

# ECOCHILLERS

## CHILLERS FOR PROCESSING WATER

### CH...

Capacities from 16 to 82 kW



CH. A. 312

- Chillers suitable for processing water systems. These machines are connected in closed circuit to the central units of powerful systems requesting water cooling procedures.
- They are supplied with a high pressure pump for water circulation and a gas by-pass device allowing the units to constantly produce chilled water at a steady temperature
- The following versions are available:
- CH...A1 or 2 circuits with remote condenser
- CH...Wwatercooled version with 1 or 2 circuits
- CH...KR407C ecological gas charge
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#### The machines provided with

- two compressors are especially designed to operate with a 100% fallback system: a main operating line and a stand-by line, by means of an automatic switching device, enabled in case of failure; in addition a timelag device guarantees an automatic switch for a regular use of both circuits. When necessary, the 2 circuits are allowed to run simultaneously. Two independent governing systems and two pumps guarantee the fallback system to operate in the two-circuit units.
- Housing  
Made of steel structurals and panels finely painted with epoxy powders and it is sound insulated by means of polyurethane panels with a high sound absorbing degree.
- Compressor  
High efficient Scroll compressor with low sound level, internal heat protection, installed on rubber dampers.
- Evaporator  
Weld-brazed plate evaporator with anticondensing insulation.

- Electric pump  
Packaged centrifugal pump with a motor-pump direct coupling  
Supplied with a 2 -pole motor, class F insulation, IP 54 protection.
- Components of the refrigerating circuits  
Thermostatic expansion valve, dehydrating filter, safety valve, liquid receiver, sight glass, high and low pressure switches, high and low pressure gauges, modulating condensing control device installed on the fans, hot gas valve.
- Components of the hydraulic circuit  
Electric pump, expansion vessel, filter, filling unit, flow switch, safety valve.
- Regulation system  
Microprocessor with a liquid crystal display.

#### Options:

- AE Electrical supply different from standard
- IM Seawood packing

### CH...Technical data

CH.A		121	161	241	341	421	501	232	312	482	682	842
Cooling capacity	kW	12.5	16.3	24.3	34.9	41.8	51.7	22.3	32.6	46.0	68.2	82.4
[Weld-brazed plate evaporator]												
Quantity	n	1	1	1	1	1	1	2	2	2	2	2
Pressure drop (single)	Kpa	25	25	30	32	40	20	29	25	30	32	40
[Electropump]												
Quantity	n	1	1	1	1	1	1	2	2	2	2	2
Available pressure	Kpa	200	195	165	130	110	120	200	195	170	130	110
Water flow rate (single)	l/s	0.60	0.78	1.16	1.67	2.00	2.47	0.53	0.78	1.10	1.63	1.97
Motor capacity (single)	kW	0.55	0.55	0.55	0.55	0.55	0.55	0.55	0.55	0.55	0.55	0.55
Nominal absorbed current (single)	A	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7
Inrush current (single)	A	8	8	8	8	8	8	8	8	8	8	8
[Scroll compressors]												
Quantity	n	1	1	1	1	1	1	2	2	2	2	2
Circuits	n	1	1	1	1	1	1	2	2	2	2	2
Nominal absorbed current (single)	A	7.5	8.5	12.8	17.5	22.5	31.0	6.1	8.5	12.8	17.5	22.5
Inrush current (single)	A	60	71	123	167	142	146	50	71	123	167	142
Nominal absorbed capacity (single)	kW	3.80	4.78	7.20	10.30	13.10	16.60	3.15	4.78	7.20	10.30	13.10
Total absorbed current	A	9.2	10.2	14.5	19.2	24.2	32.7	15.6	20.4	29	38.4	48.4
Total absorbed capacity	kW	4.35	5.33	7.75	10.85	13.65	17.15	7.4	10.66	15.5	21.7	27.3
[Dimensions]												
Length	mm	770	770	770	770	770	1265	1265	1265	1265	1265	1265
Width	mm	770	770	770	770	770	770	770	770	770	770	770
Height	mm	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Weight in operation	Kg	320	350	380	410	450	555	470	500	530	560	600
Inlet connection	mm	16	16	22	22	22	28	16	16	22	22	22
Liquide line connection	mm	10	10	12	16	16	16	10	10	12	16	16
Power supply		400/3F/50Hz										
[Remote condenser]												
Standard	[CR]	14	26	35	45	58	70	2*14	2*26	2*35	2*45	2*58
Silenced	[CRS]	21	21	34	56	56	66	2*21	2*21	2*34	2*56	2*56
Ultrasilenced	[CRU]	17	22	33	44	67	67	2*17	2*22	2*33	2*44	2*67

Nominal conditions: external air temperature 32 °C - Water temperature 7/12 °C

\*These indications are to be interpreted as follows:

18-3/4 SAE means that the pipe fitting is suitable for a pipe with a diameter of 18 mm with a 3/4 SAE thread;

22 ODS means that the line is to be connected by welding to a pipe with a diameter of 22 mm.