

Frequency (pulse, contact) TRANSMITTER & ISOLATOR

TX8-FD

FEATURES

- Measures Frequency Ranges up to 100kHz
- 13 Input and 4 Output Ranges Programmable
- Trip Relay option
- Dual output available (isolated)
- Plugs into 8 pin Din Rail mounted base
- Low cost & high stability
- CE Approved



SPECIFICATION

Input Range	Input Impedance	Output Range	Load Resistance
0 - 0.1 Hz	≥1M ohm	0 - 100 mV	≥100K ohm
0 - 1 Hz	≥1M ohm	0 - 1 V	≥50 ohm
0 - 10 Hz	≥1M ohm	0 - 5 V	≥250 ohm
0 - 20 Hz	≥1M ohm	0 - 10 V	≥500ohm
0 - 50 Hz	≥1M ohm	1 - 5 V	≥250 ohm
0 - 100 Hz	≥1M ohm	-10 - 0 - +10 V	≥1K ohm
0 - 200 Hz	≥1M ohm	0 - 1 mA	≤15K ohm
0 - 500 Hz	≥1M ohm	0 - 10 mA	≤1500 ohm
0 - 1K Hz	≥1M ohm	0 - 20 mA	≤750 ohm
0 - 2K Hz	≥1M ohm	4 - 20 mA	≤750 ohm
0 - 5K Hz	≥1M ohm		
0 - 10K Hz	≥1M ohm		
0 - 20K Hz	≥1M ohm		
0 - 50K Hz	≥1M ohm		
0 - 100K Hz	≥1M ohm		

Accuracy: ±0.1% of F.S.

Response time: ≤250 msec. Plus one pulse cycle

Span adjustment: ≤10% of F.S.

Zero adjustment: ≤5% of F.S.

Input mode: Voltage pulse, Open collector, Mechanical contact (30 Hz maximum)

Pulse width: 10 msec. minimum at < 20 Hz
Duty ratio 20 - 80% at > 20 Hz

Input level: 5Vp/12Vp/24Vp/220Vac selectable by dip-switch

Output ripple: ≤0.1% of F.S.

Excitation supply: DC 10V/24V, 40mA Changeable by dip switch AC 115 or 230V ±10%, 50/60 Hz

Power Supply: Changeable by jumper inside
Option: DC 12V, 24V, 48V ±10%, (Isolated)
DC 5W, AC 6.5VA

Power consumption: DC 5W, AC 6.5VA

Option range: Ultra-low frequency: 0 - 0.1 Hz
Ultra-high frequency: 0 - 50K/100K Hz
AC 110V/5A, 220V/2A, Normal Open

Relay contact: AC 115V/5A, 220V/2A, Normal Open

Operating temperature: 0-60 °C

Operating relative humidity: 20-95 %RH, non-condensing

Temperature coefficient: ≤100 PPM/°C

Storage temperature: -10-70 °C

Isolation: Between Power / Input / Output1 / Output2
≥100M ohm at 500Vdc

Surge test: 4 KV, 1.2 x 50 μ sec.
Common mode & differential mode

Dielectric Strength: AC 2.0 KV for 1 min
Between Power / Input / Output / Case

Standard: Comply with EN50081-1, EN50082-2

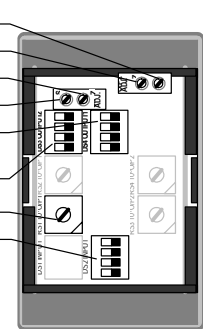
Dimensions: 50mm(W) x 87mm(H) x 123mm(D)-with socket

Mounting: Surface and DIN rail 35mm wide

Weight: 500g

ADJUSTMENT

- O/P 2 Span Adjust Pot (Clockwise: o/p2 increase)
- O/P 2 Zero Adjust Pot (Clockwise: o/p2 increase)
- O/P 1 Zero Adjust Pot (Clockwise: o/p1 increase)
- O/P 1 Span Adjust Pot (Clockwise: o/p1 increase)
- DS4: Programming for O/P 1 / 4 Ranges (by Dip-Switch)
- DS3: Programming for O/P 2 / 4 Ranges (by Dip-Switch) or for excitation supply / 2 Ranges (DC 24V: Dip-Switch 1&2 ON: DC 10V: Dip-Switch 3&4 ON)
- RS1: Programming for I/P / 10 Ranges (Rotary-Switch)
- DS2: Select for Input Voltage / 4 Ranges (by Dip-Switch)

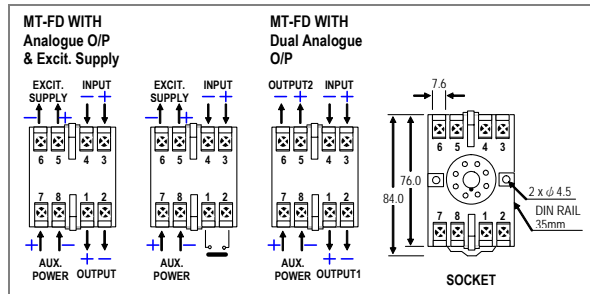


* MT-FD HAS SINGLE OUTPUT WITH EXCITATION
DUAL OUTPUT IS AVAILABLE WITH EXTERNAL
EXCITATION.

PROGRAMMING FOR INPUT AND OUTPUT:

INPUT RANGE		INPUT LEVEL	OUTPUT SIGNAL	O/P1 DS4 (5)	O/P2 DS3 (6)
J1 Closed	J1 Open	RS1 (7)	DS2 (8)		
0 ~ 1 Hz	0 ~ 10 Hz	0	5 Vp	ON	ON
0 ~ 2 Hz	0 ~ 20 Hz	1	12 Vp	ON	ON
0 ~ 5 Hz	0 ~ 50 Hz	2	24 Vp	ON	ON
0 ~ 10 Hz	0 ~ 100 Hz	3	220 Vac	ON	ON
0 ~ 20 Hz	0 ~ 200 Hz	4		ON	ON
0 ~ 50 Hz	0 ~ 500 Hz	5		ON	ON
0 ~ 100 Hz	0 ~ 1K Hz	6		ON	ON
0 ~ 200 Hz	0 ~ 2K Hz	7		ON	ON
0 ~ 500 Hz	0 ~ 5K Hz	8		ON	ON
0 ~ 1K Hz	0 ~ 10K Hz	9		ON	ON

CONNECTION DIAGRAM & SOCKET (8 PIN)



ORDER CODING

TX8-FD		Output No.	Input Range	Input Mode	Output1 Range	Output2 Range	Aux. Power				
CODE	OUTPUT LOOP	CODE	INPUT	CODE	INPUT MODE	CODE	OUTPUT	CODE	OUTPUT	CODE	AUX. POWER
1	Single Output	P0	J1 Closed: Programmable 1 - 1K Hz 10 ranges (please specify)	H1	0 - 0.1 Hz	OC	Open collect	A	0 - 1 mA	A1	AC 115 V
2	Dual Output	P1	J1 Open: Programmable 10 - 10K Hz 10 ranges (please specify)	H2	0 - 20K Hz	MC	Mech. contact	B	0 - 10 mA	A2	AC 230 V
				H3	0 - 50K Hz	V	Volt pulse	C	0 - 20 mA	A3	AC 380 V
				H4	0 - 100K Hz	05	5 Vp	D	4 - 20 mA	D12	DC 12 V
				HO	Specify(Hz)	12	12 Vp	I	Specify (mA o/p)	D24	DC 24 V
						24	24 Vp	V	Specify (Vo/p)	D48	DC 48 V
						22	220 Vac	N	None	AD1	20-90Vdc/ac
						VO	Specify	7	-10 - +10 V	AD2	90-265Vdc/ac

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