

# Parker Balston Disposable Filter and Adsorption Solutions

Selection Guide



ENGINEERING YOUR SUCCESS.



# Parker Balston Disposable Filter and Adsorption Solutions

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# Balston Disposable Filter Units

Choosing the best disposable filter product for industrial, commercial, measurement and control applications.

This brochure is designed to help OEM customers choose the best Balston disposable filter product for industrial, commercial, measurement and control applications.

Balston brand disposable filter units (DFU) consist of a microfibre filter cartridge permanently bonded into a sealed plastic holder with 125 psig pressure ratings, temperatures to 275°F, and available in low and high flow models. The economical DFU offers all of the advantages of microfibre filter cartridges for high efficiency liquid and gas filtration, combined with the economics and convenience of complete disposability.

Our years of experience in fitting products to individual applications has led to the creation of a variety of standard products that can be ordered off the shelf for general purpose filtration requirements or can be custom designed for all types of specialty applications.

If you do not see the specific configuration, size or material that you are looking for, our OEM engineering team will be happy to review your requirements and design product to your exact specifications.

If you have questions, or would like to place an order, our customer care specialists are ready to assist you. please call **1-800-343-4048**.

## Ideal for the following gas filtration applications

- Final filter for air logic devices
- Protection of pneumatic components
- Filtration of portable environmental sampling devices
- Filtration of samples to on-line analyzers
- Protection of Pneumatic temperature controls

## Ideal for the following Liquid filtration applications:

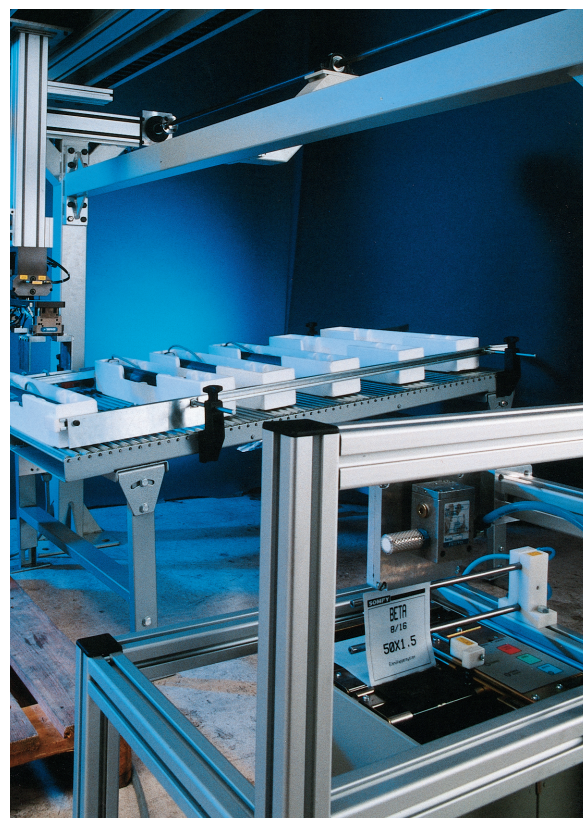
- Filtration of liquid with minimum holdup volume
- Filtration of liquid samples to analyzers

## Additional applications in the following industries

- Instrument & Controls
- HVAC
- Dental
- Automotive
- Food Packaging



Balston disposable filter units consist of a microfiber filter cartridge permanently bonded into a sealed plastic holder with 125 psig pressure ratings, temperatures to 275°F, and are available in low and high flow models



# DFU Element and Housing Material Selection Instructions

We supply filter elements in five different designs: X, Q, K, P. See description chart (right).

## How to select an element

- 1 When selecting a filter element, do not overspecify. Select the coarsest grade that will adequately protect the instrument. Coarser grade filters provide lower pressure drop and longer life than finer grades.
- 2 When selecting X or Q type elements, a D, B, C, A or AA positioned before the cartridge type will determine the retention efficiency. See Retention Efficiency chart (p. 5) Refer to the chemical compatibility chart (p. 5) to confirm compatibility of the filter element material with the sample composition.

## How to select a housing

- 1 Select a filter housing in the material chemically compatible with your application. Refer to the Chemical Compatibility chart (p. 5).
- 2 Determine the gas or liquid flow rate and pressure at the point where the filter will be located. Refer to flow information listed under each filter.

### X type elements

For removal of solids and large amounts of suspended liquids in gases  
 Feature thick walls for improved coalescing efficiency  
 Provide excellent chemical resistance  
 Temperature resistance to 300°F (150°C)  
 Use whenever permitted by housing internal volume  
 Fluorocarbon resin binder available in model 8833-11.  
 Use whenever permitted by housing internal volume

### Q type elements

For removal of solids and trace amounts of liquids in gases  
 Ideal for liquid service and particulate removal.  
 Similar to X type elements in chemical and temperature resistance  
 Available in models 9922-05, 9922-11.  
 Fluorocarbon resin binder.

### K type elements

Designed with integral dye to indicate the presence of oil.  
 Polyolfin binder with borosilicate glass fibers.  
 Available in model 9900-05.

### P type elements

For less critical applications.  
 100 micron nominal rated plastic filter element.  
 Available in model 4433-05.

# DFU Element Retention Efficiency and Chemical Compatibility

Retention efficiency for gas filtration	
Grade	Gas Filtration Efficiency
DX	93% at 0.01μ
DQ	93% at 0.01μ
BX	99.99% at 0.01μ
BQ	99.99% at 0.01μ
AQ	99.9999+% at 0.01μ
AAQ	99.99999+% at 0.01μ

Retention efficiency for liquid filtration	
Grade	Liquid Filtration Efficiency
DQ	98% at 25μ
BQ	98% at 2μ
CQ	98% at 8μ
AQ	98% at .9μ
AAQ	98% at .3μ

## Chemical compatibility

**Models:** 9922-05, 9922-11

**Suitable:** Water or steam to 200°F (135°C); concentrated nitric, sulfuric, and hydrochloric acids; chlorine (gas or liquid); sodium hypochlorite, ethylene oxide (gas or liquid); Freons; ammonia (gas, liquid, or aqueous solutions); hydrogen peroxide (all concentrations); bromine (dry and aqueous solutions); all chlorinated solvents except methylene chloride; all aromatic and aliphatic solvents; all alcohols and glycols; aniline; phenol.

**Limited Use:** Acetone, MEK, dioxane, furfural, methylene chloride.

**Unsuitable:** Water above 200°F (135°C), THF, DMF, ethylene diamine, chlorosulfonic acid, ethanolamine, pyridine, sulfur trioxide.

## Chemical compatibility

**Models** 9933-03, 9933-05, 9933-11, 9930-05, 7825, 4433-05, 8833-11, 9900-05, 8800-12, 9953-11

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.

# DFUs for Particulate Removal from Compressed Air and Most Gases

## Model 9933-05 Low Flow DFU

### Technical Information

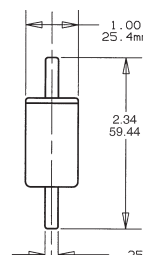
- 1/4" Inlet/Outlet Ports
- .004L Internal Volume
- 230°F (110°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 1.0"D x 3.25"L (2.5 cm x 8 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
9933-05-(L)	DQ	93% at 0.01μ	See pg. 10
	BQ	99.99% at 0.01μ	See pg. 10
	CQ	N/A	See pg. 10
	AQ	99.9999+ at 0.01μ	See pg. 10
	AAQ	99.99999+ at 0.01μ	See pg. 10

Gas Flow Rates			Flow Rate, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM/NM <sup>3</sup> /h at 2 PSI Drop at Indicated Line Pressure						
Model	Volume of Housing (ml)	DAU Grade		2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
9933-05	11.33	DQ	0.2	1.2/2.0	2.5/4.2	3.9/6.6	5.4/9.2	6.8/11.6	8.3/14.1	10.1/17.2
		BQ	0.1	0.8/1.4	1.6/2.7	2.6/4.4	3.6/6.1	4.4/7.5	5.4/9.2	6.6/11.2
		AQ		0.4/0.7	0.8/1.4	1.3/2.2	1.8/3.1	2.2/3.7	2.7/4.6	3.3/5.6

## Model 9933-11 Higher Flow DFU

### Technical Information

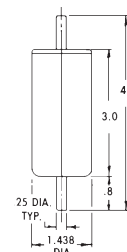
- 1/4" Inlet/Outlet Ports
- .02L Internal Volume
- 230°F (110°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 1.4"D x 4.6"L (3.6 cm x 12 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
9933-11-(L)	DQ	93% at 0.01μ	See pg. 10
	BQ	99.99% at 0.01μ	See pg. 10
	CQ	N/A	See pg. 10
	AQ	99.9999+ at 0.01μ	See pg. 10
	AAQ	99.99999+ at 0.01μ	See pg. 10

Gas Flow Rates			Flow Rate, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM/NM <sup>3</sup> /h at 2 PSI Drop at Indicated Line Pressure						
Model	Volume of Housing (ml)	DAU Grade		2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
9933-11	19.82	DQ	0.4	1.8/3.1	3.6/6.1	5.8/9.9	8.0/13.6	10/17.0	12.0/20.4	14.6/24.8
		BQ	0.2	0.9/1.5	1.8/3.1	2.9/4.9	4.0/6.8	5.0/8.5	6.0/10.2	7.3/12.4



# DFUs for Particulate Removal from Compressed Air and Most Gases

## Model 8800-12 Large Capacity High Flow DFU

### Technical Information

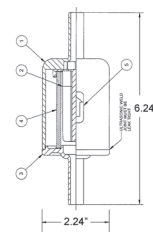
- 1/2" Inlet/Outlet Ports
- 138 mL Internal Volume
- 150°F (67°C) Maximum Temperature at 0 psig
- 50 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 2.24"D x 6.24"L (5.69 cm x 15.85 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
8800-12-(L)	DQ	93% at 0.01μ	See pg. 11
	BQ	99.99% at 0.01μ	See pg. 11

Gas Flow Rates			Flow Rate, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM/NM <sup>3</sup> /h at 2 PSI Drop at Indicated Line Pressure		
Model	Volume of Housing (ml)	DAU Grade		2 psig	20 psig	40 psig
8800-12	93.45	DQ	2.6	10/.69	22/1.51	35/2.4
		BQ	.45	2/.14	6/.41	9/.62

## Model 9953-11 Large Capacity High Flow DFU

### Technical Information

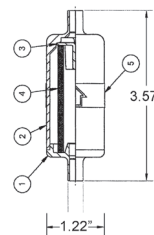
- .320" OD Inlet/Outlet Ports
- 33 mL Internal Volume
- 125°F (52°C) Maximum Temperature at 0 psig
- 2 psig (0.14 barg) at 110°F (43°C)
- Polypropylene
- 1.22"D x 3.57"L (3.1 cm x 9.07 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
99-53-11-(L)	DQ	93% at 0.01μ	N/A
	BQ	99.99% at 0.01μ	N/A

Gas Flow Rates			Flow Rate, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM/NM³/h at 2 PSI Drop at Indicated Line Pressure		
Model	Volume of Housing (ml)	DAU Grade		2 psig	20 psig	40 psig

# DFUs with Saturation Indicator for Oil Removal from Compressed Air

## Model 9900-05 Oil Indicating DFU

### Technical Information

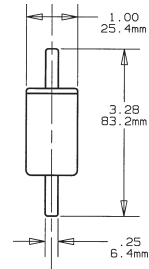
- 1/4" Inlet/Outlet Ports
- .01L Internal Volume
- 230°F (110°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 1.0"D x 3.25"L (2.5 cm x 8 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering Information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
9900-05-(L)	BK	99.99% at 0.01μ	N/A

Gas Flow Rates			Flow Rates, CFM		Flow Rates, SCFM/NM <sup>3</sup> /h					
Model	Volume of Housing (ml)	Filter Grade	at 10" Water Pressure Drop, 0 psig		at 2 PSI Drop at Indicated Line Pressure		20 psig	40 psig	60 psig	80 psig
9900-05	11.33	BK	0.1		0.8/1.4	1.6/2.7	2.6/4.4	3.6/6.1	4.4/7.5	5.4/9.2
										6.6/11.2

# DFUs with High Chemical Resistance for Particulate Removal from Gas

## Model 9922-05 High Chemical Resistance, Low Flow DFU

### Technical Information

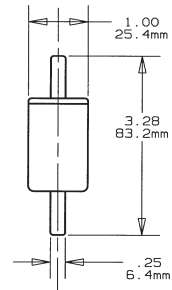
- 1/4" Inlet/Outlet Ports
- 10mL Internal Volume
- 275°F (135°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- PVDF
- 1.0"D x 3.25"L (2.5 cm x 8 cm)

### Chemical compatibility

**Suitable:** Water or steam to 200°F (135°C); concentrated nitric, sulfuric, hydrochloric acids; chlorine (gas or liquid); sodium hypochlorite, ethylene oxide (gas or liquid); Freons; ammonia (gas, liquid, or aqueous solutions); hydrogen peroxide (all concentrations); bromine (dry and aqueous solutions); all chlorinated solvents except methylene chloride; all aromatic and aliphatic solvents; all alcohols and glycols; aniline; phenol.

**Limited Use:** Acetone, MEK, dioxane, furfural, methylene chloride.

**Unsuitable:** Water above 200°F (135°C), THF, DMF, ethylene diamine, chlorosulfonic acid, ethanolamine, pyridine, sulfur trioxide.



### Ordering Information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
9922-05-(L)	DQ	93% at 0.01μ	See pg. 12
	BQ	99.99% at 0.01μ	See pg. 12
	CQ	N/A	See pg. 12
	AQ	99.9999+ at 0.01μ	See pg. 12
	AAQ	99.99999+ at 0.01μ	See pg. 12

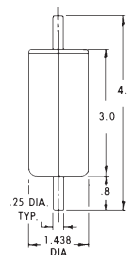
Gas Flow Rates			Flow Rates, CFM		Flow Rates, SCFM/NM <sup>3</sup> /h					
Model	Volume of Housing (ml)	Filter Grade	at 10" Water Pressure Drop, 0 psig		at 2 PSI Drop at Indicated Line Pressure		20 psig	40 psig	60 psig	80 psig
9922-05	11.33	DQ	0.2		1.2/2.0	2.5/4.2	3.9/6.6	5.4/9.2	6.8/11.6	8.3/14.1
		BQ	0.1		0.8	1.6	2.6	3.5	4.5	5.4
		AQ			0.4	0.8	1.3	1.8	2.2	2.7
										3.3

# DFUs with High Chemical Resistance for Particulate Removal from Gas

## Model 9922-11 High Chemical Resistance, Higher Flow DFU

### Technical Information

- 1/4" Inlet/Outlet Ports
- .02L Internal Volume
- 275°F (135°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- PVDF
- 1.4"D x 4.6"L (3.6 cm x 12 cm)



### Chemical compatibility

**Suitable:** Water or steam to 200°F (135°C); concentrated nitric, sulfuric, hydrochloric acids; chlorine (gas or liquid); sodium hypochlorite, ethylene oxide (gas or liquid); Freons; ammonia (gas, liquid, or aqueous solutions); hydrogen peroxide (all concentrations); bromine (dry and aqueous solutions); all chlorinated solvents except methylene chloride; all aromatic and aliphatic solvents; all alcohols and glycols; aniline; phenol.

**Limited Use:** Acetone, MEK, dioxane, furfural, methylene chloride.

**Unsuitable:** Water above 200°F (135°C), THF, DMF, ethylene diamine, chlorosulfonic acid, ethanolamine, pyridine, sulfur trioxide.

### Ordering Information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
9922-11-(-)	DQ	93% at 0.01μ	See pg. 12
	BQ	99.99% at 0.01μ	See pg. 12
	CQ	N/A	See pg. 12
	AQ	99.9999+ at 0.01μ	See pg. 12
	AAQ	99.99999+ at 0.01μ	See pg. 12

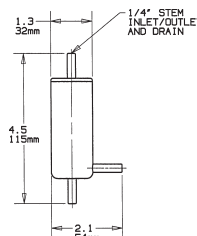
Gas Flow Rates		Filter Grade	Flow Rates, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM/NM <sup>3</sup> /h at 2 PSI Drop at Indicated Line Pressure						
Model	Volume of Housing (ml)			2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
9922-11	19.82	DQ	0.4	1.8/3.1	3.6/6.1	5.8/9.9	8.0/13.6	10.0/17.0	12.0/20.4	14.6/24.8
		BQ	0.2	0.9/1.5	1.8/3.1	2.9/4.9	4.0/6.8	5.0/8.5	6.0/10.2	7.3/12.4
		AQ		0.45/0.8	0.9/1.5	1.8/3.1	2.0/3.4	2.5/4.2	3.0/5.1	3.8/6.5

# DFUs for Liquid Removal from Gas

## Model 8833-11 DFU with Drain Port

### Technical Information

- 1/4" Inlet/Outlet Ports, Drain 1/4"
- 20mL Internal Volume
- 230°F (110°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 1.4"D x 4.6"L (3.6 cm x 12 cm)



### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.

### Ordering Information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
8833-(-)	DQ	93% at 0.01μ	N/A
	BQ	99.99% at 0.01μ	N/A
	CQ	N/A	N/A
	AQ	99.9999+ at 0.01μ	N/A
	AAQ	99.99999+ at 0.01μ	N/A

Gas Flow Rates		Filter Grade	Flow Rates, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM/NM <sup>3</sup> /h at 2 PSI Drop at Indicated Line Pressure						
Model	Volume of Housing (ml)			2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
8833-11	19.82	DQ	0.4	1.8/3.1	3.6/6.1	5.8/9.9	8.0/13.6	10.0/17.0	12.0/20.4	14.6/24.8
		BQ	0.2	0.9/1.5	1.8/3.1	2.9/4.9	4.0/6.8	5.0/8.5	6.0/10.2	7.3/12.4
		AQ		0.45/0.8	0.9/1.5	1.8/3.1	2.0/3.4	2.5/4.2	3.0/5.1	3.8/6.5

# DFUs for Particulate Removal from Liquids

## Model 9933-05 Low Flow DFU

### Technical Information

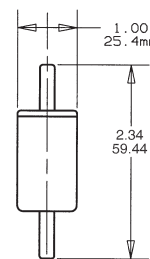
- 1/4" Inlet/Outlet Ports
- .004L Internal Volume
- 230°F (110°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 1.0"D x 3.25"L (2.5 cm x 8 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering Information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
9933-05-(-)	DQ	See pg. 6	98% at 25μ
	BQ	See pg. 6	98% at 2μ
	CQ	See pg. 6	98% at 8μ
	AQ	See pg. 6	98% at .9μ
	AAQ	See pg. 6	98% at .3μ

### Liquid Flow Rates

Model	Volume of Housing		Filter Grade	Water Flow Rates (gallons/hr) at Initial Pressure Drop	
	Gallons	Liters		1 PSI (0.07 bar)	5PSI (0.34 bar)
9933-05	0.003	0.01	DQ	12 (0.76)	30 (1.90)
			CQ	10 (0.63)	25 (1.58)
			BQ	3 (0.19)	15 (0.95)
			AQ	1.5 (0.09)	7.3 (0.46)
			AAQ	0.4 (0.03)	1.9 (0.12)

## Model 9933-11 Higher Flow DFU

### Technical Information

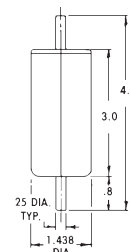
- 1/4" Inlet/Outlet Ports
- .004L Internal Volume
- 230°F (110°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 1.4"D x 4.6"L (3.6 cm x 12 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering Information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
9933-11-(-)	DQ	See page 6	98% at 25μ
	BQ	See page 6	98% at 2μ
	CQ	See page 6	98% at 8μ
	AQ	See page 6	98% at .9μ
	AAQ	See page 6	98% at .3μ

### Liquid Flow Rates

Model	Volume of Housing		Filter Grade	Water Flow Rates (gallons/hr) at Initial Pressure Drop	
	Gallons	Liters		1 PSI (0.07 bar)	5PSI (0.34 bar)
9933-11	0.003	0.01	DQ	18 (1.14)	45 (2.84)
			CQ	15 (0.95)	37 (2.33)
			BQ	5 (0.34)	26 (1.64)
			AQ	2.5 (0.16)	12 (0.76)
			AAQ	0.6 (0.04)	3.1 (0.2)

# DFUs for Particulate Removal from Liquids

## Model 8800-12 Large Capacity High Flow DFU

### Technical Information

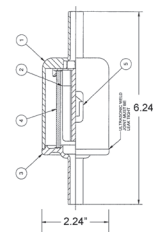
- 1/2" Inlet/Outlet Ports
- 138 mL Internal Volume
- 150°F (67°C) Maximum Temperature at 0 psig
- 50 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 2.24"D x 6.24"L (5.69 cm x 15.85 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
8800-12-(L)	DQ	See pg. 7	98% at 25μ
	BQ	See pg. 7	98% at 2μ
	CQ	See pg. 7	98% at 8μ
	AQ	See pg. 7	98% at .9μ
	AAQ	See pg. 7	98% at .3μ

Liquid Flow Rates					
Model	Volume of Housing		Filter Grade	Water Flow Rates (gallons/hr) at Initial Pressure Drop	
	Gallons	Liters		1 PSI (0.07 bar)	5PSI (0.34 bar)
8822-12	0.003	0.01	DQ	54 (3.74)	129 (8.89)
			CQ	44 (3.03)	106 (7.31)
			BQ	13 (0.90)	56 (3.86)
			AQ	6 (0.41)	26 (1.79)
			AAQ	1.4 (0.10)	6.5 (0.45)

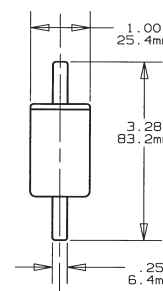


# High Chemical Resistance DFUs for Particulate Removal from Liquids

## Model 9922-05 High Chemical Resistance, Low Flow DFU

### Technical Information

- 1/4" Inlet/Outlet Ports
- 10mL Internal Volume
- 275°F (135°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- PVDF
- 1.0"D x 3.25"L (2.5 cm x 8 cm)



### Chemical compatibility

**Suitable:** Water or steam to 200°F (135°C); concentrated nitric, sulfuric, hydrochloric acids; chlorine (gas or liquid); sodium hypochlorite, ethylene oxide (gas or liquid); Freons; ammonia (gas, liquid, or aqueous solutions); hydrogen peroxide (all concentrations); bromine (dry and aqueous solutions); all chlorinated solvents except methylene chloride; all aromatic and aliphatic solvents; all alcohols and glycols; aniline; phenol.

**Limited Use:** Acetone, MEK, dioxane, furfural, methylene chloride.

**Unsuitable:** Water above 200°F (135°C), THF, DMF, ethylene diamine, chlorosulfonic acid, ethanolamine, pyridine, sulfur trioxide.

### Ordering Information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
9922-05-( )	DQ	See pg. 8	98% at 25μ
	BQ	See pg. 8	98% at 2μ
	CQ	See pg. 8	98% at 8μ
	AQ	See pg. 8	98% at .9μ
	AAQ	See pg. 8	98% at .3μ

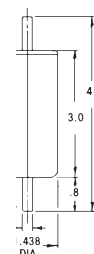
### Liquid Flow Rates

Model	Volume of Housing		Filter Grade	Water Flow Rates (gallons/hr) at Initial Pressure Drop	
	Gallons	Liters		1 PSI (0.07 bar)	5PSI (0.34 bar)
9922-05	0.003	0.01	DQ	12 (0.76)	30 (1.90)
			CQ	10 (0.63)	25 (1.58)
			BQ	3 (0.19)	15 (0.95)
			AQ	1.5 (0.09)	7.3 (0.46)
			AAQ	0.4 (0.03)	1.9 (0.12)

## Model 9922-11 High Chemical Resistance, Higher Flow DFU

### Technical Information

- 1/4" Inlet/Outlet Ports
- .02L Internal Volume
- 275°F (135°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- PVDF
- 1.4"D x 4.6"L (3.6 cm x 12 cm)



### Chemical compatibility

**Suitable:** Water or steam to 200°F (135°C); concentrated nitric, sulfuric, hydrochloric acids; chlorine (gas or liquid); sodium hypochlorite, ethylene oxide (gas or liquid); Freons; ammonia (gas, liquid, or aqueous solutions); hydrogen peroxide (all concentrations); bromine (dry and aqueous solutions); all chlorinated solvents except methylene chloride; all aromatic and aliphatic solvents; all alcohols and glycols; aniline; phenol.

**Limited Use:** Acetone, MEK, dioxane, furfural, methylene chloride.

**Unsuitable:** Water above 200°F (135°C), THF, DMF, ethylene diamine, chlorosulfonic acid, ethanolamine, pyridine, sulfur trioxide.

### Ordering Information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
9922-11-( )	DQ	93% at 0.01μ	See page 6
	BQ	99.99% at 0.01μ	See page 6
	CQ	N/A	See page 6
	AQ	99.9999+ at 0.01μ	See page 6
	AAQ	99.99999+ at 0.01μ	See page 6

### Liquid Flow Rates

Model	Volume of Housing		Filter Grade	Water Flow Rates (gallons/hr) at Initial Pressure Drop	
	Gallons	Liters		1 PSI (0.07 bar)	5PSI (0.34 bar)
9922-11	0.003	0.01	DQ	18 (1.14)	45 (2.84)
			CQ	15 (0.95)	37 (2.33)
			BQ	5 (0.34)	26 (1.64)
			AQ	2.5 (0.16)	12 (0.76)
			AAQ	0.6 (0.04)	3.1 (0.2)

# DFU with Barbed Connections for Gases and Liquids

## Model 4433-05 DFU with Integral Barb Fittings

### Technical Information

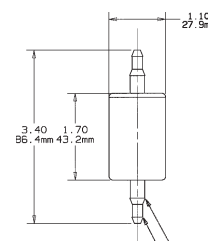
- 1/4" Inlet/Outlet Ports 1st Tier; 3/8" Inlet/Outlet Ports 2nd Tier
- 10mL Internal Volume
- 230°F (110°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 1.0"D x 3.25"L (2.5 cm x 8 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering Information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
4433-05-( )	DQ	93% at 0.01μ	98% at 25μ
	BQ	99.99% at 0.01μ	98% at 2μ
	CQ	N/A	98% at 8μ
	AQ	99.9999+ at 0.01μ	98% at .9μ
	AAQ	99.99999+ at 0.01μ	98% at .3μ

Liquid Flow Rates					
Model	Volume of Housing		Filter Grade	Water Flow Rates (gallons/hr) at Initial Pressure Drop	
	Gallons	Liters		1 PSI (0.07 bar)	5PSI (0.34 bar)
4433-05	0.003	0.01	DQ	12 (0.76)	30 (1.90)
			CQ	10 (0.63)	25 (1.58)
			BQ	3 (0.19)	15 (0.95)
			AQ	1.5 (0.09)	7.3 (0.46)
			AAQ	0.4 (0.03)	1.9 (0.12)

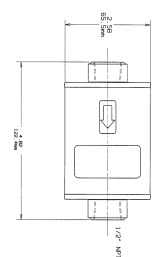
Gas Flow Rates										
Model	Volume of Housing (ml)	Filter Grade	Flow Rates, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM at 2 PSI Drop at Indicated Line Pressure, PSIG (1)/BARG						
				2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
4433-05	11.33	DQ	0.2	1.2/2.0	2.5/4.2	3.9/6.6	5.4/9.2	6.8/11.6	8.3/14.1	10.1/17.2
		BQ	0.1	0.8/1.4	1.6/2.7	2.6/4.4	3.5/6.0	4.5/7.6	5.4/9.0	6.6/11.21
		P	0.2	1.2/2.0	2.5/4.2	3.9/6.6	5.4/9.2	6.8/11.6	8.3/14.1	10.1/17.2

# High Flow DFU with Female NPT Fittings for Gases and Liquids

## Model 7825 DFU - Highest Flow

### Technical Information

- 1/4" Inlet/Outlet Ports (FNPT)
- 125°F (52°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Polypropylene
- 1.0"D x 3.25"L (2.5 cm x 8 cm)



### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.

### Ordering Information

- 1) Order housing and choose grade based on required efficiency.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Gas Efficiency	Liquid Efficiency
7825-(L)	DQ	93% at 0.01μ	98% at 25μ
	BQ	99.99% at 0.01μ	98% at 2μ
	CQ	N/A	98% at 8μ
	AQ	99.9999+ at 0.01μ	98% at .9μ
	AAQ	99.99999+ at 0.01μ	98% at .3μ

### Liquid Flow Rates

Model	Volume of Housing		Filter Grade	Water Flow Rates (gallons/hr) at Initial Pressure Drop	
	Gallons	Liters		1 PSI (0.07 bar)	5PSI (0.34 bar)
7825	0.003	0.01	DQ	12 (0.76)	30 (1.90)
			CQ	10 (0.63)	25 (1.58)
			BQ	3 (0.19)	15 (0.95)
			AQ	1.5 (0.09)	7.3 (0.46)
			AAQ	0.4 (0.03)	1.9 (0.12)

### Gas Flow Rates

Model	Volume of Housing (ml)	Filter Grade	Flow Rates, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM at 2 PSI Drop at Indicated Line Pressure, PSIG/BARG						
				2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
7825		DQ	0.2	5/8.5	11/18.7	16.0/27.2	20.0/34.0	25.0/42.5	27.0/45.9	31.0/52.7
		BQ	0.1	3.5/5.9	7.1/12.1	10.4/17.7	13.0/20.4	16.25/27.6	17.55/29.8	20.1/34.2

# Balston Disposable Adsorption Units

For vapor removal from compressed air and other gases

Disposable Adsorption Units (DAUs) contain a bed of adsorbent granules. Utilizing a wide choice of adsorbents, the DAUs selectively remove vapors from air and other gases.

Because the adsorbed vapor remains trapped in the solid bed, the DAU has a fixed upper limit of total weight of vapor which can be captured. It is usually not feasible to regenerate the filter when it has reached its adsorption limit. DAUs should be used only when small quantities of vapor are to be removed.



Balston disposable adsorption units (DAU) for vapor removal from compressed air and other gases.

## What to consider when using adsorbent cartridges

- 1 Solid adsorbents are effective only for vapors. Since liquids will damage or inactivate most solid adsorbents, the DAU must be preceded by an efficient coalescing filter.
- 2 Adsorbent cartridges have a limited holding capacity. When the adsorption capacity is reached, no further adsorption occurs. The limiting capacity, or “break-through” point, is not sharply defined, and the exit vapor concentration will increase rapidly as saturation is approached. To avoid unwanted vapor contaminants downstream, it is necessary to change the adsorbent cartridge well before it has reached its ultimate adsorption capacity.
- 3 Adsorption is reversible, if operating conditions change, a vapor may desorb rather than adsorb. For example, if a temporary surge in vapor impurity concentration causes a relatively high concentration to be adsorbed on the solid, a subsequent decrease in inlet vapor composition will result in desorption of vapor from the solid to the gas stream.
- 4 The efficiency of an adsorbent for a given vapor depends upon the specific operating conditions. Therefore, again in contrast to filtration, it is not possible to assign a single efficiency rating to an adsorbent. While it is not possible to predict or guarantee an adsorption efficiency for any specific set of conditions, it is possible to enhance the conditions beneficial to adsorption and avoid conditions which interfere with adsorption. Conditions which aid adsorption are: low temperature, high pressure, low flow rate, and absence of competing vapors (particularly water vapor).

Adsorbent	Grade	Use
Carbon	000	Compressor oil vapors, C <sub>5</sub> and heavier hydrocarbons, aromatics, oxygenated hydrocarbons, chlorinated organics, freons, carbon disulfide.
Silica gel	101	Water vapor only.
Molecular sieve type 13X	103	Cost C <sub>4</sub> and lighter hydrocarbons, ethylene, propylene, acetylene, ethylene oxide, ammonia, mercaptans, sulfur hexafluoride, triethylamine and smaller amines.
Mixed sodium & calcium hydroxides	107	All acidic gases, including sulfur trioxide, sulfur dioxide, nitrogen dioxide, carbon dioxide, hydrogen sulfide, hydrogen chloride, phosphorus trichloride, boron trifluoride

Notes:

2 In DAU 9933-05-107 and DAU 9933-11-107, color indicator turns violet when adsorbent is spent.

3 In DAU 9933-05-101 and 9933-11-101, adsorbent turns translucent when vapor capacity is reached.

4 Maximum operating temperature is 180°F.

# DAUs for Particulate Removal from Compressed Air and Most Gases

## Model 9933-05 Low Flow DAU

### Technical Information

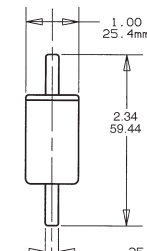
- 1/4" Inlet/Outlet Ports
- .004L Internal Volume
- 230°F (110°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 1.0"D x 3.25"L (2.5 cm x 8 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering information

- 1) Order housing and choose grade based on adsorbent choice.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Material
9933-05-( )	000	Carbon
	101	Silica Gel
	103	Molecular Sieve, Type 13X
	107	Mixed Sodium & Calcium Hydroxides

Gas Flow Rates		DAU Grade	Flow Rates, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM at 2 PSI Drop at Indicated Line Pressure, PSIG/BARG						
Model	Volume of Housing (ml)			2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
9933-05	11.33	All	0.2	0.5/0.8	1.2/2.0	1.9/3.2	2.6/4.4	3.3/5.6	4.0/6.8	4.7/8.0

## Model 9933-11 Higher Flow DAU

### Technical Information

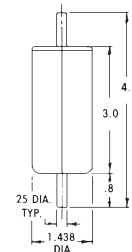
- 1/4" Inlet/Outlet Ports
- .02L Internal Volume
- 230°F (110°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 1.4"D x 4.6"L (3.6 cm x 12 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering information

- 1) Order housing and choose grade based on adsorbent choice.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Material
9933-11-( )	000	Carbon
	101	Silica Gel
	103	Molecular Sieve, Type 13X
	107	Mixed Sodium & Calcium Hydroxides

Gas Flow Rates		DAU Grade	Flow Rates, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM at 2 PSI Drop at Indicated Line Pressure, PSIG/BARG						
Model	Volume of Housing (ml)			2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
9933-11	19.82	All	0.4	0.7/1.2	1.7/2.9	2.5/4.2	3.7/6.3	4.3/7.3	5.0/8.5	5.7/9.7



# DAUs with High Chemical Resistance for Particulate Removal from Gas

## Model 9922-05 High Chemical Resistance, Low Flow DAU

### Technical Information

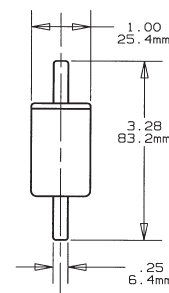
- 1/4" Inlet/Outlet Ports
- 10mL Internal Volume
- 275°F (135°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- PVDF
- 1.0"D x 3.25"L (2.5 cm x 8 cm)

### Chemical compatibility

**Suitable:** Water or steam to 200°F (135°C); concentrated nitric, sulfuric, hydrochloric acids; chlorine (gas or liquid); sodium hypochlorite, ethylene oxide (gas or liquid); Freons; ammonia (gas, liquid, or aqueous solutions); hydrogen peroxide (all concentrations); bromine (dry and aqueous solutions); all chlorinated solvents except methylene chloride; all aromatic and aliphatic solvents; all alcohols and glycols; aniline; phenol.

**Limited Use:** Acetone, MEK, dioxane, furfural, methylene chloride.

**Unsuitable:** Water above 200°F (135°C), THF, DMF, ethylene diamine, chlorosulfonic acid, ethanolamine, pyridine, sulfur trioxide.



### Ordering information

- 1) Order housing and choose grade based on adsorbent choice.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Material
9905-05-( )	000	Carbon
	101	Silica Gel
	103	Molecular Sieve, Type 13X
	107	Mixed Sodium & Calcium Hydroxides

Gas Flow Rates		DAU Grade	Flow Rates, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM at 2 PSI Drop at Indicated Line Pressure, PSIG/BARG						
Model	Volume of Housing (ml)			2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
9922-05	11.33	All	0.2	0.5/0.8	1.2/2.0	1.9/3.2	2.6/4.4	3.3/5.6	4.0/6.8	4.7/8.0

## Model 9922-11 High Chemical Resistance, Higher Flow DAU

### Technical Information

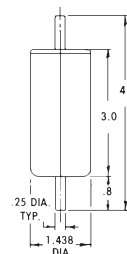
- 1/4" Inlet/Outlet Ports
- .02L Internal Volume
- 275°F (135°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- PVDF
- 1.4"D x 4.6"L (3.6 cm x 12 cm)

### Chemical compatibility

**Suitable:** Water or steam to 200°F (135°C); concentrated nitric, sulfuric, hydrochloric acids; chlorine (gas or liquid); sodium hypochlorite, ethylene oxide (gas or liquid); Freons; ammonia (gas, liquid, or aqueous solutions); hydrogen peroxide (all concentrations); bromine (dry and aqueous solutions); all chlorinated solvents except methylene chloride; all aromatic and aliphatic solvents; all alcohols and glycols; aniline; phenol.

**Limited Use:** Acetone, MEK, dioxane, furfural, methylene chloride.

**Unsuitable:** Water above 200°F (135°C), THF, DMF, ethylene diamine, chlorosulfonic acid, ethanolamine, pyridine, sulfur trioxide.



### Ordering information

- 1) Order housing and choose grade based on adsorbent choice.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Material
9922-11-( )	000	Carbon
	101	Silica Gel
	103	Molecular Sieve, Type 13X
	107	Mixed Sodium & Calcium Hydroxides

Gas Flow Rates		DAU Grade	Flow Rates, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM at 2 PSI Drop at Indicated Line Pressure, PSIG/BARG						
Model	Volume of Housing (ml)			2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
9922-11	19.82	All	0.4	0.7/1.2	1.7/2.9	2.5/4.2	3.7/6.3	4.3/7.3	5.0/8.5	5.7/9.7

# DAU with Barbed Connections for Gases

## Model 4433-05 DAU with Integral Barb Fittings

### Technical Information

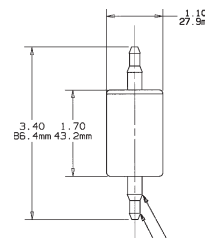
- 1/4" Inlet/Outlet Ports 1st Tier; 3/8" Inlet/Outlet Ports 2nd Tier
- 10mL Internal Volume
- 230°F (110°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Nylon
- 1.0"D x 3.25"L (2.5 cm x 8 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering information

- 1) Order housing and choose grade based on adsorbent choice.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Material
4433-05-( )	000	Carbon
	101	Silica Gel
	103	Molecular Sieve, Type 13X
	107	Mixed Sodium & Calcium Hydroxides

Gas Flow Rates			DAU Grade	Flow Rates, CFM at 10" Water Pressure Drop, 0 psig	Flow Rates, SCFM at 2 PSI Drop at Indicated Line Pressure, PSIG/BARG						
Model	Volume of Housing (ml)				2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
4433-05	11.33		All	0.2	0.5/0.8	1.2/2.0	1.9/3.2	2.6/4.4	3.3/5.6	4.0/6.8	4.7/8.0

# High Flow DAU with Female NPT Fittings for Gases and Liquids

## Model 7825 DFU - Highest Flow

### Technical Information

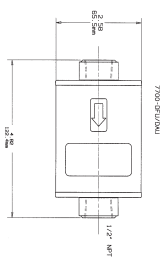
- 1/4" Inlet/Outlet Ports (FNPT)
- 125°F (52°C) Maximum Temperature at 0 psig
- 125 psig (8.62 barg) at 110°F (43°C)
- Polypropylene
- 1.0"D x 3.25"L (2.5 cm x 8 cm)

### Chemical compatibility

**Suitable:** Water to 158°F (70°C); benzene, toluene, other aromatic hydrocarbons; hydrocarbon solvents and fuels, perchloroethylene; trichloroethylene, nitric acid (to 10%); sulfuric acid (to 40%); hydrochloric acid (to 10%); most salt solutions; sodium and potassium hydroxide (to 50%).

**Limited Use:** Water at 158°F (70°C); acetone; MEK, acetaldehyde; ammonia (to 25%).

**Unsuitable:** Water above 176°F (80°C); alcohols; glycols, phenol; aniline; DMF; concentrated acids; chlorine.



### Ordering information

- 1) Order housing and choose grade based on adsorbent choice.
- 2) Add an "A" before the housing to order in 100 bulk pack.
- 3) Add a "C" before the housing to order in 500 bulk pack.

Housing	Grade	Material
7525-06-( )	000	Carbon
	101	Silica Gel
	103	Molecular Sieve, Type 13X
	107	Mixed Sodium & Calcium Hydroxides

Gas Flow Rates			Flow Rates, CFM		Flow Rates, SCFM						
Model	Volume of Housing (ml)	DAU Grade	at 10" Water Pressure Drop, 0 psig		at 2 PSI Drop at Indicated Line Pressure, PSIG/BARG						
7825-06		All	0.2		2 psig	20 psig	40 psig	60 psig	80 psig	100 psig	125 psig
					3.5/5.9	7.25/12.3	10.3/17.5	13.0/22.1	15.5/26.3	17.3/29.4	19.5/33.1









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