Current Signal Generator MR9270S

Model: MR9270S

Display Size:2.9 Inches & Under

Smart function list

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Signal expansion function name	Application function (tools)	Communication interface function
Signal conversion range	PID controller	MODBUS RTU master
Range out	20000 point Logger	MODBUS RTU Slave
Real time curve		USB TO RS485
Programming output		USB firmware upgrade
Preset value		
Signal to signal		

Smart structure and product parameters

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Brand
蓝羿LANYI

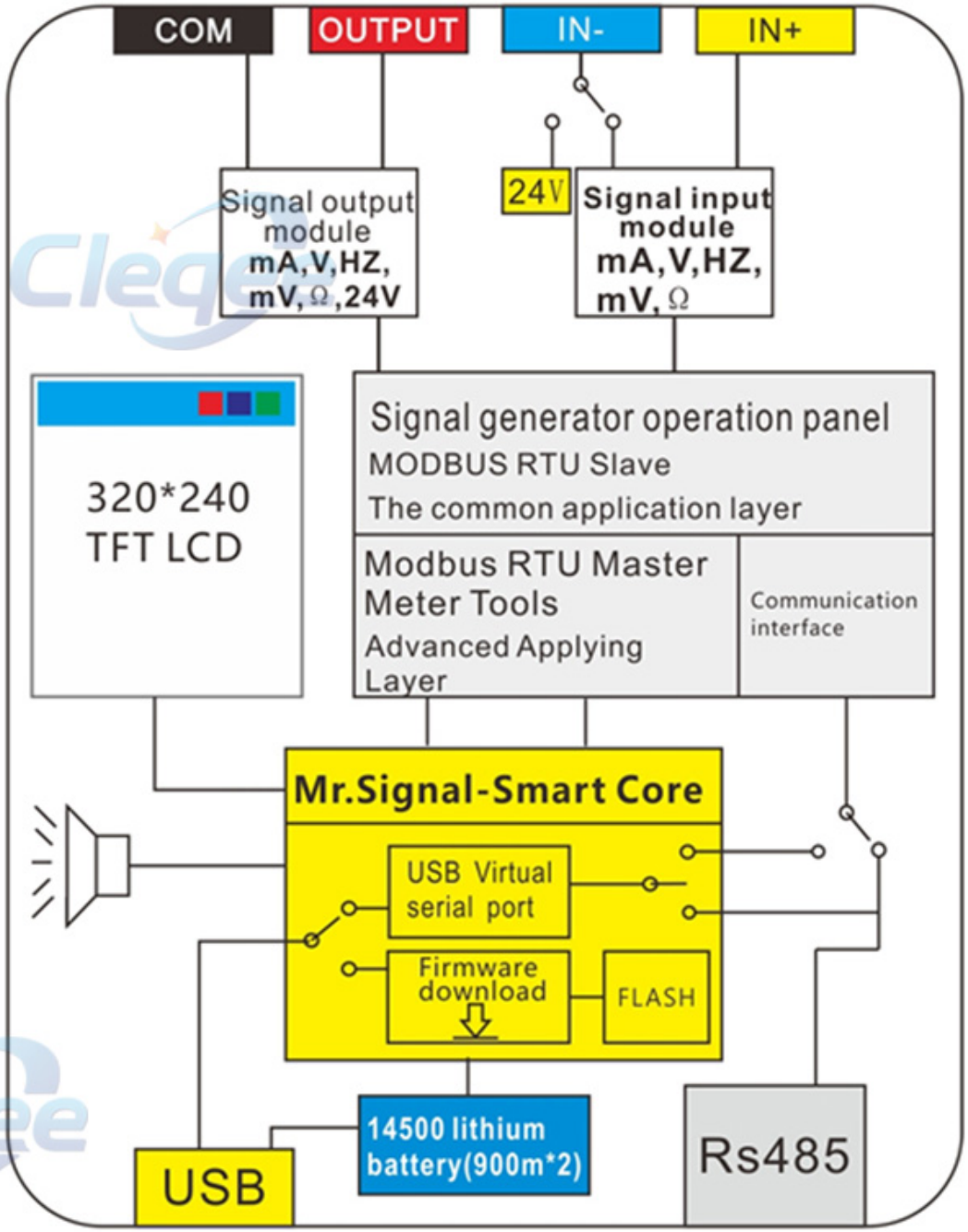
Overall dimensions
92×70×32mm

Power
Built-in lithium battery: 900mA*2 ma USB or charging and supply

Working temperature
0–50℃

Total weight of all fittings
500g

Battery life
20 ma output can work continuously More than 8 hours



Smart signal parameter list

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OUTPUT			
Signal type	Range	Accuracy	Resolution
Current	0-24mA	0.05%	0.001mA
Voltage	0-12V	0.05%	0.001V
Passive current	0-24mA	0.05%	0.001mA
PULSE (amplitude adjustable 0-24V)	0-9999Hz/ 0-150K	0.03%/ 0.5%	Range 00.001/000.01/0001
Pulse:PWM	0-100.0%	0.10%	0.10%
Millivolt	-10-110mV	0.10%	0.01mV
TC:S	-50-1760℃	0.10%	1℃
TC:B	0-1810℃	0.10%	1℃
TC:E	-270-990℃	0.10%	1℃
TC:K	-270-1373℃	0.10%	1℃
TC:R	-50-1760℃	0.10%	1℃
TC:J	-210-1190℃	0.10%	1℃
TC:T	-270-390℃	0.10%	1℃
TC:N	-270-1290℃	0.10%	1℃
TC:WRE/25	0-2300℃	0.10%	1℃
TC:WRE/26	0-2300℃	0.10%	1℃
resistance	0~400	0.30%	0.3
Pt100	-199-650℃	0.30%	0.4℃
Cu50	-50-150℃	0.10%	1℃
24VLoop current detection	0-24mA	0.10%	0.01mA

INPUT

Signal type	Range	Accuracy	Resolution
Current	0-24mA	0.10%	0.01mA
Voltage	-4V-30V	0.10%	0.001V
Pulse	0-9999Hz	0.03%	Auto range 00.001/000.01/0001/0 -150Khz
Pulse:PWM	0-100.0%	0.10%	0.20%
Millivolt	-110mV-110mV	0.10%	0.01mV
TC:S	-50-1760℃	0.50%	1 ℃
TC:B	0-1810℃	0.50%	1 ℃
TC:E	-270-990℃	0.30%	1 ℃
TC:K	-270-1373℃	0.30%	1 ℃
TC:R	-50-1760℃	0.30%	1 ℃
TC:J	-210-1190℃	0.30%	1 ℃
TC:T	-270-390℃	0.30%	1 ℃
TC:N	-270-1290℃	0.30%	1 ℃
TC:WRE/25	0-2300℃	0.30%	1 ℃
TC:WRE/26	0-2300℃	0.30%	1 ℃
resistance	0~400	0.20%	0.01Ω
Pt100	-199-650℃	0.20%	0.1℃
Cu50	-50-150℃	0.20%	0.1℃


Industrial yellow silicone sleeve
MR9270S
COM OUT IN-/24V IN+
Signal PROT
T: 00: 01: 37
R: 461.40
-OH-
IN:PT100
R: 100.0
OUT:PT100
Off
mA 1
V 2
XMT 3
Hz 4
mV 5
24V 6
Ω 7
RTD 8
TC 9
IN
T-ON
OUT
FN
I-TY
O-TY
REST
EXIT
MR.Signal-Smart generator

Smart Basic function introduction

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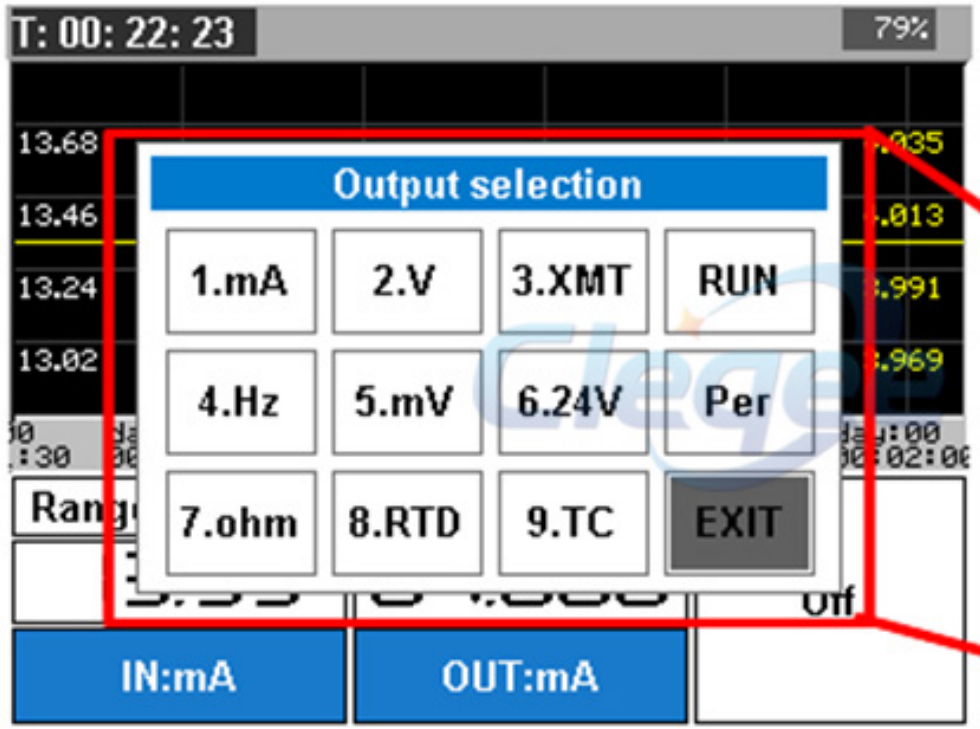
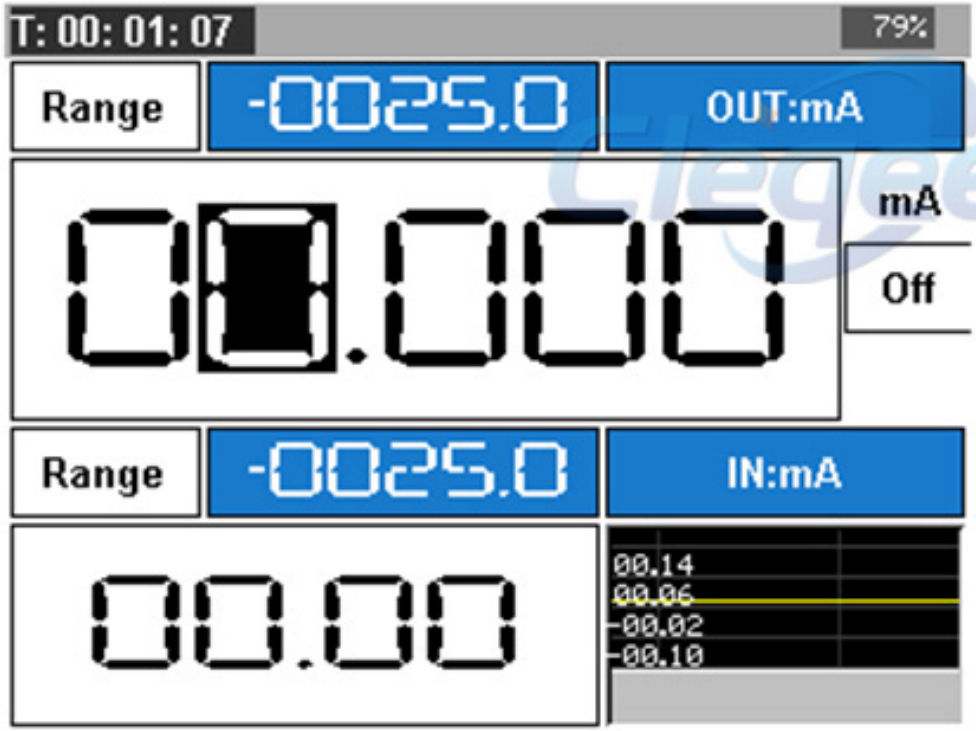
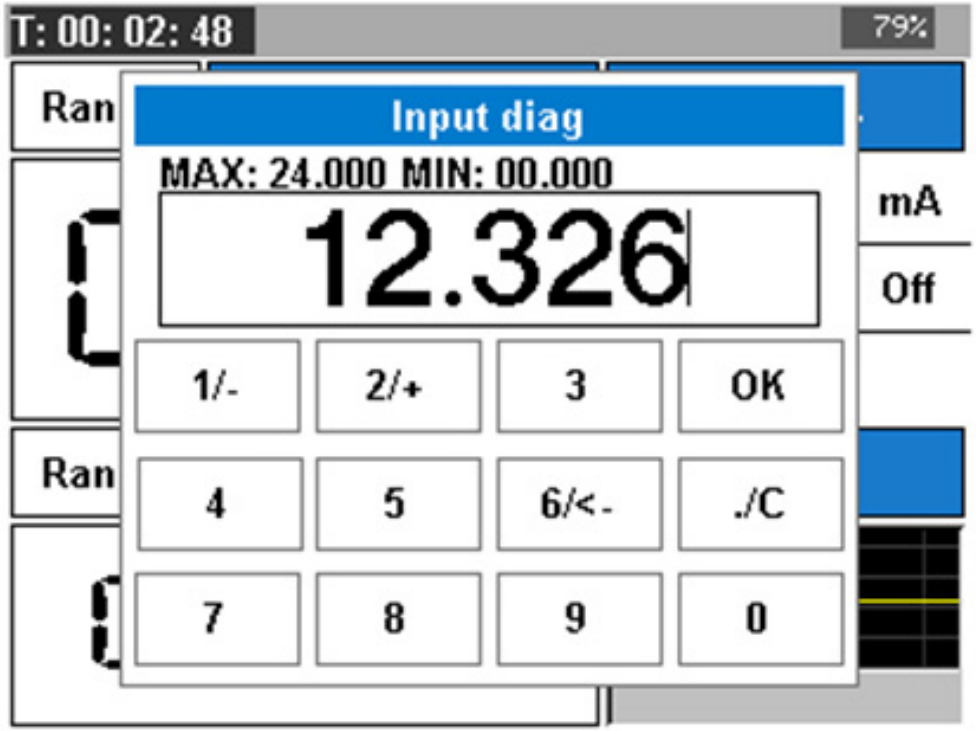
Fast multi signal switching



Two kinds of numerical input method

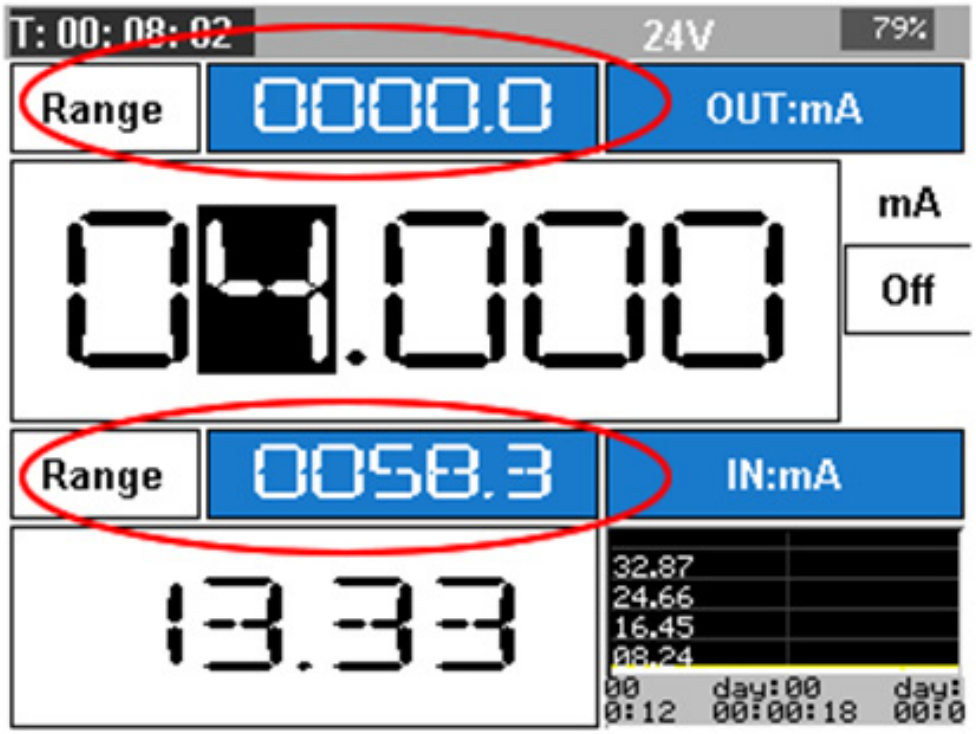


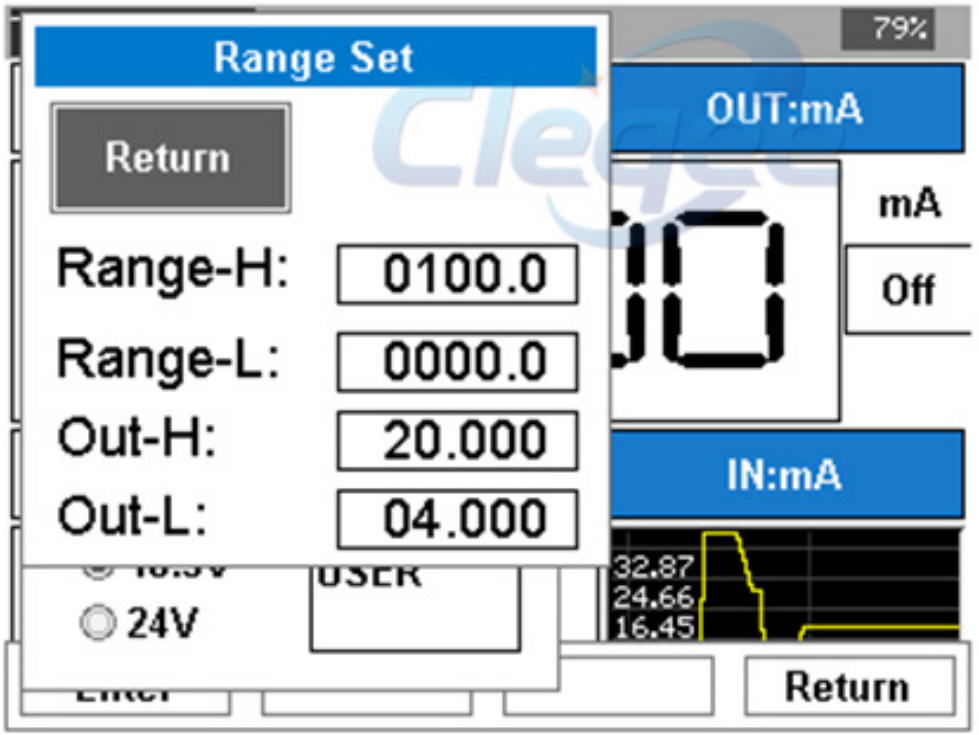
Modify the position by the direction key



Numeric keypad input

Range display or output

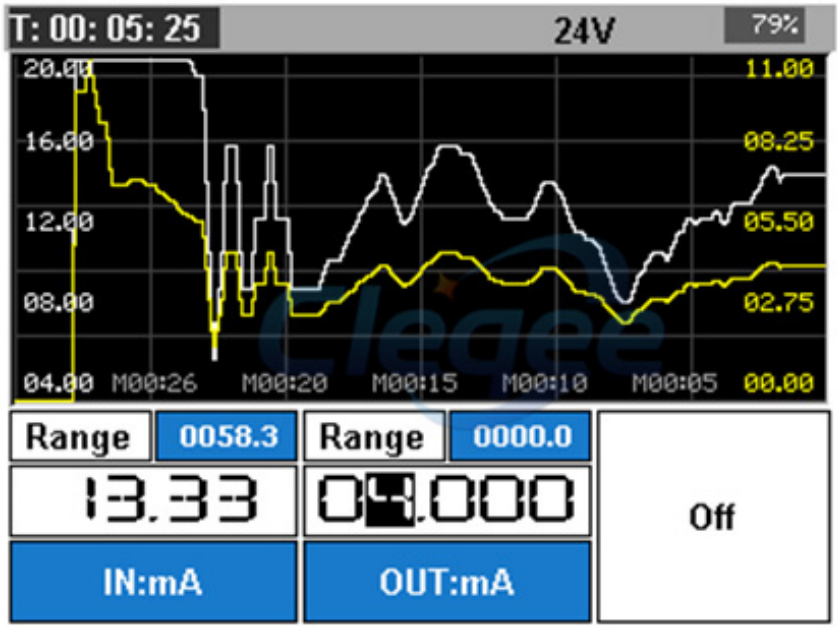




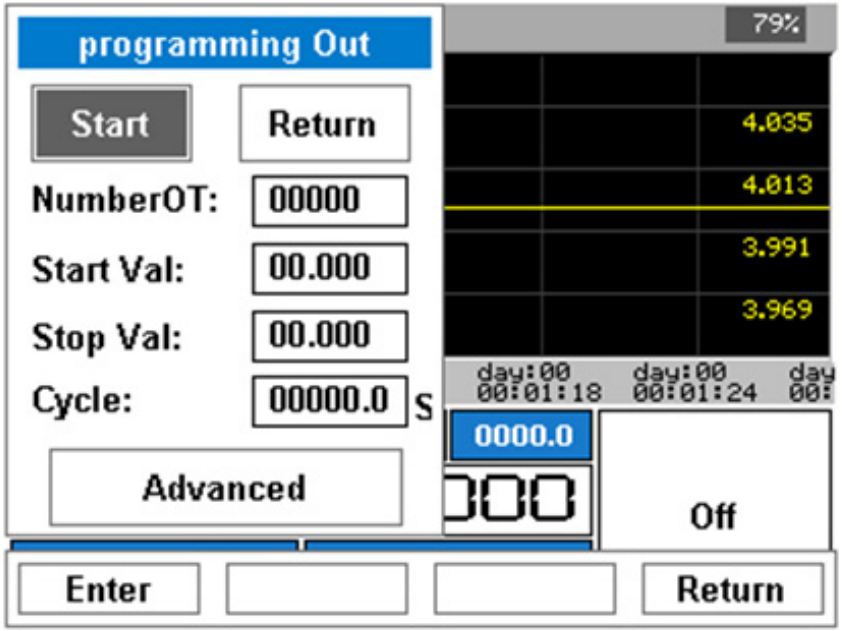
Range and signal linear correspondence.

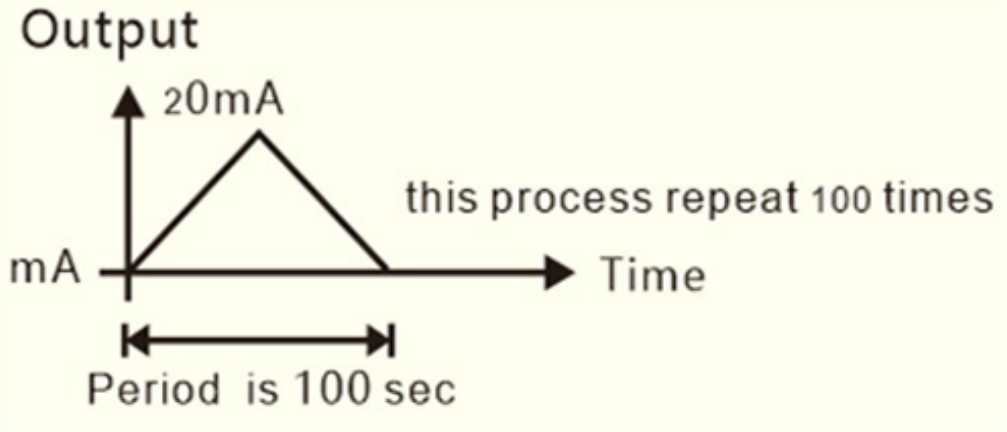
Real time curve

Input and output display real-time curve Can analyze the device dynamics.



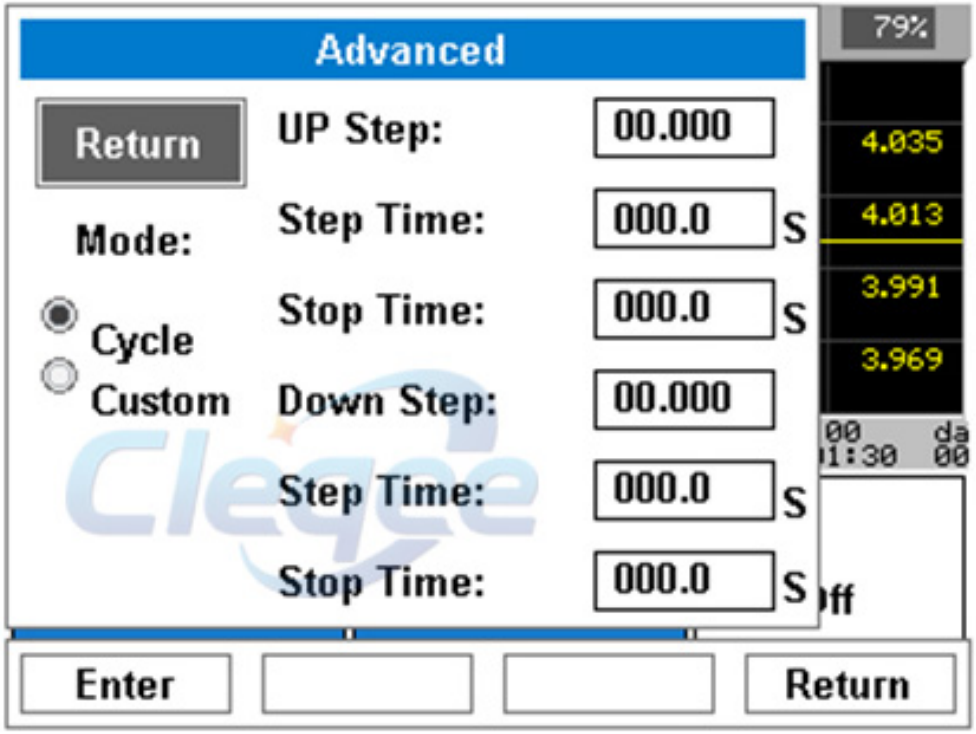
Programming output

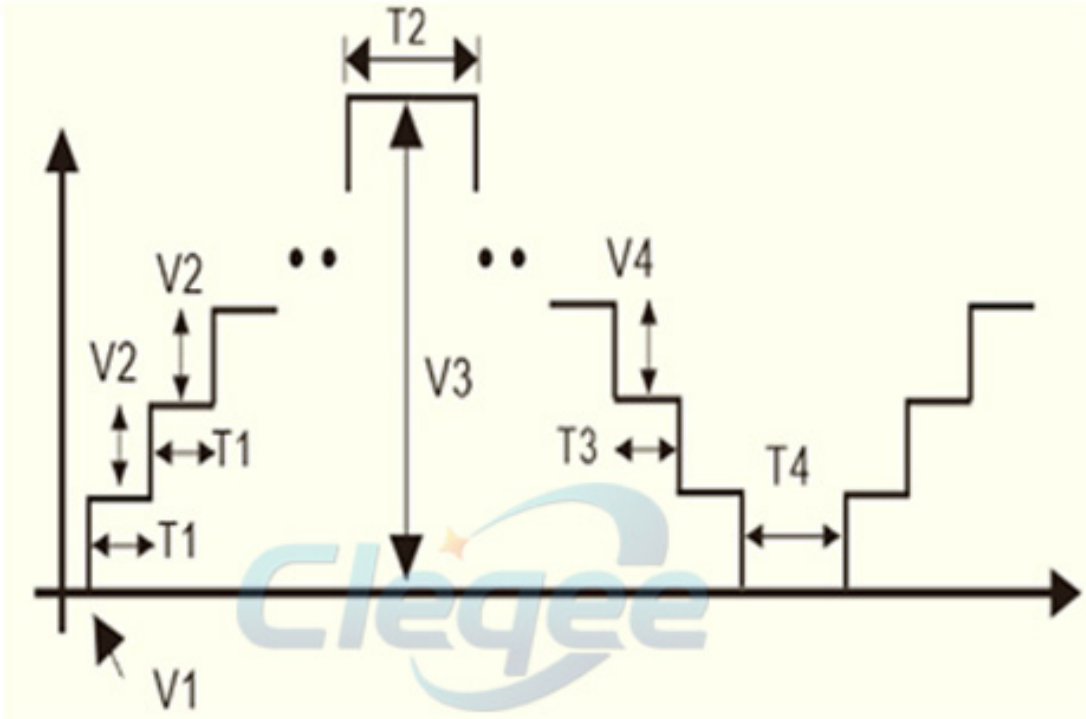




The user can set the parameters to start work

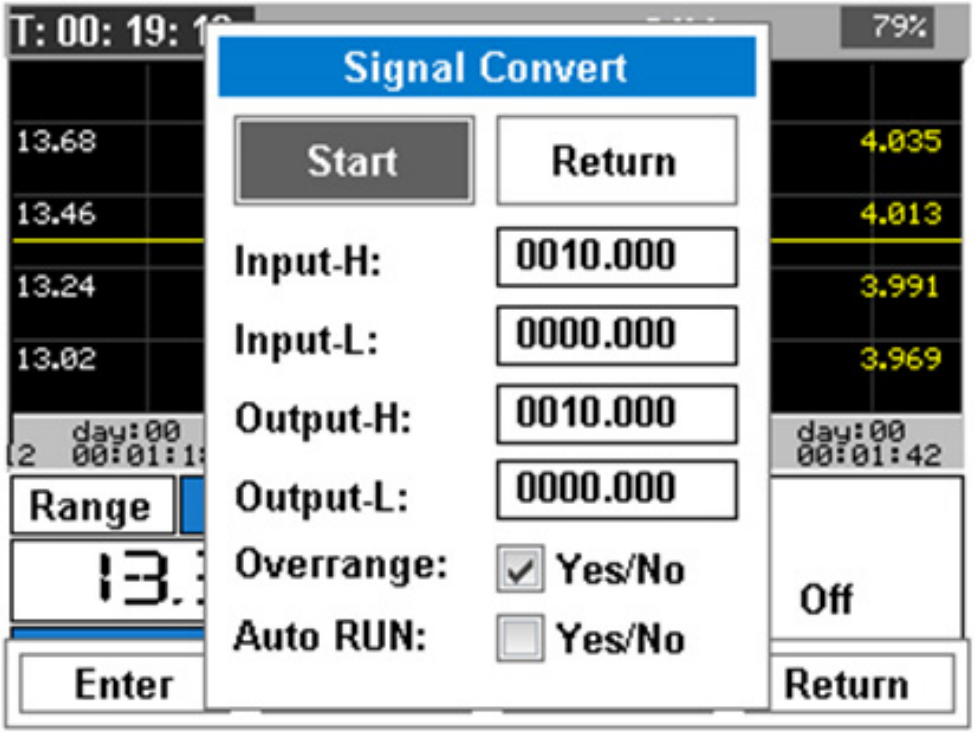
Custom output





V1:Start Val(Previous Menu) : The floor of output
V2:Up Step: Increase amount of every step
T1:Step Time: Increase every step time
T2:Stop Time: Idle time on the ceiling
V3:Stop Val(Previous Menu): The ceiling of output
V4:Down Step: Decrease amount of every step
T3:Step Time(Second One): Decrease every step time
T4:Stop Time(Second One): Idle time on the floor

Signal converter



Set the range of the input and output signals,
The output can follow the change of the input.
For example:
Input 0-1000Hz conversion
Output 4-20mA

Signal connection

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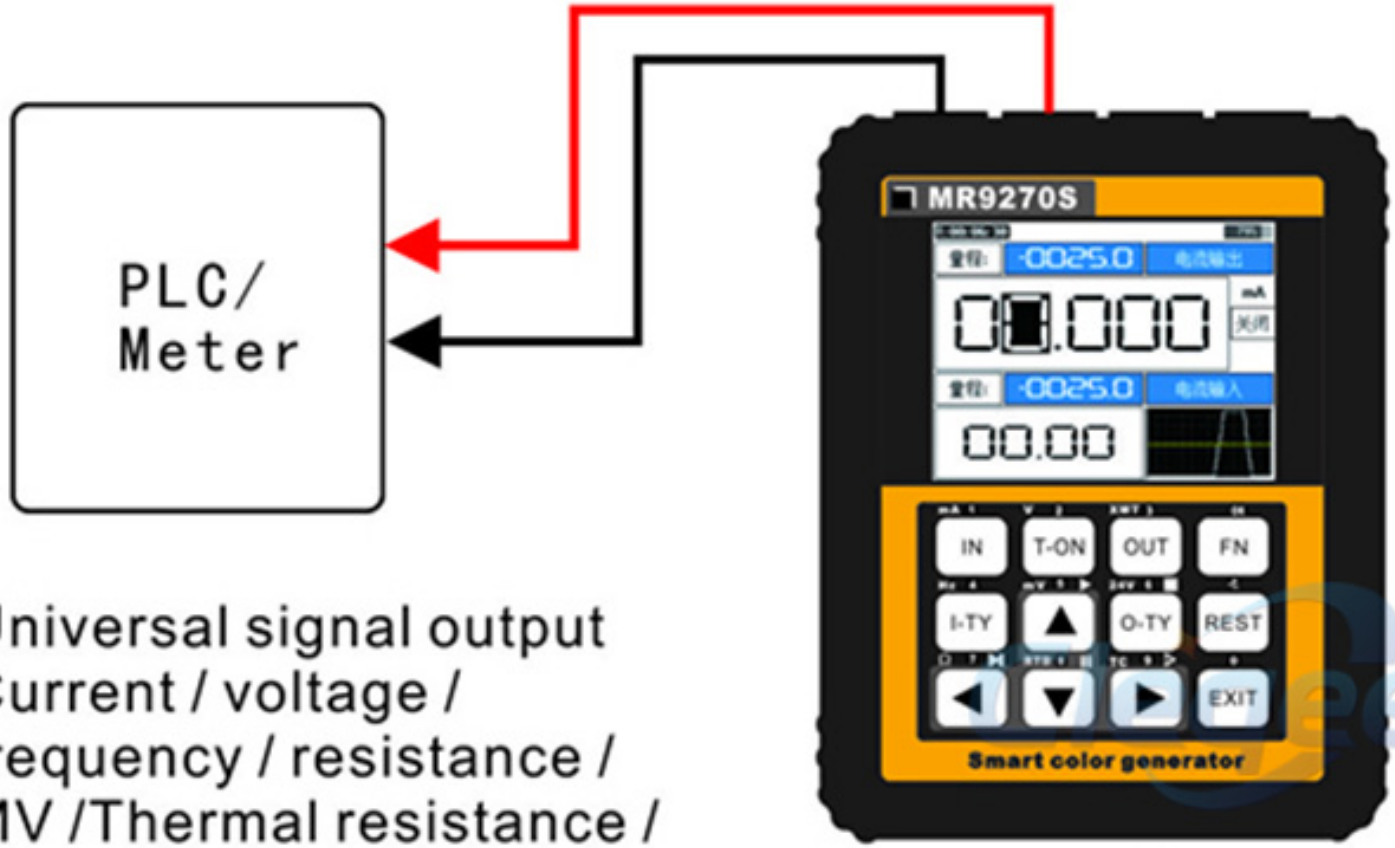
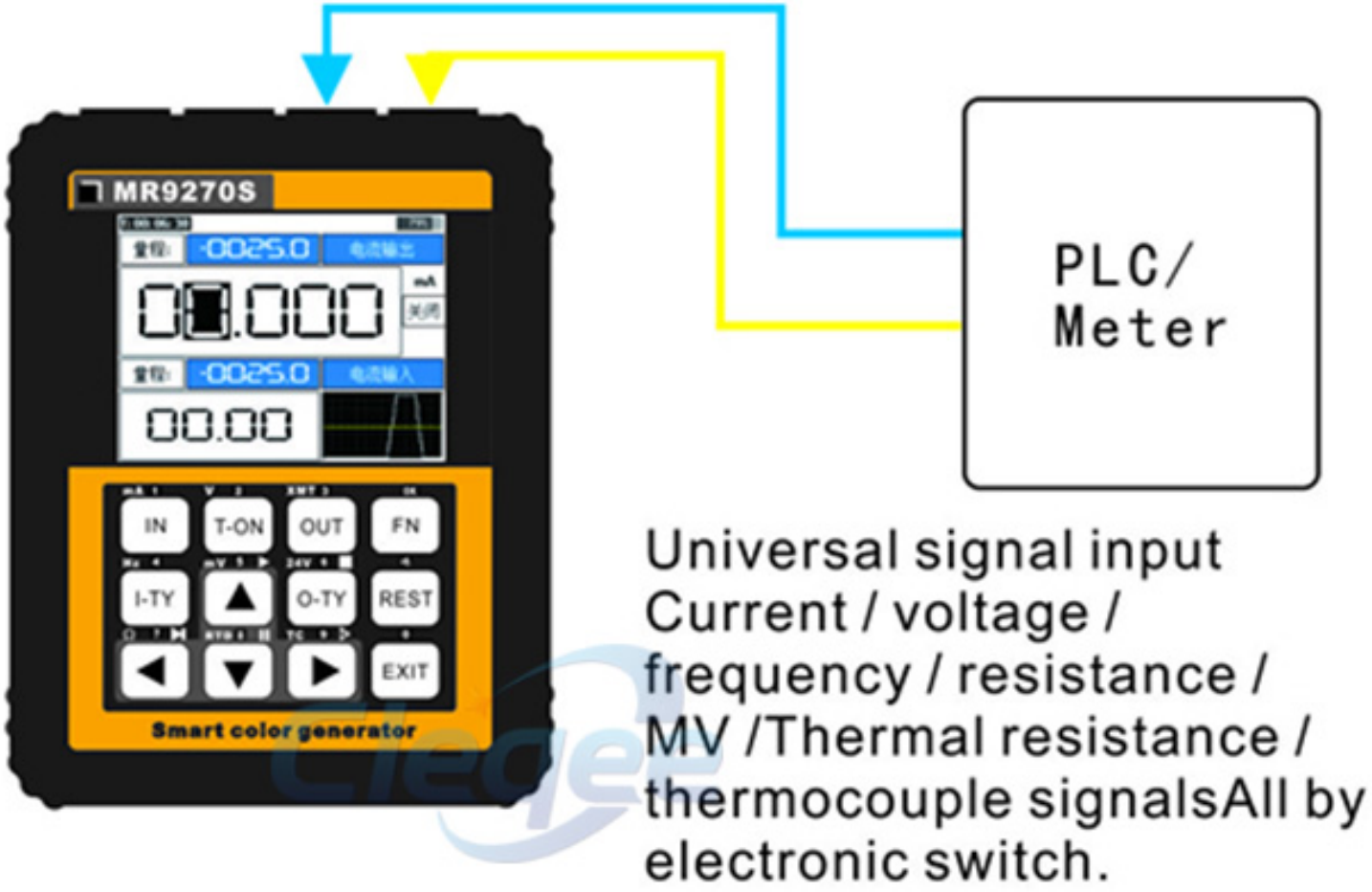


Universal signal output
Current / voltage /
frequency / resistance /
MV /Thermal resistance /
thermocouple signalsAll by electronic switch.



Universal signal input
Current / voltage /
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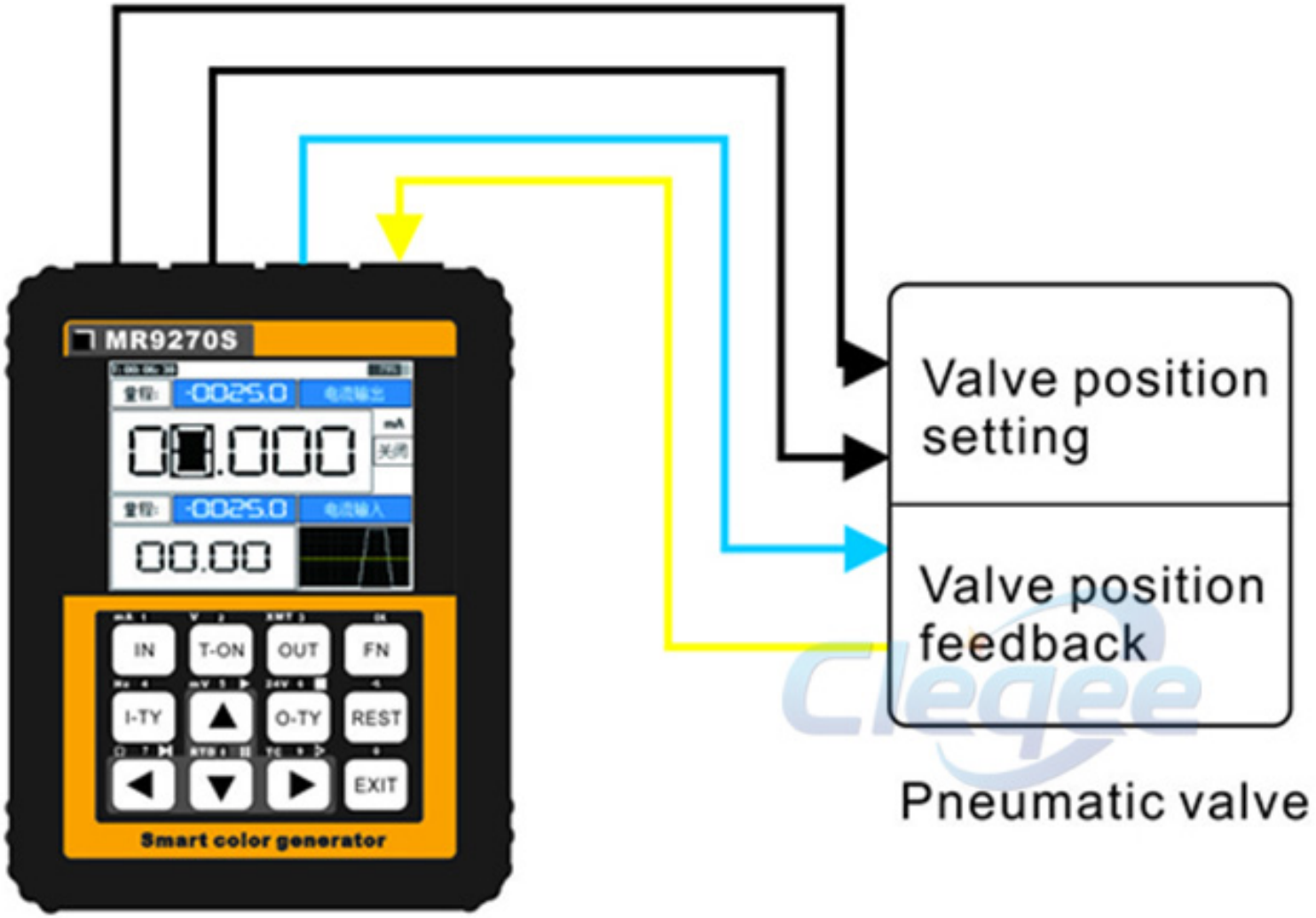
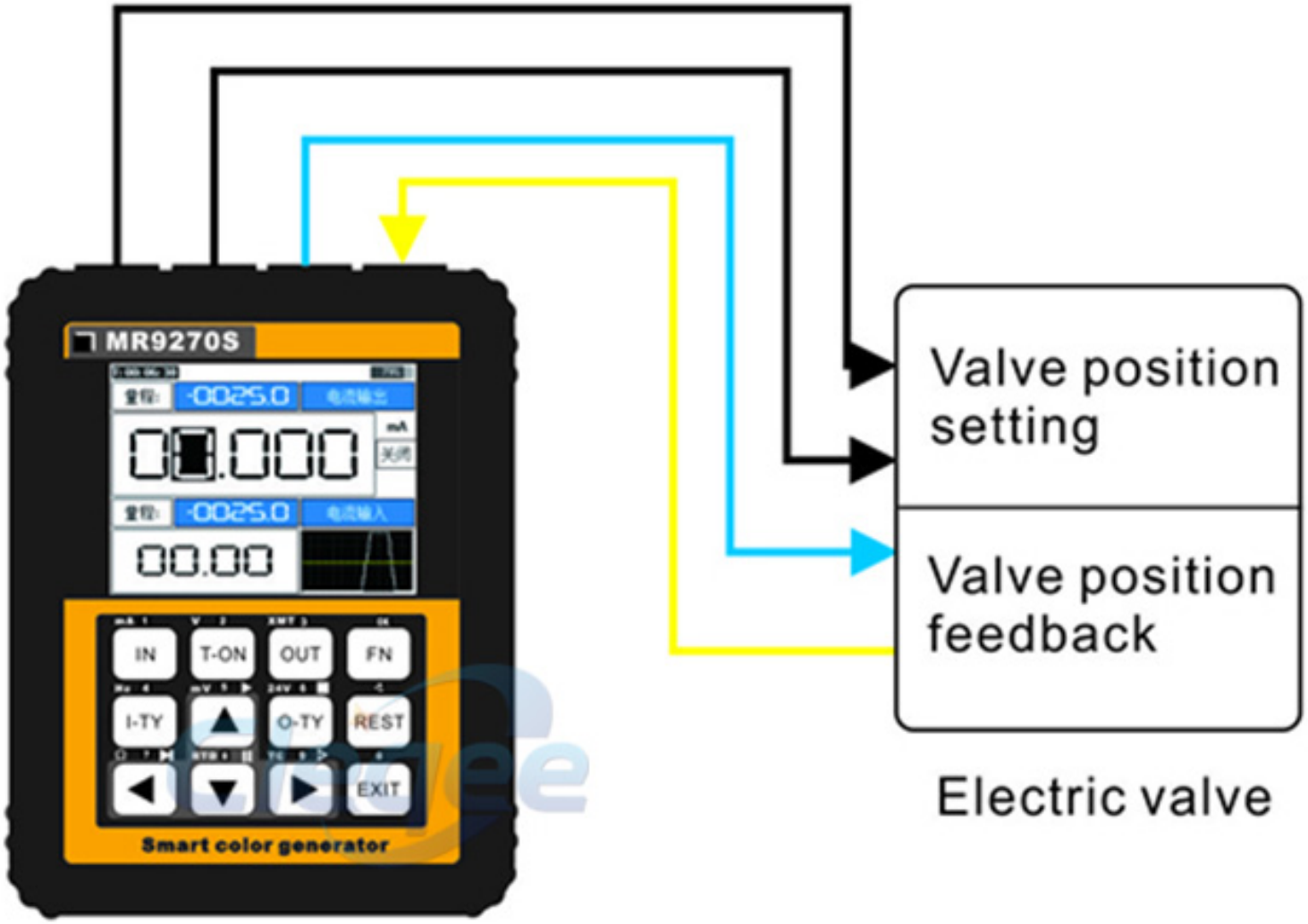
electronic switch.


MR9270S
IN
T-ON
OUT
FN
I-TY
O-TY
REST
EXIT
Smart color generator
Valve position setting
Valve position feedback
Pneumatic valve

Switch the input (-) port to 24V, as the power supply for the valve feedbackInput and output at the same time.



When the input (-) port is closed, the 24V is used as the negative electrode of the input signal.
Input and output at the same time.

LANYI Products

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Mr.Signal 2 series multi function signal generator

Model	MR2.0Smart (M9270S)	MR2.0TFTPRO+ (M9270CP)	MR2.0TFT-P (M9270P)
Price	169$	139$	99$
Current output	●	●	●
Voltage output	●	●	●
Simulator transmitter output(XMT)	●	●	●
Frequency/PWM/Speed output	●	●	
Thermocouple/millivolt output	●	●	
Resistance/Pt100/Cu50 output	●	●	
24V(transmitter power) Loop current measurement	●	●	●
Current input	●	●	●
Voltage input	●	●	●
Frequency/PWM/Speed input	●	●	
Thermocouple/millivolt input	●	●	
Resistance/Pt100/Cu50 input	●	●	
Program extensions			

Programming the output	●	●	●
Preset output	●	●	●
Signal conversion	●	●	●
RS485 interface of modbus RTU	●		
USB modbus RTU	●		
Firmware upgradeable	●	●	●
Real time curve	●	●	●
The exclusive function of the Smart			
Quantitative output pulse signal	●		
Pulse counting	●		
Modbus master station	●		
USB TO RS485 serial port	●		
20000 records some simple paperless recorder	●		
PID control panel	●		

Smart advanced applications

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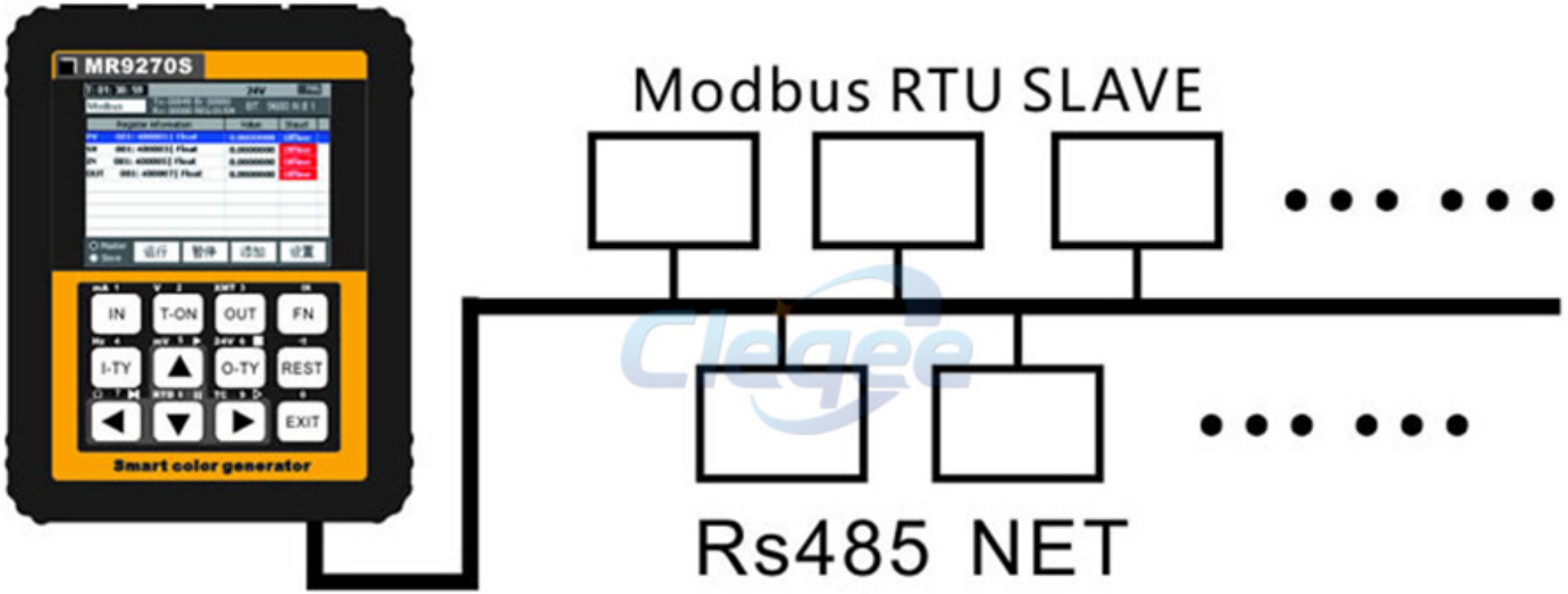
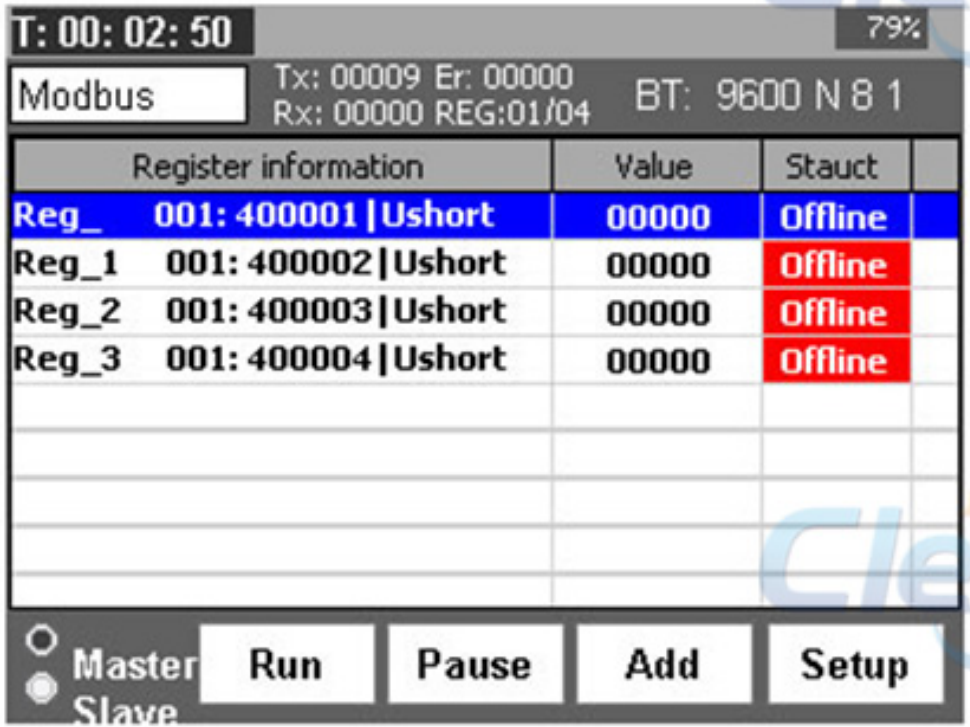
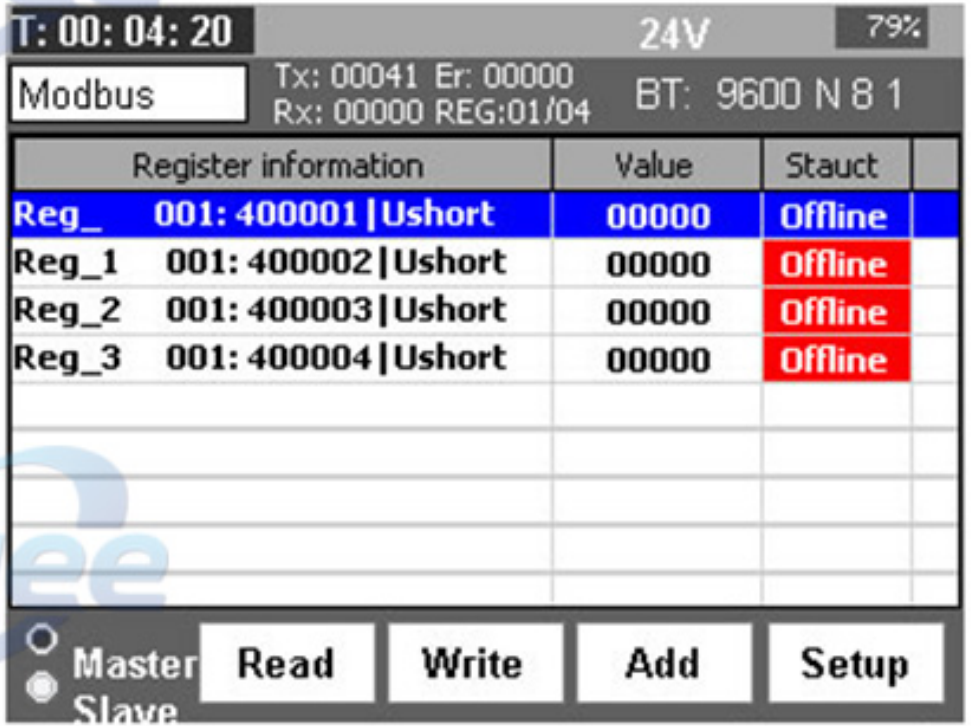
MODBUS RTU Master



Can access up to 30 RTU MODBUS from the stationTotal number of not more than 30 registers

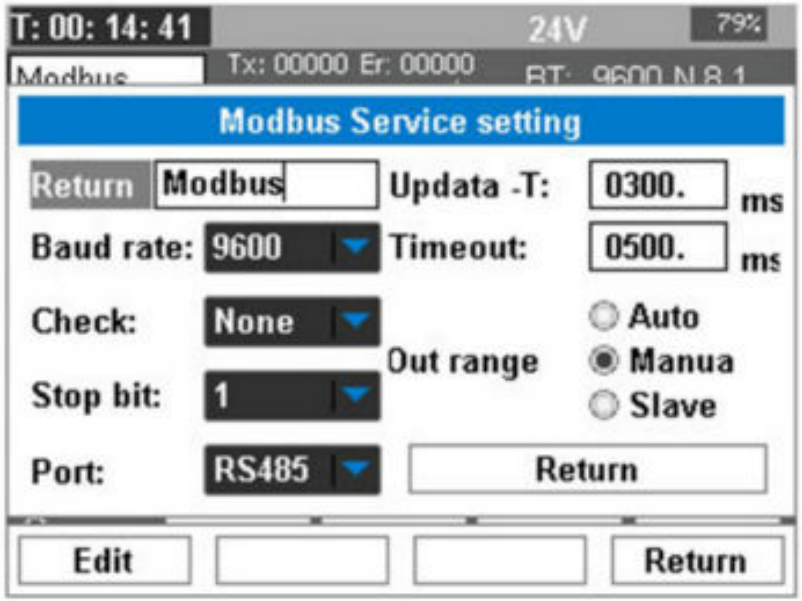
Can be monitored or online with RTU MODBUS protocol. Modify parameters and other operations, create a list of various variables.



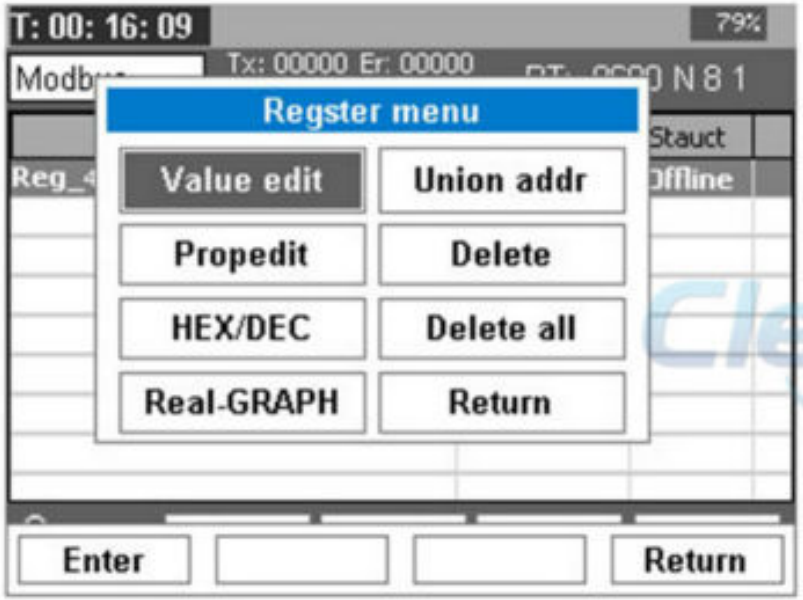


Have two modes:
Auto: reading or writing is done automatically by the software.
Manual: read or write by the button to complete the trigger.

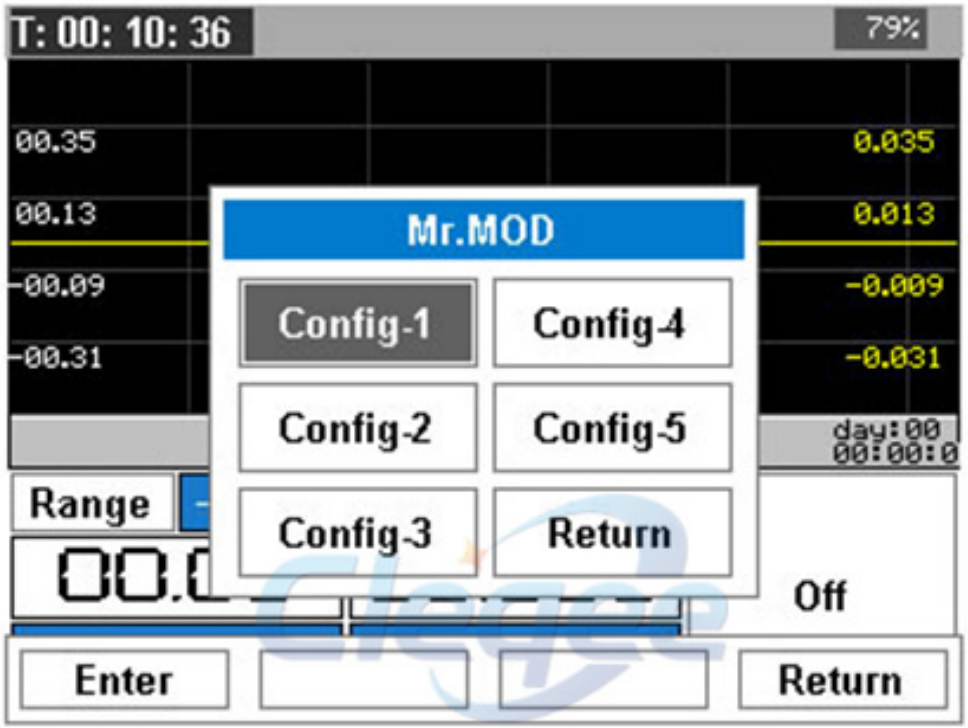
Can create a variety of types of variables



Modify master settings

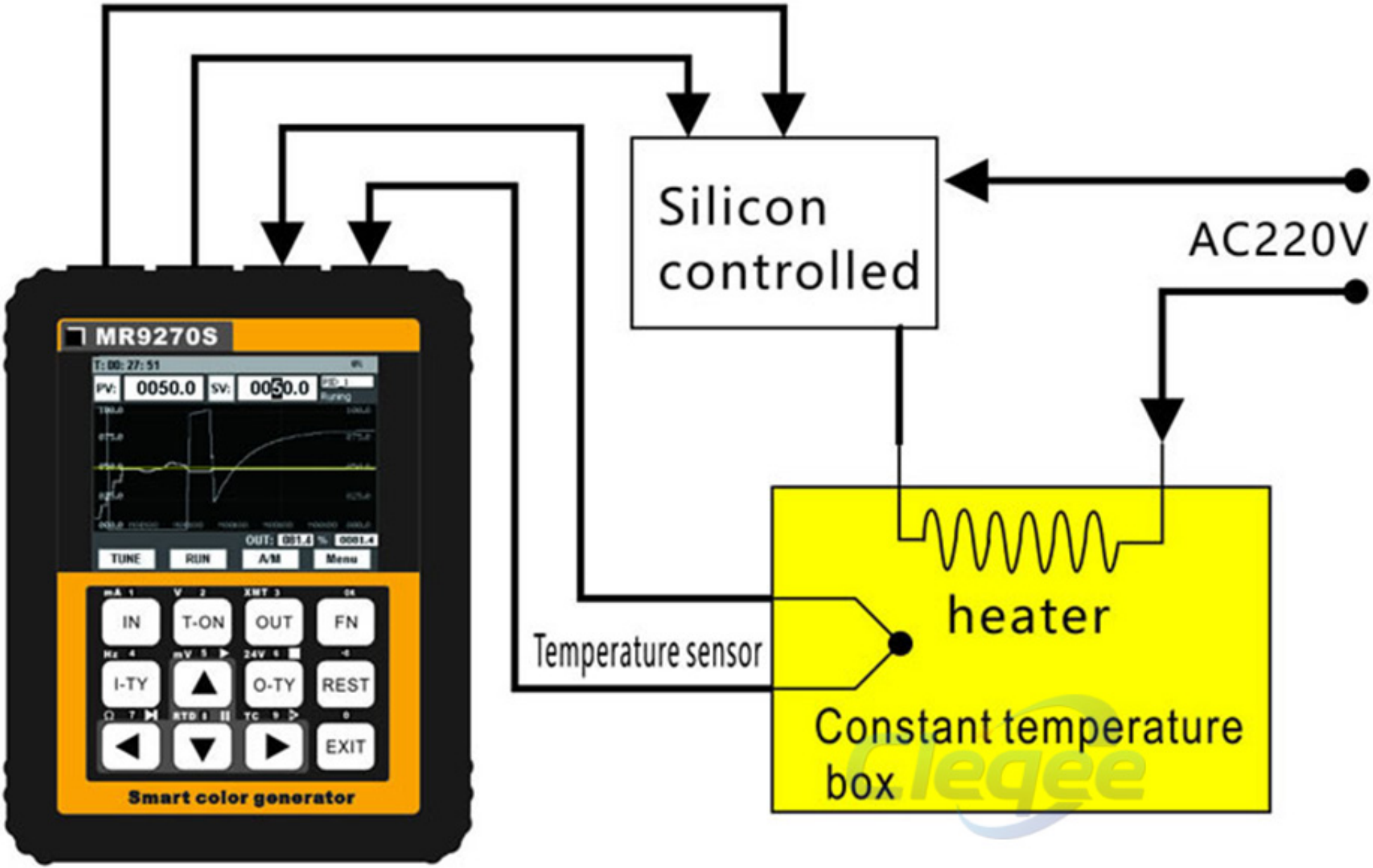


Register menu

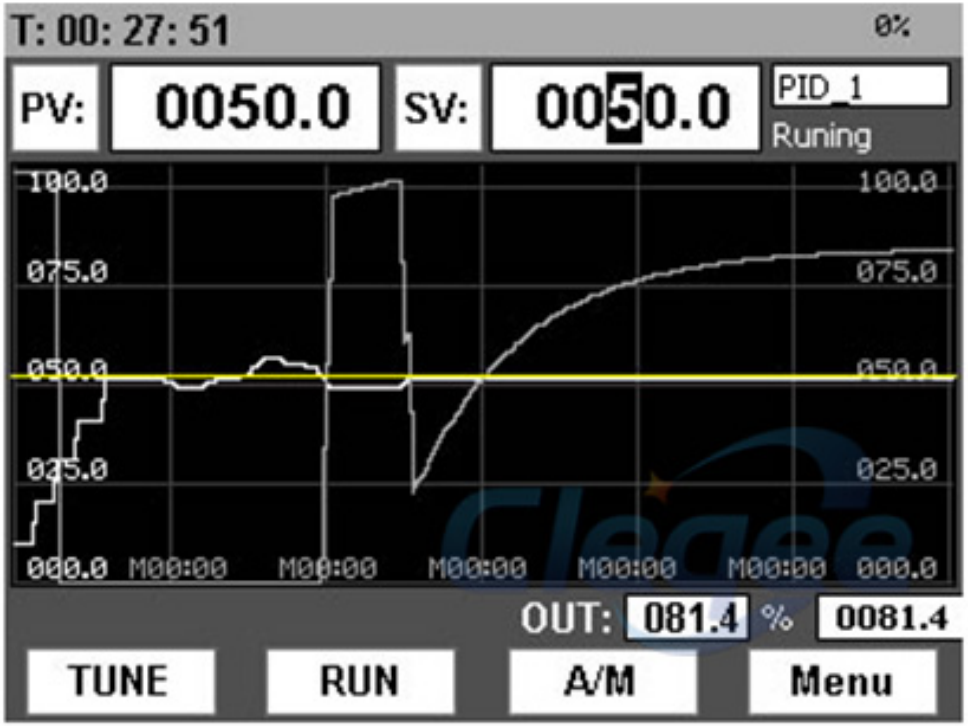


Register value online Edit

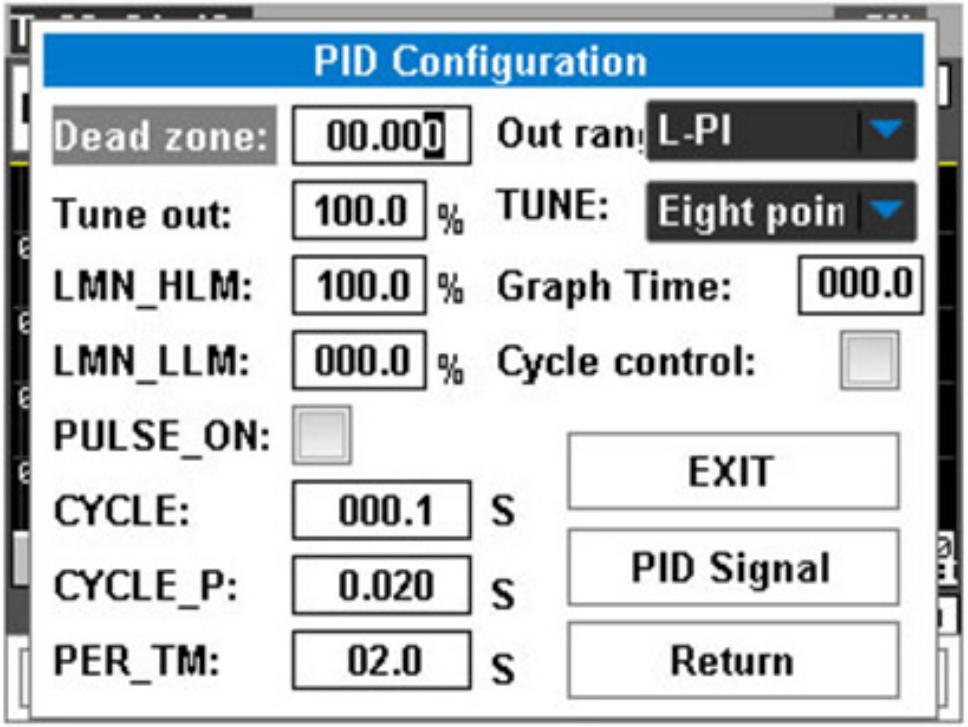
5 configurations for users to use

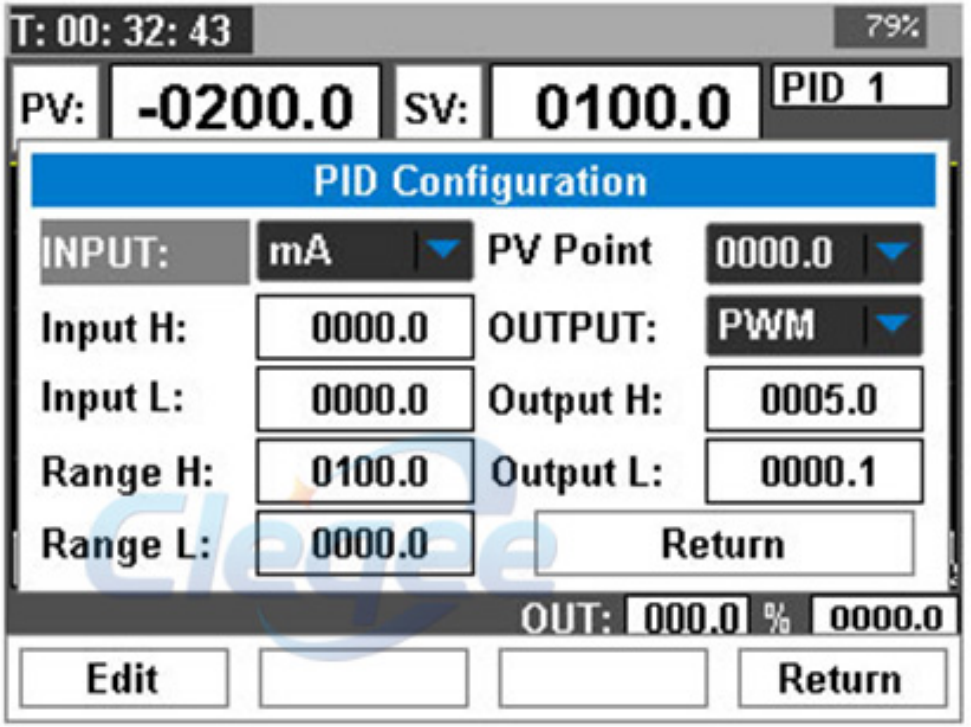

Silicon controlled
AC220V
MR9270S
T: 00: 27: 51
PV: 0050.0
SV: 0050.0
Runing
OUT: 001.4 % 001.4
TUNE
RUN
A/M
Menu
IN
T-ON
OUT
FN
I-TY
O-TY
REST
EXIT
Smart color generator
heater
Temperature sensor
Constant temperature box

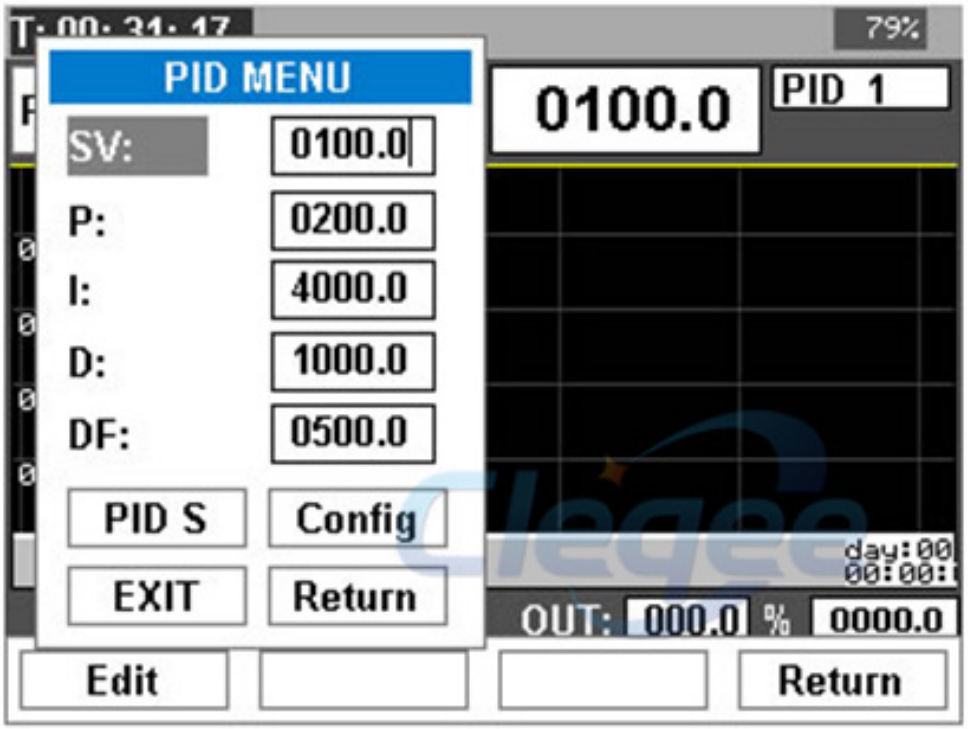
PID control constant temperature box test wiring

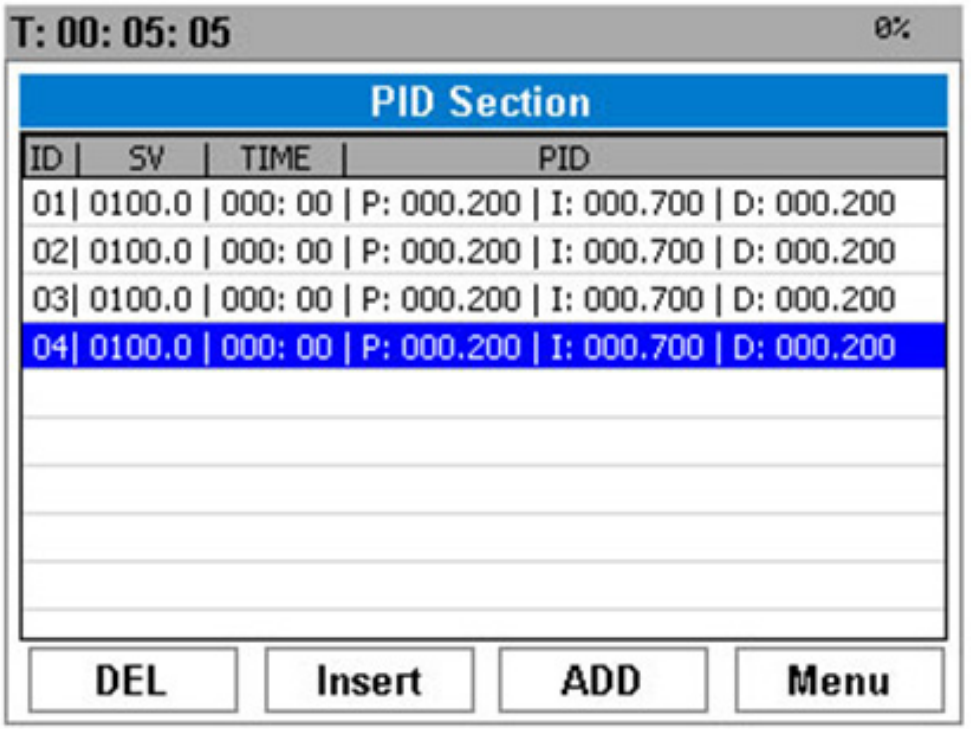


Position type PID control panel, up to 32 control points can be set


PID Configuration
Dead zone:
00.000
Out ran
L-PI
Tune out:
100.0
%
TUNE:
Eight poin
LMN_HLM:
100.0
%
Graph Time:
000.0
LMN_LLM:
000.0
%
Cycle control:
PULSE_ON:
EXIT
CYCLE:
000.1
S
CYCLE_P:
0.020
S
PID Signal
PER_TM:
02.0
S
Return

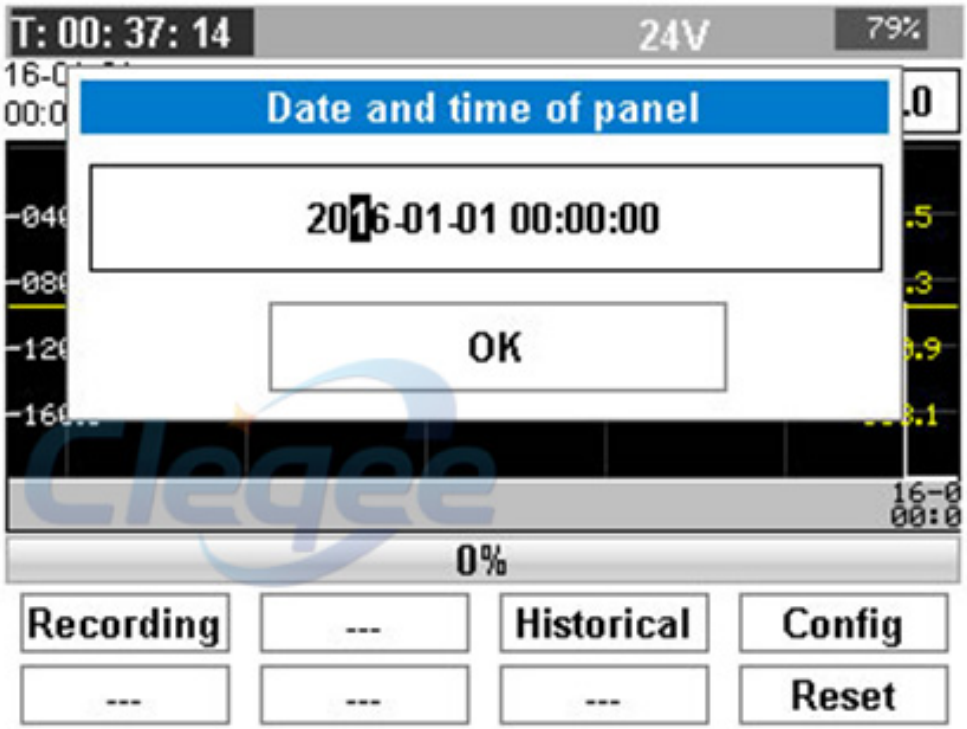

T: 00: 32: 43
79%
PV:
-0200.0
SV:
0100.0
PID 1
PID Configuration
INPUT:
mA
PV Point
0000.0
Input H:
0000.0
OUTPUT:
PWM
Input L:
0000.0
Output H:
0005.0
Range H:
0100.0
Output L:
0000.1
Range L:
0000.0
Return
OUT:
000.0
%
0000.0
Edit
Return


T: 00: 31: 17
79%
PID MENU
SV: 0100.0
P: 0200.0
I: 4000.0
D: 1000.0
DF: 0500.0
PID S
Config
EXIT
Return
0100.0
PID 1
day:00
OUT: 000.0 %
0000.0
Edit
Return


T: 00: 05: 05
0%
PID Section
ID | SV | TIME | PID
01| 0100.0 | 000: 00 | P: 000.200 | I: 000.700 | D: 000.200
02| 0100.0 | 000: 00 | P: 000.200 | I: 000.700 | D: 000.200
03| 0100.0 | 000: 00 | P: 000.200 | I: 000.700 | D: 000.200
04| 0100.0 | 000: 00 | P: 000.200 | I: 000.700 | D: 000.200
DEL
Insert
ADD
Menu

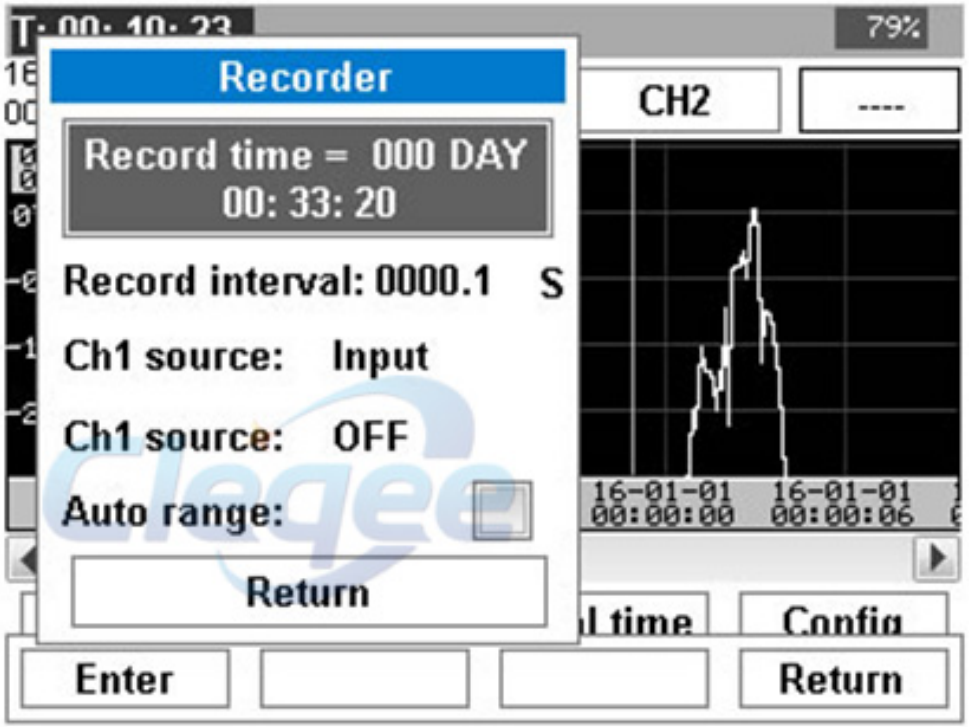
Logger

20000 recording points, two recording channels.The signal source can be recorded from within Smart.Part of the input and output signals can also be readModbus data from station equipmentLine record.



History curve online view:
Time axis can be used for recording curve
Narrow view, can also be free to modify the
light Time step size.

Modify record time interval, program Will automatically calculate the length of the record time.□Signal source can be selected through the MODBUS Master station to read data from the station to record.



Product accessories

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http://www.mrsignal.cn

Product parts list			
Name	Numbe	Name	Number
MR9270S Signal generator	1	Certificate	1
10A/4MM Test clip (black)	1	RS485 Communication cable	1
10A/4MM Test clip (red)	1	RS485 Adapter	1
10A/4MM Test clip (blue)	1	Tool bag	1
10A/4MM Test clamp (yellow)	1	USB line	1
Charger	1		


MR92705
Mr.SIGNAL™
LANYI®
SMART
miniature instrument