











	LP	LP-ACE	HP	СР	MP
Series	Low Pressure	LP - Automated Compact Edition	High Pressure	Compact Purifier	Miniature Purifier
Bed # Options	Single or Dual	Single or Dual	Single or Dual	Single or Dual	Single or Dual
Pressure Ranges	100-350 PSIG	100-350 PSIG	1000-3500 PSIG	100-3500 PSIG	100-3500 PSIG
Flow Ranges	10-60 gram/sec	10-100 gram/sec	50-400 NM3/Hr	10-300 NM3/Hr	1-25 SCFM
Approximate Pressure Drop	1 bar @ 40 g/s	3 – 6 psi @ 80 g/s	VARIES	VARIES	VARIES
Inlet Purity	> 95% Purity	> 95% Purity	> 70% Purity	> 85% Purity	> 90% Purity
Outlet Purity*	> 6.0 Grade	> 6.0 Grade	> 6.0 Grade	> 6.0 Grade	> 6.0 Grade
Ultra-High Purity	Available on Request, >7N	No	Available on Request, >7N	Available on Request, >7N	No
Approximate Dims	5ft x 6ft x 11ft 5ft x 12ft x 11ft	8ft x 12ft x 10ft	4ft x 6ft x 11ft	5ft x 7ft x 9ft	4ft x 4ft x 7ft

Available Addons:

- Recovery Systems
 - Compressors
 - Gas Storage
- Moisture Removal Systems
- Oil Elimination Systems for Oil Compressors
- Final Filtration For UHP
- LN2 Transfer Piping
- Other Cryogenic Equipment
- Vacuum Pumping Systems
- PLC Control Schemes (Semi / Full)
- >7N Purity UHP

Why AET for Purification?

Full Range of In-House Capabilities

- Engineering, Design and Consultation
- Machining & Fabrication
- Controls & Instrumentation

Global Brand / Reputation

- USA DOE National Labs
- Global Industrial Gas Suppliers
- · Academic Institutions
- Industrial Companies
- Units in Operation for 30+ Years

Quality and Manufacturing Certifications

- ASME Section VIII "U" and "UM" Stamps
 - Global Pressure Vessel Certs Available
- ISO 9001:2015
- CE / UL / Other Certifications Available

Notes: Above table represents existing model series. Variations to models above are considered custom. Please contact us for more information regarding these or any custom models. *Outlet Purity Depends on Inlet Consistency*

Operating Principal

The AET Helium or Hydrogen Recovery Purifier is a cryogenic adsorber based purification system. It accepts a flow of gas at pressure and removes the impurities by adsorption. Silica gel or similar are used as the adsorbent material and it is submerged in liquid nitrogen. To preserve cryogenic fluids and promote conservation, the system has several heat exchangers to pre-cool the helium gas prior to its passage through the desiccant/adsorbent bed.

Example PLC HMI Screen





