

HERMETIC REFRIGERATION COMPRESSORS

COPELAND AFTERMARKET REFRIGERATION COMPRESSORS

Application Range			Compressor Motor Protection	
Code	Description	Rating Point	Type Protection	Code
S	Medium & Extended Temperature R-404A, R-22	20/120	Internal Thermal Protection - Electronic Sensors; and Control Module External Use with Contactor	S
F	Extended Medium R-134a, R-404A	-10/120	Internal Inherent Protection - One Protector (Line Break) Use with Contactor	F
R	High Temperature R-134a	45/130	External Inherent Protection - One Protector (Line Break) Use with Contactor	A

Compressor Shell Series

Compressor Motor Types

Phase	Description	Code
1	Capacitor Run - Capacitor Start	C
1	Induction Run - Capacitor Start	I
1	Capacitor Run - Permanent Split Capacitor	P
3	Three Phase	T
1	Induction Run-Split Phase	S

Product Variations
Three-digit Bill of Material number that indicates compressor configuration and may include accessories.

X X X X X X X X E - X X X - X X X

Compressor Family Series
A, R, C

Capacity Multiplier
C: 100
K: 1000

Capacity
Compressor nominal capacity at 60 Hz rating condition to two significant digits.

Model Series Variation
A number of letter arbitrarily assigned to indicate different model types within any one family series.

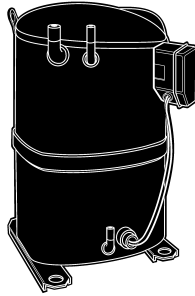
Oil Identifier
"E" designates Polyol Ester.

Electrical Codes

60 Hz	50 Hz	Code
115-1	—	A
208/230-3	200/220-3	C
460-3	380/420-3	D
575-3	500-3	E
265-1	220/240-1	J
—	380/430-3	M
208/230-1	200-1	V
—	220/240-1	Z
200/230-3	200/240-3	5

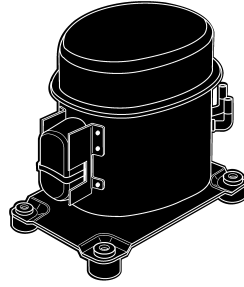
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COPELAND AFTERMARKET REFRIGERATION COMPRESSORS (cont)



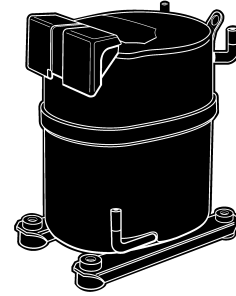
P8

C



P15

A



P7

R

60 Hz — R-22, R-404A, R-507 High Temp (HT), Extended Med. Temp (EMT), Med Temp (MT) and Low Temp (LT)

COPELAND PART NO.	HP	VOLT/ PH	R-404A					R-22 AND R-507 (BOLD)					DIMENSIONS (in.)			CONNECTIONS (in.)		OIL TYPE	SHIP. WT (lb)
			App	RLA	Btuh	Watts	Amps	App	RLA	Btuh	Watts	Amps	L	W	H	Disch	Suct		
ART69C1-IAA-959	0.5	115-1						HT	11.4	6,900	910	9.6	9.6	6.6	8.6	1/4	3/8	AB	43
								MT	11.4	3,380	570	6.9							
ART69C1-IAV-959	0.5	208/230-1						HT	6.1	6,900	910	4.7	9.6	6.6	8.6	1/4	3/8	AB	43
								MT	6.1	3,380	570	3.4							
RS43C1E-CAA-908	0.5	115-1	EMT	10.1	4,170	940	9.4						10.8	6.6	11.3	3/8	1/2	POE	51
RS43C2E-IAA-959	0.5	115-1	LT	10.1	1,720	600	7.2												
RS43C1E-CAV-909	0.5	208/230-1	EMT	5.4	4,170	940	5.6						10.8	6.6	11.3	3/8	1/2	POE	51
RS43C2E-IAV-959	0.5	208/230-1	LT	5.7	1,720	600	4.3												
RS47C2-IAA-959	0.75	115-1						HT	14.3	8,620	1250	15.3	9.4	6.6	11.1	1/4	3/8	AB	51
								MT	14.3	4,770	930	13.0							
RS47C2-IAV-959	0.75	208/230-1						HT	7.1	8,620	1250	7.6	9.4	6.6	11.1	1/4	3/8	AB	51
								MT	7.1	4,770	930	6.5							
RS64C2E-CAA-959	0.75	115-1	EMT	15.2	6,450	1460	12.9	MT	15.2	6,390	1290	11.4	10.8	6.6	10.8	3/8	1/2	POE	51
			LT	15.2	2,860	1050	9.2												
RS64C2E-PAA-908	0.75	115-1	EMT	15.2	6,450	1460	12.9	MT	15.2	6,390	1290	11.4	10.8	6.6	10.8	3/8	1/2	POE	51
			LT	15.2	2,860	1050	9.2												
RS64C2E-CAV-959	0.75	208/230-1	EMT	7.7	6,450	1460	6.4	HT	7.7	11,000	1610	7.1	10.8	6.6	11.3	3/8	1/2	POE	51
RS64C2E-IAV-959	0.75	208/230-1	LT	9.2	2,860	1050	4.6	MT	9.2	6,390	1290	5.7							
RS64C2-PAA-959	1	115-1						MT	15.2	6,390	1290	11.4	10.8	6.6	11.0	3/8	1/2	AB	51
								HT	7.0	12,500	1440	6.4							
RS70C1-PFV-959	1.25	208/230-1						MT	7.0	7,090	1110	5.1	9.4	6.6	11.1	1/3	1/2	AB	51
								HT	4.7	12,400	1370	3.8							
RS70C1-TFC-950	1.25	208/230-3						HT	9.0	18,400	1860	8.1	9.3	8.94	13.4	3/8	5/8	MO	70
CR18KQ-PFV-980WB	1.5	208/230-1						HT	6.0	18,400	1770	5.5							
CR18KQ-TF5-980WB	1.5	200/230-3											9.3	8.94	13.4	3/8	5/8	MO	70
RS97C2E-CAA-959	1.5	115-1	EMT	19.6	9,590	1940	19.5	—	—	—	—	—	10.8	6.6	10.8	3/8	1/2	POE	51
RS97C2E-CAV-959	1.5	208/230-1	EMT	11.0	9,590	1940	9.7	MT	11.0	9,620	1760	9.1							
RS97C2E-TFC-959	1.5	208/230-1	EMT	7.0	9,400	1890	6.3	—	—	—	—	—	10.8	6.6	11.6	3/8	1/2	POE	51
			EMT	10.9	12,000	1920	8.7	MT	10.9	12,200	1740	7.2							
CS12K6E-PFV-970	2	208/230-1	EMT	10.9	11,800	1920	8.7	MT	10.9	13,600	1430	4.4	10.3	9.1	13.3	3/8	3/4	POE	68
			MT	10.9	11,800	1920	8.7												
CS12K6E-TF5-970	2	200/230-3	EMT	7.5	11,800	1870	5.8	MT	7.5	13,600	1430	4.4	10.3	9.1	13.3	3/8	3/4	POE	68
			MT	7.5	11,800	1870	5.8												
CS14K6E-PFV-970	2.5	208/230-1	EMT	12.4	14,300	2590	7.6	MT	12.4	14,300	2590	7.6	10.3	9.1	13.4	3/8	3/4	POE	68
			MT	12.4	14,100	2280	10.3												
CS14K6E-TF5-970	2.5	200/230-3	EMT	9.1	13,900	2200	6.7	EMT	9.1	14,300	2250	7.0	10.3	9.1	13.4	3/8	3/4	POE	68
			MT	9.1	11,490	2200	6.7	MT	9.1	13,900	1900	3.1							
CS14K6E-TFD-970	2.5	460-3	EMT	4.7	13,900	2200	3.3	EMT	4.7	14,300	2250	3.5	10.3	9.1	13.4	3/8	3/4	POE	68
			MT	4.7	11,490	2200	3.3	MT	4.7	13,900	1900	1.5							
CS20K6E-PFV-970	3	208/230-1	EMT	18.6	20,000	3120	14.9	EMT	18.6	20,600	3180	15.2	10.3	9.1	14.1	1/2	3/4	POE	72
			MT	18.6	20,050	3120	14.9												
CS20K6E-TF5-970	3	200/230-3	EMT	11.4	19,800	3020	9.4	EMT	11.4	20,200	3090	10.2	10.3	9.1	14.1	1/2	3/4	POE	72
			MT	11.4	19,760	3020	9.4												
CS20K6E-TFD-970	3	460-3	EMT	5.1	19,800	3020	4.7	EMT	5.1	20,200	3090	5.1	10.3	9.1	14.1	1/2	3/4	POE	72
			EMT	23.9	27,600	4330	20.5												
CS27K6E-PFV-970	4	208/230-1	EMT	23.9	27,600	4330	20.5						10.3	9.1	14.8	1/2	3/4	POE	75
CS27K6E-TF5-970	4	200/230-3	EMT	15.6	26,800	4310	12.8												
CS27K6E-TFD-970	4	460-3	EMT	7.7	26,800	4310	6.4						10.3	9.1	14.8	1/2	3/4	POE	75
			EMT	30.7	31,700	5090	23.9												
CS33K6E-PFV-970	5	208/230-1	EMT	18.7	30,800	4960	14.8						10.6	9.2	14.8	1/2	7/8	POE	79
CS33K6E-TF5-970	5	200/230-3	EMT	18.7	30,800	4960	14.8												
CS33K6E-TFD-970	5	460-3	EMT	9.9	30,800	4960	7.4						10.6	9.2	14.8	1/2	7/8	POE	79
			EMT	9.9	30,800	4960	7.4												

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COPELAND AFTERMARKET REFRIGERATION COMPRESSORS (cont)

RATING POINTS

HT RATING POINTS — HIGH TEMPERATURE

MODEL	REFRIGERANT	POINT
A	All	45/130/65/130/95
R	All	45/130/65/130/95
C	All	45/130/65/130/95

LT RATING POINTS — LOW TEMPERATURE

MODEL	REFRIGERANT	POINT
A	All	-10/120/40/120/95
R	All	-10/120/40/120/95
C	All	-10/120/40/120/95

MT RATING POINTS — MEDIUM TEMPERATURE

MODEL	REFRIGERANT	POINT
A	All	20/120/40/120/95
R	All	20/120/40/120/95
C	All	20/120/40/120/95

EMT RATING POINTS — EXTENDED MEDIUM TEMPERATURE

MODEL	REFRIGERANT	POINT
A	All	-10/120/40/120/95
R	All	20/120/40/120/95
C	All	20/120/40/120/95

BILL OF MATERIAL (BOM) DESCRIPTION

“A” BOM	-959 <ul style="list-style-type: none"> • Replaces 958 • Electrical Components • Mounting Parts • Single Pack • Suction Valve 	—
“R” BOM	-908 <ul style="list-style-type: none"> • Replaces 908/909 • Electrical Components (mounted on IAA & IAV models; CAA & CAV models include capacitor & relay kit remote) • Mounting Parts • Sweat Connections 	-959 <ul style="list-style-type: none"> • Replaces 950/958/959 • Electrical Components included except on TFC, TFD, TFE models (mounted on IAA & IAV models; CAA & CAV models include capacitor & relay kit remote) • Mounting Parts • Suction Valve/Rotalock
“C” BOM	‘CR’ Compressors -970 & 980WB <ul style="list-style-type: none"> • Crankcase Heater • Mounting Parts • Screw Terminals (CRM-P) • Sweat Connections • Terminal Cover • Terminal Flat Kit (CRA-L) • 7-1/2 x 7-1/2 Footprint 	‘CS’ Compressors -970 <ul style="list-style-type: none"> • Crankcase Heater • Mounting Parts • Screw Terminal (CS33) • Sweat Connections • Terminal Cover • Terminal Flag Kit (CS 10-27) • 7-1/2 x 7-1/2 Footprint • Adapter kit