

# ZB56KCE-TWD

HFC, R-404A, 60 Hz, 3 - Phase, 460 V , [Also Available with Variable Frequency Drives](#)

## Medium Temperature

**Production Status:** This compressor and/or application of this compressor is not available to U.S. OEM customers. A field replacement is currently available through a U.S. Copeland Wholesaler. Please check with your local Copeland Representative for international availability.

## Summary

Performance		
Evaporator Temp. (°F)	20.00	45
Condensing Temp. (°F)	120.00	130
Return Gas Temp. (°F)	65.00	65
Liquid Temp. (°F)	120.00	130
Capacity (BTU/hr)	54000	76000
Power (W):	8100	9350
Current (Amps):	12.9	14.4
EER(BTU/Wh):	6.6	8.1
Mass Flow (lbs/hr):	1140	1860
Sound Data @		
Sound Power (dBA):	82 Avg	87 Max
Vibration mils(peak-peak):	2.0 Avg	3.0 Max
Record Date:	2004-12-01	
Mechanical		
Displacement (in <sup>3</sup> /Rev):	7.32	
Displacement (ft <sup>3</sup> /Hr):		
Overall Length (in):	13.65	
Overall Width (in):	12.03	
Overall Height (in):	21.17	
Mounting Length (in):	8.65	
Mounting Width (in):	8.65	

<b>Mounting Height (in):</b>	.00
<b>Suction Size (in),Type:</b>	1 3 / 4 Rotalock
<b>Discharge Size (in),Type:</b>	1 1 / 4 Rotalock
<b>Initial Oil Charge (oz):</b>	140
<b>Oil Recharge (oz):</b>	137
<b>Oil Type:</b>	POE
<b>Net Weight (lbs):</b>	192.0
<b>Internal Free Volume (in<sup>3</sup>):</b>	1037.4

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

#### Electrical

<b>LRA High* (Amps):</b>	99
<b>LRA Low*(Amps):</b>	
<b>LRA Half Winding (Amps):</b>	
<b>MCC (Amps):</b>	22
<b>Max Operating Current (Amps):</b>	15.40
<b>RLA, MCC/1.4(use for contactor selection)(Amps):</b>	15.7
<b>RLA, MCC/1.56(use for breaker &amp; wire size selection)(Amps):</b>	14.1
<b>RPM:</b>	3500
<b>Box IP :</b>	54
<b>UL File No:</b>	SA-9747
<b>UL File Date:</b>	1994-07-12
<b>European Pressure Equipment Directive (PED):</b>	
<b>Fluid Group**:</b>	FG 2
<b>PS Low / High Side (BAR):</b>	22.6 / 32.0
<b>TS Min (°C):</b>	-35 / -35
<b>TS Max (°C):</b>	50 / 150
<b>Volume (L) :</b>	

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

\*\*Fluid Group 1 comprises dangerous fluids defined as: Explosive, extremely flammable, high flammable, very toxic, toxic, oxidizing.

Fluid Group 2 is for non-dangerous fluids defined as: non-explosive, non-toxic, non-flammable.

#### Capacitors

Type	Part No	Low MFD	High MFD	Volts	User Description
No data available in table					
Alternate Applications					
Refrigerant	Voltage	Phase	Frequency	Application	
R-134a HFC	460	3	60	High Temp	
R-134a HFC	380/420	3	50	High Temp	
R-22 HCFC	460	3	60	High Temp	
R-22 HCFC	380/420	3	50	High Temp	
R-404A HFC	380/420	3	50	Medium Temperature	
R-407A HFC	380/420	3	50	Medium Temperature	
R-407A HFC	460	3	60	Medium Temperature	
R-407C HFC	380/420	3	50	Medium Temperature	
R-407C HFC	460	3	60	Medium Temperature	
R-507 HFC	380/420	3	50	Medium Temperature	

## Nomenclature

ZB56KCE-TWD

### Family Series

**Z:** Scroll

### Application Range

**B:** Ref High/ Med. Temp. - R-22/404A/410A/407A/C/F

### Capacity

**56K:** Capacity Multiplier-1000

### Model Variation

**C:** Model Variation

### Oil Type

**E:** Polyol Ester

### Motor Type

**T:** 3 Phase

### Motor Protection

**W:** External Electronic Protection

### Voltage

**D:** 60Hz (460-3) 50Hz (380/420-3)