

## Fire hydrant ATLAS+ Traffic DN80-100 - Symmetric outlets



### A good choice on a long term period

SG PAM Fire Hydrants are designed to last in time without particular intervention; their functionalities are kept even after many years of use.

The product was qualified in our PAM Laboratory accredited COFRAC.

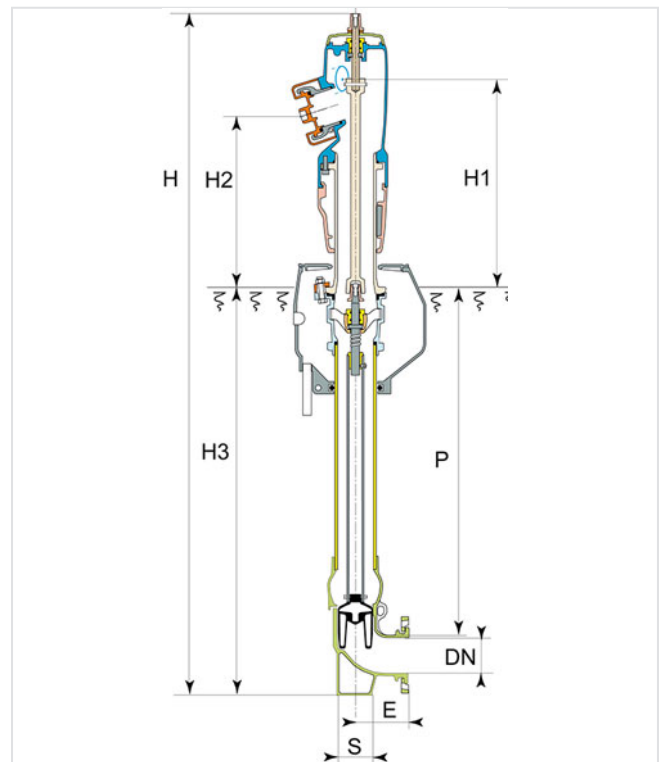
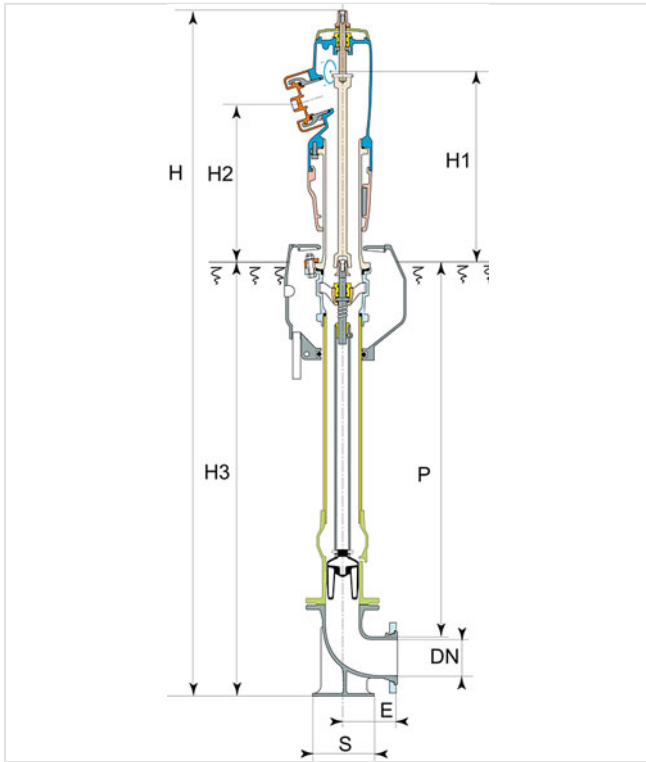
The product offers higher performances compared to the requirements of the standards:

- a number of opening and closing higher than the 1,000 necessary cycles;
- a resistance of the envelope to the pressure higher than 25 bars;
- easily manoeuvrable with operating torques lower than 80 Nm.

### A pleasant design

SG PAM designed the Fire Hydrant ATLAS + to integrate perfectly the urban landscape and to bring a little modernity and a contemporary design: slim and purified lines, soft and continuous forms, alliance of the red and the metallised grey.

DN (mm)	Version	Outlets	P=HC (mm)	H (mm)	H1 (mm)	H2 (mm)	H3 (mm)	E (mm)	S (mm)	Mass (kg)	References
80	Bended box	1xDN65	1029	1961		493	1181	120	95x80	105.00	RYA80FBBAC
80	Bended box	2xDN40 + 1xDN65	1029	1961	592	493	1181	120	95x80	105.00	RYA80FBBBC
80	Straight box	1xDN65	1309	2248		493	1468	165	180x180	127.00	RYA80FPCAC
80	Straight box	2xDN40 + 1xDN65	1309	2248	592	493	1468	165	180x180	130.00	RYA80FPCBC
100	Bended box	2xDN65 + 1xDN100	1066	2015	590	488	1235	152	100x90	106.50	164249
100	Straight box	2xDN65 + 1xDN100	1314	2278	590	488	1498	180	200x200	128.50	164251



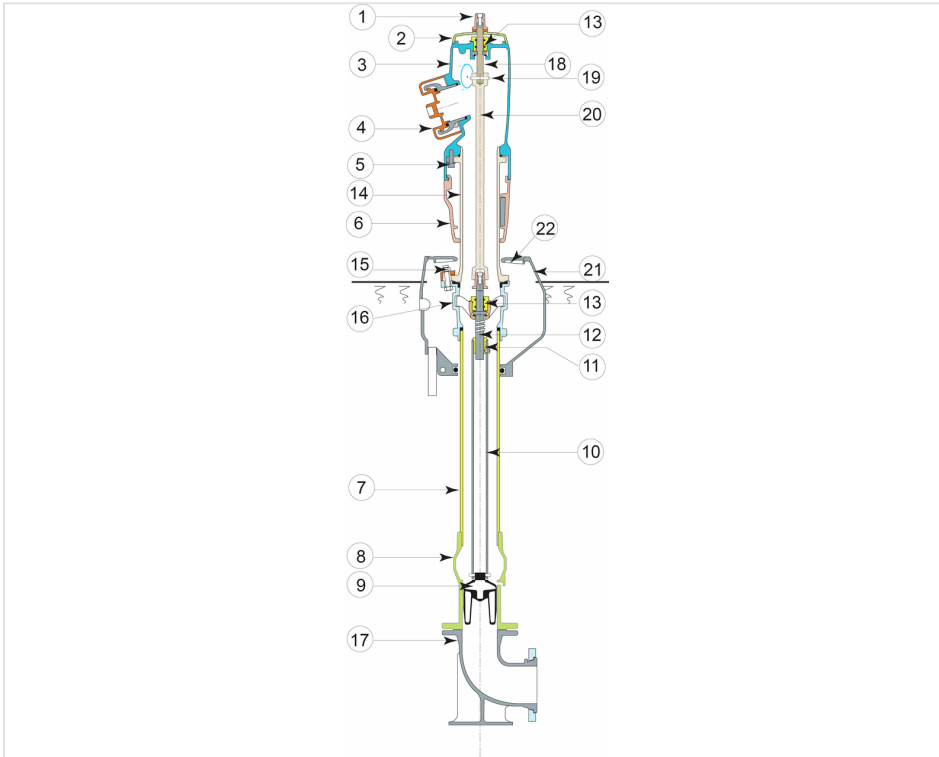
## Field of use

Fire hydrants pillar or underground type are designed, according to applicable standards and regulations, for exclusive use of fire protection and using drinking water or raw water network.

They must be handled and used in strict compliance with the recommendations and best practice by personnel trained with these recommendations.

These devices must be inspected periodically (as required by regulations or recommended instructions) to verify and maintain their proper and safe operation.

## Material and coating



Item	Designation	Material	Coating
1	Operating cap	Ductile iron EN GJS 400-15 or 500-7 EN 1563	Zinc coated
2	Cover	Polyamide P A 6	Grey polyurethane paint
3	Upper body	Ductile iron EN GJS 400-15 or 500-7 EN 1563	250 microns fusion bonded red-brown epoxy + red polyurethane
4	Outlets	Aluminium type AS7G	Red polyurethane
5	Bolt	Steel CL 8/8 type	Zinc Bichromated
6	Adjustable junction box	Polyamide P A 6	Grey polyurethane paint
7	Lower body	Ductile iron EN GJS 400-15 or 500-7 EN 1563	250 microns fusion bonded epoxy
8	Straight valve box/Bended valve box	Ductile iron EN GJS 400-15 or 500-7 EN 1563	250 microns fusion bonded epoxy
9	Valve	Ductile iron NF EN 1563	EPDM rubber
10	Operating rod	Steel Tu 56-8 type NF EN 10240	Galvanized
11	Stem nut	Brass Cu Zn 39 Pb2 type NF EN 12420	
12	Operating stem	Steel X 20 CR 13 type NF EN 10088-3	

Item	Designation	Material	Coating
13	Upper and lower bush	Brass Cu Zn 39 Pb2 typeNF EN 12420	
14	Lower body	Ductile iron	250 microns fusion bonded red-brown epoxy + red polyurethane
15	Breakable traffic clamping shim	Ductile iron	250 microns fusion bonded blue epoxy + red polyurethane
16	Lower body	Ductile iron EN GJS 400-15 or 500-7 EN 1563	250 microns fusion bonded red-brown epoxy
17	Duckfoot Bend	Ductile iron EN GJS 400-15 or 500-7 EN 1563	250 microns fusion bonded blue epoxy
18	Operating shaft	X20 Cr 13 EN 10088-1	
19	Pin	X20 Cr 13 EN 10088-1	
20	Operating spindle	(OS) Forged steel C35 - NF EN 10083-1	25 microns black Cataphoresis
21	Adjustable junction box	Ductile iron	Bituminous varnish
22	Pavement cover	P A 6 - GF 30	

Notice [NPPI 03 A](#)

## Coating

Epoxy + red polyurethane 250 microns mini inside and outside for an excellent behavior against corrosion. A complementary coating on the air part enables him to resist the climatic requests: sun, the moon, bad weather, etc...

**Reference of the repairing paint: 291163**

## Standards and marking

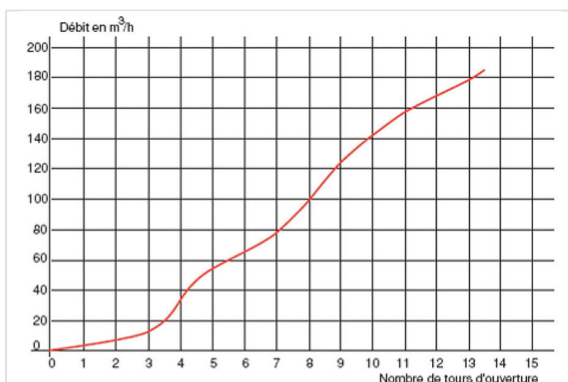
- Standards: fire hydrant Atlas+ Non Traffic DN100 is in conformity with Standards NF EN 14384/CN.
- Mark NF: SG Pam is authorized by CSTB to put NF Mark on this product. It is in conformity with Standards and complementary specifications NF EN 14384/CN.
- CE marking: fire hydrant for fire network in conformity with Standard NF EN 14384. First marking affixed: 2007.
- Alimentarity: the product is in conformity with the French regulation. It obtained the Sanitary Conformity certificate (ACS).

## Technical characteristics

Fire hydrant operating:

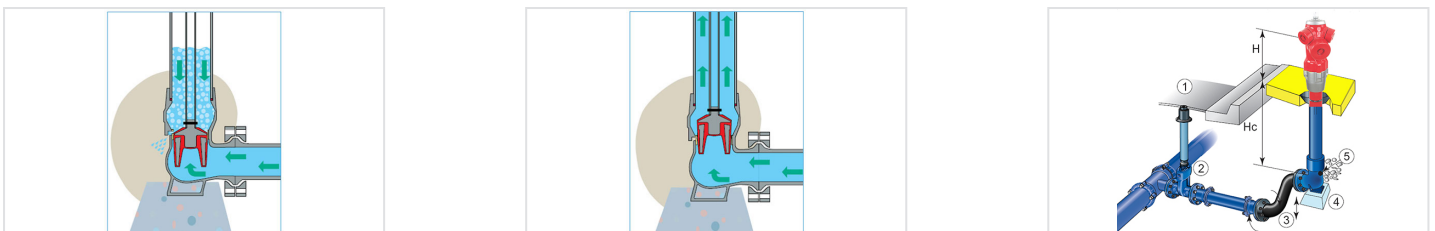
- Square: 30 x 30mm
- Closing direction: clockwise
- Number of revolutions: 13
- Kv coefficient: 160 (on the central outlet)
- Outlets diameter: 2 outlets Ø65 and 1 outlet Ø100 symmetric
- Connecting flange: drilling ISO PN10/16
- Allowable operating pressure (PFA): 16 bars
- Factory test pressure:
  - Body: 25 bars
  - Plug: 18 bars

## Hydraulic performances



Flow of the pillar hydrant ALTAS + non traffic DN100 according to the number of operating revolutions and creating a pressure loss of 1 bar with full opening.

## Reliable and perennial closing system



The closing system used with the products of the fire network was designed to guarantee the maximum security.

### **Easy draining without maintenance**

Automatic draining.

The fire hydrant equipped with a plug must be completely empty after use to avoid the risks of freezing in winter. SG PAM developed a completely automatic system of draining made up of a simple opening integrated in the ductile iron of the valve box.

Single design without component: no maintenance, perennial operation, no spare parts.

Fire hydrant in closed position (drawing 1) : the valve releases the opening of draining and water is evacuated gravitationally.

Fire hydrant in opened position (drawing 2) : the valve closes the draining from the beginning of the opening to the total opening. There is no loss of water during the opening operation.

### **Progressive and durable valve**

Valve made up of two ductile iron parts covered with EPDM. This technology enables a perennial tightness.

During the closing operation, the two parts approach by compressing the EPDM to have a durable tightness.

The closing system has been studied so that the flow is established in a progressive way at the opening and closing of the fire hydrant to avoid any risks of water hammer (sinusoidal tightness line).

Closing system with right geometry to avoid its blocking by possible foreign elements contained in water (stones for example) which could involve a tightness defect.

### **A great simplicity of installation and use**

The fire hydrant was designed with a mobile flange at the level of the duckfoot bend to be able to adjust the fire hydrant direction compared to its environment.

### **Installation of the fire hydrant in conformity with Standard NF S 62 200 and the regulations of the Book of the General Technical Specifications at the Public Markets of Works (fascicule 71)**

Earthwork is not necessary and the fire hydrants are directional on 360°.

The smooth barrel without bolt avoids the problems of corrosion of the fire hydrant, and is integrated directly in the ground, which makes it possible to simplify works of completion or landscape installation surrounding.

On this drawing it's necessary to underline:

- the use of an adjustment 'S' Bend in order to put the hydrant at the good level ;
- the draining material around the drain ;
- the block of the duckfoot bend ;
- the short flanged pipe or a piece of pipe with assembling pieces to respect a distance of 2 m minimum (from axis to axis) between the fire hydrant and the valve or 3 m minimum if the valve is in the axis of the front outlet of the fire hydrant.



*The information on this sketch is, to the best of our knowledge correct at the time of printing. However Saint-Gobain are constantly looking at ways of improving their products and services therefore reserve the right to change without prior notice, any of the data shown. Any orders placed will be subject to our Standard Conditions of Sale, available on request.*