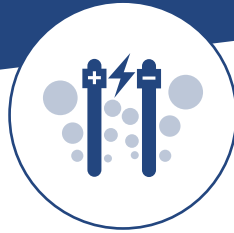


McPhy

Driving
clean energy
forward



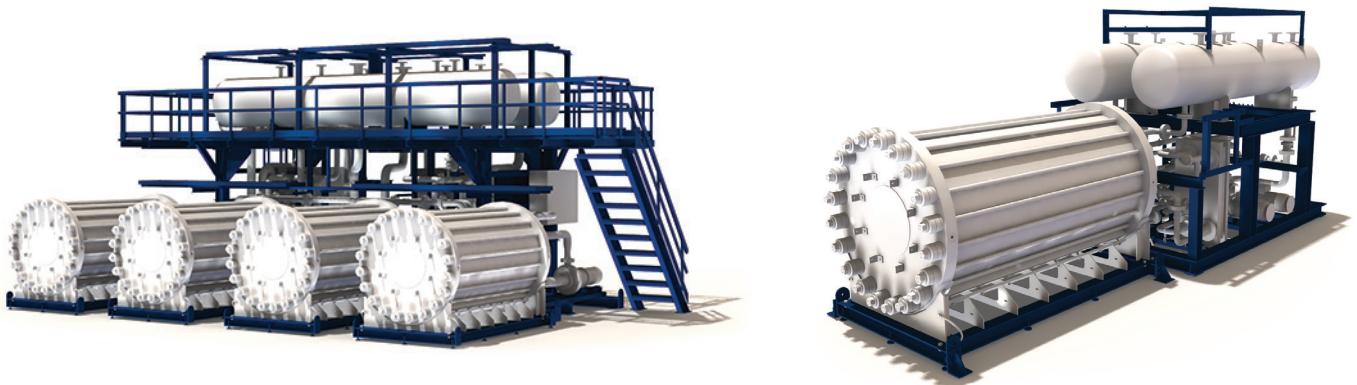
MCLYZER PRODUCT LINE

Pressurized alkaline electrolysis

30 bar

200 to 3200 Nm³/h

1 to 16 MW



mcphy.com

MCLYZER PRODUCT LINE
Specifications¹

	McLyzer 200	McLyzer 400	McLyzer 800	McLyzer 3200
Power class	1 MW	2 MW	4 MW	16 MW
Electrolyzer type	Pressurized alkaline			
Number of stacks	1	4	4	16
System design lifetime (mechanical)	> 20 years			
H₂ OUTPUT				
H₂ nominal flow rate	200 Nm ³ /h	400 Nm ³ /h	800 Nm ³ /h	3200 Nm ³ /h
H₂ purity	> 99.998 % after gas cleaning			
H₂ delivery pressure	27 to 30 bar (g), depending on configuration			
PERFORMANCES				
Stack DC consumption, BoL	4,65 kWh/Nm ³	4,65 kWh/Nm ³	4,65 kWh/Nm ³	4,65 kWh/Nm ³
System AC consumption, BoL	5,1 kWh/Nm ³	5,0 kWh/Nm ³	5,0 kWh/Nm ³	5,0 kWh/Nm ³
Operation range	20 - 100 %	20 - 100 %	20 - 100 %	10 - 100 %
Reaction time	< 30s from hot stand-by to 100 % electrical load			
Ramp-up Ramp-down²	>5 %/s 20 %/s			
DIMENSIONS (L x W x H) & WEIGHTS³				
Stack (per unit)	2.7 x 1.5 x 1.7 m / 9.5 tons			
Stacks & process unit	9.0 x 3.0 x 3.5 m	9.1 x 6.2 x 3.5 m	8.9 x 6.4 x 5.8 m	26 x 25 x 8 m
Electrical unit	6.1 x 2.4 x 2.9 m	6.1 x 3.0 x 2.9 m	9.2 x 2.4 x 2.9 m	26 x 14 x 6 m
Auxiliaries unit	6.1 x 3.0 x 3.0 m	6.1 x 3.0 x 3.0 m	12.0 x 3.0 x 3.0 m	Project specific
INSTALLATION AREA REQUIREMENTS				
Installation area requirements	All equipments delivered in containers	Stacks & process units in building	Stacks in building, process unit outdoor	
Ambient temperature	-20°C +35°C		+5°C +40°C	
UTILITIES				
Demineralized water	ca 1 l/Nm ³ H ₂			
Electrolyte	30 % KOH aqueous solution			

¹ All figures above are "expected values", may vary depending on operating conditions and can be revised by McPhy according to technological evolution.

² At system level within nominal operational load range, in % of electrical full load per second.

³ Process unit includes, separators, pumps heat exchangers and purification (all products) and drying unit (all except for McLyzer 800/3200).

Electrical unit includes transformers and rectifiers. Auxiliaries unit includes water demineralization, instrument air, control unit. Cooling auxiliaries not included.