

# QRB Series Chuck w/ Built-in Compliance Device

## Automatic Alignment Function with Overload Prevention Function

### Key Features

- Light-weight and compact resin body
- Overload can be detected based on total and lateral load in handling position
- Simple structure with cost in mind
- Selectable 2-jaw or 3-jaw gripper



QRB-0.5AS

### How To Order

Standard ----- QRB-0.5A

Option ----- QRB - 0.5A S - J2 - ET3LS2 - Z

QRB-0.5A with 2-jaw gripper with overload detection sensors and 2 of ET3L non-contact reed switches, and specially treatment is made on the model.

Size	
Symbol	Name
0.5A	

Sensor	
Symbol	Name
S	Overload Detection Sensor

Gripper Specification	
Symbol	Name
J2	2-Jaw
No Symbol	3-Jaw

Sensor, Quantity	
Symbol	Name
ET3L	Non-Contact 3-Lead
S1	1 Sensor
S2	2 Sensors

Option	
Symbol	Name
Z	Special Type (Custom)

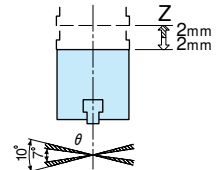
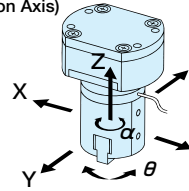
For sensor detail ▶ 277P

For option detail ▶ 36P

## Specification

Model		QRB-0.5A	QRB-0.5A-J2
Supported Chuck Model		CKL-20AS	CKL-20AS-J2
Ambient Temperature (°C)		5 to 60	
Moving Distance	X-Y Direction	±1mm	
	Twisting Direction ( $\alpha$ )	±3°	
	Compliance Angle ( $\beta$ )	±5°	
	Buffer Stroke (Z)	4mm	
Repeatability	X-Y Direction	±0.15	
	$\alpha, \theta$ Angle	±0.3°	
Overload Detection Reaction Coverage	$\theta$	Please refer to the figure on the right	
	Z	Please refer to the figure on the right	
Overload Detection Sensor Model		E2EC-CR8D1 (OMRON)	
Payload Limit		0.4kg (centering return load capacity)	
Buffer Load	At Stroke 0	2kgf	
	At Maximum Stroke	2.8kgf	
Mount Position		Gripper facing down & Body mounted in horizontal direction	
Weight		0.11 kg + 0.12 kg (gripper weight)	

(Motion Axis)



※ Load Detection Reaction Range

Note 1: Please refer to general catalogue for specifications of the gripper and open/close confirmation sensors.  
 Note 2: Please use soft materials (polyurethane, etc.) for air piping to avoid blocking the centering force.

## Layout Drawing

For CAD data, please go to [▶518P](#)

### QRB-0.5A

QRB-0.5A Standard • J2

#### J2 Specification

