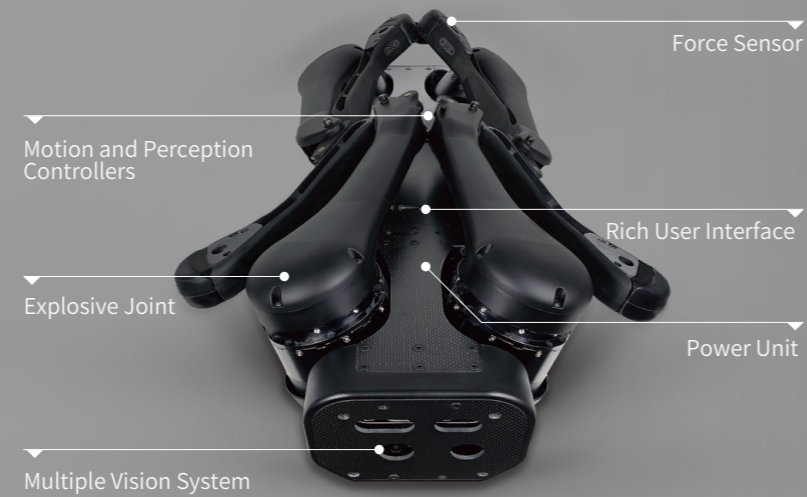


AlienGo



Product Introduction



Innovation

Compared with traditional inspection robots (wheel-type and crawler-type), quadruped robots have discrete footholds and can adapt to different terrains, such as stairs, steps, slopes, mountains, etc.



Practical

It can be equipped with various instrument and testing equipment such as GPS, robotic arm, lidar, etc., to complete a series of tasks (such as smart construction, exploration, search and rescue, security inspection, etc.).



Environment

Lithium ion battery-powered, can be used circularly; fuselage is composed with polymer plastic, carbon fiber and other aerospace aluminum these environmentally friendly materials.



Craft

The newly designed power system is more lightweight and integrated, the joint cables are built-in, and the joint is integrated with overload protection, which improves the life of the reducer and enables the reducer to withstand severe impact loads.



AlienGo Technical Parameters

FUNCTION	PARAMETER
Machine Weight (with Battery)	19±1kg
W×H×D(Stand)	0.65*0.31*0.6m/ 2.1*1.0*2.0ft
W×H×D(Folded)	0.60*0.31*0.15m/ 2.0*1.0*0.5ft
Load Capacity	13kg
Maximum Walking Speed	>1.8m/s
Slopes Ladder Height	≥ 25° 18cm
Operating Time	2.5-4.5h
Battery Capacity	12600mAh
Total DOF	12
Protected Mode	Emergency stop, fall protection
Alarm System	Voltage, temperature, circuit, charging alarm
All Motor Cables Built-in	Support
Excessive Torque Protection	Support
Reducer Wear Protection	Support
HD Video Real-time Transmission	Support
Power Outputs	5V, 12V, 19V, BAT (24V~30V)
Abundant External Interface	FE×2, HDMI×2, USB 3.0×2, RS 485×1
Encoder for Each Joint	Motor Encoder × 1, Output Encoder × 1
Perception module	Depth camera(2 unit), visual odometer camera(1 unit). as standard
	Lidar: single line or multi-line. as optional
No. of Foot Force Sensors	4 (Can greatly reduce the difficulty of developing and writing landing detection programs)
RTOS	Motion control: Ubuntu (real-time) Environmental awareness: Ubuntu-ROS
Have and support developmental sports functions	1.Walk, jump and run; 2.Go up and down steps, slopes and stairs; 3.Recover from a fall; 4.Support the development of walking and running gait and other high-performance .

Intelligent Perception System



Depth Camera	Global shutter and wide field of view.
	The minimum sensing depth is about 0.11m.
	Resolution depth output up to 1280 x 720 .
Visual Odometer Camera	Highly optimized V-SLAM, loop offset is less than 1%.
	The delay between posture action and action reflex is less than 6 milliseconds.
	Fisheye lens imager, hemispherical 163±5° field of view, stable tracking target.

Manufacturer of Excellent Motion Performance Robots

Unitree Robotics is a well-known start-up company in the world of robotics, an outstanding pioneer in the marketization of global high-performance quadruped robots, fully committed to promoting mobile robots to truly enter people's lives.