AIR-COOLED LIQUID CHILLERS
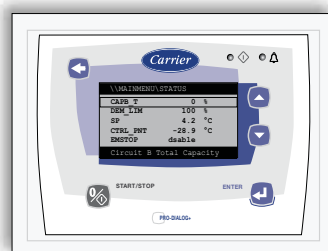
Air conditioning

AQUASNAP
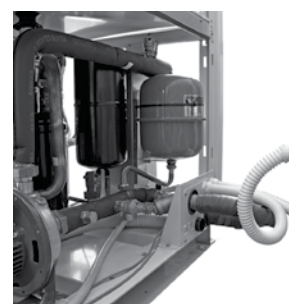
30RB

Options/accessories

- Unit without hydronic module (option)
- Integrated water fill system (option)
- Power supply without neutral (option)
- JBus, BacNet and LonTalk gateways (accessory)
- Remote interface (accessory)
- Integrated water fill system (accessory)

Features

- Four sizes with nominal cooling capacities from 16 to 33 kW.
- Aquasnap liquid chillers for commercial applications such as the air conditioning of offices and hotels.
- Exceptionally high energy efficiency at part load - Eurovent energy efficiency class A and B (in accordance with EN14511-3: 2013).
- Latest technological innovations integrated: ozone-friendly refrigerant R-410A, scroll compressors, low-noise fans and auto-adaptive microprocessor control.
- The units are equipped with a hydronic module integrated into the unit chassis, limiting the installation to straight-forward operations like connection of the power supply and the water supply and return piping.
- Low-noise scroll compressors with low vibration level.
- Vertical condenser coils with protection grilles on anti-vibration mountings.
- Low-noise fans, now even quieter. Rigid fan installation for reduced start-up noise.
- The unit has a small footprint and is enclosed by easily removable panels.
- Simplified electrical connections.
- Systematic operation test before shipment and quick-test function for step-by-step verification of the instruments, electrical components and motors.
- Maintenance-free scroll compressors and fast diagnosis of possible incidents and their history via the Pro-Dialog+ control reduce maintenance costs.
- Leak-tight refrigerant circuit.
- Corrosion resistance tests, accelerated ageing test on compressor piping and fan supports and transport simulation test on a vibrating table in the laboratory.

Pro-Dialog+ operator interface

Hydronic module (sizes 026-033 shown)

Physical data

30RB		017	021	026	033
Air conditioning application as per EN14511–3: 2013					
Condition 1					
Nominal cooling capacity	kW	16.4	21.4	27.3	33.3
EER	kW/kW	3.04	3.11	3.08	3.28
Eurovent class		B	A	B	A
ESEER	kW/kW	3.46	3.47	3.44	3.62
Condition 2					
Nominal cooling capacity	kW	22.7	29.5	38.6	45.8
EER	kW/kW	3.80	3.86	4.01	4.11
Operating weight*					
Standard unit (with hydronic module)	kg	189	208	255	280
Standard unit (without hydronic module)	kg	173	193	237	262
Refrigerant*		R-410A			
Compressor		One hermetic scroll compressor			
Control		Pro-Dialog+			
Fans		Two twin-speed axial fans, 3 blades		One twin-speed axial fan, 7 blades	
Air flow	l/s	2212	2212	3530	3530
Evaporator		Plate heat exchanger			
Condenser		Copper tubes and aluminium fins			
Unit with hydronic module		One single-speed pump, screen filter, expansion tank, flow switch, pressure gauge, automatic air purge valve, safety valve			
Power input*	kW	0.54	0.59	0.99	1.10
Nominal operating current**	A	1.30	1.40	2.40	2.60
Dimensions					
Length x depth x height	mm	1136 x 584 x 1579	1136 x 584 x 1579	1002 x 824 x 1790	1002 x 824 x 1790

NOTE: For the conditions, please refer to page 31.

* Weight shown is a guideline only. To find out the unit refrigerant charge, please refer to the unit nameplate.

Electrical data

30RB		017	021	026	033
Power circuit					
Nominal power supply	V-ph-Hz	400-3-50 ± 10%			
Control circuit supply		24 V via internal transformer			
Maximum start–up current (Un)*	A	75	95	118	118
Maximum operating power input	kW	7.8	9.1	11	13.8
Nominal unit operating current draw*	A	8	12	16	17

* Maximum instantaneous start-up current (locked rotor current of the compressor).
** Power input, compressors and fans, at the unit operating limits (saturated suction temperature 10°C, saturated condensing temperature 65°C) and nominal voltage of 400 V (data given on the unit nameplate).
*** Standardised Eurovent conditions: water heat exchanger entering/leaving water temperature 12°C/7°C, outside air temperature 35°C.

Operating range
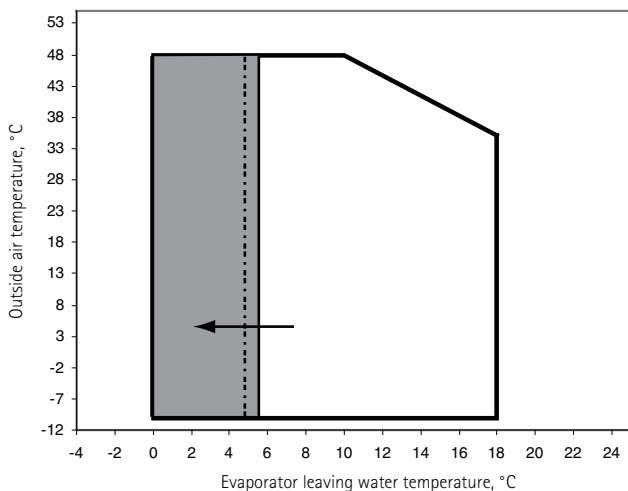
Operating range with anti-freeze solution and Pro-Dialog configuration.