

BFP-A6079-0403E

Announcement: Intelligence and AI functions Standard Installation

■ Issued
February 2026

■ Applicable Model
MELFA FR Series, MELFA CR Series , MELFA Assista Series

We would like to express our gratitude for your patronage of MELFA, a Mitsubishi Electric industrial robot. Various intelligence and AI functions of MELFA Smart Plus, except predictive maintenance, have been included as standard since software version E4.

This allows you to use various functions without the MELFA Smart Plus card/card pack.
For instructions on usage, please refer to the operation manuals for each function.
Revised editions of the relevant manuals and catalogs will be provided progressively.

1. Contents

The MELFA Smart Plus card function, which has been available since the FR series was launched, is now standard on the robot controller.

Customers who have been using conventional cards can now take advantage of the experience they have gained in using these cards, making setup and operation even more convenient. This further enhances the added value of the MELFA series and provides greater flexibility in using functions that are tailored to your needs.

For details, refer to the manual of each function as before.
Revised versions of related manuals and catalogs will be released in due course.



Table 1.1 Comparison before and after E4 release

	Smart Plus Features	After E4 Release	Before E4 Release
AI Function	predictive maintenance function	Supported by iQ Care MELFA Support (no change)	
	force sensor extension	Card not required Available for	MELFA Smart Plus Card/Card Pack Required (2F-DQ5xx)
	MELFA-3D Vision Enhancements		
intellectualization Function	preventive maintenance function		
	2D Vision Sensor Enhancements		
	calibration support function		
	additive axis cooperative control		
	Robot mechanism temperature compensation function		

MELFA
Smart Plus

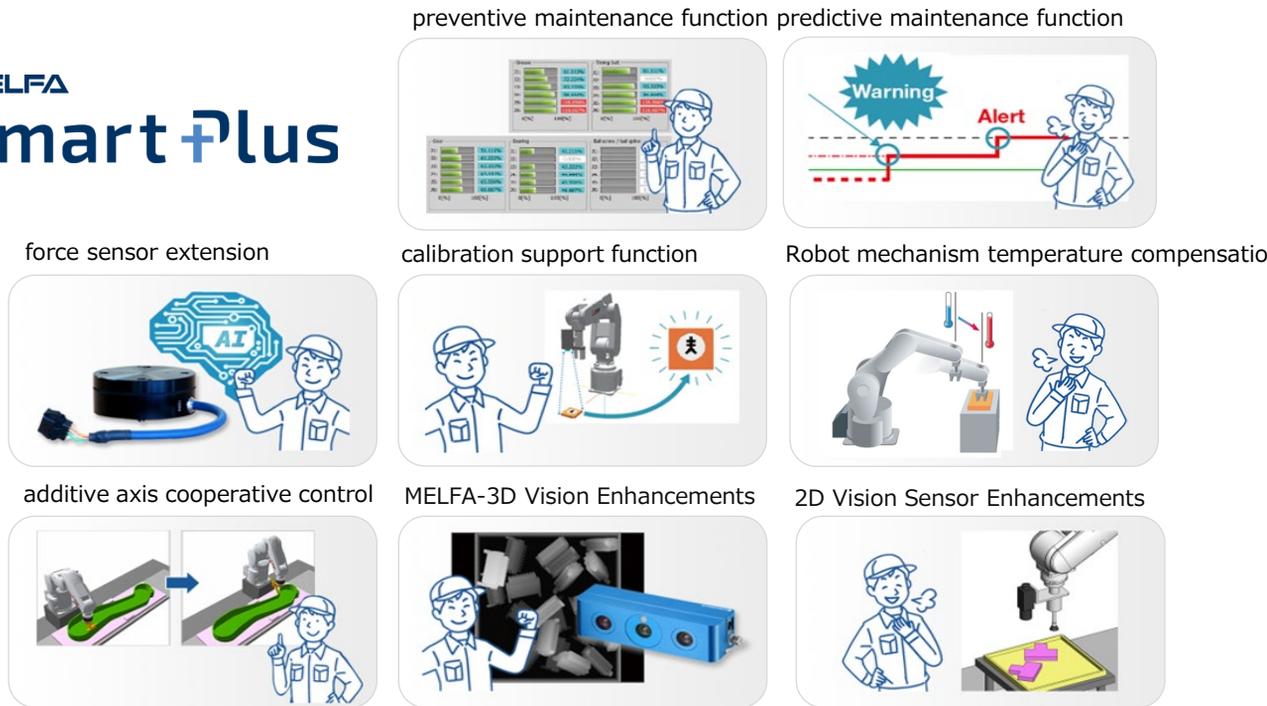


Table 1.2 MELFA Smart Plus Feature Summary

Smart Plus Features		Summary
AI Function	predictive maintenance function	Detecting abnormalities in drivetrain components before signs of abnormalities appear in robot behavior
	force sensor extension	Fast, iterative learning to generate optimal operating parameters
	MELFA-3D Vision Enhancements	Automatic parameter adjustment reduces start-up time
intellectualization Function	preventive maintenance function	Health tracking to manage robot health
	2D Vision Sensor Enhancements	Easily launch a variety of vision applications
	calibration support function	<ul style="list-style-type: none"> • automatic calibration Automatically corrects vision sensor coordinates to improve positioning accuracy • work coordinate calibration Automatic correction of robot and work coordinates by vision sensor Improves position accuracy by performing target • inter-robot relative calibration Automatic position correction between multiple robots by vision sensor Improved positioning accuracy during cooperative operation
	additive axis cooperative control	Machining and assembly with specified speed is realized by linking the robot with the running platform.
	Robot mechanism temperature compensation function	Improving Positional Accuracy by Correcting Thermal Expansion of Robot Arm