



## **Volumetric** Product Catalogue

# Innovative Dispensing Solutions

- ( An ongoing commitment to meeting individual customer needs
- Worldwide support in multiple languages
- Worldwide knowledge and compliance with local regulatory requirements.
- 100% production conformity every unit tested before despatch
- Extensive expertise in corporate customisation
- Product design service & rapid prototype production
- Ocomprehensive after-sales back-up & support

### **Volumetric Injectors**

#### The advantages

Hydro

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systems europe

#### **Precise Additive Injection**

Proportional positive displacement ensures that just the right amount of chemical is injected each and every time, regardless of pressure and flow. An adjustable ratio sleeve allows you to change the percentages— quickly and easily—to meet your injection needs. Chemical costs are reduced because of less waste in the injection process.

#### Safe and cost effective

The non-electric Dosmatic injectors reduce the liability risk concerns associated with traditional electrical pumps. The Dosmatic injectors use a patented oneway gasket. Only the mixing chamber and the lower end are exposed to the chemical. This prolongs the life of the motor, and the innovative mixing chamber design also ensures a thorough and precise mixing of the fluid and injected chemical. Typically, nonelectric injectors reduce start-up costs by 30-60% over traditional electric injectors.

#### Durable body construction and ease of operation

The body construction has engineered proprietary composite material greater than PVDF, which withstands severe weather, the chemicals used for injection, and higher operating pressures. A built-in On/Off bypass allows you to stop the injection—but not the system, and an optional remote discharge is available for the whole product line.



## Volumetric

Fluid (water)-driven volumetric injectors work on the principle of proportional positive displacement, ensuring that just the right amount of chemical is injected, regardless of pressure and flow, into the water flow.

Unlike traditional electric pumps, volumetric injectors eliminate the need for electricity and can operate in remote areas. They are easy to install and maintain -

making them ideal for low-flow injection applications.

Our volumetric injectors, for cleaning & hygiene applications, work in a piston configuration. The water powered motor drives the action of the chemical pump, drawing the concentrate in to an integral mixing chamber and then to the outflow. The pump offers variable dilution ratios, enabling the user to determine the correct percentage of concentrate to water volume.



#### **Overview**

The SuperDos mid-high flow, fluid (water)-driven proportional injectors offer a low cost alternative to traditional electric technology.

#### **General Specifications**

Housing	Proprietary Engineered Composite Material
Dosing Accuracy	+/- 10% of ratio
Repeatability	+/- 3% of ratio
Maximum Temp.	100°F (38°C)
Minimum Temp.	34°F (1°C)
Maximum vertical suction of concentrate	3.6 m
Maximum horizontal suction of concentrate	15 m
Self-Priming	Yes
Seal Material Available: *Contact your representative for specific chemical information	Aflas Viton EPDM PAA resistant Teflon Coated
Recommended Accessories	140 mesh (104 micron) filter, check valve, pressure regulator, flow restrictor.





#### **Models & Specifications**

				Dilution	
Model	Model #	Operating pressure (Bar)	Water Flow (lit./hr)	%	Ratio
SuperDos 15TF 0.3%	113727R	0.30 - 4.1	30 - 3,400	0.025 - 0.3	1:4000 - 1:333
SuperDos 15TF 2.5%	113702	0.30 - 4.1	30 - 3,400	0.2 - 2.5	1:500 - 1:40
SuperDos 15TF 2.5%	113702WSP	0.30 - 4.1	30 - 3,400	0.2 - 2.5	1:500 - 1:40
SuperDos 15TF 5%	113703	0.30 - 4.1	30 - 3,400	0.4 - 5.0	1:250 - 1:20
SuperDos 20 0.3%	113728	0.34 - 6.9	34 - 4,500	0.025 - 0.3	1:4000 - 1:333
SuperDos 20 0.3% (Peracetic acid)	113728K	0.34 - 6.9	34 - 4,500	0.025 - 0.3	1:4000 - 1:333
SuperDos 20 2.5%	113705	0.34 - 6.9	34 - 4,500	0.2 - 2.5	1:500 - 1:40
SuperDos 20 2.5% WSP	113705WSP	0.34 - 6.9	34 - 4,500	0.2 - 2.5	1:500 - 1:40
SuperDos 20 5%	113706	0.34 - 6.9	34 - 4,500	0.4 - 5.0	1:250 - 1:20
SuperDos 20 10%	113707	0.34 - 4.5	34 - 3,000	2.0 - 10.0	1:50 - 1:10
SuperDos 30 0.3% (Peracetic acid)	113729K	0.34 - 6.9	34 - 6,800	0.025 - 0.3	1:4000 - 1:333
SuperDos 30 0.3%	113708	0.34 - 6.9	34 - 6.800	0.025 - 0.3	1:4000 - 1:333
SuperDos 30 2.5%	113709	0.34 - 6.9	34 - 6.800	0.2 - 2.5	1:500 - 1:40
SuperDos 30 2.5% WSP	113709WSP	0.34 - 6.9	34 - 6.800	0.2 - 2.5	1:500 - 1:40
SuperDos 30 5%	113710	0.34 - 6.9	34 - 6.800	0.4 - 5.0	1:250 - 1:20
SuperDos 45 0.3% (Peracetic acid)	113730K	0.34 - 6.9	113 - 8,000	0.025 - 0.3	1:4000 - 1:333
SuperDos 45 0.3%	113710R	0.34 - 6.9	113 - 8,000	0.025 - 0.3	1:4000 - 1:333
SuperDos 45 2.5%	113712	0.34 - 6.9	113 - 8,000	0.2 - 2.5	1:500 - 1:40
SuperDos 45 5%	113715	0.34 - 5.5	113 - 8,000	0.4 - 5.0	1:250 - 1:20

#### Accessories



#### Twist II Clean Filter

TWISTIICLEAN is an easy to use, flushable sediment filter. It can remove sand, sediment, and organics from the incoming water supply.

TWISTIICLEAN removes the need for manual cleaning and does not require the water supply to be turned off.



Mobile cart system for use with MiniDos and SuperDos injectors



#### Overview

The MiniDos low-mid flow, fluid (water)-driven proportional injectors offer a low cost alternative to traditional, non-electric technology. These injectors are compact and offer the widest range of injection ratios.

Unlike traditional electric pumps, the MiniDos injectors eliminate the need for electricity and can operate in remote areas. They are easy to install and maintain; making them ideal for low-mid-flow injection applications.

#### **General Specifications**



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hDos

Housing	Proprietary Engineered Composite Material	Self-Priming	Yes
Dosing Accuracy	+/- 10% of ratio	Seal Material Available: *Contact your representative for specific chemical information	Aflas- Alkaline concentrates Viton - Acids, oils & pesticides EPDM - Base chemicals
Repeatability	+/- 3% of ratio	Recommended Accessories	140 mesh (104 micron) filter, check valve, pressure regulator, flow restrictor.
Maximum Temp.	100°F (38°C)		
Minimum Temp.	34°F (1°C)		
Maximum vertical suction of concentrate	3.6 m		
Maximum horizontal suction of concentrate	15 m		

#### **Models & Specifications**

				Di	lution
Model	Model #	Operating pressure (Bar)	Water Flow (lit./hr.)	%	Ratio
MiniDos 0.4%	112609	0.5 - 9.5	30 - 2,500	0.025 - 0.4	1:4000 - 1:250
MiniDos 0.4% (Peracetic acid)	112609K	0.5 - 9.5	30 - 2,500	0.025 - 0.4	1:4000 - 1:250
MiniDos 1%	112601	0.5 - 9.5	30 - 2,500	0.2 - 1.0	1:500 - 1:100
MiniDos 2.5%	112603	0.5 - 9.5	30 - 2,500	0.5 - 2.5	1:200 - 1:40
MiniDos 5%	112605	0.5 - 9.5	30 - 2,500	1.0 - 5.0	1:100 - 1:20
MiniDos 10%	112607	0.5 - 4.5	30 - 2,200	2.0 - 10.0	1:50 - 1:10
MiniDos 20%	112621	0.5 - 4.5	30 - 1,600	4.0 - 20.0	1:25 - 1:5





#### **Overview**

The MicroDos low-flow, fluid (water)-driven proportional injector offers a low cost alternative to traditional, electric technology.

One of the smallest injectors on the market, the compact dimensions make it ideal for applications requiring tight installations (approx. 3"d x 5"w x 9h").

#### **General Specifications**

Housing	Proprietary engineered composite material
Dosing	+/- 10%
Repeatibility	+/-3%
Fluid max. temp.	100°F (38°C)
Fluid min. temp.	34°F (1°C)
Max. vertical suction of concentrate	4 m
Max. horizontal suction of concentrate	15 m
Selp-priming	Yes
Seal material available*:	Aflas- Alkaline concentrates Viton - Acids, oils & pesticides EPDM - Base chemicals

#### **Models & Specifications**

			Dilution		ution
Model	Model #	Operating pressure (Bar)	Water Flow (lit./hr.)	%	Ratio
MicroDos 2%	116381	0.5 - 6.0	50 - 795	1 - 2.0	1:100 - 1:50
MicroDos 5%	116383	0.5 - 6.0	50 - 795	2.0 - 5.0	1:50 - 1:20
MicroDos 1% Fixed	116384	0.5 - 6.0	50 - 795	1.00	1:100
MicroDos 2% Fixed	116382	0.5 - 6.0	50 - 795	2.00	1:50
MicroDos 10% Fixed	116385	0.5 - 4.5	50 - 795	10.00	1:10

#### Injection ratio setting



The injection rate is set by lining up the ratio sleeve with the desired ratio on the scale. The amount of injected concentrate is proportionnal to the amount of water coming into the Dosmatic: i.e. adjustment at 1% = 1:100 = 1 volume of concentrate + 100 volumes of water entering the injector.

Check your manual for specific settings by model.

#### Markets

Animal Health, Bio-Decontamination, Chemical Manufacturing and Supply, Food Processing, Horticulture, Metal Processing, Odor Control, Pest Control, Printed Circuits Boards, Printing, Hygiene & Cleaning, Vehicle Wash, Water and Wastewater Treatment...

#### **Principle applications**

Chlorination, Cleaning, Cutting Fluids, Degreasing, Disinfecting, Fertigation, Medication, PH/Th Correction, Pesticides, Soaps & Foams, Weed Control...

#### Installation







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