

电动自行车 传感器和附件



ACCESSORY
& SENSOR
FOR EBIKE

CATALOGUE

产品目录

2018



DO BEST MAKE SPECIAL

苏州明盛电子有限公司

www.minshine.cn

刹车传感器 Brake Sensor



BK-1F / BK-1R

● 描述 Description

This is an in-line brake sensor patented by Minshine, brake cable go through the sensor, the brake signal come out from sensor immediately when the brake cable moving, system can cut-off the power after got this signal.

The main features of this sensor is small size, stable and reliable working, also can be easily fixed at any position of brake cable.

这是一款具有专利技术的新颖隐藏式电动车刹车断电保护传感器，具有性能稳定可靠，体积小，易于安装等特点，产品在欧洲市场一直处于热销状态；



● 技术参数 Specification

型号 Model	: BK-1R/1F
电源 Power	: 5V/2mA
信号 Signal	: Active 0V : InActive 5V
材料 Housing Material	: Intensive ABS
尺寸 Size(mm)	: 36x16x12
重量 Net Weight(g)	: 6.8

● 接口 Interface

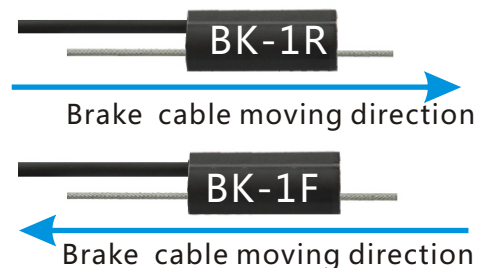
接头 Connector	: SM3 or Other
红 Red	: VCC
黑 Black	: GND
白 White	: Signal
指示灯 Indicator	: Active : Red Light InActive : Light off

● 安装 Install Guide



● 如何区分 BK-1F/1R How to distinguish Model BK-1F and BK-1R

Its mostly depend on the position want to fix and the direction of the brake cable moving; (figure below) 主要根据刹车线的运动方向和安装位置



● 包装清单 Pack List

- 传感器 Sensor x1
- 附件 Cable housing x1
- 默认线长 100cm

● 订货需知 Order

Items below must be declared clearly before order. 以下信息必须在订单中写明

- 型号数量 Model & Quantity
- 接头类型 Connector type
- 信号位序 Sequence of 3 pins
- 线长 Cable length
- 其它 Other special requirements

刹车传感器 Brake Sensor



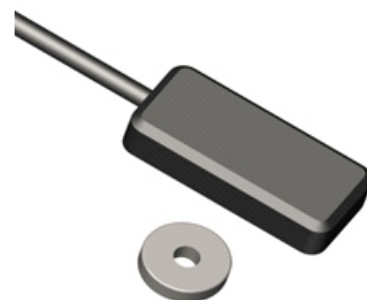
液压刹车专用 BK-2R

● 描述 Description

How to check Hydraulic brake level active or disactive is a big issues on ebike ,Now ,this trouble was complete solved after BK-2R launched.

This sensor combined with 2 parts one is sensor body and others is a small magnet , size is very small so only need to stick both of them on the brake level, then , it can check the brake active and disactive and a switch signal will be output.

液压刹车检测一直是电动自行车的难点，本公司推出的本款产品，完美的解决了该问题，体积小，性能稳定，直接使用SM胶水粘贴在刹车把上，当刹车动作时，输出开关量。



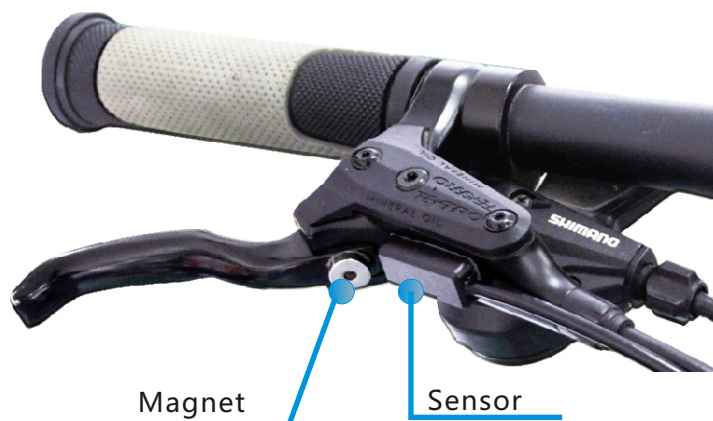
● 技术参数 Specification

型号 Model	: BK-2R
信号 Signal	: Active : switch off : InActive: switch on
材料 Housing material	: Intensive ABS
尺寸 Sensor Size(mm)	: 26x11.5x6
磁钢 Magnet Size(mm)	: $\Phi 10 \times 3$
重量 Net Weight(g)	: 4

● 接口 Interface

接头 Connector : SM2 or Other

● 安装 Install Guide



● 包装 Pack List

传感器 Sensor x1
磁钢 Magnet x1
3M背胶 3M Gummed tape x2
默认线长 100cm

● 订货 Order

Items below must be declared clearly before order..以下信息必须在订单中注明
--信号数量 Model & Quantity
--接头类型 Connector type
--线长 Cable length
--其它 Other special requirements

刹车传感器 Brake Sensor



嵌入式刹车传感器 BK=ES

● 描述 Description

This is new in-line brake sensor, the main features is ,it has a gap on the sensor therefor brake cable can be easily put inside the sensor , the brake signal come out from sensor when brake cable moving .

一种新型嵌入式检测传感器，刹车线可以嵌入传感器体，传感器可以检测刹车的动作，并输出开关量。



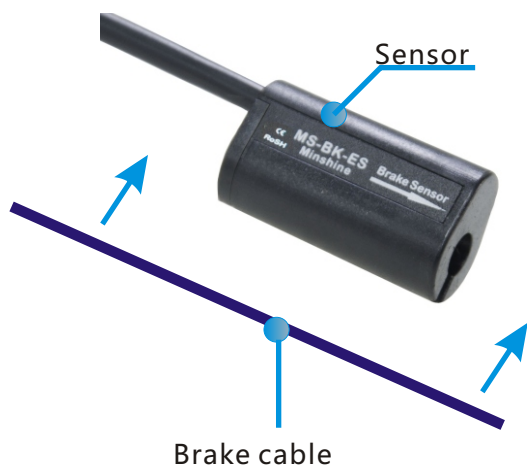
● 技术参数 Specification

型号 Model	: BK-ES
信号 Signal	: Active: switch off : InActive: switch on
材料 Housing material	: Intensive ABS
尺寸 Size(mm)	: 29x16x12
重量 Net Weight(g)	: 4.6

● 接口 Interface

接头 Connector : SM2 or Others

● 安装 Install Guide



● 包装 Pack List

传感器 Sensor x1
默认线长 100cm

● 订货 Order

Items below must be declared clearly before order. 以下信息必须在订单中写明
--信号数量 Model & Quantity
--接头类型 Connector type
--线长 Cable length
--其它 Other special requirements

● 描述Description



This is a newest high precision PAS sensor, smaller size it can be easily fixed on bottom brackets of bike. 24 signals output per circle, automatic direction detection, control system can make the electric-bike running more smooth according to these high precision signals.

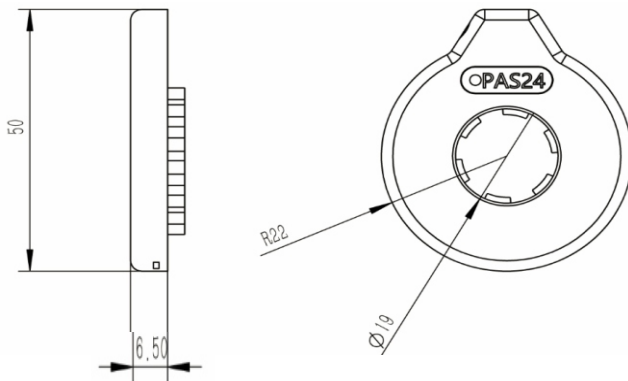
这是一款最新型的踏脚传感器 (PAS), 该传感器可以方便地安装在自行车的中轴上, 一圈输出24个脉冲信号, 正反转自动判别, 反转停止输出信号, 指示灯具有常亮、闪烁、熄灭三种状态, 分别代表等待、正转、反转;

● 技术参数Specification

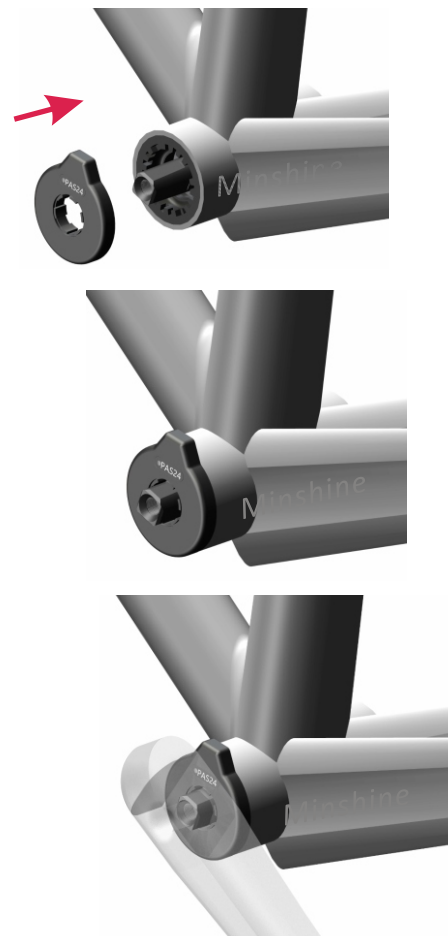
型号Model : PAS24
电源Power : 5V/2mA
信号Signal : Forward-24Pules Per Circle
 : Reverse -None
材料Material: Intensive ABS
重量Wegiht(g): 7.8

● 接口Interface

接头Connector : SM3 or Others
红Red : VCC
黑Black : GND
白White : Signal
指示灯Indicator:
停止Standby : Red Light
正转Forward : Red Blink
反转Reverse : Light off



● 安装Install Guide



● 包装Pack List

传感器Sensor x1

● 订货Order

Items below must be declared clearly before order. 以下信息必须在订单中注明

- 型号数量Model & Quantity
- 接头类型Connector type
- 信号位序Sequence of 3 pins
- 线长Cable length
- 其它Other special requirements



● 描述Description

This is a speed sensor for bike ,well design , smaller size ,easily install; electric pules come out from sensor and indicator on sensor will blink while wheel rotating ,bike control system measure the bike speed accruately according to this signal .

一款新型的带有状态指示灯的自行车速度传感器，具有体积小，外形美观，安装方便等特点。

● 技术参数Specification

型号Model	: SPS-1
电源Power	: 5V
信号Signal	: Pules
材料Housing material	: Intensive ABS
尺寸Sensor Size(mm)	: 38.5x14x15.5
磁钢材料Magnetic body	: Copper
重量Net Wegiht(g)	:12.8

● 接口Interface

连接器Connector : SM3 orOther

红Red : VCC

黑Black : GND

白White : Signal

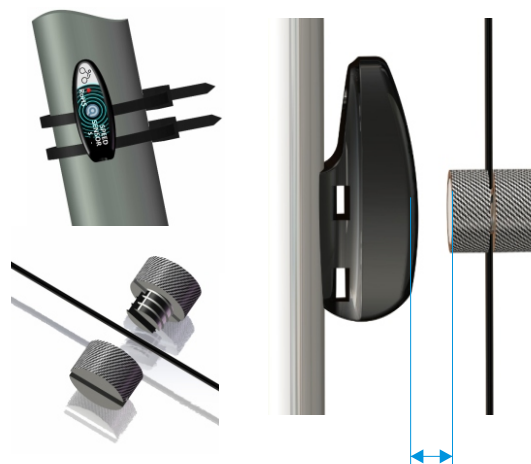
指示灯Indicator:

等待Standby: Red Light

正转Forward: Long Red Blink

反转Reverse: Short Red Blink

● 安装Install Guide



Note: The max gap between sensor and Magnet is 10mm

● 包装Pack List

- 传感器Sensor x1
- 磁钢Magnet x1
- 扎带Strapping tape x2

● 订货Order

Items below must be declared clearly before order.以下信息必须在订单中注明

--型号数量Model & Quantity

--接头类型Connector type

--信号位序Sequence of 3 pins

--线长Cable length

--其它Other special requirements

换挡检测传感器

高灵敏度

SS-01/SS-02



● Description

Chain or gear will be broken easily at Mid-motor drive system if system can not cut power on time during gear-changing process .

Newest In-Line Shift sensor can solve that problem properly, this sensor can be fixed on derailleur cable ,a signal will transfer to system from sensor at gear-changing process , control system cut-off the power according to this signal , the main feature is smaller size ,easily to fix, high sensitivity.

在中置电机实际应用中，非常容易导致链条断裂和大齿盘损坏，本传感器的退出，可以完美解决此问题，当换挡时，传感器将信号传输到控制系统，控制根据此信号，降低或切断电机输出，保护链条和大齿盘免受损坏。



● 技术参数Specification

型号Mode	: SS-01/SS-02
电源Power	: 5V/1mA
信号Signal	: Pulse (See Reference)
短路保护Protection	: Short Circuit & Polarity Reversed Protection
材料Housing Material	Intensive ABS
尺寸Size(mm)	: 47 x 18 x 12
重量Weight(g)	: 6.4

● 接口Interface

连接器Connector	: SM3 or other
红Red	: VCC
黑Black	: GND
白White	: Signal
指示灯Indicator:	
等待Standby	: Green or Blue Flash
动作Action	: Red light

● 安装Install Guide



● 包装Pack List

Sensor x1
Cable Housing x1

● 订货Order

Functions between SS-01 with SS-02 is same only inner structure is different ; SS-01 for local market and SS-02 for Europe market only; SS-01 with SS-02功能是一样的，SS-02主要针对欧洲市场

Items below must be declared clearly before order.以下信息必须在订单中注明

- 型号数量Model & Quantity
- 接头类型Connector type
- 信号模式 (见参考)
- 信号位序Sequence of 3 pins
- 线长Cable length
- 其它Other special requirements

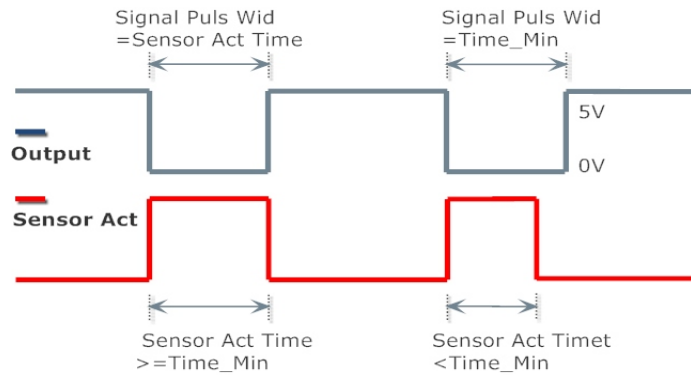
● 参考Reference

There have 3 main modes for choice to meet your special requirements for different Mid-motor drive system, each mode is effective for all kinds of Mid-motor system, the difference between each mode is the pulse width and delay time, these differences will bring little different feedback when gear-changing. We can provide customization if still outof mode range.

传感器具有三种模式,每种模式均可适用于所有中置电机,均能有效检测换挡信号,只是脉冲宽度和延时参数有些区别,而这些参数的不同,可以为系统带来的不同换挡感觉和舒适性.

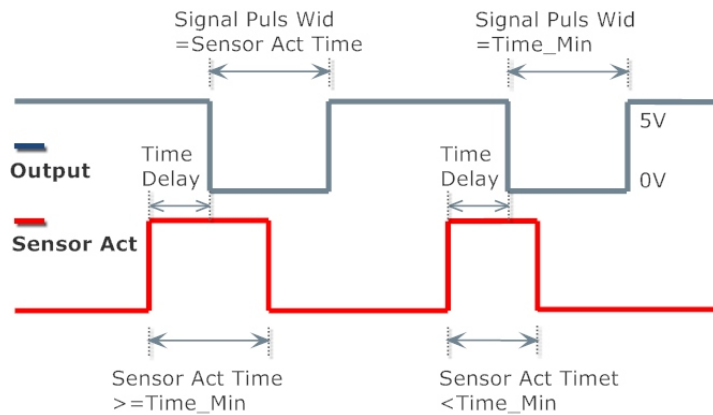
● MODE-1

Time_Min=0.2s



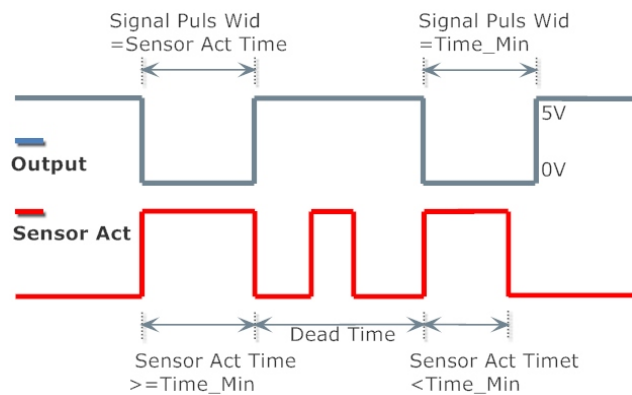
● MODE-2

Time_Min=0.5s
Time_Delay=0.1s



● MODE-3

Time_Min=0.1s
Dead Time=0.5s



USB 手机充电模块



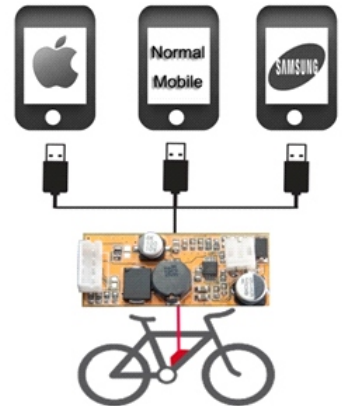
内置电池式 MCXX

● 描述Description

This is a high-performance USB charger which built-in battery of ebike ,Automatically identify different mobile charger interface include Apple , quick charging with 1-1.5a continue current ;

Wide input voltage ,multiple protection measures is valid include Reverse connection protection ,Over-Current protection ,Short-Circuit protection ;

一款高性能的内置电池实USB手机充电模块，自动手机识别，可适用于对所有手机的充电包括苹果手机。宽输入电压范围，反接保护，过流保护，过温保护

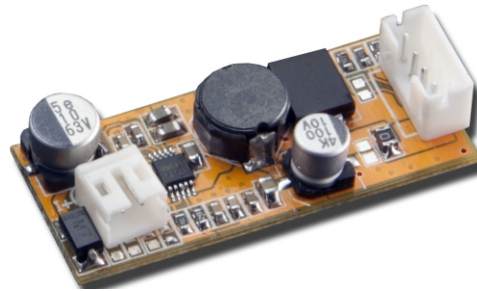
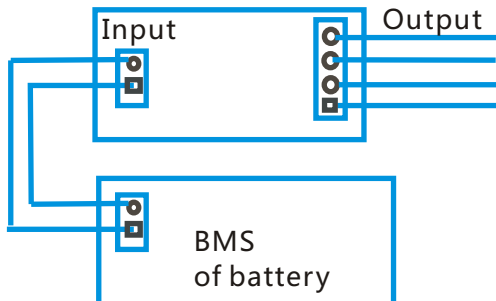


● 技术参数Specification

型号Model : MC01B
输入电压Input: : 7-60VDC
输出电压Output : 5VDC±0.25
最大电流Max Current : 1500mA
内阻Resistance : < 0.2Ω

转换效率Efficiency : > 92%
工作温度Temperature : -20°C+60°C
极限温度Over heating : 150°C
尺寸Size : 39mm * 16mm * 8mm

● 接线图Diagram



● 订货Order

This is a mobile charger module which built-in battery case make sure there have enough space in battery case to fit this module ,and BMS also need to keep a battery power output connector for connecting this module.

Customization is valid ,contact us first if some special requirements you may have before order.

定货前,需要确认电池壳内具有安装空间,并且 BMS 模块要保留电源输入接插件,本产品提供定制服务,特殊需求请和我们的工程师联系确认

● 包装Pack List

模块Charger module x1
输入线2pins cable(10cm) x1
输出线4pins cable(10cm) x1

● 描述Description

This is a high-performance USB charger which built-in battery of ebike , Automatically identify different mobile charger interface include Apple , quick charging with 1-1.5a continue current.

Wide input voltage ,multiple protection measures is valid include Reverse connection protection ,Over-Current protection ,Short-Circuit protection .

一款高性能的外置电池实USB手机充电模块，自动手机识别，可适用于对所有手机的充电包括苹果手机。宽输入电压范围，反接保护，过流保护，过温保护。可方便的接入电池充电口或控制器电源输出接头。



● 技术参数Specification

型号Model : MC02C/B
输入电压Input: : 7-60VDC
输出电压Output : 5VDC±0.25
最大电流Max Current : 1500mA
内阻Resistance : < 0.2Ω

转换效率Efficiency : > 92%
工作温度Temperature : -20°C+60°C
极限温度Over heating : 150°C
尺寸Size : 44mm * 21mm *10mm



(MC02C 接控制器)



(MC02B接电池充电口)

● 包装Pack List

模块Charger module x1

● 订货Order

Items below must be declared clearly before order以下信息必须在订单中注明.

- 型号数量Model & Quantity
- 输入线长度Input Connector type
- 输入接头类型和位序Sequence of 2 pins of input
- 输入线长度InputCable length
- USB线长度USB Cable length
- 其它Other special requirements

DC-DC转换器

MSDC 系列转换器

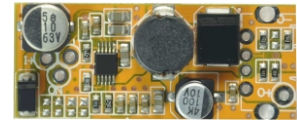


● 描述Description

Usually, battery voltage on ebike is 24/36/48V, but some electric applications like LED light or others need 5v or 6v supplier power, This converter is a good solution for it. it can convert source voltage(7-60v) to 5v or 6v or others special output voltage.

The main features of this converter is small and exquisite, wide source entering, high conversion efficiency; Reverse connection protection, Over-Current protection, Short-Circuit protection.

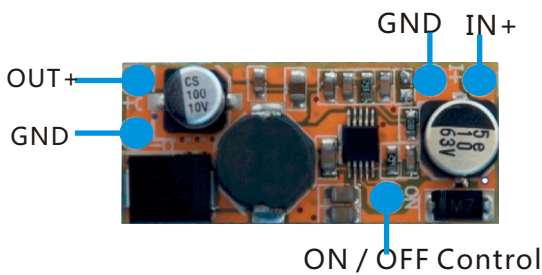
本模块是一个DC-DC转换模块，可以将电池电压转换成5/6/12V或其它电压，为电动车的其它电子部件提供稳定工作电源。宽输入电压范围，反接保护，过流保护，过温保护。



● 技术参数Specification

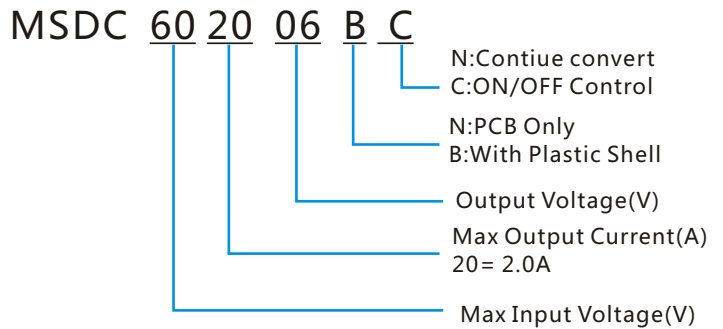
型号Model	: MDCxxxxx	转换效率Efficiency	: > 92%
输入电压Input:	: 7-60VDC	工作温度Temperature	: -20°C + 60°C
输出电压Output	: 5VDC±0.25	极限温度Over heating	: 150°C
最大电流Max Current	: 1500mA	尺寸Size	: 32mm * 15mm * 7mm
内阻Resistance	: < 0.2Ω		44mm * 21mm * 10mm(With shell)

● 接线Diagram



● 订货Order

Model define table:型号定义



Notice:

Read instructions carefully informations below is must be declared clearly before order.

- 输入电压Input voltage
- 输出电压Output voltage
- 最大电流Max output current
- 控制On/off control mode wanted or not
- PCB或带壳Need a Shell or PCB only
- 其它Other special requirements

● 包装Pack List

转换模块DC Converter x1