Open Platform · High-Performance Computing

Most Powerful Brain

Abundant computing power, open-source and open architecture—**powered by NVIDIA Jetson Orin AGX 64GB, delivering up to 275 TOPS.**



Developer Friendly

Fully supports open-source frameworks such as **ROS 2**, providing a complete **SDK** and **secondary development APIs**. An ideal experimental platform for universities and research institutions conducting R&D on humanoid robot algorithms, deep learning, and motion control—making innovation accessible.

Folding Design · Multimodal Interaction

Dual-state Switching

Features a folding design. **1720 mm** tall when fully extended, with an imposing presence; folds down to a minimum height of **790 mm**, suitable for elevator transport and storage in tight spaces.

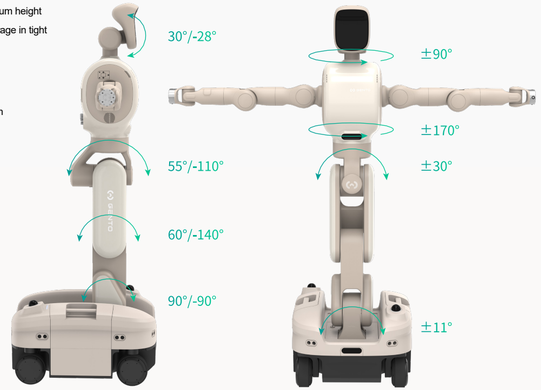
Emotional Interaction

A unique expressive lighting system combined with visual recognition makes it not only intelligent, but also warmer and more approachable during tasks such as reception, greeting, and guided tours.



Expression Lighting System & Visual Recognition

Range of Motion



Safety & Stability · Autonomous Navigation

Platform Safety

Active anti-tipping with real-time calculation of the robot's stability margin—maintaining balance through motion constraints and posture adjustments.

Sustained Power

Equipped with a **48 V 34.4 Ah LiFePO₄** battery pack, supporting **4–8 hours** of continuous operation.Supports **three charging modes: manual charging, automatic charging, and quick battery swap.**

Precise Navigation

Fusion navigation integrating **3D LiDAR** and **ultrasonic radar**, enabling **centimeter-level precision maps**. Capable of real-time obstacle avoidance and autonomous path planning—ready for demanding tasks such as production-line inspection and equipment maintenance.

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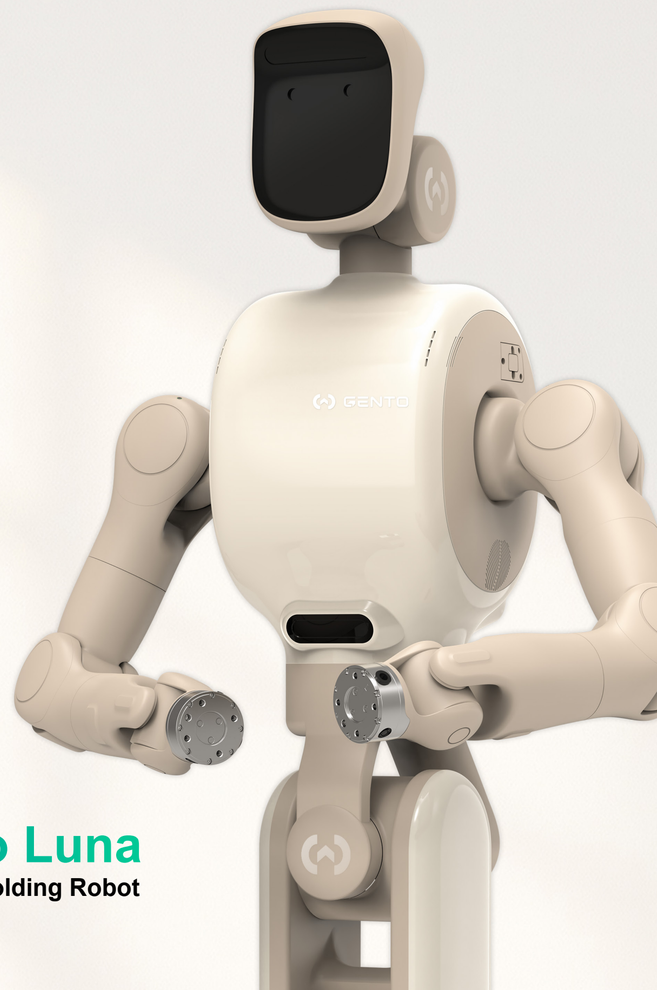
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GENTO



Gento Luna

Wheeled Folding Robot

Gento Luna

Wheeled Folding Robot

Mechanical Arm Parameters	
Model	**Standard Dual-Arm M6S Lite / Extended Dual-Arm M6S Lite**
Degree of Freedom	7 DoF *2
Force Control	Standard joint-level force control
Rated Load (Single Arm)	5 Kg / 4 Kg / 3 Kg
Working Radius (Axis J2 to End Flange)	615mm / 680mm / 750mm
TCP Maximum Speed	1.5m/s
Repeatability	±0.03 mm / ±0.04 mm / ±0.04 mm
Force Repeatability	⩽0.15N
Range of Motion	J1:±173°, J2:±110°,J3:±173°,J4:-145°/+45°,J5:±173°,J6:±60°,J7:±90°
Maximum Speed	J1~J7:180°/s
Communication Protocol	1 kHz EtherCAT
Brake Control (Braking)	Brakes on J1–J4
Function	Position Control, Impedance Control, Load Automatic Identification, Force-Position Hybrid Control
Arm End Interface	RS485、CAN fd 、Ethercat、CAN、24V(3A)、48V
End-Effector 6D Force Sensor	Optional
End-Effector Camera	Standard
End Effector	Self-developed Gripper (Optional)
Overall Machine Basic Parameters	
Name	**Specification**
External Dimensions	L670mm*W548mm*H1720mm (standing) L850mm*W548mm*H790mm (folded)
Vertical Workspace	0-2.1m
Gross Weight	150kg
Ambient Temp	-10°~40°C
Battery Life	4h-6h
Communication Interface	Wi-Fi/EtherNet
Degree of Freedom (Whole Machine)	26 DoF (excluding dexterous hands)
Drive	Four-wheel drive + four steered wheels, omni-directional movement
Force Control	Standard configuration (whole machine)
Thoracic RGB-D Camera	Optional

Head Parameters		
Degree of Freedom	2 DoF (Pan/Tilt)	
Range of Motion	J_{B1} Rotaright: +90°, J_{B2} Tilt: 30%/-28°	
Communication Protocol	1 kHz EtherCAT	
Brake control (braking method)	All joints equipped with brakes	
camera	RGBD + Binocular	
Microphone	4-Mic Array	
Computing Platform	NVIDIA AGX Orin 64GB	NVIDIA Jetson Thor T5000 128GB
AI Performance	275 TOPS	2070 TFLOPS (FP4 Sparse)
Max GPU Frequency	1.3 GHz	1.57 GHz
Max CPU Frequency	2.2 GHz	2.6 GHz
AI Compute Performance Uplift	/	7.5x
Efficiency Uplift	/	3.5x
Thorax		
stereophonic speaker	2× High-Power Loudspeakers	
Waist		
Range of Motion	J_{B3} Rotation:±170°, J_{B4} Side-sway: ±30°, J_{B5} Yaw: 55°/-110°	
Force Control	Standard	
Leg		
Range of Motion	J_{B6} Yaw:60°/-140°, J_{B7} Yaw:±90°, J_{B8} Side-swing:±11°	
Force Control	Standard	
Mobile Chassis Parameters		
Chassis Dimensions	L670mm*W548mm*H386mm	
Power Supply	Lithium Iron Phosphate Battery DC48V ; 34.4Ah	
Charging Methods	Manual Charge / Auto-Dock Charging (Optional) / Battery Bay Charging (Optional)	
Charging Time	⩽1.5h	
Speed	1.5m/s	
Climbing Angle	⩽10°	
Stopping Accuracy	±20mm (Position), ±1° (Angle)	
Navigation System	3D SLAM Navigation, 3D LiDAR, diagonally mounted Ultrasonic sensors distributed Front/Back/Left/Right, 2 each	
Charging Station	Optional	
Functions	3D LiDAR with built-in algorithms, supporting navigation planning, dynamic obstacle avoidance, autonomous localization and mapping	

Gento Luna Wheeled Folding Robot

Gento Luna is a wheeled folding robot integrating **high mobility, strong manipulation capability, and high computing power.**
Breaking through the morphological limitations of traditional robots, its innovative folding design and **omnidirectional mobile chassis** make it perfectly suitable for diverse scenarios including **home service, scientific research and education, industrial inspection, and commercial services.**



Omni-directional Mobility · Agile Operation

26 DoF (excluding dexterous hands) + Omnidirectional Mobile Chassis

Form Revolution: Featuring a highly bionic body with **26 degrees of freedom** (excluding dexterous hands) combined with a high-performance omnidirectional mobile chassis. It achieves **in-place rotation** and **omnidirectional translation**, while ensuring efficient commuting through its wheeled structure.

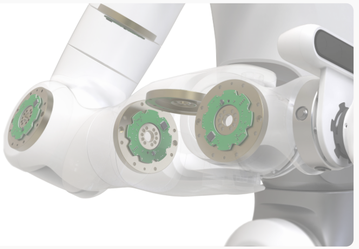
Omnidirectional Movement + In-place Rotation

Whether navigating narrow laboratory corridors or complex workshop environments, it seamlessly shuttles from point A to point B—**enabling work on the move, with no blind spots in operation.**

Full-body Force Control · Safe Interaction

Paradigm Shift from "Position Control" to "Force and Impedance Control"

The entire machine comes standard with force control, featuring **7-DoF force-controlled humanoid arms** (single arm rated payload **5 kg**, repeat positioning **repeatability ±0.03 mm).**
In addition, the **6 degrees of freedom** in the waist and legs adopt force-controlled joints, enabling **whole-body compliant impedance control.**
Full-body force control is a type of compliant control. Its core goal is to manage the contact force and interaction stiffness between the robot and the environment, ensuring ultimate safety in human–robot collaboration.



Safe Human and Environment Interaction

Specifically designed for safe human–robot coexistence. In the event of an unexpected collision (e.g., bumping into a person or a wall), the robot immediately "yields," instantly reducing joint stiffness to keep impact force within a safe range—protecting personnel and preventing self-damage.

Human-like Compliant Motion

Standard-equipped torque sensors support **impedance control** and **force-position hybrid control**. Force control technology based on **robot dynamics** reduces the jerky starts, stops, and vibrations of traditional robots. Movements become more natural, coordinated, and efficient—greatly enhancing the comfort of human–robot collaboration.

High Durability and Robustness

Hardware Protection: Active force buffering reduces impact on gears and structural components, minimizing mechanical wear.
Insensitive to Model Errors: Force control relies on real-time sensor feedback rather than precise robot dynamics models. Even if model parameters are inaccurate due to folding joints or load changes, the robot continues to operate stably.