

Industrial Automation

IMI Norgren

LR84G -

Pressure regulator for Rail application Excelon® Plus Modular System

- Port size: 3/8" ... 3/4"(ISO G/PTF)
- Excelon® Plus design allows in-line installation or modular installation with other Excelon® Plus products
- Salt Spray compliant to ISO 9227 (500 hrs)
- Shock and vibration tested to EN61373 Category 2*
 - *(includes qualification category 1, class A and B)
- Fire & Smoke compliant to EN45545-2 (HL3) grouping rules*
 - * (for single units only, please consult our technical department regarding combinations of these units)







Technical features pressure regulator

Medium:

Compressed air only

Maximum supply pressure:

20 bar (290 psi)

Outlet pressure ranges:

0.3 ...10 bar (4 ... 145 psi), 0.3 ... 4 bar (4 ... 58 psi) optional,

Gauge

02/21

Gauge port as standard (Rc 1/8 or 1/8 PTF) Integrated gauge as option Port size

G3/8, G1/2, G3/4, 3/8 PTF, 1/2 PTF, 3/4 PTF

Diaphragm Type:

Relieving

Flow:

116 dm³/s at port size: $\frac{1}{2}$ ", Inlet pressure 10 bar (145 psi), 6.3 bar (91 psi) set pressure and a Δ p: 1 bar (14.5 psi) doop from

Ambient/Media temperature: Unit with gauge port without integrated gauge:

-40 ... +80°C (-40 ... +176°F)

Air supply must be dry enough to avoid ice formation at temperatures below +2°C (+35°F).Atex:

Regulators LR84 are in conformity with Atex 2014/34/

ξχ)

II 2 GD Ex h IIC T6 Gb EX h IIIC T85°C Db

Materials:

Body: Die cast aluminium Body covers: Magnum 3904 -High Impact covers Bonnet: Die cast Aluminium Valve: Brass and Low temperature Nitrile Elastomers: Low temperature

Nitrile
Diaphragm: Low temperature
Silicone, polyester reinforced

Silicone, polyester reinforced Lower spring rest and diaphragm retainer: Aluminium

Technical data LR84G - standard models with gauge port Rc1/8 (without gauge)

Symbol	Port size	Pressure range (bar)	Adjustment	Integrated gauge (bar)	Weight (kg)	Model*)
	G3/8	0.3 10	T-bar	0 10	0.75	LR84G-3GT-RMN
	G1/2	0.3 10	T-bar	0 10	0.75	LR84G-4GT-RMN
	G3/4	0.3 10	T-bar	0 10	0.73	LR84G-6GT-RMN

^{*)} All models shown here are supplied with gauge port applicable for flow direction left to right.

With flow direction right to left please use the online configurator www.norgren.com/air-preparation-configurator or contact Norgren

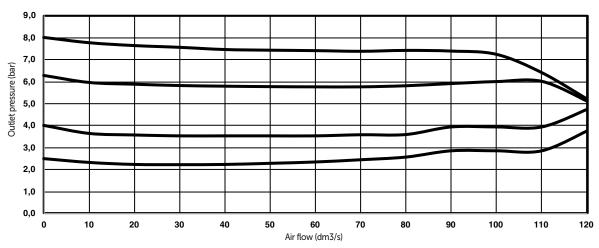


Option selector *1) LR84G-★★T-R★★ Port size Substitute Substitute Gauge 3/8" 3 Without integrated gauge but Ν with gauge port 1/8" 1/2" 4 With integrated gauge *3) G 3/4" 6 Thread form Substitute Pressure range *2) Substitute PTF Α 0.3 ... 4 bar F ISO G G 0.3 ... 10 bar (standard) Μ Adjustment Substitute *2) Outlet pressure can be adjusted to pressures in excess of, and less than, those specified. Do not use these units to control pressures outside of T-bar *1) All models shown here are applicable for flow direction left to right. With flow direction right to left please use the online configurator the specified ranges. www.norgren.com/air-preparation-configurator or contact Norgren *3) Attention: With integrated gauge temperature range of the unit changes to -20°C ... +65°C

Flow characteristics

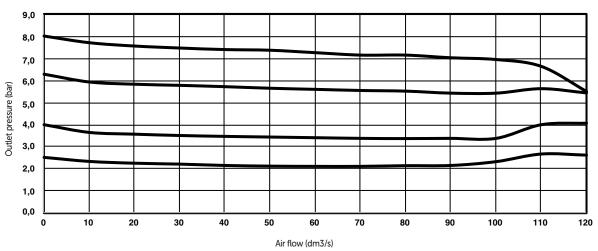
Inlet pressure: 10 bar (145 psi)

Port size: 1/2"



Inlet pressure: 10 bar (145 psi)

Port size: 3/8"





Accessories































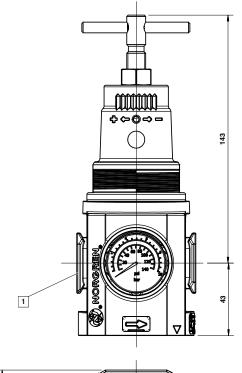


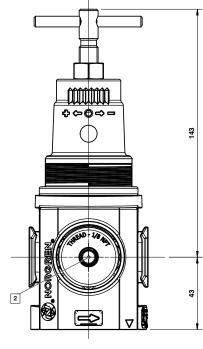


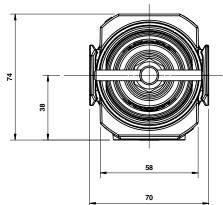
Dimensions

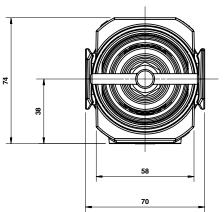
Dimensions in mm Projection/First angle











<sup>Main ports 3/8", 1/2" or 3/4"
(ISO G/PTF)
Gauge Port Rc 1/8 for ISO G and 1/8 PTF for PTF main ports</sup>

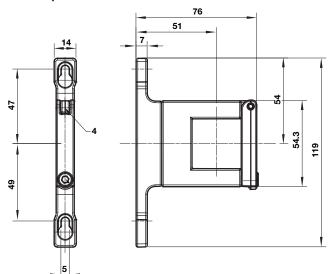


Accessories

Dimensions in mm Projection/First angle

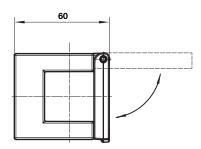


Quikclamp® with wall bracket

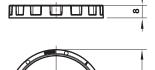


Quikclamp®





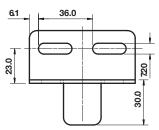
Panel mounting nut

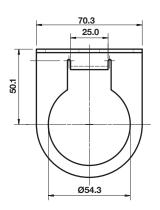


9

Recommended panel hole size: ø 55 mm ... 57 mm Panel thickness: 2 ... 6 mm

Neck mounting bracket





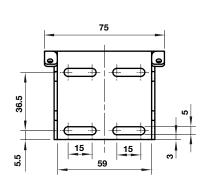


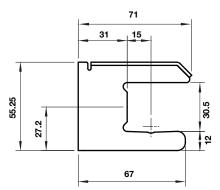
Mounting bracket

Dimensions in mm Projection/First angle



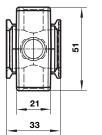


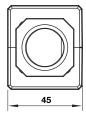


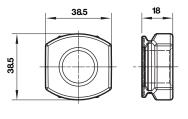


Pressure sensing block

Pipe adaptor

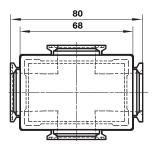


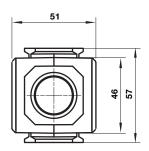


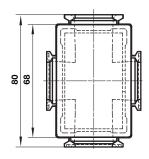


Full flow porting block horizontal

Full flow porting block vertical

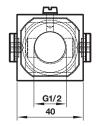


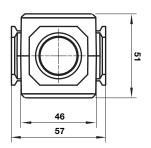




Porting block for 18D pressure switch

32





Warning

These products are intended for use in industrial compressed air systems only. Do not use these products where pressures and temperatures can exceed those listed under »Technical features/data«.

Before using these products with fluids other than those specified, for non-industrial applications, life-support systems or other applications not within published specifications, consult

IMI Precision Engineering, Norgren Ltd.

Through misuse, age, or malfunction, components used in fluid power systems can fail in various modes. The system designer is warned to consider the failure modes of all component parts used in fluid power systems and to provide adequate safeguards to prevent personal injury or damage to equipment in the event of such failure.

System designers must provide a warning to end users in the system instructional manual if protection against a failure mode cannot be adequately provided.

System designers and end users are cautioned to review specific warnings found in instruction sheets packed and shipped with these products.