## TRH-554-FLP-PDA



## **TEMPERATURE & HUMIDITY TRANSMITTER**





- Highly accurate Digital technology sensor gives fast and reliable output.
- Temperature range is -40°C to +100°C with accuracy of ± 0.5 °C.
- Relative Humidity range is 0% RH to 100%RH with accuracy of ± 2%RH.
- Long term stable output for both Temperature and Relative Humidity.
- Digital Display of Temperature & Relative Humidity on Seven Segment Display
- Standard 4-20mA signal outputs with configurable range.
- Easy handling & programming with 3 keys
- Password protected programming with password changing facility.
- Software calibration for both Temperature & Relative Humidity.
- Flash Memory for Data security in the event of power failure.
- Optional 2 Nos. Alarm relay contacts with two configurable Alarm levels & one relay for fail safe relay.
- Optional Isolated RS-485 communication port with MODBUS RTU Protocol.



- Clean Rooms
- Server Room
- Pharmaceutical
- Hospitals / Labs
- Walk-in-cooler
- Greenhouse Breeding
- Warehouse / Cold Room
- Indoor Air Quality (IAQ)
- Air Condition Room
- Energy Management System (EMS)

• Compact size, can be easily installed.

## MUST FOR YOUR PROCESS

## **TECHNICAL SPECIFICATIONS**

		PECIFICATIONS	
General		Output Signal	
Sensor Type	: Capacitive Polymer Sensor		o 4-20mA Current Outputs with configurable range
Range	: For Temperature = $-40^{\circ}$ C to $100^{\circ}$ C		lection, one each for Temperature & Relative
Diantari	For Relative Humidity = 0 % RH to 100% RH		imidity Respectively
Display	: 2-Line, 4-Digit 13mm (H) Seven Segment Display.	•	ree SPDT Relays (one for failsafe and two for arm Condition) of rating "120VAC/2A, 24VDC/2A"
Control Action	8 LEDs to indicate status of instrument.		blated RS-485 Communication port with MODBUS
CONTROLACTION	: i) Two independent Alarm set points with Latch & Non-latch facility.	-	U protocol.
	: ii) User selectable Hysteresis	Accessories (Optional)	
Setting	: By using Magnetic wand for Flameproof model	• Cecertified 24 VDC Power supply	• RS-232 to RS-485 convertor
		Canopy Mounting stand.	RS-485 to USB convertor
Measurement			SCADA Software.
Accuracy	<ul> <li>± 0.5°C for Temperature</li> <li>± 2% RH for Relative Humidity</li> </ul>		Hooter Cum Flasher - Model No.: HCF/FLP/2C
Response Time	: Approx 5 Seconds	-	MFR/TR19/4378 Dt.: 13/12/2019
Electrical		• PESO CERTIFICATE NO. : P468	728/3 Dt.: 21/02/2020
Supply Voltage	: 18 to 36 VDC; Typically 24VDC.	Flameproof Housing	
Power Consumpt		Degree of Protection Class : IF	2-66 I/CIMFR/TR19/4071 Dt.:13/12/2019
Cable	: 3 Wires (1.5 mm <sup>2</sup> ) Flexible or Armoured Shielded Cabl	• PESO CERTIFICATE NO. : P	
Error Monitor	ing		ast Aluminium LM6 alloy or Stainless Steel
	Break / Open, the Display shows '5En5 oPEn' & output		ameproof, Weatherproof IP66 Double Compression
current will be as per Upscale / Downscale.			
<ul> <li>During Over Ra</li> </ul>	nge the Display Shows 'OVER' & Under range Display Shows		20 x 1.5 (P) & M25 x 1.5(P), ½" NPT & ¾" NPT
	utput current will be as per Upscale/Downscale		MFR/TC/P/1313 Dt.: 19/09/2018 131645/2 Dt.: 19/11/2019
Upscale curren			255mm (H) with sensor holder x 223mm (W)
Down scale cui	rrent = 3.7mA	-	with stopper plug & cable gland x 125mm (D)
Environmental ii) 255mm (H) with sensor holder x 263mm (W)			
Operating Temper			with Hooter cum Flasher & cable gland x 125mm (D)
Humidity	: Less than 95% Non-Condensing.	Mounting : W	all Mounting / Stand Mounting / Duct Mounting
		-	pprox 2.53 Kg
FLAMEPROOF ENCLOSURE DIMENSIONAL DETAILS			
FRONT VIEW WITH			
	- 000		
	222mm 260mm 260mm		- [115mm
SQ-139	mm DOUBLE SQ-139mm	Bmm -	
	mm SQ-139mm -		- [115mm
	mm SQ-139mm DOUBLE COMPRESSION	DOUBLE	DRILL HOLES
	mm SQ-139mm DOUBLE COMPRESSION	DOUBLE	- [115mm
SQ-139	SQ-139mm -	DOUBLE	DRILL HOLES
	SQ-139mm -	DOUBLE	TI5mm DRILL HOLES
SQ-139 SQ-139 STOPPER PLUG	DOUBLE COMPRESSION CABLE GLAND 91mm 91mm 91mm 91mm	DOUBLE COMPRESSION CABLE GLAND CABLE GLAND	TI5mm DRILL HOLES
Stopper	DOUBLE COMPRESSION CABLE CLAND 91mm 91mm 255mm // HOOTERCUM	DOUBLE COMPRESSION CABLE GLAND	TI5mm DRILL HOLES
Stopper	DOUBLE COMPRESSION CABLE CLAND 91mm 91mm 400TERCUM FLASHER 11	DOUBLE COMPRESSION CABLE GLAND MAGNETIC WANDFOR	TI5mm DRILL HOLES
SQ-139 SQ-139 CDSD SDSD SDSD FLUC STOPPER PLUC STOPPER TRH. SENSOR	DOUBLE COMPRESSION CABLE CLAND 91mm 91mm 9255mm HOOTERCUM FLASHER	DOUBLE COMPRESSION CABLE GLAND MAGNETIC WANDFOR	TI5mm DRILL HOLES
SQ-139 SQ-139 SD-139 STOPPER PLUG 255mm	DOUBLE COMPRESSION CABLE CLAND 91mm 91mm 9255mm 72550mm 7255mm 72550mm 72550mm 72550mm 72550mm 7255000000000000000	DOUBLE COMPRESSION CABLE GLAND MAGNETIC WANDFOR	TI5mm DRILL HOLES
SQ-139 SQ-139 CDSD SDSD SDSD FLUC STOPPER PLUC STOPPER TRH. SENSOR	SQ-139mm SQ-130	DOUBLE COMPRESSION CABLE GLAND MAGNETIC WANDFOR PROGRAMMING	TI5mm DRILL HOLES
SQ-139 SQ-139 CDSD SDSD SDSD FLUC STOPPER PLUC STOPPER TRH. SENSOR	DOUBLE COMPRESSION CABLE CLAND 91mm 91mm 9255mm 72550mm 7255mm 72550mm 72550mm 72550mm 72550mm 7255000000000000000	DOUBLE COMPRESSION CABLE GLAND MAGNETIC WANDFOR PROGRAMMING	TI5mm DRILL HOLES
SQ-139 SQ-139 STOPPER PLUC STOPPER PLUC STOPPER PLUC TRH. SENSOR HOLDER (S.S)	SQ-139mm SQ-130	DOUBLE COMPRESSION CABLE GLAND MAGNETIC WANDFOR PROGRAMMING	
SQ-139 SQ-139 SUPPER PLUG 255mm TRH. SENSOR	SQ-139mm SQ-130	DOUBLE COMPRESSION CABLE GLAND MAGNETIC WANDFOR PROGRAMMING	
SQ-139 SQ-139 SD205 STOPPER PLUC STOPPER	POUBLE COMPRESSION CABLE CLAND 91mm WAGNETIC WANDFOR PROGRAMMING TH.SENSOR HOLDER (S.S.) B) Enclosure C) Retransmission D) R	DOUBLE COMPRESSION CABLE GLAND MAGNETIC WANDFOR PROGRAMMING RMATION	
SQ-139 SQ-139	ACNETIC WACN	DOUBLE COMPRESSION CABLE GLAND CABLE GLAND WANDFOR PROGRAMMING RMATION Elay Output one Relays	
SQ-139 SQ-139 SD205 STOPPER PLUC STOPPER	ACNETIC WACN	DOUBLE COMPRESSION CABLE GLAND WANDFOR PROGRAMMING RMATION Elay Output one Elay Output one	
SQ-139 SQ-139	AGNETIC       SQ-139mm         WAGNETIC       91mm         WAGNETIC       91mm         WAGNETIC       000000000000000000000000000000000000	DOUBLE COMPRESSION CABLE GLAND CABLE GLAND WAGNETIC WANDFOR PROGRAMMING Elay Output one Relays El Communication Port 1) None 2) RS-485 Serial Port	
SQ-139 SQ-139	AGNETIC WANDFOR PROGRAMMING HOUTERCUM FLASHER HOLDER (S.S.) HOLDER (S.S.	DOUBLE COMPRESSION CABLE GLAND CABLE GLAND WAGNETIC WANDFOR PROGRAMMING Elay Output one Relays El Communication Port 1) None 2) RS-485 Serial Port	Image: Steel (SS-316)         Use for assistance.
SQ-139 SQ-139	SQ-139mm CABLE CLAND OUTPRESSION CABLE CLAND 91mm 91mm 91mm 91mm 91mm 100TERCUM FLASHER TH.SENSOR TH.SENSOR TH.JER (S.S.) 0 0 0 0 0 0 0 0 0 0 0 0 0	DOUBLE COMPRESSION CABLE GLAND CABLE GLAND MAGNETIC WANDFOR PROGRAMMING RELAY RECORRAMMING ELEVANDFOR PROGRAMMING ELEVANDFOR POR PROGRAMMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMIN ELEVANDFOR PROGRAMIN ELEVANDFOR PROGRAMIN ELEVANDFOR PROGRA	Image: Steel (SS-316)         Use for assistance.
SQ-139 SQ-139 STOPPER PLUG STOPPER PLUG STOPPER PLUG STOPPER PLUG STOPPER PLUG STOPPER PLUG STOPPER PLUG STOPPER PLUG STOPPER PLUG STOPPER PLUG STOPPER PLUG STOPPER PLUG STOPPER STOPE	SQ-139mm CABLE CLAND OUBLE COMPRESSION CABLE CLAND 91mm 91mm 91mm 91mm 91mm 1000	DOUBLE COMPRESSION CABLE GLAND CABLE GLAND MAGNETIC WANDFOR PROGRAMMING RELAY RECORRAMMING ELEVANDFOR PROGRAMMING ELEVANDFOR POR PROGRAMMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMING ELEVANDFOR PROGRAMIN ELEVANDFOR PROGRAMIN ELEVANDFOR PROGRAMIN ELEVANDFOR PROGRA	Image: Steel (SS-316)         Use for assistance.
SQ-139 SQ-13	POUBLE COMPRESSION CABLE CLAND       Imm       SQ-139mm         Imm       Imm <td>DOUBLE COMPRESSION CABLE GLAND       8mm         MGNETIC WANDFOR PROGRAMMING       Image: Comparison of the comparison</td> <td>Image: Steel (SS-316)         Use for assistance.</td>	DOUBLE COMPRESSION CABLE GLAND       8mm         MGNETIC WANDFOR PROGRAMMING       Image: Comparison of the comparison	Image: Steel (SS-316)         Use for assistance.
TRH - AMMode 1)-554 * B Manufactured by :	DOUBLE COMPRESSION CABLE CLAND INTERCENT WANDFOR PROGRAMMING MACNETIC WANDFOR PROGRAMMING MACNETIC WANDFOR PROGRAMMING UNTERCIM FLSHER THI-SENSOR HOLDER (S.S.) UNTERCIM HOLDER (S.S.) () Retransmission Output 1) RUP (Flameproof) () Retransmission Output 1) None 2) 4 to 20mA () Refore placing order please Refer the above ord C) Retransmission Output 1) None 2) 4 to 20mA () R () R () R () R () R () R () R () R	DOUBLE COMPRESSION CABLE GLAND CABLE GLAND WANDFOR PROGRAMMING       Image: Comparison of the comp	Image: Steel (SS-316)         Use for assistance.
SQ-139 SQ-139	POUBLE COMPRESSION CABLE CLAND WACNETIC WANDFOR PROGRAMMING       Imm       Imm       SQ-139mm         Imm       <	DOUBLE COMPRESSION CABLE GLAND CABLE GLAND WANDFOR PROGRAMMING       Image: Comparison of the comp	() Sensor Housing 1) Stainless Steel (SS-316) Us for assistance.
SQ-139 SQ-139	DOUBLE COMPRESSION CABLE CLAND INTERCENT WANDFOR PROGRAMMING MACNETIC WANDFOR PROGRAMMING MACNETIC WANDFOR PROGRAMMING UNTERCIM FLSHER THI-SENSOR HOLDER (S.S.) UNTERCIM HOLDER (S.S.) () Retransmission Output 1) RUP (Flameproof) () Retransmission Output 1) None 2) 4 to 20mA () Refore placing order please Refer the above ord C) Retransmission Output 1) None 2) 4 to 20mA () R () R () R () R () R () R () R () R	DOUBLE COMPRESSION CABLE GLAND CABLE GLAND WANDFOR PROGRAMMING       Image: Comparison of the comp	Image: Steel (SS-316)         Use for assistance.