

**Z514, Z524 Devicenet™  
Mass Flow Controller / Meter**

Mass flow controller model *1	SEC-Z514KX	SEC-Z514MGX	SEC-Z524MGXN	SEC-Z524MGX
Mass flow meter model *1	SEF-Z514KX	SEF-Z514MGX	SEF-Z524MGXN	SEF-Z524MGX
Full-scale flow rate (N2 conversion flow rate)	1/2SCCM	MR/MG number #R01:10SCCM #R1.5:17.5SCCM #01:30SCCM #1.5:55SCCM #02:100SCCM #2.5:175SCCM #03:300SCCM #3.5:550SCCM #04:1SLM #4.5:1.75SLM #05:3SLM #5.5:5.5SLM #06:10SLM	MR/MG number #6.5:22SLM #07:30SLM #08:50SLM	
Valve Type	O: Normally open C: Normally closed			
Flow rate at fully closed control valve	≤ 2% F.S.			
Flow rate control range	2-100% of F.S.			
Flow rate measuring range (SEF)	0-100% of F.S.			
Accuracy *2	±1.0%F.S.	±1.0% S.P. (Flow rate > 25% F.S.)		
		±0.25% F.S. (Flow rate ≤ 25% F.S.)		
Operating temperature	5 to 50°C (recommended temperature range: 15 to 45°C)			
Response	≤ 1 second: Over full flow rate range			
Linearity	≤ ±0.5% F.S.			
Repeatability	≤ ±0.2% F.S.			
Operating differential pressure	50 to 300 kPa (d)	50 to 300 kPa (d)	200 to 300 kPa (d)	
		#5.5, #06: 100 to 300 kPa (d)		
Operating differential pressure (SEF)	≤ 300 kPa (d)			
MAX. Operating pressure	450kPa(g)			
Pressure resistance	1000kPa(g)			
Leak Integrity	≤ 5 × 10 <sup>-12</sup> Pa·m <sup>3</sup> /s (He)			
Digital interface	DeviceNet™ Protocol			
Wetted materials	316L Stainless Steel (polished surface)			
Power supply	Conforming to ODVA standards, DC 24 V, 4.0 VA			
Standard Fitting *3	1/4 inch VCR equivalent		1/4 inch VCR equivalent	1.5 inch IGS
	Option: 1.125 inch IGS, 1.5 inch IGS		Option: 1.125 inch IGS	
Mounting orientation	Free			

\*1 The gas type and full scale settings for the SEC(SEF)-Z514MGX and Z524MGXN can be changed by the operator, using special software.

\*2 The flow rate precision guaranteed temperatures conform to SEMI E56-1296 standards. The precision is that associated with the full-scale MR and MG number values.

\*3 IGS: Integrated Gas System

\* SCCM and SLM are notations indicating the gas flow rate (mL/min, L/min, at 0°C and 101.3 kPa).