# Upgrade Information of MPE720 Version 7.44 Lite

# **1. Added and Improved Functions**

# 1.1 Version 7.44 Lite Upgrade Information

Items added and features improved from MPE720 version 7.43 Lite to version 7.44 Lite are as follows.

No.	Feature	Classification
1	The number of monitor data could be established in real time trace and XY trace.	Improvement
2	Supported the function that indicate and choose the unallocated axis in the library	Improvement
2	function.	
3	Improved the watch function.	Improvement
4	The operation which adds a register from a program editor screen to the trace was	Improvement
4	improved.	
5	It became possible to export a property information of program.	Improvement
6	Indication of status of transfer function was improved.	Improvement
7	Improved the processing of real time trace when the scan time is unmatch.	Improvement
8	Improved the Initiation method of detail definition in a module configuration	Improvement
0	definition.	
9	Improved the input of a search variable of a project search.	Improvement
10	Improved the internal process of a motion program.	Improvement
11	Improved the contents of the error message when logging starts.	Improvement
12	Improved the indication of printing the ladder editor.	Improvement
13	Improved the compilation processing in an Expression instruction.	Improvement
14	Improved the compilation processing in a motion program.	Improvement
15	Improved the display processing in a CP ladder.	Improvement
16	Improved the indication of reserved words of an Expression instruction.	Improvement
17	Improved the processing of operand input of a ladder editor.	Improvement

#### 1.2 Past Upgrade Information

No.	Upgrade Information	Remarks
1	MPE720 version 7.42 Lite upgrade information	version 7.41 $\rightarrow$ version 7.42
2	MPE720 version 7.43 Lite upgrade information	version 7.42→version 7.43

# 2. Description

# No. 1 The number of monitor data could be established in real time trace and XY trace.

The number of trace data collected at the operation of rereading or a trace stop in real time trace and XY trace can be established.

We added the screen item on the tool bar of a screen for setting the trace data collected.

Real time trace screen				
⇒ Tra	ce Data Setting 🗦 👉 Sampling&Trigger Setting 🔶	Start Trace Read Again Monitor data No.	Al data 🔹 📝 Real Time Display	/ 🗷 Enable ServoTrace
XY trace screen				
- मिन्न Trac	ce Data Setting 🗦 🕹 Sampling&Trigger Setting 🗦 🕽	Start Trace Read Again Monitor data No.	All data 🔹 🗹 Real Time Display	Enable ServoTrace
List				
	Read Again	Monitor data No.	All data	•

A status bar was added, and the number of results of the collected trace data and trace execution status will be indicated.

No. of monitored data:04252 Stopped

[Support Version]

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Controller	Support Firmware Version
Σ-7C	It is not dependent on the version.
MP2400	It is not dependent on the version.

#### No. 2 Supported the function that indicate and choose the unallocated axis in the library function.

It became possible to choose display/nondisplay unallocated axis in a configuration definition package making Wizards :: axis page, and it became possible to choose an unallocated axis as a target axis.

Create Configuration D	efinition Library	
∵≣ Se	lection of Axis to Use	
Basic Information Ann Creation Report	Copyr protocol fun     The Copyr protocol fun     Second State and Stat	
	Stophermannen     Stopher	
	Currel AnsRegitabuse     Control AnsRegitabuse	
	Const Anthropolitani     Const Anthropolitani     Const Anthropolitani     Const Anthropolitani     Const Anthropolitani     Transaction and Anthropolitani      Entra Society	
		tas Nastr Complete Cancel

It became possible to indicate and choose an unallocated axis in a making project Wizards:: axis page.

Avers in Base Project	Allocated Aven	Anno in Configuration 1
# BIC		<ul> <li>TVC : Serve defined</li> </ul>
STM01.60D/%-****20*		<ul> <li>EVCI2 : NexClarge</li> </ul>
STMS2/SOD/%-****20*		<ul> <li>Multiple aves</li> </ul>
<ul> <li>STREESODY</li></ul>		Challocated
<ul> <li>STR04/SODV2"-SAC Input Under Childle</li> </ul>		<ul> <li>ION</li></ul>
<ul> <li>STRESSORY</li></ul>		- VDL
<ul> <li>STROESODV</li></ul>		the second
STACT SOC 75-*** 20*		<ul> <li>Uniformed.</li> </ul>
STHORSONTS		
STM04/S0075-****20*		
STM3050075-***30*		
- 16 SA		
<ul> <li>STAD:</li> </ul>		
S1402		
-#S7408		
SMA		
STATS		
S1406		
<ul> <li>Sheph</li> </ul>		
S1406		
S1409		
\$19430		
S2415		
STA12		
S243		
S204		
- S242b		
S1X26		

# [Support Version]

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## No. 3 Improved the watch function.

(1) The setting of a watch can be imported/exported.It's possible to choose the following item from a pop-up menu on the watch screen and use the export/import function.

'Export'

'Import'

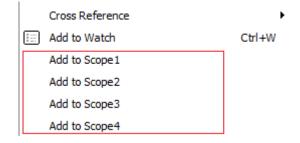
- X It was the menu for export/import of register data in Ver.7.43, but it'll be change from MPE720 Ver7.44.
- (2) The upper limit of the number of a registration variable/register of the watch was made 200.

[Support Version]

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#### No. 4 The operation which adds a register from a program editor screen to the trace was improved.

The ladder program and the motion program prepared the menu to specify the trace number as the pop-up menu.



An addition destination will be real time trace only. It is possible that additional operation concludes without the choosing dialog of the trace number and the trace kind being indicated.

At the following choice state, the trace can be added to operate more than one register at once about a ladder program.

- \* Operand: existence movement
- \* Device: A register of all operands in the device is a target.
- \* Rung: A register of all operands of the whole devices in Rung is a target.
- \* More than one devices/Rung: A register of the operand in the area is a target.

At the following choice state, the trace can be added to operate more than one register at once about a motion program.

 $\ast$  Area no selection: adds the all register which exists in the cursor line.

\* Area selection: adds the all register included in the character string.

[Support Version]

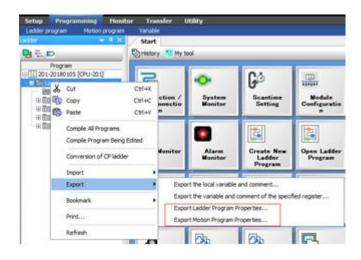
Controller	Support Firmware Version
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#### No. 5 It became possible to export a property information of program.

It became possible to export a property information of program.

It's possible to execute the export function from a pop-up menu of a ladder window or a motion window.

- \* Export of a property information of a ladder program.
- \* Export of a property information of a motion program.



When the menu is chosen, it's possible to choose the property item to export and execute an export.

[Ladder]	[Motion]
Column Display	
Property	Motion Display Property
V No. of Steps	<b>Column Display</b> √ Program No.
V Modified Other	Program Lines  Privlege
Tuning Panel	V Modified
OK Cancel	Carlos

#### [Support Version]

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#### No. 6 Indication of status of transfer function was improved.

The transfer processing became to be executed every one axis, and the percentage of transferred parameter of each axis is indicated.

//Start/
X Revisteri

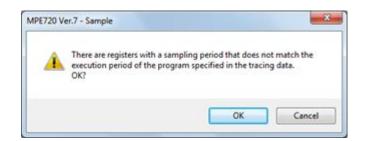
#### [Support Version]

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Σ-7C	It is not dependent on the version.		
MP2400	It is not dependent on the version.		

#### No. 7 Improved the processing of real time trace when the scan time is unmatch.

When the scan time of the D register of a trace target discorded with the sampling time of 'sampling and the trigger' setting in real time trace, it became possible to begin the trace by displaying a warning message.

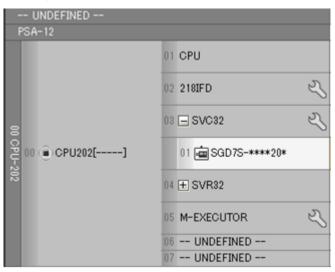


[Support Version]

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#### No. 8 Improved the Initiation method of detail definition in a module configuration definition.

Detail definition can be started by clicking a detail definition icon as well as a conventional way.



#### [Support Version]

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# No. 9 Improved the input of a search variable of a project search.

There was a phenomenon which can't input a long character string in an input item of a search variable of a project search. So, we improved a long character string can be input in an input item of a search variable of a project search.

[Support Version]

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# No. 10 Improved the internal process of a motion program.

When the subprogram designated at MSEE or SSEE in a motion program was eliminated and didn't exist, it was not possible to transfer the program and create the relevant number program. So, we improved to be able to transfer the program and create related number programs.

[Support Version]

oController

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#### No. 11 Improved the contents of the error message when logging starts.

When logging started at the following condition, an indicated error message couldn't present the information which leads to its error cause.

#### [Conditions]

A local register of the program which doesn't exist is included in logging setting.



When logging started at the previously described conditions, it was improved that an indicated error message could present the information which leads to its error cause.



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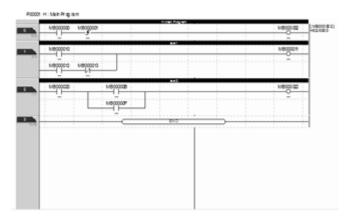
Controller	Support Firmware Version		
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MP2400	It is not dependent on the version.		

## No. 12 Improved the indication of printing the ladder editor.

When a ladder program was printed at the following condition, a difference occurred to a printout result.

[Condition]

- \* "Environment setting"  $\Rightarrow$  "Ladder"  $\Rightarrow$  "Display" , "grid" is less than 7.
- \* "Environment setting"  $\Rightarrow$  "Print"  $\Rightarrow$  "Ladder", "Print the cross reference information." is "Print".



When a ladder program was printed at the previously described conditions, it was improved that a difference didn't occur to a printout result.

[Support Version]

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MP2400	It is not dependent on the version.		

## No. 13 Improved the compilation processing in an Expression instruction.

(1)When describing only "true" and "false" as a conditional expression of if sentence of an Expression instruction, the compilation was successful.

(2)When describing an array instruction to a subscript register in an Expression instruction, compilation was successful.

We improved (1), (2) above as follows.

(1)When describing only "true" and "false" as a conditional expression of if sentence of an Expression instruction, it was improved that the compilation won't succeed.

(2)When describing an array instruction to a subscript register in an Expression instruction, it was improved that the compilation won't succeed.

[Support Version]

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## No. 14 Improved the compilation processing in a motion program.

When describing both of an INC instruction and an ABS instruction in the same line of a motion program, compilation was successful. So, when describing both of an INC instruction and an ABS instruction in the same line of a motion program, we improved that compilation won't succeed.

[Support Version]

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# No. 15 Improved the display processing in a CP ladder.

When the following procedure was executed, there was a phenomenon by which a CP ladder program is shown to the corner of the detail definition screen of MC-Configurator.

[Procedure]

- 1. A project file of MP3000 series is created.
- 2. Create 2 CP ladder program with any instruction, and save them.
- 3. MC-Configurator is started in the state which open the 1st program.
- 4. A detail definition of 218IFD is opened.
- 5. The 2<sup>nd</sup> program is opened in the state which open the detail definition.

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We improved so that a CP ladder program might be also shown to engineering manager in the previously described procedure.

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Σ-7C	It is not dependent on the version.
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# No. 16 Improved the display of reserved words of an Expression instruction.

The following reserved words were added in a Expression instruction.

•To

- Step
- Word
- •Long
- •Quad
- Float
- Double
- Ftype
- Dtype

[Support Version]

oController

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Σ-7C	It is not dependent on the version.
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# No. 17 Improved the processing of operand input of a ladder editor.

When being the cajolery processing of operand input of Double type in a ladder editor and being expressed by the value outside the reach of Double type, compilation was successful. So, when being the rounding processing of operand input of Double type in a ladder editor and being expressed by the value outside the reach of Double type, it was improved that compilation won't succeed.

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