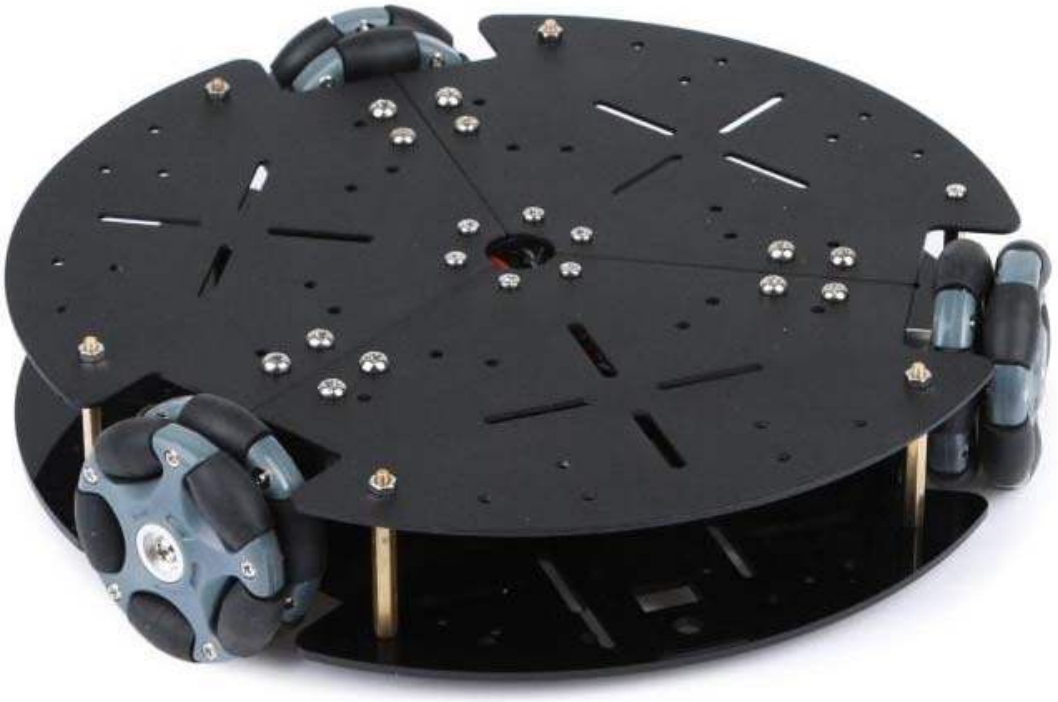


58mm Omnidirectional Wheel Chassis Smart Car Chassis Kit

SKU 110090268

The three-wheel drive omnidirectional wheel platform uses omnidirectional wheel technology for omnidirectional motion. Includes vertical and lateral movements. The main part of the car consists of three motors and three omnidirectional wheels. The motor adopts photoelectrically encoded DC geared motor with high precision. A two-layer triangular platform that frees up the number of layers to provide more space, such as controllers, sensors, cameras, and other electronic devices. Suitable for users DIY, very good Omni omnidirectional wheeled car learning chassis! It is also suitable for the development and application of robots in businesses and schools.

Through this omnidirectional wheel platform, you can design and make indoor mobile robots, you can use ROS robot operating system to learn, use motor encoder for positional closed loop, use high-precision gyroscope and laser radar or camera, realize robot by SLAM algorithm. Autonomous navigation. You can use the development board such as Jetson Nano, Raspberry Pi4, Coral Dev Board to develop, come on, and start designing your own robot!

GA25-371
1:74.8

The Motor parameters:

Encoders Magnetic Series

Magnetic Encoders

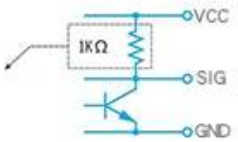
Two Channel Optical Encoder

Two Channel Encoder Connections
1.Black:-Motor
2.Red :+Motor
3.Green:Hall Sensor GND
4.Blue :Hall Sensor VCC
5.Yellow:Hall Sensor A OUT
6.White:Hall Sensor B OUT

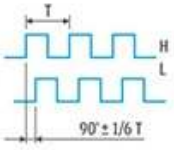
Electrical Characteristics

Characteristics	Symbol	Test conditions	Min.	Ref.	Max.	Units
Supply voltage	Vcc	- -	2.7	-	5.5	V
Output saturation voltage	Vce (sat)	Vcc = 14V ; IC = 20mA	-	300	700	mV
Output leakage current	Icex	Vcc = 14V ; Vcc = 14V	-	< 0.1	10	μA
Supply current	Ice	Vcc = 20V Output open	-	5	10	mA
Output rise time	tr	Vcc = 14V ; RL = 820 Ω ; CL = 20pF	-	0.3	1.5	μS
Output fall time	tr	Vcc = 14V ; RL = 820 Ω ; CL = 20pF	-	0.3	1.5	μS

Output circuit



Output wave



- 20%~85%RH
  Operating relative humidity
- -10°C~+60°C
  Operating temperature range

Part List

- 1 x Chassis (metal)
- 1 x Chassis (acrylic)
- 3 x DC motor
- 3 x Omnidirectional wheel (metal)
- 3 x Motor mounting bracket (metal)
- 3 x 4MM coupling
- 1 x Screw and nut kit

ECCN/HTS

ECCN	ERA99
HSCODE	9023009000
USHSCODE	90230000
UPC	