





# \*\*\* APPLICATION NOTES \*\*\*

- 1. The Governar regulator is ANSI Z21.80A-2012 / CSA 6.22A-2012(R2016) and ANSI Z21.18B-2012 / CSA 6.3B-2012 (R2017) certified for vent limited installations (indoor installations where a vent line is not required) depending upon local codes and standards requirements. Per the terminology of the standard there is no"vent less regulator", they are vent limited because they can leak up to 2.5 cu.ft. per hr. (1 cu.ft. per hr. propane) per the code. The regulators per code can be installed without installing a vent line but again are technically termed "vent limited" per the standard not vent less.
- **2.** The tables listed are guidelines in capacity. The actual capacity can differ based on inlet and outlet piping, type of equipment installed and flowing differential pressure of the system.
- 3. The Governor is a bubble tight full lockup regulator (it will not leak gas downstream when it shuts off). Lock up of the Governor is certified to ANSI Z21.80A-2012 / CSA 6.22A-2012(R2016) and ANSI Z21.18B-2012 / CSA 6.3B-2012 (R2017) standard. Lock up in any given installation can vary based on, piping, snap acting gas valves on high efficiency equipment , firing rate at the time of equipment shut off, debris in the line, temperature, as well as many other variables. You may see variations in lock up in some installations due to the above Pietro Fiorentini will not guarantee the lock up will meet your equipment requirement due to these variations in installations and piping.
- **4.** The low Capacity GOVERNORS 3/8" 1" are intended for use on equipment such as unit heaters or simple on/off furnace applications.
- 5. Use the High Capacity GOVERNORS on all "High Efficiency" quick acting gas valve applications, such as generators, pool heaters, or high turn down boilers. Install a regulator on each individual piece of equipment. Size the regulator at minimum 50% to 100% of listed capacity to minimize high lock-up. Make sure you match the regulator pipe size to the pipe size of the equipments gas train and design the piping to minimize pressure drop to 1" W.C. between the regulator and the gas train.
- **6.** Try to match the GOVERNOR regulator to the pipe size of the equipment and minimize pressure drop between the regulator and equipment to 1" W.C.. Minimize the amount of elbows and fittings between the regulator and the equipment and use full port ball valves not plug valves or reduced port valves.
- 7. Be careful on applications where you increase the outlet piping more than 1 diameter. You may need to install an external control line in the larger piping. The GOVERNOR can be ordered with or retrofitted with an external control line.
- **8.** Make sure on all installations you don't install the regulator directly at the equipment. Install the regulator 3 to 10 feet away depending on the application.
- 9. <u>Never install the external brass vent limiter outdoors</u>. For outdoors installation install appropriate vent protection.
- **10.** All GOVERNORS include an inlet filter. The filter and/or regulator may be cleaned by removing the bottom plate Torx security screws, bottom plate assembly, then remove the filter. The filter can then be cleaned with detergent or Buna compatable solvent and dried. The valve and orifice can be cleaned with a cloth while the bottom plate is off. Then reassemble the unit.
- **11.** If there are ever any questions on the installation or application of the Governor regulator, immediately contact your local authorized distributor or representative.
- The maximum inlet pressure on the regulator label is the required maximum pressure of the ANSI Z21.80A-2012
  / CSA 6.22A-2012(R2016) and ANSI Z21.18B-2012 / CSA 6.3B-2012 (R2017) rating. It is not always the maximum allowable operating inlet pressure of the regulator. The rating is a CSA requirement.



# \*\*\* WARRANTY POLICY \*\*\*

- 1. The Seller undertakes to remedy any defects, lack of quality or non conformity of the goods contract for which he is responsible, provided such defects have been notified in accordance within 10 (ten) days from the occurrence. The Seller may either repair or replace the goods which have shown to be defective. In case of repair, request to return product(s) for repair must be pre-approved in writing by our Sales Department. The product(s) shall be returned pre-paid to Pietro Fiorentini USA.
- 2. Seller is not responsible for defects due to: natural wearing, Buyer's inexperience, negligence, tampering or wrong assemblage, overcome of limits conditions, non authorized intervention, force majeure or fault of the Buyer.
- **3.** The duration of the guarantee is twenty four months from delivery of goods. The present warranty is not enforceable in case of lack of payment in the agreed terms. It is agreed that the obligation to repair or replace the defective goods is in lieu of any other legal guarantee or liability of the Seller, whether contractual or non contractual, which may arise out of or in relation with the goods supplied (e.g.compensation of damages, loss of profit, recall campaigns, etc.). For goods that have been purchased from sub-suppliers, the warranty guarantee grantee by them is herewith extended to the Buyer.



Warrant

### **GOVERNOR STANDARD MODEL**





STANDARD MODEL Inlet Pressure Range: 3" W.C. to 2 PSIG

#### **MAIN FEATURES**

ANSI Z21.80A-2012 / CSA 6.22A-2012(R2016) Class I for outlet pressures up to 14" W.C. Certified Integral Vent Limiter External Vent Limiter – no vent line required\*\* Positive 100% bubble tight lockup Inlet and Outlet test ports 500 to 1 Turndown Filter included in all models

#### **SPECIFICATIONS**

Suitable for use with Natural Gas, LPG, and other non-corrosive, clean gas Inlet Pressure: 3" W.C. to 2 PSIG CSA approved Max. Inlet 7.25 PSIG for non-CSA applications Outlet pressure: 2" W.C. to 14" W.C. and up to 4.25 PSIG for non-CSA applications Temperature range: -40°F to 150°F Connections: ½" thru 4" Maximum Emergency Inlet Exposure Pressure: 80 PSIG Suitable for Indoor or Outdoor Installation\*\*\*

#### **VENT SIZE**

1/4" NPT 1/2" - 1" 1/2" NPT 11/4" - 4"

### **OUTLET SPRING RANGE**

Green 2" W .C. to 5.1" W.C.\* Red 2.75" W .C. to 7.87" W.C.\* White 4" W .C. to 11.8" W.C.\* Black 6" W.C. to 14" W.C.\* Yellow 9.8" W.C. to 27.5" W.C.\* Violet 23.6" W.C. to 59" W.C. or 0.85 to 2.13 PSIG \* Orange 55" W.C. to 118" W.C. or 2 to 4.26 PSIG

- \* Spring is CSA outlet pressure certified
- \*\* As Approved by Local Codes and Standards
- \*\*\* Brass vent limiter must be removed for outdoor installation



## **TECHNICAL DATA**

	Outlet Pessue Set	sure		
	Point	14" W.C.	1 PSIG	2 PSIG
31051 ½"	8" W.C.	386 (360)	552 (649)	785 (923)
	11" W.C.	218 (256)	511 (601)	785 (923)
<b>31052</b> ¾"	8" W.C.	369 (450)	665 (812)	946 (1154)
	11" W.C.	363 (321)	616 (751)	946 (1154)
31053 1"	8" W.C.	495 (585)	893 (1,055)	1270 (1154)
	11" W.C.	353 (417)	825 (977)	1270 (1154)
31150 ½" High Capacity	8" W.C.	610 (855)	1097 (1,543)	1558 (2193)
	11" W.C.	433 (609)	10,14 (1,428)	1558 (2193)
31151 ¾" High Capacity	8" W.C.	714 (1,080)	1284 (1,949)	1824 (2771)
	11" W.C.	507 (770)	1187 (1,803)	1824 (2771)
31152 1" High Capacity	8" W.C.	903 (1,283)	1625 (2,314)	2309 (3290)
	11" W.C.	642 (914)	1503 (2,142)	2309 (3290)
31153 1¼"	8" W.C.	2,071(3,062)	3,735 (5,522)	5311 (7851)
	11" W.C.	1,476 (2,183)	3,457 (5,110)	5311 (7851)
31154 1½"	8" W.C.	2,567 (3,197)	4,629 (5,766)	6581 (8197)
	11" W.C.	1,829 (2,279)	4,284 (5,336)	6581 (8197)
31155 2"	8" W.C.	5,179 (5,854)	9,339 (10,557)	13278 (15009)
	11" W.C.	3,691(4,173)	8,643 (9,336)	13278 (15009)
31156/F 2½"	8" W.C.	6,530 (7,431)	11,775 (13,999)	16741(19051)
	11" W.C.	4,655 (5,297)	10,898 (12,401)	16741(19051)
31157/F 3"	8" W.C.	7,205 (9,007)	12,993 (16,242)	18473 (23092)
	11" W.C.	12,025 (6,240)	12,025 (15,032)	18473 (23092)
31158/F 4"	8" W.C.	12,835 (15,762)	23,245 (28,424)	32906 (40411)
	11" W.C.	9,149 (11,236)	21,420 (26,306)	32906 (40411)
				Tab.3

Capacity in cfh for .60 Specific gravity gas with filter (capacity withouth filter in brackets

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## STANDARD MODEL DIMENSIONS



Model	Size	A	В	C	D	E	F	G*	Weight (Lbs)
PF400S	3/8 NPT	3.90	-	3/8	-	3.42	-	3.10	0.56
PF400S	1/2" NPT	3.90	-	1/2	-	3.42	-	3.10	0.56
31051	1/2" NPT	4.09	-	1/2	-	5.59	-	3.78	1.54
31052	3/4" NPT	4.09	-	3/4	-	5.59	-	3.78	1.54
31053	1" NPT	4.09	-	1	-	5.59	-	3.78	1.54
31150	1/2" NPT	4.72	-	1/2	-	6.89	-	4.49	2.75
31151	3/4" NPT	4.72	-	3/4	-	6.89	-	4.49	2.75
31152	1" NPT	4.72	-	1	-	6.89	-	4.49	2.75
31153	1 1/4" NPT	7.68	-	1 1/4	-	10	-	7.56	7.5
31154	1 1/2" NPT	7.68	-	1 1/2	-	10	-	7.56	7.5
31155	2" NPT	9.29	-	2	-	12.44	13.74	7.56	12.34
31156/F	2 1/2" FLANGED	-	16.9	3	ANSI 150	-	17.09	12.52	27.56
31157/F	3" FLANGED	-	16.9	3	ANSI 150	-	17.09	12.52	27.56
31158/F	4" FLANGED	-	16.9	4	ANSI 150	-	19.76	12.52	27.56
									Tab.6

 $^{\star}\left( \mathbf{G}\right)$  Dimensions is the width of the regulator

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The data are not binding. We reserve the right to make changes without prior notice.



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