### **Controllers for RVF and RHF Series**







# Controller Specifications

Model Number		CR750-Q • CR750-D	CR751-Q • CR751-D	CR760-Q • CR760-D
Robot CPU		FQ Series: Q172DRCPU (Included with FQ Series robots) FD Series: Built-in		
Path Control Method		PTP control and CP control		
Number of Axes Controlled		Maximum 6 axes		6 axes + additional 8 axes available
Robot Language		MELFA-BASIC IV/V		
Position Teaching Method		Teaching method, MDI method		
Memory Capacity	Number of Teaching Points	FQ Series: 13,000; FD Series: 39,000		13,000
	Number of Steps	FQ Series: 26,000; FD Series: 78,000		26,000
	Number of Programs (Unit)	FQ Series: 256; FD Series: 512		256
External Input/ Output (Points)	General-Purpose I/O	FQ Series: 8192 input points/8192 output points with the multiple CPU common device. FD Series: 0 input/0 output (Up to 256/256 when options are used)	FQ Series: 8192 input points/8192 output points with the multiple CPU common device. FD Series: 0 input/0 output (Up to 256/256 when options are used) RHCH Series: 32/32 (2D-TZ368 included)	0 input/0 output
	Dedicated I/O	FQ Series: Assigned to multiple CPU common device; FD Series: Assigned to general-purpose I/O	FQ Series: Assigned to multiple CPU common device; SD Series: Assigned to general-purpose I/O.	Assigned to general-purpose I/O
	Hand Open/Close	8 Input / 8 Output (Excludes RHCH models)		16 input / 16 output
	Emergency Stop Input	1 (redundant)		
	Door Switch Input	1 (redundant)		
	Enabling Device Input	1 (redundant)		
	Emergency Stop Output	1 (redundant)		
	Mode Output	1 (redundant)		
	Robot Error Output	1 (redundant)		
	Sync.of Additional Axes	1 (redundant)		
Interface	RS-232	-		FQ Series: 1; FD Series: Use the functio of the programmable controller
	RS-422	1 (Teaching pendant: dedicated T/B)		
	Ethernet	FQ Series: 1 (dedicated teaching pendant port) 10BASE-T FD Series: 1 (dedicated teaching pendant port), 1 (for customer) 10BASE-T/100BASE-TX		
	USB	FQ Series: 1 (USB port of programmable controller CPU unit can be used) FD Series: (Ver. 2.0 device functions only, mini B terminal)		FQ Series: Use the function of the programmable controller; FD Series: 1
	Hand Dedicated Slot	1 (dedicated for pneumatic hand interface)		_
	Additional-Axis Interface	1 (SSCNET III)		
	Extension Slot (*1)	FQ Series: N/A (Expansion located on iQ backplane) ; FD Series: 2		FQ Series: Use the option of the programmable controller; FD Series: 3
	Encoder Input (Channels)	FQ Series: Q173DPX (sold separately); FD Series: 2		FQ Series: Use the option of the programmable controller; FD Series: 2
	Memory Extension Slot	<u>-</u>		FQ Series: -; FD Series: 1
Ambient Temperature (°C)		FQ Series: 0 to 40 (drive unit) / 0 to 55 (Robot CPU); FD Series: 0 to 40		0 to 40
Relative Humidity (%RH)		45 to 85		
Power Supply (*5)	Input Voltage Range (V) (*2)	RV: 2F/4F/7F/13F/20F, RH:1FHR/3CH/3FH/3FHR/6CH/6FH/12FH/20FH Single-Phase AC 200V to 230V		RV35F/50F/70F: Three-phase AC 180V to 253V
	Power Capacity kVA (*3)	RV2F, RH3FH/RH3CH/RH6CH: 0.5; RV4F, RH6FH: 1.0; RH1FHR/RH12FH/20FH: 1.5; RV7F: 2.0; RV7FLL/13F/20F: 3.0		RV-35F/50F/70F: Maximum : 20
External Dimensions (Including Legs) (W x D x H) mm		430 x 425 x 174	430 x 425 x 98; 430 x 425 x 174 (*6)	670 x 415 x 700
Weight (kg)		Approx. 18	Approx. 12 / Approx. 18 (*6)	Approx. 120
Structure (Protective Specification)		Self-contained floor type/open structure (Vertical and horizontal position can be placed) (IP20)		Self-contained floor type/sealed structure (IP54)
Grounding $\Omega$ (*4)		100 or less (class D grounding)		

#### Notes:

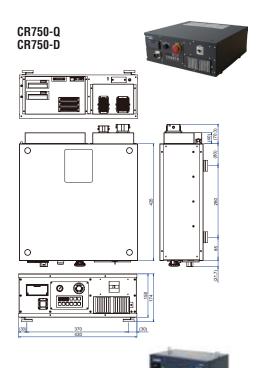
- 1. For installing option interface.
  2. The rate of power-supply voltage fluctuation is within 10%.
  3. The power capacity indicates the rating for normal operation. Take note that the power capacity does not include the current being input when the power is turned on. The power capacity is only a rough guide
- and whether or not operation can be guaranteed depends on the input power-supply voltage.

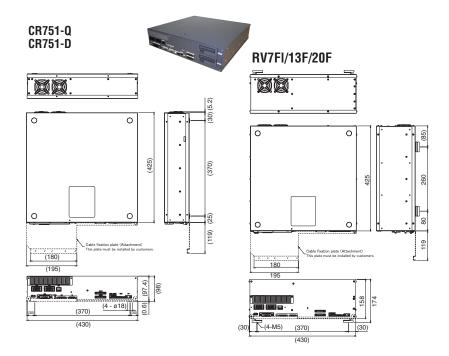
  4. Grounding works are the customer's responsibility.

  5. For CR751, crimp or solder wiring for connection to user wiring connectors for emergency stop input/output, door switch input, etc. and power supply connectors. The optional terminal block replacement tool available separately can also be used to connect wiring.

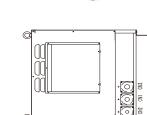
  6. For RV7FLL/13F/20F

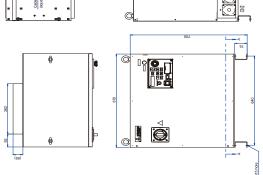
# **Controllers RVF and RHFH Series**

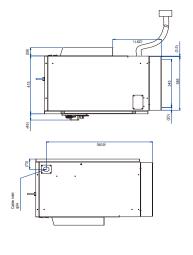












### Multiple CPU Environment

Апом А

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Unit	Туре		
Base	High-speed standard base between multiple CPU • Q35DB: 5 slots • Q38DB: 8 slots • Q312DB: 12 slots		
Power Supply	Q61P, Q62P, Q63P, Q64PN		
Programmable Controller CPU	Universal model (CPU that can transmit by multiple CPU high speed transmission)  • Q03UD(E)CPU  • Q04UD(E)HCPU  • Q10UD(E)HCPU  • Q13UD(E)HCPU  • Q26UD(E)HCPU  • Q26UD(E)HCPU  • Q26UD(E)HCPU  • Q26UD(E)HCPU		

