

Aperflux 101

The **Aperflux 101** is one of the **pilot-operated gas pressure regulators** designed and manufactured by Pietro Fiorentini. This device is suitable for use with previously filtered non-corrosive gases, and it is mainly used for high-pressure transmission systems and for medium pressure natural gas distribution networks. According to the European Standard EN 334, it is classified as **Fail Open.** The Aperflux 101 is **Hydrogen Ready** for NG-H2 blending.





Gas liquefaction

booster stations

Gas compression /



City gates

Gas storage

Regasification

Heavy industries

Features	Values
Design pressure* (PS1 / DP2)	up to 8.5 MPa up to 1,232 psig
Ambient temperature* (TS1)	from -20 °C to +60 °C from -4 °F to +140 °F
Inlet gas temperature*	from -20 °C to +60 °C from -4 °F to +140 °F
Inlet pressure (MAOP / p _{umax} 1)	from 0.18 MPa to 8.5 MPa from 26 psig to 1,232 psig
Range of downstream pressure (Wd1)	from 0.08 MPa to 7.4 MPa from 11,6 psig to 1,073 psig
Available accessories	none
Minimum operating differential pressure (Δp_{min}^{-1})	0.1 MPa - recommended > 0.2 MPa 14.5 psig - recommended > 29 psig
Accuracy class (AC1)	up to 1 (depending on working conditions)
Lock-up pressure class (SG ¹)	up to 2.5 (depending on working conditions)
Nominal size (DN ^{1,2})	DN 50 2"; DN 80 3"; DN 100 4";
Connections	Class 300/600 RF / RTJ according to ANSI B 16.5

is the maximum for which the equipment's full performance, including accuracy is guaranteed. Product may have a different pressure or temperature ranges according to the version and/or installed accessories.





Materials and Approvals

Part	Material
Body	Cast steel ASTM A352 LCC for rating 300 and 600
Cover	Rolled or forged carbon steel A350 LF2
Seat	Stainless steel
Diaphragm	Vulcanized rubber
Sealing ring	Nitrile rubber
Compression fittings	According to DIN 2353 in zinc-plated carbon steel
NOTE: The materials indicated above refer to the standard models. Different materials can be provided according to specific needs.	

Table 2 Materials

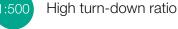
The Aperflux 101 regulator is designed according to the European standard EN 334. The regulator reacts in opening (Fail Open) according to EN 334. The product is certified according to European Directive 2014/68/EU (PED). Leakage class: bubble tight, better than VIII according to ANSI/FCI 70-3.



Aperflux 101 competitive advantages



Compact and simple design





Low noise



Easy maintenance



Balanced type



Biomethane compatible and 20% Hydrogen blending compatible. Higher blending available on request