0 | 11.0 | 10.9 | 10.8 | 10.7 | 10.7 | 10.6 | 10.6 |
| | | 22 | 28 | 35 | 42 | 50 | 54 | 60 | 64 |
| | | 1.6 | 2.1 | 2.6 | 3.2 | 4.0 | 4.3 | 4.9 | 5.3 |
| | 49.7 | 55.7 | 61.0 | 65.3 | 68.6 | 69.6 | 70.6 | 70.9 | |
| 40.0 (15.4) C P A M E % | 3,050 | 3,950 | 5,050 | 6,250 | 7,650 | 9,250 | 9,950 | 11,100 | 11,900 |
| | 2,010 | 2,020 | 2,010 | 2,000 | 1,980 | 1,950 | 1,940 | 1,920 | 1,910 |
| | 9.9 | 10.0 | 9.9 | 9.9 | 9.8 | 9.7 | 9.6 | 9.6 | 9.5 |
| | 18 | 23 | 29 | 35 | 42 | 51 | 54 | 60 | 64 |
| | 1.5 | 2.0 | 2.5 | 3.1 | 3.9 | 4.7 | 5.1 | 5.8 | 6.2 |
| 46.2 | 52.9 | 58.6 | 63.3 | 66.9 | 69.2 | 69.6 | 69.7 | 69.3 | |
| 35.0 (13.5) C P A M E % | 3,250 | 4,250 | 5,350 | 6,600 | 8,050 | 9,750 | 10,500 | 11,650 | 12,500 |
| | 1,810 | 1,810 | 1,800 | 1,780 | 1,760 | 1,740 | 1,730 | 1,710 | 1,700 |
| | 9.0 | 9.0 | 9.0 | 9.0 | 8.9 | 8.8 | 8.7 | 8.7 | 8.6 |
| | 19 | 24 | 29 | 36 | 43 | 51 | 55 | 60 | 65 |
| | 1.8 | 2.3 | 3.0 | 3.7 | 4.6 | 5.6 | 6.1 | 6.8 | 7.4 |
| 49.2 | 55.6 | 60.8 | 64.8 | 67.3 | 68.1 | 67.8 | 66.6 | 65.3 | |
| 30.0 (11.8) C P A M E % | 3,500 | 4,500 | 5,650 | 6,950 | 8,450 | 10,200 | 10,950 | 12,200 | 13,050 |
| | 1,620 | 1,610 | 1,600 | 1,590 | 1,570 | 1,550 | 1,540 | 1,520 | 1,510 |
| | 8.2 | 8.2 | 8.2 | 8.1 | 8.0 | 7.9 | 7.9 | 7.9 | 7.8 |
| | 19 | 24 | 30 | 36 | 43 | 51 | 55 | 61 | 65 |
| | 2.2 | 2.8 | 3.5 | 4.4 | 5.4 | 6.6 | 7.1 | 8.0 | 8.6 |
| 51.7 | 57.6 | 62.1 | 65.1 | 66.2 | 65.1 | 63.8 | 61.0 | 58.5 | |
| 27.0 (10.8) C P A M E % | 3,600 | 4,650 | 5,800 | 7,150 | 8,700 | 10,450 | 11,250 | 12,500 | 13,400 |
| | 1,510 | 1,500 | 1,490 | 1,480 | 1,460 | 1,440 | 1,430 | 1,420 | 1,410 |
| | 7.8 | 7.7 | 7.7 | 7.6 | 7.6 | 7.5 | 7.5 | 7.4 | 7.4 |
| | 19 | 24 | 30 | 36 | 43 | 52 | 55 | 61 | 65 |
| | 2.4 | 3.1 | 3.9 | 4.8 | 6.0 | 7.3 | 7.9 | 8.8 | 9.5 |
| 53.1 | 58.6 | 62.6 | 64.8 | 64.8 | 62.2 | 60.3 | 56.3 | 52.8 | |

C: Capacity (W), P: Power (W), A: Current (Amps), M: Mass Flow (gm/s), E: COP, %: Isentropic Efficiency (%)

Nominal Performance Values (±5%) based on 72 hours run-in. Subject to change without notice. Current @ 220 V