

KUKA



**The compact robot
for low payloads**

KR 5 scara

»KR 5 scara: SMALL BUT SPEEDY

Maximum speed in minimum space: the KUKA Small Robots are ideal for nearly all applications that call for utmost precision and rapidity, such as for handling delicate components. Special tools can be easily adapted, as all the energy and fluid supply lines are integrated into the robots so that there is no restriction on the axis motion ranges.

All of the Small Robots are also optionally available as a dust- and splash-proof variant, allowing protection ratings of up to IP 65 to be achieved. A further strength is their user-friendly and service-proven KUKA controller. This assures system compatibility with other KUKA models, provides a uniform control concept across the entire range, and enables fast commissioning and simple maintenance. **The advantages: high planning reliability and security of investment.**

»EXTREMELY FAST – EXTREMELY PRECISE

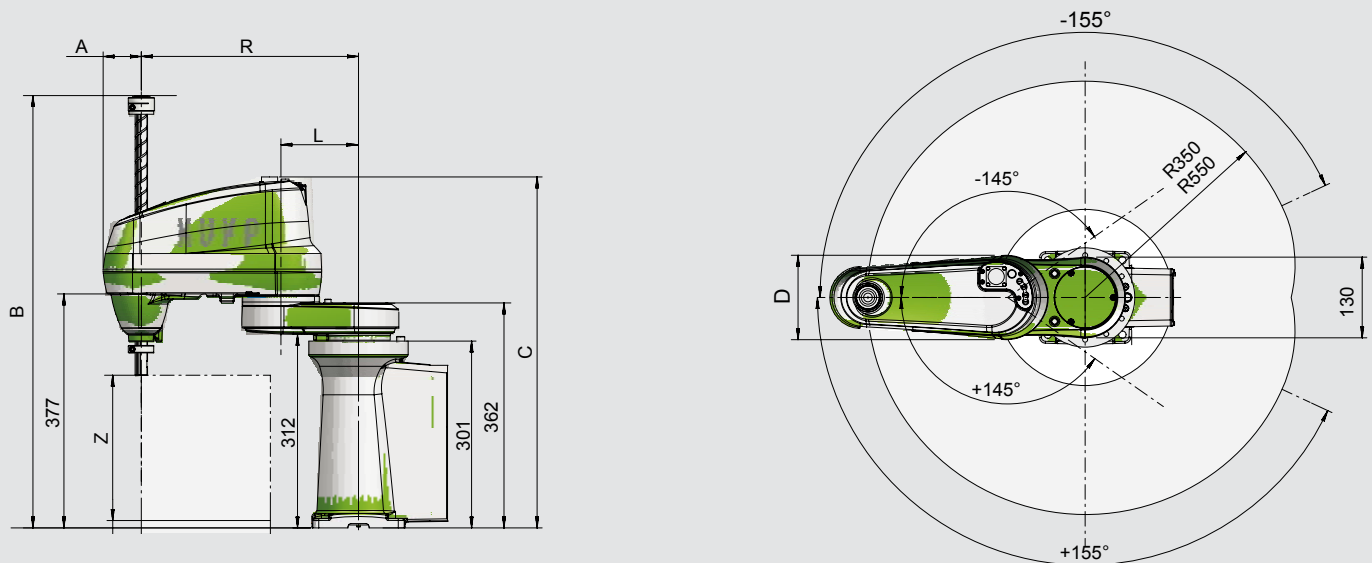
KUKA Small Robots give you high precision: accurate link-and-gear combinations and optimized control loops in the kinematic chain provide repeatability rates of up to ± 0.015 mm. And their special design makes them really fast: their low weight ensures high working velocities and makes them ideal for pick-and-place tasks. **The advantages: increased output and fewer rejects.**

»EXTREMELY DURABLE – EXTREMELY PRODUCTIVE

These robots offer you more: integrated routing of the energy supply system for air and I/O signals significantly reduces the wear – thereby extending the maintenance intervals. At the same time, special brakes prevent the axes from sagging under gravity when the robot is switched off. This means that the robot is always ready for operation, and you save time and money. **The advantages: lower maintenance and major time savings.**

»TECHNICAL DETAILS KR 5 scara

Dimensions: mm



Work envelope	Dimensions						Volume
	A	B	C	R	Z	L	
KR 5 scara R350 Z200	62 mm	697 mm	566 mm	350 mm	200 mm	125 mm	0.064 m³
KR 5 scara R350 Z320	62 mm	697 mm	566 mm	350 mm	320 mm	125 mm	0.102 m³
KR 5 scara R550 Z200	62 mm	697 mm	566 mm	550 mm	550 mm	325 mm	0.165 m³
KR 5 scara R550 Z320	62 mm	697 mm	566 mm	550 mm	320 mm	325 mm	0.264 m³

»EXTREMELY COST-EFFECTIVE – EXTREMELY PRECISE

Automatically better: with a KUKA robot you not only have all process steps under control, but also benefit from top performance and flexibility. Thanks to pioneering robotics and control technology, you can rely around the clock on maximum precision – as well as on ease of operation, simple space-saving integration into production sequences, and availability rates of almost 100%. **The advantages: production with greater precision and lower costs.**

»EXTREMELY SIMPLE – EXTREMELY VERSATILE

The simpler your robot is to program, the quicker you can get going. KUKA supports you with a wide range of products and services: from expandable system software and ready-made application software to simulation programs for designing systems. Programming is made easy with the familiar Windows look, intuitive user interface and clear visualization. **The advantages: maximum ease of operation and rapid commissioning.**

Type	KR 5 scara R350	KR 5 scara R550
Maximum reach	350 mm	550 mm
Rated payload	5 kg	5 kg
Suppl. load, arm/link arm/rotating col.		
Suppl. load, arm + link arm, max.		
Maximum total load	5 kg	
Number of axes	4	
Mounting position	Floor	
Variant	Waterproof	
Positioning repeatability*	±0.015 mm	±0.020 mm
Path repeatability*		
Controller	KR C2 sr	
Weight (excluding controller), approx.	20 kg	29 kg
Temperature during operation	0 °C to +40 °C	
Protection classification	IP 40	
Robot footprint	150 mm x 150 mm	
Connection	2.35 kVA	
Noise level	< 75 dB	

Axis data	Range (software)	Speed with rated payload 5 kg
Axis 1 (A1) KR 5 scara R350	±155°	525°/s
Axis 2 (A2) KR 5 scara R550	±155°	450°/s
Axis 3 (A3) KR 5 scara R350	±145°	525°/s
Axis 4 (A4) KR 5 scara R550	±145°	720°/s
Axis 5 (A5)	200 mm, 320 mm	2,000 mm/s
Axis 6 (A6)	±358°	2,400°/s

Drive system, electromechanical with brushless AC servomotors

*to ISO 9283

Details provided about the properties and usability of the products are purely for information purposes and do not constitute a guarantee of these characteristics. The extent of goods delivered and services performed is determined by the subject matter of the specific contract. No liability accepted for errors or omissions.



»THE KUKA ROBOT GROUP: YOUR STRONG PARTNER

Quality made in Germany, creativity and the utmost commitment to customers and business partners: these form the basis on which KUKA develops the best possible technologies and thus the optimal automation concepts. The result is that you receive custom-tailored solutions and benefit from decisive process optimization.

Genuine passion for the fascination of robotics is reflected in our slogan "KUKA YOUR IDEAS", which is also our promise to you: Whatever you want to do, and however unusual your idea may be, with us you can implement anything – irrespective of the specific branch of industry and irrespective of whether or not a similar application has existed before.

Whatever task you give us, KUKA has the required specialists. In close cooperation with experienced system partners with competence in their respective industries, we do everything in our power to implement your ideas. Let us work on them together.

»KUKA SERVICES: ALWAYS THERE FOR YOU

You can rely on us to stand by you in every phase of a project: from planning and commissioning to maintenance and conversion. 24 hours a day. 365 days a year. The high-density KUKA service network ensures that we are always in your vicinity and can start your production in record time.

KUKA YOUR IDEAS

KUKA ROBOTER GMBH

Global Sales Center
Hery-Park 3000
86368 Gersthofen
Germany
Tel. +49 821 4533-0
Fax +49 821 4533-1616
info@kuka-roboter.de

Additional contact addresses:
www.kuka-robotics.com