

## New control "MELFA High Drive" realize higher speed and higher accuracy! **MELFA FR** SERIES

### Shorter cycle time

➤ **Cycle time improved by 30% maximum by shortening the settling time\***

- Residual vibration is suppressed during positioning by applying the vibration suppression algorithm.
- Operation stops right at the target position.

### Adjust the robot's trajectory accuracy

➤ **Trajectory accuracy improved by 80% maximum by our proprietary control\***

- Work quality is greatly improved for operations such as sealing and processing that require priority on trajectory accuracy.
- Teaching is easier because trajectory changes are small even if the speed changes.

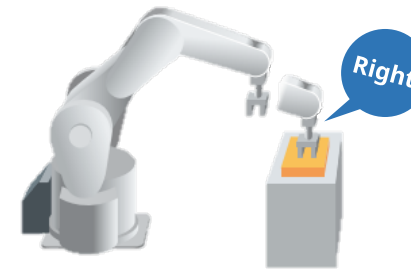
### Easier robot system layout

➤ **Reduced speed and accuracy variations in about 70% of the robot operating range\***

- Reduction in speed and accuracy variations that occur when the layout is changed.
- The layout consideration time and the setup time are significantly shortened.

\* The results are obtained using our in-house operation patterns.

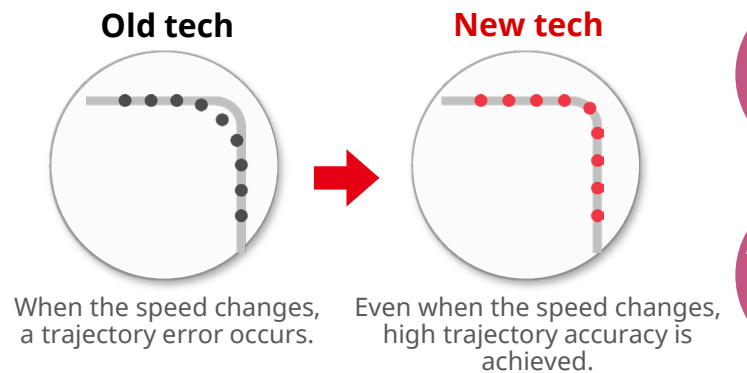
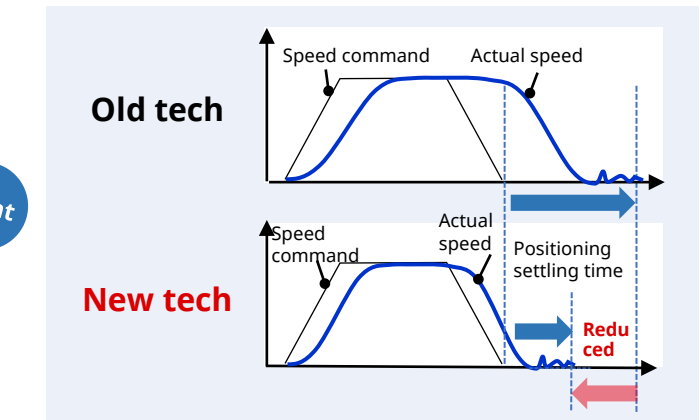
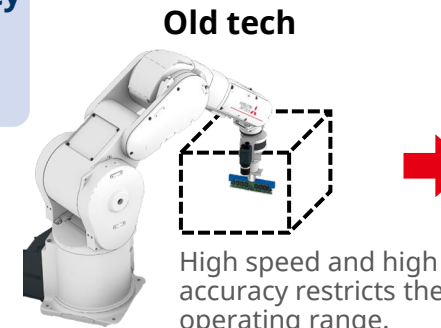
Settling time  
reduced by 30%  
max.



Trajectory accuracy  
improved by 80%  
max.



Speed and accuracy  
improved for the  
entire range of  
robot movement



- Anti-sway
- Cycle time reduction
- Trajectory accuracy improvement
- Adjustment time reduction

# Industrial Robots : MELFA FR series

## Concept

Advanced intelligence helps perform tasks with high accuracy, support e-F@ctory, promote human-robot collaboration, and next-generation manufacturing.

### Three concepts provided by the MELFA FR series

#### Intelligence

[Next-generation intelligence]



Improved basic performance and advanced intelligent technology facilitates line introduction and the automation of high-precision tasks.

#### Integration

[FA-IT integration]



Factories are smartened with e-F@ctory through interaction with our FA products.

#### Safety

[Safe, collaborative work applications]



Enhanced safety functions support human-robot collaboration and further production improvement.

## Product lineup

(Schedule to be determined)

**MELFA FR**  
SERIES

**NEW!**

Vertical articulated robot	FR PLUS		FR PLUS		FR PLUS			FR PLUS		FR PLUS			
Model	RV-2FR	RV-2FRL	RV-4FR	RV-4FRL	RV-7FR	RV-7FRL	RV-7FRL	RV-13FR	RV-13FRL	RV-20FR	RV-35FR	RV-50FR	RV-80FR
Maximum load capacity	3kg		4kg		7kg			13kg		20kg	35kg	50kg	80kg
Reach	504mm		515mm										
		649mm		649mm									
					713mm								
						908mm		1094mm		1094mm			
Horizontal articulated robot													
Model	RH-3FRH		RH-6FRH		RH-12FRH		RH-20FRH		RH-3FRHR				
Maximum load capacity	3kg		6kg		12kg		20kg		3kg				
Reach	350mm / 450mm / 550mm		350mm / 450mm / 550mm		700mm / 850mm		850mm / 1000mm		350mm				
	120mm / 150mm								120mm / 150mm				
Z Stroke					200mm								
					340mm		350mm						
							450mm						