

		REF ONLY FOR PDM USE ONLY		DWG NO. MPAN-9402-XXX-0-OL	MODEL NO. MPAN-9402-XXX-0-OL	1		
REVISIONS								
SH-ZONE	REV	DESCRIPTION				ECO NO.	BY/DATE	APVD/DATE
-	A	RELEASED FOR PRODUCTION				-	DL-2/8/24	WS-2/22/24


- NOTES:
- APPROX WEIGHT: 20 LBS.
 - BACKPLATE: 0.090" THK 300 SERIES STAINLESS STEEL
 - REGULATOR: DUAL STAGE TIED DIAPHRAGM SEMICONDUCTOR GRADE 9460 SERIES
 - VCR TYPE AND BUTT-WELD CONSTRUCTION
 - VALVES: ROUND KNOB, 1/4 TURN, OPEN/CLOSED STATUS INDICATION WINDOW
 - HELIUM LEAK TESTED 1×10^{-9} scc/sec - Helium
 - MAXIMUM WORKING PRESSURE IS THE LESSER OF 3000 PSIG OR THE MAXIMUM ALLOWED BY THE CGA OR DISS CONNECTION
 - SYSTEM TO PASS PRESSURE RATING PER CRITERIA ON ANSI/ASME B31.3
 - ASSEMBLED IN CLASS 100 CLEAN ROOM

- MATERIALS OF CONSTRUCTION:
- REGULATOR BODY: 316L STAINLESS STEEL
 - REGULATOR BONNET: NICKEL PLATED BRASS
 - REGULATOR DIAPHRAGM: 316 STAINLESS STEEL
 - REGULATOR SEAT: KEL-F 81
 - REGULATOR LINKAGE: 316 STAINLESS STEEL
 - REGULATOR SPRING: 316 STAINLESS STEEL
 - REGULATOR SEALS: METAL TO METAL
 - REGULATOR FINISH: 10 Ra MAX
 - VALVE BODY: 316L STAINLESS STEEL VAR SECONDARY REMELT
 - VALVE FINISH: 10 RA MAX - ELECTROPOLISHED AND PASSIVATED
 - VALVE DIAPHRAGM: NI-CO ALLOY / UNS R30003
 - VALVE SEAT: PCTFE
 - PURGE GAS CHECK VALVE: 316L STAINLESS/VITON (STD) -NEOPRENE OR ETHYLENE PROPYLENE (OPTION)
 - GAUGES: 316L STAINLESS STEEL
 - TUBING: ELECTROPOLISHED 316L STAINLESS STEEL
 - BACKPLATE: 300 SERIES STAINLESS STEEL
 - MOUNTING BLOCKS: CLEAR ANODIZED ALUMINUM

- SPECIFICATIONS:
- REGULATOR FLOW CAPACITY (CV): 0.05
 - VALVES FLOW CAPACITY (CV): 0.29
 - OPERATING TEMPERATURE: -40°F TO 160°F (-40°C TO 71°C)
 - INLET CONNECTION: CGA OR DISS
 - OUTLET CONNECTION: 1/4" MALE VCR
 - VENT LINE CONNECTION: 1/4" X .035 WALL, SS TUBING

- UTILITIES NEEDED:
- PURGE GAS: 50 - 100 PSIG OF INERT GAS (TYPICALLY N2, AR, OR HE) FILTERED TO 0.01 μ m, 99.999 % PURITY

REGULATOR		
PART NUMBER	DELIVERY PRESSURE (PSIG)	OUTLET GAUGE (PSIG)
SEQ PAN9402xxx0	0-30	60
SEQ PAN9412xxx0	0-100	200

PROPRIETARY STATEMENT THIS DOCUMENT CONTAINS INFORMATION PROPRIETARY TO MATHESON TRI-GAS, INC. AND SHALL NOT BE REPRODUCED OR DISCLOSED TO THIRD PARTIES WITHOUT PRIOR WRITTEN CONSENT FROM MATHESON TRI-GAS.	TOLERANCES		MATERIAL:		APPROVALS		 ask...The Gas Professionals™ GAS EQUIPMENT TECHNOLOGY GROUP, MONTGOMERYVILLE, PA 18936	
	INCH	METRIC	FINISH:		DRAWN BY:	DATE:		
	X ± .1 .X ± .03 .XX ± .01 .XXX ± .005	X ± .8 .X ± .3 .XX ± .13	63 ✓ 1.6 ✓		DL	2/8/24	TITLE: OUTLINE DRAWING HIGH PURITY PAN 9402 SERIES DUAL-STAGE PANEL	
	THIRD ANGLE PROJECTION		DO NOT SCALE DRAWING		CHECKED BY:	DATE:		
					WS	2/22/24		
					ENGINEER:	DATE:	SIZE	D
					WS	2/22/24	DWG. NO.	MPAN-9402-XXX-0-OL
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