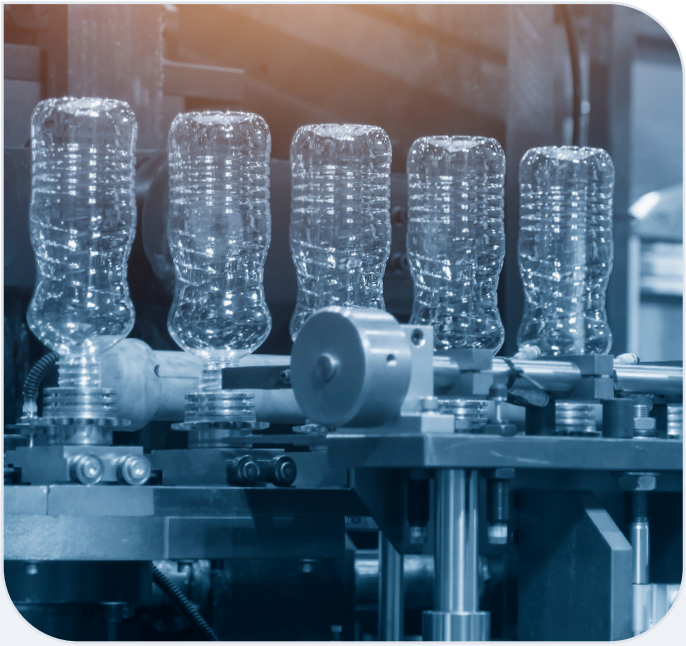
APET High-Pressure Refrigerated Dryers

Features

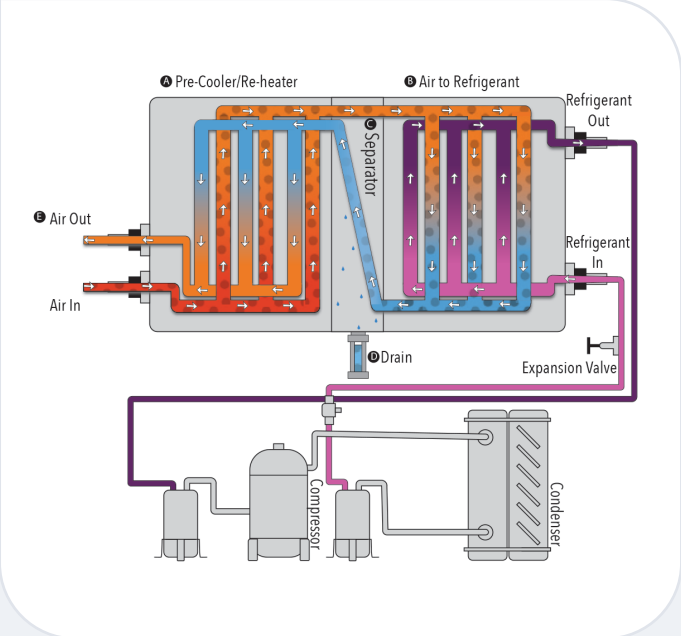
- Design pressure of 725 psig
- Features high-pressure 316 stainless steel, brazed plate heat exchangers, and stainless steel air-side components designed specifically for harsh environments.
- Achieves a separation efficiency of over 98% moisture separation by utilizing a double-circuit heat exchanger in combination with a centrifugal separator.
- Low power and energy consumption
- Reliable and constant dew point performance in all flow conditions
- Lightweight and compact
- Environmentally friendly R134a refrigerant
- High-pressure pre and after filtration also available for optimal energy savings
- Options include: water-cooled, NEMA 4, NEMA 4X and condenser cleaner assembly.
- Made in the USA

Application Driven



Designed for PET container production, injection molding, component testing and naval and military applications.

How it Works



APET cools compressed air using a refrigerant circuit. The compressed air passes through an air-to-refrigerant heat exchanger, reducing its temperature. As a result, water vapor condenses into liquid, which is the separated and removed, leaving dry air.

nano R³: APET PET High-Pressure Refrigerated Dryers

MODEL	INLET & OUTLET	RATED FLOW (SCFM) (1)		FULL LOAD AMPS	DIMENSIONS (INCHES)			APPROX. WEIGHT	POWER SUPPLY (V/PH/60HZ)		
	NPT	@725 PSIG	@500 PSIG		A	B	C	LBS	115/1	230/1	460/3
APET-45	½”	45	31	4.5	16	16	15	71	•		
APET-65	½”	65	45	5.5	16	16	15	78	•		
APET-80	½”	80	55	8.0	16	16	15	102	•		
APET-125	½”	125	86	8.0	24	18	22	124	•		
APET-200	1”	200	138	14.5	36	25	30	162	•		
APET-260	1”	260	179	13.5	36	25	30	240		•	
APET-415	1”	415	286	8.0	36	25	30	345			•
APET-570	1”	570	393	9.5	34	45	45	567			•
APET-860	1”	860	593	12.5	34	45	45	582			•
APET-1000	1”	1000	690	11.5	38	54	48	790			•

SPECIFICATIONS	STANDARD
Design operating pressure (psig)	200 to 725
Inlet air temperature range (°F)	40 to 120
Ambient temperature range (°F)	40 to 120
Electrical class	NEMA 1
Outlet dew point (°F)	38
Initial △P (psid) (3)	5

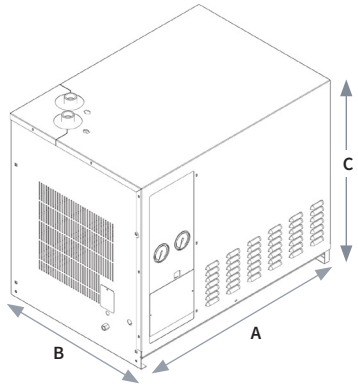
TEMPERATURE CORRECTION FACTORS (2) (3)							
Ambient air temperature (°F)	70	80	90	100	110	115	120
Correction factor	1.10	1.07	1.05	1.00	0.94	0.85	0.65

TEMPERATURE CORRECTION FACTORS (2) (3)					
Inlet air temperature (°F)	80	90	100	110	120
Correction factor	1.50	1.21	1.00	0.82	0.72

PRESSURE CORRECTION FACTORS (2)			
Inlet air pressure (psig)	725	500	225
Correction factor	1.00	0.69	0.31

OUTLET PRESSURE DEW POINT CORRECTION FACTORS (2) (3)				
Dew point (°F)	38	41	45	50
Correction factor	1.00	1.12	1.17	1.22

(1) Capacity rated at 725 psig, 100°F inlet, 100°F ambient.
(2) To be used as rough guide only. All applications should be confirmed by nano. Contact support@nano-purification.com.
(3) If using correction factors >1.00, the unit initial △P (psid) value will increase.



APET-45 to APET-1000

Technical specifications subject to change without notice.
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