

# 1 Function Description

## 1.1 Device ID Configuration

### 1.1.1 Function Description

Set the device ID of the instrument. The register type should be holding register.

### 1.1.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Device ID	4096-4111	0x1000-0x100F	0x03/0x10	16	String		String data in ASCII format, with a maximum length of 32 bytes and occupying up to 16 registers. Unused registers are filled with 0x0000. For example, if the device No. is SENSOR_1234,

### 1.2.1 Function Description

Set the measurement parameters of the instrument. You can select PV, SV, TV, and QV to measure different data indicators. The register type is holding register.

The function varies according to device models, refer to actual product for reference.

### 1.2.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
PV Value	4112	0x1010	0x03/0x10	1	uint16		
SV Value	4113	0x1011	0x03/0x10	1	uint16		
TV Value	4114	0x1012	0x03/0x10	1	uint16		
QV Value	4115	0x1013	0x03/0x10	1	uint16		
Reserved	4116~4143						

## 1.3 General Time Configuration

## 1.3.1 Function Description

Set the time of the digital clock, including year, month, day, hour, minute, and second. The register type is holding register.

## 1.3.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Devices date-Year	4144	0x1030	0x03/0x10	1	uint16		
Devices date-month	4145	0x1031	0x03/0x10	1	uint16		
Devices date-day	4146	0x1032	0x03/0x10	1	uint16		
Devices date-hour	4147	0x1033	0x03/0x10	1	uint16		
Devices date-minute	4148	0x1034	0x03/0x10	1	uint16		
Devices date-second	4149	0x1035	0x03/0x10	1	uint16		
Reserved	4150~4159						

## 1.4 General Bluetooth Parameter Configuration

### 1.4.1 Function Description

Configure the activation switch of Bluetooth and other parameters. The register type is holding register.

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Bluetooth activation switch	4160	0x1040	0x03/0x10	1	BOOL		
Reserved	4161~4175						

## 1.5 General HART Parameter Configuration Function

## 1.5.1 Function Description

To configure HART address and loop current mode. The register type is holding register.

## 1.5.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
HART Address	4176	0x1050	0x03/0x10	1	uint16	Unit	Range: 0 to 63
Loop Current	4177	0x1051	0x03/0x10	1	uint16		0: Invalid parameter when setting and not supported when getting. 1: Analog current output (determined by analog current output mode). 2: Fixed current output.
Reserved	4178~4191						

## 1.6 Restore Instrument Parameter Function Configuration

### 1.6.1 Function Description

Restore device parameters to default settings, including basic reset and all reset, using keep registers.

### 1.6.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Device restore	4192	0x1060	0x10	1	uint16		Write-only parameter, cannot get notified about 0-Invalid value 1- Basic rest 2- All reset
Reserved	4193-4207	0x1061-0x106F	0x03/0x10	15			

## 1.7 Write Protection Waiting Time

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### 1.7.1 Function Description

The register type is holding register.

### 1.7.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Write protection waiting time	4208	0x1070	0x03/0x10	1	uint16	Minutes	0-1 1-10 2-30
Reserved	4209-4223						

## 1.8 Diagnosis Event List Exporting Function

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### 1.8.1 Function Description

Export different types of file data from the device using holding register.

### 1.8.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Diagnosis Event List	16387	0x4003	0x03/0x10	1	uint16		0x0011: Device Event List 0x0012: Device Parameter

## 1.9 Unit Settings

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### 1.9.1 Function Description

The unit of the parameter of different measurement indexes of devices is kept in the holding register.

### 1.9.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
Volume Flow Rate Unit	4608	0x1200	0x03/0x10	1	uint16		See the description of the enumeration value in "Unit Description"
Mass Flow Rate Unit	4609	0x1201	0x03/0x10	1	uint16		See the description of the enumeration value in "Unit Description"
Flow Velocity Unit	4610	0x1202	0x03/0x10	1	uint16		See the description of the enumeration value in "Unit Description"
Density Unit	4611	0x1203	0x03/0x10	1	uint16		See the description of the enumeration value in "Unit Description"
Temperature Unit	4612	0x1204	0x03/0x10	1	uint16		See the description of the enumeration value in "Unit Description"
Mass Unit	4614	0x1206	0x03/0x10	1	uint16		See the description of the enumeration value in "Unit Description"
Volume Unit	4615	0x1207	0x03/0x10	1	uint16		See the description of the enumeration value in "Unit Description"
Sound Velocity Unit	4616	0x1208	0x03/0x10	1	uint16		See the description of the enumeration value in "Unit Description"
Reserved	4617-4623						

## 1.10 Unit Description

Instrument unit enumeration values are listed as follows:

## Temperature Unit

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
°C	16416	0x4020
°F	16417	0x4021
K	16419	0x4023

## Time Unit

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
min	17970	0X4632
sec	17971	0x4633
hour	17972	0x4634
day	17973	0x4635

## Volume Unit

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
gal	17448	0x4428
L	17449	0x4429
m <sup>3</sup>	17451	0x442B
ft <sup>3</sup>	17520	0x4470
in <sup>3</sup>	17521	0x4471

## Mass Unit

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
g	18236	0x473C
kg	18237	0x473D
t	18238	0x473E
lb	18239	0x473F

## Mass Flow Rate Unit

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
g/s	18502	0x4846
g/min	18503	0x4847
g/h	18504	0x4848
kg/s	18505	0x4849
kg/min	18506	0x484A
kg/h	18507	0x484B
t/min	18509	0x484D
t/h	18510	0x484E
t/d	18511	0x484F
lb/s	18512	0x4850
lb/min	18513	0x4851
lb/h	18514	0x4852

#### Volume Flow Rate Unit

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
m <sup>3</sup> /s	16924	0x421C
m <sup>3</sup> /min	17027	0x4283
m <sup>3</sup> /Hour	16915	0x4213
m <sup>3</sup> /d	16925	0x421D
L/s	16920	0x4218
L/min	16913	0x4211
L/h	17034	0x428A
ft <sup>3</sup> /min	16911	0x420F
ft <sup>3</sup> /h	17026	0x4282
ft <sup>3</sup> /d	16923	0x421B
gal/s	16918	0x4216
gal/min	16912	0x4210
gal/h	17032	0x4288

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
gal/d	17131	0x42EB

Current Unit

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
mA	21543	0x5427

Voltage Unit

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
V	21306	0x533A

Percentage Unit

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
%	20793	0x5139

Flow Velocity Unit

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
m/s	17173	
cm/s	513	

Density Unit

Unit	Enumeration value (decimal)	Enumeration value (hexadecimal)
g/cm <sup>3</sup>	1	0x0001
kg/m <sup>3</sup>	2	0x0002

## 1.11 Measurement Parameter Settings (Need to Stop Measurement)

### 1.11.1 Function Description

Measurement settings can be modified when measurement is stopped. The register type is holding register.

## 1.11.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Measurement Command	4624	0x1210	0x03/0x10	1	uint16		0: Invalid parameter when setting and not supported when getting. 1: Start measurement. 2: End measurement. Note: All parameters in this register should be modified in the end measurement phase, or failure will be returned.
Measurement Mode	4625	0x1211	0x03/0x10	1	uint16		0: invalid parameter for setting and not supported for getting; 1: time difference method; 2: Doppler effect method; 255: auto-switch method
Pipe outer diameter	4626-4627	0x1212-0x1213	0x03/0x10	2	float	mm	
Pipe wall thickness	4628-4629	0x1214-0x1215	0x03/0x10	2	float	mm	
Pipe Material	4630	0x1216	0x03/0x10	1	uint16		0: Invalid parameter when setting; Not supported when getting. 1: Stainless Steel 2: Copper 3: Aluminum 4: Cast Iron
Pipe Surface Roughness	4631 - 4632	0x1217 - 0x1218	0x03/0x10	2	float	mm	Range: 0 - 5
Number of traverse	4633	0x1219	0x03/0x10	1	uint16		Range [1, 6]
Reserved	4634 To 4639						

## 1.12 Measurement Parameter Settings (No Need to Stop Measurement)

### 1.12.1 Function Description

The register type is holding register. You can edit the settings during measurement.

### 1.12.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
Temperature Input Mode	4640	0x1220	0x03/0x10	1	uint16		0: Invalid parameter when setting and Not supported when getting. 1: Manual input. 2: PT1000 input. 3: Current Input.
Manual Input Temperature Value	4641 to 4642	0x1221 to 0x1222	0x03/0x10	2	float		
Temperature Unit	4643	0x1223	0x03/0x10	1	uint16	See the description of the enumeration value in "Unit Description"	
Damping Time	4644-4645	0x1224-0x1225	0x03/0x10	2	float	s (second)	Range: 0 to 100.0, accurate to one decimal place
Reserved	4646-4655						

## 1.13 Low Flow Cutoff Parameter Settings

### 1.13.1 Function Description

You can select different process variables for allocation, configure parameters such as thresholds and surge suppression time, and use holding registers.

## 1.13.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
Process Variable	4656	0x1230	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: none; 2: volume flow rate; 3: mass flow rate; 4: flow velocity
Activation Threshold	4657 to 4658	0x1231 to 0x1232	0x03/0x10	2	float		
Deactivation Threshold	4659 to 4660	0x1233 to 0x1234	0x03/0x10	2	float		
Threshold unit	4661	0x1235	0x03/0x10	1	uint16		
Surge Suppression Time	4662 to 4663	0x1236 to 0x1137	0x03/0x10	2	float		
Reserved	4664-4671						

## 1.14 Totalizer Parameter Settings

### 1.14.1 Function Description

Multiple totalizers are configured with different process variables, measuring modes, and overflow settings. The register type is holding register.

### 1.14.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
Totalizer 1-Control	4672	0x1240	0x03/0x10	1	uint16		0: Invalid parameter when setting, not supported when getting 1: Start 2: Stop 3: Reset
Totalizer 1 - Process Variable	4673	0x1241	0x03/0x10	1	uint16		0: invalid parameter when setting; not supported when getting 1: none 2: volume flow rate 3: mass flow rate
Totalizer 1 - Measuring Mode	4674	0x1242	0x03/0x10	1	uint16		0: Invalid parameter when setting; not supported when getting. 1: Forward flow accumulation. 2: Reverse flow accumulation. 3: Net flow accumulation
Totalizer 1 - Overflow Settings	4675	0x1243	0x03/0x10	1	uint16		0: Invalid parameter when setting, not supported when getting 1: Hold (Freeze after reaching Max. value) 2: Hold + Alarm (Freeze and warn after reaching Max. value) 3: Reset (Clear to zero after reaching Max. value)
Totalizer 2-Control	4676	0x1244	0x03/0x10	1	uint16		0: Invalid parameter when setting, not supported when getting 1: Start 2: Stop 3: Reset

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
Totalizer 2 - Process Variable	4677	0x1245	0x03/0x10	1	uint16		0: invalid parameter when setting; not supported when getting 1: none 2: volume flow rate 3: mass flow rate
Totalizer 2 - Measuring Mode	4678	0x1246	0x03/0x10	1	uint16		0: Invalid parameter when setting; not supported when getting. 1: Forward flow accumulation. 2: Reverse flow accumulation. 3: Net flow accumulation
Totalizer 2 - Overflow Settings	4679	0x1247	0x03/0x10	1	uint16		0: Invalid parameter when setting, not supported when getting 1: Hold (Freeze after reaching Max. value) 2: Hold + Alarm (Freeze and warn after reaching Max. value) 3: Reset (Clear to zero after reaching Max. value)
Totalizer 3 -Control	4680	0x1248	0x03/0x10	1	uint16		0: Invalid parameter when setting, not supported when getting 1: Start 2: Stop 3: Reset
Totalizer 3 - Process Variable	4681	0x1249	0x03/0x10	1	uint16		0: invalid parameter when setting; not supported when getting 1: none 2: volume flow rate 3: mass flow rate

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
Totalizer 3 - Measuring Mode	4682	0x124A	0x03/0x10	1	uint16		0: Invalid parameter when setting; not supported when getting. 1: Forward flow accumulation. 2: Reverse flow accumulation. 3: Net flow accumulation
Totalizer 3 - Overflow Settings	4683	0x124B	0x03/0x10	1	uint16		0: Invalid parameter when setting, not supported when getting 1: Hold (Freeze after reaching Max. value) 2: Hold + Alarm (Freeze and warn after reaching Max. value) 3: Reset (Clear to zero after reaching Max. value)
Reserved	4684 to 4687	0x124C to 0x124F	0x03/0x10	4			

## 1.15 Current Output Configuration

### 1.15.1 Function Description

Select different process variables for allocation, configure signal type, output process variable, etc., and use holding register as the register type.

### 1.15.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Process Variable	4688	0x1250	0x03/0x10	1	uint16		0: Invalid parameter when setting; Not supported when getting. 1: None. 2: Volume Flow Rate. 3: Mass Flow Rate. 4: Flow Velocity
Signal Type	4689	0x1251	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: active; 2: passive
Output Range	4690	0x1252	0x03/0x10	1	uint16		0: Invalid parameter when setting; Not supported when getting. 1: 4 to 20 mA
4mA Output Process Variable Value	4691-4692	0x1253-0x1254	0x03/0x10	2	float		
20mA output process variable value	4693-4694	0x1255-0x1256	0x03/0x10	2	float		
Process variable unit	4695	0x1257	0x03/0x10	1	uint16		

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Failure Mode	4696	0x1258	0x03/0x10	1	uint16		0: Invalid parameter when setting, unsupported when getting notified about this parameter 1: Low current alarm 2: High current alarm 3: Hold mode
High Alarm Current Setting	4697-4703	0x12590x125F	0x03/0x10	7		mA	

## 1.16 Get Initialization Parameter

### 1.16.1 Function Description

The register used is input register. The range and unit of mass flow rate and volume flow rate are included.

### 1.16.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Mass Flow Rate	8192 - 8195	0x2000 - 0x2003	0x04	4	int64		coefficient: 0.0001
Mass Flow Rate	8196 to 8199	0x2004 to 0x2007	0x04	4	int64		coefficient: 0.0001
Mass Flow Rate Unit	8200	0x2008	0x04	1	uint16		
Volume Flow Rate Upper Limit	8201- 8204	0x2009-0x200C	0x04	4	int64		coefficient: 0.0001
Volume Flow Rate Lower Limit	8205 to 8208	0x200D to 0x2010	0x04	4	int64	Coefficient: 0.0001	
Volume Flow Rate Unit	8209	0x2011	0x04	1	uint16		

## 1.17 Device Restart

### 1.17.1 Function Description

The register used is the holding register.

### 1.17.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
Mode	4224	0x1080	0x03/0x10	1	uint16		0-Reserved 1- Immediate Restart
Reserved	4225~4607						

## 1.18 FPS Output Mode Configuration

## 1.18.1 Function Description

The selection for FPS output port 1 and 2. The selectable options are pulse, frequency, and switch. The register type is the holding register.

## 1.18.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
FPS Output 1 Mode Setting	4704	0x1260	0x03/0x10	1			0: Invalid parameter when setting; Not supported when getting. 1: Pulse (see Pulse Output Configuration). 2: Frequency (see Frequency Output Configuration). 3: Switch (see Switch Output Configuration)
FPS Output 2 Mode Setting	4705	0x1261	0x03/0x10	1			0: Invalid parameter when setting; Not supported when getting. 1: Pulse (see Pulse Output Configuration). 2: Frequency (see Frequency Output Configuration). 3: Switch (see Switch Output Configuration)

## 1.19 Pulse Output Configuration

### 1.19.1 Function Description

Currently, there are two pulse output ports. You can configure the process variable, signal mode, pulse scaling, pulse width, etc., and use the holding register type.

### 1.19.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Pulse1-Process Variable	4720	0x1270	0x03/0x10	1	uint16		0: Invalid parameter when setting, not supported when getting 1: Volume flow rate 2: Mass flow rate
Pulse1-Signal Mode	4721	0x1271	0x03/0x10	1	uint16		0: Invalid parameter when setting, not supported when getting 1: Active 2: Passive
Pulse 1 - Pulse Scaling	4722 ~ 4725	0x1272 ~ 0x1275	0x03/0x10	4	int64		Range: 0 - 10000000000 Coefficient: 0.0001
Pulse Scaling Unit	4726	0x1276	0x03/0x10	1	uint16		0: P/U 1: U/P
Pulse1-Pulse Width	4727-4728	0x1277-0x1278	0x03/0x10	2	float	ms	
Pulse 1 - Failure Mode	4729	0x1279	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: no pulse; 2: actual value
Pulse 1 - Invert Signal	4730	0x127A	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: normal; 2: inverted
Pulse 2 - Process Variable	4736	0x1280	0x03/0x10	1	uint16		0: Invalid parameter when setting, not supported when getting 1: Volume flow rate 2: Mass flow rate

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Pulse 2- Signal Mode	4737	0x1281	0x03/0x10	1	uint16		0: Invalid parameter when set, not supported when getting 1: Active 2: Passive
Pulse 2 - Pulse Scaling	4738-4741	0x1282~0x1285	0x03/0x10	4	int64		Range: 0-10000000000 Coefficient: 0.0001
Pulse Scaling Unit	4742	0x1286	0x03/0x10	1	uint16		0: P/U 1: U/P
Pulse 2- Pulse Width	4743-4744	0x1287-0x1288	0x03/0x10	2	float	ms	
Pulse 2 - Failure Mode	4745	0x1289	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: no pulse; 2: actual value
Pulse 2 - Invert Signal	4746	0x128A	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: normal; 2: inverted
Reserved	4747-4751						

## 1.20 Frequency Output Configuration

### 1.20.1 Function Description

Currently, there are two frequency output ports. You can configure the process variable of frequency output port, signal mode, maximum and minimum frequency value, and frequency output test value, etc. The register type is holding register.

### 1.20.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Frequency 1- Process Variable	4752	0x1290	0x03/0x10	1	uint16		0: Invalid parameter when setting and not supported when getting; 1: volume flow rate; 2: mass flow rate; 3: flow velocity
Frequency 1- Signal Mode	4753	0x1291	0x03/0x10	1	uint16		0: Invalid parameter when setting and not supported when getting, 1: Active, 2: Passive
Frequency 1 - Min. Frequency	4754-4755	0x1292-0x1293	0x03/0x10	2	float	Hz	
Frequency 1 - Max. Frequency	4756-4757	0x1294-0x1295	0x03/0x10	2	float	Hz	
Frequency 1 - Min. Measurement Value	4758-4759	0x1296-0x1297	0x03/0x10	2	float		
Frequency 1 - Max. Measurement Value	4760-4761	0x1298-0x1299	0x03/0x10	2	float		
Frequency 1 - Measurement Value Unit	4762	0x129A	0x03/0x10	1	uint16		
Frequency 1 - Failure Mode	4763	0x129B	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: none; 2: actual value

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Frequency 1 - Invert Signal	4764	0x129C	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: normal; 2: inverted
Frequency 2 - Process Variable	4768	0x12A0	0x03/0x10	1	uint16		0: Invalid parameter when setting and not supported when getting; 1: volume flow rate; 2: mass flow rate; 3: flow velocity
Frequency 2 - Signal Mode	4769	0x12A1	0x03/0x10	1	uint16		0: Invalid parameter when set, not supported when getting 1: Active 2: Passive
Frequency 2 - Min. Frequency	4770-4771	0x12A2-0x12A3	0x03/0x10	2	float	Hz	
Frequency 2 - Max. Frequency	4772-4773	0x12A4-0x12A5	0x03/0x10	2	float	Hz	
Frequency 2 - Min. Measurement Value	4774-4775	0x12A6-0x12A7	0x03/0x10	2	float		
Frequency 2 - Max. Measurement Value	4776-4777	0x12A8-0x12A9	0x03/0x10	2	float		
Frequency 2 - Measurement Value Unit	4778	0x12AA	0x03/0x10	1	uint16		

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Frequency 2 - Failure Mode	4779	0x12AB	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: none; 2: actual value
Frequency 2 - Invert Signal	4780	0x12AC	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: normal; 2: inverted
Reserved	4781-4783						

## 1.21 Switch Output Configuration

### 1.21.1 Function Description

Currently, there are two switch output ports. You can configure the switch output function, signal mode, diagnostic event, flow direction check, switch on/off limit value, switch on/off delay time, etc., of the switch output port. The register type is holding register.

### 1.21.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Switch 1 - Switch Output Function	4784	0x12B0	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: none; 2: diagnostic event; 3: limit value; 4: flow direction check; 5: status
Switch 1 - Signal Mode	4785	0x12B1	0x03/0x10	1	uint16		0: Invalid parameter when setting and not supported when getting, 1: Active, 2: Passive
Switch 1 - Diagnostic Event	4786	0x12B2	0x03/0x10	1	uint16		(Only takes effect when Switch Output is set to Diagnostic Event.) 0: Invalid parameter when setting; not supported when getting 1: Failure Alarm 2: Warning 3: Failure/Warning
Switch 1 - Flow Direction Check	4787	0x12B3	0x03/0x10	1	uint16		(Only takes effect when Switch Output is set to Flow Check) 0: Invalid parameter when set, not supported when getting 1: Enable (forward flow direction) 2: Disable (reverse flow direction)
Switch 1 - Status Mode	4788	0x12B4	0x03/0x10	1	uint16		(Only takes effect when Switch Output is set to Status) 0: Invalid parameter when set, not supported when getting 1: low flow cut off

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Switch 1 - Process Variable	4789	0x12B5	0x03/0x10	1	uint16		(Only takes effect when Switch Output is set to Limit) 0: Invalid parameter when setting and not supported when getting 1: Volume Flow Rate 2: Mass Flow Rate 3: Flow Velocity 4: Totalizer1 5: Totalizer2 6: Totalizer3
Switch 1 - Switch On Limit Value	4790-4793	0x12B6-0x12B9	0x03/0x10	4	int64		Coefficient: 0.0001 (Only takes effect when Switch Output is set to Limit)
Switch 1 - Switch Off Limit Value	4794-4797	0x12BA-0x12BD	0x03/0x10	4	int64		Coefficient: 0.0001 (Only takes effect when Switch Output is set to Limit)
Switch 1 - Limit Value Unit	4798	0x12BE	0x03/0x10	1	uint16		(Only takes effect when Switch Output is set to Limit)
Switch 1 - Switch On Delay	4799	0x12BF	0x03/0x10	2	float	s	(Only takes effect when Switch Output is set to Limit)
Switch 1 - Switch Off Delay	4801	0x12C1	0x03/0x10	2	float	s	(Only takes effect when Switch Output is set to Limit)
Switch 1 - Failure Mode	4803	0x12C3	0x03/0x10	1	uint16		0: invalid parameter when setting; not supported when getting. 1: enabled (only can be enabled when Switch Output is set to Diagnostic Event) 2: disabled

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Switch 2 - Switch Output Function	4804	0x12C4	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: none; 2: diagnostic event; 3: limit value; 4: flow direction check; 5: status
Switch 2 - Signal Mode	4805	0x12C5	0x03/0x10	1	uint16		0: Invalid parameter when setting and not supported when getting, 1: Active, 2: Passive
Switch 2 - Diagnostic Event	4806	0x12C6	0x03/0x10	1	uint16		(Only takes effect when Switch Output is set to Diagnostic Event.) 0: Invalid parameter when setting; not supported when getting 1: Failure Alarm 2: Warning 3: Failure/Warning
Switch 2 - Flow Direction Check	4807	0x12C7	0x03/0x10	1	uint16		(Only takes effect when Switch Output is set to Flow Check) 0: Invalid parameter when set, not supported when getting 1: Enable (forward flow direction) 2: Disable (reverse flow direction)
Switch 2 - Status Mode	4808	0x12C8	0x03/0x10	1	uint16		(Only takes effect when Switch Output is set to Status) 0: Invalid parameter when set, not supported when getting 1: low flow cut off

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Switch 2 - Process Variable	4809	0x12C9	0x03/0x10	1	uint16		(Only takes effect when Switch Output is set to Limit) 0: Invalid parameter when setting and not supported when getting 1: Volume Flow Rate 2: Mass Flow Rate 3: Flow Velocity 4: Totalizer1 5: Totalizer2 6: Totalizer3
Switch 2 - Switch On Limit Value	4810	0x12CA	0x03/0x10	4	int64		Coefficient: 0.0001 (Only takes effect when Switch Output is set to Limit)
Switch 2 - Switch Off Limit Value	4814	0x12CE	0x03/0x10	4	int64		Coefficient: 0.0001 (Only takes effect when Switch Output is set to Limit)
Switch 2 - Limit Value Unit	4818	0x12D2	0x03/0x10	1	uint16		(Only takes effect when Switch Output is set to Limit)
Switch 2 - Switch On Delay	4819	0x12D3	0x03/0x10	2	float	s	(Only takes effect when Switch Output is set to Limit)
Switch 2 - Switch Off Delay	4821	0x12D5	0x03/0x10	2	float	s	(Only takes effect when Switch Output is set to Limit)
Switch 2 - Failure Mode	4823	0x12D7	0x03/0x10	1	uint16		0: invalid parameter when setting; not supported when getting. 1: enabled (only can be enabled when Switch Output is set to Diagnostic Event) 2: disabled

## 1.22 Current Input Configuration

### 1.22.1 Function Description

Set the types of input parameter and signal, upper/lower limit value, unit of value, etc., and use holding register as the register type.

### 1.22.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
Input Parameter	4944	0x1350	0x03/0x10	1	uint16		0: Invalid parameter when setting and Not supported when getting; 1: Temperature; 2: Density
Signal Mode	4945	0x1351	0x03/0x10	1	uint16		0: Invalid parameter when setting and Not supported when getting. 1: Active 2: Passive
Upper Range	4946	0x1352	0x03/0x10	2	float		
Lower Range	4948	0x1354	0x03/0x10	2	float		
Value Unit	4950	0x1356	0x03/0x10	1	uint16		unit depends on input variable
Reserved	4951~4975						

## 1.23 Switch Input Configuration

### 1.23.1 Function Description

Set the type of switch input parameter and the response time. The register type is holding register.

### 1.23.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
Input Parameter	4976	0x1370	0x03/0x10	1	uint16		0: Invalid parameter when setting and Not supported when getting. 1: Disable. 2: Reset Totalizer1. 3: Reset Totalizer2. 4: Reset Totalizer3. 5: Reset All Totalizers
Response Time	4977	0x1371	0x03/0x10	1	uint16	ms	Range [5, 200]
Trigger Level	4978	0x1372	0x03/0x10	1	uint16		0: Reserved 1: High Level 2: Low Level
Reserved	4979~5007						

## 1.24 Display Format Configuration

### 1.24.1 Function Description

Supports configuring different display modes, indicator types for different display values, decimal places, etc., and the register type is holding register.

### 1.24.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Display Mode	4848	0x12F0	0x03/0x10	1	uint16		0: Invalid parameter when setting and not supported when getting. 1: 1 Value. 2: 2 Values. 3: 1 Value + 1 Bargraph.
Value 1 Display	4849	0x12F1	0x03/0x10	1	uint16		
Value 1 Display Decimal Places	4850	0x12F2	0x03/0x10	1	uint16		0: Invalid parameter when setting, unsupported when getting 1: 1 decimal place (#. #) 2: 2 decimal places (#. ##) 3: 3 decimal places (#. ###) 4: 4 decimal places (#. ####) 10: Auto
Value 2 Display	4851	0x12F3	0x03/0x10	1	uint16		
Value 2 Display Decimal Places	4852	0x12F4	0x03/0x10	1	uint16		0: Invalid parameter when setting, unsupported when getting 1: 1 decimal place (#. #) 2: 2 decimal places (#. ##) 3: 3 decimal places (#. ###) 4: 4 decimal places (#. ####) 10: Auto
Value 3 Display	4853	0x12F5	0x03/0x10	1	uint16		

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Value 3 Display Decimal Places	4854	0x12F6	0x03/0x10	1	uint16		0: Invalid parameter when setting, unsupported when getting 1: 1 decimal place (#.#) 2: 2 decimal places (##) 3: 3 decimal places (###) 4: 4 decimal places (####) 10: Auto
Value 4 Display	4855	0x12F7	0x03/0x10	1	uint16		
Value 4 Display Decimal Places	4856	0x12F8	0x03/0x10	1	uint16		0: Invalid parameter when setting, unsupported when getting 1: 1 decimal place (#.#) 2: 2 decimal places (##) 3: 3 decimal places (###) 4: 4 decimal places (####) 10: Auto
Contrast	4857	0x12F9	0x03/0x10	1	uint16		0-100
Backlight							0: Invalid parameter when setting and not supported when getting. 1: Enable 2: Disable
Reserved	4859-4863						

## 1.25 Simulation Configuration

## **1.25.1 Function Description**

Select different simulation patterns, configure the frequency simulation value and unit, pulse simulation value, period, and pulse width parameters. The register type is holding register.

## **1.25.2 Function Point Table**

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Simulation Mode	4864	0x1300	0x03/0x10	1	uint16		0: invalid parameter when setting and not supported when getting; 1: disable simulation; 2: flow rate; 3: volume flow rate; 4: mass flow rate; 5: current; 6: frequency 1; 7: pulse 1 (simulation value is the cycle and pulse width of pulse simulation); 8: alarm; 9: frequency 2; 10: pulse 2 (simulation value is the cycle and pulse width of pulse simulation)
Simulation Value	4865	0x1301	0x03/0x10	2	float		Note: When simulating the alarm, the simulation value of 0 means "off" and that of 1 means "on".
Simulation Value Unit	4867	0x1303	0x03/0x10	1	uint16		Note: No need to apply the parameter when simulating alarm.
Pulse simulation value-cycle	4868	0x1304	0x03/0x10	2	float	ms	

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Pulse simulation value-pulse width	4870	0x1306	0x03/0x10	2	float	mm	
Reserved	4872-4879						

## 1.26 Storage Parameter Configuration

### 1.26.1 Function Description

Supports selecting whether to overwrite historical data and getting the total capacity and used capacity information. The register type is holding register.

### 1.26.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Historical Data Loop Storage	4880	0x1310	0x03/0x10	1	uint16		0: Invalid parameter when setting; Not supported when getting. 1: Yes. 2: No.
Occupied capacity	4881	0x1311	0x03/0x10	1	uint16		
Total capacities	4882	0x1312	0x03/0x10	1	uint16		
Reserved	4883-4895						

## 1.27 Multiple Calibration

### 1.27.1 Function Description

The register type is holding register.

### 1.27.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Multiple Calibration	16387	0x4003	0x03/0x10	1	uint16		0x0013: Multiple Calibration

## 1.28 Get Historical Measurement Curves Data

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### 1.28.1 Function Description

The register type is holding register.

### 1.28.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Historical Measurement Curves Data	16387	0x4003	0x03	1	uint16		0x0013: Historical Measurement Curves Data

## 1.29 Query Historical Data of Specified Time Period

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### 1.29.1 Function Description

Steps:

1. Configure the required time period for the device. (see 1.29)
2. Calculate the historical data size of the specified time period from the device's register and return it to the device. (see 1.30)

The register type is holding register.

### 1.29.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Start date-Year	4896	0x1320	0x03/0x10	1	uint16		
Start date-month	4897	0x1321	0x03/0x10	1	uint16		
Start date-day	4898	0x1322	0x03/0x10	1	uint16		
Start Time-hour	4899	0x1323	0x03/0x10	1	uint16		
Start Time-minute	4900	0x1324	0x03/0x10	1	uint16		
Start Time-second	4901	0x1325	0x03/0x10	1	uint16		
End Date-Year	4902	0x1326	0x03/0x10	1	uint16		
End Date-Month	4903	0x1327	0x03/0x10	1	uint16		
End Date-Day	4904	0x1328	0x03/0x10	1	uint16		
End Time-hour	4905	0x1329	0x03/0x10	1	uint16		
End Time-minute	4906	0x132A	0x03/0x10	1	uint16		
End Time-second	4907	0x132B	0x03/0x10	1	uint16		
Reserved	4908-4911						

## 1.30 Calculate the Size of Historical Data in a Specified Time Period

### 1.30.1 Function Description

Steps:

1. Configure the required time period for the device. (see 1.29)
2. Calculate the historical data size of the specified time period from the device's register and return it to the device. (see 1.30)

The register type is holding register.

## 1.30.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Data size	4912-4913	0x1330-1331	0x03	2	uint32		
Reserved	4914~4943						

## 1.31 Export Historical Data of Specified Time Period

### 1.31.1 Function Description

The device first queries the historical data in a specific time period, then filters the data, and finally transmits the data to the client via big data transmission.

The register type is holding register.

### 1.31.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Export specified historical data	16387	0x4003	0x03/0x10	1	uint16		

## 1.32 Zero Setting

### 1.32.1 Function Description

Send command to perform zero calibration. The register type is holding register.

### 1.32.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Zero Point Calibration Control	5008	0x1390	0x03/0x10	1	uint16		0: Reserved 1: Start Calibration
Reserved	5009~5015	0x1397					

## 1.33 Display Format Configuration (Extended)

## 1.33.1 Function Description

Set the bar chart and unit field to be displayed. The register type is holding register.

## 1.33.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Value 2 Display 0% Bar Chart	4851	0x12F3	0x03/0x10	1	uint16		Coefficient: 0.0001
Value 2 Display 100% Bar Chart	4852	0x12F4	0x03/0x10	1	uint16		Coefficient: 0.0001
Value 2 Display Unit	4853	0x12F5	0x03/0x10	1	uint16		
Value 4 Display 0% Bar Chart	4854	0x12F6	0x03/0x10	1	uint16		Coefficient: 0.0001
Value 4 Display 100% Bar Chart	4855	0x12F7	0x03/0x10	1	uint16		Coefficient: 0.0001
Value 4 Display Unit	4856	0x12F8	0x03/0x10	1	uint16		
Reserved	4859-4863						

## 1.34 Get General Measurement Parameter

### 1.34.1 Function Description

Get the measurement value, unit, and status information of PV, SV, TV, and QV. The register type is input register.

### 1.34.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
PV Value	4096-4097	0x1000-0x1001	0x04	2	float		PV Value (the specific data type is defined by the general measurement parameter configuration)
PV Unit	4098	0x1002	0x04	1	uint16	See 1.10 Unit Description	PV value unit (determined by the configuration of each instrument)
PV Value Status	4099	0x1003	0x04	1	uint16		0-Parameter Exception 1-Parameter Normal
SV Value	4100-4101	0x1004-0x1005	0x04	2	float		SV Value (the specific data type is defined by the general measurement parameter configuration)
SV Unit	4102	0x1006	0x04	1	uint16	See 1.10 Unit Description	SV Value Unit (determined by the configuration of each instrument)
SV Value Status	4103	0x1007	0x04	1	uint16		0-Parameter Abnormal 1-Parameter Normal
TV Value	4104-4105	0x1008-0x1009	0x04	2	float		TV Value (the specific data type is defined by the general measurement parameter configuration)
TV Unit	4106	0x100A	0x04	1	uint16	See 1.10 Unit Description	TV Value Unit (determined by the configuration of each instrument)
TV Value Status	4107	0x100B	0x04	1	uint16		0-Parameter Exception 1-Parameter Normal

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
QV Value	4108-4109	0x100C-0x100D	0x04	2	float		QV Value (the specific data type is defined by the General Measurement Parameter Configuration)
QV Unit	4110	0x100E	0x04	1	uint16	See 1.10 Unit Description	Unit of QV value (determined by the configuration function of each instrument)
QV Value Status	4111	0x100F	0x04	1	uint16		0-Parameter Exception 1-Parameter Normal

## 1.35 Get Factory Time

### 1.35.1 Function Description

Get the production date of devices. The register type is input register.

### 1.35.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Device manufacturing time - year	4112	0x1010	0x04	1	uint16		
Device manufacturing time - month	4113	0x1011	0x04	1	uint16		
Device manufacturing date - day	4114	0x1012	0x04	1	uint16		
Device manufacturing time - hour	4115	0x1013	0x04	1	uint16		
Device manufacturing time - minute	4116	0x1014	0x04	1	uint16		
Device factory time - seconds	4117	0x1015	0x04	1	uint16		

## 1.36 Get Lock PIN

## 1.36.1 Function Description

The register used is the input register.

## 1.36.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Parameter Lock PIN	4118	0x1016	0x04	1	uint16		The PIN is a 4-digit integer value

## 1.37 Get Device Information

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### 1.37.1 Function Description

Device information includes device type, device serial No., software version, device ID, etc. The register used is the input register.

### 1.37.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Device Type	4128	0x1020	0x04	1	uint16		0: Use 1: Level transmitter 2: Pressure transmitter 3: Flow transmitter
Serial No.	4129-4133	0x1021-0x1025	0x04	5	String		String data, represented in ASCII format, with a maximum length of 10 bytes and occupying up to 5 registers. Unused registers are padded with 0x0000. For example, the device serial number is: C98B12345
Software Version	4134-4137	0x1026-0x1029	0x04	4	String		The software version number format is Va.b.c build yy.mm.dd, occupying 4 register addresses. First register: High 8 bits represent a, low 8 bits represent b. Second register: Full 16 bits represent c. Third register: Full 16 bits represent yy. Fourth register: High 8 bits represent mm, low 8 bits represent dd. For example: V5.6.2 build 24082
Device ID	4138-4153	0x102A-0x1039	0x04	16	String		String data, represented in ASCII format, with a maximum length of 32 bytes, occupying up to 16 registers. Unused registers are padded with 0x0000. For example: Device tag is SENSOR_1234.

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Reserved	4154 - 4159	0x103A - 0x103F	0x04	6			

## 1.38 Get Device Model

### 1.38.1 Function Description

The register used is the input register.

### 1.38.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Device Model	4160-4223	0x1040-0x107F	0x04	64	String		String data in ASCII form, with a maximum length of 128 bytes and up to 32 registers occupied. Unused registers are padded with 0x0000. For example, the device model is HM-TD2B38T-4/T120230919CACH711686134.

## 1.39 Get General HART Information

### 1.39.1 Function Description

The register used is the input register.

### 1.39.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
HART version information	4224	0x1080	0x04	1	uint16		

## 1.40 Get Current Diagnosis Events

### 1.40.1 Function Description

The content of the diagnosis event is made up of the diagnosis status and code, which are stored in input register.

### 1.40.2 Function Point Table

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Event Number	4608	0x1200	0x04	1	uint16		Range: 0-32
The nth diagnosis code	4609-4640	0x1201-x01220	0x04	16	String		The high 4 bits represent the diagnosis status and the low 12 bits represent the diagnosis code. 0 indicates normal. For example: If the first diagnosis code is F123, the data to get is: 0x107B (1 represents diagnosis status F, and 0x07B represents diagnosis code 123). The diagnosis status is defined as follows: 0x1: F 0x2: S 0x3: M 0x4: C

Field Name	Register Address (Decimal)	Register Address (Hexadecimal)	Function Yards	Number of Registers	Data Type	Unit	Field Description
Device Highest Priority Status	4641	0x1221	0x04	1	uint16		The high 4 bits represent the diagnosis status and the low 12 bits represent the diagnosis code. 0 indicates normal. For example: If the first diagnosis code is F123, the data to get is: 0x107B (1 represents diagnosis status F, and 0x07B represents diagnosis code 123). The diagnosis status is defined as follows: 0x1: F 0x2: S 0x3: M 0x4: C
Reserved	4642-4655	0x1222-0x122F	0x04	14			

## 1.41 Get Flow Rate Measurement Information

### 1.41.1 Function Description

The register used is input register. The measurement value and unit of mass flow rate, volume flow rate, flow velocity, and totalizers are included.

### 1.41.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
Mass Flow Rate	4864-4867	0x1300-0x1303	0x04	4	int64		coefficient: 0.0001
Mass Flow Rate Unit	4868	0x1304	0x04	1	uint16		
Mass Flow Rate Getting Status	4869	0x1305	0x04	1	uint16		0: Invalid Value 1: Normal 2: Abnormal 3: Analog
Volume Flow Rate	4870-4873	0x1306-0x1309	0x04	4	int64		coefficient: 0.0001
Volume Flow Rate Unit	4874	0x130A	0x04	1	uint16		
Volume Flow Rate Getting Status	4875	0x130B	0x04	1	uint16		0: Invalid Value 1: Normal 2: Abnormal 3: Analog
Sound Velocity	4876-4879	0x130C-0x130F	0x04	4	int64		coefficient: 0.0001
Sound Velocity Unit	4880	0x1310	0x04	1	uint16		
Sound Velocity Getting Status	4881	0x1311	0x04	1	uint16		
Totalizer1	4882-4885	0x1312-0x1315	0x04	4	int64		coefficient: 0.0001
Totalizer1 Unit	4886	0x1316	0x04	1	uint16		
Totalizer1 Getting Status	4887	0x1317	0x04	1	uint16		0: Invalid Value 1: Normal 2: Abnormal 3: Analog
Totalizer2	4888-4891	0x1318-0x131B	0x04	4	int64		coefficient: 0.0001
Totalizer2 Unit	4892	0x131C	0x04	1	uint16		

Field name	Register address (decimal)	Register address (hexadecimal)	Function code	Number of registers	Data type	Unit	Field description
Totalizer2 Getting Status	4893	0x131D	0x04	1	uint16		0: Invalid Value 1: Normal 2: Abnormal 3: Analog
Totalizer3	4894-4897	0x131E-0x1321	0x04	4	int64		coefficient: 0.0001
Totalizer3 Unit	4898	0x1322	0x04	1	uint16		
Totalizer3 Getting Status	4899	0x1323	0x04	1	uint16		0: Invalid Value 1: Normal 2: Abnormal 3: Analog

## 1.42 Get Installation Information

### 1.42.1 Function Description

Refers to the recommended installation distance between the sensors. The register used is input register.

### 1.42.2 Function Point Table

Field name	Register address (decimal)	Register address (hexadecimal)	Function Yards	Number of registers	Data type	Unit	Field description
Recommended installation distance	4912-4913	0x1330-0x1331	0x04	2	float	mm	