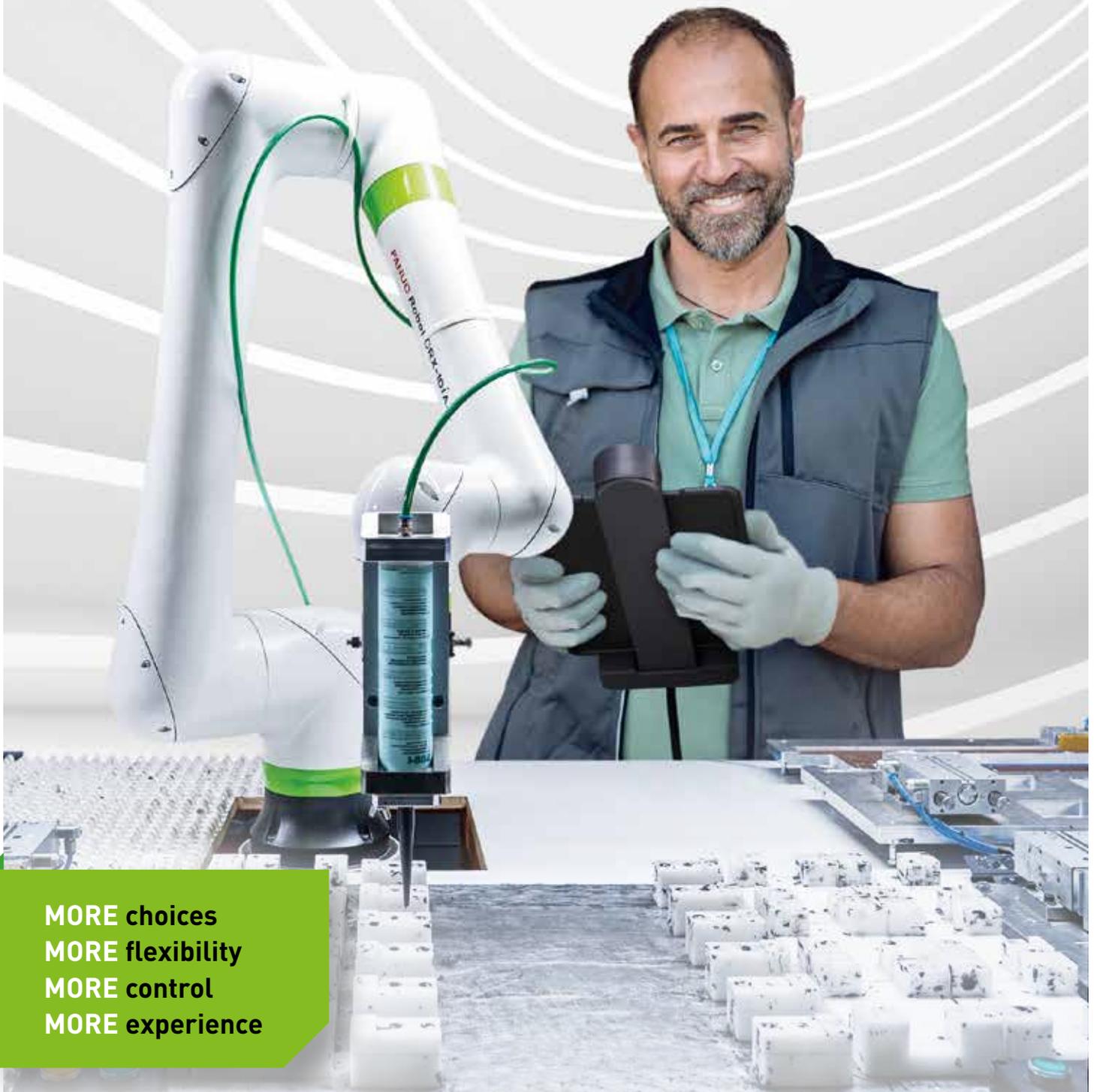


THE FACTORY AUTOMATION COMPANY

**FANUC**

**Experience MORE**

Collaborative robots for a  
wide range of applications



**MORE choices**  
**MORE flexibility**  
**MORE control**  
**MORE experience**

# Why settle for less when you can get **MORE**?

FANUC's collaborative robots offer **MORE** choices, **MORE** payload, **MORE** reach, and **MORE** speed than any other cobot series on the market. Safety-certified, FANUC cobots work hand in hand with humans to add value to your processes. Covering the needs of medium- and small-sized businesses as well as automation beginners and large corporations, the range contains exactly the right solution for your business.

## More choices for more businesses

Do you run a small- or medium-sized company and have never thought about automation? If so, FANUC cobots provide you with just the opportunity you are looking for. Quick to install, easy to use and offering unrivalled reliability, they represent a lasting solution that boosts your productivity and provides you with new growth opportunities. They also offer a safe return on investment. Let our experts advise you on exactly the right automation solution for your needs!



## Designed for your benefit

In recent years, the market for collaborative robots, or "cobots", has grown in popularity. The reason is simple: Collaborative robots offer proven safety features, enabling more flexible solutions as well as a smaller footprint in many instances and compared to traditional robots.

As a result, collaborative robots provide this safety and flexibility without the need for safety fencing or equipment – made possible by sensors and force controls. In combination with an ergonomic product design, cobots are meant to eliminate injury and avoid collisions when working side by side with humans.

# MORE performance and MORE capability

FANUC offers two series of collaborative robots: the CR series and the CRX series. No matter what series you choose, you are choosing the most reliable cobots for your automation solution, with a payload range of 5-50 kg and a reach of 994-1889 mm.



More reach –  
up to 1889 mm



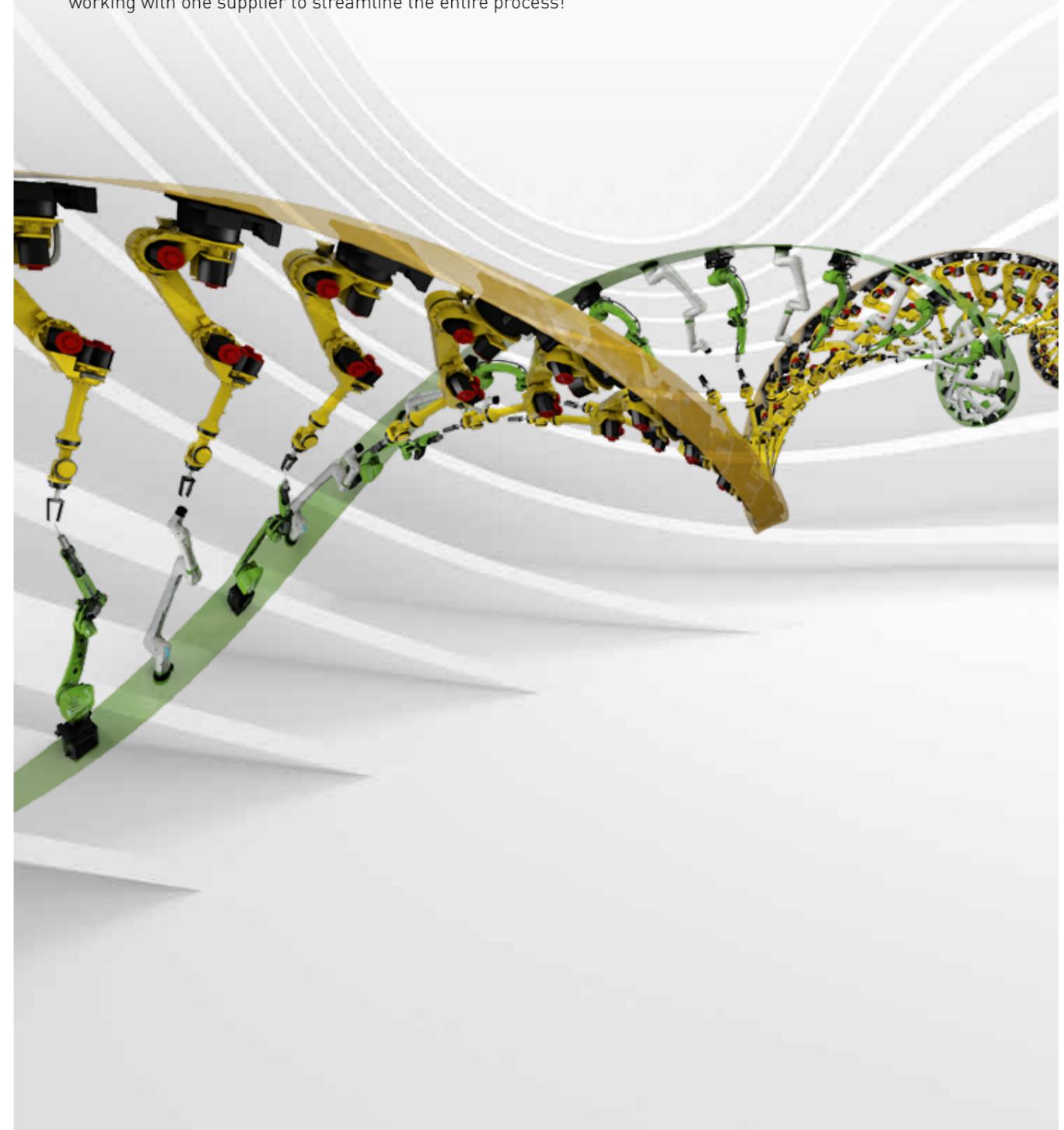
More payloads –  
up to 50 kg

# It's in our DNA

FANUC's line of cobots have a distinct heritage, displaying the same trademark intelligence and reliability that have been the backbone of our traditional yellow robots for decades!

Such proven FANUC technology includes certification according to IP67 and ISO standards, but also safety features such as our Dual Check Safety (DCS) software which helps keeping operators, cobots, and tooling completely safe.

Whether third-party connectivity or life-time support for your devices – when it comes to automation, FANUC truly is your "one stop shop" for advanced hardware and software technologies. Look no further: Benefit from working with one supplier to streamline the entire process!



# MORE collaborative opportunities with FANUC cobots

## Key Industries



AUTOMOTIVE



LOGISTICS



PHARMACY



FOOD



TIER1



**ASSEMBLING**  
Cobots are ideally suited to take over repetitive or complex assembly tasks while delivering a precise and consistent output.



**GRINDING AND DEBURRING**  
Tasks which involve removing material can easily be carried out by cobots, adding flexibility, efficiency, and quality to the process.



**HANDLING**  
FANUC Vision and Force accessories can quickly be connected to cobots so as to cover a variety of different handling operations.



**MACHINE TENDING**  
When it comes to repetitive operations such as machine tending, cobots help improve your process speed and quality while at the same time keeping operators safe.



**PARTS INSPECTION AND TESTING**  
Easy to program, FANUC cobots can carry out inspecting operations while assuring accurate production batches and product quality.



**PICKING, PACKING, PALLETISING**  
The payloads and reaches of FANUC cobots make them suitable to a wide range of handling tasks, relieving operators from heavy lifting.



**SANDING AND POLISHING**  
Equipping cobots with FANUC Force Sensor assures the precision and correct force needed for these kinds of operations.



**SCREWING**  
FANUC cobots can be used in screw driving applications with a tightening torque up to 200Nm (M16) – for higher consistency and quality.



**SEALING AND DISPENSING**  
Dispensing tasks like gluing and sealing can be efficiently carried over by cobots.



**WELDING**  
FANUC cobots are capable of offering consistent weld quality, on top of being easy to teach and program.

# MORE versatility and MORE precision

## Key Features - CRX Series

### INTEGRATION

Integration has never been easier thanks to our cobots' lightweight, slim, and compact design.

### USABILITY

Ready for business in no time: the FANUC CRX series is quick to set up and exceedingly easy to program.

### SERVICE

Enjoy 8 years of maintenance-free operations.

### LIGHT TOUCH

By default, every CRX device is equipped with FANUC's Force Sensor - for the ultimate in tactile precision.

### REPEATABILITY

Repeatability up to +/- 0.03 mm to repeat the same movement multiple times at the exact same dexterity.

**8 YEARS  
ZERO  
MAINTENANCE**

## Key feature - CR Series

### STRONGEST COBOT ON THE MARKET

With a payload up to 50 kg, the FANUC CR-35iB is by far the strongest cobot on the market today. Its combination of load capacity, extensive reach, and dependable safety certification make it ideally suited for an extensive spectrum of processes involving heavy lifting and handling.



#### CRX-5iA

Payload: 5 kg  
Reach: 994 mm

#### CRX-10iA

Payload: 10 kg  
Reach: 1249 mm

#### CRX-10iA/L

Payload: 10 kg  
Reach: 1418 mm

#### CRX-20iA/L

Payload: 20 kg  
Reach: 1418 mm

#### CRX-30iA

Payload: 30 kg  
Reach: 1756 mm

#### CR-35iB

Payload: 50 kg  
Reach: 1831 mm

# MORE hygiene MORE safety for food processing

## Key Features

### FOOD APPLICATION SPECIALIST

Avoid the risk of contamination with NSF-H1 food grade grease. Benefit from a design with a white epoxy coating, rust/chemical resistant plating and IP67 rating.

### DUST-TIGHT AND WATERPROOF

Work in areas prone to water splashes or dampness – most standard cobots are unable to withstand wet environments without compromising safety.

### LIGHT TOUCH

By default, every CRX device is equipped with FANUC's force sensing technology – for the ultimate in tactile precision.

### REPEATABILITY

Repeatability up to +/- 0.05 mm to repeat the same movement multiple times at the exact same dexterity.



#### CRX-5iA Food

Payload: 5 kg  
Reach: 994 mm



#### CRX-10iA Food

Payload: 10 kg  
Reach: 1249 mm



#### CRX-10iA/L Food

Payload: 10 kg  
Reach: 1418 mm



#### CRX-20iA/L Food

Payload: 20 kg  
Reach: 1418 mm



#### CRX-30iA Food

Payload: 30 kg  
Reach: 1756 mm

# EASY programming

Whether you are a seasoned programmer or a first-time operator – FANUC robots provide you with user-friendly and intuitive programming. Furthermore, you can also select:

## Easy programming with Tablet Teach Pendant

- FANUC's Tablet Teach Pendant is designed for intuitive programming, thanks to a large touch screen. Wi-Fi connectivity comes as standard.
- Additional drag & drop functionality lets you easily program an application within minutes
- Two interfaces are available:
  - New User Interface for beginners
  - iPendant User Interface for experienced operators

## Easy programming with iHMI on iPendant Touch

- FANUC's iHMI user interface offers ample processing power and clear high-resolution screen displays.
- Display setup, programming guides and tutorials are all readily accessible from the main home screen.
- 30 minutes – that's all it takes to create a program for simple handling tasks, thanks to FANUC's programming guide.

# EASY teaching without programming



By leading it through paths and points, you can now easily teach your FANUC collaborative robot. Additionally, hand guidance is comfortable and intuitive, thereby eliminating the need for a pendant to teach the device positions. This will not only save you valuable time, but also money – as training costs can therefore be kept to a minimum.

While the CRX series was designed with manual guidance in mind, the CR series was built for heavier applications, and therefore requires a separate hand guidance model.



New user interface



iPendant user interface



# MORE control MORE features

More than 140 software features, FANUC's latest R-30iB Plus controller guarantees the best processing speed and robot performance for every FANUC cobot. Designed for increased user-friendliness and minimal energy consumption, the R-30iB Plus comes in different cabinets to help you make the most of your floor space and production cell layouts.



## Ultimate Versatility

With the CRX series you can work in palletising mode and move linear through singularity. This gives you the flexibility to operate it as a fully-fledged palletising robot.

# MORE efficiency MORE flexibility

FANUC ROBOGUIDE is an offline simulation package that simulates both the robot's motion and application commands, significantly reducing the time it takes to create new motion setups.

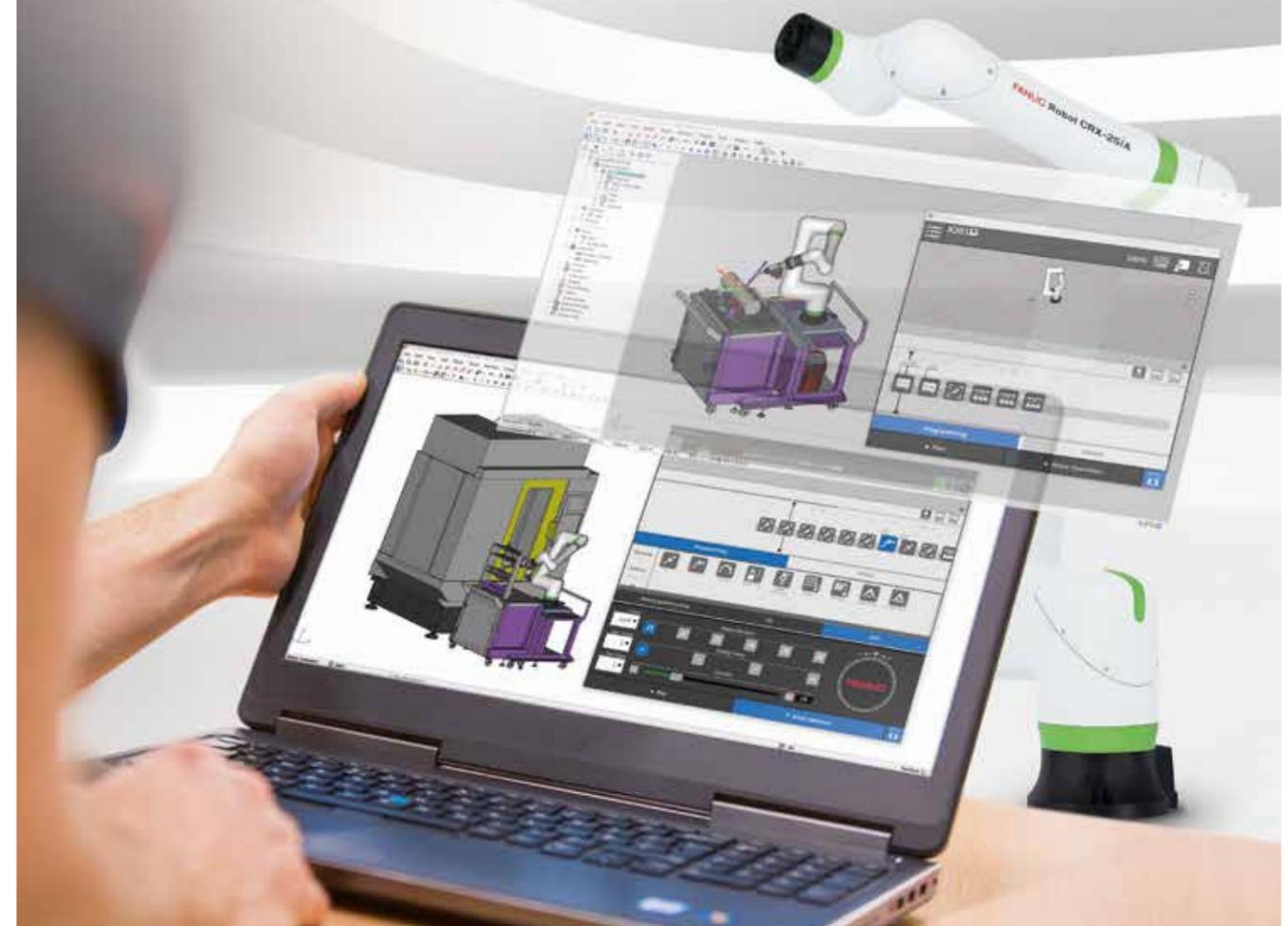
## Advantages

FANUC ROBOGUIDE allows you to:

- Evaluate cells and cycle times without downtimes
- Save time thanks to the pre-programming feature
- Set up and test complex systems

Furthermore, ROBOGUIDE offers specific functions to be used to simulate certain applications:

- HandlingPRO  
Simulate and test material handling processes
- WeldPRO  
Simulate a robotic arc welding process
- PalletPRO  
Build, debug, and test a palletising application

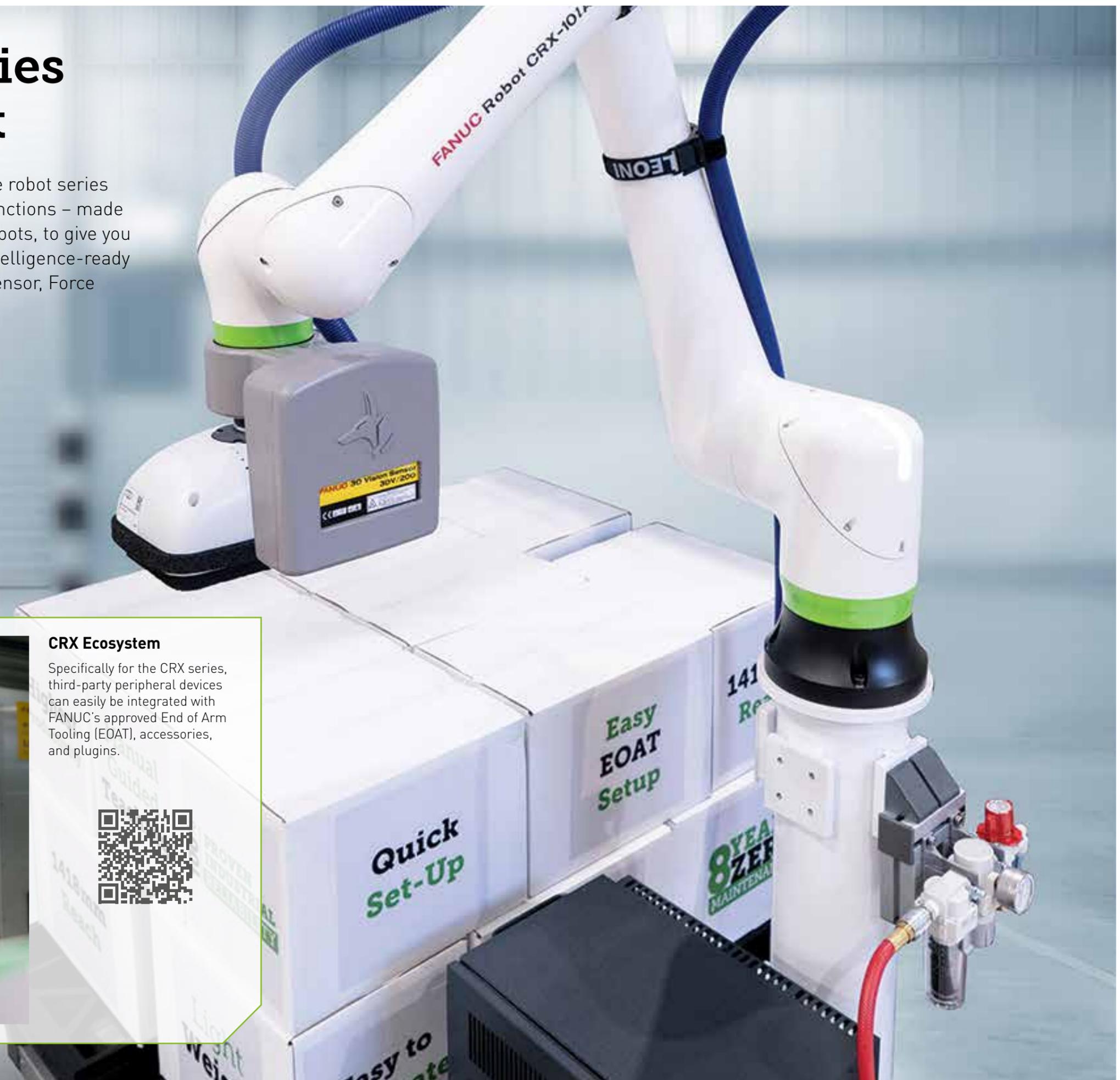


# **MORE** possibilities **EASY** to connect

As with all of our robots, FANUC's collaborative robot series can be equipped with any of our intelligence functions – made by FANUC and developed specifically for our robots, to give you more possibility for automation with cobots. Intelligence-ready functions include FANUC *i*RVision, 3D Vision Sensor, Force Sensors and many more.

## **CRX Ecosystem**

Specifically for the CRX series, third-party peripheral devices can easily be integrated with FANUC's approved End of Arm Tooling (EOAT), accessories, and plugins.



# MORE information

# Technical data

Specifications	CRX-5iA	CRX-10iA	CRX-10iA/L
Type: articulated	•	•	•
Controlled axes	6	6	6
Max. load capacity at wrist [kg]	5	10	10
Reach [mm]	994	1249	1418
Repeatability [mm] *5)	± 0.03	±0.04	±0.04
Mass [kg]	25	40	40
Installation: floor   upside down   wall	•   •   •	•   •   •	•   •   •
<b>Motion range</b>			
J1 axis rotation [°]	400	380	360
J2 axis rotation [°]	360	360	360
J3 axis rotation [°]	635	570	540
J4 axis wrist rotation [°]	380	380	380
J5 axis wrist swing [°]	360	360	360
J6 axis wrist rotation [°]	450	450	450
Max. speed [mm / s]*2)	1000*1)	1000*1)	1000*1)
<b>Allowable load moment at wrist</b>			
J4 axis [Nm]	19.0	34.8	34.8
J5 axis [Nm]	15.4	26.0	26.0
J6 axis [Nm]	6.7	11.0	11.0
<b>Allowable load inertia at wrist</b>			
J4 axis [kgm <sup>2</sup> ]	0.77	1.28	1.28
J5 axis [kgm <sup>2</sup> ]	0.50	0.90	0.90
J6 axis [kgm <sup>2</sup> ]	0.10	0.30	0.30
<b>Installation environment</b>			
Acoustic noise level [dB]	<70	<70	<70
Ambient operating temperature [°C]	0-45	0-45	0-45
<b>Protection</b>			
Body standard/optional	IP67	IP67	IP67
Wrist & J3 arm standard/optional	IP67	IP67	IP67
Cleanroom class	• (ISO Class 4)*3)	• (ISO Class 2)*3)	• (ISO Class 3)*3)
<b>Food grade / mechanical options</b>			
Food grade grease	• *4)	• *4)	•
White epoxy paint	•	•	•

• standard

\*1) 2000mm/s in high speed mode

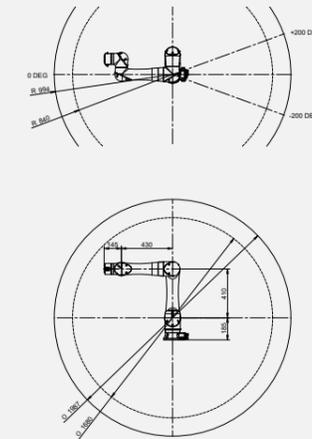
\*2) During short distance motions, the speed may not reach the maximum value stated

\*3) Not with food grade option

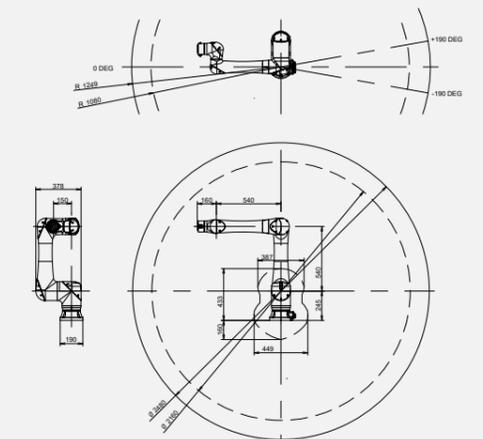
\*4) Food grade grease for all axes

\*5) Based on ISO9283.

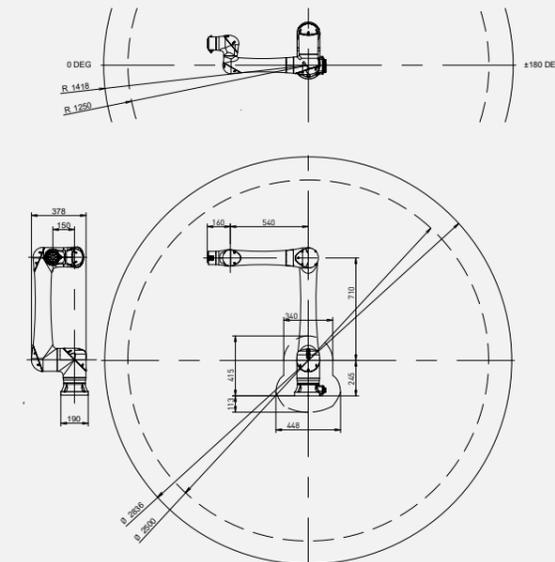
Working range CRX-5iA



Working range CRX-10iA



Working range CRX-10iA/L



# MORE information

# Technical data

Specifications	CRX-20iA/L	CRX-30iA	CR-35iB
Type: articulated	•	•	•
Controlled axes	6	6	6
Max. load capacity at wrist [kg]	20	30 [25] *5)	35/50
Reach [mm]	1418	1756 (1889)	1831 (1643)
Repeatability [mm] *8)	±0.04	± 0.05	±0.03
Mass [kg]	41	135	386
Installation: floor   upside down   wall	•   •   •	•   •   •	•   -   -
<b>Motion range</b>			
J1 axis rotation [°]	360	360	370
J2 axis rotation [°]	360	360	215
J3 axis rotation [°]	540	540	338
J4 axis wrist rotation [°]	380	380	400
J5 axis wrist swing [°]	360	360	280
J6 axis wrist rotation [°]	450	450	900
Max. speed [mm / s] *2)	1000	1000 *1)	750 *6)
<b>Allowable load moment at wrist</b>			
J4 axis [Nm]	70.0	115.0 (100.0) *5)	110.0 *7)
J5 axis [Nm]	64.0	85.0	110.0 *7)
J6 axis [Nm]	30.0	32.0	60.0 *7)
<b>Allowable load inertia at wrist</b>			
J4 axis [kgm <sup>2</sup> ]	4.00	4.70 *5)	4.00 (10.80) *7)
J5 axis [kgm <sup>2</sup> ]	4.00	4.00	4.00 (10.80) *7)
J6 axis [kgm <sup>2</sup> ]	2.00	2.00	1.5 (4.40) *7)
<b>Installation environment</b>			
Acoustic noise level [dB]	<70	<70	< 70
Ambient operating temperature [°C]	0-45	0-45	0-45
<b>Protection</b>			
Body standard/optional	IP67	IP67	IP54
Wrist & J3 arm standard/optional	IP67	IP67	IP67
Cleanroom class	• (ISO Class 3) *3)	• (ISO Class 2) *3)	-
<b>Food grade / mechanical options</b>			
Food grade grease	• *4)	• *4)	-
White epoxy paint	•	•	-

• standard

\*1) 2000mm/s in high speed mode

\*2) During short distance motions, the speed may not reach the maximum value stated

\*3) Not with food grade option

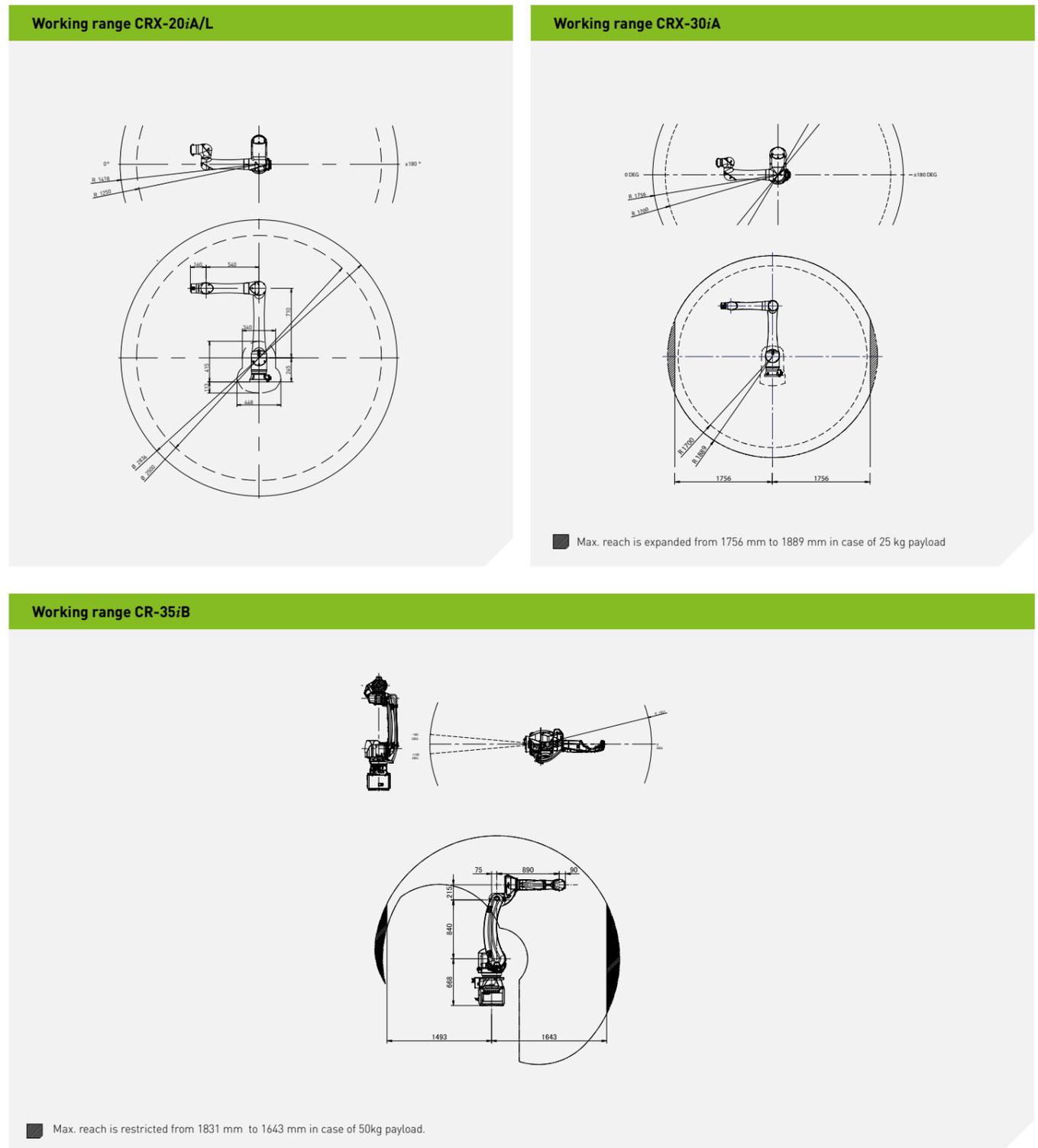
\*4) Food grade grease for all axes

\*5) In case of 25 kg payload

\*6) It is necessary to set a motion speed according to risk assessment of system considering pinching with the surroundings.

\*7) In case of 50 kg payload

\*8) Based on ISO9283



# MORE confidence

With FANUC, you benefit from efficient FANUC service worldwide. Wherever you need us, our comprehensive FANUC network provides sales, support and customer service all around the world. That way, you can be sure you have always got a local contact that speaks your language.



More than  
**99%**  
spare parts availability

**24/7**  
support \*1

  
**ONE.FANUC.EU/SERVICE**

**Lifetime OEM spare parts**  
As long as your machine is in service we are able to provide you with original spare parts.



**Efficient training**  
The FANUC Academy offers everything you need to upskill your teams and increase productivity – from introductory programs for beginners to courses tailored to the needs of expert users and specific applications.

**Service First** 

\*1 Service is available as a contractual option for selected markets.

# One common servo and control platform – Infinite opportunities THAT'S FANUC!



## **FA**

CNCs,  
Servo Motors  
and Lasers

## **ROBOTS**

Industrial Robots,  
Accessories  
and Software

## **ROBOCUT**

CNC Wire-Cut  
Electric Discharge  
Machines

## **ROBODRILL**

Compact  
CNC Machining  
Centres

## **ROBOSHOT**

Electric CNC  
Injection Moulding  
Machines

## **IoT**

Industry 4.0  
solutions