

High Precision Filter for Liquids

Series *FGH*

RoHS

How to Order

FGH 100 - 03 - J 002 T

High precision filter for liquids

Body size

Symbol	Element length	Applicable element
100	L117	EJ701S
200	L246	EJ801S, ED801S
300	L496	EJ901S, ED901S

* The membrane element cannot be selected for FGH100.

Port size

03	Rc3/8
04	Rc1/2
06	Rc3/4
10	Rc1

Element seal

Symbol	Material
T	PTFE

Filtration accuracy

Symbol	Filtration accuracy	Filtration efficiency	Applicable for:	Applicable body
002	2 μm	99%	HEPO II	FGH100 to 300
004	4 μm			
006	6 μm			
013	13 μm	99.9%	Membrane	FGH200 to 300
X20	0.2 μm			
X40	0.4 μm			

Element classification Note)

Symbol	Element
J	HEPO II
D	Membrane

Note) Refer to pages 1190 to 1193 for details about specifications, models, dimensions, etc. regarding the elements.



Specifications

Model		FGH100	FGH200	FGH300
Number of built-in elements (element length) (mm)		1(125)	1(250)	1(500)
Operating pressure		MAX. 1 MPa		
Operating temperature		MAX. 80°C (Not above the boiling point)		
Applicable fluid		Each kind of fluid (See the table of applicable fluids on pages 1183 and 1184)		
Port size (Rc)		3/8, 1/2, 3/4, 1		
Material	Housing	Stainless steel 316 (Electrolytic polishing)		
	Seals	PTFE		
Weight (kg)		2.6	3.2	4.3
Internal capacity (L)		1.0	1.8	3.3

Accessories for FGH 100-300 (Option)

Tool for tightening clamp rings

Description	Part number
Tightening tool	FTT410S

FGD

FGE

FGG

FGA

FGB

FGC

FGF

FGH

EJ

ED

FQ1

FN

EB

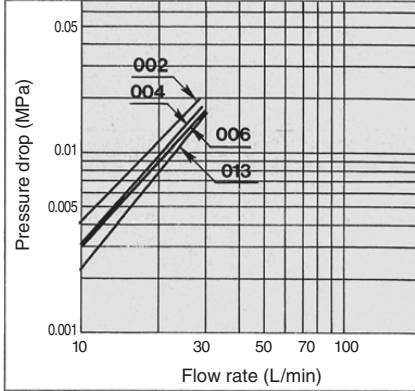
ES

Series FGH

Flow Rate Characteristics of Built-in HEPO II Elements (Fluid: water, temperature: 20°C) — 002 (2 μm) — 004 (4 μm) — 006 (6 μm) — 013 (13 μm)

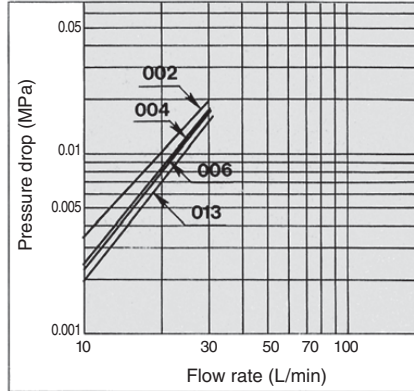
Series FGH100

FGH100-03 {Rc3/8}



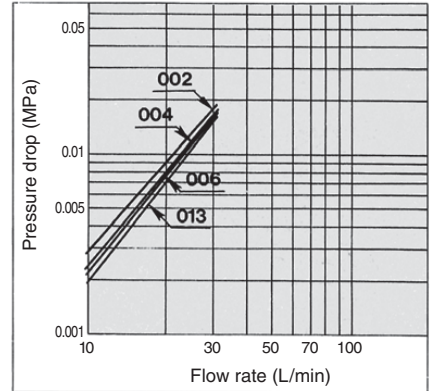
Series FGH200

FGH200-03 {Rc3/8}

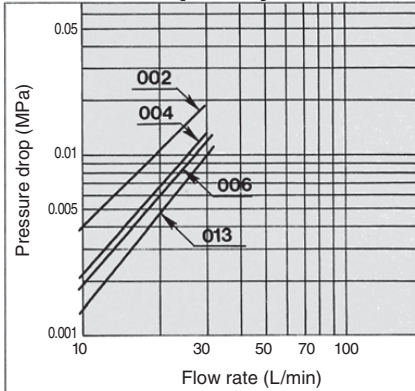


Series FGH300

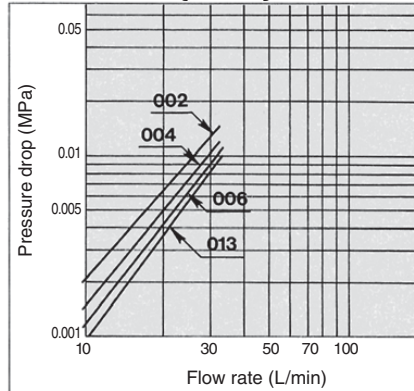
FGH300-03 {Rc3/8}



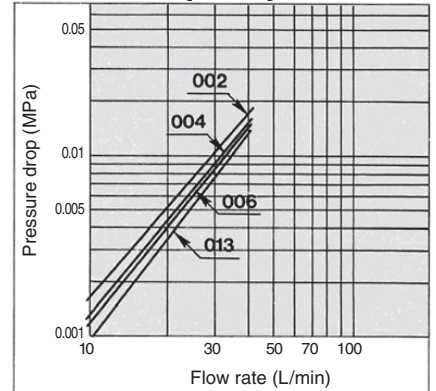
FGH100-04 {Rc1/2}



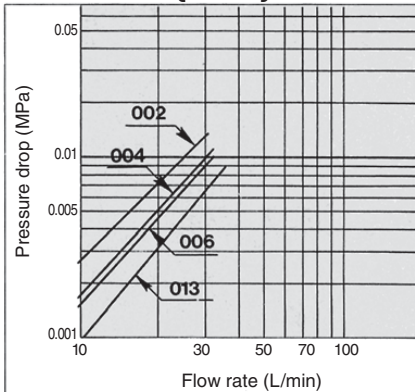
FGH200-04 {Rc1/2}



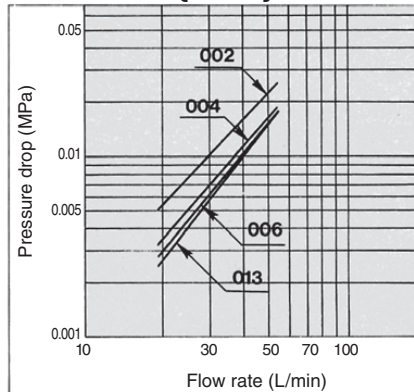
FGH300-04 {Rc1/2}



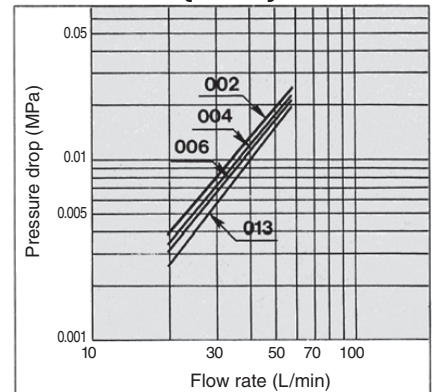
FGH100-06 {Rc3/4}



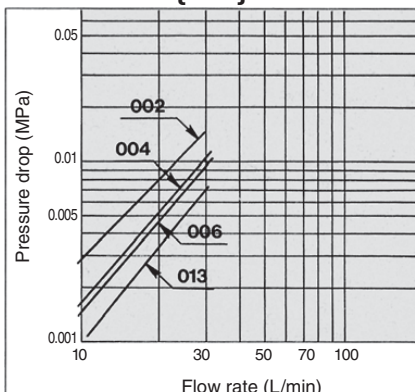
FGH200-06 {Rc3/4}



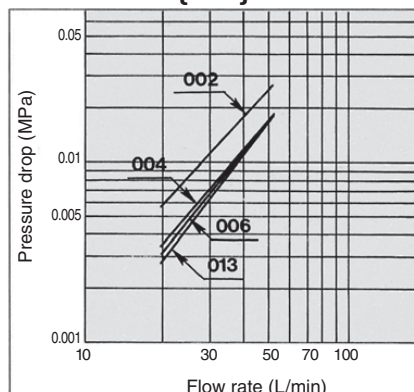
FGH300-06 {Rc3/4}



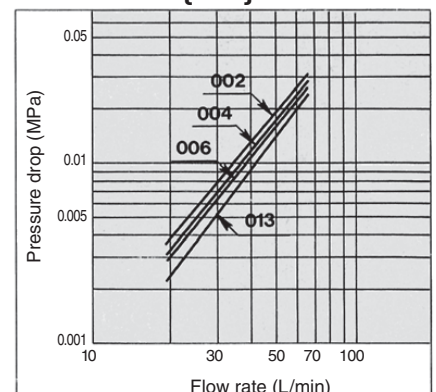
FGH100-10 {Rc1}



FGH200-10 {Rc1}

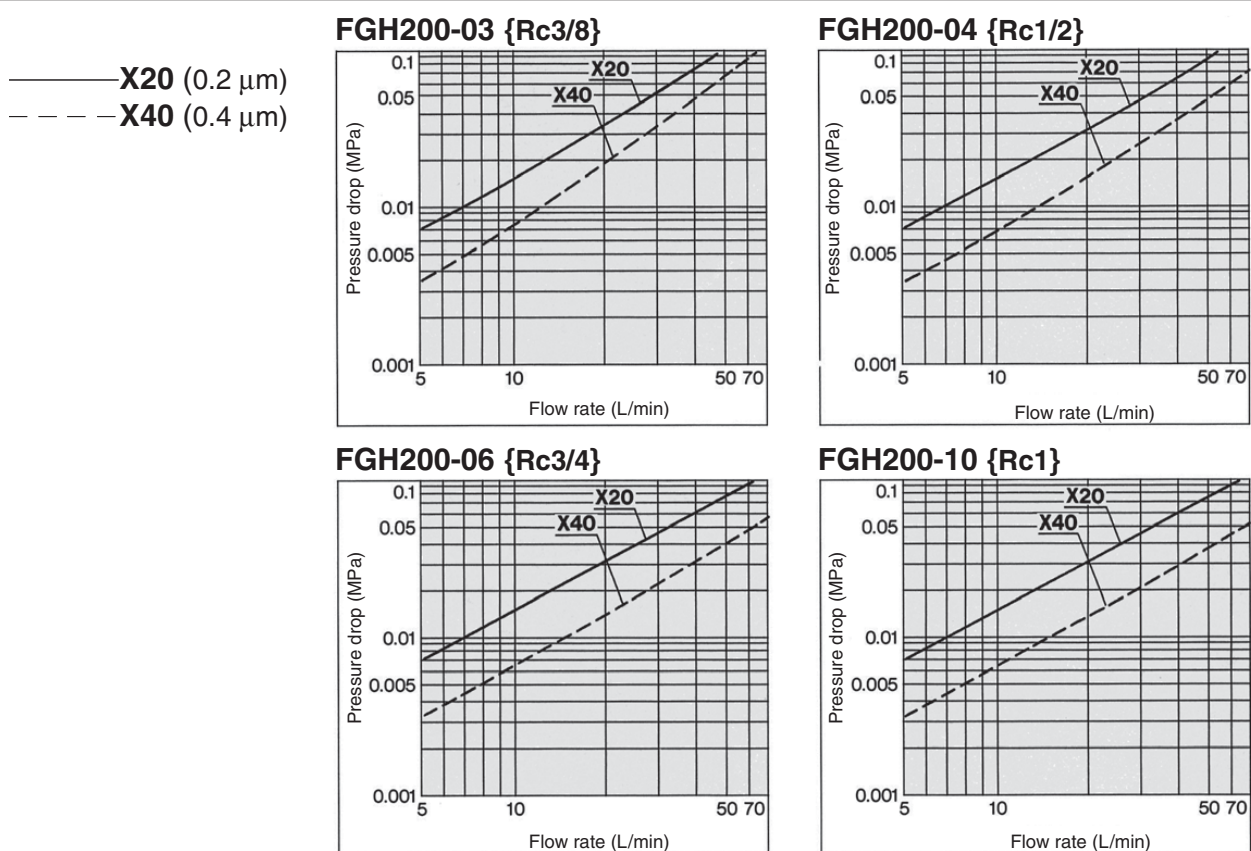


FGH300-10 {Rc1}

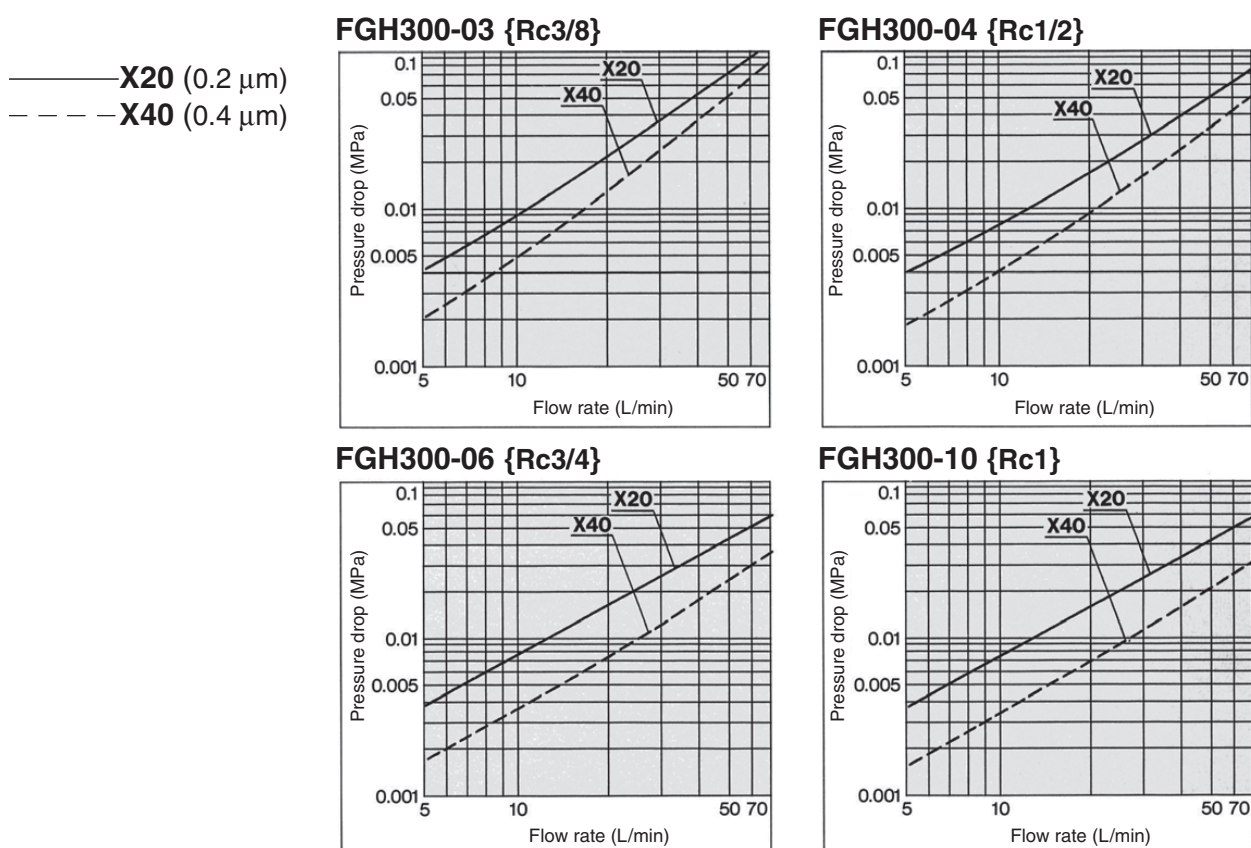


Flow Rate Characteristics of Built-in Membrane Elements (Fluid: water, temperature: 20°C)

Series FGH200

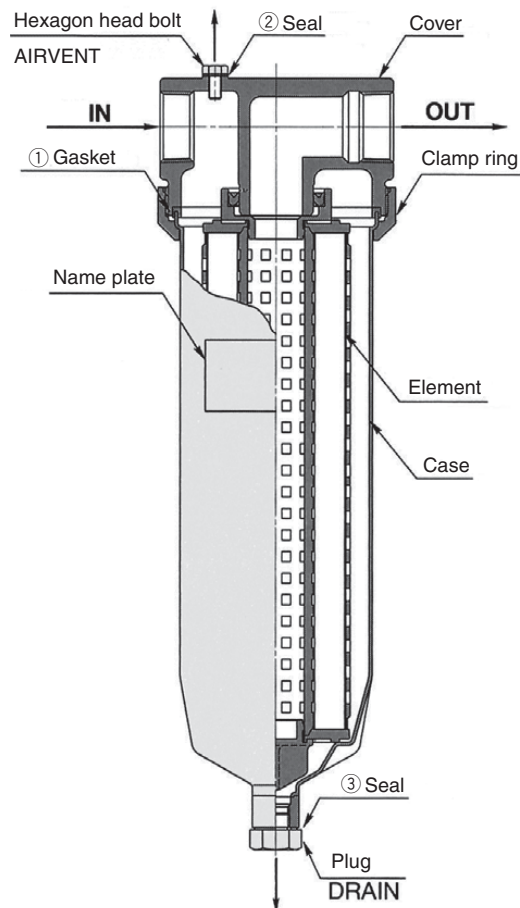


Series FGH300



Series FGH

Construction/Spare Parts and Seal List



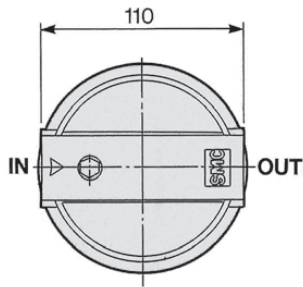
Spare Parts and Seal List

No.	Description	Part number		
		FGH100	FGH200	FGH300
1	Gasket	AL-58S#1		
2	Seal	AL-43S		
3	Seal	AL-53S		

* Use each one of the above parts for each filter unit.

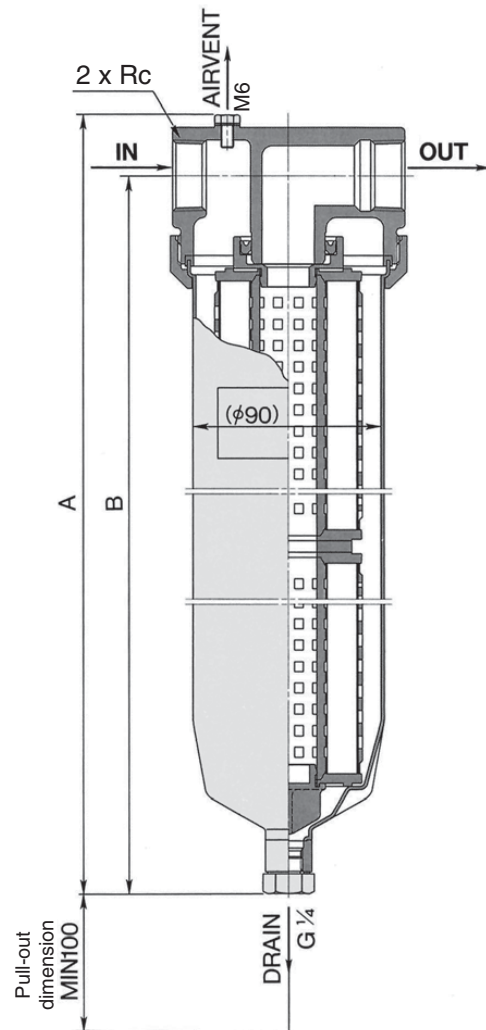
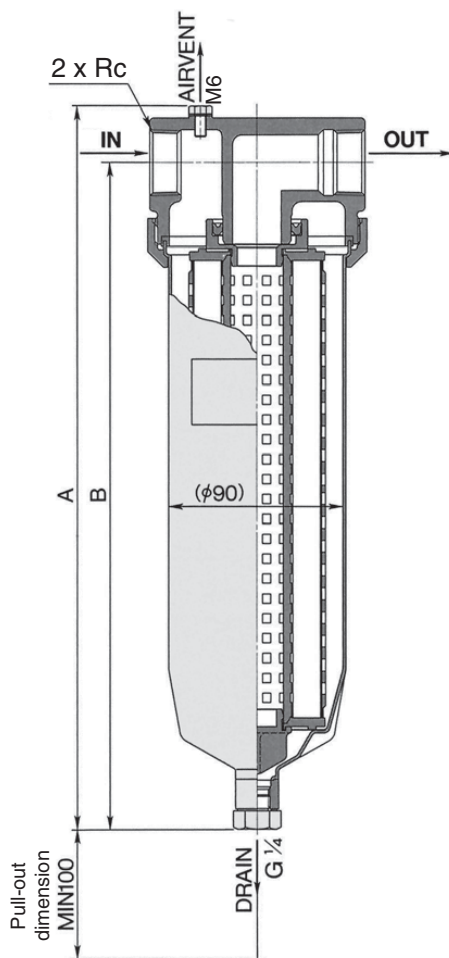
* Use a commercially available belt wrench etc. for mounting and removing clamp rings.

Dimensions



FGH100/200

FGH300



FGD

FGE

FGG

FGA

FGB

FGC

FGF

FGH

EJ

ED

FQ1

FN

EB

ES

Dimensions

Model	Element length	Port size (Rc)	A	B
FGH100	$\phi 70 \times L117$	3/8, 1/2	235	211
		3/4, 1	240	
FGH200	$\phi 70 \times L246$	3/8, 1/2	364	340
		3/4, 1	369	
FGH300	$\phi 70 \times L496$	3/8, 1/2	615	591
		3/4, 1	620	

HEPO II Element for Series FGH

Series *EJ*

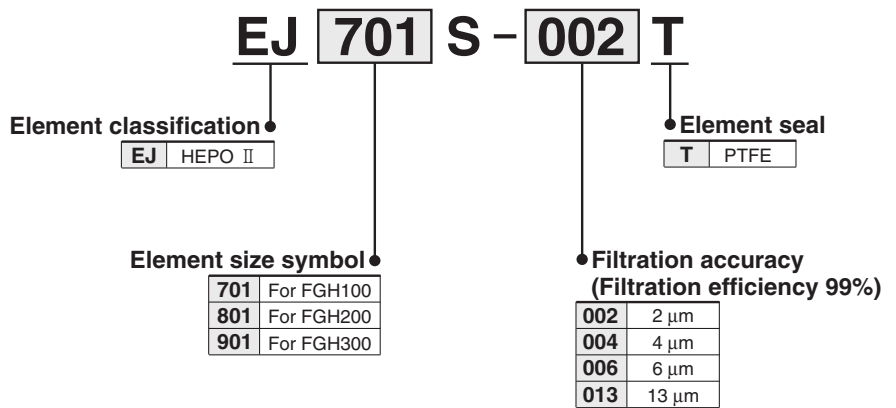


Specifications

Model		EJ□S-002	EJ□S-004	EJ□S-006	EJ□S-013	
Filtration accuracy (Filtration efficiency 99%)		2	4	6	13	
Filtration area (cm ²)	Length	117 mm	1890	2310	2090	2490
		246 mm	4250	5200	4700	5600
		496 mm	8500	10400	9400	11200
Heat resistant temperature (°C)		80				
Material	Filter media	Polyester				
	Reinforcement material	Polypropylene				
	Others	Polypropylene				
Pressure resistance		0.5 MPa at 20°C, 0.125 MPa at 80°C				

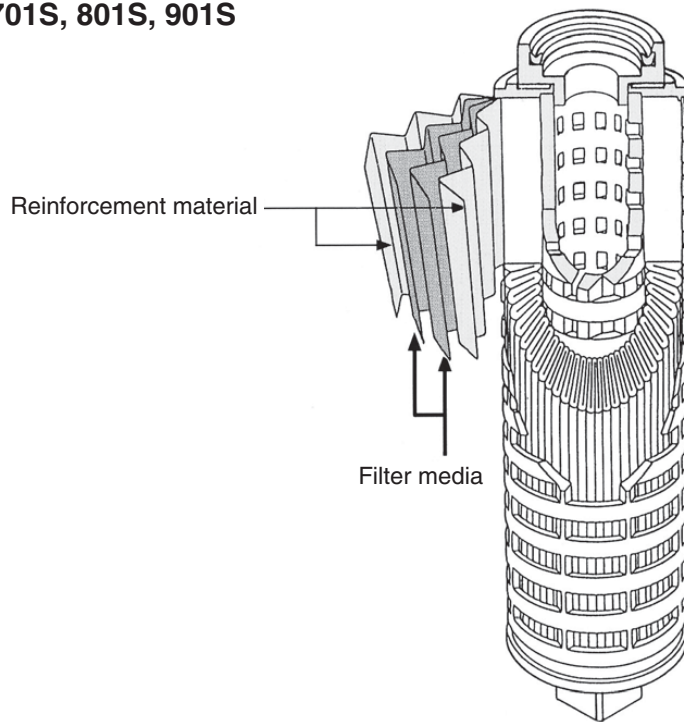
Note) See "How to Order" below for items represented by □.

How to Order Elements



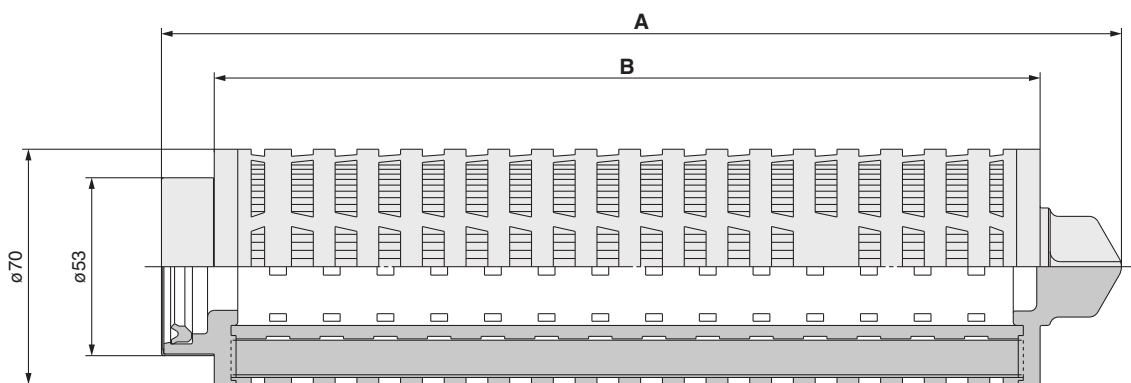
Construction

EJ701S, 801S, 901S



- FGD
- FGE
- FGG
- FGA
- FGB
- FGC
- FGF
- FGH
- EJ**
- ED
- FQ1
- FN
- EB
- ES

Dimensions



Element Dimensions

Model	A	B	Applicable container
EJ701S-□T	157	117	FGH100
EJ801S-□T	286	246	FGH200
EJ901S-□T	536	496	FGH300

Membrane Element for Series FGH

Series *ED*

RoHS



Specifications

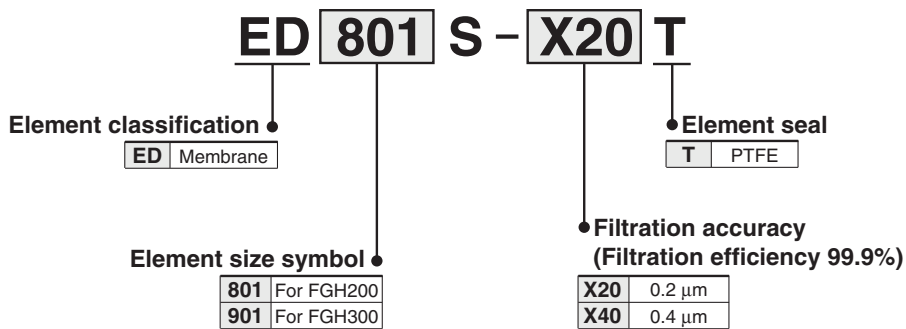
Model		ED□S-X20	ED□S-X40
Filtration accuracy (Filtration efficiency 99.9%) <small>Note 1)</small>		0.2	0.4
Filtration area (cm ²)	Length 247 mm	4,000	6,200
	495 mm	8,000	12,400
Heat resistant temperature (°C)		80	
Material	Filter media	Polyether sulfone	Cellulose acetate & polyester
	Reinforcement material	Polypropylene	Polyester
	Others	Polypropylene	Polypropylene
Pressure resistance		0.5 MPa at 20°C, 0.125 MPa at 80°C	
Resistivity recovery <small>Note 2)</small>		60 min at 10 L/min	—
Others		100 L/4000 cm ² Pure water cleaning	—

Note 1) Filtration accuracy: tested with ultrapure water, flow rate at $\Delta P = 0.01$ MPa.

Note 2) Resistivity recovery: time taken to recover to 18 M Ω -cm with ultrapure water.

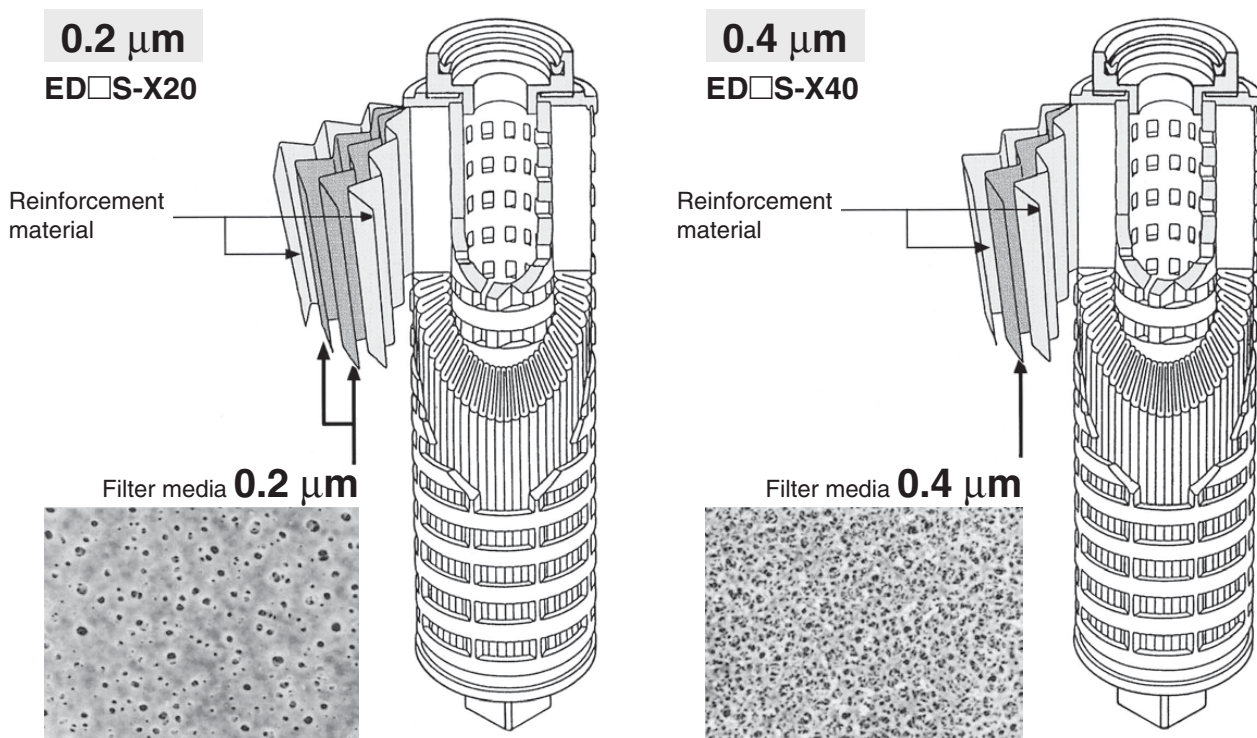
Note 3) See "How to Order" below for items represented by □.

How to Order Elements



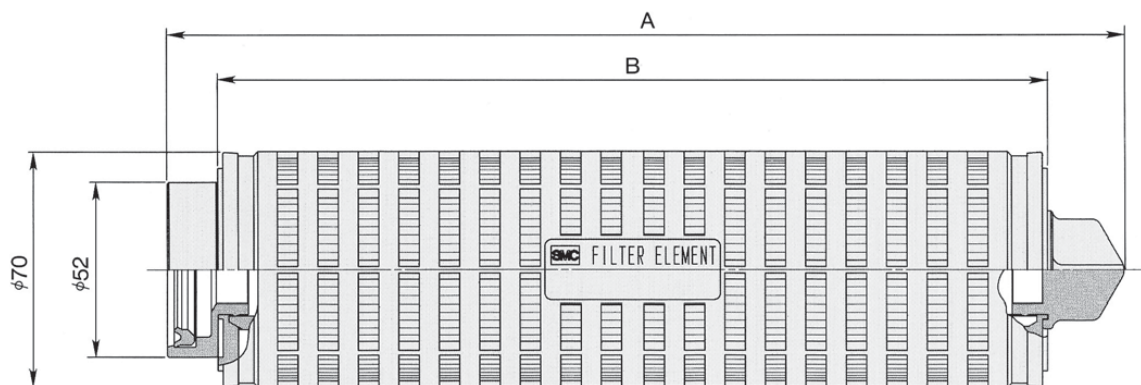
* Cannot be used for FGH100.

Construction



FGD
FGE
FGG
FGA
FGB
FGC
FGF
FGH
EJ
ED
FQ1
FN
EB□
ES□

Dimensions



Element Dimensions

Model	A	B	Applicable container
ED801S-X□T	285	247	FGH200
ED901S-X□T	533	495	FGH300