

Model

SC15CLX.2

Sales code:

104L1853

Compressor Data

Refrigerant(s)	R404A / R452A / R507
Refr. charge - tech. limit	1300g / 45.86oz
Weight	13.70 kg / 30.20lbs
Displacement	15.28 cm³ / 0.93cu.in
Compressors on pallet	80



General – Configurations With SC15CLX.2

–	Conf. 1	Conf. 2	Conf. 3	Conf. 4
Motor configuration	CSIR	CSCR	CSIR	CSCR
Power supply (nominal)	115 V/60 Hz	115 V/60 Hz	115 V/60 Hz	115 V/60 Hz
Number of phases	1	1	1	1
Voltage range	103-127 V	103-127 V	103-127 V	103-127 V
Approvals	UL	UL	UL	UL
Starting torque	HST	HST	HST	HST
Refrigerant	R404A	R404A	R452A	R452A
Application	LBP	LBP	LBP	LBP
Hot gas defrost	OK	OK	OK	OK

Application Notes

- Protector and cover are included and pre-assembled to compressor.
- Provision for PE Grounding is located at the PE Stamp on the compressor

Model
SC15CLX.2

Sales code:
104L1853

Compressor Design

Oil type	POE	Winding resistance main	0.700 Ohm
Oil viscosity	32cSt	Winding resistance aux	2.70 Ohm
Oil quantity	506 / 17.11fl.oz	Max. winding temp.	125 °C
Free gas volume comp.	1,460 cm ³ / 49.37fl.oz	Max. discharge temp.	130°C / 266°F
Motor protection	external		

Compressor Dimensions

Housing

A Height	219mm / 8.62in
B Height	213mm / 8.39in
C Length shell	218mm / 8.58in
D Length w. cover	255mm / 10.04in
E Width	151mm / 5.94in

[Find 3D Model here](#)



Connectors	Suction X	Discharge Y	Process Z
Diameter [mm]	øi 9.54–9.72 / 0.38–0.38in	øi 6.41–6.59 / 0.25–0.26in	øi 6.41–6.59 / 0.25–0.26in
Material	CU	CU	CU
Horizontal angle ±2°	37°	37°	143°
Vertical angle ±2°	30°	0°	150°
Position l/h/w [mm]	107/193/55 / 4.21/7.60/2.17in	115/110/63 / 4.53/4.33/2.48in	-107/193/55 / -4.21/7.60/2.17in
Straight tube l. [mm]	12 / 0.47in	12 / 0.47in	12 / 0.47in

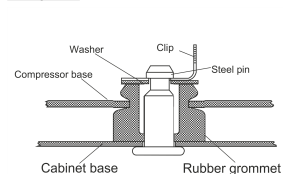
Mounting Accessories



Bolt joint



Snap-on



Dimensions in mm [in]

	one comp.	multi pack
Bolt joint M6 ø16mm	118-1917	118-1918
Bolt joint ø1/4" ø16mm	118-1946	-
Bolt joint ø1/4" ø19mm	118-1949	-
Snap-on ø7,3 ø16mm	118-1947	118-1919

Model

SC15CLX.2

Configuration 1

Sales code:

104L1853

Configuration

Motor configuration	CSIR
Power supply (nominal)	115 V/60 Hz 1~
Refrigerant	R404A
Application	LBP
Voltage range	103-127 V
Starting torque	HST
Approvals	UL
Starting device type	relay
Run capacitor	-/-
Start capacitor	410 µF
LRA (locked rotor amps / 4s/ U(N))	56.8 A
RLA (rated load amps / 1s/ U(N))	9.8 A
Cut in current (U(N))	56.8 A

Ambient/ machine room temperatures minimum /maximum

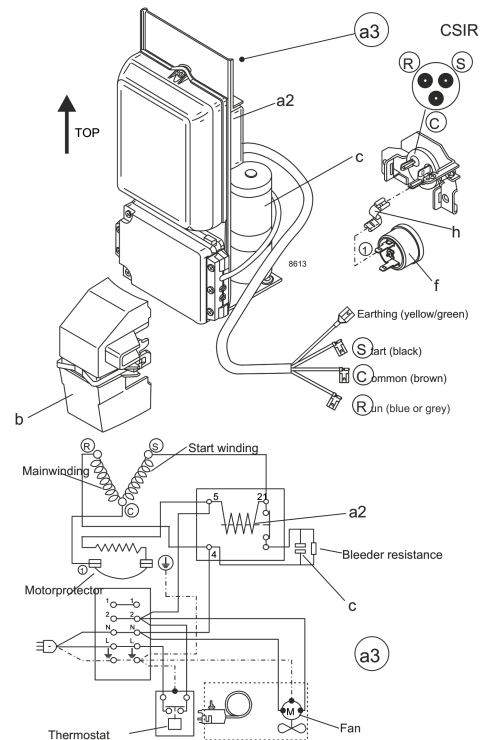
Ambient temperature range: 10 - 43°C / 50 - 109°F

Machine room temp. compressor: 10 - 48°C / 50 - 118°F

System Cooling

fan 3m/s

Electrical Accessories / Wiring Diagram



[View full size](#)

Components (protector + ~holder + cover: pre assembled)

a3 SC starter kit 117-7053

f ext. protector (T0761/46) 117U3212

h protector holder 117U0439

b plastic cover + clamp 117U1021

Alternative components

a2 potential relay (RVA 7AA3R) 117-7441

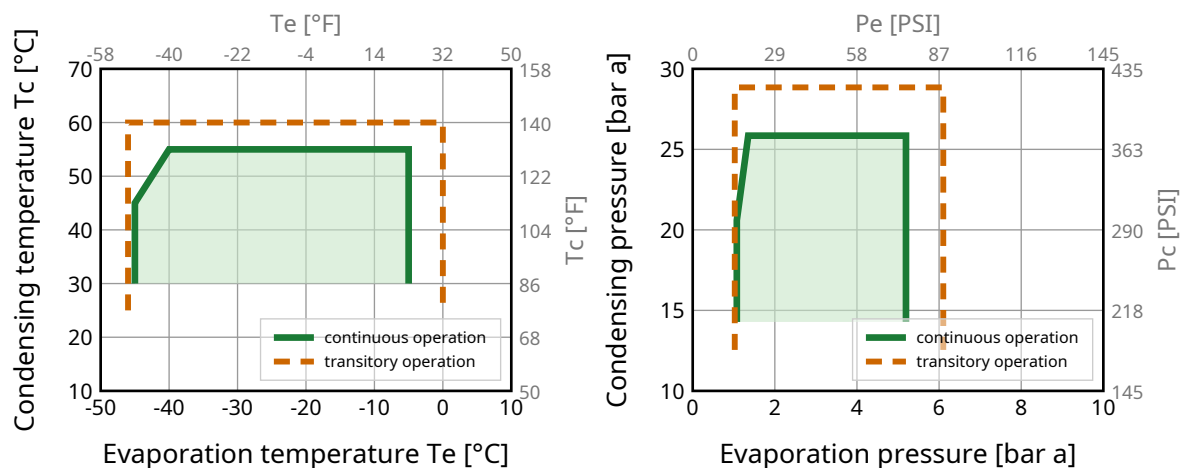
c start capacitor (410µF, 6.3mm) 117U5042

f ext. protector (T0761/46) 117U3212

h protector holder 117U0439

b plastic cover + clamp 117U1021

Operation Pressure Range



Model
SC15CLX.2

Configuration 1

Sales code:
104L1853

Standard Conditions

R404A, 115 V/60 Hz, CSIR, fan 3m/s

pe	pc	RGT	Tliq	Cooling capacity			COP	EER	P	I	m	
[°C] [°F]	[°C] [°F]	[°C] [°F]	[°C] [°F]	[W]	[Btu/h]	[kcal/h]	[W/W]	[Btu/Wh]	[W]	[A]	[kg/h]	
-23.3 -10	54.4 129.9	32.2 90	32.2 90	882	3010	759	1.21	4.13	729	9.24	20.51	ASHRAE LBP
-25 -13	55 131	32 89.6	55 131	592	2021	509	0.85	2.89	700	9.05	18.47	CECOMAF LBP
-35 -31	40 104	20 68	40 104	478	1632	411	0.93	3.18	513	7.99	12.96	EN12900 LBP
-23.3 -10	48.8 119.8	4.4 39.9	48.8 119.8	668	2279	574	0.94	3.20	711	9.18	23.57	ARI540 LBP
-23.3 -10	40.6 105.1	32.2 90	32.2 90	1019	3477	876	1.48	5.06	687	9.05	23.69	AHAM LBP
-25 -13	45 113	32 89.6	45 113	776	2649	668	1.16	3.94	672	8.95	20.89	opt LBP

Performance Tables

R404A, 115 V/60 Hz, CSIR, fan 3m/s

pc= 45/113 | RGT= 32/89.6 | Tliq= 45/113 | °C/°F

pe		Cooling capacity			COP	EER	P	I	m
[°C]	[°F]	[W]	[Btu/h]	[kcal/h]	[W/W]	[Btu/Wh]	[W]	[A]	[kg/h]
-45	-49	194	661	166	0.54	1.85	358	7.09	5.13
-40	-40	305	1040	262	0.70	2.37	438	7.53	8.10
-30	-22	593	2023	510	1.00	3.41	593	8.46	15.87
-20	-4	991	3380	852	1.31	4.48	754	9.46	26.82
-10	14	1525	5204	1312	1.64	5.58	932	10.52	41.93
-5	23	1852	6318	1593	1.79	6.12	1032	11.07	51.41

pc= 55/131 | RGT= 32/89.6 | Tliq= 55/131 | °C/°F

-45	-49	93	317	80	0.28	0.97	326	6.90	2.84
-40	-40	190	648	163	0.45	1.54	422	7.41	5.84
-30	-22	436	1489	375	0.72	2.45	608	8.49	13.53
-20	-4	775	2643	666	0.98	3.33	793	9.63	24.32
-10	14	1231	4200	1059	1.24	4.24	990	10.83	39.35
-5	23	1512	5158	1300	1.38	4.71	1096	11.46	48.87

Model

SC15CLX.2

Configuration 2

Sales code:

104L1853

Configuration

Motor configuration	CSCR
Power supply (nominal)	115 V/60 Hz 1~
Refrigerant	R404A
Application	LBP
Voltage range	103-127 V
Starting torque	HST
Approvals	UL
Starting device type	relay
Run capacitor	23.5 μF
Start capacitor	410 μF
LRA (locked rotor amps / 4s/ U(N))	56.8 A
RLA (rated load amps / 1s/ U(N))	9.8 A
Cut in current (U(N))	56.8 A

Ambient/ machine room temperatures minimum /maximum

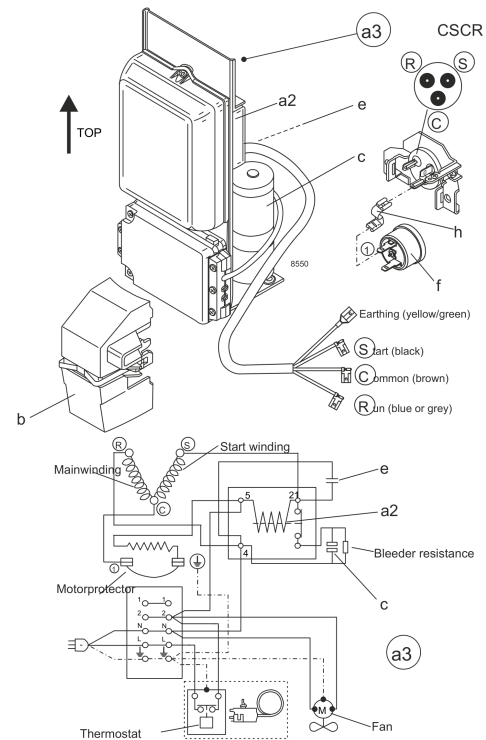
Ambient temperature range: 10 - 43°C / 50 - 109°F

Machine room temp. compressor: 10 - 48°C / 50 - 118°F

System Cooling

fan 3m/s

Electrical Accessories / Wiring Diagram


[View full size](#)

Components (protector + ~holder + cover: pre assembled)

a3 SC starter kit 117-7045

f ext. protector (T0761/46) 117U3212

b plastic cover + clamp 117U1021

Alternative components

a2 potential relay (RVA 7AA3R) 117-7441

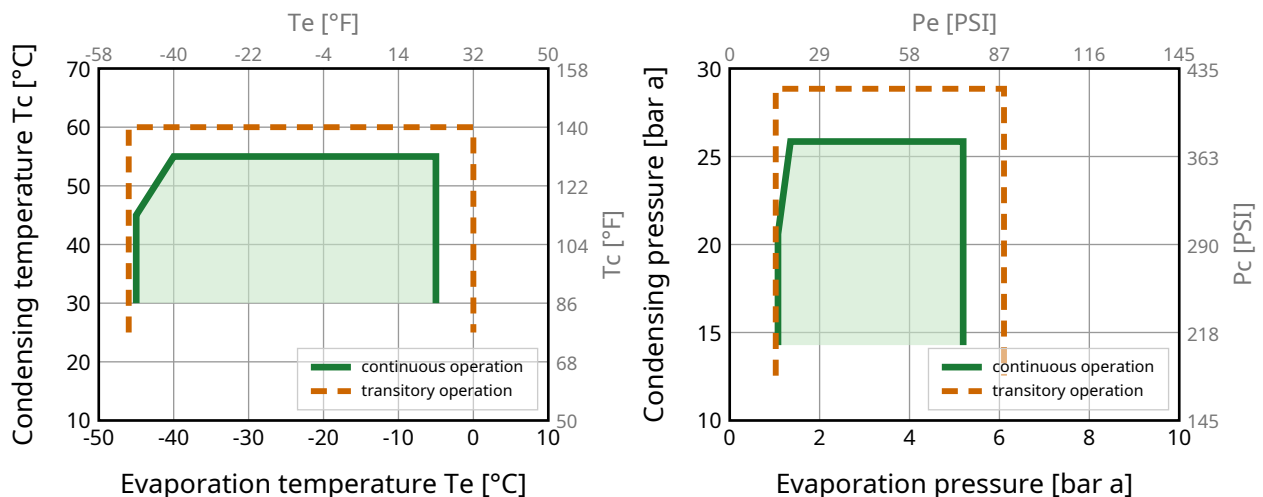
e run capacitor (23,5 μ F, 6.3mm) 117-7114

c start capacitor (410 μ F, 6.3mm) 117U5043

f ext. protector (T0761/46) 117U3212

b plastic cover + clamp 117U1021

Operation Pressure Range



Model
SC15CLX.2

Configuration 2

Sales code:
104L1853

Standard Conditions

R404A, 115 V/60 Hz, CSCR, fan 3m/s

pe	pc	RGT	Tliq	Cooling capacity			COP	EER	P	I	m	
[°C] [°F]	[°C] [°F]	[°C] [°F]	[°C] [°F]	[W]	[Btu/h]	[kcal/h]	[W/W]	[Btu/Wh]	[W]	[A]	[kg/h]	
-23.3 -10	54.4 129.9	32.2 90	32.2 90	876	2989	753	1.27	4.33	691	7.23	20.36	ASHRAE LBP
-25 -13	55 131	32 89.6	55 131	588	2007	506	0.89	3.03	662	7.03	18.34	CECOMAF LBP
-35 -31	40 104	20 68	40 104	475	1622	409	0.98	3.36	483	5.66	12.88	EN12900 LBP
-23.3 -10	48.8 119.8	4.4 39.9	48.8 119.8	663	2262	570	0.98	3.35	676	7.10	23.40	ARI540 LBP
-23.3 -10	40.6 105.1	32.2 90	32.2 90	1012	3453	870	1.55	5.28	654	6.83	23.52	AHAM LBP
-25 -13	45 113	32 89.6	45 113	771	2630	663	1.20	4.11	640	6.77	20.75	opt LBP

Performance Tables

R404A, 115 V/60 Hz, CSCR, fan 3m/s

pc= 45/113 | RGT= 32/89.6 | Tliq= 45/113 | °C/°F

pe		Cooling capacity			COP	EER	P	I	m
[°C]	[°F]	[W]	[Btu/h]	[kcal/h]	[W/W]	[Btu/Wh]	[W]	[A]	[kg/h]
-45	-49	192	653	165	0.60	2.03	321	4.88	5.07
-40	-40	303	1033	260	0.74	2.54	407	5.28	8.04
-30	-22	589	2009	506	1.04	3.56	564	6.22	15.77
-20	-4	984	3356	846	1.37	4.68	717	7.37	26.63
-10	14	1516	5172	1304	1.72	5.88	879	8.76	41.68
-5	23	1842	6287	1585	1.90	6.49	969	9.54	51.15

pc= 55/131 | RGT= 32/89.6 | Tliq= 55/131 | °C/°F

-45	-49	91	311	78	0.32	1.08	288	4.88	2.79
-40	-40	189	644	162	0.48	1.65	389	5.35	5.79
-30	-22	434	1479	373	0.76	2.58	574	6.42	13.44
-20	-4	769	2625	662	1.03	3.50	750	7.68	24.15
-10	14	1224	4177	1053	1.31	4.49	931	9.14	39.13
-5	23	1506	5137	1295	1.46	4.99	1029	9.96	48.67

Model

SC15CLX.2

Configuration 3

Sales code:

104L1853

Configuration

Motor configuration	CSIR
Power supply (nominal)	115 V/60 Hz 1~
Refrigerant	R452A
Application	LBP
Voltage range	103-127 V
Starting torque	HST
Approvals	UL
Starting device type	relay
Run capacitor	-/-
Start capacitor	410 µF
LRA (locked rotor amps / 4s/ U(N))	56.8 A
RLA (rated load amps / 1s/ U(N))	9.8 A
Cut in current (U(N))	56.8 A

Ambient/ machine room temperatures minimum /maximum

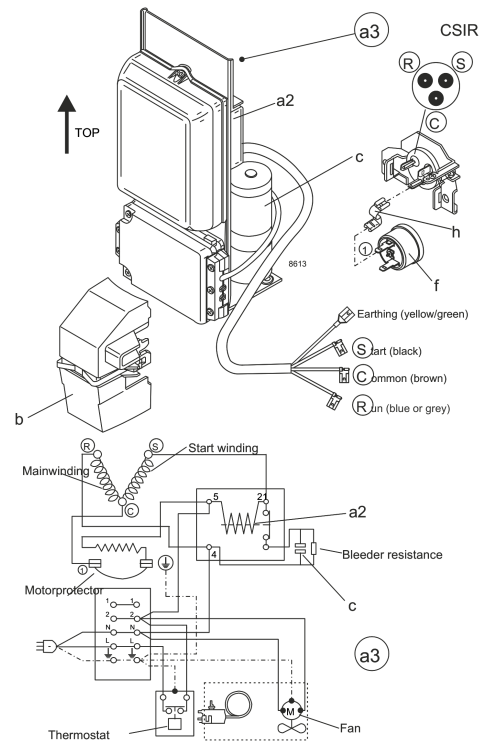
Ambient temperature range: 10 - 43°C / 50 - 109°F

Machine room temp. compressor: 10 - 48°C / 50 - 118°F

System Cooling

fan 3m/s

Electrical Accessories / Wiring Diagram



[View full size](#)

Components (protector + ~holder + cover: pre assembled)

a3 SC starter kit 117-7053

f ext. protector (T0761/46) 117U3212

h protector holder 117U0439

b plastic cover + clamp 117U1021

Alternative components

a2 potential relay (RVA 7AA3R) 117-7441

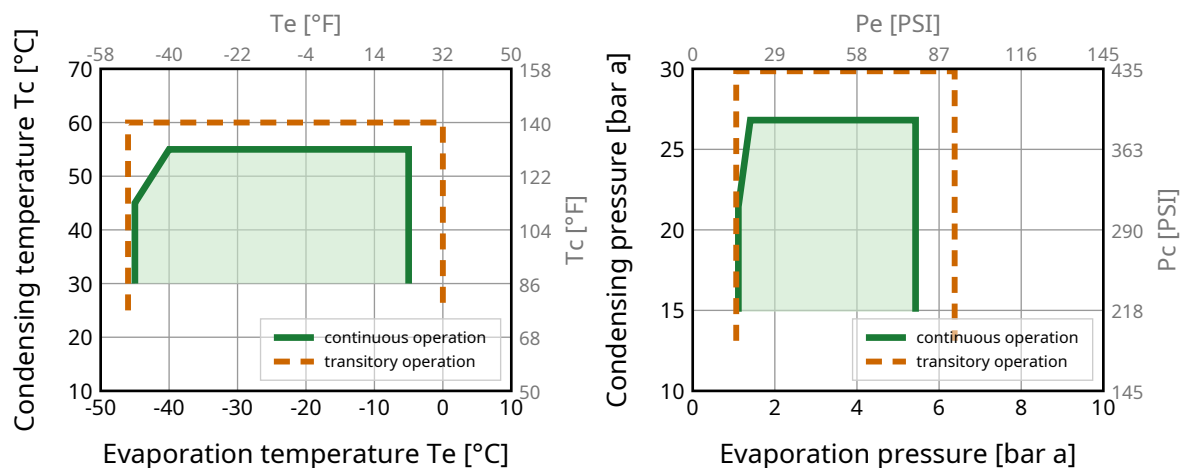
c start capacitor (410µF, 6.3mm) 117U5042

f ext. protector (T0761/46) 117U3212

h protector holder 117U0439

b plastic cover + clamp 117U1021

Operation Pressure Range



Model
SC15CLX.2

Configuration 3

Sales code:
104L1853

Standard Conditions

R452A, 115 V/60 Hz, CSIR, fan 3m/s

pe	pc	RGT	Tliq	Cooling capacity			COP	EER	P	I	m	
[°C] [°F]	[°C] [°F]	[°C] [°F]	[°C] [°F]	[W]	[Btu/h]	[kcal/h]	[W/W]	[Btu/Wh]	[W]	[A]	[kg/h]	
-23.3 -10	54.4 129.9	32.2 90	32.2 90	810	2765	697	1.19	4.07	679	8.94	19.61	ASHRAE LBP
-25 -13	55 131	32 89.6	55 131	545	1861	469	0.84	2.86	650	8.77	17.59	CECOMAF LBP
-35 -31	40 104	20 68	40 104	431	1469	370	0.90	3.07	479	7.80	12.13	EN12900 LBP
-23.3 -10	48.8 119.8	4.4 39.9	48.8 119.8	619	2111	532	0.93	3.18	664	8.85	22.58	ARI540 LBP
-23.3 -10	40.6 105.1	32.2 90	32.2 90	939	3204	808	1.46	4.99	642	8.73	22.72	AHAM LBP
-25 -13	45 113	32 89.6	45 113	714	2437	614	1.14	3.89	627	8.64	19.97	opt LBP

Performance Tables

R452A, 115 V/60 Hz, CSIR, fan 3m/s

pc= 45/113 | RGT= 32/89.6 | Tliq= 45/113 | °C/°F

pe		Cooling capacity			COP	EER	P	I	m
[°C]	[°F]	[W]	[Btu/h]	[kcal/h]	[W/W]	[Btu/Wh]	[W]	[A]	[kg/h]
-45	-49	164	561	141	0.47	1.61	348	7.05	4.52
-40	-40	268	915	231	0.65	2.21	414	7.42	7.40
-30	-22	540	1841	464	0.98	3.33	552	8.21	15.01
-20	-4	920	3138	791	1.30	4.44	707	9.10	25.86
-10	14	1436	4901	1235	1.62	5.53	886	10.12	41.01
-5	23	1755	5987	1509	1.78	6.07	986	10.69	50.59

pc= 55/131 | RGT= 32/89.6 | Tliq= 55/131 | °C/°F

-45	-49	73	250	63	0.23	0.79	315	6.86	2.32
-40	-40	164	559	141	0.41	1.41	396	7.32	5.21
-30	-22	396	1353	341	0.70	2.41	562	8.27	12.72
-20	-4	721	2459	620	0.97	3.32	741	9.29	23.41
-10	14	1165	3975	1002	1.24	4.23	939	10.42	38.51
-5	23	1441	4917	1239	1.38	4.69	1048	11.04	48.16

Model

SC15CLX.2

Configuration 4

Sales code:

104L1853

Configuration

Motor configuration	CSCR
Power supply (nominal)	115 V/60 Hz 1~
Refrigerant	R452A
Application	LBP
Voltage range	103-127 V
Starting torque	HST
Approvals	UL
Starting device type	relay
Run capacitor	23.5 μF
Start capacitor	410 μF
LRA (locked rotor amps / 4s/ U(N))	56.8 A
RLA (rated load amps / 1s/ U(N))	9.8 A
Cut in current (U(N))	56.8 A

Ambient/ machine room temperatures minimum /maximum

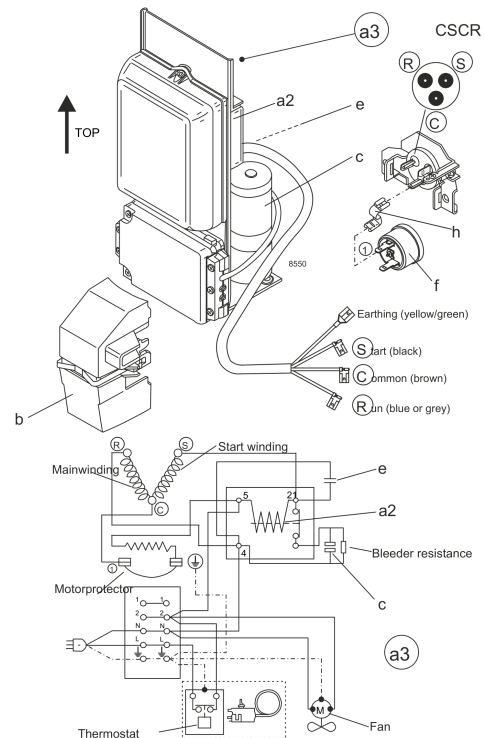
Ambient temperature range: 10 - 43°C / 50 - 109°F

Machine room temp. compressor: 10 - 48°C / 50 - 118°F

System Cooling

fan 3m/s

Electrical Accessories / Wiring Diagram



[View full size](#)

Components (protector + ~holder + cover: pre assembled)

a3 SC starter kit 117-7045

f ext. protector (T0761/46) 117U3212

b plastic cover + clamp 117U1021

Alternative components

a2 potential relay (RVA 7AA3R) 117-7441

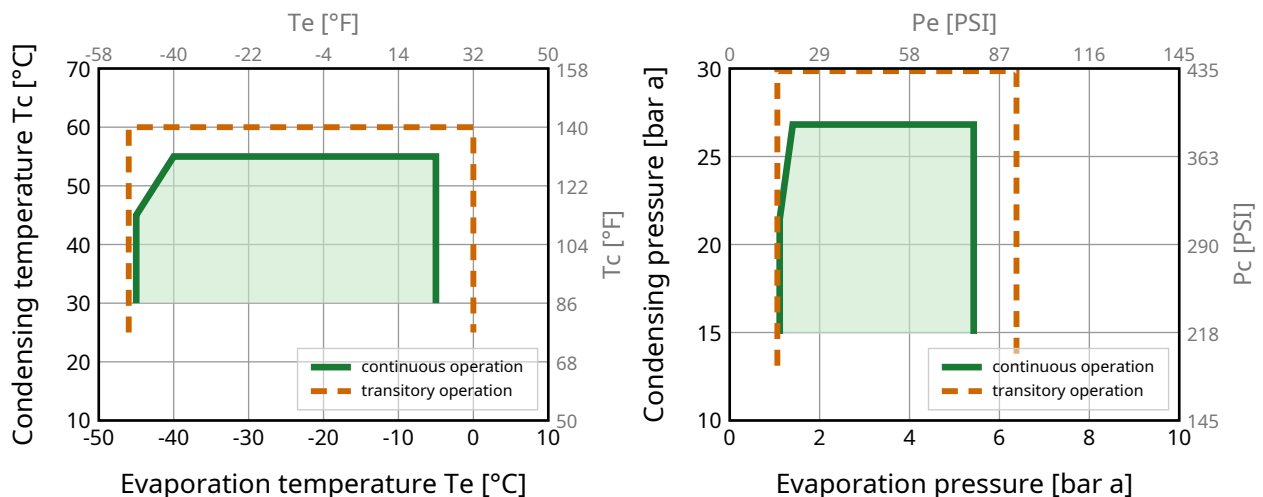
e run capacitor (23,5 μ F, 6.3mm) 117-7114

c start capacitor (410 μ F, 6.3mm) 117U5043

f ext. protector (T0761/46) 117U3212

b plastic cover + clamp 117U1021

Operation Pressure Range



Model
SC15CLX.2

Configuration 4

Sales code:
104L1853

Standard Conditions

R452A, 115 V/60 Hz, CSCR, fan 3m/s

pe	pc	RGT	Tliq	Cooling capacity			COP	EER	P	I	m	
[°C] [°F]	[°C] [°F]	[°C] [°F]	[°C] [°F]	[W]	[Btu/h]	[kcal/h]	[W/W]	[Btu/Wh]	[W]	[A]	[kg/h]	
-23.3 -10	54.4 129.9	32.2 90	32.2 90	805	2746	692	1.25	4.26	644	6.90	19.47	ASHRAE LBP
-25 -13	55 131	32 89.6	55 131	542	1848	466	0.88	3.00	615	6.70	17.47	CECOMAF LBP
-35 -31	40 104	20 68	40 104	428	1461	368	0.96	3.29	444	5.42	12.06	EN12900 LBP
-23.3 -10	48.8 119.8	4.4 39.9	48.8 119.8	614	2096	528	0.97	3.32	631	6.77	22.42	ARI540 LBP
-23.3 -10	40.6 105.1	32.2 90	32.2 90	932	3181	802	1.52	5.20	612	6.52	22.56	AHAM LBP
-25 -13	45 113	32 89.6	45 113	709	2419	610	1.19	4.05	597	6.46	19.83	opt LBP

Performance Tables

R452A, 115 V/60 Hz, CSCR, fan 3m/s

pc= 45/113 | RGT= 32/89.6 | Tliq= 45/113 | °C/°F

pe		Cooling capacity			COP	EER	P	I	m
[°C]	[°F]	[W]	[Btu/h]	[kcal/h]	[W/W]	[Btu/Wh]	[W]	[A]	[kg/h]
-45	-49	163	556	140	0.57	1.93	288	4.73	4.48
-40	-40	266	909	229	0.72	2.46	369	5.08	7.36
-30	-22	536	1828	461	1.03	3.50	522	5.94	14.91
-20	-4	913	3115	785	1.36	4.63	673	7.04	25.67
-10	14	1427	4870	1227	1.71	5.82	836	8.38	40.75
-5	23	1745	5955	1501	1.88	6.43	926	9.14	50.31

pc= 55/131 | RGT= 32/89.6 | Tliq= 55/131 | °C/°F

-45	-49	72	247	62	0.29	0.99	250	4.73	2.29
-40	-40	163	556	140	0.47	1.60	347	5.15	5.18
-30	-22	394	1344	339	0.74	2.54	528	6.13	12.63
-20	-4	716	2442	615	1.02	3.48	703	7.33	23.24
-10	14	1158	3952	996	1.31	4.47	885	8.75	38.29
-5	23	1434	4894	1234	1.46	4.97	984	9.55	47.94