

MULTIFUNCTION METER

— CAPTAIN —



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Timing



Mileage



Speed



RPM



Stroke



Voltage



Temperature






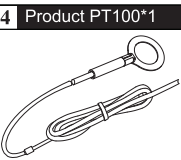
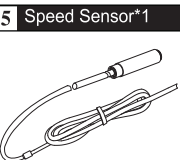
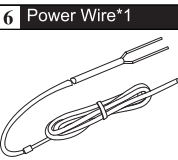
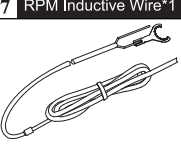
Notice

1. Please make sure to refer to the installation instructions in the Operating Instructions to avoid damage caused by installation errors.
2. The product included the battery inside and cannot be replaced, do not disassemble or replace the battery by yourself.
3. Do not pull the wiring when using it to prevent falling off or poor contact happened.
4. Please install the product in a proper location to avoid the possibility of this product being hit and prevent damage to the product.
5. The product is waterproof, but cannot be used in deep water or soaked in rain for a long time.
6. Please use the product at the specified temperature, high temperature environment may cause damage to the product.

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PRODUCT ACCESSORIES LIST

1	Product*1	2	User Manual*1	3	Paper Card*8
				 X8	
4	Product PT100*1	5	Speed Sensor*1	6	Power Wire*1
					
7	RPM Inductive Wire*1				
					

PRODUCT SPECIFICATION

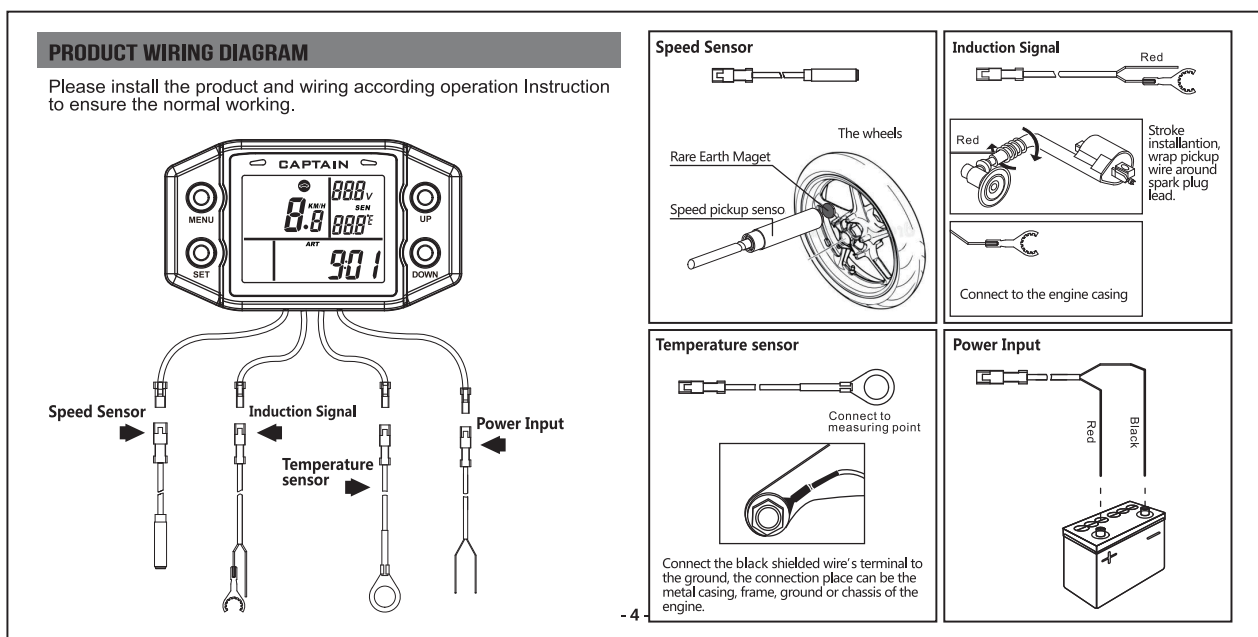


Speed display	000.8 KM/H	Battery Voltage display	8.8V
Maintenance information	SVC CHG OIL VALVE FILTER PLUG	Temperature display	88.8°C
Clock, Hours, Engine RPM, Distance	00:00:00 000000 000000		

FUNCTION	ICON	UNITS	RANGE
Current Speed	⊖	KM/H or M/H	0-350KM/H 0-217.5M/H
Average Speed	AVG ⊖	KM/H or M/H	0-350KM/H 0-217.5M/H
Maximum Speed	MAX ⊖	KM/H or M/H	0-350KM/H 0-217.5M/H
Alert Speed	⚠ ⊖	KM/H or M/H	0-300KM/H 0-186.5M/H

FUNCTION	ICON	UNITS	RANGE	FUNCTION	ICON	UNITS	RANGE
Wheel diameter		mm	100-2000	Clock	CLK	H:M:S	24H
Current RPM	RPM	rpm	0-20000	Air Temperature	AIR	C / F	-10 C → +70 C 14 F → +158 F
Maximum RPM	MAX RPM	rpm	0-20000	Engine Temperature	SEN	C / F	-20 C → +250 C -4 F → +482 F
Alert RPM	RPM H...	rpm	500-20000	Maximum Engine Temperature	SEN MAX	C / F	-20 C → +250 C -4 F → +482 F
Firing Patterns		/	1P1R 1P2R 2P1R 3P1R 3P2R 4P1R 5P2R 6P1R 8P1R	Alert Temperature	SEN Δ	C / F	-20 C → +250 C -4 F → +482 F
Total Mileage	ODO	KM/H or M/H	0-500000KM 0-310000M	Battery Voltage	/	V	6-60V
Trip Mileage	TRP DST	KM/H or M/H	0-500000KM 0-310000M	Maximum Battery Voltage	/	V	6-60V
Target Mileage	TARDST	KM/H or M/H	0-10000KM	Minimum Battery Voltage	/	V	6-60V
Service Alert Mileage	SVC DST	KM/H or M/H	0-10000KM	Change Oil Alert	CHG OIL	H:M	0-250H
Total Hours	ART	H:M:S	0-65000H	Change Plug Alert	CHG PLUG	H:M	0-250H
Job Hours	RT	H:M:S	0-65000H	Change Oil Filter Alert	CHG OIL FILTER	H:M	0-250H
				Change Valve Filter Alert	CHG VALVE FILTER	H:M	0-250H

※ The Air Temperature for reference only, it maybe existed deviation with actual value.



USER INTERFACE

All the information that captain is on one of these 3 screens. The user has the choice of staying on **Screen 1**, **Screen 2** or **Screen 3**. Press "**MEMU**", the 3 main interfaces could be switched freely.



- Screen 1
- Speed
 - Battery voltage
 - Engine Temperature
 - Total time (ART)



- Screen 2
- Speed
 - Battery voltage
 - Engine Temperature
 - Odometer (ODO)



- Screen 3
- Speed
 - Battery voltage
 - Engine Temperature
 - Engine RPM (RPM)

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USER OPERATION

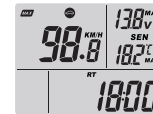
1 Screen 1 Operation

Screen 1:

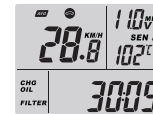
- Speed
- Battery voltage
- Engine Temperature
- Total time (ART)



Under the Screen 1 interface, press the "**UP**" or "**DOWN**" button can view more data information)



- max speed
- max battery voltage
- max engine temperature
- trip riding time



- average speed
- min battery voltage
- air temperature
- change oil filter time

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- alert speed
- min battery voltage
- air temperature
- change valve filter time



- Wheel diameter
- min battery voltage
- air temperature
- change spark plug time



- Wheel diameter
- min battery voltage
- air temperature
- change oil time



Back to Main Interface At Circle

- alert speed
- min battery voltage
- alert engine temperature
- change valve filter time

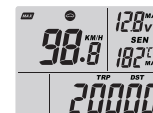
2 Screen 2 Operation

Screen 2:

- Speed
- Battery voltage
- Engine Temperature
- Odometer (ODO)



Under the Screen 2 interface, press the "**UP**" or "**DOWN**" button can view more data information)




- max speed
- max battery voltage
- max engine temperature
- trip distance




- average speed
- min battery voltage
- alert engine temperature
- target distance


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- alert speed
- min battery voltage
- air temperature
- service distance



- Wheel diameter
- min battery voltage
- air temperature
- service distance




Back to Main Interface At Circle


3 Screen 3 Operation

Screen 3:


- Speed
- Battery voltage
- Engine Temperature
- Engine RPM (RPM)



Under the Screen 3 interface, press the “UP” or “DOWN” button can view more data information)




- max speed
- max battery voltage
- max engine temperature
- engine max rpm




- average speed
- min battery voltage
- alert engine temperature
- alert RPM


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- alert speed
- min battery voltage
- air temperature
- Engine Firing Patterns



- Wheel diameter
- min battery voltage
- air temperature
- clock



Back to Main Interface At Circle

PRODUCT OPERATION

A.Product Startup and shutdown

- Press any button to arise when product is off
- Press and hold the “MENU” button for 2s to off at any interface.

B.Setup Mode


- Press the “MENU” button until display Screen 1 or Screen 2 or Screen 3.
- Setup at circle as following
 KM/H → Speed Alert → Temp Unit → Temp Alert → Clock-H → Clock-M → Clock-S →
 CHG OIL FILTER → CHG VALVE FILTER → CHG PLUG → CHG OIL → TAR DST →
 SVC DST → ALERT RPM → RPM FIRING PATTERNS → Wheel diameter → KM/H
- Press “SET” or “MENU” to switch the Setup.

C.Exit Setup

- Press “SET” + “DOWN” 1s to exit.
- Exit automatically 30s later.

1.Setup distance and speed units (Defaults:KM/H)

- Press and hold the “SET” button until screen display “SET” icon and “KM/H” icon start flashing.
- Press the “UP” or “DOWN” button until you get desired unit , release the button and finish your confirm.(Press the “SET” button can enter next setup)



- It will be back to main interface, if 30 seconds No operation on any brunch interfaces.
- It will be back to Stand-by(Clock) interface, if 5 minutes no operation on any main interfaces.

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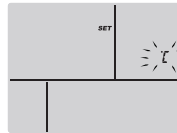
2. Setup alert speed value (Defaults: 50KM/H)

Press the "UP" or "DOWN" button until you get desired alert speed value , release the button and finish your confirm.(Press the "SET" button can enter next setup) .



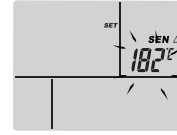
3. Setup Temperature units (Defaults: °C)

Press the "UP" or "DOWN" button until you get desired temperature unit , release the button and finish your confirm.(Press the "SET" button can enter next setup)



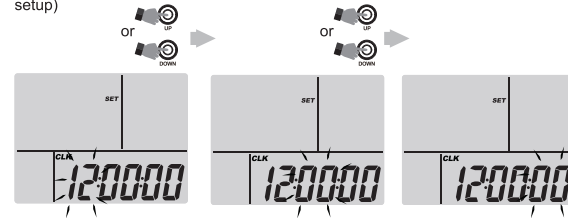
4. Setup Alert Temperature Value (Defaults: 100 C)

Press the "UP" or "DOWN" button until you get desired alert temperature value , release the button and finish your confirm.(Press the "SET" button can enter next setup)



5. Setup Clock -H:M:S (Defaults: 12:00:00)

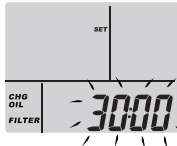
Press the "UP" or "DOWN" button until you get desired clock value , release the button and finish your confirm.(Press the "SET" button can enter next setup)



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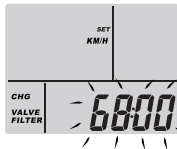
6. Setup Change Oil Filter Timer (Defaults: 50H)

Press the "UP" or "DOWN" button until you get the change oil filter alert desired hours , release the button and finish your confirm.(Press the "SET" button can enter next setup)



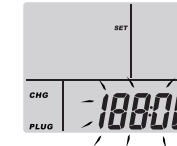
7. Setup Change Valve Filter Timer (Defaults: 20H)

Press the "UP" or "DOWN" button until you get the change valve filter alert desired hours , release the button and finish your confirm.(Press the "SET" button can enter next setup)



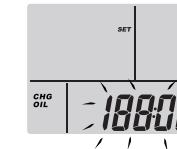
8. Setup Change Plug Timer (Defaults: 250H)

Press the "UP" or "DOWN" button until you get change spark plug alert desired hours , release the button and finish your confirm.(Press the "SET" button can enter next setup)



9. Setup Change OIL Timer (Defaults: 100H)

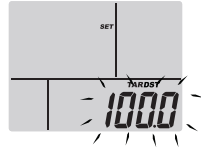
Press the "UP" or "DOWN" button until you get the change oil alert desired hours , release the button and finish your confirm.(Press the "SET" button can enter next setup)



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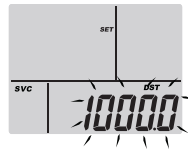
10. Setup target Distance (Defaults: 0KM)

Press the "UP" or "DOWN" button until you get desired target distance mileage value , release the button and finish your confirm.(Press the "SET" button can enter next setup)



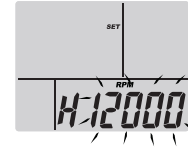
11. Setup Service Distance Alert (Defaults: 1000KM)

Press the "UP" or "DOWN" button until you get desired alert service distance value , release the button and finish your confirm.(Press the "SET" button can enter next setup)



12. Setup Engine RPM Alert (Defaults: 8000RPM)

Press the "UP" or "DOWN" button until you get desired alert rpm value , release the button and finish your confirm.(Press the "SET" button can enter next setup)



13. Setup Engine Firing Patterns (Defaults: 1P1R)

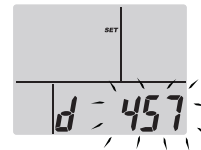
Press the "UP" or "DOWN" button until you get desired firing patterns value , release the button and finish your confirm.(Press the "SET" button can enter next setup)



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14. Setup Wheel Diameter (Defaults: 457MM)

Press the "UP" or "DOWN" button until you get wheel diameter value , release the button and finish your confirm.(Press the "SET" button can enter next setup)



C.Reset

1.Get into reset

- Press and hold the "SET" button for 2s to into reset at any sub-interface.
- Product defaulted get into the Max Speed Reset Interface, the current reset value start flashing.

2.Reset Operation

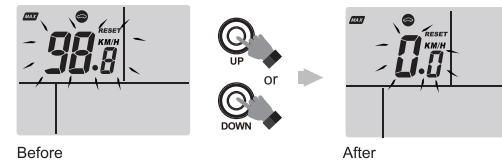
- Press button "UP/DOWN", reset the value of the current interface.
- Press button "MENU/SET" to switch to the next desired value.

3.Reset exit

- Press and hold buttons "SET" + "DOWN" for 1s to exit the reset interface.
- It will exit without no operation within 30s.

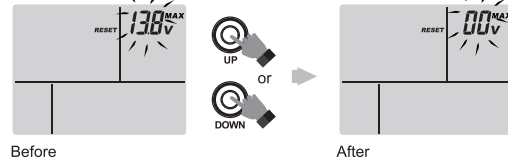
4.Reset Interface demo

- Reset the Max Speed Value
- It will exit without no operation within 30s.



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b) Reset the Max Voltage Value

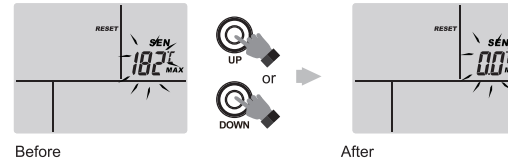


Before

After

Press **UP/DOWN** to reset

d) Reset the Max Temp of Sensor Value

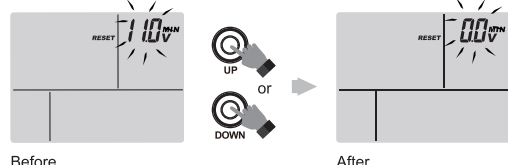


Before

After

Press **UP/DOWN** to reset

c) Reset the Min Voltage value

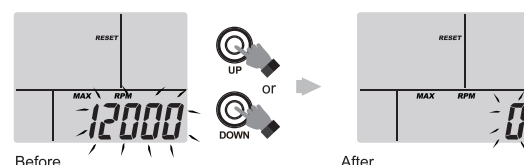


Before

After

Press **UP/DOWN** to reset

e) Reset the Max RPM Value

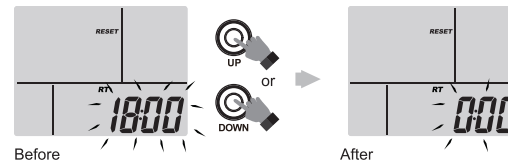


Before

After

Press **UP/DOWN** to reset

f) Reset Job Hours Value

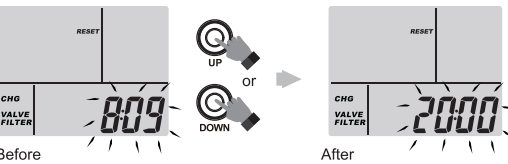


Before

After

Press **UP/DOWN** to reset

h) Reset the Air Filter Change Timing Value

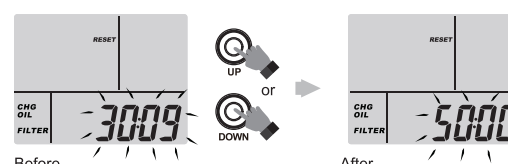


Before

After

Press **UP/DOWN** to reset

g) Reset the Oil Filter change timing Value

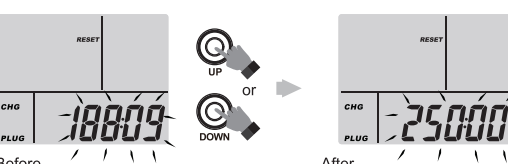


Before

After

Press **UP/DOWN** to reset

i) Reset the Spark Plug Change Timing Value

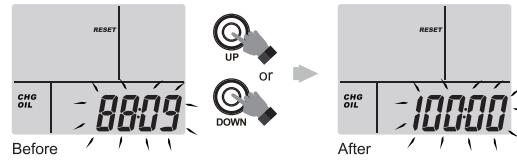


Before

After

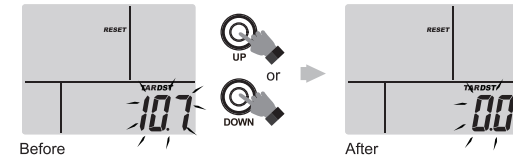
Press **UP/DOWN** to reset

j) Reset Oil Change Timing Value



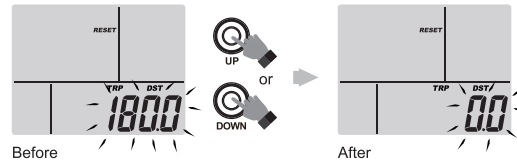
Press **UP/DOWN** to reset

l) Reset Target Distance Value



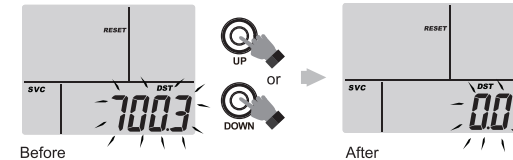
Press **UP/DOWN** to reset

k) Rest Trip Distance Value



Press **UP/DOWN** to reset

m) Reset Service Distance Value



Press **UP/DOWN** to reset

C. Timing up function (competition or used to measure a certain time period, range 0:00:00-99:59:99)

1. Press button "**SET**" to into timing up function, press button "**MENU**" to back main interface.
2. Press button "**UP**" to start timing, press button "**DOWN**" to stopping timing, press button "**SET**" to clear the current timing value.
3. Working interfaces as following



PHYSICAL FEATURES

A. Maintenance Reminder

NO	TYPES OF MAINTENANCE REMINDER	SETTING RANGE	LCD REMINDER METHOD	LED REMINDER METHOD
1	Change Oil Filter	0-250H	CHG OIL FILTER	Yellow Flashes
2	Change Air Filter	0-250H	CHG VALVE FILTER	Yellow Flashes
3	Change Spark Plug	0-250H	CHG PULG	Yellow Flashes
4	Change Oil	0-250H	CHG OIL	Yellow Flashes
5	SVC	0-10000KM	SVC DST	Yellow Flashes

B.Alert Reminder

NO	TYPES OF ALERT	SETTING RANGE	LCD REMINDER METHOD	LED REMINDER METHOD
1	Over Speed Reminder	0-300KM/H	Alert Icon Flashes	Red Flashes
2	Over Temp of Sensor Reminder	-20-250 °C	Alert Icon Flashes	Red Flashes
3	Engine RPM reminder	0-20000RPM	H Flashes	Red Flashes
4	Recharging Reminder	Non	Low Battery Icon Flashes	Red Flashes

Notice:

1. When reach to the alert value, red flashing at twice every 5s, and LCD display the current reminder content.
2. When happen Multiple reminders at the same time, display alternately.
3. Long press button "SET" for 1s to clear the reminder.

C.Engine Type & RPM Mode Setting

FIRING PATTERNS	SPARK & REVOLUTION	ENGINE TYPE(STROKE AND CYLINDER)
1P1R	1 spark per revolution	4 stroke 2 Cylinder
		2 stroke 1Cylinder
1P2R	1 spark 2 revolution	4 stroke 1 Cylinder
2P1R	2 spark per revolution	4 stroke 4Cylinder
		2 stroke 2Cylinder
3P1R	3 spark per revolution	4 stroke 6 Cylinder
		2 stroke 3Cylinder
4P1R	4 spark per revolution	4stroke 8cylinder
6P1R	6 spark per revolution	4stroke 12cylinder
8P1R	8 spark per revolution	4stroke 16cylinder
3P2R	3 spark 2 revolution	4stroke 3cylinder
5P2R	5 spark 2 revolution	4stroke 5cylinder

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SPECIFICATION & PARAMETER

Product Name	Multifunctional Meter	Housing Materials	ABS	Job hours	0-65000H	Display Resolution of Job hours	1MIN/0.1H
Item No	RL-HM400	Display Panel Materials	Transparent Acrylic	Change Oil Filter Reminder	0-250H	Display Resolution of Oil Filter Timing	1MIN
Product Size	118X68X22mm	Package	Colorful Box	Change Air Filter Reminde	0-250H	Display Resolution of Air Filter Reminder	1MIN
Display Screen	LCD	Visible Windows Size	57mmX42mm	Change Spark plug Reminder	0-250H	Display Resolution of Spark plug changing Reminder	1MIN
Backlight Color	White	Product weighte	315g	Change Oil Reminder	0-250H	Display Resolution of Oil Changing Reminder	1MIN
Button Type	Tact Switch	Waterproof Class	IP67	Timing Error	24H < 10S	Clock Error	24H < ±1S
Internal Battery	4.2V-500mAh Lithium Battery	Recharging Current	< 150mA	Clock mode	24H-Mode	Stopwatch Range	99H:59M:59S:99MS
External Power Range	DC6-60V	Length Of Wire	About 100mm	RPM Measurement Range	0-20000RPM	RPM display Resolution	10RPM
Total hours	0-65000H	Display Resolution of Total hours	1MIN/0.1H	Alert RPM Setting Range	500-2000RPM	RPM Refresh Rate	0.5S

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SPECIFICATION & PARAMETER

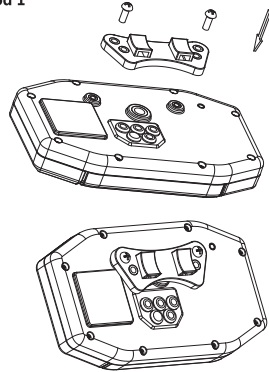
Stroke Types	1P1R 1P2R 2P1R 3P1R 3P2R 4P1R 5P2R 6P1R 8P1R		
Speed Measurement Range	0-350KM/H 0-217.5M/H	Alert Speed Setting Range	0-300KM/H 0-186.4M/H
Unit of Speed, Mileage	KM/H(KM) M/H(M)	Speed Display Resolution	0.1KM/H 0.1M/H
Speed Measurement Error	< ±5%	Speed Refresh Rate	1-2S
Total Mileage	0-500000KM 0-310000M	Trip Mileage	0-500000KM 0-310000M
Target Mileage	0-10000KM(M)	Service Mileage	0-10000KM(M)
Distance Display Resolution	0.1KM(M)	Distance Measurement Error	< ±5%
Voltage Measurement Range	6-60V	Voltage Measurement Error	< ±0.8%
Voltage Display Resolution	0.1V	Voltage Refresh Rate	1S

Temperature Measurement Range	-20°C— +250°C -4°F— +482°F	Alert Temperature Setting Range	-20°C— +250°C -4°F— +482°F
Temperature Measurement Error	< ±1.5°C	Temperature Display Resolution	0.1/1
Air Temperature Measurement Range	-10°C— +60°C +14°F— +140°F	Temperature of Environment Measurement Error	< ±2°C
Inductive Wire	UL2464-24WAG -2C—1.5M	Temp Sensor Inductive Wire	FEP-26AWG-2C—1.5M
Power Wire	UL2464-24WAG -2C—1.5M	Speed Sensor Inductive Wire	UL2464-24WAG -3C—1.5M
Temperature Sensor	PT100	Speed Sensor	Hall Switch +NdFeB Magnet

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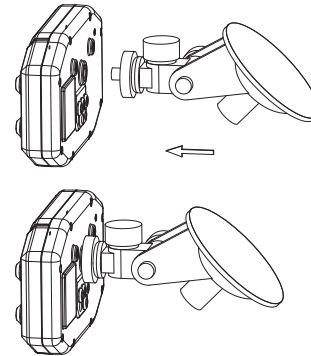
PRODUCT INSTALLATION

Installation Method 1



Suitable for motorcycle Install on metal handle

Installation Method 2



Suction cup mount Suitable for internal of closed car

※ Mounting bracket and suction cup mounting bracket need to be purchased separately and are not included in this product.

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PRODUCT DIMENSION

