

CYGNUS G

Air-cooled chillers featuring ON/OFF scroll compressors
and BPHE evaporator
Nominal cooling capacity 27 – 81 kW



*Cooling your industry,
optimising your process.*



CYGNUS G

A ROBUST SOLUTION FOR INDUSTRIAL APPLICATIONS

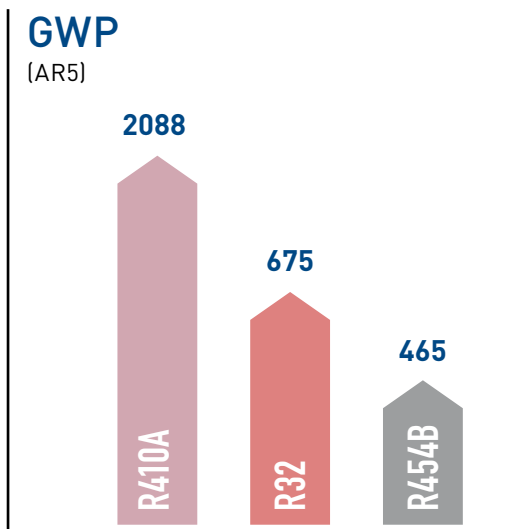
CYGNUS G air-cooled chillers are designed specifically for use in demanding applications.

CYGNUS G is the result of MTA's commitment towards the green transition of energy systems, combining reliability, durability and flexibility with the application of low GWP refrigerant R454B.

The packaged plug & play configuration features an internal storage tank and single or twin pumps. Numerous options, coupled with wide operating limits, ensure CYGNUS G perfectly fits a variety of process cooling applications.

CYGNUS G is the flexible and dependable solution for your industrial needs.

SUSTAINABLE COOLING WITHOUT COMPROMISING ENERGY EFFICIENCY



R454B

-78%

GWP versus R410A

- Composition 69% R32 + 31% R1234yf;
- Low GWP 465 (AR4 + AR6);
- A2L low-toxicity, mildly flammable (ISO 817);
- Non-Ozone depleting.

Wide operating range

CYG's wide operating limits match the requirements of multiple applications, with water outlet temperatures from -5 to +20 °C and a delta T from 4 to 10 °C.

Certified Efficiency

CYG efficiencies exceed the latest Ecodesign SEPR standard for process cooling applications and are guaranteed by Eurovent certification.

Plug and Play

CYG features an integrated hydronic group. Multiple accessories and kits allow each unit to fit the application needs. CYG is easy-to-use and ready-to-install.

Industrial quality

CYG is designed to work whatever the conditions. The robust design features field-tested premium components and a meticulous attention to every single detail.

WATER OUTLET TEMPERATURE

-5/+20 °C

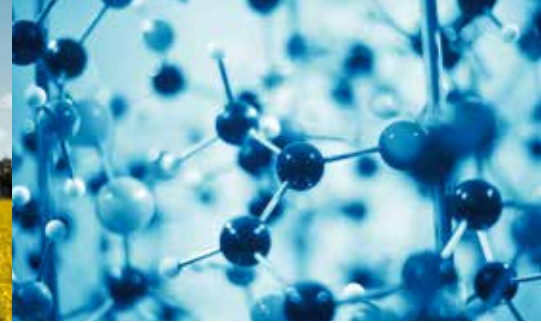
SEPR HT5,44
UP TO

(REG. 2016/2281)

AMBIENT TEMPERATURE

-20/+46 °C





Low noise

CYG offers low noise levels, with sound power levels down to below 67 dB(A) as standard. This is ideal in noise sensitive environments.

Packaged and flexible

CYG meets your specific needs. Choose between a unit with or without a buffer tank, and without pump, with a single pump or with twin pumps.

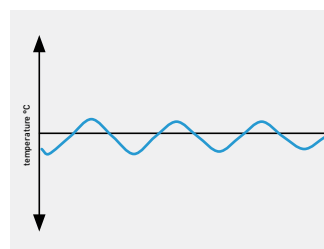
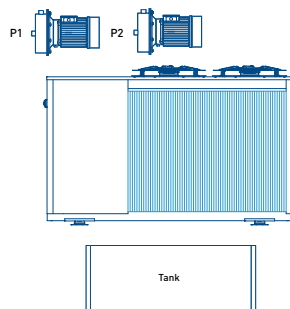
Accurate control

Outlet liquid temperature control and a generously sized cold tank ensure accurate temperature control even in industrial applications with sudden load variations.

Stainless steel evaporator

MTA's industrial chiller ranges offer differing evaporator configurations. CYG's stainless steel plate evaporator is ideal in multiple closed circuit industrial processes.

Noise reduction
down to 67 dB(A)



Standard features

- Refrigerant R454B;
- Hermetic scroll compressor (twin compressors from mod.211);
- Compressor crankcase heater;
- Industrial copper-aluminium condenser;
- Integrated hydronic module with pump, storage tank, expansion vessel, safety valve, filling/drain valve, pressure gauge and automatic bleed valve;
- Hydraulic threaded connections directly accessible from the unit's exterior;
- Brazed stainless steel plate evaporator;
- Axial fans with electronic speed control;
- Electrical panel protection grade IPX4;
- Phase monitor;
- Factory charged with refrigerant and non-freezing oil;
- Extensively factory tested (performance, operation, quality and safety).

Options

- Winter package: minimum ambient temperature -20 °C, storage tank, medium head pressure pump, condenser air filters and antivibration mounts;
- Configuration with storage tank;
- Medium/low head pressure pump (depending on model);
- Double pumps (1 run/1 stand-by);
- Anti-freeze heater on evaporator, pump and storage tank (if installed).

Kits

- Replicated remote user display;
- Serial card (RS485 Modbus);
- xWEB300D PRO supervisor system;
- Soft starter;
- Condenser air filters;
- Antivibration mounts.

CYG		081	101	131	171	211	251	301
Nominal cooling capacity (1) ▼	kW	19,30	25,61	33,16	37,59	44,71	52,38	59,05
EER (1) ▼	-	2,72	2,77	2,80	2,94	2,67	2,88	2,77
SEPR HT (2) ▼	-	5,09	5,04	5,05	5,25	5,07	5,44	5,24
Nominal cooling capacity (3)	kW	26,69	35,06	45,20	50,93	61,27	71,89	80,83
EER (3)	-	4,43	4,30	4,25	4,43	4,16	4,52	4,23
Power supply	V/ph/Hz	400 ± 10% / 3-PE / 50						
Circuits / Compressors	n°	1 / 1	1 / 1	1 / 1	1 / 1	1 / 2	1 / 2	1 / 2
Refrigerant	-	R454B						
Sound Power (4) ▼	dB(A)	75	76	76	77	81	82	82
Length	mm	1998	1998	2102	2102	2503	2503	2503
Width	mm	810	810	1112	1112	1112	1112	1112
Height	mm	1184	1184	1464	1464	1552	1552	1552
Operating weight (5)	kg	463	489	586	607	735	770	778

Data declared according to UNI EN 14511, and they refer to units without options which require an electrical feeding source and in nominal working conditions

- (1) Evaporator water inlet/outlet temperature 12/7 °C, external air temperature 35 °C;
- (2) Data declared in compliance with the European Regulation (EU) 2016/2281 with regard to ecodesign requirements for cooling products and high temperature process chillers;
- (3) Evaporator water inlet/outlet temperature 20/15 °C, external air temperature 25 °C;
- (4) Sound power is determined on the basis of measurements taken in accordance with the standard ISO 3744;
- (5) Operating weight refers to the unit without options, and according to the chosen configuration the weights could vary up to +20%.
- ▼ Eurovent certified data



MTA is ISO9001 certified, a sign of its commitment to complete customer satisfaction.



MTA products comply with European safety directives, as recognised by the CE symbol.



MTA participates in the E.C.C. programme for LCP-HP. Certified products are listed on: www.eurovent-certification.com
Certification applied to the units:
- Air/Water up to 600 kW
- Water/Water up to 1500 kW

www.mta-it.com

© 2026 MTA. All rights reserved.

