

3550 Series air service units – 1/4" to 3/4" Filter Regulators

A 316L stainless steel combined unit for filtration and regulation of compressed air and gases for the actuation industries.

Features and Benefits

- Specifically designed for severe environments
- Non or self-relieving
- 40 micron element stainless steel 316 as standard, 5 micron option available
- 316L stainless steel construction
- Regulated pressure range from 0.50 to 12.0 bar depending on model selection
- Large flow characteristics
- NACE: standard temperature and manual drain only

Media & Ambient Temperature Range

- Standard temperature
-20 to +80 °C (-4 to +176 °F)
- Low temperature version
-50 to +80 °C (-58 to +176 °F)

Note: When product is ordered as ATEX ambient temperature is limited to +40 °C (104 °F) Ex II 2G c T6.

Maximum Relief Flow

- At 2 bar (29 psi) secondary pressure
0.5 cc/sec (0.03 cu in/sec)

Flow

At 10 bar (145 psi) supply pressure, 6 bar (87 psi) secondary pressure, 1 bar (14.5 psi) pressure drop.

- 1/4" - 3,720 l/min (130 SCFM)
- 1/2" and 3/4" - 6,000 l/min (212 SCFM)

Maximum Inlet Pressure

- Manual drain - 20 bar (290 psi)
- Automatic drain - 17 bar (247 psi)

Ports NPT

(BSP option available - consult factory for part codes)

- 1/4", 1/2", 3/4"

Gauge Ports

- 1/8" NPT
- 1/4" NPT (option available - suffix product code with 'X')

Certification Options Available



Relief Vent Port

- 1/8" NPT (fitted with breather)
Note: Not fitted on low temperature option

Bowl Capacity

- 21 cc (1.28 cu ins)

Accessories Available

- Mounting brackets
- Stainless steel pressure gauge
- Hand wheel

See page 13-14 for ordering details

Operating Media

- Air, inert gas and sweet (natural) gas
- Sour gas (NACE) standard temperature and manual drain only
- Suitable for water and other compatible liquids - manual drain only, consult Rotork Midland for details

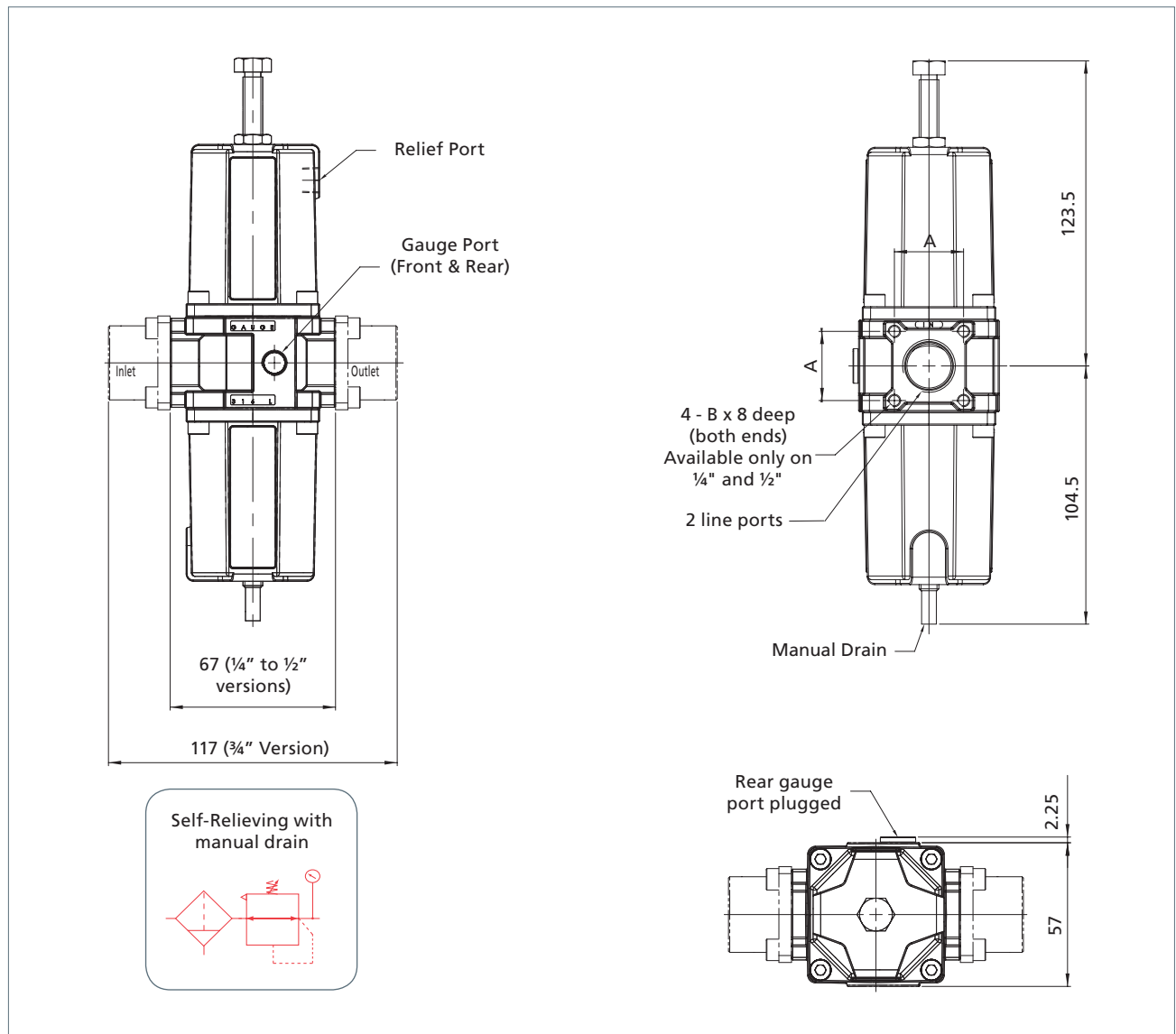
Note: To prevent freezing of the condensate within the product, the media dew point must be at least 10 °C below the lowest ambient temperature the product will be exposed to.

Construction Materials

- Body/bonnet/bowl: 316L stainless steel
- Internals: 316L stainless steel and Ryton R-4
Note: on auto-drain version float is nylon, polyoxymethylene and rubber.
- Element: 40 micron 316 stainless steel
(5 micron option available - suffix product code with '05')
- Seals: Standard option - Fluoroelastomer
Low temperature option - EPDM¹ and Fluorosilicone

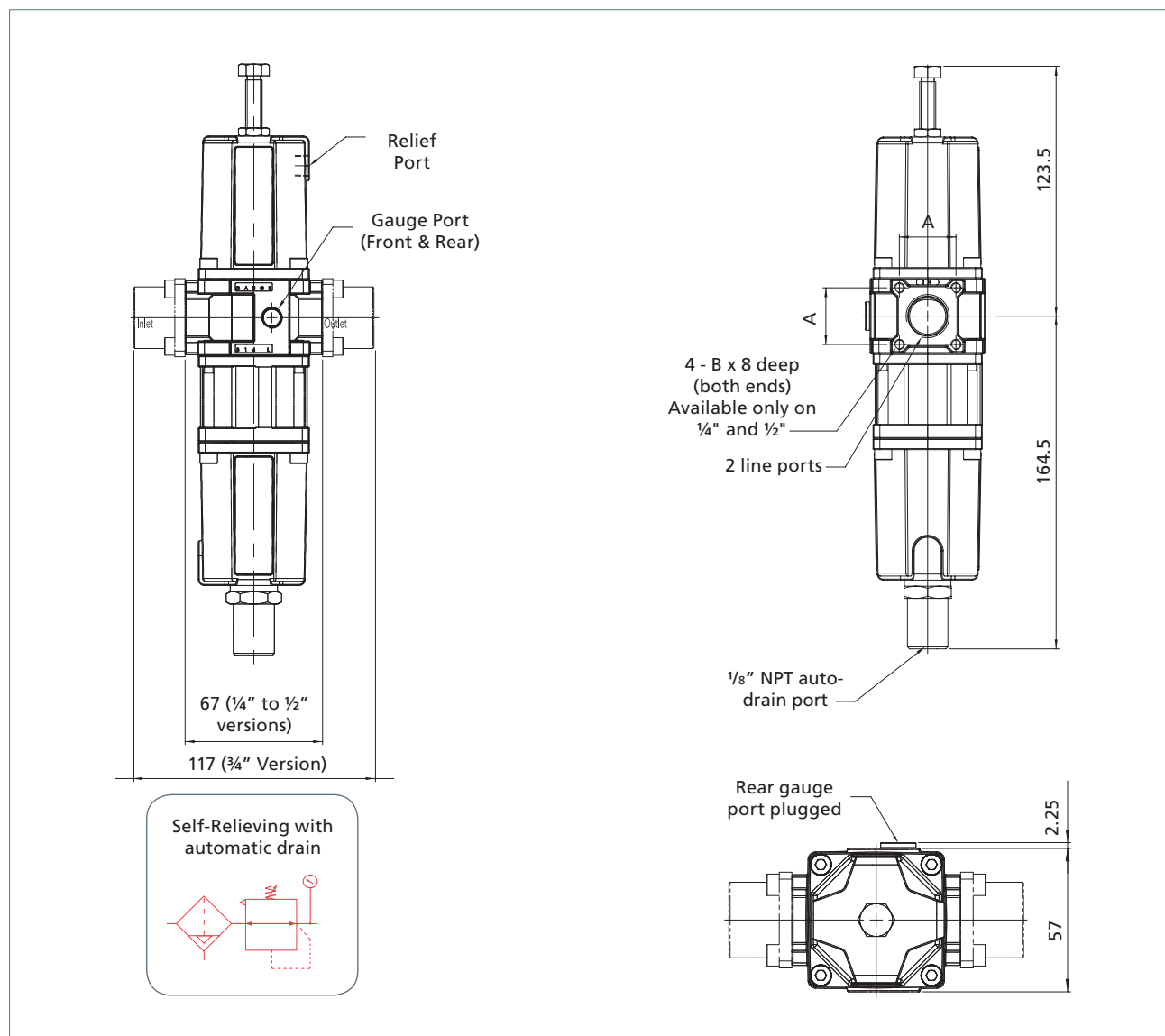
¹ The use of lubrication upstream of the product is not recommended for low temperature applications

3550 Series air service units – 1/4" to 3/4" Filter Regulators - Engineering drawings (manual drain)



Size	Filter	Regulated Pressure bar (psi)	Max Inlet Pressure bar	A	B	Weight kg	Cv
1/4"	Manual Drain	0.50 to 2.0 (7.2 to 29)	20	24	M4	1.75	2.4
1/2"				28	M5	1.75	4.4
3/4"				-	-	1.95	5.0
1/4"	Manual Drain	0.50 to 4.0 (7.2 to 58)	20	24	M4	1.75	2.4
1/2"				28	M5	1.75	4.4
3/4"				-	-	1.95	5.0
1/4"	Manual Drain	0.50 to 8.0 (7.2 to 116)	20	24	M4	1.75	2.4
1/2"				28	M5	1.75	4.4
3/4"				-	-	1.95	5.0
1/4"	Manual Drain	0.50 to 12.0 (7.2 to 174)	20	24	M4	1.75	2.4
1/2"				28	M5	1.75	4.4
3/4"				-	-	1.95	5.0

3550 Series air service units – ¼" to ¾" Filter Regulators - Engineering Drawings (auto drain)



Size	Filter	Regulated Pressure bar (psi)	Max Inlet Pressure bar	A	B	Weight kg	Cv
¼"	Auto Drain	0.50 to 2.0 (7.2 to 29)	17	24	M4	2.05	2.4
½"				28	M5	2.05	4.4
¾"				-	-	2.25	5.0
¼"	Auto Drain	0.50 to 4.0 (7.2 to 58)	17	24	M4	2.05	2.4
½"				28	M5	2.05	4.4
¾"				-	-	2.25	5.0
¼"	Auto Drain	0.50 to 8.0 (7.2 to 116)	17	24	M4	2.05	2.4
½"				28	M5	2.05	4.4
¾"				-	-	2.25	5.0
¼"	Auto Drain	0.50 to 12.0 (7.2 to 174)	17	24	M4	2.05	2.4
½"				28	M5	2.05	4.4
¾"				-	-	-	-

3550 Series air service units – 1/4" to 3/4" Filter Regulator - Flow Characteristics

3550 Series Coding Chart - Filter Regulators

Additional Options

Size		Type ¹		Material		Seals °C (°F)		Regulated Pressure bar (psi)		Port Style		Revision	Filter Element (40 micron standard)		Gauge Port		Approval		
2	¼"	FRM	Manual Drain	S	Stainless	V	Standard -20 (-4)	02	2 (29)	1	BSP	A	05	5 micron	X	¼" NPT Gauge Port	/ATEX	Ex II 2G c T6	
4	½"	FRA ¹	Auto Drain	S	Stainless	F ²	Low Temp -50 (-58)	04	4 (58)	2	NPT	A		w/o option		w/o option		w/o option	
6	¾"	FRN	Manual Drain Non Relieving					08	8 (116)										
		FRB ¹	Auto Drain Non Relieving					12	12 (174)										
●		●		S		●		●		●		A	●		●		●		

¹ NACE not available in auto-drain or low temperature options

² Low temperature option not available in auto-drain

