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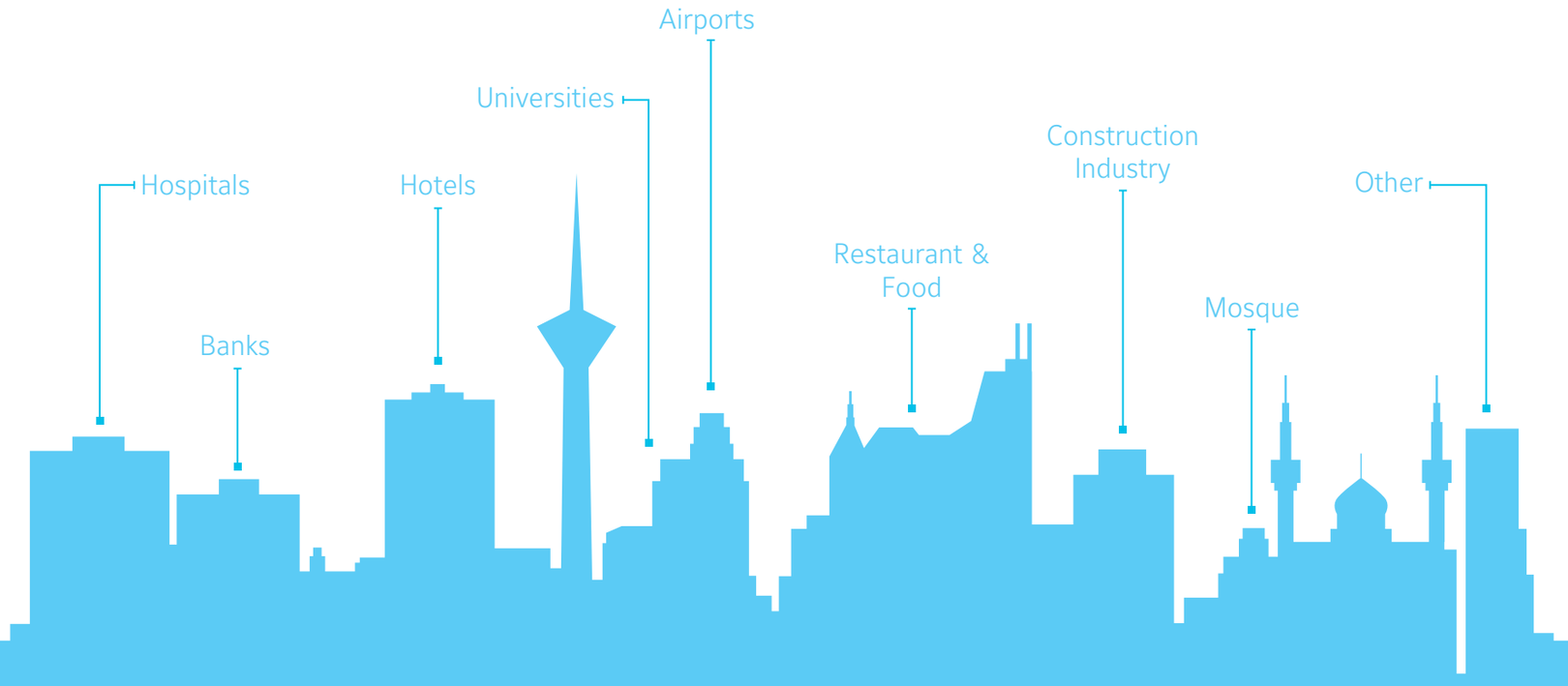
PACKAGE UNIT

Saran
Life's Pleasant Breeze



AIR CONDITIONING MFG.GROUP

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Contents

NOMENCLATURE

2 SR PU R – 50 AU – 450 6

AHU Model

Condenser Model

Condenser Type:
AU: Unitary Air Cooled
AR: Remote Air Cooled
W: Water Cooled

Nominal Cooling Capacity (TR)

Compressor Type:
S: Compact Screw
R: Semi-Hermetic Reciprocating
H: Hermetic Scroll

Packaged Unit

SARAN

No. of Compressors

Introduction

Saran packaged units are compact systems intended for commercial and industrial applications where installers, consultants and building owner require optimal performances and maximum quality.
Saran packaged Units are available in the capacity range of 10 to 120 tons of refrigeration in one and two independent refrigerant circuits. All components of these units selected from reliable and famous international brands or designed and constructed base on international air-conditioning equipment's standards.
Saran packaged units have three major types such as Roof top (Unitary Air Cooled), Remote Air Cooled and Water Cooled. These units can provide year round air conditioning with hot water, steam or electrical heating coil during the cold season. They can also use to supplement central systems, permitting zone control at low load conditions without the expense of central systems.
Each unit is factory assembled, wired and shipped as a package. This greatly reduces installation time and assures the optimum positioning of the components.

Component Features

Casing

Suitable heavy gage galvanized steel sheets are used for constructing of Saran packaged unit's casing panels. To facilitate installation, the units are mounted on a proper chassis. The base channels and casings are coated with proper thickness painting for archive to maximum corrosion protection.
As standard, the unit wall are made up by 25mm thickness double skin Poly ethylene insulation panel with high strength pre-painted galvanized steel as internal and external skin.

Compressor

Saran packaged units available with screw, reciprocating or scroll type compressor, so these units not only cover wide range of cooling capacities and applications, but also canachieved special features base on selected compressor.

Condenser

The condenser coils are made of staggered rows of 3/8 inches diameter seamless inner grooved copper tube, mechanically expanded into slit aluminum fins to ensure optimum heat exchange capability. The fins have full spacing collars which completely cover each tube. The staggered tube design improves the thermal efficiency of the coil and eliminates bypassing of air around the tubes. A separate sub cooling circuit is standard on all units to maximize energy efficiency. The condenser coils are designed and constructed base on AHRI standards and equipped with suitable low noise axial fans from well-known international brands, which automatically controlled base on condensing temperature to obtain a satisfactory performance in different ambient conditions.

Refrigerant

Saran packaged unit can be design to operate with R-22, R-407C and R-134a refrigerants, so these units can operating more efficient in wide range of ambient conditions. (in the tropical conditions is suggested to use R-134a)

Fan Assembly

The standard used fans in Saran packaged units are high performance double width double Inlet (DWDI) centrifugal fans, optimally engineered for HVAC application, with high quality, and fully tested performance according to international standards.

All fans are optimally selected for best performance and sound characteristics based on maximum fan efficiency. The impellers can have forward curved, backward inclined or airfoil profile blades depending on the customer requirement and the system static pressure.

The impeller is galvanized finished for forward curve blade; glass reinforced polyamide or welded heavy gauge steel painted with epoxy for backward and airfoil blade. Fans housings are made of galvanized steel and shafts are made of carbon steel (CK45) and are precision machined to provide an accurate fit with the fan bearings and the wheel hub. All fans are statically and dynamically balanced for stable non-surging operation.

Motor

Motors are totally enclosed, fan cooled (TEFC) squirrel cage type with class "F" insulation at 104°F ambient temperature and continuous duty. Motors are of IP54 and protect the motor from dust and water. For motor sizing the mechanical losses incurred in transmitting the load from motor shaft to the fan shaft are taken into consideration along with a reasonable safety factor. Electric motors with ingress protection of (IP- 55) are also available upon request.

Cooling and Heating Coils

All coils designed to deliver their respective duties at optimum performance at all design conditions and to meet a wide range of applications and requirements.

As standard, coils are manufactured from seamless copper tubes, mechanically expanded into collar continuous corrugated aluminum fins to provide a continuous compression bond over the entire finned length for maximum heat transfer rates. The standard fin spacing is 8 and 12 FPI; however, 10 and 14 FPI are available as an option upon the client request or to achieve the determined indoor conditions.

Direct expansion coils are equipped with a properly sized expansion valve and distributor to ensure equal refrigerant fed to all circuits. The number of circuits is chosen to provide optimum heat transfer and reasonable refrigerant velocity and pressure drop so as not to trap any oil in the coil tubing.

Headers and connections for water coils and DX-coils are made of seamless copper pipes, and inlet and outlet connections are sealed against unit panels by rubber gaskets as standard wherever coil connections protrude through the casing. All water coils are fitted with plugged drain and vent tapping to facilitate draining and venting.

Other type of coil such as coil with copper fin or Hydrophilic fin (Golden Fin), Steam heating coil and Electrical heater available upon request.

Drain Pan

In order to remove the condensate, dropped-out during dehumidification, the drain pan is supplied under the cooling coil, cover the entire coil section. The drain pan, as standard, is made of galvanized steel sheet protected with powder coating paint or stainless steel as option.

Filters

As standard, Saran packaged units equipped with panel type aluminum washable pre-filter which efficiency is G2. Other type of filters such as Pleated, Bag, Rigid V-Cell filers available upon request.

Safety Protection

For more efficiency and safe operation of the units, Saran packaged units equipped with various safety and operating controls such as, high and low pressure cut out, oil level control, compressor operation time logger, three phase controller, circuit breakers, air flow switch and fault detection system. (Microprocessor based PLC controller is also available upon request). All above-mentioned equipment selected from the most recognized controls manufactures in the air conditioning industry.

Selection Considerations

Cooling capacity of Saran packaged units presented in the "Performance Data" tables; indicate capacity of them at standard condition, so for other condition, following performance adjustment factors shall be attend in packaged unit selection:

Table 1: Air Cooled Condenser Fin Arrangement Correction Factor

Coil Fin Spacing (FPI)	Correction Factor
8	0.79
10	0.91
12	1.00

Table 2: Altitude Correction Factor for Air Cooled Condenser Performance Data

Altitude (ft)	0	1000	2000	3000	4000	5000	6000
Correction Factor	1.00	0.98	0.97	0.95	0.93	0.92	0.90

Table3: Non Standard Air Flow Rate Correction Factor

Actual CFM / Nom. CFM	0.7	0.8	0.9	1.0	1.1	1.2	1.4
Cooling Coil	0.86	0.92	0.95	1.00	1.03	Not Recommended	
Heating Coil	0.80	0.88	0.93	1.00	1.05	1.11	1.19

Table 4: Approximate Sensible Heat Factor

Entering Air Wet Bulb Temp. (°F)	Entering Air Dry Bulb Temp. (°F)			
	75	80	85	90
59	0.94	0.97	1.00	1.00
63	0.74	0.80	0.92	1.00
67	0.56	0.70	0.84	1.00
71	0.41	0.52	0.64	0.74

Table 5: Heating Coil Fin Spacing Correction Factors

No of Rows	Fin Spacing			
	8 FPI	10 FPI	12 FPI	14 FPI
1	1.00	1.14	1.25	1.37
2	1.00	1.11	1.20	1.30

Table 6: Entering Hot Water Temperature Correction Factor

Entering Hot Water Temp. (°F)	160	180	200	220
Heating Capacity Correction Factor	0.75	1.00	1.25	1.50

Table 7: Steam Pressure Correction Factors

Steam Pressure (psig)	2	5	10	15	20	30	40	50	60
Heating Capacity Correction Factor	0.95	1.00	1.07	1.14	1.19	1.28	1.35	1.42	1.48

Selection Example

Given:

Required Air Flow Rate: 11700 CFM

Summer Conditions

Required cooling capacity: 350,000 Btu/hr
Entering Air Temperature: 80°F DB / 67°F WB

Winter Conditions

Required heating capacity: 480,000 Btu/hr
Entering Air Temperature: 60°F DB
Entering/Leaving Water Temperature: 180°F / 160°F

Ambient Air Temperature: 100°F
Altitude:3000 ft
Refrigerant: R407C
Compressor Type: Reciprocating
Package Type: Unitary Air Cooled

Solution:

Step 1:Air-Cooled Packaged Unit Model Selection

By Assuming 20°F condensing range, our condenser temperature will be 120°F, so by referring to the performance data table of air-cooled packaged unit (Reciprocating Compressor – R407C), we can see nominal air flow rate, cooling capacity and total heat rejection of 2SRPUR-40A in 67°F WB is 13000 CFM, 370 MBH and 459 MBH, respectively.
The ratio of Actual Air Flow Rate (11700 CFM) to Nominal Air Flow Rate of selected unit (13000CFM) is 0.9, so by referring to table 3, we can see non standard air flow rate correction factors for cooling capacity is 0.95. Therefore, actual cooling capacity of selected unit in our condition will be 351.5 MBH and satisfy our requirements.

Step 2:Condenser Model Selection

By referring to condensers performance tables (R407C), we can see total heat rejection of 450 from condenser models at 20°F condensing range (@12 FPI Al. fins and sea level) is 493 MBH. By using corresponding altitude correction factors from table 2, total heat rejection of selected condenser will be 0.95 × 493 = 468 MBH

Therefore, we select this condenser model for our selected unitary air-cooled packaged unit.

Step 3:Air Handling Model Selection

By referring to table 36, based on our required air flow rate, we can see air handling model of 4 satisfied our required air flow rate.

NOTE:

Selection of air handling and condenser sections shall be done in such away that the width of both sections is equal. In the other cases, please contact Saran MFG.

Finally, according to above steps, appropriate model of Saran unitary air-cooled packaged unit for our condition in this problem will be 2SRPUR-40AU-4504.

Step 4:Hot Water Coil Selection

By referring to table 26, we can see heating capacity of selected air handling section with 1Rows/8FPI heating coil in given winter conditions is 363 MBH.
By using non standard air flow rate, 12 FPI fin spacing and Hot water entering temperature correction factors in our conditions are 1.04, 1.20 and 1.00, respectively. Therefore, heating coil capacity will be
1.09 × 1.25 × 1.00 × 363 = 494 MBH.

Therefore, 1Rows/12FPI heating coil satisfied our requirements.

Step 5:Leaving Air Temperature Determining

To determine the leaving air temperature of selected unit in pervious steps, we can using following procedure:

Heating Mode Leaving Air Temperature:

$$\text{Temp.Difference (°F)} = \frac{\text{Heating Capacity (MBH)} \times 1000}{1.085 \times \text{Actual Air Flow Rate (CFM)}} = \frac{494 \times 1000}{1.085 \times 11700} = 38.9\ °F$$

Therefore, leaving air temperature in heating mode will be:

Leaving Air Temp. = Entering Air Temp. + Temp. Difference = 60 + 38.9 = 98.9°F

Cooling Mode Leaving Air Temperature:

$$\text{Dry BulbTemp.Difference (°F)} = \frac{\text{Sensible Heat factor (Table 4)} \times \text{Cooling Capacity (MBH)} \times 1000}{1.085 \times \text{Actual Air Flow Rate (CFM)}}$$

$$\text{Dry BulbTemp.Difference (°F)} = \frac{0.7 \times 351.5 \times 1000}{1.085 \times 11700} = 19.4\ °F$$

$$\text{Enthalpy Diffrence (Btu/hr)} = \frac{\text{Cooling Capacity (MBH)} \times 1000}{4.5 \times \text{Actual Air Flow Rate (CFM)}} = \frac{351.5 \times 1000}{4.5 \times 11700} = 6.7\ \text{Btu/hr}$$

Leaving Air Enthalpy = Entering Air Enthalpy (From Table 37) – Enthalpy Difference= 33.5 – 6.7 = 26.8 Btu/hr

Therefore, leaving air temperature in cooling mode will be:

Leaving Air DB Temp. (°F) = Entering DB Air Temp. (°F) -DB Temp. Difference (°F) = 80 - 19.4 = 60.6 °F

Leaving Air WB Temp. (°F) = Corresponding WB Temp. of Leaving Air Enthalpy (From Table 37) = 58.5 °F

Performance Data

Table 8a: Performance Data (Scroll Water Cooled Packaged Unit) - R22

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
1SRPUH-10W	3500	59°F	27.7	2.4	119	5.9	114	6.6	108	7.5
		63°F	28.6	2.5	124	5.9	118	6.6	112	7.5
		67°F	30.0	2.6	131	6.0	125	6.7	119	7.5
		71°F	30.9	2.7	135	6.0	129	6.7	123	7.5
1SRPUH-15W	5500	59°F	41.3	2.3	177	9.2	168	10.2	159	11.4
		63°F	42.7	2.5	184	9.2	175	10.3	166	11.5
		67°F	44.9	2.7	194	9.3	185	10.3	176	11.5
		71°F	46.3	2.8	201	9.3	192	10.3	182	11.5
1SRPUH-20W	7000	59°F	53.5	3.7	228	12.1	218	13.4	207	14.9
		63°F	55.3	3.8	237	12.1	226	13.5	215	15.0
		67°F	58.2	4.1	251	12.2	239	13.5	228	15.0
		71°F	60.2	4.3	261	12.3	249	13.6	236	15.1
1SRPUH-25W	9000	59°F	66.8	4.6	286	14.9	273	16.6	259	18.5
		63°F	69.1	4.8	297	15.0	284	16.7	269	18.6
		67°F	72.7	5.2	314	15.2	301	16.8	286	18.8
		71°F	75.2	5.5	326	15.3	312	17.0	297	18.9
1SRPUH-30W	10000	59°F	81.6	5.8	348	18.4	334	20.4	318	22.7
		63°F	84.2	6.1	361	18.5	346	20.5	330	22.8
		67°F	88.3	6.6	381	18.7	365	20.7	349	23.0
		71°F	91.2	6.9	395	18.9	379	20.8	362	23.1

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 8b: Performance Data (Scroll Water Cooled Packaged Unit) - R22

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
2SRPUH-10W	3500	59°F	26.5	0.8	113	6.0	107	6.7	101	7.4
		63°F	27.3	0.9	117	6.0	112	6.7	105	7.5
		67°F	28.7	0.9	124	6.1	118	6.8	112	7.6
		71°F	29.6	1.0	128	6.2	122	6.9	116	7.6
2SRPUH-15W	5500	59°F	42.0	1.6	181	9.0	172	10.0	163	11.3
		63°F	43.4	1.7	188	9.0	179	10.1	170	11.3
		67°F	45.7	1.8	199	9.1	190	10.1	180	11.3
		71°F	47.2	1.9	206	9.2	197	10.2	187	11.4
2SRPUH-20W	7500	59°F	55.4	2.4	239	11.8	228	13.2	216	14.9
		63°F	57.2	2.5	248	11.8	236	13.3	224	15.0
		67°F	60.0	2.6	261	11.9	249	13.4	237	15.0
		71°F	61.9	2.7	271	12.0	258	13.4	246	15.1
2SRPUH-30W	10000	59°F	82.7	2.3	354	18.4	337	20.5	318	22.9
		63°F	85.4	2.5	367	18.5	350	20.5	331	22.9
		67°F	89.7	2.7	388	18.6	370	20.6	351	23.0
		71°F	92.7	2.8	403	18.6	385	20.7	365	23.1
2SRPUH-40W	14000	59°F	107.1	3.7	457	24.2	435	26.8	414	29.9
		63°F	110.7	3.8	475	24.3	452	26.9	430	29.9
		67°F	116.4	4.1	503	24.4	479	27.1	456	30.0
		71°F	120.3	4.3	522	24.5	497	27.1	473	30.1
2SRPUH-50W	17000	59°F	133.5	4.6	571	29.7	545	33.1	517	37.1
		63°F	138.2	4.8	594	30.0	567	33.3	538	37.2
		67°F	145.4	5.2	628	30.4	601	33.7	571	37.5
		71°F	150.4	5.5	652	30.7	624	33.9	594	37.7
2SRPUH-60W	21000	59°F	163.1	5.8	696	36.7	668	40.7	637	45.4
		63°F	168.4	6.1	722	37.0	693	41.0	661	45.6
		67°F	176.6	6.6	762	37.4	731	41.3	698	45.9
		71°F	182.4	6.9	789	37.7	757	41.6	723	46.1

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 9a: Performance Data (Scroll Water Cooled Packaged Unit) - R407C

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
1SRPUH-10W	3500	59°F	27.5	2.3	119	5.8	113	6.5	106	7.4
		63°F	28.5	2.4	123	5.8	117	6.5	110	7.4
		67°F	30.0	2.6	131	5.9	125	6.5	118	7.4
		71°F	31.1	2.7	136	5.9	130	6.6	122	7.4
1SRPUH-15W	5500	59°F	40.5	2.3	173	9.0	165	10.1	155	11.3
		63°F	42.0	2.4	181	9.1	172	10.1	162	11.3
		67°F	44.3	2.6	192	9.2	183	10.1	172	11.4
		71°F	45.9	2.8	200	9.2	190	10.2	179	11.4
1SRPUH-20W	7000	59°F	53.7	3.7	231	11.6	218	13.1	205	14.9
		63°F	55.7	3.9	241	11.6	228	13.2	214	14.9
		67°F	58.6	4.2	256	11.5	242	13.2	228	15.0
		71°F	60.7	4.4	266	11.5	252	13.2	237	15.0
1SRPUH-25W	9000	59°F	68.6	4.8	295	14.8	276	16.5	257	18.5
		63°F	71.2	5.1	308	14.9	288	16.6	268	18.6
		67°F	75.2	5.5	327	15.0	307	16.7	286	18.7
		71°F	78.0	5.8	341	15.1	320	16.7	299	18.7
1SRPUH-30W	10000	59°F	83.0	6.0	357	17.9	337	19.9	315	22.4
		63°F	86.2	6.3	373	18.0	351	20.0	329	22.5
		67°F	91.3	6.9	398	18.1	375	20.2	352	22.6
		71°F	94.8	7.3	415	18.3	391	20.2	367	22.6

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 9b: Performance Data (Scroll Water Cooled Packaged Unit) - R407C

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
2SRPUH-10W	3500	59°F	25.8	0.8	111	5.6	106	6.4	100	7.3
		63°F	26.7	0.8	116	5.6	110	6.4	104	7.3
		67°F	28.2	0.9	123	5.5	117	6.3	110	7.3
		71°F	29.2	1.0	128	5.4	122	6.3	115	7.3
2SRPUH-15W	5500	59°F	41.7	1.6	180	8.9	171	10.0	162	11.4
		63°F	43.2	1.7	187	8.9	179	10.0	169	11.4
		67°F	45.5	1.8	199	8.9	190	10.0	179	11.4
		71°F	47.1	1.9	207	8.9	197	10.0	187	11.4
2SRPUH-20W	7500	59°F	54.9	2.3	237	11.6	225	13.0	212	14.7
		63°F	56.9	2.4	247	11.6	235	13.0	221	14.7
		67°F	60.0	2.6	262	11.7	249	13.1	235	14.8
		71°F	62.2	2.7	273	11.8	260	13.1	245	14.8
2SRPUH-30W	10000	59°F	81.0	2.3	347	18.0	329	20.1	310	22.6
		63°F	84.0	2.4	361	18.1	343	20.2	323	22.6
		67°F	88.6	2.6	384	18.3	365	20.3	344	22.7
		71°F	91.9	2.8	399	18.4	380	20.4	359	22.8
2SRPUH-40W	14000	59°F	107.5	3.7	462	23.1	437	26.3	410	29.8
		63°F	111.3	3.9	482	23.1	455	26.3	428	29.9
		67°F	117.3	4.2	512	23.1	484	26.4	455	30.0
		71°F	121.4	4.4	532	23.0	504	26.4	474	30.0
2SRPUH-50W	17000	59°F	137.2	4.8	590	29.7	552	33.0	514	37.1
		63°F	142.4	5.1	615	29.8	576	33.1	537	37.2
		67°F	150.4	5.5	655	30.0	614	33.3	572	37.3
		71°F	156.0	5.8	682	30.2	640	33.5	597	37.4
2SRPUH-60W	21000	59°F	166.0	6.0	714	35.7	673	39.9	631	44.9
		63°F	172.4	6.3	746	35.9	703	40.0	659	45.0
		67°F	182.6	6.9	795	36.3	750	40.3	703	45.2
		71°F	189.7	7.3	830	36.5	782	40.5	734	45.3

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 10a: Performance Data (Scroll Water Cooled Packaged Unit) - R134a

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
1SRPUH-10W	2500	59°F	18.6	1.6	80	4.0	76	4.5	71	5.0
		63°F	19.3	1.7	83	4.0	79	4.5	75	5.0
		67°F	20.4	1.8	89	4.1	84	4.5	80	5.0
		71°F	21.2	1.9	93	4.1	88	4.5	83	5.0
1SRPUH-15W	3500	59°F	28.0	2.7	119	6.5	113	7.1	107	7.9
		63°F	29.1	2.8	124	6.5	118	7.2	111	8.0
		67°F	30.7	3.0	132	6.5	126	7.2	119	8.0
		71°F	31.9	3.1	138	6.6	131	7.2	124	8.0
1SRPUH-20W	5000	59°F	35.8	2.0	152	8.3	144	9.2	136	10.3
		63°F	37.1	2.2	159	8.3	150	9.3	142	10.3
		67°F	39.3	2.4	169	8.4	161	9.3	152	10.4
		71°F	40.8	2.6	177	8.4	168	9.3	158	10.4
1SRPUH-25W	6000	59°F	44.5	3.1	189	10.3	179	11.4	169	12.7
		63°F	46.2	3.3	198	10.3	187	11.4	177	12.7
		67°F	48.9	3.6	211	10.4	200	11.5	189	12.8
		71°F	50.7	3.8	220	10.5	208	11.6	197	12.8
1SRPUH-30W	7500	59°F	55.0	3.8	235	12.4	222	13.8	210	15.4
		63°F	57.1	4.0	245	12.5	232	13.9	219	15.5
		67°F	60.4	4.4	261	12.7	247	14.0	234	15.6
		71°F	62.7	4.7	272	12.8	258	14.1	244	15.7

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 10b: Performance Data (Scroll Water Cooled Packaged Unit) - R134a

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
2SRPUH-10W	2500	59°F	18.1	0.5	77	4.0	73	4.5	69	5.0
		63°F	18.8	0.5	81	4.0	77	4.5	72	5.0
		67°F	19.9	0.6	86	4.0	82	4.5	77	5.0
		71°F	20.6	0.6	90	4.0	85	4.5	81	5.1
2SRPUH-15W	3500	59°F	27.9	1.0	119	6.2	113	6.9	106	7.8
		63°F	28.9	1.1	125	6.2	118	6.9	111	7.8
		67°F	30.6	1.2	133	6.2	126	6.9	119	7.8
		71°F	31.8	1.2	138	6.3	132	7.0	124	7.8
2SRPUH-20W	5000	59°F	37.1	1.6	159	8.1	151	9.0	143	10.0
		63°F	38.6	1.7	167	8.1	158	9.0	149	10.1
		67°F	40.8	1.8	178	8.1	169	9.0	159	10.1
		71°F	42.4	1.9	186	8.1	176	9.0	166	10.1
2SRPUH-30W	7500	59°F	56.0	2.7	238	12.9	226	14.3	213	15.9
		63°F	58.2	2.8	249	13.0	236	14.3	223	15.9
		67°F	61.5	3.0	265	13.1	252	14.4	238	16.0
		71°F	63.8	3.1	276	13.1	263	14.4	248	16.0
2SRPUH-40W	9500	59°F	71.5	2.0	304	16.5	288	18.5	272	20.6
		63°F	74.3	2.2	318	16.6	301	18.5	284	20.7
		67°F	78.6	2.4	339	16.7	321	18.6	303	20.8
		71°F	81.6	2.6	353	16.8	335	18.7	316	20.8
2SRPUH-50W	11500	59°F	89.0	3.1	378	20.5	359	22.8	339	25.4
		63°F	92.4	3.3	395	20.6	375	22.9	354	25.5
		67°F	97.7	3.6	421	20.8	400	23.0	377	25.6
		71°F	101.5	3.8	440	20.9	417	23.1	394	25.7
2SRPUH-60W	14500	59°F	110.0	3.8	470	24.9	445	27.7	420	30.9
		63°F	114.2	4.0	490	25.0	464	27.8	438	31.0
		67°F	120.8	4.4	522	25.3	495	28.0	467	31.2
		71°F	125.4	4.7	544	25.5	516	28.2	487	31.3

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 11a: Performance Data (Reciprocating Water Cooled Packaged Unit) - R22

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
1SRPUR-10W	3500	59°F	30.2	2.6	129	6.9	121	7.6	114	8.3
		63°F	31.3	2.7	134	6.9	126	7.6	119	8.3
		67°F	33.0	2.9	143	6.9	134	7.7	126	8.4
		71°F	34.2	3.0	148	6.9	140	7.7	132	8.5
1SRPUR-15W	5500	59°F	42.1	2.4	179	9.6	168	10.6	158	11.6
		63°F	43.6	2.6	187	9.6	176	10.7	164	11.7
		67°F	45.9	2.8	198	9.7	187	10.8	175	11.8
		71°F	47.5	3.0	206	9.7	194	10.8	183	11.9
1SRPUR-20W	7000	59°F	49.2	3.2	210	11.2	197	12.4	185	13.5
		63°F	51.0	3.4	218	11.2	206	12.5	193	13.6
		67°F	53.7	3.7	232	11.2	219	12.6	206	13.8
		71°F	55.6	3.9	241	11.2	228	12.6	214	13.9
1SRPUR-25W	9000	59°F	65.1	4.4	278	14.9	262	16.5	246	18.1
		63°F	67.5	4.7	289	14.9	273	16.6	256	18.2
		67°F	71.0	5.1	307	15.0	290	16.7	272	18.5
		71°F	73.5	5.3	319	15.0	301	16.8	284	18.6
1SRPUR-30W	10000	59°F	75.2	5.1	321	17.1	302	19.0	284	20.8
		63°F	77.8	5.4	334	17.1	315	19.1	296	21.0
		67°F	81.9	5.9	354	17.1	335	19.2	315	21.2
		71°F	84.7	6.2	368	17.1	348	19.3	328	21.3
1SRPUR-35W	12000	59°F	97.8	8.7	416	22.4	392	25.0	369	27.4
		63°F	101.2	9.1	433	22.5	409	25.1	384	27.6
		67°F	106.6	9.6	460	22.5	434	25.3	409	28.0
		71°F	110.3	10.1	478	22.5	452	25.4	426	28.2
1SRPUR-40W	14000	59°F	112.2	9.3	478	25.7	450	28.5	423	31.2
		63°F	116.2	9.7	497	25.8	469	28.7	441	31.5
		67°F	122.4	10.3	528	25.8	499	28.9	469	31.9
		71°F	126.6	10.8	549	25.9	519	29.0	489	32.1
1SRPUR-50W	17000	59°F	134.9	8.5	574	31.2	541	34.6	509	37.8
		63°F	139.7	8.9	597	31.2	564	34.8	530	38.2
		67°F	147.0	9.6	634	31.3	599	35.0	564	38.6
		71°F	152.1	10.0	659	31.3	623	35.1	587	38.8
1SRPUR-60W	20000	59°F	158.4	8.3	668	38.4	630	42.5	592	46.3
		63°F	163.7	8.7	694	38.5	655	42.8	616	46.7
		67°F	171.9	9.4	734	38.6	694	43.1	653	47.3
		71°F	177.5	9.8	762	38.6	720	43.3	678	47.7

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 11b: Performance Data (Reciprocating Water Cooled Packaged Unit) - R22

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
2SRPUR-10W	3500	59°F	30.3	1.0	129	7.1	120	7.9	112	8.7
		63°F	31.4	1.1	134	7.1	125	7.9	117	8.7
		67°F	33.1	1.1	142	7.1	133	8.0	124	8.8
		71°F	34.2	1.2	148	7.1	138	8.0	129	8.9
2SRPUR-15W	5500	59°F	45.6	1.8	194	10.6	181	11.9	169	13.1
		63°F	47.2	1.9	202	10.6	189	11.9	176	13.2
		67°F	49.6	2.0	214	10.6	200	12.0	187	13.3
		71°F	51.3	2.1	222	10.6	208	12.0	195	13.4
2SRPUR-20W	7500	59°F	60.5	2.6	258	13.7	243	15.2	227	16.5
		63°F	62.7	2.7	269	13.8	253	15.3	237	16.7
		67°F	66.0	2.9	285	13.8	269	15.4	253	16.9
		71°F	68.3	3.0	297	13.8	280	15.4	263	17.0
2SRPUR-30W	10000	59°F	84.1	2.4	358	19.2	337	21.2	315	23.1
		63°F	87.1	2.6	373	19.3	351	21.4	329	23.4
		67°F	91.8	2.8	397	19.3	373	21.5	350	23.6
		71°F	95.1	3.0	413	19.3	389	21.6	365	23.8
2SRPUR-40W	14000	59°F	98.4	3.2	420	22.4	395	24.8	370	27.0
		63°F	101.9	3.4	437	22.4	412	24.9	386	27.3
		67°F	107.4	3.7	464	22.5	437	25.1	411	27.6
		71°F	111.1	3.9	483	22.5	455	25.2	428	27.8
2SRPUR-50W	17000	59°F	130.3	4.4	555	29.8	523	33.0	491	36.2
		63°F	134.9	4.7	578	29.8	545	33.2	512	36.5
		67°F	142.0	5.1	613	29.9	579	33.5	545	36.9
		71°F	146.9	5.3	638	29.9	603	33.6	567	37.1
2SRPUR-60W	20000	59°F	150.3	5.1	641	34.1	605	37.9	569	41.6
		63°F	155.6	5.4	667	34.2	630	38.2	593	41.9
		67°F	163.8	5.9	708	34.3	669	38.4	630	42.4
		71°F	169.5	6.2	736	34.3	696	38.5	656	42.7
2SRPUR-70W	25000	59°F	195.6	8.7	833	44.8	785	49.9	737	54.8
		63°F	202.5	9.1	867	45.0	818	50.2	769	55.3
		67°F	213.2	9.6	920	45.1	869	50.6	817	55.9
		71°F	220.6	10.1	957	45.1	904	50.8	851	56.3
2SRPUR-80W	29000	59°F	224.5	9.3	956	51.5	901	57.1	846	62.5
		63°F	232.4	9.7	995	51.6	938	57.4	882	63.0
		67°F	244.7	10.3	1056	51.7	997	57.8	938	63.7
		71°F	253.2	10.8	1098	51.7	1038	58.1	977	64.2
2SRPUR-100W	32000	59°F	269.9	8.5	1147	62.3	1082	69.1	1017	75.7
		63°F	279.4	8.9	1194	62.5	1127	69.5	1061	76.3
		67°F	294.1	9.6	1268	62.6	1197	70.0	1128	77.2
		71°F	304.2	10.0	1318	62.6	1246	70.3	1174	77.7
2SRPUR-120W	32000	59°F	316.8	8.3	1335	76.8	1260	85.0	1184	92.7
		63°F	327.4	8.7	1387	77.0	1310	85.6	1231	93.5
		67°F	343.7	9.4	1468	77.2	1387	86.2	1305	94.7
		71°F	354.9	9.8	1524	77.2	1440	86.6	1356	95.4

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 12a: Performance Data (Reciprocating Water Cooled Packaged Unit) - R407C

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
1SRPUR-10W	3500	59°F	29.0	2.5	124	6.6	115	7.2	106	7.9
		63°F	30.1	2.6	129	6.6	120	7.3	111	7.9
		67°F	31.9	2.8	138	6.6	128	7.4	119	8.1
		71°F	33.1	2.9	144	6.6	134	7.4	124	8.1
1SRPUR-15W	5500	59°F	40.3	2.2	172	9.2	159	10.1	146	11.0
		63°F	41.9	2.4	180	9.2	167	10.2	153	11.1
		67°F	44.4	2.6	192	9.2	178	10.3	164	11.3
		71°F	46.1	2.8	200	9.3	186	10.4	172	11.4
1SRPUR-20W	7000	59°F	47.2	3.0	201	10.7	187	11.8	172	12.9
		63°F	49.1	3.2	210	10.7	196	11.9	180	13.0
		67°F	51.9	3.5	225	10.8	209	12.0	193	13.2
		71°F	53.9	3.7	235	10.8	218	12.1	202	13.3
1SRPUR-25W	9000	59°F	62.6	4.1	265	14.7	247	16.1	229	17.5
		63°F	65.1	4.4	277	14.8	259	16.3	239	17.7
		67°F	68.9	4.8	296	14.9	276	16.5	256	18.0
		71°F	71.5	5.1	309	14.9	289	16.7	268	18.2
1SRPUR-30W	10000	59°F	72.9	4.9	310	17.0	289	18.8	268	20.4
		63°F	75.8	5.2	323	17.1	302	18.9	281	20.7
		67°F	80.2	5.7	345	17.2	323	19.2	300	21.0
		71°F	83.2	6.0	360	17.3	337	19.3	313	21.2
1SRPUR-35W	12000	59°F	90.7	7.9	384	21.5	358	23.9	332	26.2
		63°F	94.3	8.3	401	21.6	375	24.1	347	26.5
		67°F	99.8	8.9	429	21.7	400	24.5	371	26.9
		71°F	103.6	9.3	447	21.8	418	24.6	388	27.2
1SRPUR-40W	14000	59°F	106.0	8.6	449	25.1	420	28.0	389	30.6
		63°F	110.1	9.1	469	25.2	438	28.2	407	31.0
		67°F	116.4	9.7	500	25.4	468	28.5	435	31.5
		71°F	120.8	10.2	521	25.4	489	28.7	455	31.7
1SRPUR-50W	17000	59°F	125.4	7.7	530	29.9	495	33.2	458	36.2
		63°F	130.2	8.1	554	30.1	517	33.5	480	36.7
		67°F	137.8	8.8	591	30.2	553	33.9	513	37.3
		71°F	143.0	9.2	617	30.3	577	34.1	536	37.6
1SRPUR-60W	20000	59°F	155.8	8.1	655	38.1	611	42.1	566	45.9
		63°F	161.6	8.6	684	38.3	638	42.4	592	46.3
		67°F	170.6	9.3	728	38.4	680	42.8	631	47.0
		71°F	176.8	9.7	759	38.4	709	43.0	659	47.4

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 12b: Performance Data (Reciprocating Water Cooled Packaged Unit) - R407C

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
2SRPUR-10W	3500	59°F	30.5	1.0	129	7.4	119	8.1	109	8.7
		63°F	31.8	1.1	135	7.4	125	8.2	114	8.8
		67°F	33.7	1.2	144	7.5	133	8.3	123	9.0
		71°F	35.0	1.2	151	7.6	140	8.4	128	9.1
2SRPUR-15W	5500	59°F	45.7	1.8	193	11.0	178	12.1	164	13.1
		63°F	47.5	1.9	202	11.1	187	12.2	172	13.2
		67°F	50.4	2.1	216	11.2	200	12.4	184	13.5
		71°F	52.4	2.2	225	11.3	209	12.5	193	13.7
2SRPUR-20W	7500	59°F	58.0	2.5	248	13.1	230	14.5	211	15.7
		63°F	60.3	2.6	259	13.2	240	14.6	221	15.9
		67°F	63.8	2.8	276	13.2	257	14.8	237	16.1
		71°F	66.3	2.9	289	13.2	268	14.8	248	16.3
2SRPUR-30W	10000	59°F	80.6	2.2	344	18.3	318	20.3	293	22.0
		63°F	83.8	2.4	359	18.4	333	20.4	307	22.2
		67°F	88.7	2.6	384	18.5	356	20.6	329	22.6
		71°F	92.1	2.8	401	18.5	372	20.8	344	22.8
2SRPUR-40W	14000	59°F	94.4	3.0	403	21.4	374	23.7	345	25.7
		63°F	98.1	3.2	421	21.5	391	23.9	361	26.0
		67°F	103.9	3.5	449	21.5	418	24.1	386	26.4
		71°F	107.8	3.7	469	21.6	437	24.2	404	26.6
2SRPUR-50W	17000	59°F	125.2	4.1	531	29.3	494	32.3	457	35.0
		63°F	130.1	4.4	555	29.5	517	32.6	479	35.5
		67°F	137.8	4.8	592	29.7	553	33.0	512	36.1
		71°F	143.0	5.1	618	29.9	577	33.3	536	36.5
2SRPUR-60W	20000	59°F	145.9	4.9	619	34.0	578	37.6	536	40.9
		63°F	151.5	5.2	647	34.2	604	37.9	561	41.4
		67°F	160.3	5.7	690	34.4	645	38.4	600	42.0
		71°F	166.4	6.0	720	34.5	674	38.6	627	42.4
2SRPUR-70W	25000	59°F	181.5	7.9	768	42.9	717	47.8	663	52.3
		63°F	188.6	8.3	803	43.2	749	48.3	694	53.0
		67°F	199.6	8.9	857	43.5	801	48.9	743	53.9
		71°F	207.2	9.3	895	43.6	837	49.3	777	54.5
2SRPUR-80W	29000	59°F	212.0	8.6	897	50.2	839	55.9	779	61.3
		63°F	220.1	9.1	937	50.4	877	56.4	815	61.9
		67°F	232.8	9.7	1000	50.7	936	57.0	871	62.9
		71°F	241.6	10.2	1043	50.8	978	57.4	910	63.5
2SRPUR-100W	32000	59°F	250.7	7.7	1060	59.8	989	66.4	916	72.5
		63°F	260.4	8.1	1107	60.1	1034	67.0	959	73.4
		67°F	275.6	8.8	1182	60.5	1105	67.8	1026	74.5
		71°F	286.0	9.2	1233	60.7	1154	68.3	1073	75.3
2SRPUR-120W	32000	59°F	311.6	8.1	1311	76.3	1221	84.2	1132	91.7
		63°F	323.2	8.6	1368	76.5	1276	84.8	1183	92.7
		67°F	341.2	9.3	1457	76.7	1360	85.6	1263	94.0
		71°F	353.6	9.7	1519	76.8	1419	86.0	1318	94.8

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 13a: Performance Data (Reciprocating Water Cooled Packaged Unit) - R134a

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
1SRPUR-10W	4000	59°F	28.3	2.6	121	6.2	112	6.8	103	7.4
		63°F	29.5	2.8	127	6.3	117	6.9	108	7.5
		67°F	31.3	2.9	136	6.3	126	7.0	116	7.6
		71°F	32.6	3.1	142	6.3	132	7.1	121	7.7
1SRPUR-15W	4500	59°F	33.2	1.7	142	7.4	132	8.1	121	8.7
		63°F	34.6	1.8	149	7.4	138	8.2	127	8.9
		67°F	36.7	2.1	159	7.5	148	8.3	136	9.0
		71°F	38.2	2.2	167	7.5	154	8.4	142	9.2
1SRPUR-20W	5500	59°F	43.6	2.9	186	9.9	173	10.9	161	11.8
		63°F	45.3	3.1	194	10.0	181	11.0	168	12.0
		67°F	48.0	3.4	207	10.1	194	11.2	180	12.2
		71°F	49.9	3.6	217	10.1	202	11.3	188	12.3
1SRPUR-25W	6500	59°F	49.7	3.0	211	11.6	196	12.8	181	13.8
		63°F	51.7	3.2	221	11.7	205	12.9	190	14.0
		67°F	54.8	3.6	235	11.9	220	13.2	203	14.3
		71°F	56.9	3.8	246	12.0	229	13.3	213	14.5
1SRPUR-30W	8500	59°F	64.6	4.4	275	14.8	257	16.3	238	17.7
		63°F	67.2	4.7	288	14.9	269	16.5	249	18.0
		67°F	71.2	5.1	307	15.0	287	16.8	267	18.3
		71°F	74.0	5.5	321	15.1	300	16.9	279	18.6
1SRPUR-35W	9500	59°F	74.3	6.6	315	17.5	293	19.3	272	20.9
		63°F	77.3	7.0	329	17.7	307	19.5	284	21.2
		67°F	81.9	7.6	351	17.9	328	19.9	304	21.7
		71°F	85.1	7.9	367	18.0	343	20.1	318	22.0
1SRPUR-40W	11000	59°F	89.4	7.6	378	21.2	353	23.3	327	25.2
		63°F	92.9	8.0	395	21.4	369	23.5	342	25.5
		67°F	98.5	8.6	422	21.6	394	24.0	366	26.1
		71°F	102.3	9.0	441	21.8	412	24.2	383	26.4
1SRPUR-50W	13000	59°F	103.4	6.3	430	26.8	401	29.0	372	30.9
		63°F	107.5	6.7	450	27.0	420	29.3	390	31.4
		67°F	113.8	7.3	480	27.3	449	29.8	417	32.1
		71°F	118.1	7.7	501	27.5	469	30.1	436	32.5
1SRPUR-60W	15000	59°F	121.5	6.0	506	31.4	472	34.0	437	36.3
		63°F	126.2	6.4	529	31.7	493	34.4	457	36.9
		67°F	133.5	7.0	564	32.0	526	35.0	489	37.7
		71°F	138.5	7.4	588	32.2	550	35.3	511	38.2

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 13b: Performance Data (Reciprocating Water Cooled Packaged Unit) - R134a

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
2SRPUR-10W	4000	59°F	31.1	1.1	132	7.3	123	8.0	113	8.7
		63°F	32.4	1.2	138	7.4	129	8.1	119	8.9
		67°F	34.5	1.3	148	7.4	138	8.3	128	9.0
		71°F	35.9	1.4	155	7.5	144	8.4	134	9.2
2SRPUR-15W	5500	59°F	40.8	1.7	175	9.1	162	10.0	148	10.9
		63°F	42.5	1.8	183	9.1	169	10.1	156	11.1
		67°F	45.1	2.0	196	9.2	181	10.3	167	11.3
		71°F	46.9	2.1	205	9.2	190	10.4	175	11.4
2SRPUR-20W	7000	59°F	56.6	2.6	243	12.5	224	13.7	205	14.7
		63°F	58.9	2.8	254	12.5	235	13.8	215	15.0
		67°F	62.6	2.9	272	12.6	252	14.0	231	15.3
		71°F	65.2	3.1	285	12.7	264	14.1	242	15.4
2SRPUR-30W	8500	59°F	66.4	1.7	284	14.8	263	16.2	242	17.5
		63°F	69.1	1.8	298	14.9	276	16.4	253	17.7
		67°F	73.4	2.1	319	15.0	295	16.6	272	18.1
		71°F	76.4	2.2	333	15.1	309	16.8	285	18.3
2SRPUR-40W	11000	59°F	87.2	2.9	372	19.8	347	21.8	322	23.6
		63°F	90.7	3.1	389	20.0	363	22.0	337	23.9
		67°F	96.0	3.4	415	20.1	388	22.3	360	24.4
		71°F	99.7	3.6	433	20.3	405	22.5	376	24.7
2SRPUR-50W	13000	59°F	99.5	3.0	422	23.3	393	25.5	363	27.6
		63°F	103.4	3.2	441	23.5	411	25.8	380	28.0
		67°F	109.6	3.6	471	23.8	439	26.3	407	28.6
		71°F	113.9	3.8	492	24.0	459	26.6	425	29.0
2SRPUR-60W	17000	59°F	129.2	4.4	550	29.5	513	32.6	476	35.5
		63°F	134.3	4.7	575	29.7	537	33.0	498	36.0
		67°F	142.4	5.1	615	30.0	574	33.5	533	36.7
		71°F	148.0	5.5	642	30.2	600	33.8	558	37.1
2SRPUR-70W	19000	59°F	148.5	6.6	629	35.0	587	38.5	543	41.8
		63°F	154.5	7.0	658	35.3	614	39.0	569	42.4
		67°F	163.8	7.6	703	35.8	656	39.8	609	43.3
		71°F	170.2	7.9	734	36.1	685	40.2	636	43.9
2SRPUR-80W	23000	59°F	178.7	7.6	756	42.3	706	46.5	654	50.3
		63°F	185.8	8.0	791	42.7	738	47.1	685	51.1
		67°F	196.9	8.6	844	43.3	789	47.9	733	52.1
		71°F	204.6	9.0	882	43.6	824	48.4	766	52.8
2SRPUR-100W	26000	59°F	206.9	6.3	861	53.5	803	57.9	744	61.8
		63°F	215.0	6.7	900	54.0	840	58.7	779	62.8
		67°F	227.6	7.3	961	54.6	898	59.7	834	64.2
		71°F	236.2	7.7	1003	55.0	938	60.3	872	65.0
2SRPUR-120W	30000	59°F	243.1	6.0	1012	62.8	943	68.0	873	72.7
		63°F	252.5	6.4	1057	63.3	986	68.9	914	73.8
		67°F	267.1	7.0	1128	64.0	1053	70.0	977	75.4
		71°F	277.1	7.4	1177	64.3	1099	70.7	1021	76.3

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 14: Performance Data (Screw Water Cooled Packaged Unit) - R22

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
1SRPUS-50W	15000	59°F	114.1	6.7	485	27.9	457	31.2	429	34.8
		63°F	117.8	7.0	503	27.9	475	31.3	447	35.1
		67°F	123.6	7.5	532	28.0	503	31.5	473	35.4
		71°F	127.5	7.9	552	27.9	522	31.6	492	35.7
1SRPUS-60W	18000	59°F	142.8	7.1	608	34.6	573	38.7	539	43.2
		63°F	147.5	7.5	631	34.7	596	38.9	560	43.5
		67°F	154.8	8.1	667	34.7	631	39.1	594	44.0
		71°F	159.7	8.4	692	34.6	655	39.3	617	44.2
1SRPUS-70W	21000	59°F	168.5	9.9	712	42.5	670	46.8	624	51.8
		63°F	174.1	10.4	739	42.9	696	47.2	649	52.2
		67°F	182.8	11.1	781	43.4	736	47.8	688	52.9
		71°F	188.8	11.6	810	43.8	764	48.3	715	53.3
1SRPUS-80W	25000	59°F	195.6	9.0	830	48.3	778	53.0	722	58.3
		63°F	202.2	9.5	861	48.8	808	53.5	751	58.9
		67°F	212.3	10.3	910	49.5	854	54.3	795	59.7
		71°F	219.4	10.9	943	50.1	887	54.9	826	60.3
1SRPUS-90W	30000	59°F	231.1	9.1	986	55.1	931	60.6	871	67.0
		63°F	238.6	9.7	1022	55.5	965	61.1	904	67.5
		67°F	250.3	10.6	1079	56.2	1020	61.8	956	68.3
		71°F	258.3	11.2	1117	56.6	1057	62.3	992	68.9
2SRPUS-100W	30000	59°F	228.1	6.7	969	55.8	914	62.3	859	69.6
		63°F	235.6	7.0	1006	55.9	950	62.7	893	70.1
		67°F	247.2	7.5	1064	55.9	1005	63.1	947	70.9
		71°F	255.1	7.9	1104	55.8	1044	63.3	984	71.3
2SRPUS-120W	32000	59°F	285.7	7.1	1216	69.2	1146	77.4	1077	86.3
		63°F	295.1	7.5	1263	69.3	1191	77.8	1121	87.0
		67°F	309.6	8.1	1335	69.4	1261	78.3	1188	88.0
		71°F	319.5	8.4	1385	69.3	1309	78.5	1234	88.5

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 15: Performance Data (Screw Water Cooled Packaged Unit) - R407C

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT. WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
1SRPUS-50W	15000	59°F	116.1	6.9	492	27.7	460	30.7	425	34.1
		63°F	120.3	7.3	513	28.0	480	31.0	444	34.5
		67°F	127.0	7.8	544	28.5	510	31.6	473	35.0
		71°F	131.6	8.2	566	28.9	531	31.9	493	35.3
1SRPUS-60W	18000	59°F	145.3	7.3	618	34.4	578	38.1	534	42.4
		63°F	150.7	7.7	643	34.8	602	38.5	557	42.8
		67°F	159.1	8.4	683	35.4	640	39.2	593	43.4
		71°F	164.8	8.8	710	35.9	667	39.6	619	43.8
1SRPUS-70W	21000	59°F	172.5	10.2	735	40.2	680	44.3	623	49.0
		63°F	179.1	10.8	767	40.7	710	44.7	651	49.3
		67°F	189.5	11.6	816	41.4	757	45.3	695	49.9
		71°F	196.7	12.2	851	41.9	790	45.8	725	50.3
1SRPUS-80W	25000	59°F	198.4	9.2	842	47.1	776	51.2	707	55.9
		63°F	206.1	9.9	879	47.9	810	51.9	739	56.6
		67°F	218.3	10.8	935	49.2	864	53.2	788	57.7
		71°F	226.7	11.5	974	50.2	900	54.0	823	58.5
1SRPUS-90W	30000	59°F	225.1	8.6	961	51.9	891	57.3	816	63.6
		63°F	233.5	9.3	1001	52.5	928	57.9	851	64.1
		67°F	246.6	10.3	1063	53.5	987	58.8	906	65.0
		71°F	255.7	11.0	1107	54.1	1028	59.4	944	65.5
2SRPUS-100W	30000	59°F	232.1	6.9	985	55.4	921	61.4	850	68.3
		63°F	240.7	7.3	1026	56.0	960	62.1	887	68.9
		67°F	254.0	7.8	1089	57.1	1020	63.1	945	70.0
		71°F	263.2	8.2	1133	57.8	1062	63.8	985	70.7
2SRPUS-120W	32000	59°F	290.7	7.3	1235	68.7	1155	76.2	1067	84.7
		63°F	301.4	7.7	1286	69.5	1204	77.0	1114	85.5
		67°F	318.1	8.4	1366	70.8	1280	78.3	1187	86.8
		71°F	329.7	8.8	1421	71.7	1333	79.2	1237	87.7

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 16: Performance Data (Screw Water Cooled Packaged Unit) - R134a

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condenser Water Flow		Condenser Leaving Water Temperature					
					85°F		95°F		105°F	
			GPM	PD (FT.WG)	QE	WC	QE	WC	QE	WC
					MBH	kW	MBH	kW	MBH	kW
1SRPUS-50W	15000	59°F	114.6	7.4	490	25.8	458	28.4	425	31.5
		63°F	119.3	7.8	512	26.0	480	28.7	445	31.8
		67°F	126.6	8.5	547	26.5	513	29.2	477	32.2
		71°F	131.7	9.0	571	26.8	536	29.5	499	32.6
1SRPUS-60W	18000	59°F	134.5	7.1	576	29.7	540	32.7	501	36.3
		63°F	140.0	7.6	603	30.0	565	33.1	524	36.6
		67°F	148.6	8.3	644	30.6	604	33.6	562	37.2
		71°F	154.5	8.8	672	30.9	632	34.0	588	37.5
1SRPUS-70W	20000	59°F	154.3	9.6	662	33.7	620	37.2	575	41.3
		63°F	160.6	10.1	692	34.1	649	37.6	603	41.6
		67°F	170.4	11.0	739	34.7	694	38.2	645	42.2
		71°F	177.3	11.6	772	35.2	726	38.6	675	42.6
1SRPUS-80W	24000	59°F	184.7	8.9	791	41.0	746	45.2	699	50.1
		63°F	191.9	9.5	825	41.5	780	45.6	731	50.5
		67°F	203.2	10.5	880	42.1	832	46.2	781	51.1
		71°F	211.0	11.2	917	42.6	868	46.7	816	51.5
1SRPUS-90W	28000	59°F	212.5	8.4	911	46.8	860	51.5	806	57.1
		63°F	220.8	9.1	951	47.2	898	52.0	843	57.6
		67°F	233.7	10.2	1013	48.0	958	52.7	900	58.3
		71°F	242.7	10.9	1056	48.5	1000	53.2	940	58.7
2SRPUS-100W	30000	59°F	229.2	7.4	979	51.5	917	56.8	850	63.0
		63°F	238.5	7.8	1024	52.1	960	57.4	890	63.6
		67°F	253.2	8.5	1094	53.0	1026	58.3	954	64.5
		71°F	263.3	9.0	1143	53.7	1073	59.0	998	65.1
2SRPUS-120W	32000	59°F	269.0	7.1	1153	59.3	1080	65.5	1001	72.6
		63°F	280.0	7.6	1205	60.0	1130	66.1	1049	73.3
		67°F	297.1	8.3	1288	61.1	1209	67.2	1124	74.3
		71°F	309.1	8.8	1345	61.9	1263	67.9	1175	75.0

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- PD = Condenser Water Pressure Drop
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 17a: Performance Data (Scroll Air Cooled Packaged Unit) - R22

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condensing Temperature											
			115°F			120°F			125°F			130°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
1SRPUH-10A	3500	59°F	108	7.5	132	105	7.9	131	102	8.4	129	99	9.0	128
		63°F	112	7.5	136	109	7.9	135	106	8.5	134	103	9.0	132
		67°F	119	7.5	143	115	8.0	141	112	8.5	140	109	9.0	138
		71°F	123	7.5	147	120	8.0	146	116	8.5	144	113	9.0	142
1SRPUH-15A	5000	59°F	159	11.4	196	154	12.1	194	149	12.8	191	143	13.6	187
		63°F	166	11.5	203	161	12.1	200	155	12.8	197	150	13.6	194
		67°F	176	11.5	213	170	12.2	210	165	12.9	207	159	13.6	203
		71°F	182	11.5	220	177	12.2	217	172	12.9	213	166	13.6	210
1SRPUH-20A	6000	59°F	207	14.9	255	202	15.8	253	196	16.7	250	190	17.7	247
		63°F	215	15.0	264	210	15.8	261	204	16.7	258	198	17.7	255
		67°F	228	15.0	276	222	15.9	273	216	16.8	270	210	17.8	267
		71°F	236	15.1	285	230	15.9	282	224	16.8	279	218	17.8	276
1SRPUH-25A	8000	59°F	259	18.5	319	251	19.6	315	243	20.8	311	235	22.1	307
		63°F	269	18.6	329	261	19.7	325	253	20.9	321	245	22.1	317
		67°F	286	18.8	346	278	19.8	342	269	21.0	337	261	22.2	333
		71°F	297	18.9	358	289	19.9	353	280	21.1	349	272	22.3	344
1SRPUH-30A	10000	59°F	318	22.7	392	310	24.0	388	302	25.3	384	293	26.8	380
		63°F	330	22.8	404	322	24.1	400	313	25.4	396	304	26.9	391
		67°F	349	23.0	423	340	24.2	419	331	25.6	414	322	27.0	409
		71°F	362	23.1	437	353	24.3	432	344	25.7	427	334	27.1	422

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 17b: Performance Data (Scroll Air Cooled Packaged Unit) - R22

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condensing Temperature											
			115°F			120°F			125°F			130°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
2SRPUH-10A	3500	59°F	101	7.4	125	98	7.9	124	95	8.3	122	92	8.8	120
		63°F	105	7.5	130	102	7.9	128	99	8.4	126	96	8.8	124
		67°F	112	7.6	136	108	8.0	134	105	8.4	132	102	8.9	131
		71°F	116	7.6	141	112	8.1	139	109	8.5	137	106	9.0	135
2SRPUH-15A	5000	59°F	163	11.3	200	158	12.0	197	153	12.7	194	148	13.5	191
		63°F	170	11.3	206	165	12.0	204	160	12.7	201	154	13.5	198
		67°F	180	11.3	217	175	12.0	214	170	12.7	211	164	13.5	208
		71°F	187	11.4	224	182	12.0	221	176	12.8	218	171	13.5	215
2SRPUH-20A	7000	59°F	216	14.9	265	210	15.9	262	204	16.9	259	198	18.0	256
		63°F	224	15.0	273	218	15.9	270	212	16.9	267	206	18.0	264
		67°F	237	15.0	286	231	16.0	283	224	16.9	279	218	18.0	276
		71°F	246	15.1	295	239	16.0	291	233	17.0	288	226	18.1	285
2SRPUH-30A	10000	59°F	318	22.9	393	309	24.2	387	298	25.6	381	287	27.2	375
		63°F	331	22.9	406	321	24.3	400	311	25.7	394	299	27.2	387
		67°F	351	23.0	426	341	24.3	420	330	25.7	413	318	27.2	407
		71°F	365	23.1	440	354	24.4	433	343	25.8	427	331	27.3	420
2SRPUH-40A	13000	59°F	414	29.9	511	403	31.6	506	392	33.4	500	380	35.4	495
		63°F	430	29.9	527	419	31.6	522	408	33.5	516	395	35.5	510
		67°F	456	30.0	553	444	31.7	547	432	33.6	541	419	35.5	534
		71°F	473	30.1	571	461	31.8	564	449	33.6	557	436	35.6	551
2SRPUH-50A	16000	59°F	517	37.1	637	502	39.3	629	486	41.7	621	470	44.2	614
		63°F	538	37.2	659	523	39.4	651	507	41.8	642	490	44.3	634
		67°F	571	37.5	693	555	39.7	684	539	42.0	675	522	44.5	666
		71°F	594	37.7	716	577	39.9	707	561	42.2	697	543	44.6	688
2SRPUH-60A	19000	59°F	637	45.4	784	621	47.9	776	603	50.6	768	586	53.5	759
		63°F	661	45.6	809	644	48.1	800	627	50.8	791	608	53.7	783
		67°F	698	45.9	847	681	48.4	838	662	51.2	828	644	54.0	819
		71°F	723	46.1	873	706	48.7	863	687	51.4	854	668	54.2	844

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 18a: Performance Data (Scroll Air Cooled Packaged Unit) - R407C

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condensing Temperature											
			115°F			120°F			125°F			130°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
1SRPUH-10A	3500	59°F	106	7.4	130	102	7.9	128	99	8.4	126	95	8.9	124
		63°F	110	7.4	134	107	7.9	132	103	8.4	130	99	9.0	128
		67°F	118	7.4	141	114	7.9	139	110	8.4	137	106	9.0	135
		71°F	122	7.4	146	119	7.9	144	114	8.4	142	110	9.0	139
1SRPUH-15A	5000	59°F	155	11.3	191	149	12.0	188	144	12.8	185	138	13.6	182
		63°F	162	11.3	198	156	12.0	195	150	12.8	192	144	13.6	188
		67°F	172	11.4	209	166	12.1	205	160	12.8	202	154	13.6	198
		71°F	179	11.4	216	173	12.1	213	167	12.8	209	161	13.7	205
1SRPUH-20A	6000	59°F	205	14.9	253	198	15.9	250	191	16.9	246	184	18.0	242
		63°F	214	14.9	262	207	15.9	258	199	16.9	254	192	18.1	250
		67°F	228	15.0	276	220	16.0	272	213	17.0	268	205	18.1	263
		71°F	237	15.0	286	229	16.0	281	222	17.1	277	214	18.2	272
1SRPUH-25A	8000	59°F	257	18.5	317	247	19.7	311	237	20.9	305	227	22.3	300
		63°F	268	18.6	329	258	19.7	322	248	21.0	316	238	22.4	310
		67°F	286	18.7	347	276	19.8	340	265	21.0	333	254	22.4	327
		71°F	299	18.7	359	288	19.9	352	277	21.1	345	266	22.4	338
1SRPUH-30A	10000	59°F	315	22.4	388	304	23.8	382	293	25.4	375	281	27.0	368
		63°F	329	22.5	402	318	23.9	395	306	25.4	389	294	27.0	382
		67°F	352	22.6	425	340	24.0	417	327	25.5	410	314	27.1	402
		71°F	367	22.6	440	355	24.0	432	342	25.5	425	329	27.1	417

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 18b: Performance Data (Scroll Air Cooled Packaged Unit) - R407C

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condensing Temperature											
			115°F			120°F			125°F			130°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
2SRPUH-10A	3500	59°F	100	7.3	124	97	7.9	122	94	8.4	121	90	9.0	120
		63°F	104	7.3	128	101	7.9	126	97	8.4	125	94	9.0	123
		67°F	110	7.3	134	107	7.8	132	103	8.4	130	100	9.0	129
		71°F	115	7.3	138	111	7.8	136	107	8.4	134	103	9.0	133
2SRPUH-15A	5000	59°F	162	11.4	199	156	12.2	196	151	13.0	193	144	13.9	189
		63°F	169	11.4	206	163	12.2	203	157	13.0	199	151	13.9	196
		67°F	179	11.4	216	174	12.1	213	167	13.0	210	161	13.9	206
		71°F	187	11.4	223	181	12.1	220	175	12.9	217	168	13.8	213
2SRPUH-20A	7000	59°F	212	14.7	259	205	15.7	255	197	16.8	251	189	17.9	247
		63°F	221	14.7	269	214	15.7	264	206	16.8	260	198	17.9	256
		67°F	235	14.8	283	227	15.7	278	219	16.8	274	211	17.9	269
		71°F	245	14.8	293	237	15.8	288	229	16.8	283	220	17.9	279
2SRPUH-30A	10000	59°F	310	22.6	383	299	24.0	377	287	25.6	370	275	27.3	364
		63°F	323	22.6	397	312	24.1	390	300	25.6	383	288	27.3	376
		67°F	344	22.7	418	333	24.1	411	320	25.6	404	308	27.3	396
		71°F	359	22.8	432	347	24.2	425	334	25.7	418	321	27.3	410
2SRPUH-40A	13000	59°F	410	29.8	507	396	31.7	499	382	33.8	491	367	36.0	484
		63°F	428	29.9	525	413	31.8	517	399	33.9	509	384	36.1	501
		67°F	455	30.0	552	440	31.9	544	425	34.0	535	409	36.3	527
		71°F	474	30.0	572	459	32.0	563	443	34.1	554	427	36.4	545
2SRPUH-50A	16000	59°F	514	37.1	634	494	39.4	622	475	41.9	611	455	44.6	600
		63°F	537	37.2	657	517	39.5	645	496	42.0	632	476	44.7	621
		67°F	572	37.3	694	551	39.6	680	530	42.1	667	509	44.8	654
		71°F	597	37.4	719	575	39.7	704	553	42.2	690	531	44.9	677
2SRPUH-60A	19000	59°F	631	44.9	776	608	47.7	763	586	50.7	750	562	54.0	737
		63°F	659	45.0	805	636	47.8	791	612	50.8	777	588	54.1	763
		67°F	703	45.2	850	679	47.9	835	654	50.9	820	629	54.2	805
		71°F	734	45.3	881	709	48.0	865	684	51.0	849	657	54.3	833

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 19a: Performance Data (Scroll Air Cooled Packaged Unit) - R134a

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	120°F			125°F			130°F			135°F			140°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
1SRPUH-10A	2500	59°F	69	5.3	86	67	5.6	85	64	6.0	84	62	6.3	82	60	6.7	81
		63°F	72	5.3	90	70	5.6	88	67	6.0	87	65	6.3	85	62	6.7	84
		67°F	77	5.3	94	75	5.6	93	72	6.0	91	70	6.3	90	67	6.7	89
		71°F	81	5.3	98	78	5.6	96	75	6.0	95	73	6.3	93	70	6.7	92
1SRPUH-15A	3500	59°F	103	8.4	130	99	8.9	128	96	9.4	126	92	10.0	124	88	10.6	122
		63°F	108	8.4	135	104	8.9	133	100	9.4	131	96	10.0	129	92	10.6	126
		67°F	115	8.4	142	111	8.9	140	107	9.4	138	103	10.0	135	99	10.6	133
		71°F	120	8.4	147	116	8.9	145	112	9.5	143	108	10.0	140	103	10.6	138
1SRPUH-20A	4000	59°F	132	10.9	167	127	11.5	165	123	12.2	163	119	12.9	161	114	13.7	159
		63°F	138	10.9	173	133	11.6	171	129	12.2	168	124	13.0	166	120	13.7	164
		67°F	147	11.0	183	142	11.6	180	138	12.3	177	133	13.0	175	128	13.8	173
		71°F	153	11.0	189	149	11.6	186	144	12.3	184	139	13.0	181	134	13.8	178
1SRPUH-25A	5000	59°F	164	13.4	208	159	14.2	205	153	15.1	202	148	16.0	200	142	16.9	197
		63°F	172	13.5	215	166	14.2	212	160	15.1	209	155	16.0	207	149	17.0	204
		67°F	183	13.5	227	177	14.3	224	171	15.1	220	165	16.0	217	159	17.0	214
		71°F	191	13.6	235	185	14.3	232	179	15.2	228	173	16.0	225	166	17.0	222
1SRPUH-30A	6500	59°F	204	16.3	256	197	17.3	253	191	18.3	250	184	19.3	247	178	20.4	244
		63°F	213	16.4	266	206	17.3	262	199	18.3	259	192	19.4	255	186	20.5	252
		67°F	227	16.5	280	220	17.4	276	212	18.4	272	205	19.5	268	198	20.6	265
		71°F	236	16.5	290	229	17.5	286	222	18.5	282	214	19.5	278	207	20.6	274

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 19b: Performance Data (Scroll Air Cooled Packaged Unit) - R134a

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	120°F			125°F			130°F			135°F			140°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
2SRPUH-10A	2500	59°F	67	5.3	84	65	5.6	83	63	6.0	82	60	6.3	81	58	6.7	80
		63°F	70	5.3	87	68	5.6	86	66	6.0	85	63	6.3	84	61	6.7	83
		67°F	75	5.3	92	72	5.7	91	70	6.0	90	68	6.4	88	65	6.7	87
		71°F	78	5.4	96	76	5.7	94	73	6.0	93	71	6.4	91	68	6.8	90
2SRPUH-15A	3500	59°F	102	8.3	129	98	8.8	127	94	9.3	125	90	9.9	122	85	10.6	120
		63°F	107	8.3	134	103	8.8	132	99	9.3	129	95	9.9	127	90	10.6	124
		67°F	115	8.3	142	111	8.8	139	106	9.3	137	102	9.9	134	97	10.6	131
		71°F	120	8.3	147	116	8.8	144	112	9.3	142	107	9.9	139	102	10.5	136
2SRPUH-20A	4000	59°F	138	10.6	173	134	11.2	170	129	11.9	168	124	12.6	165	119	13.4	162
		63°F	145	10.6	179	140	11.3	176	135	11.9	174	130	12.6	171	125	13.4	168
		67°F	154	10.6	189	149	11.3	186	144	11.9	183	139	12.6	180	134	13.4	177
		71°F	161	10.7	196	156	11.3	193	151	11.9	189	145	12.6	186	140	13.4	183
2SRPUH-30A	6500	59°F	206	16.8	261	199	17.8	257	191	18.9	252	184	20.0	248	176	21.2	244
		63°F	215	16.8	270	208	17.8	266	200	18.9	261	192	20.0	257	184	21.2	253
		67°F	230	16.9	285	222	17.8	280	214	18.9	275	206	20.0	271	197	21.2	266
		71°F	240	16.9	295	232	17.9	290	224	18.9	285	215	20.0	280	207	21.2	275
2SRPUH-40A	8000	59°F	263	21.8	334	255	23.1	330	246	24.4	326	238	25.9	321	229	27.4	317
		63°F	275	21.9	346	267	23.1	342	258	24.5	337	249	25.9	333	239	27.5	328
		67°F	294	21.9	365	285	23.2	360	275	24.6	355	266	26.0	350	256	27.5	345
		71°F	307	22.0	378	297	23.3	373	287	24.6	367	277	26.1	362	267	27.6	357
2SRPUH-50A	10000	59°F	328	26.9	415	318	28.4	410	307	30.1	405	296	31.9	399	285	33.9	394
		63°F	343	26.9	430	332	28.5	424	321	30.2	419	310	32.0	413	298	33.9	408
		67°F	366	27.0	454	355	28.6	447	343	30.2	441	331	32.0	435	318	34.0	429
		71°F	382	27.1	470	370	28.6	463	358	30.3	456	345	32.1	450	333	34.0	443
2SRPUH-60A	13000	59°F	407	32.7	513	394	34.5	506	381	36.5	500	368	38.6	494	355	40.8	487
		63°F	425	32.8	531	412	34.7	524	398	36.6	517	385	38.8	510	371	41.0	504
		67°F	453	33.0	560	439	34.8	552	425	36.8	544	411	38.9	537	396	41.2	529
		71°F	473	33.1	580	458	35.0	571	443	36.9	563	428	39.0	555	413	41.3	547

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 20a: Performance Data (Reciprocating Air Cooled Packaged Unit) - R22

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condensing Temperature											
			115°F			120°F			125°F			130°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
1SRPUR-10A	3500	59°F	114	8.3	140	110	8.6	138	106	8.9	135	102	9.2	132
		63°F	119	8.3	146	115	8.7	143	111	9.0	140	107	9.3	137
		67°F	126	8.4	154	122	8.8	151	118	9.1	148	114	9.5	145
		71°F	132	8.5	159	127	8.9	156	123	9.2	153	119	9.6	150
1SRPUR-15A	5000	59°F	158	11.6	195	152	12.0	191	147	12.5	187	142	12.9	183
		63°F	164	11.7	202	159	12.1	198	153	12.6	194	148	13.0	190
		67°F	175	11.8	213	169	12.3	209	164	12.8	205	158	13.3	201
		71°F	183	11.9	221	177	12.4	217	171	12.9	213	165	13.4	208
1SRPUR-20A	6000	59°F	185	13.5	229	179	14.1	225	173	14.6	220	167	15.1	216
		63°F	193	13.6	237	187	14.2	233	180	14.8	228	174	15.3	224
		67°F	206	13.8	250	199	14.4	246	192	15.0	241	186	15.6	236
		71°F	214	13.9	259	207	14.5	254	201	15.1	250	194	15.7	245
1SRPUR-25A	8000	59°F	246	18.1	304	238	18.8	299	230	19.6	293	222	20.3	288
		63°F	256	18.2	315	248	19.0	310	240	19.8	304	232	20.5	298
		67°F	272	18.5	332	264	19.3	326	255	20.1	321	247	20.9	315
		71°F	284	18.6	344	275	19.4	338	266	20.3	332	257	21.1	326
1SRPUR-30A	10000	59°F	284	20.8	352	275	21.7	346	266	22.5	339	257	23.4	333
		63°F	296	21.0	364	287	21.9	358	278	22.8	352	269	23.7	345
		67°F	315	21.2	384	305	22.2	377	296	23.1	371	286	24.0	364
		71°F	328	21.3	397	318	22.3	390	308	23.3	384	298	24.3	377
1SRPUR-35A	12000	59°F	369	27.4	457	357	28.6	449	345	29.7	441	333	30.9	433
		63°F	384	27.6	474	372	28.9	466	360	30.1	457	348	31.3	449
		67°F	409	28.0	499	396	29.3	491	383	30.5	482	370	31.8	473
		71°F	426	28.2	517	412	29.5	508	399	30.8	499	386	32.1	490
1SRPUR-40A	13000	59°F	423	31.2	524	409	32.5	515	396	33.8	506	382	35.1	496
		63°F	441	31.5	543	427	32.9	534	413	34.2	524	399	35.5	514
		67°F	469	31.9	572	455	33.3	562	440	34.7	552	425	36.0	542
		71°F	489	32.1	593	473	33.6	582	458	35.0	572	443	36.4	561
1SRPUR-50A	16000	59°F	509	37.8	631	493	39.4	620	476	41.0	609	460	42.5	598
		63°F	530	38.2	654	514	39.8	643	497	41.4	631	480	43.0	620
		67°F	564	38.6	689	546	40.3	677	529	42.0	665	512	43.7	653
		71°F	587	38.8	713	569	40.6	701	551	42.4	689	533	44.1	676
1SRPUR-60A	18000	59°F	592	46.3	742	573	48.2	729	554	50.0	716	534	51.8	702
		63°F	616	46.7	767	596	48.7	754	576	50.5	740	556	52.4	726
		67°F	653	47.3	806	632	49.3	792	611	51.3	778	591	53.3	764
		71°F	678	47.7	833	657	49.8	818	636	51.8	804	614	53.9	789

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 20b: Performance Data (Reciprocating Air Cooled Packaged Unit) - R22

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condensing Temperature											
			115°F			120°F			125°F			130°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
2SRPUR-10A	3500	59°F	112	8.7	140	108	9.0	137	104	9.4	134	100	9.8	131
		63°F	117	8.7	145	112	9.1	142	108	9.5	139	104	9.9	136
		67°F	124	8.8	153	120	9.2	149	115	9.6	146	111	10.0	143
		71°F	129	8.9	158	125	9.3	155	120	9.7	152	116	10.1	149
2SRPUR-15A	5000	59°F	169	13.1	211	163	13.7	207	157	14.3	203	151	14.8	199
		63°F	176	13.2	219	170	13.8	214	164	14.4	210	158	15.0	206
		67°F	187	13.3	230	181	13.9	226	174	14.6	222	168	15.2	217
		71°F	195	13.4	238	188	14.0	234	182	14.7	229	175	15.3	225
2SRPUR-20A	7000	59°F	227	16.5	281	220	17.2	275	212	17.8	270	205	18.4	264
		63°F	237	16.7	291	229	17.3	286	222	18.0	280	214	18.6	274
		67°F	253	16.9	307	244	17.6	301	236	18.3	295	228	19.0	289
		71°F	263	17.0	318	255	17.7	312	246	18.5	306	238	19.2	300
2SRPUR-30A	10000	59°F	315	23.1	390	304	24.0	382	294	24.9	375	283	25.8	367
		63°F	329	23.4	405	318	24.3	397	307	25.2	389	296	26.1	380
		67°F	350	23.6	427	339	24.6	419	327	25.6	410	316	26.6	402
		71°F	365	23.8	442	353	24.9	434	341	25.9	425	330	26.8	417
2SRPUR-40A	13000	59°F	370	27.0	458	358	28.1	449	346	29.2	440	334	30.2	431
		63°F	386	27.3	475	374	28.4	466	361	29.5	457	348	30.6	448
		67°F	411	27.6	501	398	28.8	491	385	30.0	482	372	31.1	472
		71°F	428	27.8	518	415	29.0	509	401	30.3	499	388	31.4	489
2SRPUR-50A	16000	59°F	491	36.2	609	476	37.7	598	460	39.2	587	444	40.6	576
		63°F	512	36.5	631	496	38.1	619	480	39.6	608	464	41.1	597
		67°F	545	36.9	665	528	38.6	653	511	40.2	641	494	41.8	629
		71°F	567	37.1	688	550	38.9	676	532	40.5	664	515	42.2	652
2SRPUR-60A	18000	59°F	569	41.6	704	551	43.4	691	533	45.1	679	515	46.8	666
		63°F	593	41.9	729	574	43.8	716	556	45.6	703	537	47.3	691
		67°F	630	42.4	768	611	44.3	755	591	46.2	741	572	48.1	728
		71°F	656	42.7	794	636	44.7	781	616	46.6	767	596	48.5	754
2SRPUR-70A	23000	59°F	737	54.8	915	713	57.2	899	690	59.5	883	666	61.7	866
		63°F	769	55.3	948	744	57.7	931	720	60.1	915	695	62.5	898
		67°F	817	55.9	999	792	58.5	982	766	61.1	964	741	63.6	947
		71°F	851	56.3	1034	825	59.0	1016	799	61.7	999	772	64.2	981
2SRPUR-80A	26000	59°F	846	62.5	1049	819	65.1	1030	792	67.6	1011	765	70.1	992
		63°F	882	63.0	1087	854	65.7	1067	826	68.4	1048	798	70.9	1028
		67°F	938	63.7	1145	909	66.6	1125	880	69.4	1105	850	72.1	1084
		71°F	977	64.2	1185	947	67.1	1164	917	70.0	1144	887	72.8	1123
2SRPUR-100A	30000	59°F	1017	75.7	1263	985	78.9	1241	953	82.0	1219	921	85.0	1196
		63°F	1061	76.3	1308	1027	79.6	1285	994	82.9	1263	961	86.0	1240
		67°F	1128	77.2	1378	1093	80.6	1354	1058	84.1	1331	1023	87.4	1307
		71°F	1174	77.7	1426	1138	81.3	1402	1103	84.8	1377	1067	88.3	1353
2SRPUR-120A	32000	59°F	1184	92.7	1484	1146	96.4	1458	1107	100.0	1431	1069	103.6	1405
		63°F	1231	93.5	1534	1192	97.3	1507	1153	101.1	1480	1113	104.8	1453
		67°F	1305	94.7	1612	1264	98.7	1584	1223	102.7	1556	1182	106.6	1527
		71°F	1356	95.4	1665	1314	99.6	1636	1271	103.7	1607	1229	107.7	1578

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 21a: Performance Data (Reciprocating Air Cooled Packaged Unit) - R407C

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condensing Temperature											
			115°F			120°F			125°F			130°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
1SRPUR-10A	4000	59°F	106	7.9	131	101	8.1	127	96	8.4	124	92	8.6	120
		63°F	111	7.9	136	106	8.2	133	101	8.5	129	96	8.7	125
		67°F	119	8.1	145	114	8.4	141	108	8.7	137	103	8.9	132
		71°F	124	8.1	150	119	8.5	146	114	8.8	142	108	9.0	138
1SRPUR-15A	5000	59°F	146	11.0	182	140	11.4	177	133	11.7	171	127	12.0	166
		63°F	153	11.1	189	147	11.5	184	140	11.9	178	133	12.2	173
		67°F	164	11.3	201	157	11.7	195	150	12.1	189	143	12.5	183
		71°F	172	11.4	209	165	11.8	203	157	12.3	197	150	12.6	191
1SRPUR-20A	6000	59°F	172	12.9	214	165	13.3	208	157	13.8	202	150	14.1	196
		63°F	180	13.0	223	173	13.5	216	165	13.9	210	157	14.4	204
		67°F	193	13.2	236	185	13.7	229	177	14.2	223	169	14.7	216
		71°F	202	13.3	245	194	13.9	239	185	14.4	232	177	14.8	225
1SRPUR-25A	8000	59°F	229	17.5	285	219	18.1	278	210	18.7	270	200	19.3	263
		63°F	239	17.7	297	230	18.4	289	220	19.0	281	210	19.6	274
		67°F	256	18.0	315	246	18.7	307	236	19.4	299	225	20.1	290
		71°F	268	18.2	327	257	19.0	319	247	19.7	310	236	20.3	302
1SRPUR-30A	9500	59°F	268	20.4	334	258	21.2	326	247	22.0	318	236	22.7	310
		63°F	281	20.7	348	270	21.5	339	259	22.3	331	248	23.0	322
		67°F	300	21.0	368	288	21.9	359	277	22.7	351	265	23.5	342
		71°F	313	21.2	382	302	22.1	373	290	23.0	364	278	23.8	355
1SRPUR-35A	12000	59°F	332	26.2	416	318	27.2	406	304	28.2	396	290	29.1	385
		63°F	347	26.5	433	333	27.6	422	319	28.6	412	304	29.6	400
		67°F	371	26.9	459	357	28.1	448	342	29.2	436	327	30.3	425
		71°F	388	27.2	477	373	28.4	465	358	29.6	454	342	30.7	442
1SRPUR-40A	14000	59°F	389	30.6	489	374	31.9	477	359	33.1	466	343	34.2	454
		63°F	407	31.0	508	392	32.3	496	375	33.5	484	359	34.7	472
		67°F	435	31.5	537	419	32.8	525	402	34.1	513	385	35.4	500
		71°F	455	31.7	558	438	33.2	545	420	34.5	532	403	35.9	519
1SRPUR-50A	16000	59°F	458	36.2	576	440	37.7	562	421	39.0	547	402	40.2	532
		63°F	480	36.7	598	460	38.1	584	441	39.5	569	421	40.9	554
		67°F	513	37.3	634	493	38.8	619	472	40.3	603	452	41.7	587
		71°F	536	37.6	658	515	39.3	643	494	40.8	627	473	42.3	610
1SRPUR-60A	18000	59°F	566	45.9	715	544	47.6	698	521	49.4	681	499	51.0	664
		63°F	592	46.3	742	568	48.2	725	545	50.0	707	522	51.8	690
		67°F	631	47.0	784	607	49.0	766	583	51.0	748	559	52.9	730
		71°F	659	47.4	813	634	49.5	794	609	51.6	776	584	53.6	757

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 21b: Performance Data (Reciprocating Air Cooled Packaged Unit) - R407C

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condensing Temperature											
			115°F			120°F			125°F			130°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
2SRPUR-10A	3500	59°F	109	8.7	137	104	9.0	134	99	9.3	129	95	9.5	125
		63°F	114	8.8	143	109	9.1	139	104	9.4	135	99	9.7	131
		67°F	123	9.0	152	117	9.3	148	112	9.6	143	107	9.9	139
		71°F	128	9.1	158	123	9.5	153	117	9.8	149	112	10.1	144
2SRPUR-15A	5000	59°F	164	13.1	206	157	13.5	201	150	13.9	195	142	14.3	189
		63°F	172	13.2	215	164	13.7	209	157	14.2	203	149	14.6	196
		67°F	184	13.5	228	176	14.0	221	168	14.5	215	160	14.9	209
		71°F	193	13.7	237	184	14.2	230	176	14.7	224	168	15.2	217
2SRPUR-20A	7000	59°F	211	15.7	262	202	16.3	255	193	16.8	247	184	17.2	239
		63°F	221	15.9	273	212	16.5	265	202	17.0	257	193	17.5	249
		67°F	237	16.1	289	227	16.7	281	217	17.3	273	207	17.8	265
		71°F	248	16.3	301	238	16.9	292	227	17.5	284	217	18.1	275
2SRPUR-30A	10000	59°F	293	22.0	364	280	22.7	353	267	23.4	342	253	24.0	331
		63°F	307	22.2	379	293	23.0	368	280	23.7	357	266	24.4	345
		67°F	329	22.6	402	314	23.4	390	300	24.2	379	286	24.9	367
		71°F	344	22.8	417	329	23.7	406	315	24.5	394	300	25.3	382
2SRPUR-40A	13000	59°F	345	25.7	428	330	26.6	416	315	27.5	404	300	28.3	391
		63°F	361	26.0	445	345	27.0	433	330	27.9	420	314	28.7	407
		67°F	386	26.4	472	370	27.4	459	354	28.4	446	337	29.3	432
		71°F	404	26.6	490	387	27.7	477	370	28.7	464	354	29.7	450
2SRPUR-50A	16000	59°F	457	35.0	571	438	36.3	556	419	37.5	541	400	38.6	525
		63°F	479	35.5	593	459	36.8	578	440	38.0	563	420	39.2	547
		67°F	512	36.1	629	492	37.5	613	471	38.8	597	451	40.1	581
		71°F	536	36.5	654	515	37.9	638	493	39.4	621	472	40.7	604
2SRPUR-60A	18000	59°F	536	40.9	669	515	42.4	653	494	43.9	637	473	45.3	620
		63°F	561	41.4	695	539	43.0	679	517	44.5	662	495	46.0	645
		67°F	600	42.0	736	577	43.8	719	554	45.4	701	531	47.0	683
		71°F	627	42.4	764	603	44.3	747	579	46.0	728	555	47.7	710
2SRPUR-70A	23000	59°F	663	52.3	833	636	54.4	812	608	56.4	791	581	58.2	769
		63°F	694	53.0	866	666	55.2	845	638	57.2	823	609	59.1	801
		67°F	743	53.9	918	713	56.2	896	683	58.4	873	653	60.5	849
		71°F	777	54.5	953	746	56.9	931	715	59.2	907	684	61.4	883
2SRPUR-80A	26000	59°F	779	61.3	977	748	63.7	955	717	66.1	932	686	68.4	908
		63°F	815	61.9	1016	783	64.5	992	751	67.0	968	719	69.4	943
		67°F	871	62.9	1075	838	65.7	1050	804	68.3	1025	770	70.8	999
		71°F	910	63.5	1116	876	66.4	1091	841	69.1	1065	805	71.7	1038
2SRPUR-100A	30000	59°F	916	72.5	1151	879	75.3	1123	842	78.0	1094	804	80.5	1065
		63°F	959	73.4	1197	921	76.3	1168	882	79.1	1138	843	81.7	1107
		67°F	1026	74.5	1268	986	77.7	1238	945	80.7	1206	904	83.5	1174
		71°F	1073	75.3	1317	1031	78.6	1286	989	81.7	1253	946	84.6	1220
2SRPUR-120A	32000	59°F	1132	91.7	1429	1087	95.3	1396	1042	98.7	1362	998	102.1	1329
		63°F	1183	92.7	1484	1137	96.4	1449	1091	100.1	1415	1044	103.6	1380
		67°F	1263	94.0	1568	1214	98.0	1532	1166	101.9	1496	1117	105.8	1460
		71°F	1318	94.8	1626	1268	99.0	1589	1218	103.1	1552	1168	107.1	1515

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 22a: Performance Data (Reciprocating Air Cooled Packaged Unit) - R134a

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	120°F			125°F			130°F			135°F			140°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
1SRPUR-10A	3000	59°F	98	7.6	123	93	7.8	119	89	8.1	115	84	8.2	111	79	8.4	107
		63°F	103	7.7	128	98	8.0	124	93	8.2	120	88	8.4	116	83	8.6	111
		67°F	110	7.9	136	105	8.2	132	100	8.4	128	95	8.7	123	90	8.9	119
		71°F	116	8.0	142	110	8.3	137	105	8.6	133	100	8.8	128	95	9.0	124
1SRPUR-15A	3500	59°F	115	9.0	145	110	9.3	140	105	9.6	136	100	9.8	131	94	10.1	127
		63°F	121	9.2	151	116	9.5	146	110	9.8	142	105	10.0	137	99	10.3	132
		67°F	130	9.4	161	124	9.7	156	118	10.0	151	113	10.3	146	107	10.6	141
		71°F	136	9.5	167	130	9.9	162	124	10.2	157	118	10.5	152	112	10.8	147
1SRPUR-20A	5000	59°F	155	12.3	194	148	12.7	189	142	13.1	184	135	13.4	179	129	13.8	174
		63°F	162	12.4	202	155	12.9	197	149	13.3	192	142	13.7	186	135	14.0	181
		67°F	173	12.7	214	166	13.1	209	159	13.6	203	152	14.0	198	145	14.4	192
		71°F	181	12.8	223	174	13.3	217	167	13.8	211	160	14.2	206	152	14.6	200
1SRPUR-25A	6000	59°F	174	14.3	220	166	14.7	214	158	15.1	207	151	15.5	201	143	15.9	194
		63°F	182	14.5	229	174	15.0	222	166	15.4	216	158	15.8	209	150	16.2	203
		67°F	195	14.8	243	187	15.3	236	178	15.8	229	170	16.2	223	161	16.7	215
		71°F	204	15.0	253	195	15.6	246	187	16.1	239	178	16.5	232	169	17.0	224
1SRPUR-30A	7000	59°F	228	18.4	288	219	19.0	280	209	19.6	273	200	20.1	265	190	20.6	257
		63°F	239	18.7	300	229	19.3	292	220	19.9	284	210	20.5	276	200	21.0	268
		67°F	256	19.1	318	246	19.8	310	236	20.4	302	225	21.0	293	215	21.6	285
		71°F	268	19.3	331	258	20.1	323	247	20.8	314	236	21.4	305	225	22.0	297
1SRPUR-35A	8000	59°F	261	21.6	331	250	22.3	322	239	22.9	313	228	23.5	304	217	24.1	295
		63°F	273	22.0	344	262	22.7	335	251	23.4	326	239	24.0	317	228	24.6	308
		67°F	292	22.5	365	280	23.3	356	269	24.0	346	257	24.7	337	245	25.3	327
		71°F	306	22.8	380	293	23.6	370	281	24.4	360	269	25.1	350	256	25.8	340
1SRPUR-40A	10000	59°F	314	26.0	399	301	26.9	388	289	27.6	378	276	28.3	367	263	29.0	357
		63°F	329	26.4	415	316	27.3	404	302	28.1	393	289	28.8	382	275	29.5	371
		67°F	352	27.0	440	338	27.9	429	324	28.8	417	310	29.6	406	295	30.3	394
		71°F	368	27.4	457	354	28.3	445	339	29.2	434	324	30.1	422	309	30.9	409
1SRPUR-50A	11000	59°F	357	31.8	460	343	32.6	448	328	33.3	436	313	34.1	424	298	34.8	411
		63°F	374	32.3	479	359	33.2	467	344	34.0	454	329	34.8	441	313	35.5	429
		67°F	401	33.1	508	385	34.1	495	369	35.0	482	353	35.8	469	337	36.6	456
		71°F	419	33.6	528	403	34.6	515	386	35.6	502	370	36.5	488	353	37.4	474
1SRPUR-60A	13000	59°F	419	37.4	540	402	38.4	526	384	39.3	511	367	40.1	497	349	40.9	482
		63°F	439	38.0	562	421	39.1	547	403	40.0	532	385	41.0	517	366	41.8	502
		67°F	470	38.9	596	451	40.1	580	432	41.1	565	413	42.1	549	393	43.1	533
		71°F	491	39.5	619	471	40.7	603	452	41.8	587	432	42.9	571	412	43.9	555

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 22b: Performance Data (Reciprocating Air Cooled Packaged Unit) - R134a

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	120°F			125°F			130°F			135°F			140°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
2SRPUR-10A	3500	59°F	109	9.0	138	104	9.3	134	99	9.6	130	94	9.9	126	90	10.1	122
		63°F	114	9.2	144	109	9.5	140	104	9.8	136	99	10.1	132	94	10.3	128
		67°F	122	9.4	153	117	9.7	149	112	10.1	145	107	10.4	140	102	10.6	136
		71°F	128	9.5	159	123	9.9	155	118	10.2	151	112	10.5	146	107	10.8	142
2SRPUR-15A	4500	59°F	142	11.3	178	135	11.7	173	128	12.0	167	122	12.3	162	115	12.6	156
		63°F	149	11.5	186	142	11.9	180	135	12.2	175	128	12.6	169	121	12.9	163
		67°F	160	11.7	198	152	12.2	192	145	12.6	186	138	12.9	180	131	13.3	174
		71°F	167	11.9	206	160	12.3	200	152	12.8	194	145	13.2	187	137	13.5	181
2SRPUR-20A	6000	59°F	196	15.2	245	186	15.7	237	177	16.1	229	168	16.5	221	159	16.8	213
		63°F	206	15.5	256	196	16.0	248	186	16.4	239	177	16.8	231	167	17.2	223
		67°F	221	15.8	272	211	16.4	264	200	16.9	255	190	17.3	246	180	17.7	238
		71°F	232	16.0	284	221	16.6	275	210	17.1	266	200	17.6	257	189	18.1	248
2SRPUR-30A	7000	59°F	231	18.1	290	220	18.7	281	210	19.2	272	199	19.7	263	189	20.1	254
		63°F	242	18.4	302	231	19.0	293	220	19.5	284	209	20.1	274	198	20.6	265
		67°F	260	18.8	321	248	19.4	311	237	20.1	302	225	20.6	292	214	21.2	282
		71°F	273	19.0	334	260	19.7	324	248	20.4	314	236	21.0	304	224	21.6	294
2SRPUR-40A	10000	59°F	309	24.5	388	296	25.3	379	284	26.1	368	271	26.9	358	258	27.6	348
		63°F	324	24.9	404	310	25.7	394	297	26.6	383	284	27.3	373	271	28.1	362
		67°F	346	25.4	429	333	26.3	418	319	27.2	407	305	28.0	396	291	28.8	384
		71°F	362	25.7	445	348	26.6	434	333	27.6	423	319	28.5	411	305	29.3	400
2SRPUR-50A	11000	59°F	347	28.5	440	332	29.4	427	317	30.2	414	301	31.0	402	286	31.7	388
		63°F	364	29.0	458	348	29.9	445	332	30.8	432	316	31.6	419	300	32.4	405
		67°F	390	29.7	486	373	30.7	473	357	31.6	459	340	32.5	445	323	33.3	431
		71°F	408	30.1	506	391	31.1	492	374	32.1	478	356	33.1	463	339	33.9	449
2SRPUR-60A	14000	59°F	457	36.8	576	438	38.0	561	419	39.2	546	400	40.2	530	381	41.2	514
		63°F	479	37.3	600	459	38.6	584	439	39.8	568	419	41.0	552	400	42.0	536
		67°F	513	38.2	637	492	39.6	620	471	40.9	604	451	42.1	587	430	43.2	570
		71°F	537	38.7	662	515	40.1	645	494	41.5	628	472	42.8	611	451	44.0	593
2SRPUR-70A	16000	59°F	522	43.2	662	500	44.6	644	478	45.9	627	456	47.1	609	434	48.2	591
		63°F	546	43.9	689	524	45.4	671	501	46.7	653	478	48.0	634	456	49.2	615
		67°F	585	45.0	731	561	46.5	712	537	48.0	693	513	49.3	673	489	50.6	653
		71°F	612	45.6	760	587	47.3	740	562	48.8	720	537	50.2	700	512	51.5	679
2SRPUR-80A	20000	59°F	629	52.1	797	603	53.7	777	577	55.2	756	551	56.7	735	525	58.0	713
		63°F	658	52.9	830	631	54.6	808	605	56.2	787	578	57.7	765	551	59.1	742
		67°F	704	54.0	879	676	55.9	857	648	57.6	834	619	59.2	811	591	60.7	788
		71°F	736	54.8	914	707	56.7	891	678	58.5	867	648	60.2	843	619	61.7	819
2SRPUR-100A	22000	59°F	715	63.5	921	685	65.1	897	656	66.7	872	626	68.1	847	597	69.5	822
		63°F	749	64.6	958	718	66.4	933	688	68.0	908	657	69.6	883	627	71.0	857
		67°F	802	66.2	1016	770	68.1	991	738	69.9	964	706	71.6	938	674	73.3	911
		71°F	839	67.2	1057	806	69.2	1030	773	71.1	1003	739	73.0	976	706	74.7	949
2SRPUR-120A	26000	59°F	838	74.8	1081	803	76.7	1052	768	78.5	1023	733	80.3	994	698	81.9	964
		63°F	878	76.0	1124	842	78.1	1095	805	80.1	1065	769	81.9	1035	733	83.6	1004
		67°F	939	77.8	1191	901	80.1	1161	863	82.3	1130	825	84.3	1098	787	86.2	1066
		71°F	982	78.9	1238	943	81.4	1206	903	83.7	1174	864	85.8	1142	825	87.9	1109

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 23: Performance Data (Screw Air Cooled Packaged Unit) - R22

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condensing Temperature											
			115°F			120°F			125°F			130°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
1SRPUS-50A	13000	59°F	429	34.8	536	415	36.7	528	401	38.8	520	387	41.0	513
		63°F	447	35.1	554	432	37.1	546	418	39.2	538	403	41.4	530
		67°F	473	35.4	582	459	37.5	574	444	39.7	566	428	42.0	557
		71°F	492	35.7	601	477	37.8	593	461	40.0	584	446	42.4	576
1SRPUS-60A	17000	59°F	539	43.2	671	521	45.6	661	504	48.2	652	486	50.9	642
		63°F	560	43.5	694	542	46.0	684	524	48.6	674	506	51.4	664
		67°F	594	44.0	729	575	46.6	718	557	49.3	708	538	52.1	698
		71°F	617	44.2	753	598	46.9	742	579	49.7	732	560	52.6	721
1SRPUS-70A	19000	59°F	624	51.8	783	600	54.5	767	575	57.4	751	548	60.4	734
		63°F	649	52.2	810	624	54.9	793	598	57.8	776	571	60.8	758
		67°F	688	52.9	850	662	55.6	833	635	58.5	815	607	61.6	796
		71°F	715	53.3	878	688	56.1	860	661	59.0	842	632	62.1	822
1SRPUS-80A	22000	59°F	722	58.3	901	693	61.2	881	662	64.3	859	630	67.5	837
		63°F	751	58.9	931	720	61.8	910	689	64.8	888	656	68.0	865
		67°F	795	59.7	978	764	62.6	956	731	65.7	933	697	68.9	909
		71°F	826	60.3	1011	794	63.3	988	760	66.3	964	726	69.6	939
1SRPUS-90A	27000	59°F	871	67.0	1076	839	70.5	1055	805	74.2	1033	771	78.1	1010
		63°F	904	67.5	1111	871	71.1	1090	837	74.8	1067	802	78.7	1043
		67°F	956	68.3	1166	922	71.9	1143	887	75.6	1119	850	79.6	1094
		71°F	992	68.9	1203	957	72.4	1180	921	76.2	1155	883	80.2	1129
2SRPUS-100A	27000	59°F	859	69.6	1072	831	73.5	1056	803	77.6	1041	774	82.0	1026
		63°F	893	70.1	1108	865	74.1	1092	836	78.4	1076	806	82.8	1061
		67°F	947	70.9	1164	917	75.0	1148	887	79.4	1131	857	84.0	1115
		71°F	984	71.3	1203	953	75.6	1186	923	80.1	1169	892	84.8	1152
2SRPUS-120A	32000	59°F	1077	86.3	1342	1043	91.2	1323	1007	96.3	1303	972	101.7	1284
		63°F	1121	87.0	1388	1085	92.0	1368	1049	97.2	1348	1012	102.7	1328
		67°F	1188	88.0	1458	1151	93.1	1437	1114	98.5	1416	1076	104.2	1396
		71°F	1234	88.5	1506	1196	93.8	1484	1158	99.4	1463	1119	105.2	1443

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 24: Performance Data (Screw Air Cooled Packaged Unit) - R407C

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	Condensing Temperature											
			115°F			120°F			125°F			130°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
1SRPUS-50A	13000	59°F	425	34.1	533	406	36.0	520	386	38.0	507	366	40.1	493
		63°F	444	34.5	553	424	36.3	540	404	38.3	526	383	40.4	511
		67°F	473	35.0	584	453	36.8	569	432	38.8	555	410	40.9	539
		71°F	493	35.3	605	472	37.2	590	451	39.2	575	428	41.3	559
1SRPUS-60A	17000	59°F	534	42.4	668	510	44.7	652	486	47.2	635	460	49.7	618
		63°F	557	42.8	693	533	45.1	676	508	47.6	659	481	50.1	640
		67°F	593	43.4	731	568	45.7	713	542	48.2	695	515	50.8	676
		71°F	619	43.8	758	593	46.2	739	566	48.6	720	538	51.2	701
1SRPUS-70A	19000	59°F	623	49.0	778	593	51.6	757	562	54.4	735	532	57.3	713
		63°F	651	49.3	807	620	51.9	785	588	54.7	762	556	57.6	739
		67°F	695	49.9	853	662	52.5	829	629	55.2	804	596	58.1	780
		71°F	725	50.3	885	692	52.8	859	658	55.6	834	623	58.4	808
1SRPUS-80A	22000	59°F	707	55.9	884	672	58.5	857	635	61.3	830	599	64.3	803
		63°F	739	56.6	918	702	59.2	890	665	61.9	861	627	64.9	833
		67°F	788	57.7	971	750	60.2	941	710	62.9	910	671	65.8	880
		71°F	823	58.5	1008	783	61.0	976	742	63.7	944	701	66.5	912
1SRPUS-90A	27000	59°F	816	63.6	1018	778	67.0	990	738	70.7	962	698	74.7	935
		63°F	851	64.1	1055	811	67.6	1026	770	71.2	997	729	75.2	967
		67°F	906	65.0	1112	864	68.4	1081	821	72.0	1050	777	75.9	1018
		71°F	944	65.5	1152	901	68.9	1120	856	72.6	1087	811	76.5	1054
2SRPUS-100A	27000	59°F	850	68.3	1067	812	72.0	1041	773	76.0	1014	732	80.2	986
		63°F	887	68.9	1106	849	72.7	1079	808	76.6	1051	766	80.8	1022
		67°F	945	70.0	1167	905	73.7	1139	863	77.6	1109	819	81.8	1079
		71°F	985	70.7	1210	944	74.4	1180	901	78.3	1150	856	82.5	1118
2SRPUS-120A	32000	59°F	1067	84.7	1336	1020	89.4	1304	971	94.3	1270	920	99.5	1235
		63°F	1114	85.5	1385	1066	90.2	1352	1015	95.1	1317	963	100.3	1281
		67°F	1187	86.8	1462	1137	91.4	1427	1084	96.4	1390	1030	101.5	1352
		71°F	1237	87.7	1515	1186	92.3	1479	1132	97.2	1441	1076	102.4	1401

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Performance Data (Cont.)

Table 25: Performance Data (Screw Air Cooled Packaged Unit) - R134a

Models	Nominal Air Flow Rate (CFM)	Entering Air Wet Bulb Temperature	120°F			125°F			130°F			135°F			140°F		
			QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC	QE	WC	QC
			MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH	MBH	kW	MBH
1SRPUS-50A	13000	59°F	407	33.2	515	390	35.1	503	371	37.1	492	353	39.2	480	334	41.5	469
		63°F	427	33.5	536	409	35.4	523	390	37.4	511	370	39.5	499	351	41.8	486
		67°F	458	34.0	568	438	35.8	555	419	37.8	541	398	39.9	528	378	42.2	515
		71°F	479	34.3	590	459	36.1	576	439	38.1	562	418	40.2	548	396	42.5	534
1SRPUS-60A	15000	59°F	480	38.3	604	459	40.5	590	438	42.8	577	416	45.2	563	394	47.9	549
		63°F	503	38.6	629	482	40.8	614	460	43.1	599	437	45.5	585	414	48.2	570
		67°F	540	39.1	666	517	41.3	651	493	43.6	635	470	46.0	619	446	48.7	603
		71°F	565	39.5	693	541	41.6	676	517	43.9	660	493	46.4	643	468	49.0	627
1SRPUS-70A	17000	59°F	552	43.5	693	528	46.0	677	504	48.6	661	479	51.4	645	453	54.4	630
		63°F	578	43.9	721	554	46.3	704	528	49.0	687	503	51.8	670	476	54.7	654
		67°F	620	44.5	764	594	46.9	746	567	49.5	728	540	52.3	710	513	55.3	692
		71°F	649	44.9	794	622	47.3	775	594	49.9	756	566	52.7	737	538	55.7	718
1SRPUS-80A	21000	59°F	675	52.9	847	650	56.0	832	625	59.3	817	599	62.9	803	573	66.9	790
		63°F	706	53.3	879	681	56.4	864	655	59.7	848	628	63.3	833	601	67.2	819
		67°F	755	53.9	930	729	57.0	913	701	60.3	897	674	63.9	881	646	67.8	865
		71°F	789	54.3	966	762	57.4	948	734	60.7	931	705	64.3	914	676	68.2	898
1SRPUS-90A	25000	59°F	778	60.3	973	749	63.8	956	720	67.6	939	690	71.7	923	660	76.2	907
		63°F	814	60.8	1011	784	64.3	993	755	68.1	975	724	72.2	958	693	76.6	941
		67°F	870	61.5	1069	840	64.9	1050	808	68.7	1031	776	72.8	1013	744	77.3	995
		71°F	909	61.9	1110	878	65.4	1090	846	69.2	1070	813	73.3	1051	780	77.7	1032
2SRPUS-100A	26000	59°F	815	66.5	1030	779	70.2	1007	743	74.2	983	705	78.5	960	668	83.1	937
		63°F	854	67.1	1072	817	70.8	1047	779	74.8	1022	741	79.0	997	702	83.6	973
		67°F	916	67.9	1136	877	71.6	1109	837	75.6	1082	797	79.9	1055	755	84.4	1029
		71°F	959	68.6	1181	918	72.3	1153	877	76.2	1124	835	80.5	1096	793	85.0	1068
2SRPUS-120A	30000	59°F	961	76.6	1209	919	80.9	1181	876	85.5	1153	832	90.4	1126	788	95.7	1099
		63°F	1007	77.3	1257	963	81.5	1228	919	86.1	1198	874	91.1	1169	829	96.3	1141
		67°F	1079	78.3	1333	1034	82.6	1301	987	87.1	1269	940	92.1	1238	892	97.3	1207
		71°F	1129	79.0	1386	1082	83.3	1352	1034	87.8	1319	985	92.7	1286	935	98.0	1253

NOTE

- 1MBH = 1000 Btu/hr
- QE = Actual Cooling Capacity
- WC = Compressor Motor Power Input (380V,3ϕ,50HZ)
- QC = Condenser Total Heat Rejection
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Heating Coil Rating (Based on Air Handling Section)

Table 26: Heating Coil Rating (Based on Air Handling Section)

Air Handling Unit Model	Nominal Air Flow Rate (CFM)	EDB (°F)	Hot Water		Steam	
			1ROW	2ROW	1ROW	2ROW
			Total Load (MBH)	Total Load (MBH)	Total Load (MBH)	Total Load (MBH)
1	3500	20	161	268	255	461
		40	136	227	232	418
		60	111	187	206	372
2	5000	20	236	392	341	618
		40	201	334	309	562
		60	165	276	275	500
3	7000	20	339	562	473	859
		40	288	480	429	771
		60	239	399	383	694
4	10000	20	509	842	675	1237
		40	436	722	613	1124
		60	363	603	546	1000
5	13000	20	624	1037	843	1546
		40	535	889	766	1406
		60	446	742	681	1250
6	15000	20	756	1252	1016	1855
		40	648	1075	923	1687
		60	540	897	821	1499
7	17500	20	883	1464	1191	2169
		40	756	1256	1083	1971
		60	648	1051	963	1752
8	20000	20	1027	1701	1367	2482
		40	882	1460	1242	2254
		60	736	1222	1105	2004
9	22000	20	1137	1886	1527	2788
		40	974	1621	1690	2533
		60	814	1358	1502	2252
10	25500	20	1326	2185	1687	3094
		40	1140	1878	1533	2811
		60	953	1575	1363	2499
11	30000	20	1464	2417	2033	3712
		40	1255	2075	1847	3373
		60	1044	1731	1642	2999

NOTE

- 1MBH = 1000 Btu/hr
- EDB = Entering air dry bulb temperature
- Hot water rating data are based on entering / leaving hot water temperature of 180°F / 160°F. For other condition, performance adjustment factors shall be attend in heating coil selection (See Table 6).
- Steam rating data are based on stem pressure of 5 psig. For other condition, performance adjustment factors shall be attend in heating coil selection (See Table 7).
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.

Condensers Performance Data

Table 27a: Condenser Total Heat Rejection (MBH) - R22

Condenser Models	Condensing Range									
	Aluminum Fin					Copper Fin				
	10°F	15°F	20°F	25°F	30°F	10°F	15°F	20°F	25°F	30°F
110	65	100	138	177	219	66	102	141	182	224
150	79	123	169	217	267	81	126	173	222	274
225	134	211	293	379	470	137	216	300	389	482
300	155	240	330	424	523	157	243	335	431	531
375	220	343	474	613	757	223	349	483	624	772
450	238	371	512	660	813	243	379	523	675	833
600	319	497	686	883	1088	324	505	697	898	1107
750	397	622	862	1114	1375	403	633	877	1134	1401
900	518	825	1150	1486	1830	530	845	1179	1525	1879
1150	575	915	1273	1643	2019	588	937	1305	1685	2071
1200	614	967	1338	1720	2109	626	987	1366	1756	2154
1500	661	1039	1433	1838	2249	674	1059	1462	1875	2294

Table 27b: Condenser Total Heat Rejection (MBH) - R407C

Condenser Models	Condensing Range									
	Aluminum Fin					Copper Fin				
	10°F	15°F	20°F	25°F	30°F	10°F	15°F	20°F	25°F	30°F
110	61	96	132	170	211	63	98	135	174	216
150	76	118	162	209	259	77	120	166	214	265
225	128	202	283	368	457	131	207	289	377	469
300	147	229	317	409	506	149	233	322	416	514
375	209	329	457	593	735	212	334	465	604	749
450	227	356	493	639	790	232	363	504	653	809
600	305	477	661	855	1058	309	484	672	869	1076
750	380	599	834	1082	1342	385	608	848	1101	1366
900	501	804	1127	1462	1806	512	823	1155	1501	1854
1150	558	894	1251	1620	1996	570	916	1282	1661	2047
1200	595	944	1313	1694	2083	607	963	1340	1730	2128
1500	643	1017	1410	1814	2225	655	1037	1438	1850	2269

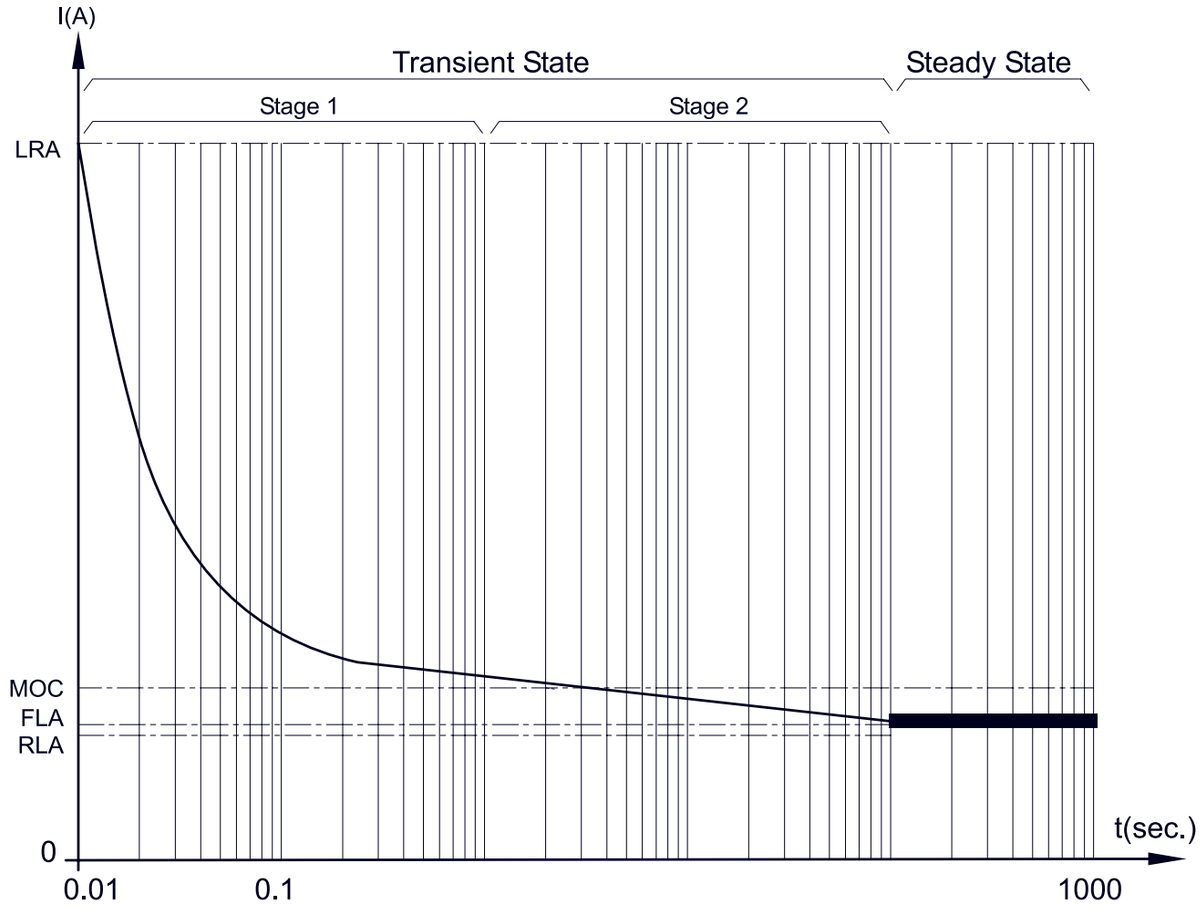
Table 27c: Condenser Total Heat Rejection (MBH) - R134a

Condenser Models	Condensing Range									
	Aluminum Fin					Copper Fin				
	10°F	15°F	20°F	25°F	30°F	10°F	15°F	20°F	25°F	30°F
110	73	111	150	191	232	74	113	154	195	238
150	89	135	183	232	282	90	138	187	237	289
225	148	228	311	396	485	152	233	318	407	497
300	172	262	355	450	548	174	266	361	458	558
375	243	373	507	645	787	247	379	516	657	802
450	263	402	546	694	846	268	411	558	710	865
600	352	538	731	928	1131	358	547	743	944	1151
750	435	668	909	1159	1415	442	679	925	1179	1440
900	548	851	1167	1494	1829	560	871	1197	1532	1876
1150	604	939	1288	1647	2013	618	961	1319	1688	2064
1200	648	998	1362	1735	2114	660	1019	1390	1771	2159
1500	693	1067	1454	1849	2251	706	1088	1482	1885	2295

NOTE

- 1MBH = 1000 Btu/hr
- Condensing Range = Condensing Temperature - Ambient Temperature .
- All above data are based on 12 FPI coil fin spacing and sea level altitude.For other condition, performance adjustment factors shall be attend in condenser selection (See Table 1 and 2).
- Interpolation is allowed but extrapolation outside table boundary is not allowed. Contact Saran MFG group for operating conditions outside table boundary.
- The above data is subject to change without notice.

Electrical Schematic Curve at the Start-Up



NOTE

- The transient stage is drastically reduce in chillers that utilize unloaders or part winding start method so it curve differs from the above.

Locked Rotor Amps (LRA):

Peak of transient electrical current at the instant of compressor motor start-up.(stage1).

Maximum Operating Current (MOC):

Maximum electrical current tolerates by compressor motor. This current exists only when the system has been idle (warm evaporator, condenser & connecting piping) & lasts for a short period until the system reaches the steady state condition.
Other wise the stage 2 of transient state on the graph can be ignored.

Full Load Amps (FLA):

Maximum electrical drawn at the most undesirable system working condition under steady state operation.

Rated Load Amps (RLA):

Nominal electrical current drawn at normal working condition under steady state operation.

Electrical Data (Cont.)

Table 28a: Electrical Data (Air Handling Section)

Model	Motor				System	
	Qty	Rated Speed (R.P.M)	Input Power (kW)	Rated Current (A)	Total Input Power (kW)	Total Current (A)
1	1	1500	3	6.1	3	6.1
2	1	1500	3	6.1	3	6.1
3	1	1500	4	8.1	4	8.1
4	2	1500	3	6.1	6	12.2
5	2	1500	3	6.1	6	12.2
6	2	1500	4	8.1	8	16.2
7	2	1500	4	8.1	8	16.2
8	2	1500	4	8.1	8	16.2
9	2	1500	5.5	10.6	11	21.2
10	2	1500	5.5	10.6	11	21.2
11	2	1500	7.5	14.3	15	28.6

Table 28b: Electrical Data (Air Cooled Condenser Section)

Model	Motor				System	
	Qty	Input Power (kW)	Rated Current (A)	Starting Current (A)	Total Input Power (kW)	Total Current (A)
110	2	0.9	1.9	7.2	1.8	3.8
150	2	0.9	1.9	7.2	1.8	3.8
225	4	0.9	1.9	7.2	3.6	7.6
300	4	0.9	1.9	7.2	3.6	7.6
375	6	0.9	1.9	7.2	5.4	11.4
450	6	0.9	1.9	7.2	5.4	11.4
600	8	0.9	1.9	7.2	7.2	15.2
750	10	0.9	1.9	7.2	9	19
900	12	0.9	1.9	7.2	10.8	22.8
1150	12	0.9	1.9	7.2	10.8	22.8
1200	12	0.9	1.9	7.2	10.8	22.8
1500	12	0.9	1.9	7.2	10.8	22.8

NOTE

- System Power Supply:380~400V/3ϕ/ 50Hz

Water Cooled Packaged Unit Electrical Data

Table 29a: Condensing Section Electrical Data(Scroll Compressor)-R22

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUH-10W	10	D.O.L	12.8	14.55	19.6	118	8.05	12.8	14.55	8.05
1SRPUH-15W	15	D.O.L	20.2	22.45	35	175	12.25	20.2	22.45	12.25
1SRPUH-20W	20	D.O.L	25.75	29.15	50	215	16.7	25.75	29.15	16.7
1SRPUH-25W	25	D.O.L	33	37.2	69	270	21.3	33	37.2	21.3
1SRPUH-30W	30	D.O.L	36.85	42.4	79	300	25.25	36.85	42.4	25.25
2SRPUH-10W	5	D.O.L	7.1	7.95	11	65.5	4.15	14.2	15.9	8.3
2SRPUH-15W	7.5	D.O.L	10	11.5	15.9	95	6.05	20	23	12.1
2SRPUH-20W	10	D.O.L	12.8	14.55	19.6	118	8.05	25.6	29.1	16.1
2SRPUH-30W	15	D.O.L	20.2	22.45	35	175	12.25	40.4	44.9	24.5
2SRPUH-40W	20	D.O.L	25.75	29.15	50	215	16.7	51.5	58.3	33.4
2SRPUH-50W	25	D.O.L	33	37.2	69	270	21.3	66	74.4	42.6
2SRPUH-60W	30	D.O.L	36.85	42.4	79	300	25.25	73.7	84.8	50.5

Table 29b: Condensing Section Electrical Data(Scroll Compressor)-R407C

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUH-10W	10	D.O.L	12.9	14.6	19.6	118	7.9	12.9	14.6	7.9
1SRPUH-15W	15	D.O.L	20.6	22.9	35	175	12.25	20.6	22.9	12.25
1SRPUH-20W	20	D.O.L	25.6	28.7	50	215	16.75	25.3	28.7	16.75
1SRPUH-25W	25	D.O.L	31	35.65	69	270	20.5	31	35.65	20.5
1SRPUH-30W	30	D.O.L	36.3	41.3	79	300	24.95	36.3	41.3	24.95
2SRPUH-10W	5	D.O.L	6.2	6.9	12	59	3.85	12.4	13.8	7.7
2SRPUH-15W	7.5	D.O.L	10.55	11.7	15.9	95	6	21.1	23.4	12
2SRPUH-20W	10	D.O.L	12.9	14.6	19.6	118	7.9	25.8	29.2	15.8
2SRPUH-30W	15	D.O.L	20.6	22.9	35	175	12.25	41.2	45.8	24.5
2SRPUH-40W	20	D.O.L	25.6	28.7	50	215	16.75	51.2	57.4	33.5
2SRPUH-50W	25	D.O.L	31	35.65	69	270	20.5	62	71.3	41
2SRPUH-60W	30	D.O.L	36.3	41.3	79	300	24.95	72.6	82.6	49.9

Table 29c: Condensing Section Electrical Data(Scroll Compressor)-R134a

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUH-10W	10	D.O.L	10.7	11.55	19.6	118	5.35	10.7	11.55	5.35
1SRPUH-15W	15	D.O.L	20	21.15	34	174	8.5	20	21.15	8.5
1SRPUH-20W	20	D.O.L	20.35	22.3	50	215	11.5	20.35	22.3	11.5
1SRPUH-25W	25	D.O.L	25.8	28.3	69	270	14.4	25.8	28.3	14.4
1SRPUH-30W	30	D.O.L	27.7	30.7	79	300	17.2	27.7	30.7	17.2
2SRPUH-10W	5	D.O.L	5.15	5.6	11	65.5	2.7	10.3	11.2	5.4
2SRPUH-15W	7.5	D.O.L	9.1	9.65	15.9	95	4.15	18.2	19.3	8.3
2SRPUH-20W	10	D.O.L	10.7	11.55	19.6	118	5.35	21.4	23.1	10.7
2SRPUH-30W	15	D.O.L	20	21.15	34	174	8.5	40	42.3	17
2SRPUH-40W	20	D.O.L	20.35	22.3	50	215	11.5	40.7	44.6	23
2SRPUH-50W	25	D.O.L	25.8	28.3	69	270	14.4	51.6	56.6	28.8
2SRPUH-60W	30	D.O.L	27.7	30.7	79	300	17.2	55.4	61.4	34.4

System Incoming Cable Size	
System Total Ampere	Cable Size (mm^2)
17 A	4*2.5
25A	4*4
30A	4*6
45 A	4*10
60A	4*16
75A	3*25/16
95 A	3*35/16
115 A	3*50/25
145 A	3*70/35
175 A	3*95/50
200 A	3*120/70
230 A	3*150/70
265 A	3*185/95
310 A	3*240/120
350 A	2*(3*95/50)
405 A	2*(3*120/70)
465 A	2*(3*150/70)
530 A	2*(3*185/95)
620 A	2*(3*240/120)
700A	3*(3*150/70)

NOTE

- System Power Supply:380~400V/3ϕ/ 50Hz
- RLA: Rated Load Ampere
- FLA: Full Load Ampere
- MOC: Maximum Operating Current
- LRA: Lock Rotor Ampere
- MPI: Maximum Power Input (Kw)
- D.O.L: Direct On Line Start Type
- Cable Size Are Based On Copper Conductor At Maximum Ambient Temperature Of 40°C And Maximum Distance Of 70 Meter.
- System Total Power Input = Condensing Section Total Power Input+ Air Handling Section Total Power Input
- System Total Ampere =Condensing Section Total Ampere + Air Handling Section Total Ampere.
- For System Incoming Wire Sizing Add The Condensing Section Total Ampere And Air Handling Section Total Ampere.
- All Above Data Subject To Change Without Notice.

Water Cooled Packaged Unit Electrical Data (Cont.)

Table 30a: Condensing Section Electrical Data(Reciprocating Compressor)-R22

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUR-10W	10	PW	13.8	15.8	19.9	59/99	9	13.8	15.8	9
1SRPUR-15W	15	PW	19.4	22.1	28.2	81/132	12.65	19.4	22.1	12.65
1SRPUR-20W	20	PW	21.9	25.2	33.2	97/158	14.8	21.9	25.2	14.8
1SRPUR-25W	25	PW	29.4	33.9	44	125/211	19.75	29.4	33.9	19.75
1SRPUR-30W	30	PW	34.6	39.8	51.2	141/233	22.7	34.6	39.8	22.7
1SRPUR-35W	35	PW	44.9	52.1	64.4	165/275	30	44.9	52.1	30
1SRPUR-40W	40	PW	53.4	60.5	73.9	219/362	34.1	53.4	60.5	34.1
1SRPUR-50W	50	PW	72.5	79.7	96.2	226/404	41.3	72.5	79.7	41.3
1SRPUR-60W	60	PW	83.4	94.6	113	349/513	50.7	83.4	94.6	50.7
2SRPUR-10W	5	D.O.L	7.5	8.5	10.8	62.2	4.71	15	17	9.42
2SRPUR-15W	7.5	D.O.L	10.8	12.4	16.5	82.4	7.1	21.6	24.8	14.2
2SRPUR-20W	10	PW	13.8	15.8	19.9	59/99	9	27.6	31.6	18
2SRPUR-30W	15	PW	19.4	22.1	28.2	81/132	12.65	38.8	44.2	25.3
2SRPUR-40W	20	PW	21.9	25.2	33.2	97/158	14.8	43.8	50.4	29.6
2SRPUR-50W	25	PW	29.4	33.9	44	125/211	19.75	58.8	67.8	39.5
2SRPUR-60W	30	PW	34.6	39.8	51.2	141/233	22.7	69.2	79.6	45.4
2SRPUR-70W	35	PW	44.9	52.1	64.4	165/275	30	89.8	104.2	60
2SRPUR-80W	40	PW	53.4	60.5	73.9	219/362	34.1	106.8	121	68.2
2SRPUR-100W	50	PW	72.5	79.7	96.2	226/404	41.3	145	159.4	82.6
2SRPUR-120W	60	PW	83.4	94.6	113	349/513	50.7	166.8	189.2	101.4

System Incoming Cable Size	
System Total Ampere	Cable Size (mm^2)
17 A	4*2.5
25A	4*4
30A	4*6
45 A	4*10
60A	4*16
75A	3*25/16
95 A	3*35/16
115 A	3*50/25
145 A	3*70/35
175 A	3*95/50
200 A	3*120/70
230 A	3*150/70
265 A	3*185/95
310 A	3*240/120
350 A	2*(3*95/50)
405 A	2*(3*120/70)
465 A	2*(3*150/70)
530 A	2*(3*185/95)
620 A	2*(3*240/120)
700A	3*(3*150/70)

NOTE

- System Power Supply:380~400V/3ϕ/ 50Hz
- RLA: Rated Load Ampere
- FLA: Full Load Ampere
- MOC: Maximum Operating Current
- LRA: Lock Rotor Ampere
- MPI: Maximum Power Input (Kw)
- D.O.L: Direct Online Start Type
- PW: Part Winding Start Type
- Cable Size Are Based On Copper Conductor At Maximum Ambient Temperature Of 40°C And Maximum Distance Of 70 Meter.
- System Total Power Input = Condensing Section Total Power Input + Air Handling Section Total Power Input.
- System Total Ampere = Condensing Section Total Ampere + Air Handlind Section Total Ampere.
- For System Incoming Wire Sizing Add The Condensing Section Total Ampere And Air Handling Section Total Ampere.
- Starting Type Of Compressors Maybe Change Base On The Unit Operation Condition
- All Above Data Subject To Change Without Notice.

Water Cooled Packaged Unit Electrical Data (Cont.)

Table 30b: Condensing Section Electrical Data(Reciprocating Compressor)-R407C

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUR-10W	10	PW	13.3	15.2	19.9	59/99	8.65	13.3	15.2	8.65
1SRPUR-15W	15	PW	18.7	21.3	28.2	81/132	12.1	18.7	21.3	12.1
1SRPUR-20W	20	PW	21.2	24.3	33.2	97/158	14.15	21.2	24.3	14.15
1SRPUR-25W	25	PW	29	33.6	44	125/211	19.5	29	33.6	19.5
1SRPUR-30W	30	PW	34.5	39.8	51.2	141/233	22.7	34.5	39.8	22.7
1SRPUR-35W	35	PW	43.6	50.9	64.4	165/275	29.2	43.6	50.9	29.2
1SRPUR-40W	40	PW	52.8	60.3	73.9	219/362	34	52.8	60.3	34
1SRPUR-50W	50	PW	71.1	78.6	96.2	226/404	40.3	71.1	78.6	40.3
1SRPUR-60W	60	PW	83	94.7	113	349/513	50.7	83	94.7	50.7
2SRPUR-10W	5	D.O.L	7.7	8.75	10.8	62.2	4.9	15.4	17.5	9.8
2SRPUR-15W	7.5	D.O.L	11	12.7	16.5	82.4	7.35	22	25.4	14.7
2SRPUR-20W	10	PW	13.3	15.2	19.9	59/99	8.65	26.6	30.4	17.3
2SRPUR-30W	15	PW	18.7	21.3	28.2	81/132	12.1	37.4	42.6	24.2
2SRPUR-40W	20	PW	21.2	24.3	33.2	97/158	14.15	42.4	48.6	28.3
2SRPUR-50W	25	PW	29	33.6	44	125/211	19.5	58	67.2	39
2SRPUR-60W	30	PW	34.5	39.8	51.2	141/233	22.7	69	79.6	45.4
2SRPUR-70W	35	PW	43.6	50.9	64.4	165/275	29.2	87.2	101.8	58.4
2SRPUR-80W	40	PW	52.8	60.3	73.9	219/362	34	105.6	120.6	68
2SRPUR-100W	50	PW	71.1	78.6	96.2	226/404	40.3	142.2	157.2	80.6
2SRPUR-120W	60	PW	83	94.7	113	349/513	50.7	166	189.4	101.4

System Incoming Cable Size	
System Total Ampere	Cable Size (mm^2)
17 A	4*2.5
25A	4*4
30A	4*6
45 A	4*10
60A	4*16
75A	3*25/16
95 A	3*35/16
115 A	3*50/25
145 A	3*70/35
175 A	3*95/50
200 A	3*120/70
230 A	3*150/70
265 A	3*185/95
310 A	3*240/120
350 A	2*(3*95/50)
405 A	2*(3*120/70)
465 A	2*(3*150/70)
530 A	2*(3*185/95)
620 A	2*(3*240/120)
700A	3*(3*150/70)

NOTE

- System Power Supply:380~400V/3ϕ/ 50Hz
- RLA: Rated Load Ampere
- FLA: Full Load Ampere
- MOC: Maximum Operating Current
- LRA: Lock Rotor Ampere
- MPI: Maximum Power Input (Kw)
- D.O.L: Direct Online Start Type
- PW: Part Winding Start Type
- Cable Size Are Based On Copper Conductor At Maximum Ambient Temperature Of 40°C And Maximum Distance Of 70 Meter.
- System Total Power Input = Condensing Section Total Power Input + Air Handling Section Total Power Input.
- System Total Ampere = Condensing Section Total Ampere + Air Handlind Section Total Ampere.
- For System Incoming Wire Sizing Add The Condensing Section Total Ampere And Air Handling Section Total Ampere.
- Starting Type Of Compressors Maybe Change Base On The Unit Operation Condition
- All Above Data Subject To Change Without Notice.

Water Cooled Packaged Unit Electrical Data (Cont.)

Table 30c: Condensing Section Electrical Data(Reciprocating Compressor)-R134a

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUR-10W	10	PW	12.8	14.65	22.7	59/99	8.25	12.8	14.65	8.25
1SRPUR-15W	15	PW	14.7	17	26.6	69/113	9.8	14.7	17	9.8
1SRPUR-20W	20	PW	19.95	22.9	36.7	97/158	13.2	19.95	22.9	13.2
1SRPUR-25W	25	PW	22.7	26.5	43.9	97/158	15.6	22.7	26.5	15.6
1SRPUR-30W	30	PW	31	35.8	53.2	141/233	19.95	31	35.8	19.95
1SRPUR-35W	35	PW	35.4	41.3	65.5	141/233	23.6	35.4	41.3	23.6
1SRPUR-40W	40	PW	46.7	52.7	83.2	219/362	28.3	46.7	52.7	28.3
1SRPUR-50W	50	PW	61.3	68.3	92	298/438	34.8	61.3	68.3	34.8
1SRPUR-60W	60	PW	72.5	80.5	113	349/513	40.8	72.5	80.5	40.8
2SRPUR-10W	5	D.O.L	7.7	8.8	14.5	62.2	4.95	15.4	17.6	9.9
2SRPUR-15W	7.5	PW	9.25	10.65	16.6	39/68	6.1	18.5	21.3	12.2
2SRPUR-20W	10	PW	12.8	14.65	22.7	59/99	8.25	25.6	29.3	16.5
2SRPUR-30W	15	PW	14.7	17	26.6	69/113	9.8	29.4	34	19.6
2SRPUR-40W	20	PW	19.95	22.9	36.7	97/158	13.2	39.9	45.8	26.4
2SRPUR-50W	25	PW	22.7	26.5	43.9	97/158	15.6	45.4	53	31.2
2SRPUR-60W	30	PW	31	35.8	53.2	141/233	19.95	62	71.6	39.9
2SRPUR-70W	35	PW	35.4	41.3	65.5	141/233	23.6	70.8	82.6	47.2
2SRPUR-80W	40	PW	46.7	52.7	83.2	219/362	28.3	93.4	105.4	56.6
2SRPUR-100W	50	PW	61.3	68.3	92	298/438	34.8	122.6	136.6	69.6
2SRPUR-120W	60	PW	72.5	80.5	113	349/513	40.8	145	161	81.6

System Incoming Cable Size	
System Total Ampere	Cable Size (mm^2)
17 A	4*2.5
25A	4*4
30A	4*6
45 A	4*10
60A	4*16
75A	3*25/16
95 A	3*35/16
115 A	3*50/25
145 A	3*70/35
175 A	3*95/50
200 A	3*120/70
230 A	3*150/70
265 A	3*185/95
310 A	3*240/120
350 A	2*(3*95/50)
405 A	2*(3*120/70)
465 A	2*(3*150/70)
530 A	2*(3*185/95)
620 A	2*(3*240/120)
700A	3*(3*150/70)

NOTE

- System Power Supply:380~400V/3ϕ/ 50Hz
- RLA: Rated Load Ampere
- FLA: Full Load Ampere
- MOC: Maximum Operating Current
- LRA: Lock Rotor Ampere
- MPI: Maximum Power Input (Kw)
- D.O.L: Direct Online Start Type
- PW: Part Winding Start Type
- Cable Size Are Based On Copper Conductor At Maximum Ambient Temperature Of 40°C And Maximum Distance Of 70 Meter.
- System Total Power Input = Condensing Section Total Power Input + Air Handling Section Total Power Input.
- System Total Ampere = Condensing Section Total Ampere + Air Handlind Section Total Ampere.
- For System Incoming Wire Sizing Add The Condensing Section Total Ampere And Air Handling Section Total Ampere.
- Starting Type Of Compressors Maybe Change Base On The Unit Operation Condition
- All Above Data Subject To Change Without Notice.

Water Cooled Packaged Unit Electrical Data (Cont.)

Table 31a: Condensing Section Electrical Data(Screw Compressor)-R22

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUS-50W	50	PW	54.6	65.8	86	218/411	38.9	54.6	65.8	38.9
1SRPUS-60W	60	PW	67.1	80.6	108	269/508	48.3	67.1	80.6	48.3
1SRPUS-70W	70	PW	80.5	94.9	128	290/485	57.6	80.5	94.9	57.6
1SRPUS-80W	80	PW	91	107.7	144	350/585	65.3	91	107.7	65.3
1SRPUS-90W	90	PW	100.5	119.8	162	423/686	74.3	100.5	119.8	74.3
2SRPUS-100W	50	PW	54.6	65.8	86	218/411	38.9	109.2	131.6	77.8
2SRPUS-120W	60	PW	67.1	80.6	108	269/508	48.3	134.2	161.2	96.6

Table 31b: Condensing Section Electrical Data(Screw Compressor)-R407C

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUS-50W	50	PW	54.7	64.6	86	218/411	38.1	54.7	64.6	38.1
1SRPUS-60W	60	PW	67.2	79.2	108	269/508	47.3	67.2	79.2	47.3
1SRPUS-70W	70	PW	77	89.6	128	290/485	53.9	77	89.6	53.9
1SRPUS-80W	80	PW	89.2	104.8	144	350/585	63.3	89.2	104.8	63.3
1SRPUS-90W	90	PW	96	114.1	162	423/686	70.5	96	114.1	70.5
2SRPUS-100W	50	PW	54.7	64.6	86	218/411	38.1	109.4	129.2	76.2
2SRPUS-120W	60	PW	67.2	79.2	108	269/508	47.3	134.4	158.4	94.6

Table 31c: Condensing Section Electrical Data(Screw Compressor)-R134a

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUS-50W	50	PW	51.4	60.2	79	206/355	35.1	51.4	60.2	35.1
1SRPUS-60W	60	PW	59.8	69.6	98	267/449	40.5	59.8	69.6	40.5
1SRPUS-70W	70	PW	67.1	78.5	124	290/485	46	67.1	78.5	46
1SRPUS-80W	80	PW	74.1	87.6	144	394/606	55.4	74.1	87.6	55.4
1SRPUS-90W	90	PW	86.4	102.7	155	439/675	63.2	86.4	102.7	63.2
2SRPUS-100W	50	PW	51.4	60.2	79	206/355	35.1	102.8	120.4	70.2
2SRPUS-120W	60	PW	59.8	69.6	98	267/449	40.5	119.6	139.2	81

System Incoming Cable Size	
System Total Ampere	Cable Size (mm^2)
17 A	4*2.5
25A	4*4
30A	4*6
45 A	4*10
60A	4*16
75A	3*25/16
95 A	3*35/16
115 A	3*50/25
145 A	3*70/35
175 A	3*95/50
200 A	3*120/70
230 A	3*150/70
265 A	3*185/95
310 A	3*240/120
350 A	2*(3*95/50)
405 A	2*(3*120/70)
465 A	2*(3*150/70)
530 A	2*(3*185/95)
620 A	2*(3*240/120)
700A	3*(3*150/70)

NOTE

- System Power Supply:380~400V/3ϕ/ 50Hz
- RLA: Rated Load Ampere
- FLA: Full Load Ampere
- MOC: Maximum Operating Current
- LRA: Lock Rotor Ampere
- MPI: Maximum Power Input (Kw)
- PW: Part Winding Start Type
- Cable Size Are Based On Copper Conductor At Maximum Ambient Temperature Of 40°C And Maximum Distance Of 70 Meter.
- System Total Power Input = Condensing Section Total Power Input + Air Handling Section Total Power Input.
- System Total Ampere = Condensing Section Total Ampere + Air Handlind Section Total Ampere.
- For System Incoming Wire Sizing Add The Condensing Section Total Ampere And Air Handling Section Total Ampere.
- All Above Data Subject To Change Without Notice.

Air Cooled Packaged Unit Electrical Data

Table 32a: Condensing Section Electrical Data(Scroll Compressor)-R22

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUH-10A	10	D.O.L	14.7	17.1	19.6	118	10	14.7	17.1	10
1SRPUH-15A	15	D.O.L	22.75	25.85	35	175	14.95	22.75	25.85	14.95
1SRPUH-20A	20	D.O.L	29.05	33.55	50	215	20.1	29.05	33.55	20.1
1SRPUH-25A	25	D.O.L	36.95	42.55	69	270	25.4	36.95	42.55	25.4
1SRPUH-30A	30	D.O.L	42.25	49.1	79	300	30.15	42.25	49.1	30.15
2SRPUH-10A	5	D.O.L	7.85	8.95	11	65.5	5	15.7	17.9	10
2SRPUH-15A	7.5	D.O.L	11.6	13.6	15.9	95	7.45	23.2	27.2	14.9
2SRPUH-20A	10	D.O.L	14.7	17.1	19.6	118	10	29.4	34.2	20
2SRPUH-30A	15	D.O.L	22.75	25.85	35	175	14.95	45.5	51.7	29.9
2SRPUH-40A	20	D.O.L	29.05	33.55	50	215	20.1	58.1	67.1	40.2
2SRPUH-50A	25	D.O.L	36.95	42.55	69	270	25.4	73.9	85.1	50.8
2SRPUH-60A	30	D.O.L	42.25	49.1	79	300	30.15	84.5	98.2	60.3

Table 32b: Condensing Section Electrical Data(Scroll Compressor)-R407C

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUH-10A	10	D.O.L	14.85	17.35	19.6	118	9.95	14.85	17.35	9.95
1SRPUH-15A	15	D.O.L	23.25	26.5	35	175	15.2	23.25	26.5	15.2
1SRPUH-20A	20	D.O.L	29	34.05	50	215	20.7	29	34.05	20.7
1SRPUH-25A	25	D.O.L	35.8	41.85	69	270	25.35	35.8	41.85	25.35
1SRPUH-30A	30	D.O.L	41.8	48.95	79	300	30.6	41.8	48.95	30.6
2SRPUH-10A	5	D.O.L	7.1	8.3	12	59	5	14.2	16.6	10
2SRPUH-15A	7.5	D.O.L	11.95	13.7	15.9	95	7.65	23.9	27.4	15.3
2SRPUH-20A	10	D.O.L	14.85	17.35	19.6	118	9.95	29.7	34.7	19.9
2SRPUH-30A	15	D.O.L	23.25	26.5	35	175	15.2	46.5	53	30.4
2SRPUH-40A	20	D.O.L	29	34.05	50	215	20.7	58	68.1	41.4
2SRPUH-50A	25	D.O.L	35.8	41.85	69	270	25.35	71.6	83.7	50.7
2SRPUH-60A	30	D.O.L	41.8	48.95	79	300	30.6	83.6	97.9	61.2

Table 32c: Condensing Section Electrical Data(Scroll Compressor)-R134a

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUH-10A	10	D.O.L	11.65	12.9	19.6	118	6.55	11.65	12.9	6.55
1SRPUH-15A	15	D.O.L	21.4	22.85	34	174	10.35	21.4	22.85	10.35
1SRPUH-20A	20	D.O.L	22.4	25	50	215	13.9	22.4	25	13.9
1SRPUH-25A	25	D.O.L	28.5	32.05	69	270	17.35	28.5	32.05	17.35
1SRPUH-30A	30	D.O.L	31	35.3	79	300	20.7	31	35.3	20.7
2SRPUH-10A	5	D.O.L	5.65	6.35	11	65.5	3.3	11.3	12.7	6.6
2SRPUH-15A	7.5	D.O.L	9.75	10.65	15.9	95	5.1	19.5	21.3	10.2
2SRPUH-20A	10	D.O.L	11.65	12.9	19.6	118	6.55	23.3	25.8	13.1
2SRPUH-30A	15	D.O.L	21.4	22.85	34	174	10.35	42.8	45.7	20.7
2SRPUH-40A	20	D.O.L	22.4	25	50	215	13.9	44.8	50	27.8
2SRPUH-50A	25	D.O.L	28.5	32.05	69	270	17.35	57	64.1	34.7
2SRPUH-60A	30	D.O.L	31	35.3	79	300	20.7	62	70.6	41.4

System Incoming Cable Size	
System Total Ampere	Cable Size (mm^2)
17 A	4*2.5
25A	4*4
30A	4*6
45 A	4*10
60A	4*16
75A	3*25/16
95 A	3*35/16
115 A	3*50/25
145 A	3*70/35
175 A	3*95/50
200 A	3*120/70
230 A	3*150/70
265 A	3*185/95
310 A	3*240/120
350 A	2*(3*95/50)
405 A	2*(3*120/70)
465 A	2*(3*150/70)
530 A	2*(3*185/95)
620 A	2*(3*240/120)
700A	3*(3*150/70)

NOTE

- System Power Supply:380~400V/3ϕ/ 50Hz
- RLA: Rated Load Ampere
- FLA: Full Load Ampere
- MOC: Maximum Operating Current
- LRA: Lock Rotor Ampere
- MPI: Maximum Power Input (Kw)
- D.O.L: Direct On Line Start Type
- Cable Size Are Based On Copper Conductor At Maximum Ambient Temperature Of 40°C And Maximum Distance Of 70 Meter.
- System Total Power Input = Condensing Section Total Power Input + Air Cooled condenser Section Total Power Input + Air Handling Section Total Power Input.
- System Total Ampere = Condensing Section Total Ampere + Air Cooled condenser Section Total Ampere + Air Handling Section Total Ampere.
- For System Incoming Wire Sizing Add The Condensing Section Total Ampere And Air Condenser Section Total Ampere And Air Handling Section Total Ampere.
- All Above Data Subject To Change Without Notice.

Air Cooled Packaged Unit Electrical Data (Cont.)

Table 33a: Condensing Section Electrical Data(Reciprocating Compressor)-R22

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUR-10A	10	PW	15.55	17.85	19.9	59/99	10.4	15.55	17.85	10.4
1SRPUR-15A	15	PW	21.8	25.1	28.2	81/132	14.6	21.8	25.1	14.6
1SRPUR-20A	20	PW	24.9	28.8	33.2	97/158	17.1	24.9	28.8	17.1
1SRPUR-25A	25	PW	33.5	38.9	44	125/211	23	33.5	38.9	23
1SRPUR-30A	30	PW	39.4	45.4	51.2	141/233	26.4	39.4	45.4	26.4
1SRPUR-35A	35	PW	51.4	59.8	64.4	165/275	35.1	51.4	59.8	35.1
1SRPUR-40A	40	PW	59.9	68.3	73.9	219/362	39.6	59.9	68.3	39.6
1SRPUR-50A	50	PW	79.1	87.2	96.2	226/404	48.1	79.1	87.2	48.1
1SRPUR-60A	60	PW	93.5	107.2	113	349/513	59	93.5	107.2	59
2SRPUR-10A	5	D.O.L	8.45	9.6	10.8	62.2	5.5	16.9	19.2	11
2SRPUR-15A	7.5	D.O.L	12.3	14.2	16.5	82.4	8.35	24.6	28.4	16.7
2SRPUR-20A	10	PW	15.55	17.85	19.9	59/99	10.4	31.1	35.7	20.8
2SRPUR-30A	15	PW	21.8	25.1	28.2	81/132	14.6	43.6	50.2	29.2
2SRPUR-40A	20	PW	24.9	28.8	33.2	97/158	17.1	49.8	57.6	34.2
2SRPUR-50A	25	PW	33.5	38.9	44	125/211	23	67	77.8	46
2SRPUR-60A	30	PW	39.4	45.4	51.2	141/233	26.4	78.8	90.8	52.8
2SRPUR-70A	35	PW	51.4	59.8	64.4	165/275	35.1	102.8	119.6	70.2
2SRPUR-80A	40	PW	59.9	68.3	73.9	219/362	39.6	119.8	136.6	79.2
2SRPUR-100A	50	PW	79.1	87.2	96.2	226/404	48.1	158.2	174.4	96.2
2SRPUR-120A	60	PW	93.5	107.2	113	349/513	59	187	214.4	118

System Incoming Cable Size	
System Total Ampere	Cable Size (mm^2)
17 A	4*2.5
25A	4*4
30A	4*6
45 A	4*10
60A	4*16
75A	3*25/16
95 A	3*35/16
115 A	3*50/25
145 A	3*70/35
175 A	3*95/50
200 A	3*120/70
230 A	3*150/70
265 A	3*185/95
310 A	3*240/120
350 A	2*(3*95/50)
405 A	2*(3*120/70)
465 A	2*(3*150/70)
530 A	2*(3*185/95)
620 A	2*(3*240/120)
700A	3*(3*150/70)

NOTE

- System Power Supply:380~400V/3ϕ/ 50Hz
- RLA: Rated Load Ampere
- FLA: Full Load Ampere
- MOC: Maximum Operating Current
- LRA: Lock Rotor Ampere
- MPI: Maximum Power Input (kW)
- D.O.L: Direct Online Start Type
- PW: Part Winding Start Type
- Cable Size Are Based On Copper Conductor At Maximum Ambient Temperature Of 40°C And Maximum Distance Of 70 Meter.
- System Total Power Input = Condensing Section Total Power Input + Air Cooled condenser Section Total Power Input + Air Handling Section Total Power Input
- System Total Ampere = Condensing Section Total Ampere + Air Cooled condenser Section Total Ampere + Air Handling Section Total Ampere.
- For System Incoming Wire Sizing Add The Condensing Section Total Ampere And Air Cooled condenser Section Total Ampere And Air Handling Section Total Ampere.
- Starting Type Of Compressors Maybe Change Base On The Unit Operation Condition
- All Above Data Subject To Change Without Notice.

Air Cooled Packaged Unit Electrical Data (Cont.)

Table 33b: Condensing Section Electrical Data(Reciprocating Compressor)-R407C

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUR-10A	10	PW	14.9	16.85	19.9	59/99	9.75	14.9	16.85	9.75
1SRPUR-15A	15	PW	20.8	23.6	28.2	81/132	13.65	20.8	23.6	13.65
1SRPUR-20A	20	PW	23.8	27.1	33.2	97/158	16	23.8	27.1	16
1SRPUR-25A	25	PW	32.6	37.5	44	125/211	22.1	32.6	37.5	22.1
1SRPUR-30A	30	PW	38.8	44.6	51.2	141/233	25.9	38.8	44.6	25.9
1SRPUR-35A	35	PW	49.5	57.3	64.4	165/275	33.5	49.5	57.3	33.5
1SRPUR-40A	40	PW	59.1	67.4	73.9	219/362	39	59.1	67.4	39
1SRPUR-50A	50	PW	77.3	84.9	96.2	226/404	46	77.3	84.9	46
1SRPUR-60A	60	PW	92.8	106.1	113	349/513	58.3	92.8	106.1	58.3
2SRPUR-10A	5	D.O.L	8.45	9.57	10.8	62.2	5.47	16.9	19.14	10.94
2SRPUR-15A	7.5	D.O.L	12.25	14.05	16.5	82.4	8.27	24.5	28.1	16.54
2SRPUR-20A	10	PW	14.9	16.85	19.9	59/99	9.75	29.8	33.7	19.5
2SRPUR-30A	15	PW	20.8	23.6	28.2	81/132	13.65	41.6	47.2	27.3
2SRPUR-40A	20	PW	23.8	27.1	33.2	97/158	16	47.6	54.2	32
2SRPUR-50A	25	PW	32.6	37.5	44	125/211	22.1	65.2	75	44.2
2SRPUR-60A	30	PW	38.8	44.6	51.2	141/233	25.9	77.6	89.2	51.8
2SRPUR-70A	35	PW	49.5	57.3	64.4	165/275	33.5	99	114.6	67
2SRPUR-80A	40	PW	59.1	67.4	73.9	219/362	39	118.2	134.8	78
2SRPUR-100A	50	PW	77.3	84.9	96.2	226/404	46	154.6	169.8	92
2SRPUR-120A	60	PW	92.8	106.1	113	349/513	58.3	185.6	212.2	116.6

System Incoming Cable Size	
System Total Ampere	Cable Size (mm^2)
17 A	4*2.5
25A	4*4
30A	4*6
45 A	4*10
60A	4*16
75A	3*25/16
95 A	3*35/16
115 A	3*50/25
145 A	3*70/35
175 A	3*95/50
200 A	3*120/70
230 A	3*150/70
265 A	3*185/95
310 A	3*240/120
350 A	2*(3*95/50)
405 A	2*(3*120/70)
465 A	2*(3*150/70)
530 A	2*(3*185/95)
620 A	2*(3*240/120)
700A	3*(3*150/70)

NOTE

- System Power Supply:380~400V/3ϕ/ 50Hz
- RLA: Rated Load Ampere
- FLA: Full Load Ampere
- MOC: Maximum Operating Current
- LRA: Lock Rotor Ampere
- MPI: Maximum Power Input (kW)
- D.O.L: Direct Online Start Type
- PW: Part Winding Start Type
- Cable Size Are Based On Copper Conductor At Maximum Ambient Temperature Of 40°C And Maximum Distance Of 70 Meter.
- System Total Power Input = Condensing Section Total Power Input + Air Cooled condenser Section Total Power Input + Air Handling Section Total Power Input
- System Total Ampere = Condensing Section Total Ampere + Air Cooled condenser Section Total Ampere + Air Handling Section Total Ampere.
- For System Incoming Wire Sizing Add The Condensing Section Total Ampere And Air Cooled condenser Section Total Ampere And Air Handling Section Total Ampere.
- Starting Type Of Compressors Maybe Change Base On The Unit Operation Condition
- All Above Data Subject To Change Without Notice.

Air Cooled Packaged Unit Electrical Data (Cont.)

Table 33c: Condensing Section Electrical Data(Reciprocating Compressor)-R134a

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUR-10A	10	PW	14.15	16.3	22.7	59/99	9.35	14.15	16.3	9.35
1SRPUR-15A	15	PW	16.4	19	26.6	69/113	11.2	16.4	19	11.2
1SRPUR-20A	20	PW	22.2	25.7	36.7	97/158	15.05	22.2	25.7	15.05
1SRPUR-25A	25	PW	25.4	29.5	43.9	97/158	17.55	25.4	29.5	17.55
1SRPUR-30A	30	PW	34.6	39.9	53.2	141/233	22.7	34.6	39.9	22.7
1SRPUR-35A	35	PW	39.6	45.8	65.5	141/233	26.7	39.6	45.8	26.7
1SRPUR-40A	40	PW	51.1	57.5	83.2	219/362	31.9	51.1	57.5	31.9
1SRPUR-50A	50	PW	66.1	74	92	298/438	38.9	66.1	74	38.9
1SRPUR-60A	60	PW	78.1	87.3	113	349/513	45.7	78.1	87.3	45.7
2SRPUR-10A	5	D.O.L	8.5	9.8	14.5	62.2	5.6	17	19.6	11.2
2SRPUR-15A	7.5	PW	10.3	11.9	16.6	39/68	6.95	20.6	23.8	13.9
2SRPUR-20A	10	PW	14.15	16.3	22.7	59/99	9.35	28.3	32.6	18.7
2SRPUR-30A	15	PW	16.4	19	26.6	69/113	11.2	32.8	38	22.4
2SRPUR-40A	20	PW	22.2	25.7	36.7	97/158	15.05	44.4	51.4	30.1
2SRPUR-50A	25	PW	25.4	29.5	43.9	97/158	17.55	50.8	59	35.1
2SRPUR-60A	30	PW	34.6	39.9	53.2	141/233	22.7	69.2	79.8	45.4
2SRPUR-70A	35	PW	39.6	45.8	65.5	141/233	26.7	79.2	91.6	53.4
2SRPUR-80A	40	PW	51.1	57.5	83.2	219/362	31.9	102.2	115	63.8
2SRPUR-100A	50	PW	66.1	74	92	298/438	38.9	132.2	148	77.8
2SRPUR-120A	60	PW	78.1	87.3	113	349/513	45.7	156.2	174.6	91.4

System Incoming Cable Size	
System Total Ampere	Cable Size (mm^2)
17 A	4*2.5
25A	4*4
30A	4*6
45 A	4*10
60A	4*16
75A	3*25/16
95 A	3*35/16
115 A	3*50/25
145 A	3*70/35
175 A	3*95/50
200 A	3*120/70
230 A	3*150/70
265 A	3*185/95
310 A	3*240/120
350 A	2*(3*95/50)
405 A	2*(3*120/70)
465 A	2*(3*150/70)
530 A	2*(3*185/95)
620 A	2*(3*240/120)
700A	3*(3*150/70)

NOTE

- System Power Supply:380~400V/3ϕ/ 50Hz
- RLA: Rated Load Ampere
- FLA: Full Load Ampere
- MOC: Maximum Operating Current
- LRA: Lock Rotor Ampere
- MPI: Maximum Power Input (kW)
- D.O.L: Direct Online Start Type
- PW: Part Winding Start Type
- Cable Size Are Based On Copper Conductor At Maximum Ambient Temperature Of 40°C And Maximum Distance Of 70 Meter.
- System Total Power Input = Condensing Section Total Power Input + Air Cooled condenser Section Total Power Input + Air Handling Section Total Power Input
- System Total Ampere = Condensing Section Total Ampere + Air Cooled condenser Section Total Ampere + Air Handling Section Total Ampere.
- For System Incoming Wire Sizing Add The Condensing Section Total Ampere And Air Cooled condenser Section Total Ampere And Air Handling Section Total Ampere.
- Starting Type Of Compressors Maybe Change Base On The Unit Operation Condition
- All Above Data Subject To Change Without Notice.

Air Cooled Packaged Unit Electrical Data (Cont.)

Table 34a: Condensing Section Electrical Data(Screw Compressor)-R22

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUS-50A	50	PW	64.8	77.8	86	218/411	47	64.8	77.8	47
1SRPUS-60A	60	PW	79.4	95.7	108	269/508	58.3	79.4	95.7	58.3
1SRPUS-70A	70	PW	93.2	110.5	128	290/485	68.2	93.2	110.5	68.2
1SRPUS-80A	80	PW	104.9	124	144	350/585	76.3	104.9	124	76.3
1SRPUS-90A	90	PW	117.7	140.8	162	423/686	88.1	117.7	140.8	88.1
2SRPUS-100A	50	PW	64.8	77.8	86	218/411	47	129.6	155.6	94
2SRPUS-120A	60	PW	79.4	95.7	108	269/508	58.3	158.8	191.4	116.6

Table 34b: Condensing Section Electrical Data(Screw Compressor)-R407C

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUS-50A	50	PW	63.5	75.9	86	218/411	45.7	63.5	75.9	45.7
1SRPUS-60A	60	PW	77.8	93.3	108	269/508	56.8	77.8	93.3	56.8
1SRPUS-70A	70	PW	88.7	104.5	128	290/485	64.2	88.7	104.5	64.2
1SRPUS-80A	80	PW	101.2	119.4	144	350/585	73.3	101.2	119.4	73.3
1SRPUS-90A	90	PW	112.4	135.4	162	423/686	84.5	112.4	135.4	84.5
2SRPUS-100A	50	PW	63.5	75.9	86	218/411	45.7	127	151.8	91.4
2SRPUS-120A	60	PW	77.8	93.3	108	269/508	56.8	155.6	186.6	113.6

Table 34c: Condensing Section Electrical Data(Screw Compressor)-R134a

Model	Per Compressor							Total		
	HP	Starting Type	RLA	FLA	MOC	LRA	MPI	RLA	FLA	MPI
1SRPUS-50A	50	PW	59.3	70.9	79	206/355	42.4	59.3	70.9	42.4
1SRPUS-60A	60	PW	68.5	81.4	98	267/449	48.9	68.5	81.4	48.9
1SRPUS-70A	70	PW	77.3	91.9	124	290/485	55.5	77.3	91.9	55.5
1SRPUS-80A	80	PW	86.8	105.2	144	394/606	67.6	86.8	105.2	67.6
1SRPUS-90A	90	PW	101.6	123.7	155	439/675	77	101.6	123.7	77
2SRPUS-100A	50	PW	59.3	70.9	79	206/355	42.4	118.6	141.8	84.8
2SRPUS-120A	60	PW	68.5	81.4	98	267/449	48.9	137	162.8	97.8

System Incoming Cable Size	
System Total Ampere	Cable Size (mm^2)
17 A	4*2.5
25A	4*4
30A	4*6
45 A	4*10
60A	4*16
75A	3*25/16
95 A	3*35/16
115 A	3*50/25
145 A	3*70/35
175 A	3*95/50
200 A	3*120/70
230 A	3*150/70
265 A	3*185/95
310 A	3*240/120
350 A	2*(3*95/50)
405 A	2*(3*120/70)
465 A	2*(3*150/70)
530 A	2*(3*185/95)
620 A	2*(3*240/120)
700A	3*(3*150/70)

NOTE

- System Power Supply:380~400V/3ϕ/ 50Hz
- RLA: Rated Load Ampere
- FLA: Full Load Ampere
- MOC: Maximum Operating Current
- LRA: Lock Rotor Ampere
- MPI: Maximum Power Input (Kw)
- PW: Part Winding Start Type
- Cable Size Are Based On Copper Conductor At Maximum Ambient Temperature Of 40°C And Maximum Distance Of 70 Meter.
- System Total Power Input = Condensing Section Total Power Input + Air Cooled condenser Section Total Power Input + Air Handling Section Total Power Input.
- System Total Ampere = Condensing Section Total Ampere + Air Cooled condenser Section Total Ampere + Air Handling Section Total Ampere.
- For System Incoming Wire Sizing Add The Condensing Section Total Ampere And Air Cooled condenser Section Total Ampere And Air Handling Section Total Ampere.
- All Above Data Subject To Change Without Notice.

Technical and Physical Data

Remote Air Cooled and Water Cooled Packaged Unit

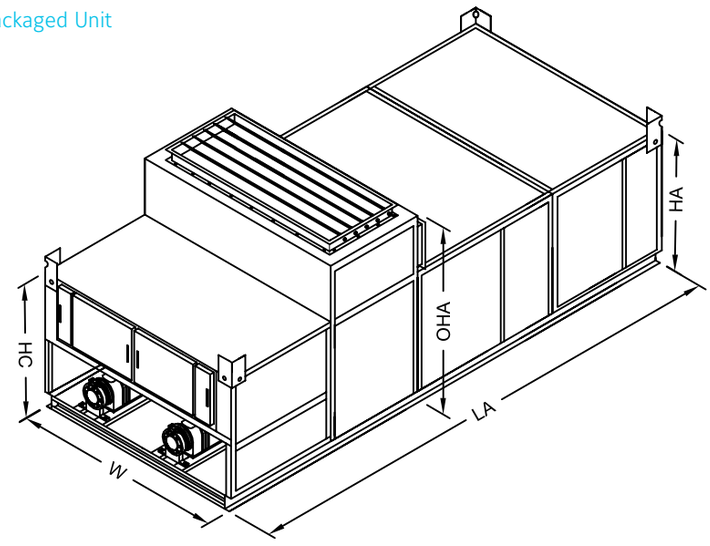


Table 35: Technical and Physical Data (Based on Air Handling Section of Packaged Unit)

Models	Air Flow (CFM)		Fan Qty	Max. Coil Face Area (Sq.ft)	Dimensions (cm)				
	Min	Max			LA1	LA2	W	HA	OHA
1	3000	4000	1	9.1	315	403	150	136	170
2	4000	6000	1	16.1	327	415	200	136	170
3	6000	8000	1	21	352	440	200	165	205
4	8000	12000	2	25.4	357	445	230	175	215
5	12000	14000	2	28.2	384	472	230	192	-
6	14000	16000	2	33.9	394	482	230	217	-
7	16000	19000	2	38.2	412	500	270	202	-
8	19000	21000	2	41.7	437	525	270	222	-
9	21000	23000	2	45.1	462	550	270	237	-
10	23000	28000	2	53.1	489	577	300	254	-
11	28000	32000	2	62	612	700	300	254	-

NOTE

- LA1: Length of the remote air cooled (water cooled) packaged unit without special filter
- LA2: Length of the remote air cooled (water cooled) packaged unit with special filter
- The height of the dampers and the condenser fans are not considered in height of air handling and condenser sections, respectively.
- All above data subject to change without prior notice.

Technical and Physical Data (Cont.)

Unitary Air Cooled Packaged Unit

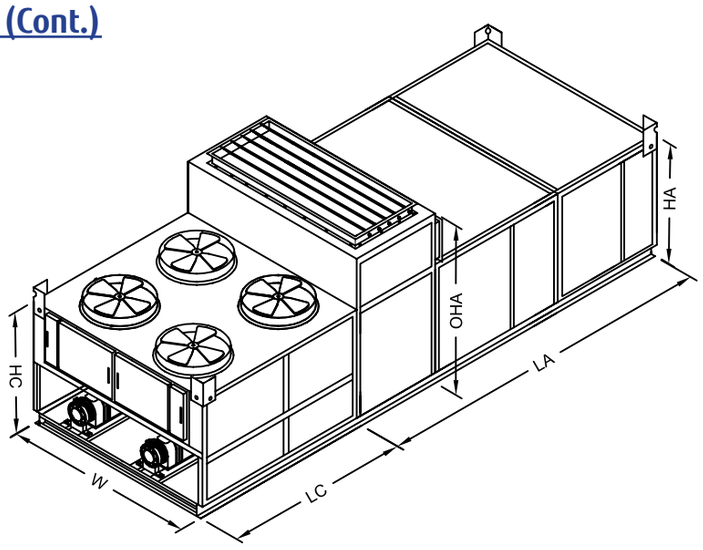


Table 36a: Technical and Physical Data (Air Handling Section of Unitary Air Cooled Packaged Unit)

Models	Air Flow (CFM)		Fan Qty	Max. Coil Face Area (Sq.ft)	Dimensions (cm)				
	Min	Max			LA1	LA2	W	HA	OHA
1	3000	4000	1	9.1	225	313	150	136	170
2	4000	6000	1	16.1	237	325	200	136	170
3	6000	8000	1	21	262	350	200	165	205
4	8000	12000	2	25.4	267	355	230	175	215
5	12000	14000	2	28.2	294	382	230	192	242
6	14000	16000	2	33.9	304	392	230	217	267
7	16000	19000	2	38.2	312	400	270	202	262
8	19000	21000	2	41.7	337	425	270	222	282
9	21000	23000	2	45.1	362	450	270	237	297
10	23000	28000	2	53.1	389	477	300	254	314
11	28000	32000	2	62	512	600	300	254	314

Table 36b: Technical and Physical Data (Condenser Section of Unitary Air Cooled Packaged Unit)

Models	Propeller Fan Data						Coil Data		Dimensions (cm)		
	Qty	Dia.	RPM	Power (kW)	Current (Amp.)	Air Flow (CFM)	Rows	Coil Face Area (Sq.ft)	LC	W	HC
110	2	710	900	0.9	1.9	13000	3	19.2	200	150	150
150	2	710	900	0.9	1.9	15000	3	24.5	200	150	155
225	4	710	900	0.9	1.9	26000	3	38.4	200	200	170
300	4	710	900	0.9	1.9	28800	3	47.6	255	200	165
375	6	710	900	0.9	1.9	42000	3	64.6	310	230	205
450	6	710	900	0.9	1.9	43500	3	73.2	310	230	205
600	8	710	900	0.9	1.9	57600	3	99.0	390	230	202
750	10	710	900	0.9	1.9	72000	3	118.8	390	270	202
900	12	710	900	0.9	1.9	86400	3	144.7	445	270	224
1150	12	710	900	0.9	1.9	92500	3	162.8	445	300	224
1200	12	710	900	0.9	1.9	84000	4	144.7	445	270	224
1500	12	710	900	0.9	1.9	86400	4	162.8	445	300	224

NOTE

- LA1: Length of the air handling section without special filter
- LA2: Length of the air handling section with special filter
- The height of the dampers and the condenser fans are not considered in height of air handling and condenser sections, respectively.
- Selection of air handling and condenser sections shall be done in such away that the width of both sections is equal. In the other cases, please contact Saran MFG.
- All above data subject to change without prior notice.

Installation

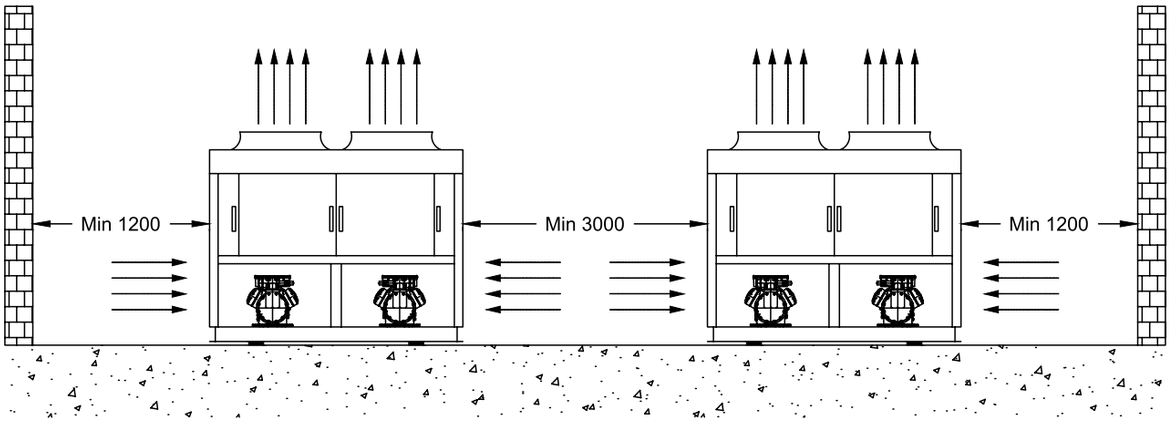
Following points should be considered for installation location of unitary air cooled packaged unit:

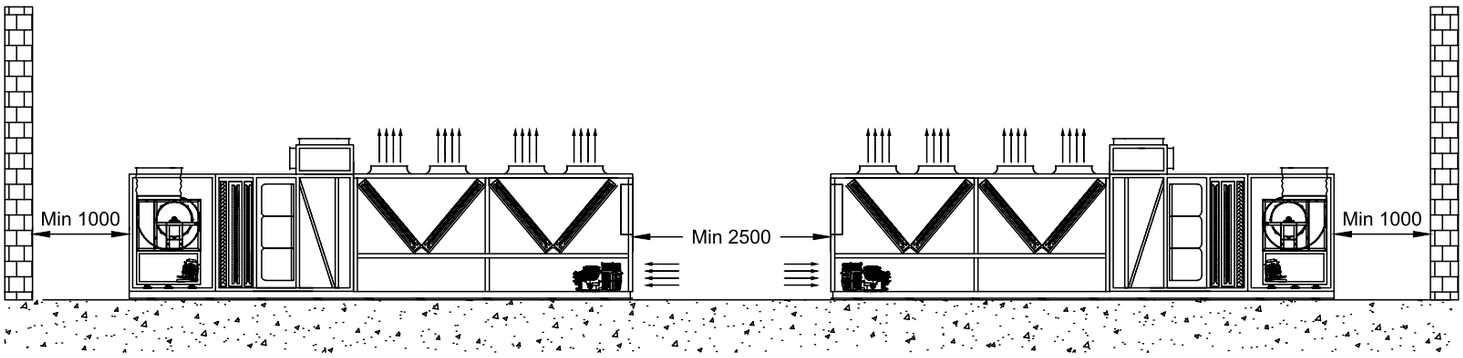
1- Do not install the unit in air shaft, courtyard, or other places which is limited for the unit or it will maximize the vibration and noise because of the echo and resonance of the wall or other obstacles.

2- Space for access to front and sides of the equipment must be provided to accommodate such maintenance and service and to permit unobstructed flow of air to and from the unit.

3- Install the unitary air cooled packaged unit in a way such that hot air distributed by the unit cannot be drawn in again (as in the case of short circuit of hot discharge air).

4- The unit should be have at least 1200 to 1500 millimeter distance from any wall or other obstacles base on following schematics:

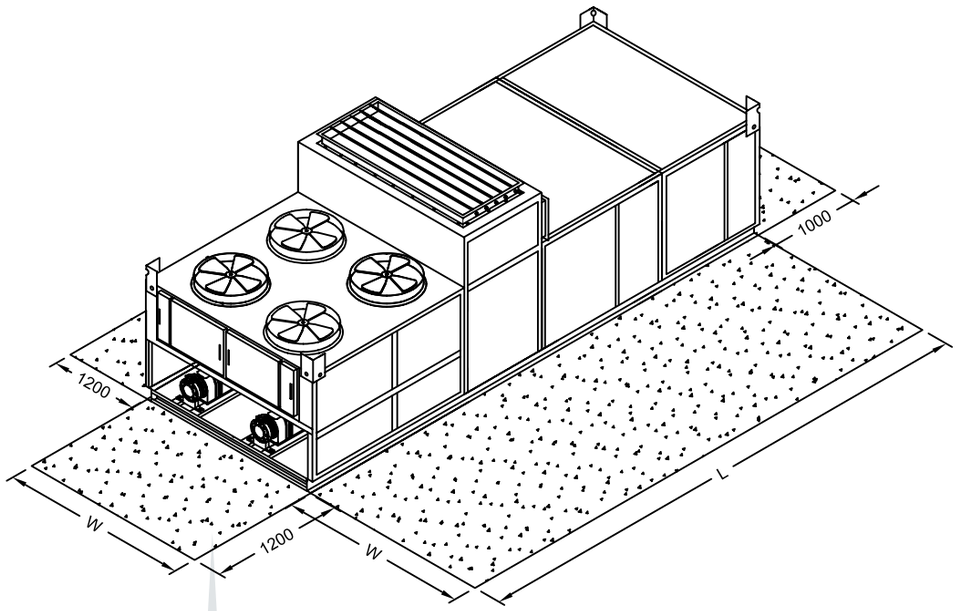




5- Ensure that there is no obstruction of airflow into or out of the unit. Remove obstacles that block air intake or discharge.

6- The location of the unitary air cooled packaged unit must be well ventilated, so the unit can draw in and distribute plenty of air thus lowering the condensing temperature.

7- Set apart some service space. Space ranges are recommended in following schematics:

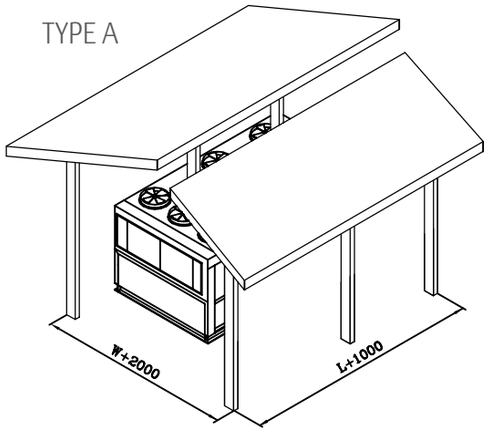


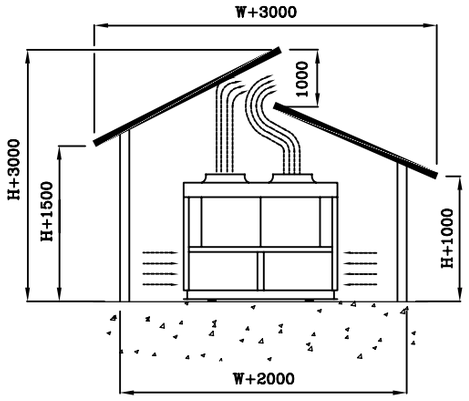
NOTE

- L = Packaged unit length
- W = Packaged unit width
- All dimensions are in mm.

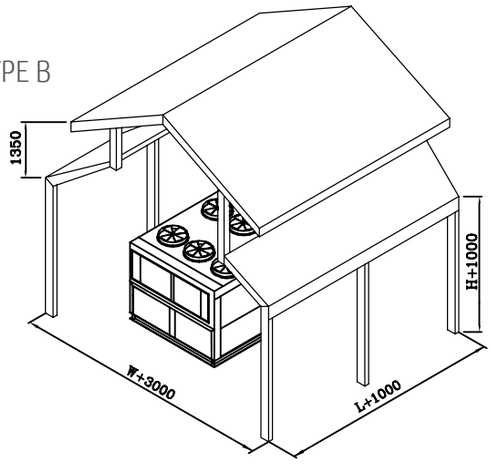
8- If the unitary air cooled packaged unit is installed in a high temperature environment, it is recommended to cover the unit with a shelter base on following schematic:

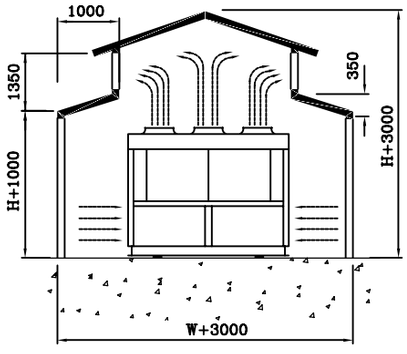
TYPE A





TYPE B





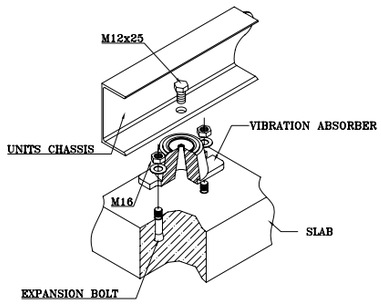
Bearing Platform:

1- The unit should be installed on concrete or steel structure bearing platform that is firm and the surface of the baring platform should be smooth and flat. The intensity of the platform should hold the whole unit, if the intensity is not strong enough, it is easy to cause vibration and noise.

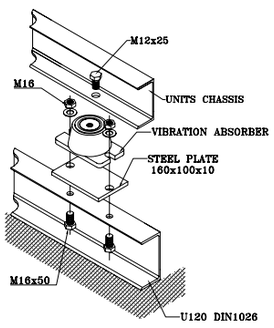
2- The surface of the concrete base platform normally has been plastered as horizontal ornament with waterproof treatment. the surrounding of it should have drainage sink placed, and the slope angle should be no less than 0.5% and the slope should lead to drainage outlet.

3- In order to maintain quiet operation and prevent the vibration and noise transmission from interfering the under floors, the absorber should be laid between the unit base and base platform. Please maintain horizontal when install the unit and mount anti vibration pad when it is necessary.

4) In order to keep connection pipe from being twisted to crack by earthquake, typhoon, or by long time running caused movement. The fixation method should be taken into consideration, refers to following examples for platform installation and fixation:



ARMOURED CEMENT FOUNDATION

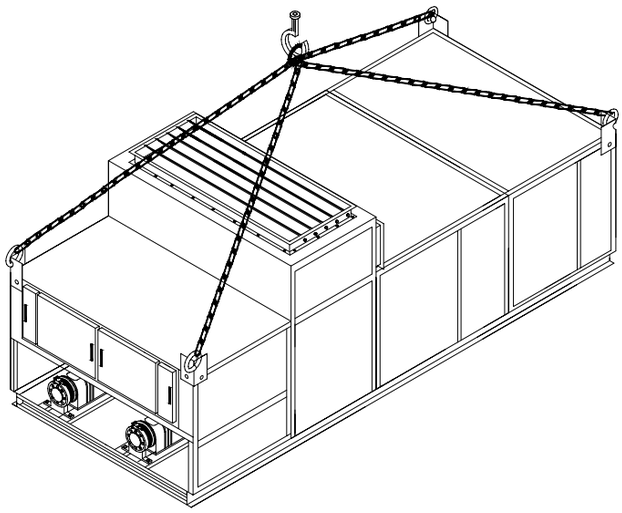


STEEL FRAME FOUNDATION

Hanging and Transporting of the Unit

1- Each unit has been carefully tested and inspected at the factory where every precaution was taken to ensure that it reaches its destination in prefect condition. It is very important that the installers, movers, and riggers use the same care in handling the unit. Chains, cables, or other moving equipment should be placed to avoid damage to any part of the unit. For proper method of rigging consult the label on the unit.

2- To prevent any damage to the unit, at least 45 degree angle between the unit and the hosting chain and the unit should be maintained.



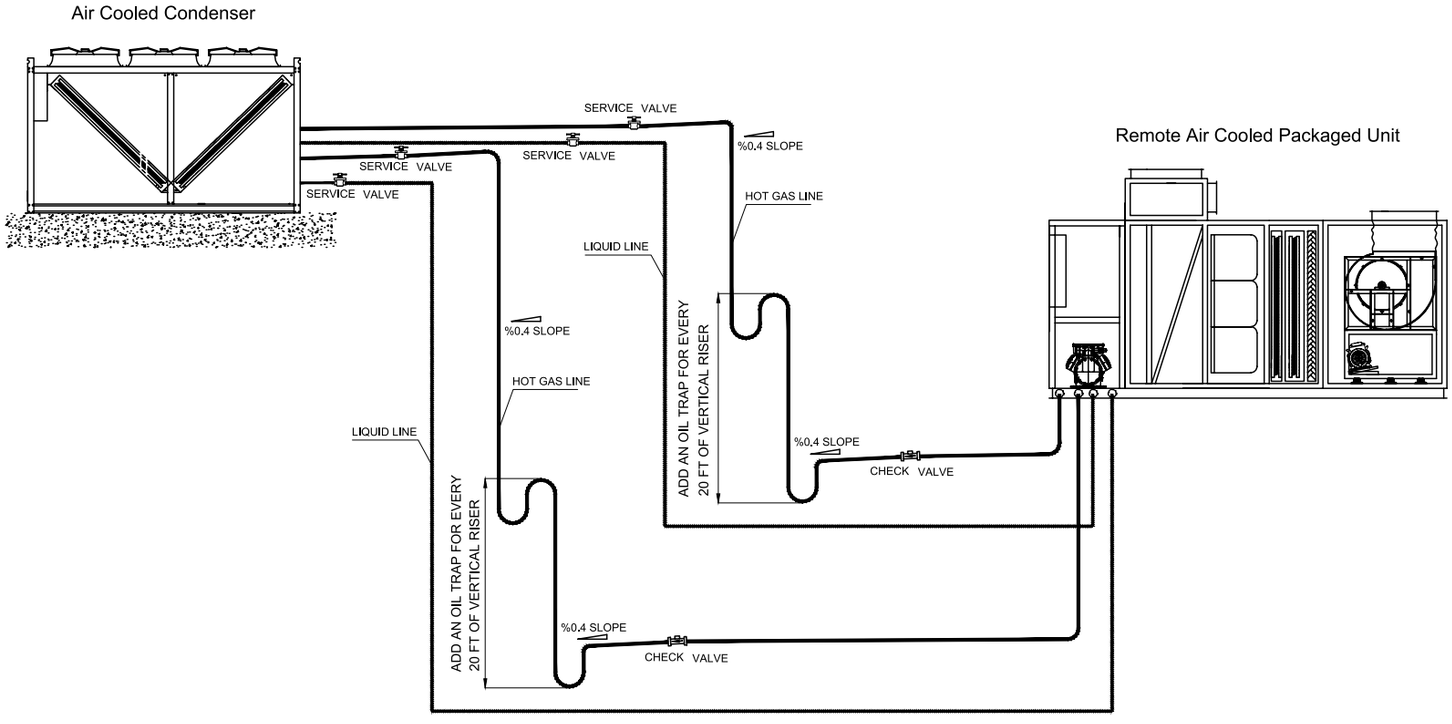
Recommended Piping Diagram

Following points should be considered for refrigerant piping between remote type air-cooled packaged unit and air-cooled condenser:

1- All horizontal piping segments should be sloped 1/8 inch per feet (10.4 mm/m) in the direction of refrigerant flow.

2- Whenever a condenser is located above the compressor, an inverted trap or check valve should be installed at the condenser inlet to prevent liquid refrigerant from flowing backwards into the compressor during off cycles In addition, Intermediate trap should be installed every 20 feet of riser in discharge line.

3- For proper oil return back to compressor, install air-cooled condenser a minimum of 3 feet above the compressor.



Enthalpy Based on Altitude

Table 37: Enthalpy / Altitude

Air Wet Bulb Temperature (°F)	Attitude (Ft)					
	0	1000	2000	3000	4000	5000
	Enthalpy (BTU/Lb)					
35	13.0	13.2	13.3	13.5	13.7	13.9
36	13.4	13.5	13.8	14.0	14.2	14.5
37	13.9	14.0	14.3	14.4	14.7	14.8
38	14.2	14.5	14.7	15.0	15.1	15.3
39	14.8	15.0	15.2	15.4	15.6	15.9
40	15.2	15.4	15.7	15.9	16.2	16.4
41	15.7	15.9	16.1	16.4	16.6	16.8
42	16.2	16.4	16.6	16.9	17.2	17.4
43	16.6	16.9	17.1	17.4	17.6	18.0
44	17.2	17.4	17.6	17.9	18.2	18.5
45	17.7	17.9	18.2	18.4	18.7	19.0
46	18.2	18.4	18.7	19.0	19.3	19.6
47	18.7	18.9	19.3	19.5	19.8	20.2
48	19.2	19.5	19.8	20.0	20.4	20.8
49	19.7	20.0	20.4	20.6	21.0	21.3
50	20.3	20.6	20.9	21.2	21.6	22.3
51	20.9	21.2	21.5	21.8	22.2	22.6
52	21.4	21.7	22.1	22.5	22.8	23.2
53	22.0	22.4	22.7	23.1	23.5	24.0
54	22.6	23.0	23.4	23.8	24.1	24.6
55	23.2	23.6	24.0	24.4	24.8	25.3
56	23.8	24.2	24.6	25.0	25.5	25.9
57	24.4	24.8	25.3	25.8	26.2	26.7
58	25.2	25.5	25.9	26.4	26.9	27.4
59	25.8	26.2	26.7	27.2	27.6	28.2
60	26.5	26.9	27.4	27.8	28.4	28.9
61	27.2	27.6	28.1	28.6	29.2	29.7
62	27.9	28.3	28.9	29.4	29.9	30.5
63	28.5	29.0	29.6	30.2	30.7	31.4
64	29.3	29.8	30.3	31.0	31.6	32.2
65	30.1	30.6	31.2	31.7	32.3	33.0
66	30.8	31.4	32.0	32.6	33.3	33.9
67	31.6	32.2	32.8	33.5	34.1	34.8
68	32.4	33.0	33.7	34.3	35.0	35.8
69	33.2	33.9	34.5	35.3	35.9	36.7
70	34.0	34.7	35.4	36.1	36.9	37.6
71	34.9	35.6	36.3	37.0	37.9	38.6
72	35.8	36.5	37.3	38.0	38.8	39.7
73	36.7	37.5	38.2	39.0	39.9	40.7
74	37.6	38.4	39.2	40.0	40.9	41.8
75	38.6	39.4	40.2	41.0	42.0	42.9
76	39.6	40.3	41.2	42.1	43.0	44.0
77	40.6	41.4	42.3	43.2	42.2	45.2
78	41.5	42.5	43.4	44.3	45.3	46.4
79	42.6	43.5	44.5	45.5	46.5	47.5
80	43.7	44.6	45.6	46.6	47.6	48.8
81	44.8	45.8	46.7	47.8	48.8	50.0
82	45.9	46.9	48.0	49.0	50.3	51.4
83	47.0	48.1	49.2	50.3	51.5	52.8
84	48.2	49.3	50.4	51.6	52.9	54.2
85	49.4	50.3	51.7	53.0	54.2	55.6