Van Borselen
FILTERS

Laboratory Consumables Catalog

Syringe Filters

Syringe Filters

Van Borselen Filters color-coded syringe filters are specifically designed to filter samples for chromatographic analysis, removing particles and microorganisms from aqueous and organic solvents.

Selection Guide

Aqueous	PES		High throughput, low protein adsorption
	MCE		Widely used in water quality analysis and detection
	CA		For aqueous and mild organic solutions with low protein binding
Organic	Nylon		Compatible with aqueous and organic solutions; not alkali resistant
	Hydrophilic PTFE		Strong acid and alkali resistance
	Hydrophilic PVDF		Low protein binding, suitable for filtration of biological sample
Prefiltration	PP		High dirt holding capacity, wide chemical compatibility
	GF		Filtration of coarse particles or viscous solutions
Air/ Gas	Hydrophobic PTFE		Widely used in air/ gas filtration and venting
	Hydrophobic PVDF		Designed for venting and gas filtration, protecting systems from atmospheric moisture

PES Syringe Filters

Aqueous Solutions

Typical Application

PES syringe filters feature a hydrophilic membrane and are ideally suited for the filtration of aqueous solutions. Due to their low protein adsorption and high flow rates, they are commonly used for sterile filtration of buffers, tissue culture media and protein solutions. Available in multiple pore sizes, diameters, and sterile or non-sterile versions.

Ordering Information

Part No.	Material	Diameter	Micron	Sterile/Non Sterile1
LSCHLPES13-0201S-S	Hydrophilic PES	13	[0.22+0.1] Double layer	Sterile
LSCHLPES13-0402-A	Hydrophilic PES	13	[0.45+0.2] Double Layer	Non-sterile
LSCHLPES13-0602S-S	Hydrophilic PES	13	[0.65+0.2] Double Layer	Sterile
LSCHLPES13-0804S-S	Hydrophilic PES	13	[0.8+0.45] Double Layer	Sterile
LSCHLPES13-0804S-A	Hydrophilic PES	13	[0.8+0.45] Double Layer	Non-sterile
LSCHLPES13-001S-N	Hydrophilic PES	13	0.1 µm	Non-sterile
LSCHLPES13-002S-S	Hydrophilic PES	13	0.2 µm	Sterile
LSCHLPES13-002S-N	Hydrophilic PES	13	0.2 µm	Non-sterile
LSCHLPES13-004S-N	Hydrophilic PES	13	0.45 µm	Non-sterile
LSCHLPES13-006S-N	Hydrophilic PES	13	0.65 µm	Non-sterile
LSCHLPES13-008S-N	Hydrophilic PES	13	0.8 µm	Non-sterile
LSCHLPES13-012S-N	Hydrophilic PES	13	1.2 µm	Non-sterile
LSCHLPES13-050S-N	Hydrophilic PES	13	5.0 µm	Non-sterile
LSCHLPES25-0201S-S	Hydrophilic PES	25	[0.2+0.1] Double Layer	Sterile
LSCHLPES25-0402S-A	Hydrophilic PES	25	[0.4+0.2] Double Layer	Non-sterile
LSCHLPES25-0602S-S	Hydrophilic PES	25	[0.6+0.2] Double Layer	Sterile
LSCHLPES25-0804S-S	Hydrophilic PES	25	[0.8+0.4] Double Layer	Sterile
LSCHLPES25-0804S-A	Hydrophilic PES	25	[0.8+0.4] Double Layer	Non-sterile
LSCHLPES25-001S-N	Hydrophilic PES	25	0.1 µm	Non-sterile
LSCHLPES25-002S-S	Hydrophilic PES	25	0.2 µm	Sterile
LSCHLPES25-002S-N	Hydrophilic PES	25	0.2 µm	Non-sterile
LSCHLPES25-004S-N	Hydrophilic PES	25	0.45 µm	Non-sterile
LSCHLPES25-006S-N	Hydrophilic PES	25	0.65 µm	Non-sterile
LSCHLPES25-008S-N	Hydrophilic PES	25	0.8 µm	Non-sterile
LSCHLPES25-012S-N	Hydrophilic PES	25	1.2 µm	Non-sterile
LSCHLPES25-050S-N	Hydrophilic PES	25	5.0 µm	Non-sterile
LSCHLPES33-0201S-S	Hydrophilic PES	33	[0.2+0.1] Double Layer	Sterile
LSCHLPES33-0402S-A	Hydrophilic PES	33	[0.4+0.2] Double Layer	Non-sterile
LSCHLPES33-0602S-S	Hydrophilic PES	33	[0.65+0.2] Double Layer	Sterile
LSCHLPES33-0804S-S	Hydrophilic PES	33	[0.8+0.4] Double Layer	Sterile
LSCHLPES33-0804S-A	Hydrophilic PES	33	[0.8+0.4] Double Layer	Non-sterile
LSCHLPES33-001S-N	Hydrophilic PES	33	0.1 µm	Non-sterile
LSCHLPES33-002S-S	Hydrophilic PES	33	0.22 µm	Sterile
LSCHLPES33-002S-N	Hydrophilic PES	33	0.22 µm	Non-sterile
LSCHLPES33-004S-N	Hydrophilic PES	33	0.45 µm	Non-sterile
LSCHLPES33-006S-N	Hydrophilic PES	33	0.65 µm	Non-sterile
LSCHLPES33-008S-S	Hydrophilic PES	33	0.8 µm	Sterile
LSCHLPES33-008S-N	Hydrophilic PES	33	0.8 µm	Non-sterile
LSCHLPES33-012S-S	Hydrophilic PES	33	1.2 µm	Sterile
LSCHLPES33-012S-N	Hydrophilic PES	33	1.2 µm	Non-sterile
LSCHLPES33-050S-N	Hydrophilic PES	33	5.0 µm	Non-sterile

PES Syringe Filters

Aqueous Solutions

Ordering Information

Part No.	Material	Diameter	Micron	Sterile/Non Sterile1
LSMHLPES63-002HB-S	Hydrofiel PES	63	0.2 µm	Sterile
LSMHLPES63-004HB-S	Hydrofiel PES	63	0.45 µm	Sterile
LSMHLPES63-006HB-S	Hydrofiel PES	63	0.65 µm	Sterile
LSMHLPES63-002NP-S	Hydrofiel PES	63	0.2 µm	Sterile
LSMHLPES63-004NP-S	Hydrofiel PES	63	0.45 µm	Sterile
LSMHLPES63-006NP-S	Hydrofiel PES	63	0.65 µm	Sterile
LSMHLPES63-002L-S	Hydrofiel PES	63	0.2 µm	Sterile
LSMHLPES63-004L-S	Hydrofiel PES	63	0.45 µm	Sterile
LSMHLPES63-006L-S	Hydrofiel PES	63	0.65 µm	Sterile

Aqueous Solutions

Mixed Cellulose Ester
Syringe Filters

Typical Application

MCE syringe filters are an economical solution for the filtration of aqueous solutions. They provide high flow rates and effective particulate removal, making them suitable for routine laboratory use and general analytical filtration.

Ordering Information

Part No.	Material	Diameter	Micron	Sterile/Non Sterile1
LSCHLMCE13-002S-N	Hydrophilic Mixed Cell. Ester	13	0.2 µm	Non-sterile
LSCHLMCE13-004S-N	Hydrophilic Mixed Cell. Ester	13	0.45 µm	Non-sterile
LSCHLMCE13-008S-N	Hydrophilic Mixed Cell. Ester	13	0.8 µm	Non-sterile
LSCHLMCE25-002S-N	Hydrophilic Mixed Cell. Ester	25	0.2 µm	Non-sterile
LSCHLMCE25-004S-N	Hydrophilic Mixed Cell. Ester	25	0.45 µm	Non-sterile
LSCHLMCE25-008S-N	Hydrophilic Mixed Cell. Ester	25	0.8 µm	Non-sterile
LSCHLMCE33-002S-N	Hydrophilic Mixed Cell. Ester	33	0.2 µm	SNon-sterile
LSCHLMCE33-004S-N	Hydrophilic Mixed Cell. Ester	33	0.45 µm	Non-sterile
LSCHLMCE33-008S-N	Hydrophilic Mixed Cell. Ester	33	0.8 µm	Non-sterile

Aqueous Solutions

Hydrophilic Cellulose Acetate Syringe Filters

Typical Application

Cellulose acetate syringe filters are hydrophilic and suitable for the filtration of aqueous and mild organic solutions. Due to their low protein binding, they are commonly used for biological samples and analytical applications where sample integrity is critical.

Ordering Information

Part No.	Material	Diameter	Micron	Sterile/Non Sterile1
LSCHLCEA13-002S-N	Hydrophilic Cell.Acetaat	13	0.2 µm	Non-sterile
LSCHLCEA13-004S-N	Hydrophilic Cell.Acetaat	13	0.45 µm	Non-sterile
LSCHLCEA25-002S-N	Hydrophilic Cell.Acetaat	25	0.2 µm	Non-sterile
LSCHLCEA25-004S-N	Hydrophilic Cell.Acetaat	25	0.45 µm	Non-sterile
LSCHLCEA33-002S-N	Hydrophilic Cell.Acetaat	33	0.2 µm	Non-sterile
LSCHLCEA33-004S-N	Hydrophilic Cell.Acetaat	33	0.45 µm	Non-sterile

Organic Solutions

Hydrophilic PVDF
Syringe Filters

Typical Application

Hydrophilic PVDF syringe filters are designed for the efficient filtration and clarification of aqueous and biological samples, such as protein solutions. The naturally hydrophilic PVDF membrane provides low protein binding and high flow rates, ensuring reliable and reproducible filtration results. These syringe filters are available in both non-sterile versions for routine laboratory and analytical applications, and sterile, individually packed versions for sterility-critical processes where contamination must be prevented.

Ordering Information

Part No.	Material	Diameter	Micron	Sterile/Non Sterile1
LSCHLPVD13-0402S-A	Hydrophilic PVDF	13	[0.45+0.2] Double Layer	Non-sterile
LSCHLPVD13-0602S-S	Hydrophilic PVDF	13	[0.65+0.2] Double Layer	Sterile
LSCHLPVD13-1004S-A	Hydrophilic PVDF	13	[1.0+0.4] Double Layer	Non-sterile
LSCHLPVD13-0014S-S	Hydrophilic PVDF	13	0.1 µm	Sterile
LSCHLPVD13-002S-S	Hydrophilic PVDF	13	0.2 µm	Sterile
LSCHLPVD13-002S-N	Hydrophilic PVDF	13	0.2 µm	Non-sterile
LSCHLPVD13-004S-S	Hydrophilic PVDF	13	0.45 µm	Sterile
LSCHLPVD13-004S-N	Hydrophilic PVDF	13	0.45 µm	Non-sterile
LSCHLPVD25-0402S-A	Hydrophilic PVDF	25	[0.45+0.2] Double Layer	Non-sterile
LSCHLPVD25-0602S-S	Hydrophilic PVDF	25	[0.65+0.2] Double Layer	Sterile
LSCHLPVD25-1004S-A	Hydrophilic PVDF	25	[1.0+0.4] Double Layer	Non-sterile
LSCHLPVD25-0014S-S	Hydrophilic PVDF	25	0.1 µm	Sterile
LSCHLPVD25-001S-N	Hydrophilic PVDF	25	0.1 µm	Non-sterile
LSCHLPVD25-002S-S	Hydrophilic PVDF	25	0.2 µm	Sterile
LSCHLPVD25-002S-N	Hydrophilic PVDF	25	0.2 µm	Non-sterile
LSCHLPVD25-004S-S	Hydrophilic PVDF	25	0.45 µm	Sterile
LSCHLPVD25-004S-N	Hydrophilic PVDF	25	0.45 µm	Non-sterile
LSCHLPVD33-0402S-A	Hydrophilic PVDF	33	[0.45+0.2] Double Layer	Non-sterile
LSCHLPVD33-0602S-S	Hydrophilic PVDF	33	[0.65+0.2] Double Layer	Sterile
LSCHLPVD33-1004S-A	Hydrophilic PVDF	33	[1.0+0.4] Double Layer	Non-sterile
LSCHLPVD33-002S-S	Hydrophilic PVDF	33	0.2 µm	Sterile
LSCHLPVD33-002S-N	Hydrophilic PVDF	33	0.2 µm	Non-sterile
LSCHLPVD33-004S-S	Hydrophilic PVDF	33	0.45 µm	Sterile
LSCHLPVD33-004S-N	Hydrophilic PVDF	33	0.45 µm	Non-sterile
LSMHLPVD63-002HB-S	Hydrofiel PVDF	63	0.2 µm	Sterile
LSMHLPVD63-004HB-S	Hydrofiel PVDF	63	0.45 µm	Sterile
LSMHLPVD63-006HB-S	Hydrofiel PVDF	63	0.65 µm	Sterile
LSMHLPVD63-002NP-S	Hydrofiel PVDF	63	0.2 µm	Sterile
LSMHLPVD63-004NP-S	Hydrofiel PVDF	63	0.45 µm	Sterile
LSMHLPVD63-006NP-S	Hydrofiel PVDF	63	0.65 µm	Sterile
LSMHLPVD63-002L-S	Hydrofiel PVDF	63	0.2 µm	Sterile
LSMHLPVD63-004L-S	Hydrofiel PVDF	63	0.45 µm	Sterile
LSMHLPVD63-006L-S	Hydrofiel PVDF	63	0.65 µm	Sterile

Autoclavable

Organic Solutions

Hydrophilic PTFE
Syringe Filters

Typical Application

HPLC-certified hydrophilic PTFE syringe filters are designed for the filtration of aqueous and organic solvents in HPLC applications. The hydrophilic PTFE membrane offers very low adsorption and is free of extractables and leachables, ensuring reliable, repeatable and interference-free analytical results.

In addition to the HPLC-certified version, non-sterile hydrophilic PTFE syringe filters are available for general laboratory and sample preparation use. These filters feature a modified hydrophilic PTFE membrane with excellent chemical and pH resistance, suitable for aqueous solutions, aggressive organic solvents and elevated temperatures. Aqueous solutions can be filtered without alcohol pre-wetting. Pore sizes range from 0.1 µm to 5.0 µm.

Ordering Information

Part No.	Material	Diameter	Micron	Sterile/Non Sterile1
LSCHLPTF13-001S-N	Hydrophilic PTFE	13	0.1 µm	Non-sterile
✓ LSCHLPTF13-002S-H	Hydrophilic PTFE	13	0.2 µm	Non-sterile
LSCHLPTF13-002S-N	Hydrophilic PTFE	13	0.2 µm	Non-sterile
✓ LSCHLPTF13-004S-H	Hydrophilic PTFE	13	0.45 µm	Non-sterile
LSCHLPTF13-004S-N	Hydrophilic PTFE	13	0.45 µm	Non-sterile
LSCHLPTF13-010S-N	Hydrophilic PTFE	13	1.0 µm	Non-sterile
LSCHLPTF13-050S-N	Hydrophilic PTFE	13	5.0 µm	Non-sterile
LSCHLPTF25-001S-N	Hydrophilic PTFE	25	0.1 µm	Non-sterile
✓ LSCHLPTF25-002S-H	Hydrophilic PTFE	25	0.2 µm	Non-sterile
LSCHLPTF25-002S-N	Hydrophilic PTFE	25	0.2 µm	Non-sterile
✓ LSCHLPTF25-004S-H	Hydrophilic PTFE	25	0.45 µm	Non-sterile
LSCHLPTF25-004S-N	Hydrophilic PTFE	25	0.45 µm	Non-sterile
LSCHLPTF25-010S-N	Hydrophilic PTFE	25	1.0 µm	Non-sterile
LSCHLPTF25-050S-N	Hydrophilic PTFE	25	5.0 µm	Non-sterile
LSCHLPTF33-001S-N	Hydrophilic PTFE	33	0.1 µm	Non-sterile
LSCHLPTF33-002S-N	Hydrophilic PTFE	33	0.2 µm	Non-sterile
LSCHLPTF33-004S-N	Hydrophilic PTFE	33	0.45 µm	Non-sterile
LSCHLPTF33-010S-N	Hydrophilic PTFE	33	1.0 µm	Non-sterile
LSCHLPTF33-050S-N	Hydrophilic PTFE	33	5.0 µm	Non-sterile
LSMHBPTF63-002HB-S	Hydrofoob PTFE	63	0.2 µm	Sterile
LSMHBPTF63-002NP-S	Hydrofoob PTFE	63	0.2 µm	Sterile
LSMHBPTF63-002L-S	Hydrofoob PTFE	63	0.2 µm	Sterile

✓ HPLC- approved

Nylon Syringe Filters

Organic Solutions

Typical Application

Nylon syringe filters are designed for the filtration of both aqueous and organic solutions in routine laboratory and analytical applications. The nylon membrane offers broad chemical compatibility and good mechanical strength, making these filters suitable for general sample preparation and clarification. These non-sterile syringe filters are commonly used where reliable particle removal is required without the need for sterilization.

Ordering Information

Part No.	Material	Diameter	Micron	Sterile/Non Sterile1
LSCHLCEA13-002S-N	Nylon	13	0.2 µm	Non-sterile
LSCHLCEA13-004S-N	Nylon	13	0.45 µm	Non-sterile
LSCHLCEA25-002S-N	Nylon	25	0.2 µm	Non-sterile
LSCHLCEA25-004S-N	Nylon	25	0.45 µm	Non-sterile
LSCHLCEA33-002S-N	Nylon	33	0.2 µm	Non-sterile
LSCHLCEA33-004S-N	Nylon	33	0.45 µm	Non-sterile

PP Syringe Filters

Prefiltration

Typical Application

PP syringe filters are used as prefilters to remove coarse particles and high particulate loads before final filtration. Their high dirt holding capacity makes them ideal for protecting downstream membrane filters, especially when filtering viscous or heavily contaminated samples.

Ordering Information

Part No.	Material	Diameter	Micron	Sterile/Non Sterile1
LSCHBPPR13-002S-N	Hydrophobic PP	13	0.2 µm	Non-sterile
LSCHBPPR13-004S-N	Hydrophobic PP	13	0.45 µm	Non-sterile
LSCHBPPR13-010S-N	Hydrophobic PP	13	1.0 µm	Non-sterile
LSCHBPPR13-030S-N	Hydrophobic PP	13	3.0 µm	Non-sterile
LSCHBPPR13-050S-N	Hydrophobic PP	13	5.0 µm	Non-sterile
LSCHBPPR13-100S-N	Hydrophobic PP	13	10.0 µm	Non-sterile
LSCHBPPR25-002S-N	Hydrophobic PP	25	0.2 µm	Non-sterile
LSCHBPPR25-004S-N	Hydrophobic PP	25	0.45 µm	Non-sterile
LSCHBPPR25-010S-N	Hydrophobic PP	25	1.0 µm	Non-sterile
LSCHBPPR25-030S-N	Hydrophobic PP	25	3.0 µm	Non-sterile
LSCHBPPR25-050S-N	Hydrophobic PP	25	5.0 µm	Non-sterile
LSCHBPPR25-100S-N	Hydrophobic PP	25	10.0 µm	Non-sterile
LSCHBPPR33-002S-N	Hydrophobic PP	33	0.2 µm	Non-sterile
LSCHBPPR33-004S-N	Hydrophobic PP	33	0.45 µm	Non-sterile
LSCHBPPR33-010S-N	Hydrophobic PP	33	1.0 µm	Non-sterile
LSCHBPPR33-030S-N	Hydrophobic PP	33	3.0 µm	Non-sterile
LSCHBPPR33-050S-N	Hydrophobic PP	33	5.0 µm	Non-sterile
LSCHBPPR33-100S-N	Hydrophobic PP	33	10.0 µm	Non-sterile
LSCHBPPR33-200S-N	Hydrophobic PP	33	20.0 µm	Non-sterile
LSCHBPPR33-300S-N	Hydrophobic PP	33	30.0 µm	Non-sterile

Prefiltration

Glass Fibre
Syringe Filters

Typical Application

Glass fibre syringe filters are designed for depth filtration and are particularly suitable for viscous samples. They are widely used in environmental and food analysis to handle high particulate loads and to protect finer downstream membrane filters.

Ordering Information

Part No.	Material	Diameter	Micron	Sterile/Non Sterile1
LSCHLGLF13-002S-N	Hydrophilic Glass Fibre	13	0.2 µm	Non-sterile
LSCHLGLF13-004S-N	Hydrophilic Glass Fibre	13	0.45 µm	Non-sterile
LSCHLGLF25-002S-N	Hydrophilic Glass Fibre	25	0.2 µm	Non-sterile
LSCHLGLF25-004S-N	Hydrophilic Glass Fibre	25	0.45 µm	Non-sterile
LSCHLGLF25-010S-N	Hydrophilic Glass Fibre	25	1.0 µm	Non-sterile
LSCHLGLF33-002S-N	Hydrophilic Glass Fibre	33	0.2 µm	Non-sterile
LSCHLGLF33-004S-N	Hydrophilic Glass Fibre	33	0.45 µm	Non-sterile
LSCHLGLF33-010S-N	Hydrophilic Glass Fibre	33	1.0 µm	Non-sterile

Air & Gas Filtration

Hydrophobic PTFE
Syringe Filters

Typical Application

Hydrophobic PTFE syringe filters are designed for air and gas filtration and the filtration of aggressive solvents, where high chemical resistance is required. The hydrophobic PTFE membrane ensures reliable moisture retention and consistent filtration performance.

Hydrophobic PTFE syringe filters are available in standard and autoclavable versions, making them suitable for a wide range of laboratory, analytical and process applications where high chemical compatibility and reliable performance are essential.

Ordering Information

Part No.	Material	Diameter	Micron	Sterile/Non Sterile1
LSCHBPTF13-001S-N	Hydrophobic PTFE	13	0.1 µm	Non-sterile
LSCHBPTF13-002S-S	Hydrophobic PTFE	13	0.2 µm	Sterile
LSCHBPTF13-002S-A	Hydrophobic PTFE	13	0.2 µm	Non-sterile
LSCHBPTF13-002S-N	Hydrophobic PTFE	13	0.2 µm	Non-sterile
LSCHBPTF13-004S-N	Hydrophobic PTFE	13	0.45 µm	Non-sterile
LSCHBPTF13-008S-N	Hydrophobic PTFE	13	0.8 µm	Non-sterile
LSCHBPTF13-100S-N	Hydrophobic PTFE	13	10.0 µm	Non-sterile
LSCHBPTF13-030S-N	Hydrophobic PTFE	13	3.0 µm	Non-sterile
LSCHBPTF13-050S-N	Hydrophobic PTFE	13	5.0 µm	Non-sterile
LSCHBPTF25-001S-N	Hydrophobic PTFE	25	0.1 µm	Non-sterile
LSCHBPTF25-002S-S	Hydrophobic PTFE	25	0.2 µm	Sterile
LSCHBPTF25-002S-A	Hydrophobic PTFE	25	0.2 µm	Non-sterile
LSCHBPTF25-002L-S	Hydrophobic PTFE	25	0.2 µm	Sterile
LSCHBPTF25-002S-N	Hydrophobic PTFE	25	0.2 µm	Non-sterile
LSCHBPTF25-004S-N	Hydrophobic PTFE	25	0.45 µm	Non-sterile
LSCHBPTF25-008S-N	Hydrophobic PTFE	25	0.8 µm	Non-sterile
LSCHBPTF25-100S-N	Hydrophobic PTFE	25	10.0 µm	Non-sterile
LSCHBPTF25-030S-N	Hydrophobic PTFE	25	3.0 µm	Non-sterile
LSCHBPTF25-050S-N	Hydrophobic PTFE	25	5.0 µm	Non-sterile
LSCHBPTF33-001S-N	Hydrophobic PTFE	33	0.1 µm	Non-sterile
LSCHBPTF33-002S-S	Hydrophobic PTFE	33	0.2 µm	Sterile
LSCHBPTF33-002S-A	Hydrophobic PTFE	33	0.2 µm	Non-sterile
LSCHBPTF33-002S-N	Hydrophobic PTFE	33	0.2 µm	Non-sterile
LSCHBPTF33-004S-N	Hydrophobic PTFE	33	0.45 µm	Non-sterile
LSCHBPTF33-008S-N	Hydrophobic PTFE	33	0.8 µm	Non-sterile
LSCHBPTF33-100S-N	Hydrophobic PTFE	33	10.0 µm	Non-sterile
LSCHBPTF33-030S-N	Hydrophobic PTFE	33	3.0 µm	Non-sterile
LSCHBPTF33-050S-N	Hydrophobic PTFE	33	5.0 µm	Non-sterile

Autoclavable

Air & Gas Filtration

Hydrophobic PVDF
Syringe Filters

Typical Application

Hydrophobic PVDF syringe filters are designed for air and gas filtration applications where effective moisture retention is essential. The low protein binding hydrophobic PVDF membrane provides reliable protection against the ingress of atmospheric moisture during venting processes, while ensuring consistent filtration performance and good mechanical strength.

Hydrophobic PVDF syringe filters are available in standard and autoclavable versions, as well as in sterile and non-sterile configurations, making them suitable for a wide range of laboratory, analytical and process venting applications.

Ordering Information

Part No.	Material	Diameter	Micron	Sterile/Non Sterile1
LSCHBPVD13-002S-S	Hydrophobic PVDF	13	0.2 µm	Sterile
LSCHBPVD13-002S-A	Hydrophobic PVDF	13	0.2 µm	Non-sterile
LSCHBPVD25-002S-S	Hydrophobic PVDF	25	0.2 µm	Sterile
LSCHBPVD25-002S-A	Hydrophobic PVDF	25	0.2 µm	Non-sterile
LSCHBPVD33-002S-S	Hydrophobic PVDF	33	0.2 µm	Sterile
LSCHBPVD33-002S-A	Hydrophobic PVDF	33	0.2 µm	Non-sterile

Autoclavable

How to choose the correct size

Choosing the right syringe filter is essential for achieving reliable and reproducible filtration results. The correct combination of membrane type, filter diameter and sterility level ensures optimal performance while preventing sample loss, contamination or unnecessary pressure build-up.

This guide helps you select the most suitable syringe filter for your application.

Selection Guide

The required filter diameter mainly depends on the sample volume to be filtered. Larger diameters provide a greater filtration area, resulting in lower pressure drop, higher flow rates and increased dirt holding capacity.

Sample Volume	Filter Diameter	Filtration Area	Hold-up Volume
< 10mL	13mm	0.72 cm²	< 25µL
10mL to 100mL	25mm	3.4 cm²	< 100µL
100mL to 200mL	33mm	4.5 cm²	< 125µL

Selecting the correct size helps minimize sample loss while ensuring efficient filtration without clogging.

Sterility options

The required sterility level depends on the application and whether further sterilization steps will follow after filtration.

Sterile Packed

For applications where sterility is critical, individually packed sterile syringe filters are recommended. These filters ensure optimal filtration performance while preventing microbial contamination and are suitable for sensitive laboratory and life science applications.

Non-sterile Packed

If the filtered solution will undergo additional sterilization or filtration steps, non-sterile syringe filters can be used. They are widely applied in routine sample preparation, such as analytical chemistry, where the main purpose is to remove particles and protect analytical instruments.

Autoclavable Syringe Filters

Autoclavable syringe filters can be sterilized at 121°C (maximum 130°C) for 30 minutes and can withstand up to 20 times. To ensure consistent filtration performance and reliability, Van Borselen Filters advises single use after autoclaving.

Common applications per material type

Material	Features	Apllications	PH Range
PES	High throughput and low protein adsorption.	Ideal for processing water-based solutions, compatible with mild organic solvents, and cell culture applications.	3-14
MCE	Provides high volumetric flow and elevated throughput performance. Characterized by a high protein adsorption capacity. Exhibits excellent biocompatibility for biological and pharmaceutical applications.	Applied for clarification of aqueous streams and routine laboratory filtration tasks. Compatible with water-based fluids, hydrocarbons, and a broad range of organic solvent systems.	3-10
CA	Minimizes non-specific binding while maintaining high recovery performance.	Intended for aqueous samples containing proteins or other high-molecular-weight organic biomolecules.	4-8

Material	Features	Apllications	PH Range
Nylon	Minimal release of extractables. Chemically compatible with aqueous and organic media.	Optimized for use with neutral-pH, water-based solutions and solvent mixtures. Widely applied for sample clarification and particulate removal ahead of HPLC.	5-12
Hydrophilic PTFE	Provides maximum chemical resistance, including excellent tolerance to strong acids and alkalis. Ready for use without pre-wetting.	Suitable for filtration of both aqueous and organic media Used for sample preparation prior to UHPLC, HPLC, and LC-MS analysis.	1-14
Hydrophilic PVDF	Offers lowest protein binding of all types.	Suitable for protein-containing solutions and mild organic media.	2-10
PP	Delivers high retention efficiency across the specified particle size range. Supports a high contaminant loading capacity.	Suitable for pre-treatment applications, including clarification and removal of fine particulates.	1-14

Material	Features	Apllications	PH Range
GF	Offers maximum open filtration area.	Often used in applications where liquid is highly viscous. Designed for the pre-filtration of viscous biological fluids, including serums and tissue culture media, ahead of analytical evaluation. Suitable for pre-filtration in cell culture media separation applications.	2-11
Hydrophobic PTFE	Exhibits exceptional chemical resistance across a broad range of media. Aqueous samples can be processed following appropriate pre-wetting (e.g. alcohol or isopropanol). Suitable for filtration of elevated-temperature liquids.	Commonly used for venting and gas filtration and to prevent moisture ingress through air vents.	1-14
Hydrophobic PVDF	Delivers high retention efficiency while maintaining a low differential pressure. Ensures reliable capture of bacteria and suspended particulates.	Designed for sterile venting of fermentors, tanks, and closed process systems. Provides sterile-grade filtration for compressed process gases such as air, O_2, and N_2.	2-12