

# Industrial Robot Series

Faster | More Reliable | More Precise



## AUCTECH Robotics

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## AUCTECH

To be a world-leading robot expert

AUCTECH industrial robots are faster, more reliable, and more precise.

Every second and every motion of industrial robots matter throughout manufacturing, and that explains why robot reliability and speed come first for us. After years of updating and improving, our products have become faster and more reliable, with more functions integrated into a compact size. That makes applications easier, production more stable, and intelligent manufacturing more efficient.





## Product Advantages



### Faster - Efficient Production

- Optimal hardware performance powered by self-developed control systems
- Remarkably adroit motion backed by modularized control architecture



### More Reliable - Stable Operation

- Rigorous design and continuous improvement bring you a reliable partner in industrial production
- IP67, CE, CR, KCs, and MTBF certifications



### More Precise - Flexible Integration

- Easier deployment thanks to the compact structure and hollow wrist
- Broader application due to various interfaces



### Easier to Use - Worry-free Operation

- Simple maintenance with timely, professional, and efficient service



## Product series



### AN-220 series

Payload: 150kg 170kg 220kg  
Reach: 3201mm 2705mm 2705mm

### AN-80 series

Payload: 50kg 80kg  
Reach: 2598mm 2200mm

### AN-25 series

Payload: 12kg 20kg 25kg/35kg 30kg  
Reach: 2110mm 2013mm 1813mm 1617mm

### AN-12 series

Payload: 10kg 12kg 16kg  
Reach: 1602mm 1442mm 1102mm 953mm

### AX-10 series

Payload: 10kg  
Reach: 1206mm

### AX-12 series

Payload: 12kg  
Reach: 707mm 906mm

### AX-7 series

Payload: 7kg  
Reach: 707mm 906mm 1206mm

### AX-4 series

Payload: 4kg  
Reach: 596mm



# AX-4 series

- Easy integration into small automation units to accomplish various tasks efficiently
- Satisfactory quality and takt time thanks to the amazing stability and best-in-class motion control

Model		AX-4
DOF		6
Drive mode		AC servo
Reach		596 mm
Repeatability		±0.02 mm
Payload		4 kg
Range of motion (maximum speed)	Axis 1	-170° to +170° (440°/s)
	Axis 2	-80° to +144° (355°/s)
	Axis 3	-194° to +54° (440°/s)
	Axis 4	-170° to +170° (490°/s)
	Axis 5	-119° to +119° (450°/s)
	Axis 6	-360° to +360° (720°/s)
Operating temperature		0°C to +40°C
Storage temperature		-10°C to +55°C
IP rating		IP67
Mounting method		Floor, Ceiling
Noise level		≤ 70 dB(A)
Weight		About 32 kg
AIR		4-Φ4, 5bar
Signal		8 channels (30V, 0.5A)





# AX-7 series

- Flexible reach choices: 707/906/1206 mm
- Satisfactory quality and takt time thanks to the amazing stability and best-in-class motion control

Model		AX-7	AX-7L	AX-7XL
DOF		6		
Drive mode		AC servo		
Reach		707 mm	906 mm	1,206 mm
Repeatability		±0.02 mm	±0.03 mm	±0.05 mm
Payload		7 kg		
Range of motion (maximum speed)	Axis 1	-170° to +170° (440°/s)	-170° to +170° (355°/s)	-170° to +170° (297°/s)
	Axis 2	-96° to +135° (355°/s)	-96° to +130° (355°/s)	-95° to +125° (223°/s)
	Axis 3	-195° to +65° (440°/s)	-195° to +65° (355°/s)	-195° to +65° (297°/s)
	Axis 4	-170° to +170° (480°/s)		
	Axis 5	-120° to +120° (450°/s)		
	Axis 6	-360° to +360° (705°/s)		
Operating temperature		0°C to +40°C		
Storage temperature		-10°C to +55°C		
IP rating		IP67	IP67	IP54
Mounting method		Floor, Ceiling		
Noise level		≤ 70 dB(A)		
Weight		About 50 kg	About 52 kg	About 76 kg
AIR		4-Φ4, 5bar		
Signal		8 channels (30V, 0.5A)		





# AX-10 series

- All-cast aluminum body for the lightest weight and highest speed in its class
- Easy and compact deployment made possible by the fully enclosed arm with internal cables

Model		AX-10 R1206
DOF		6
Drive mode		AC servo
Reach		1,206 mm
Repeatability		±0.05 mm
Payload		10 kg
Range of motion (maximum speed)	Axis 1	-170° to +170° (297°/s)
	Axis 2	-95° to +125° (223°/s)
	Axis 3	-195° to +65° (223°/s)
	Axis 4	-170° to +170° (480°/s)
	Axis 5	-120° to +120° (360°/s)
	Axis 6	-360° to +360° (705°/s)
Operating temperature		0°C to +40°C
Storage temperature		-10°C to +55°C
IP rating		IP54
Mounting method		Floor, Ceiling
Noise level		≤ 70 dB(A)
Weight		About 76 kg
AIR		4-Φ4, 5bar
Signal		8 channels (30V, 0.5A)





# AX-12 series

- Customized for special industry with high ROI
- Satisfactory quality and takt time for segment customers thanks to the amazing stability and best-in-class motion speed
- Long-term reliable operation due to high stiffness and high inertia design
- Easy and compact deployment made possible by the fully enclosed arm with internal cables

Model		AX-12 R707-3	AX-12 R707-4	AX-12 R906-3-LAR	AX-12 R906-4-LAR
DOF		3	4	3	4
Drive mode		AC servo			
Reach		707 mm		906 mm	
Repeatability		±0.02 mm		±0.03 mm	
Payload		12 kg			
Range of motion (maximum speed)	Axis 1	-96° to +135° (297°/s)		-126° to +100° (297°/s)	
	Axis 2	-195° to +65° (297°/s)			
	Axis 3	-120° to +120° (360°/s)			
	Axis 4		-360° to +360° (356°/s)		-360° to +360° (356°/s)
Operating temperature		0°C to +40°C			
Storage temperature		-10°C to +55°C			
IP rating		IP54			
Mounting method		Floor, Ceiling			
Noise level		≤ 70 dB(A)			
Weight		About 43 kg	About 45 kg	About 44 kg	About 46 kg
Signal		8 channels (30V, 0.5A)			





# AN-12 series

- Full-cast aluminum alloy body for 20% weight reduction compared with products of the same class. Running speed that is 20% faster for efficient and precise operation.
- Compact design with built-in motor and cable for easier and more flexible deployment
- IP67 protection that endures harsh environments

Model		AN-12-10/1.6	AN-12-12/1.4	AN-12-16/1.1	AN-12-16/0.95-3	AN-12-16/0.95-4
DOF		6			3	4
Drive mode		AC servo			AC servo	
Reach		1,602 mm	1,442 mm	1,102 mm	953 mm	953 mm
Repeatability		±0.03 mm			±0.03 mm	
Payload		10 kg	12 kg	16 kg	16 kg	16 kg
Range of motion (maximum speed)	Axis 1	-170° to +170° (245°/s)			-125° to +110° (245°/s)	
	Axis 2	-105° to +145° (245°/s)			-210° to +70° (290°/s)	
	Axis 3	-210° to +70° (290°/s)			-135° to +135° (450°/s)	
	Axis 4	-270° to +270° (435°/s)			-360° to +360° (705°/s)	
	Axis 5	-135° to +135° (450°/s)				
	Axis 6	-360° to +360° (705°/s)				
Operating temperature		0°C to +45°C			0°C to +45°C	
Storage temperature		-10°C to +55°C			-10°C to +55°C	
IP rating		IP67			IP67	
Mounting method		Floor, Ceiling			Floor, Ceiling	
Noise level		≤75 dB(A)			≤75 dB(A)	
Weight		About 117 kg	About 115 kg	About 112 kg	About 67 kg	About 69 kg
AIR		1-Φ8+2-Φ6, 8bar			1-Φ8+2-Φ6, 8bar	
Signal		24 channels (30V, 0.5A)			12 channels (30V, 0.5A)	





# AN-25 series

- Longer reach than products of the same class helps easily address a wide range of automation requirements
- AUCTECH self-developed control system maximizes production efficiency while ensuring the service life
- A 25% increase in payload over the previous model on average
- High inertia motion characteristics optimized for high inertia and fast beat applications
- IP67 high protection rating of wrists allows working in extreme environments thanks to the newly optimized sealing design

Model		AN-25-20/2.0	AN-25-25/1.8	AN-25-30/1.6	AN-25-35/1.8	AN-25-12/2.1
DOF		6				
Drive mode		AC servo				
Reach		2,013 mm	1,813 mm	1,617 mm	1,813 mm	2,110 mm
Repeatability		±0.05 mm				
Payload		20 kg	25 kg	30 kg	35 kg	12 kg
Range of motion (maximum speed)	Axis 1	-180° to +180° (204°/s)			-180° to +180° (204°/s)	-180° to +180° (204°/s)
	Axis 2	-99° to +156° (186°/s)			-99° to +156° (186°/s)	-99° to +156° (186°/s)
	Axis 3	-200° to +75° (182°/s)			-200° to +75° (182°/s)	-200° to +85° (182°/s)
	Axis 4	-180° to +180° (492°/s)			-180° to +180° (310°/s)	-180° to +180° (492°/s)
	Axis 5	-135° to +135° (450°/s)			-135° to +135° (360°/s)	-135° to +135° (450°/s)
	Axis 6	-360° to +360° (705°/s)			-360° to +360° (444°/s)	-360° to +360° (705°/s)
Operating temperature		0°C to +40°C				
Storage temperature		-10°C to +55°C				
IP rating		IP65 (Wrist IP67)				
Mounting method		Floor, Ceiling				
Noise level		≤75 dB(A)				
Weight		About 264 kg	About 256 kg	About 252 kg	About 256 kg	About 262 kg
AIR		2-Φ8, 8bar				
Signal		24 channels (30V, 0.5A)				





# AN-80 series

- Highest payload and longest reach among products of the same class helps easily address a wide range of automation needs
- High inertia motion characteristics optimized for high inertia applications
- Higher protection level against even the most demanding environments

Model		AN-80-80/2.2	AN-80-50/2.6
DOF		6	
Drive mode		AC servo	
Reach		2200 mm	2598 mm
Repeatability		±0.06 mm	±0.08 mm
Payload		80 kg	50 kg
Range of motion (maximum speed)	Axis 1	-185°~+185°(170°/s)	-185°~+185°(170°/s)
	Axis 2	-90°~+155°(145°/s)	-90°~+155°(180°/s)
	Axis 3	-210°~+80°(170°/s)	-210°~+80°(180°/s)
	Axis 4	-200°~+200°(285°/s)	-200°~+200°(285°/s)
	Axis 5	-130°~+130°(285°/s)	-130°~+130°(285°/s)
	Axis 6	-360°~+360°(285°/s)	-360°~+360°(360°/s)
Operating temperature		0°C to +45°C	
Storage temperature		-10°C to +55°C	
IP rating		IP65 (Wrist IP67)	
Mounting method		Floor, Ceiling	
Weight		About 635 kg	About 645 kg
AIR		2-Φ12, 8bar	
Signal		24 channels (30V, 0.5A)	





# AN-220 series

- Payload of 220 kg, with greater operating capacity under the same working conditions
- Reach of 3200 mm, cope with more application needs easily
- The whole machine IP65, wrist IP67 protection, deal with harsh environment freely

Model		AN-220-220/2.7	AN-220-170/2.7	AN-220-150/3.2
DOF		6		
Drive mode		AC servo		
Reach		2705 mm	2705 mm	3201 mm
Repeatability		±0.05 mm		
Payload		220 kg	170 kg	150 kg
Range of motion (maximum speed)	Axis 1	-185°~+185°(120°/s)	-185°~+185°(130°/s)	-185°~+185°(130°/s)
	Axis 2	-65°~+85°(110°/s)	-65°~+85°(115°/s)	-65°~+85°(115°/s)
	Axis 3	-185°~+80°(110°/s)	-185°~+80°(125°/s)	-185°~+80°(125°/s)
	Axis 4	-200°~+200°(150°/s)	-200°~+200°(180°/s)	-200°~+200°(180°/s)
	Axis 5	-130°~+130°(150°/s)	-130°~+130°(180°/s)	-130°~+130°(180°/s)
	Axis 6	-360°~+360°(220°/s)	-360°~+360°(260°/s)	-360°~+360°(260°/s)
Operating temperature		0°C to +45°C		
Storage temperature		-10°C to +55°C		
IP rating		IP65 (Wrist IP67)		
Mounting method		Floor		
Weight		About 1138 kg	About 1138 kg	About 1165 kg
AIR		2-Φ12, 8bar		
Signal		24 channels (30V, 0.5A)		





# aBC-5M

- Compact design and small footprint
- Flexible deployment through vertical/horizontal installation

# aBC-5

- More convenient deployment with a size only 50% that of the previous generation
- Suitable for wet, acidic, and alkaline gas environment thanks to internal and external dual cycle cooling system and IP54 protection



Controller	aBC-5M	aBC-5
Dimensions (W×D×H)	448 mm x 446 mm x 268 mm	522 mm x 408 mm x 425 mm
Weight	28 kg	35 kg
Standard I/O	Input: 16; Output: 16	Input: 16; Output: 16
IP rating	IP40	IP54
Power supply	230VAC, voltage fluctuation within -15% to +10%, frequency variation within ±2%	230VAC or 3 x 380VAC(3L+N+PE)*1, voltage fluctuation within -15% to +10%, frequency variation within ±2%
Rated power	1.6kW(AX-4),1.7kW(AX-12 series), 2.5kW(AX-7、AX-7L、AX-7XL),2.7kW(AX-10 R1206)	1.6kW(AX-4),1.7kW(AX-12 series),2.5kW(AX-7、AX-7L、AX-7XL), 2.7kW(AX-10 R1206),4.7kW(AN-12-12/1.4、AN-12-10/1.6、AN-12-16/1.1), 2.8kW(AN-12-16/0.95-3),3kW(AN-12-16/0.95-4),9.1kW(AN-25 series)
Operating temperature	0°C to +45°C	0°C to +45°C
Storage temperature	-10°C~+55°C	-10°C~+55°C
Maximum humidity for operation/storage	≤ 80% (non-condensing)	≤ 95% (non-condensing)

\*1: 3x380VAC power supply for AN-12 Series, AN-25 Series,and 230VAC power supply for the rest.

# aBC-5E

- Compact design and easy installation
- IP54 protection level against metal dust
- Rich interface, support multiple communication methods



Controller	aBC-5E
Dimensions (W×D×H)	690 mm× 514 mm× 835 mm
Weight	102 kg
Standard I/O	Input: 16; Output: 16
IP rating	IP54
Power supply	3x380VAC(3L+PE); voltage fluctuation within -10%-10%, frequency variation within ±2%
Rated power	17.5kW(AN-80 series)、32.6kW(AN-220 series)
Operating temperature	0°C ~ +45°C
Storage temperature	-10°C~ +55°C
Maximum humidity for operation/storage	≤95% (non-condensing)

# aPad-2

- Modern ergonomic design
- Large multi-touch HD Screen,easier human-machine interaction
- Plug & play connection and shareable between robots
- Intuitive UI layout allowing quick start within 10 minutes



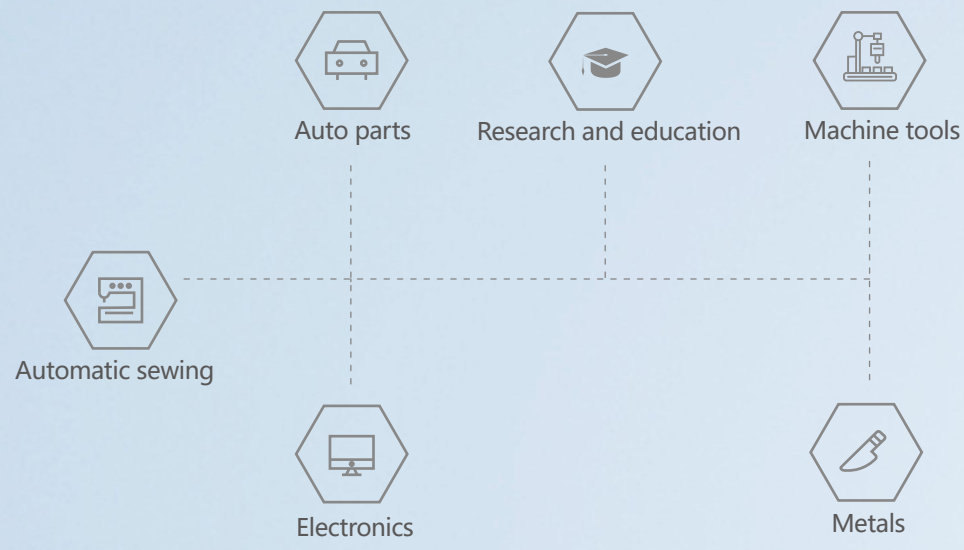
## FlexPendant

	aPad-2	aPad
Dimensions	290 mm × 190 mm × 80 mm	9.7 inches
Weight	840 g	1.15 kg (without cable)
Connection	Wired	Wired
Display	10.1-in LCD with a resolution of 1,920×1,200	Resolution 1,024×768
IP rating	IP54	IP65



# Applications

AUCTECH has built high-quality industrial robot platforms on modular technology. By satisfying the market needs with multi-function products that are more efficient, reliable, and compact, AUCTECH empowers efficient intelligent manufacturing and drives innovations in different industries.





# Electronics

Outperforming competitors in speed, reliability, and size, AUCTECH industrial robots have found wide applications in consumer electronics, glass cover, PCB, and other segments.



**Loading & Unloading for Mobile Phone Inspection**



Loading and unloading for inspection equipment of mobile phones and other electronic products

**Notebook Package Labeling**



Labeling on the outer package of notebooks

**Loading & Unloading for Mobile Phone Screen Processing**



Loading and unloading for CNC engraving machine to process the glass cover of electronic products

**Mobile Phone Backboard Polishing**



Grinding and polishing of the metal backboards of mobile phones and other electronic products

**Relay Gluing**



Encapsulating and gluing of relays and other electronic components

**PCB Board Handling**



Handling of large inertia PCB boards in the PCB industry

# Auto Parts

AUCTECH serves Tier 1 auto part suppliers and their factories across the globe. Thanks to superior trajectory accuracy and stiffness, AUCTECH robots ensure consistent trajectory in automated applications such as part grinding and gluing.

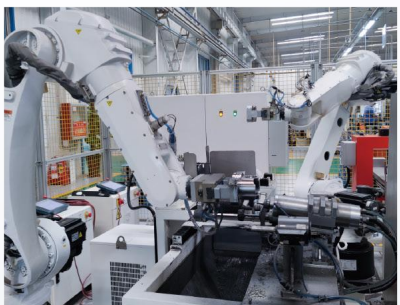


**Rail Grinding**



Chamfering and deburring of different end surfaces of auto linear guides

**Piston Grinding & Deburring**



Fine grinding and deburring of piston products (including valves, oil holes, inner pin holes, and other complex parts)

**Plastic Part Grinding**



Grinding and polishing of interior and exterior plastic trims, such as door handles and three-spoke steering wheels

**Lock Gluing**



Plasma cleaning and sealant application for car locks

**Casting Grinding**



Grinding and deburring of cast iron parts, aluminum and magnesium alloy die-cast parts, and steel machined parts

**Front-End Module Inspection**



Flexible automatic inspection of different types of automotive front-end modules

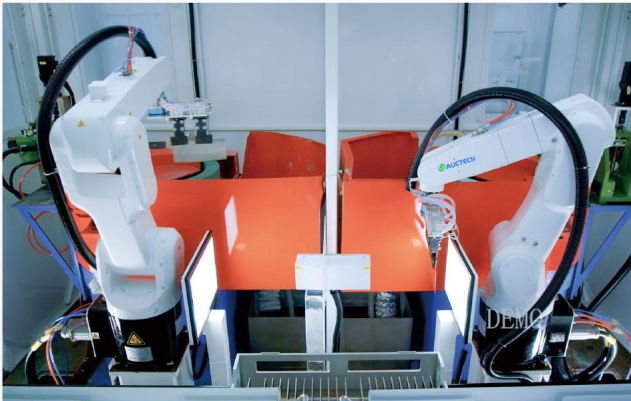


# Metals

Equipped with proprietary control systems, constant force control software process kit, and intelligent vision planning system, the IP67 protected AUCTECH robots automate most of the tool production processes with improved productivity and quality. AUCTECH has now grown into one of the best robot brands for manufacturing hardware including knife and shear.



Automatic Loading & Unloading for Wet Sanding



Automatic Blade Cutting



Automatic Chamfering



Automatic Deburring

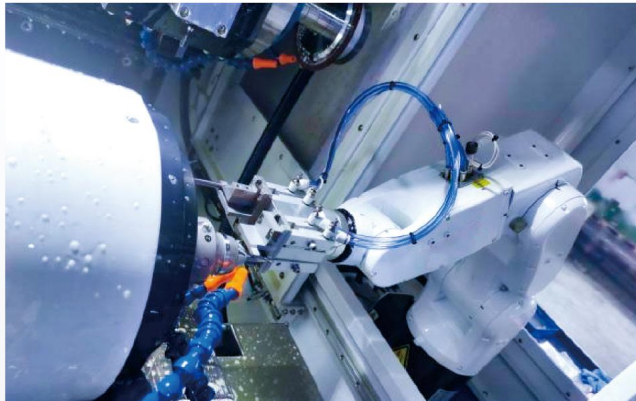


# Machine Tending

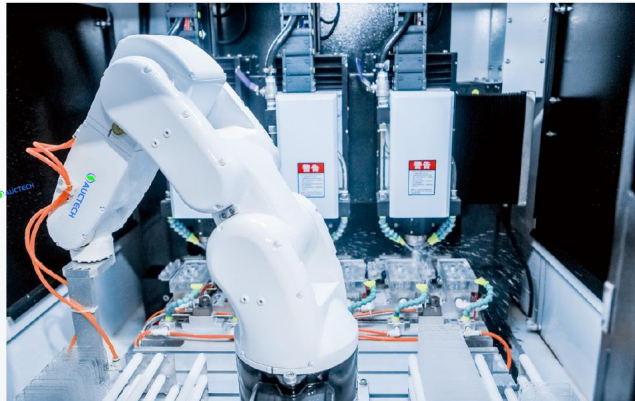
Powered by high-performance motion control and other platform-based technologies, the IP67 protected AUCTECH robots have become the ideal choice for the machine tool industry due to their high protection level, compact design, and outstanding precision. Equipped with the hollow wrist, they allow for long-term stable loading and unloading inside and outside machine tools. That wins it the reputation of the No. 1 domestic brand in the segment.



Loading and Unloading for Tool Grinding Machine



Loading and Unloading for CNC Engraving Machine



Loading and Unloading for Injection Moulding Machine



Loading and Unloading for Water Truck

