

The gradual starter (patented) is used in pneumatic circuits where a cut-off in pressure, an abrupt start-up is to be avoided to prevent possible damages to equipment.

TECHNICAL CHARACTERISTICS

Max. working pressure: 10 bar

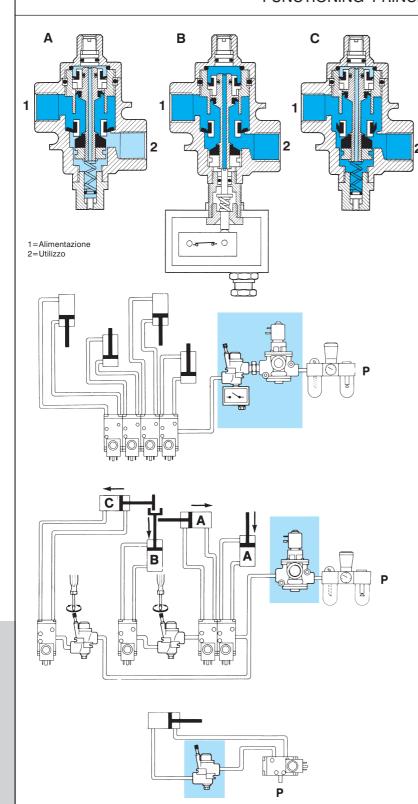
Ambient and fluid temperature: -20 ÷ 80°C

Valve body: die-cast zamak

Oil resistant seal

Fluid: filtered air, with or without lubrication

FUNCTIONING PRINCIPLE



The gradual starter is a 2–way valve which, in the stand–by position, allows the passage of an air regulated flow (A). When the working pressure is reached the valve allows the full passage of the air by remaining open even when pressure falls to $2 \div 2,5$ bar. Coupled with an NO electrical swith the valve gives a contemporary pneumatic and electrical reply (B). When pressure is blocked, air exhausts through the unidirectional seals (C).

Advantages

It prevents accidents and possible damages to the parts of the equipments. It reduces wear in pneumatic equipments and contributes to the synchronisation of the actuator movements after stopping. It can be installed on existing equipments without modifications.

When the starter is applied after the 3-way valve the cylinders can be progressively positioned. If an electrical reply is given, the integration of the starter will allow the reading of the complete opening, guaranteeing the operator complete starting safety.

The starter can act as plant selector if correctly applied and regulated and position cylinders according to a fixed sequence. The sequence of the example is A - B - C.

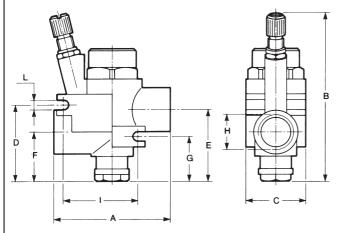
When the starter is inserted between the valve and the cylinder the rod will exit at low pressure up to max. stroke. At this point the automatic release of maximum pressure is reached.



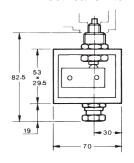
Туре	Connections	Ø mm	Capacity NI/min.	Description	Mass kg	Patr number
	G 1/8 G 1/4 G 1/4 G 3/8	6,5 6,5 9,5 9,5	620 620 2100 2100	with manual regulation	0,12 0,11 0,18 0,16	AM-5240 AM-5241 AM-5242 AM-5243
	G 1/4 G 3/8	9,5 9,5	2100 2100	with electrical switch	0,18 0,16	AM-5242 E AM-5243 E
	G 1/2 G 3/4 G 1	15 15 24	3500 3500 6800	with manual regulation	0,37 0,33 0,75	AM-5254 AM-5255 AM-5256
	G 1/2 G 3/4 G 1	15 15 24	3500 3500 6800	with electrical switch	0,51 0,47 0,75	AM-5259 AM-5260 AM-5261

Overall dimensions

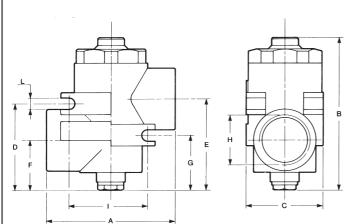
Gradual starters with G 1/8 - G 1/4 connections



Electrical switch



Gradual starters with G 1/4 - G 3/8 - G 1/2 - G 3/4 - G 1 connections



Α	В	С	D	Е	F	G	Н	I	L
46	61÷67	24	31	29	20	18,5	G 1/8 G 1/4	31	4,25
50	64÷71	28	35	38	21	24,5	G 1/4 G 3/8	37	5,25
67	86	40	46	48	27	28,5	G 1/2 G 3/4	42	6,25
101	107	56,5	54	57,5	30	33,5	G1	59,5	8,25