

SQUARE ROOT EXTRACTOR

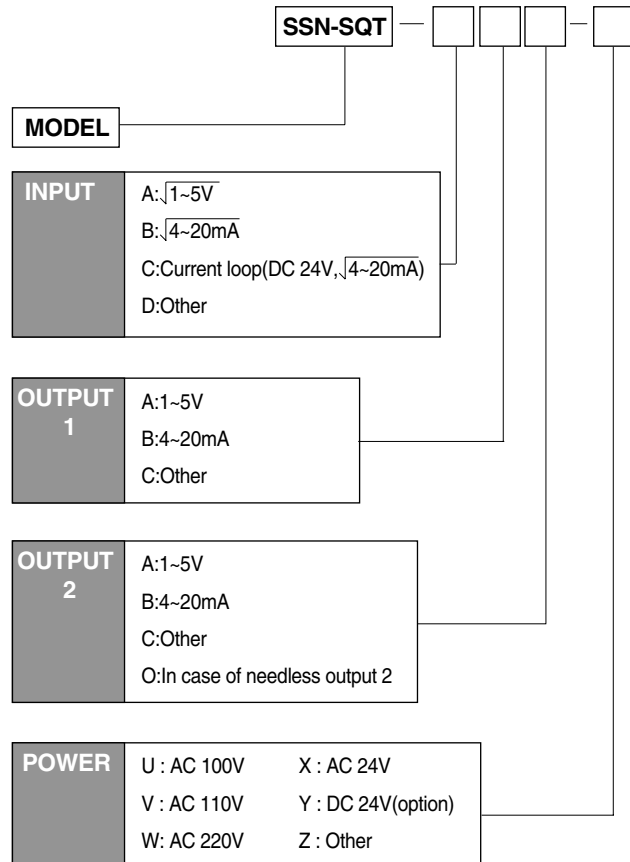
SSN-SQT



Converting DC input signal into an isolated square root output signal.

- Various 2-wire transmitters application.
- Square root extractor application(4-20mA).
- Contains linearizer circuit.
- 1 or 2 outputs are available from 1 input.
- Contains overvoltage protection circuit.
- Transformer isolation type.

MODEL & SUFFIX CODE SELECTION



GENERAL SPECIFICATIONS

Isolation/Type	Input to output to power/Transformer isolation type		
Power Supply	AC rating $\pm 10\%$, approx 3.5VA		
Accuracy	$\pm 0.3\%$ (Max)		
Temp Coefficient	$\pm 0.02\%$ / $^{\circ}C$ ($\pm 0.008\%$ / $^{\circ}F$)		
Linearity	$\pm 0.03\%$ F.S		
Insulation Resistance	Greater than 100M Ω with DC 500V		
Dielectric Strength	Input — Power	AC 2500V	1 minute
	Input — Output		
	Output 1 — Output 2		
	GND — Power		
Front Adjustments	Zero and Span $\pm 10\%$		
Overrange Output	approx $-10\% \sim 110\%$ at DC 1~5V		
Response Time	≤ 0.5 sec (0~90%)		
Operating Temperature/Humidity	$-20\sim 60^{\circ}C$ / 90%(N.C)		
Storage Temperature/Humidity	$-20^{\circ}C\sim 80^{\circ}C$ / 95%(N.C)		
Dimensions	W40×H129×D138(mm)		
Case Material	Aluminum		
Weight	about 400g		
Mounting	Wall mounting		

INPUT & OUTPUT SPECIFICATIONS

Input Impedance

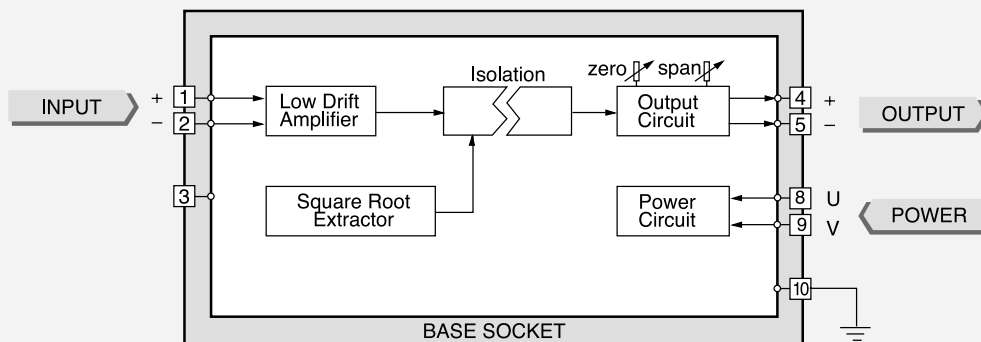
Input	Impedance
4~20mA	250Ω
1~5V	1MΩ(Min)

Output Load Resistance

Output	1 Point	2Point		Remark
	Output	Output-1	Output-2	
4 ~ 10mA	700Ω	600Ω	350Ω	(Max)
1 ~ 5V	5kΩ	5kΩ	5kΩ	(Min)

BLOCK DIAGRAM

1 Point Output



2 Point Output

