



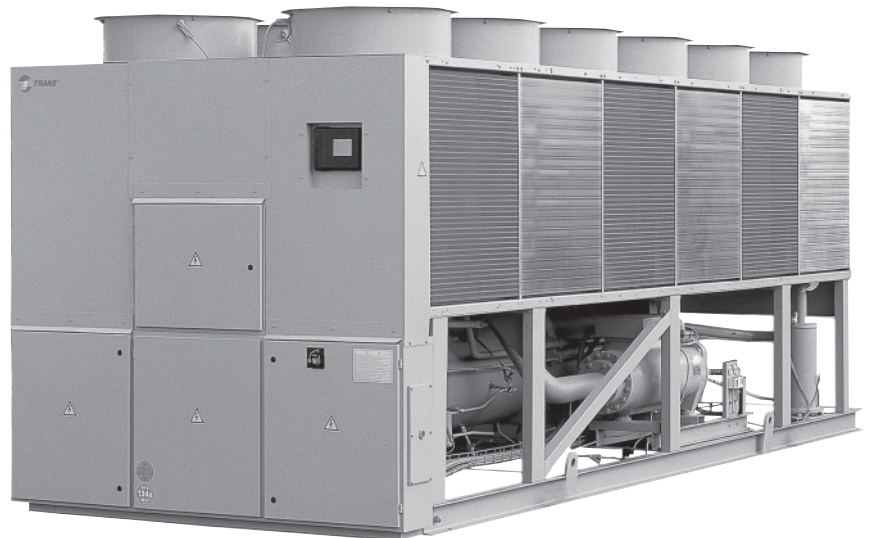
**TRANE®**

*Cooling and Heating  
Systems and Services*

# Installation Operation Maintenance

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## Series R™ Air-Cooled Helical-Rotary Liquid Chiller



**Model RTAC 120-400 (50 Hz)  
400-1500 kW**

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**RLC-SVX02G-E4**



# General Data

## SI Units

**Table G-7 - General Data RTAC 230-400 Standard**

Size		230	240	250	275	300	350	375	400
Cooling capacity (5) (6)	kW	769.7	857.9	850.9	947.2	1077.3	1191.6	1322.4	1451.4
Power input (7)	kW	263	293.6	293.4	330.5	370.2	418.9	458.8	498.4
Energy Efficiency Ratio (5) (6) (as Eurovent)	kW/kW	2.93	2.92	2.9	2.87	2.91	2.85	2.88	2.91
ESEER (as Eurovent)	kW/kW	3.94	4.17	3.82	3.86	3.94	4.10	4.14	4.18
IPLV (According to ARI conditions 44°F leaving water temperature, 95°F entering air temperature)	kW/kW	4.31	4.35	4.05	4.05	3.97	4.47	4.50	4.54
<b>Compressor</b>									
Quantity		3	3	3	3	3	4	4	4
Nominal Size (1)	tons	60-60/100	70-70/100	70-70/100	85-85/100	100-100/100	85-85/85-85	100-100/85-85	100-100/100-100
<b>Evaporator</b>									
Evaporator Model		EH270	EH270	EH250	EH270	EH301	EH340	EH370	EH401
Water Storage	l	223	223	198	223	239	264	280	294
Minimum Flow	l/s	20	20	17	20	22	22	24	26
Maximum Flow	l/s	71	71	60	71	77	80	87	92
Number of water passes		2	2	2	2	2	2	2	2
<b>Condenser</b>									
Quantity of Coils		2/2	2/2	4/4	4/4	4/4	4/4	4/4	4/4
Coil Length	mm	6401/6401	6401/6401	3962/2743	4572/2743	5486/2743	4572/4572	5486/4572	5486/5486
Coil Height	mm	1067	1067	1067	1067	1067	1067	1067	1067
Fin series	fins/ft	192	180	192	192	192	192	192	192
Number of Rows		3	4	3	3	3	3	3	3
<b>Condenser Fans</b>									
Quantity (1)		7/7	7/7	8/6	10/6	12/6	10/10	12/10	12/12
Diameter	mm	762	762	762	762	762	762	762	762
Total Air Flow	m <sup>3</sup> /s	60.09	58.27	61.21	68.7	77.29	85.88	94.47	103.06
Nominal RPM		915	915	915	915	915	915	915	915
Tip Speed	m/s	36.48	36.48	36.48	36.48	36.48	36.48	36.48	36.49
Motor kW	kW	1.57	1.57	1.57	1.57	1.57	1.57	1.57	1.57
<b>Minimum Starting/Operating Ambient (2)</b>									
Standard Unit	°C	0	0	0	0	0	0	0	0
Low-Ambient Unit	°C	-18	-18	-18	-18	-18	-18	-18	-18
<b>General Unit</b>									
Refrigerant		HFC 134a	HFC 134a	HFC 134a	HFC 134a	HFC 134a	HFC 134a	HFC 134a	HFC 134a
Number of Independent Refrigerant Circuits		2	2	2	2	2	2	2	2
% Minimum Load (3)		13	13	13	13	13	10	10	10
Operating Weight (4)	kg	8040	8040	7892	8664	9375	10684	11330	11929
Shipping Weight (4)	kg	7660	7660	7694	8441	9136	10420	11050	11635

**Notes:**

1. Data containing information on two circuits shown as follows: ckt1/ckt2
2. Minimum start-up/operation ambient based on a 2.22 m/s (5mph) wind across the condenser.
3. Percent minimum load is for total machine at 10°C (50°F) ambient and 7°C (44°F) leaving chilled water temperature, not each individual circuit.
4. With aluminium fins.
5. At Eurovent conditions, 7°C leaving water temperature and 35°C entering condenser air temperature.
6. Ratings based on sea level altitude and evaporator fouling factor of 0.017615 m<sup>2</sup>K/kW
7. Unit kW input, including fans