

DUCO EXPLOSION PROOF COBOT

Strive to be the Best Partner for Smarter Future



ABOUT US

Founded in 2014, SIASUN-DUCO focuses on R&D of Next-Generation Intelligent Robots. As the sub-brand of SIASUN CORPORATION (Stock No.300024), SIASUN-DUCO has retained SIASUN's innovative spirit and craftsmanship philosophy, deeply creating continuous values to the world. Currently, SIASUN-DUCO has brought cutting-edge technologies in multiple industries, with 100% core components of HW & SW originally self-manufactured.

28 million USD⁺
Annual Sales

30⁺
Types of Robots

200⁺
High-Level talents



1500+
Projects



300+
Patents



30+
Countries



40%+
R&D Engineers



20%+
High-End Customers



GLOBAL LOCATION



- 1 **Headquarter:** Block 4, No.358 Jinhu Road, Pudong District, Shanghai.
- 2 **Thailand:** 112 Moo 2, KM. 15 th Bangna-Trad Rd, Bangchalong, Bangplee, Samutprakarn.
- 3 **Malaysia:** 1050708 Jalan Gurdwara hexagon tech park 10300 george town pulau pinang.
- 4 **Singapore:** 3A International Business Park, Tower B #08-18, Singapore.
- 5 **Germany:** Austraße 58, 71642 Ludwigsburg, Stuttgart.
- 6 **Mexico:** piso 5 oficina 518 avenida miguel hidalgo 330 monterrey centro monterrey nuevo leon.
- 7 **America:** 2021 Guadalupe Street, Suite 260, Austin, Texas.
- 8 **Japan:** 5F, CLOTO Building, 376 Ichinofunairicho Kawaramachi-dori, Nijo Sagaru, Nakagyo-Ku, Kyoto. 604-0924.

PRODUCT INTRODUCTION

This product series covers five explosion-proof collaborative robot models with load capacities ranging from 5 to 25 kg and arm spans of 900-2000 mm. Serving as a protective shield for frontline high-risk personnel, they can replace workers in performing tasks within flammable, explosive, toxic, hazardous, high-temperature, or high-pressure environments such as petroleum, natural gas, and chemical industries. Their outstanding advantages in load capacity and working radius enable adaptation to broader application requirements, while maintaining collaborative robot features including safety, user-friendly operation, rapid deployment, and low power consumption.

PRODUCT FEATURES



Explosion Proof

- This product features pressurized explosion-proof design and operates in ambient temperatures from -10°C to 50°C.



Applicable Markets

- This product is approved for use in China and the European Union. For other regions, please consult your local distributor or our company.



Application Scenarios

- This product is designed to operate in hazardous environments including flammable, explosive, toxic, and otherwise dangerous conditions, replacing manual labor to eliminate personnel safety risks while enhancing operational stability and reliability.
- **Typical applications include:** Handling operations in high-temperature, high-pressure oil & gas hazardous environments; Material transfer in combustible dust atmospheres; Spraying and coating operations; Cleaning and washing procedures; Loading/unloading and assembly tasks in confined spaces.



Smart

- Configurable with intelligent sensing devices for real-time environmental data collection and analysis, enhancing enterprise digital operation capabilities.



Wide Application

- Payload: 5-25kg | Working reach: 900-2000 mm. Broad applicability across diverse scenarios.



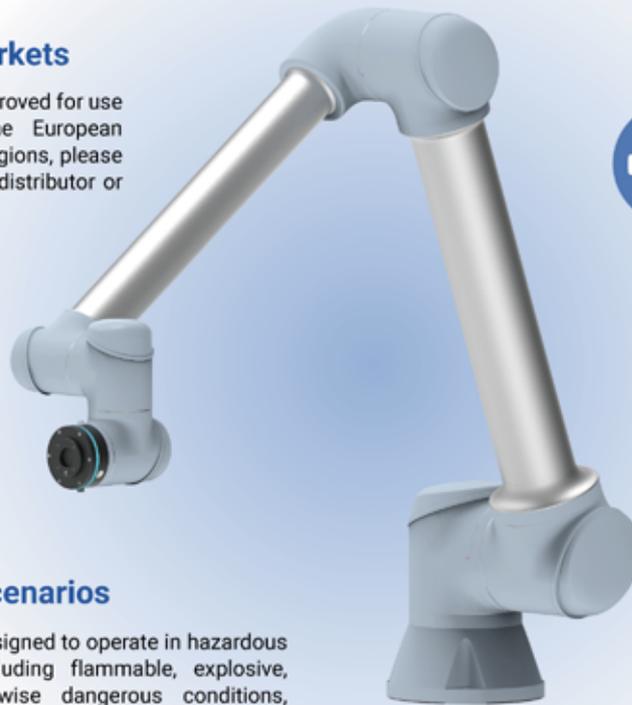
Easy-to-Use

- Drag-and-teach programming lowers the skill barrier for operation.



Light and Handy

- Lightweight design enables rapid deployment and production line adaptation for higher efficiency.



CONTROL BOX

Technical Parameters	
Weight	80kg
Size	1300*600*500mm
Power Supply	200-240VAC,47-63HZ,16A
Rated Power	1000W
Cable Length	12m (Contact your dealer for other specifications)
Communication Mode	TCP/IP,Modbus/TCP,CAN,RS485,Profinet
I/O Interface	2AI/2AO, 4*SDI/3*SDO、 16DI/16DO (PNP, 24V/Max 500mA), Among which 8DI/8DO can be configured
IP Class	IP65
Operation Temperature	-10°C - 50°C
Storage Temperature	-40°C - 55°C
Humidity	20% - 90%RH
Explosion Proof	II 2 G Ex db eb mb pxb IIC T4 Gb/II 2 D Ex mb pxb tb IIIC T130°CDb
Gas Source Type	Clean Air



Explosion Proof Control Box

TEACH PEDANT

Technical Parameters	
Size	248x172x22mm
OS	Android 10.0
Resolving Power	1280*800
VGA Class	10.1 16:10
IP Class	IP65
Weight	1095g
Power	AC100V~240V, 50Hz/60Hz Output: DC 5V/3A
DC Ports	DC 5V-3A ϕ 3.5mm



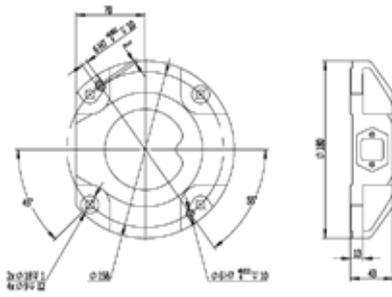
Teach Pendant

PRODUCT MODEL

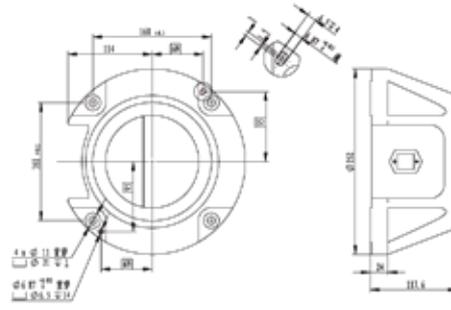


Technical Parameters	GCR5-910-Ex	GCR10-1300-Ex	GCR16-2000-Ex	GCR20-1400-Ex	GCR25-1800-Ex
Max Payload	5kg	10kg	16kg	20kg	25kg
Degree of Freedom	6	6	6	6	6
Max TCP Speed	3.6m/s	3.8m/s	3.5m/s	2.2m/s	2.5m/s
Max Straight-line Speed	1.5m/s	1.5m/s	1.8m/s	1.5m/s	1.5m/s
Reach	917mm	1300mm	2000mm	1400mm	1800mm
Repeatability	±0.02mm	±0.03mm	±0.05mm	±0.05mm	±0.05mm
Joint	Range	Max Speed			
J6	±360°	225°/s	225°/s	225°/s	225°/s
J5	±360°	225°/s	225°/s	225°/s	225°/s
J4	±360°	225°/s	225°/s	225°/s	225°/s
J3	±360°	225°/s	225°/s	180°/s	180°/s
J2	±360°	225°/s	180°/s	120°/s	100°/s
J1	±360°	225°/s	180°/s	120°/s	120°/s
Tool Interface	GB/T 14468.1-50-4-M6(eqv ISO 9409-1)				
Type of Gas Source	Clean Air				
Explosion Proof	II 2 G Ex db eb mb pxb IIC T4 Gb/II 2 D Ex mb pxb tb IIIC T130°CDB				
Installation	Ceiling / Floor / Wall / Inclined				
IP Class	IP65				
Ambient Temperature Range	-10°C~50°C				
Storage Temperature Range	-40°C~55°C				
Robot Package Size	698x588x450mm	958x508x516mm	1465x516x472mm	1060x500x600mm	1295x540x515mm
Weight	22kg/30kg	37.8kg/46kg	60kg/68kg	66kg/75kg	61.6kg/70kg

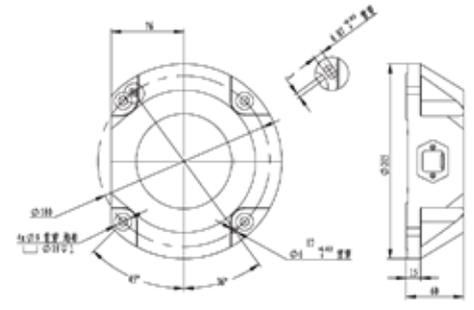
BASE FLANGE



GCR5-910-Ex

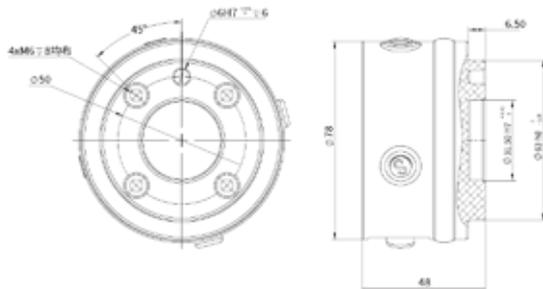


GCR16-2000-Ex
GCR20-1400-Ex
GCR25-1800-Ex

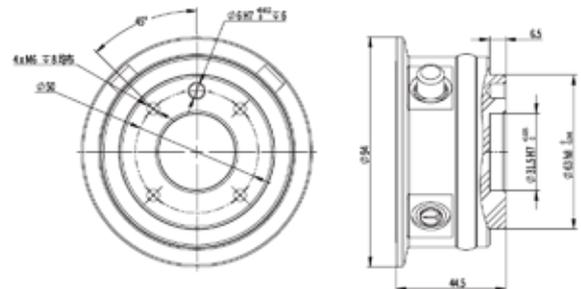


GCR10-1300-Ex

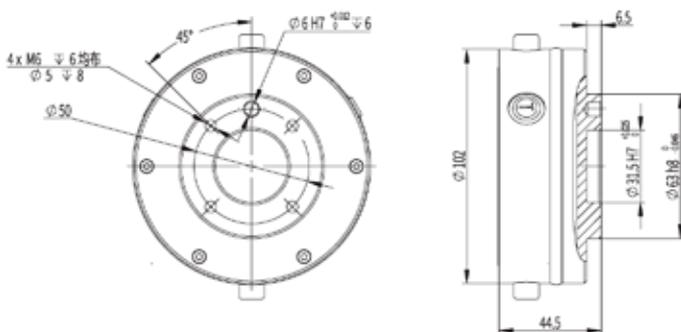
TOOL FLANGE



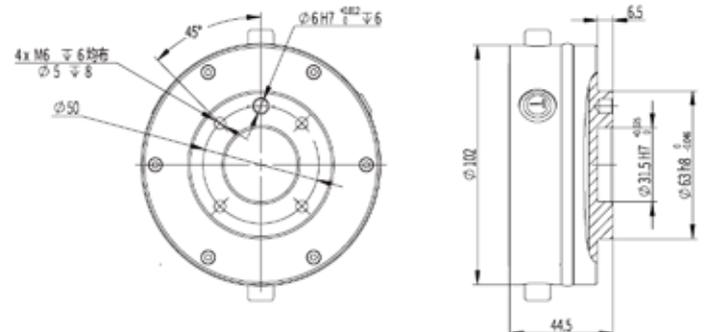
GCR5-910-Ex



GCR16-2000-Ex
GCR10-1300-Ex

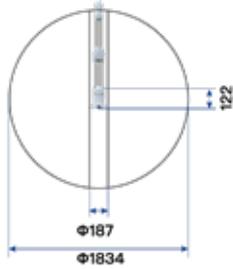


GCR20-1400-Ex



GCR25-1800-Ex

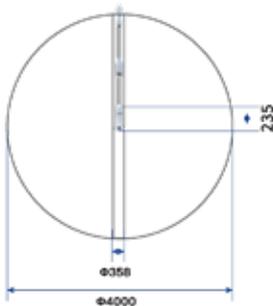
WORK SPACE



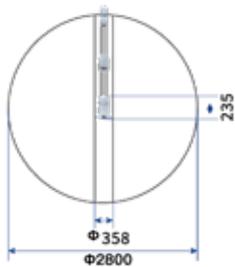
GCR5-910-Ex



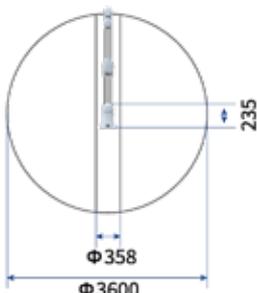
GCR10-1300-Ex



GCR16-2000-Ex

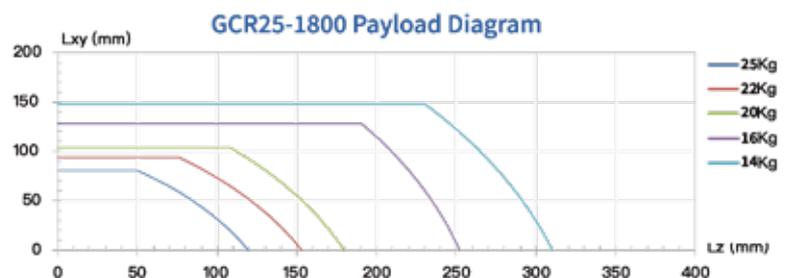
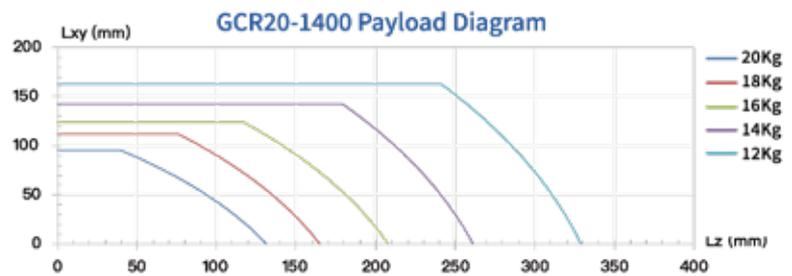
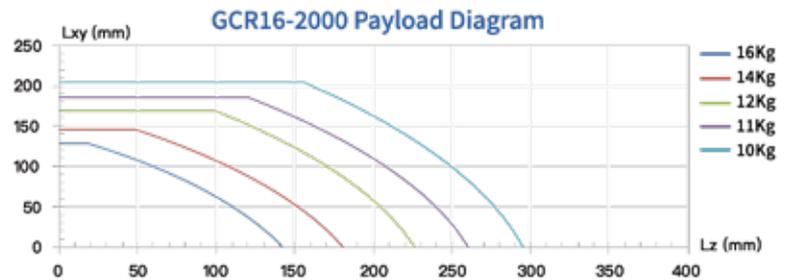
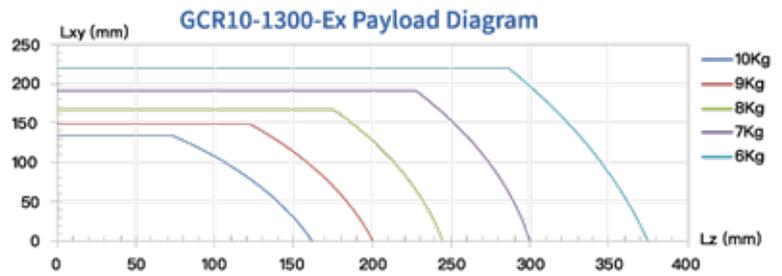
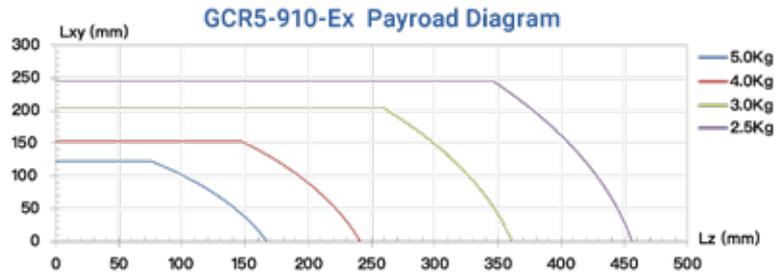


GCR20-1400-Ex



GCR25-1800-Ex

PAYLOAD DIAGRAM



Force Sensor



Vision System



Electrical Gripper



Vacuum Gripper



Quick-Change



Simulation&Off-line Program



Fasten System



Dress Packs



Gateway&Expansion Module



Laser Scanner



Optical &3D Scanner



Welding Machine(China)



Welding Machine(Global)



Other

