

New Generation Liquid Nitrogen Plants

CNP480 – Compact, Economic and Elegant

CNP480 arrives as a plug-and-liquify system with external compressor and chiller to lower the noise in the plant room. A fully integrated design and one button operation allows you to place CNP series liquifiers in the research labs or clean rooms. Its modular design takes a little space and allows you to extend your liquification capacity. Simply make the electrical connections and produce your own liquid nitrogen by a fully automated operation with a user friendly interface of its PLC controller. Operator only needs to replace the filters and perform routine checks between maintenance intervals of 13000 operating hours.



Production Rate	≥ 480 liter/day (≥ 512 l/day @ 23 °C)
Electrical Rating	380/400/415VAC, 3Ph, 50Hz, 480VAC, 3 Ph, 60 Hz
Power Consumption (Steady State)	56kW @ 50Hz 64kW @ 60Hz
Dimensions	1245 mm (W) x 4953 mm (L) x 1439 mm (H)
Weight	2200 kg (Empty) / 3000 kg (Full)
Suggested Installation Area	4.5m (L) x 6m (W) x 3.5m (H)
Compressed Air Requirement	~56 m ³ /hour @ 9 bar
Cooling Water Flow Rate	72 liter/min @ 4 bar
Cryocooler	GM type cryocooler mounted on Dewar
Compressor	He, 99.999% purity @ 245-260psig, Water cooled
Human Machine Interface	8" Color Graphic Touch Screen
Dewar Volume	1000 liter
Operating Pressure	2.0 bar
Dewar Level Control	Capacitive level sensor
Features	Easy installation, fully automatic start and stop operation by PLC which supports efficient troubleshooting, the monitor displays the operational status of the plant and the failures triggered by safety devices and sensors, single switch operation, control all components through the diagnostic screen, LN ₂ transfer by one button, Automatic re-start after power failure.
Built-in Nitrogen Generator	
Purity	≥ 99%
Dew Point	up to -40°C
Flow Rate	18 m ³ /hour
Ambient Temperature Range	+5°C to +50°C
Maximum Altitude	3 000 meters
Noise Level	< 65 dB @ 1 meter
Standards	CE Conformance, ISO 12100:2010, IEC60204-1, 2006/42/EC, 97/23/EC; ISO9001:2015