

FISHER TYPE 64



Type 64 high pressure adjustable regulator used for high pressure burners as crop dryers or industrial burners. Suitable for liquid under 150° F. Does not have internal relief valve. Separate relief valve may be required by NFPA-58.

FISHER TYPE 64SR



Internal Relief Valve

Type 64SR High pressure adjustable regulator with a built-in relief valve. Applications include high pressure burners in crop dryers and tobacco curers. Not suitable for liquid. May also be used as a first stage regulator when set at 10 PSIG or less.



FISHER TYPE 64 & 64SR REGULATORS

Standard RMI Part No.	Part No. w/ Relief Valve	Inlet & Outlet	Pressure Setting	Pressure Range, PSI	Capacity* BTU/HR
64/33	64SR/21	1/2" FNPT	10	3-15	2,625,000
-	64SR/22	1/2" FNPT	15	5-20	3,000,000
64/35	64SR/23	1/2" FNPT	20	5-35	3,600,000
64/36	--	1/2" FNPT	40	30-60	4,150,000
64/222	--	1/2" FNPT	50	35-100	5,250,000

*Based on inlet pressure 20# over outlet pressure with 20% droop.



FISHER 627

A popular regulator for many commercial and industrial loads. Field-proven over the years, reliable performance within their capacity range. Additional overpressure protection typically required.



FISHER 630

A high capacity regulator which offers reliable performance for large load commercial and industrial applications.



FISHER TYPE 99

A pilot-operated regulator, keeps constant outlet pressure with varying inlet pressure and flows, used as first, second or single stage service.



RMI Part No.	Inlet /Outlet Connection	Orifice Size	Pressure Range, PSI	Pressure Setting, PSI	Internal Relief Valve	Capacity BTU/HR
627/5810	3/4"	3/8"	5-20	10	No	6,080,000
627/6210	3/4"	1/2"	5-20	10	No	10,755,000
627R-117	3/4"	1/2"	5-20	10	Yes	10,755,000
627/7710	1"	1/2"	5-20	10	No	10,773,000
627R-197	1"	1/2"	5-20	10	Yes	10,773,000
630-104/78	2"	1/2"	8-20	10	No	14,000,000
99-513P	2"	7/8"	2-10	10	No	36,368,000
99-512P	2"	7/8"	5-15	15	No	37,950,000
99-515P	2"	7/8"	10-20	20	No	41,112,000
99-903P	2"	7/8"	10-65	30	No	44,275,000
99-504PH	2"	1 1/8"	5-15	15	No	63,250,000
99-901PH	2"	1 1/8"	10-65	30	No	74,318,000

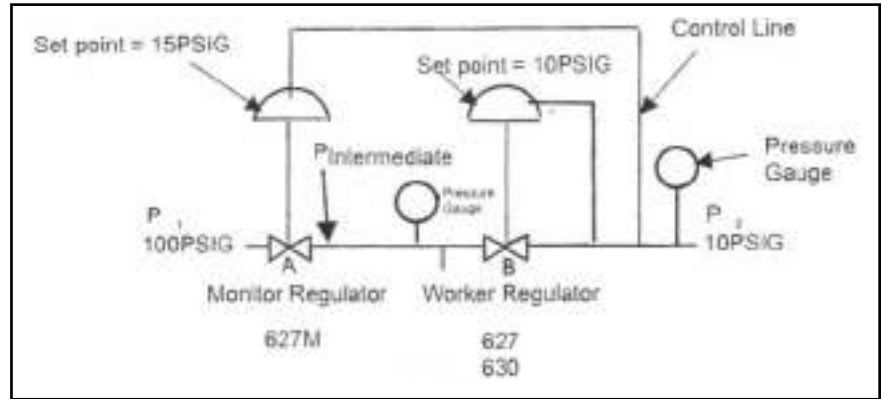
Capacity based on inlet pressure 20 PSI greater than setting pressure and 20% droop. Other spring ranges and orifice sizes available.

TYPICAL WIDE OPEN UPSTREAM MONITOR INSTALLATION

Monitor regulator system provides overpressure protection for jurisdictional accounts with no release of gas like a relief valve would.

A monitor system consists of two regulators in series. The “worker” regulator controls downstream pressure during normal operating conditions. If the “worker” allows the pressure to build up downstream, the “monitor” regulator takes over control by sensing the higher pressure through the pilot control line and keeping the downstream pressure to a safe maximum pressure.

The “worker” regulator is usually set at 8-10 psi and the “monitor” regulator set at 13-15 psi. Because the monitor regulator is sensing the 8-10 psi setting of the operating regulator, it remains wide open due to its 15 psi set pressure. The “monitor” regulator will remain wide open unless the operating regulator loses pressure control and its outlet pressure climbs to 15 psi. The “monitor” regulator will start to function and limit the downstream pressure to 15 psi.



MONITOR REGULATORS

RMI Part No.	Inlet Connection	Orifice Size	Pressure Range, PSI	Pressure Setting, PSI	Internal Relief Valve
627M-421	3/4"	1/2"	5-20	15	No
627M-471	1"	1/2"	5-20	15	No
627M-267	2"	1/2"	5-20	15	No
99-504PHM	2"	1 1/8"	5-15	15	No

TYPICAL MONITOR SYSTEM

RMI Part No. Worker Regulator	Body Size NPT	Orifice Size Inches	Monitor Regulator	Body Size NPT	Orifice Size Inches	Regulating Capacity BTU - LP Gas*
627/5810	3/4"	3/8"	627M-421	3/4"	1/2"	5,750,000
627/6210	3/4"	1/2"	627M-421	3/4"	1/2"	7,050,000
627/7710	1"	1/2"	627M-471	1"	1/2"	7,050,000
630-104/78	2"	1/2"	627M-267	2"	1/2"	8,400,000
630-104/78	2"	1/2"	99-504PHM	2"	1 1/8"	13,500,000
99-504PH	2"	1 1/8"	99-504PHM	2"	1 1/8"	42,650,000

* Capacities Calculated at 30 PSIG in and 8 PSIG out w/20% droop.



FISHER LOW PRESSURE RELIEF VALVES

Diaphragm Relief Valves

Type 1805 relief valve is designed for installation between the First and Second Stage regulators or in the downstream line from a high pressure regulator used for a Final-Stage service. Available in 1" or 2" valve bodies.

Type 289H relief valve is designed for installation downstream of a large Second-Stage regulator. The larger diaphragm in this relief valve provides extremely sensitive operation.



289H/2



1805-19P

RMI Part No.	Inlet/Outlet	Relief Setting PSI	Relief Range PSI
1805-19P	1"	30	10-60
1805-52	2"	30	10-50
289H/2	2"	1.5"	.5 - 2.25
289H/3	2"	1.5"	1.75 - 7
289H-43	1"	15	10-20

FISHER HSRL

Type HSRL is an UL listed regulator designed for light commercial applications up to 2,100,000 BTU/HR. It utilizes a high strength cast iron body and a 3/4" NPT drip lip vent design with high capacity internal relief valve.



COMMERCIAL & INDUSTRIAL REGULATORS

RMI Part No.	Inlet/Outlet Size	Set Pressure	Outlet Adjustment	Orifice Size	Vent Location & Tap Size	Capacity** BTU/HR
HSRL-BFC*	3/4" FNPT	11" WC	9-13" WC	3/8"	Over Inlet side, 3/4"	2,100,000
HSRL-CFC*	1"	11" WC	9-13" WC			

* Includes high capacity relief valve.

** Capacity based upon 10 PSIG inlet and 20% droop, except PSIG regulators.

FISHER CS200, CS400 & CS800 SERIES COMMERCIAL / INDUSTRIAL REGULATORS



CS200



CS400



CS400

These direct-fired, spring-loaded regulators have been engineered to fit a multitude of pressure-reducing applications including commercial and industrial installations.

CS200 offers a full 360-degree of rotation of the actuator via the union ring connection between the body and casing, for ease of maintenance and installation.

CS400 and CS800 provides flexibility with numerous body sizes, end connections, outlet pressure settings, orifice sizes, as well as the option for internal and external pressure regulation. In addition these models offer multiple overpressure protection options to meet the demands on many application requirements.

COMMERCIAL & INDUSTRIAL REGULATORS

RMI Part No.	Inlet/Outlet Size	Outlet Adjustment Range	Set	Orifice Size	Vent Size	Pressure Tap	Capacity @ 20% droop*	Capacity @ 1% droop
CS200IR-6EC1	3/4" FNPT	10-14" WC	11"wc	1/2"	1" FNPT	1/4" inlet	2,551,250	n/a
CS200IR-6EC3	1"	10-14" WC	11"wc	1/2"	1"	1/4" inlet	3,758,000	n/a
CS200IR-6EC6	1 1/4"	10-14" WC	11"wc	1/2"	1"	1/4" inlet	3,846,500	n/a
CS400IR-6EC6	1 1/4"	10-14" WC	11"wc	1/2"	1"	1/4" inlet	5,495,000	n/a
CS400IR-8EC6	1 1/4"	10-14" WC	11"wc	3/4"	1"	1/4" inlet	6,437,000	n/a
CS400IR-8EC7	1 1/2"	10-14" WC	11"wc	3/4"	1"	1/4" inlet	7,065,000	n/a
CS400IR-8EC8	2"	10-14" WC	11"wc	3/4"	1"	1/4" inlet	7,065,000	n/a
CS800IR-8CC7	1 1/2"	8-12" WC	11"wc	1"	1"	-	9,106,000	n/a
CS800IR-8CC8	2"	8-12" WC	11"wc	1"	1"	-	18,290,500	n/a
CS820IR-8GC7	1 1/2"	1.5-3.5 #	2 psi	1"	1"	-	15,040,600	8,242,500
CS820IR-9GC7	1 1/2"	1.5-3.5 #	2 psi	1-3/8"	1"	-	17,615,400	10,095,100
CS820IR-8GC8	2"	1.5-3.5 #	2 psi	1"	1"	-	21,477,600	14,491,100
CS820IR-9GC8	2"	1.2-3.5 #	2 psi	1-3/8"	1"	-	28,511,200	16,956,900
CS820IR-8HC7	1 1/2"	2.5-5.5 #	5 psi	1"	1"	-	15,291,800	3,752,300
CS820IR-9HC7	1 1/2"	2.5-5.5 #	5 psi	1-3/8"	1"	-	18,902,800	5,181,000
CS820IR-8HC8	2"	2.5-5.5 #	5 psi	1"	1"	-	16,563,500	3,752,300
CS820IR-9HC8	2"	2.5-5.5 #	5 psi	1-3/8"	1"	-	21,336,300	5,086,800

Capacities are based on 10 psig inlet pressure.

* For pounds-to-inches regulators, capacity is for 2" wc droop



FISHER TYPE 299

Pilot-operated unit keeps outlet pressure constant despite varying flow rates and inlet pressures. A lightweight (19 lbs.), yet dependable regulator for applications from large commercial sites to smaller multi-dwelling establishments. Maximum inlet pressure 150 PSI.



FISHER TYPE 99

Pilot-operated regulator, keeps constant outlet pressure with varying inlet pressure and flows, used as first, second and single stage service.



FISHER TYPE 133

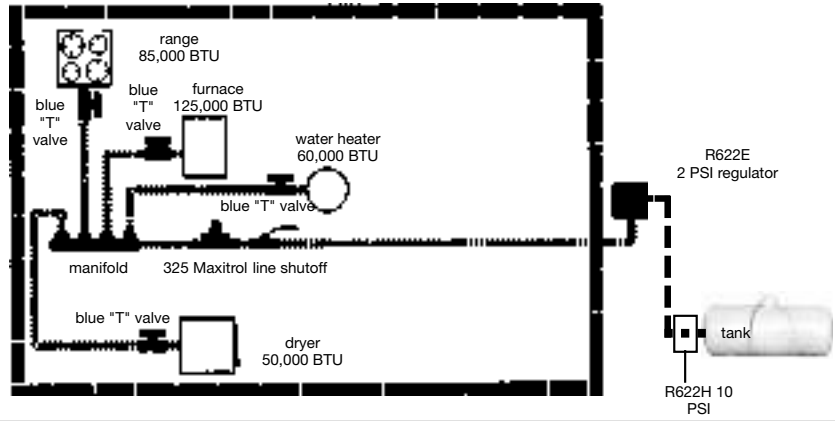
Self-operated 2nd stage regulator for either low pressure or pounds to pounds service. Maximum inlet pressure is 60 psig, and a downstream control line is required.

COMMERCIAL AND INDUSTRIAL REGULATORS

RMI Part No.	Inlet	Outlet	Orifice Size	Pressure Setting	Registration	Range	Capacity BTU/HR
299H-101	1 1/2"	1 1/2"	3/4"	11" W.C.	Internal	9-20" W.C.	13,100,000
299H-102	2"	2"					19,700,000
299H-105	1 1/2"	1 1/2"			External		20,400,000
299H-106	2"	2"					29,400,000
99-510P	2"	2"	7/8"	1 PSI		1/4 - 2 PSI	49,000,000
99-501P			1 1/8"				70,875,000
133L-4	2"	2"	2"	8.5-18" W.C.	N/A	Over outlet 1" FNPT Screened	113,400,000
133H-1				1.5-3 PSIG			
133H-2				2-5 PSIG			

DUAL PRESSURE SYSTEMS (2 PSI SYSTEMS)

Elevated pressure systems (2 psi for residential and up to 5 psi for commercial installations) are usually piped with one or more house line regulators (pounds-to-inches) followed by a manifold and runs to each of the appliances. It is possible that these runs to appliances may contain tee branching off to an additional appliance where gas loads permit.



FISHER RESIDENTIAL 2 PSI REGULATORS

2 PSI service regulators have an internal relief valve, and are designed to serve as intermediate regulators installed on the exterior of the building structure. These regulators supply propane to a manifold (located inside the structure) where piping such as corrugated stainless steel tubing (CSST) is routed to a line regulator supplying approximately 11" w.c. to appliances throughout the structure.



2 PSI INTEGRAL 2 STAGE

RMI Part No.	Inlet Connection	Outlet Connection	Outlet Pressure Range	Vent	Capacity BTU/hr Propane
R232E-BBH	1/4" FNPT	1/2" FNPT	2 psig	Over	500,000 (1)
R232E-HBH	F. POL	1/2" FNPT	0.14 bar	Outlet	500,000 (1)
R632E-BCH	1/4" FNPT	1/2" FNPT	2 psig 0.14 bar	Over Outlet	850,000 (1)
R632E-HCH	F. POL	1/2" FNPT			900,000 (1)
R632E-CFH	1/4" FNPT	3/4" FNPT			850,000 (1)
R632E-JFH	F. POL	3/4" FNPT			850,000 (1)

(1) Capacities based on 30 psig / 2.07 bar inlet pressure and 20% droop.

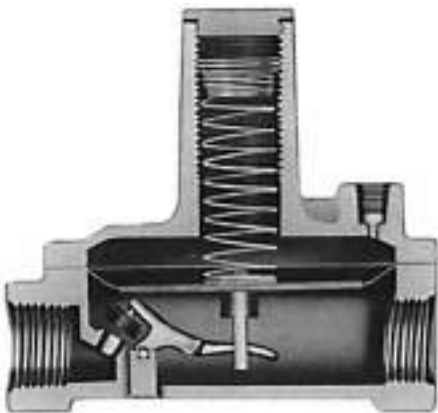
2 PSI 2nd STAGE

RMI Part No.	Inlet Connection	Outlet Connection	Outlet Pressure Range	Vent	Capacity BTU/hr Propane
R622E-BCH	1/2" FNPT	1/2" FNPT	1.5 - 2.5 psig	Over Inlet	1,250,000
R622E-DCH	3/4" FNPT	3/4" FNPT			1,500,000
R652E-DFH	3/4" FNPT	3/4" BACK			1,400,000



MAXITROL 325 SERIES LINE REGULATORS Lever Acting Design - Line Certified

Used in 2 PSIG piping systems for propane installations. 325 Series can only be used as an appliance regulator with a maximum 2 PSIG inlet pressure. 325 Series does not have an internal relief valve and can not be used as a second stage regulator.



325 Series

RMI Part No. w/vent limit installed	Vent Port	Inlet/Outlet	Propane Spring Range	Spring Setting	Operating Inlet PSI**	BTU Capacity Single Appliance	BTU Capacity Total Combined All Appliances
325-3L-3/8	1/8" limiter included	3/8"	7"-11" WC	11" WC	2 PSI	140,000	250,000
325-3L-1/2		1/2"				140,000	250,000
325-5AL-1/2	3/8" limiter included	1/2"				300,000	425,000
325-5AL-3/4		3/4"				300,000	550,000
325-5AL-1		1"				300,000	550,000
325-7-1.25	1/2" must vent to atmosphere	1 1/4"				900,000	1,000,000
325-7-1.5		1 1/2"	900,000	1,000,000			
325-7AL-1.25		1 1/4"	900,000	1,000,000			

* Regulator must be mounted in horizontal position and vent limiter must be mounted in upright position for best performance. Otherwise vent to outside building.

** Maximum inlet pressure is 10 PSI.