

- ✓ Pilot module designed specifically for testing of adsorption medias
- ✓ Independent columns with automatic flow control
- ✓ Influent piping configurable for pressurized or pumped flows
- ✓ Parallel or series operation
- ✓ Manual valves to allow for feed pump to be used as backwash pump
- ✓ Multiple sample ports in each column for sampling water or media
- ✓ All equipment integrated onto one skid for plug-and-play operation
- ✓ Independent pressure measurement in each column
- ✓ Bed volume calculated through totalizing magnetic flow meter
- ✓ Designed for automatic un-manned operation
- ✓ Monitored and controlled remotely via wireless cellular connection
- ✓ Data logging to formatted text file for importing into spreadsheet and charting applications
- ✓ Historical and real-time trending visualization tool
- ✓ Alarm notification via email or text messaging
- ✓ IoT network provides exceptional diagnostic information



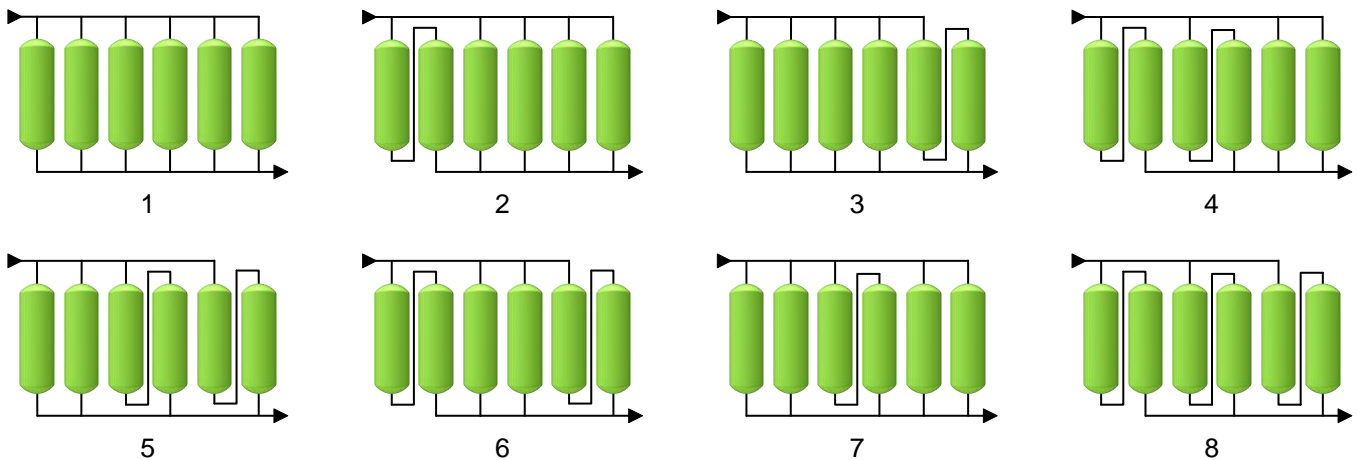
All information presented in this data sheet is for configuration code A60448-SAP-15PC-0PH-0CF.
See ordering section for other configurations.

Example Specifications

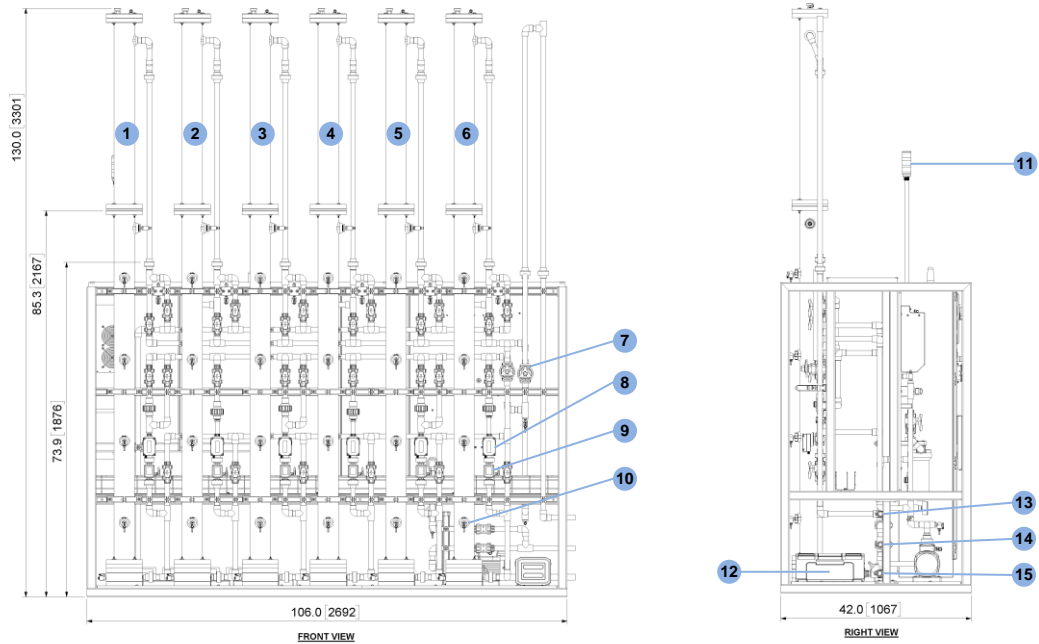
A60472-SAP-15PC-0PH-0CF		
Columns	6	6
Column Diameter	4 inch	102 mm
System Height	130 inch	3301 mm
Maximum Media Depth	72 inch	1829 mm
Media Retention Size	> 0.0059 inch	> 149 μm
Loading Rate	2.3... 17.2 gpm/ft ²	5.6... 42.2 m/h
Backwash Rate	2.3... 17.2 gpm/ft ²	5.6... 42.2 m/h
Maximum Column Pressure	40 psi	275 kpa
Maximum Total Flow Rate	9 gpm	34 L/min
Operating Dimensions	144 X 48 X 130 inch	3658 X 1219 X 3301 mm
Operating Weight	1900 lbs	862 kg
Electrical Supply	Single Phase	Single Phase
Voltage	120 / 240 V	230 V
Frequency	60 Hz	50 Hz
Maximum Current	10 / 5 A	5.2 A

Operation

The standard Adsorption Pilot module has a very flexible design. All configurations come with feed pump and by-pass piping if a pressurized source is used. If the PAR configuration is selected the filters are operated in parallel only. If the SAP configuration is selected the filters can be operated in series or parallel. Eight possible configurations are shown below.



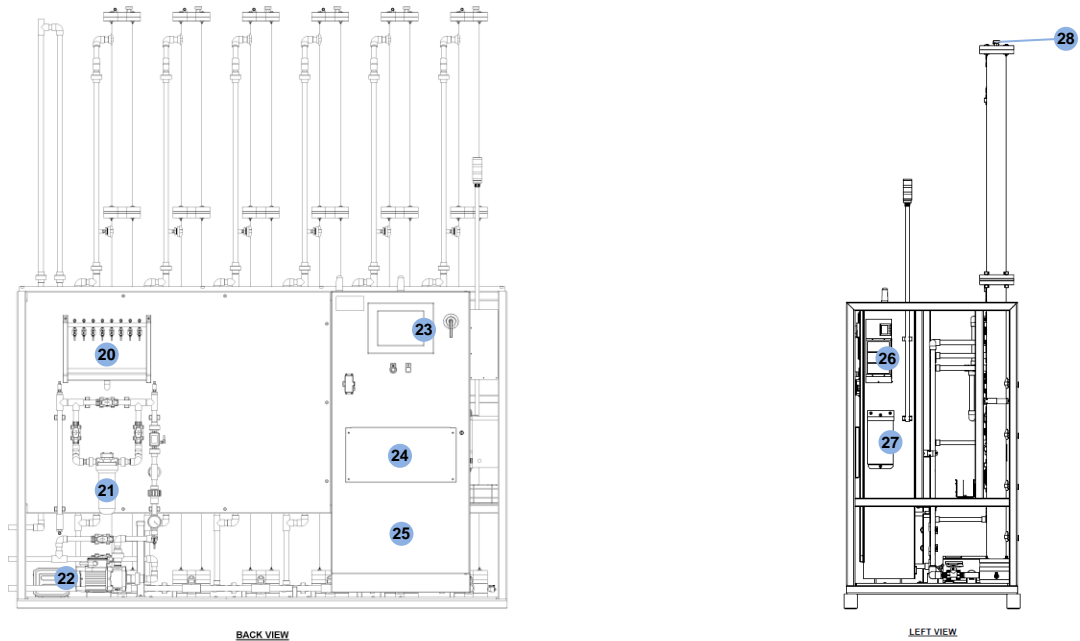
General Arrangement Drawings



1	Column 1
2	Column 2
3	Column 3
4	Column 4
5	Column 5

6	Column 6
7	Backwash Flow Control Valve
8	Column Flow Control Valve
9	Column Flow Meter
10	Sample Port

11	Alarm Beacon
12	Spare Part Box
13	Effluent $\frac{3}{4}$ " MPT
14	Influent $\frac{3}{4}$ " MPT
15	Drain Waste 1" MPT



20	Sample Sink
21	Cartridge Filter
22	Feed/Backwash Pump

23	Operator Interface
24	Folding Shelf
25	Control Panel

26	Air Conditioner
27	Power Transformer
28	Pressure Relief (50psi)

Dimensions: inch [mm]

Data Logging

The following parameters are automatically collected and stored for analysis. The collection is performed at a user-specified frequency from once per second to once per twelve hours. The values are time and data stamped and simultaneously written to a formatted text file on a removable flash drive and to a backup file on the internal solid state drive. These files can be transferred by removing the flash drive or using file transfer protocol over a remote connection.

Column 1 Flow	Column 4 Flow	Feed/ Backwash Pump Flow	If Chem System Specified:
Column 1 Headloss	Column 4 Headloss	Cartridge Filter Diff Pressure	Chemical X Dosage
Column 2 Flow	Column 5 Flow	System Diagnostic Data	Chemical X Flow
Column 2 Headloss	Column 5 Headloss		Chemical X Tank Level
Column 3 Flow	Column 6 Flow		
Column 3 Headloss	Column 6 Headloss		

Remote Operation

The pilot module is designed for automatic un-manned operation and can be monitored and controlled remotely. A wireless cellular router is installed in the control panel. This device can provide remote access to the pilot module in locations where adequate cellular data service is available. The router can be configured for the Verizon or AT&T networks depending on which network has the best service at the installed location. Data service is included during the warranty period. Data service beyond the warranty period can be purchased from Intuitech in one year blocks. Any task normally performed using the operator interface can also be performed remotely using a laptop computer, tablet, or smartphone. The operator interface can also be configured to send alarm notifications via email or text messaging.



Ordering

Our standard Adsorption Pilot Module can be configured as shown below. It can also be customized to meet specific requirements for an additional cost. Please contact Intuitech for more information.

