

# ASAP 2420 Specifications

<b>Electrical</b>	<p>Voltage: 100/115/230 VAC (<math>\pm 10\%</math>)          Frequency: 50 or 60 Hz          Power: 800 VA, exclusive of vacuum pumps, which are powered separately</p>
<b>Environment</b>	<p>Temperature: 10 to 30 °C operating          -10 to 55 °C storage or shipping          Humidity: Up to 90% (non-condensing) for instrument</p>
<b>Capacity</b>	<p>Analysis System: 6 sample ports (5 for krypton), each with a constantly monitored saturation pressure port          Degas System: 12 degas ports, each with independently controlled heating mantle</p>
<b>Analysis System</b>	<p>Manifold Temperature Transducer:          Type: Platinum resistance device (RTD)          Accuracy: <math>\pm 0.10</math> °C by keyboard entry          Stability: <math>\pm 0.10</math> °C per month</p> <p>Manifold Pressure Transducer(s):          Range: 0 to 950 mmHg operating: 1000 mmHg maximum          0 to 10 mmHg added for Krypton option          Resolution: 1000-mmHg Transducer: 0.001 mmHg          1-mmHg Transducer: 0.000001mm          Accuracy: 1000-mmHg Transducer: within 0.15% of reading          10-mmHg Transducer*: within 0.15% of reading          1-mmHg Transducer:** within 0.12% of reading          Includes nonlinearity, hysteresis, and nonrepeatability          *The 10-mmHg transducer is active only when running krypton samples.          **The 1-mmHg transducer is present only in the enhanced micropore option</p>
	<p>Sample Port Transducers and P<sub>0</sub> Port Transducers:          Range: 0 to 950 mmHg          Resolution: 0.001 mmHg          Accuracy: <math>\pm 0.1\%</math> Full Scale</p>
	<p>Vacuum Transducer:          Type: Thermocouple          Range: 0.001 to 1 mmHg</p>
<b>Vacuum System</b>	<p>Pumps: Nitrogen: 2 oil-based pumps: 1 analysis, 1 degas          4 pumps available: 2 oil-free (1 analysis, 1 degas)          2 high vacuum (1 analysis, 1 degas)</p> <p>Krypton: 4 pumps: 2 oil-free (1 analysis, 1 degas)          2 high-vacuum (1 analysis, 1 degas)</p> <p>Oil-based mechanical pump: <math>5 \times 10^{-3}</math> mmHg ultimate vacuum          Oil-free and high vacuum pump: <math>3.8 \times 10^{-9}</math> mmHg ultimate vacuum*          *Ultimate vacuum measured by pump manufacturer according to Pneurop Standard 5608</p>
<b>Physical</b>	<p>Height: 159 cm (62.5 in.)          Width: 103 cm (40.5 in.)          Depth: 51 cm (20.2 in.)          Weight: 160 kg (350 lb)</p>

<p><b>Degas System</b></p>	<p>Capacity: 12 degas ports</p> <p>Vacuum Control: Selectable target pressure controls switchover from restricted to unrestricted evacuation</p> <p>Evacuation: Selectable evacuation rate from 1.0 to 50.0 mmHg/s</p> <p>Manifold Pressure Transducer:</p> <p>    Range: 0 to 950 mmHg</p> <p>    Resolution: 0.01 mmHg</p> <p>    Accuracy: <math>\pm 0.1\%</math> Full Scale</p> <p>Vacuum Transducer:</p> <p>    Type: Thermocouple</p> <p>    Range: 0.001 to 1mmHg</p> <p>    Temperature Range: Ambient to 450 °C (Programmable)</p> <p>    Temperature Control: 1 ramp during evacuation phase, 5 additional selectable ramps during heating phase</p> <p>    Selection: Digitally set, 1 °C increments from computer</p> <p>    Accuracy: Deviation less than <math>\pm 10</math> °C of set point at the sensing thermocouple embedded in the heating mantle</p> <p>    Backfill Gas: User-selectable at dedicated port, typically nitrogen or helium</p>
<p><b>Computer Minimum Requirements:</b></p>	<p>Pentium CPU (or equivalent)</p> <p>CD-ROM drive</p> <p>512 megabytes of main memory</p> <p>20-gigabyte hard drive</p> <p>SVGA monitor (1024 x 768 minimum resolution)</p> <p>Windows XP or Windows 7</p> <p>Ethernet Port, capable of communicating with a 10 base-T Ethernet card</p>

*In keeping with a policy of ongoing product improvement, specifications are subject to change without notice.*



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Rev-A