e-Front runners

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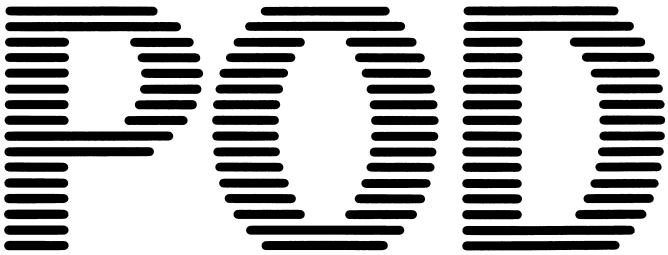
FUJI UG SERIES PROGRAMMABLE OPERATION DISPLAY



USER'S MANUAL <MEMORY CARD EDITOR>

TYPE: UG00P-MS

FEH359b

Preface

Thank you very much for purchasing the Fuji UG Series UG00P-MS(Memory Card Editor).

This manual explains how to operate UG00P-MS when writing from a PC to a SRAM/CF card, or reading the data from a SRAM/CF card to a PC.

This manual is constructed under the condition that the user would understand all the functions of memory manager, data logging, SRAM cassette/built-in SRAM, and CF card in POD UG series very well.
About these functions, refer to the User's Manual <Function> (FEH376).

[Reference]
In addition to this manual, the following manuals on the UG Series are available. Please ask your nearest dealer for the appropriate manuals and read them as required.

Name	Manual No.	Contents
UG Series Manual <Operation>	FEH375	Describes the operations available with the UG Series.
UG Series Manual <Function>	FEH376	Describes the functions available with the UG Series.
UG20 Series Manual <Hardware>	FEH352	Describes the UG20 Sereis hardware specifications.
UG30 Series Manual <Hardware>	FEH377	Describes the UG30 Sereis hardware specifications.
UG230 Series Manual <Hardware>	FEH381	Describes the UG230 Sereis hardware specifications.

Record of Revisions

Printing Date	Reference No.	Revised Contents
August, 1999	FEH359	First edition
January, 2003	FEH359a	Second edition Ver. 2.0.0.0 (CF card reading/writing and SRAM cassette reading/ writing, etc.)
February, 2004	FEH359b	Third edition Ver. 2.0.0.0 (Change in Company name.)

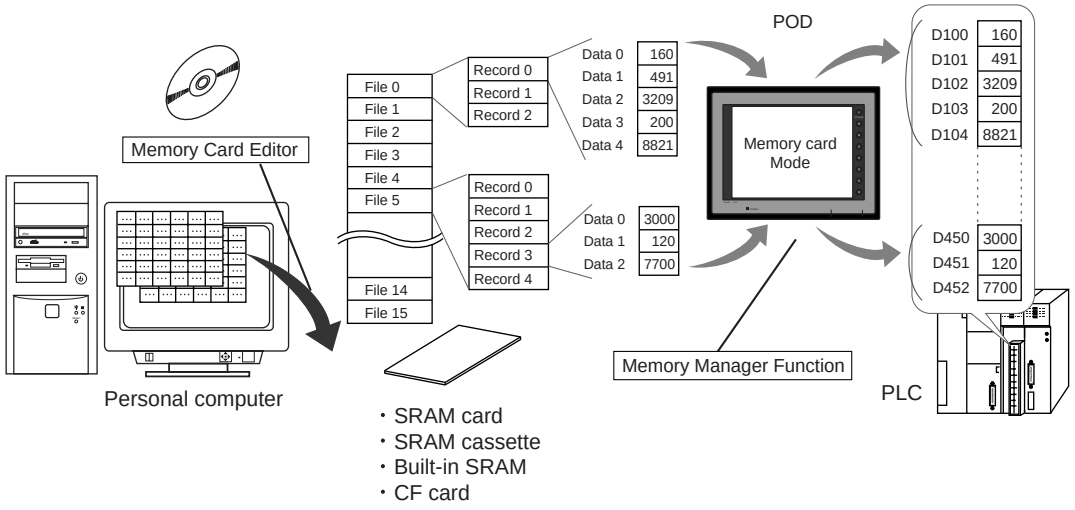
Contents

Outline

Data is transferred between the PLC and the memory card with two UG30/20 series SRAM/CF card functions: memory manager and data logging.
Memory Card Editor is software that allows the user to write data that was entered and edited on a personal computer onto the SRAM/CF card, and also acts as conversion software that reads data saved on the SRAM/CF card and makes it possible for this data to be edited by spreadsheet software etc. The converted data becomes comma (,) delimited CSV data.

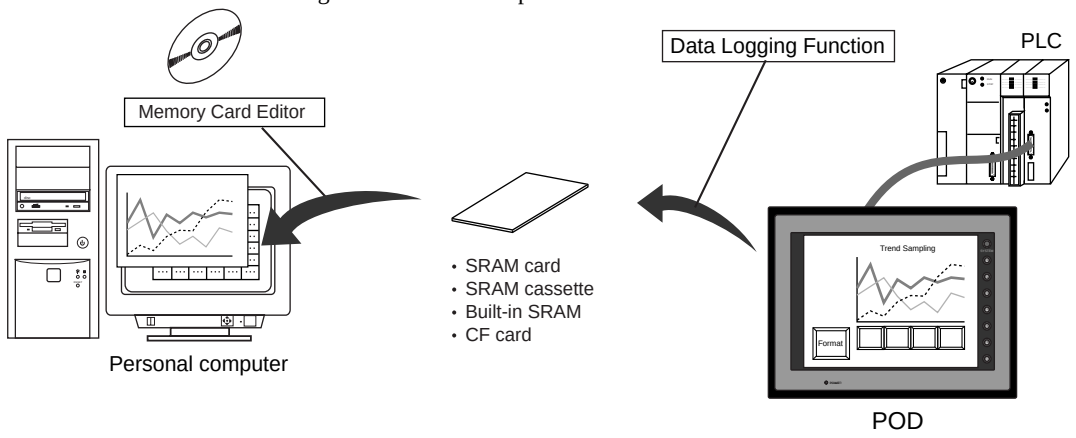
Data from Memory Manager

The parameters for machine temperature, pressure, conveyor speed, etc., are allocated in each machine's individual memory card internal record.
Record names and numerical data within records can be edited with Memory Card Editor as well as with spreadsheet (e.g. Excel).
As the amount of record data to be edited becomes larger and larger, you may find that it is easier to perform editing using application software that you are accustomed to, and then transferring the data to Memory Card Editor.



Data from Data Logging

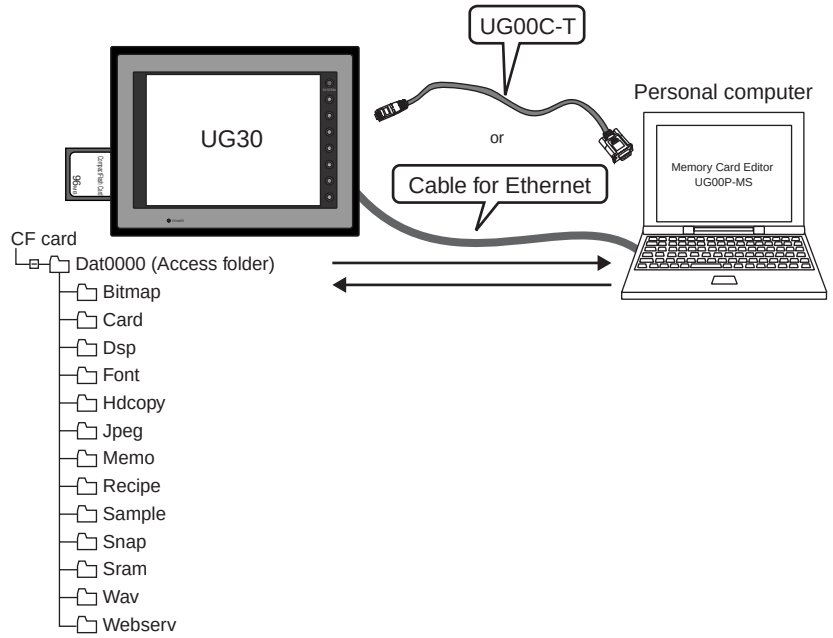
It is possible to read data accumulated from constant sampling, bit synchronization, bit sampling, alarm display, and temperature control network PLC2Way from the SRAM/ CF card, change this data into a graph using spreadsheet software (e.g. Excel), and edit and manage this software as a product document.



CF Card Supported (UG00P-MS Ver. 2.0.0.0 or later, UG30 only)

*** Check that the UG30 has the system program version 1.080 or later. Access to UG320HD (handy type) is not supported.**

In the UG30 series, a CF card interface is implemented as standard. For the functions used for a CF card, you need to store the data to the CF card, or import the data in the CF card to a PC. However, in case that your PC does not support the CF card, or that it is difficult to insert/remove the CF card from the UG30, "Memory Card Editor" allows you to read/write the CF card while the CF card is inserted into the UG30 series.

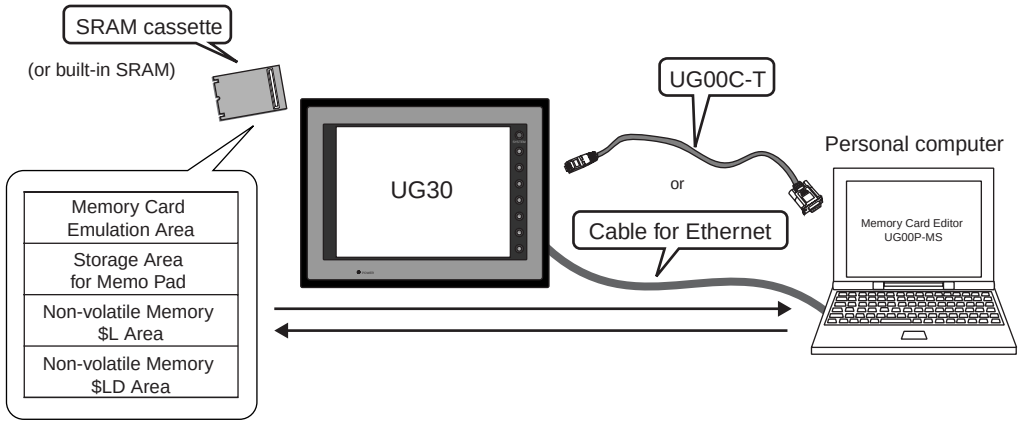


SRAM Cassette/ Built-in SRAM Supported (UG00P-MS Ver. 2.0.0.0 or later)

*** Check that the UG20 has the system program version 1.200 or later.**

The UG30 and UG20 series are supported for SRAM cassette/ built-in SRAM. For the functions used in these SRAM areas, you need to store the data to the SRAM, or import the data in the SRAM to a PC.

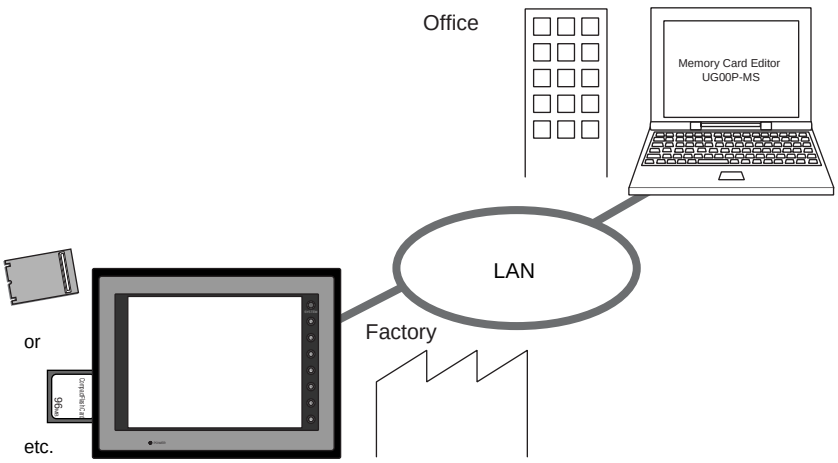
In the previous version, only reading/writing of "Memory Card Emulation Area" in the SRAM area was supported. From Ver. 2.0.0.0, in addition to "Memory Card Emulation Area," the data of "Memo Pad" or "Non-volatile Memory" can be read/written.



Ethernet Communication Supported

*** Check that the UG20 has the system program version 1.200 or later. Check that the UG30 has the system program version 1.080 or later when you wish to access a CF card.**

Data transfer by Ethernet communication is supported. If there is a POD system (UG30/20 series) and a PC with the memory card editor installed, high speed data reading/writing on the LAN will be possible. You can check logging data or recipe data, which are on a POD in a remote production site, from your office.

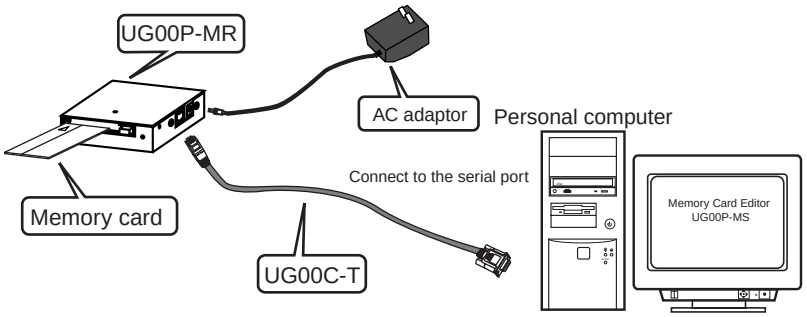


Connecting to a PC

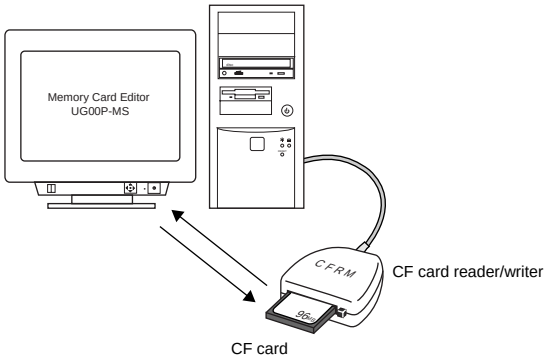
The following shows the connection configuration when SRAM/CF card data created on the POD is read to "Memory Card Editor," or data edited on a PC is written to the SRAM/CF card via "Memory Card Editor."

Connecting to a Recorder

UG00P-MR



CF Card Reader/Writer

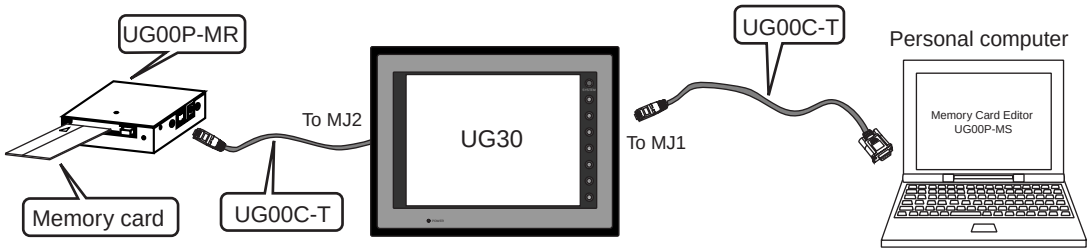


Connecting to a POD

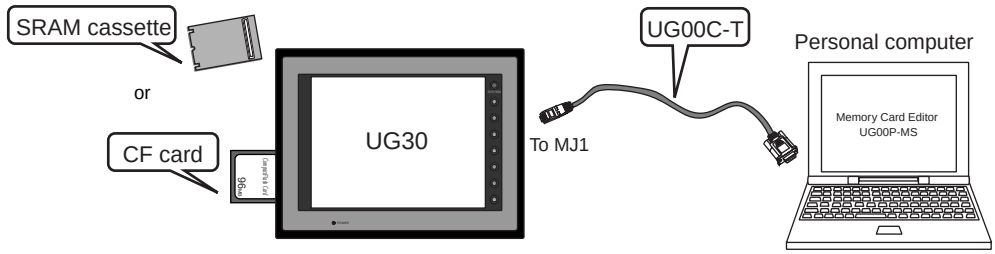
UG30 Series (UG00C-T Connection)

*** Check that the UG30 has the system program version 1.080 or later when you access a CF card.**

◆ UG00P-MR



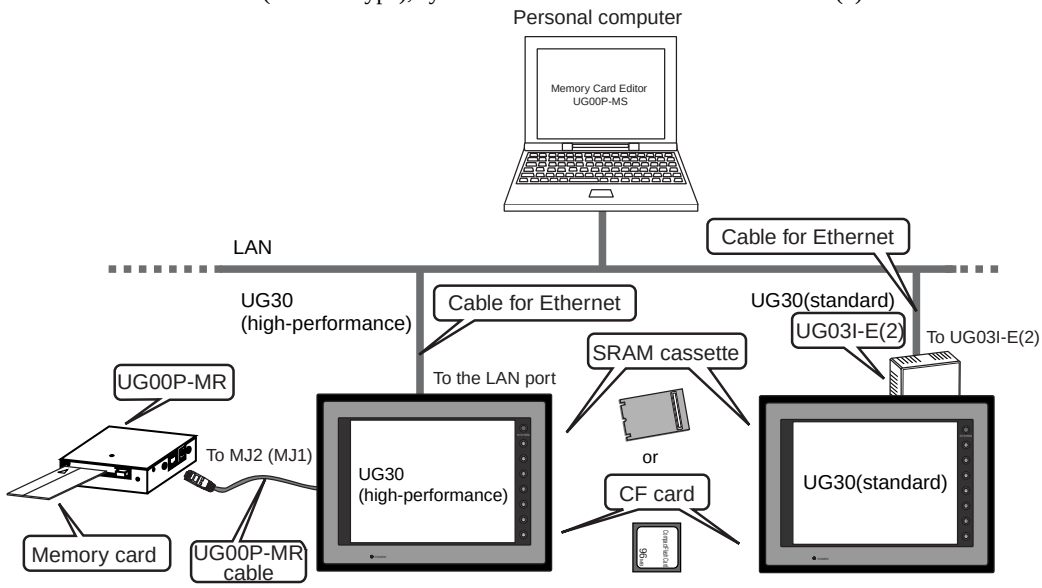
◆ SRAM cassette or CF card



UG30 Series (Ethernet Connection)

*** Check that the UG30 has the system program version 1.080 or later when you access a CF card.**

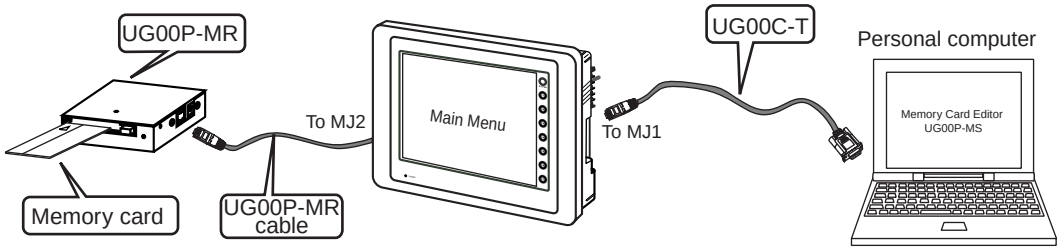
In the UG30 series, the connection for "UG30(high-performance type)" and "UG30(standard type)" are different. For "UG30(high-performance type)," you can connect to the LAN directly because it has a built-in LAN port. However, for "UG30(standard type)," you need an additional I/F unit "UG03I-E (2)."



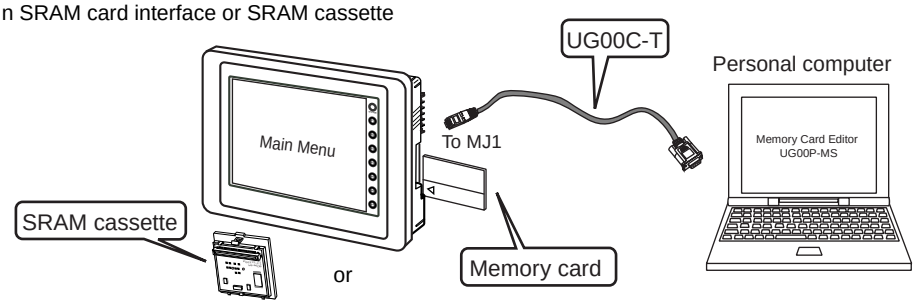
UG20 Series (UG00C-T Connection)

*** Check that the UG20 has the system program version 1.180 or later.**
Note that UG320HD (handy type) is not supported.

◆ UG00P-MR

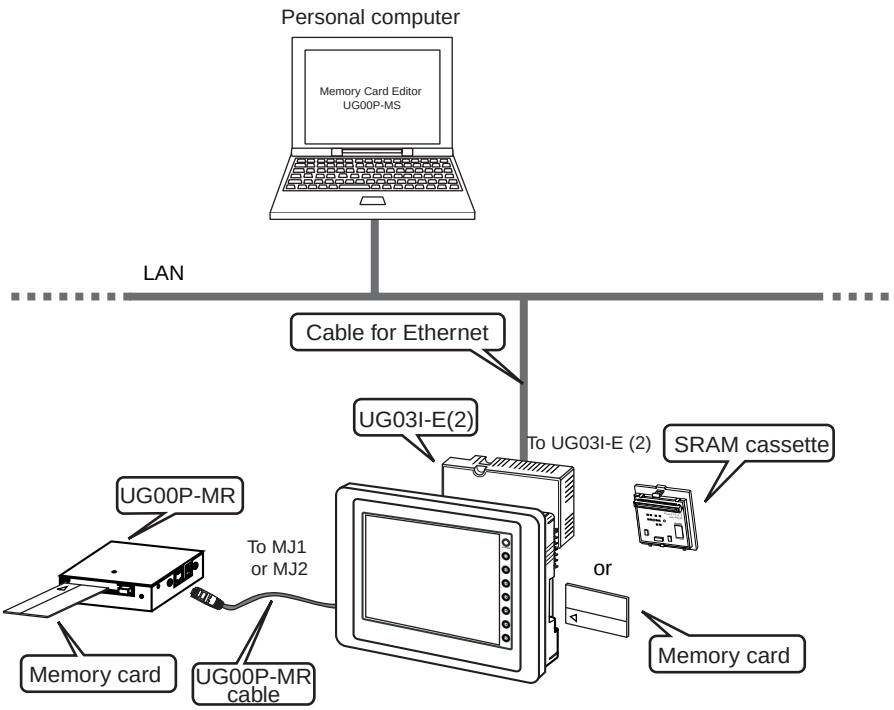


◆ Built-in SRAM card interface or SRAM cassette



UG20 Series (Ethernet Connection)

*** Check that the UG20 has the system program version 1.200 or later.**

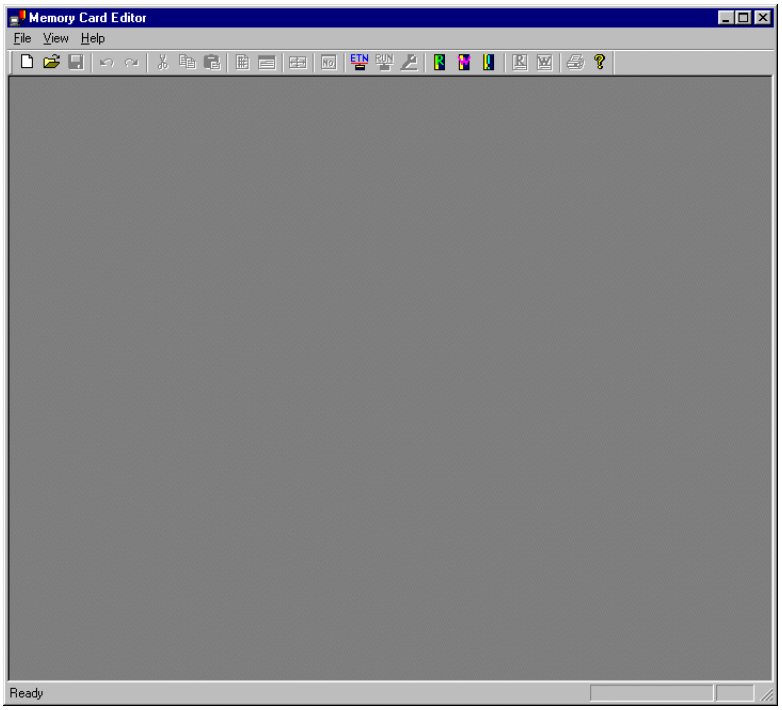


Memory Card Editor Notes

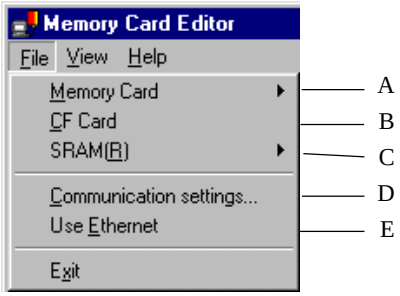
When a memory card or CF card is removed or canceled while data is being written to it, the data on that card cannot be guaranteed.
Even if the memory card or CF card is read normally, take into account the fact that the data that is read is inaccurate.

Memory Card Editor Operating Procedures

When you start the memory card editor, the following screen is displayed.



Before starting an operation, make sure what target is to be read/written using the Memory Card Editor. Depending on the target, menu commands selected from the [File] menu will vary.



A. Memory Card
This menu is for the data stored in the UG00P-MR (UG30/20 series), orbuilt-in memory card type (UG20 series) .
Refer to page 9.

B. CF Card
This menu is for the data stored on a CF card (UG30/UG320HD).
Refer to page 45.

C. SRAM
This menu is for the data stored on a SRAM cassette or the built-in SRAM (UG30 series).
Refer to page 60.

D. Communication Settings
For serial communication (when using UG00C-T), specify the baud rate and the serial port. For Ethernet communication, set the IP address.

E. Use Ethernet
Check this menu when you read/write the data via Ethernet communication.
"A. Memory Card" Refer to page 41.
"B. CF Card" Refer to page 46.
"C. SRAM" Refer to page 60.

[Memory Card]

Usable Memory Cards

An SRAM card or FPROM card can be used for the memory card. The following table shows the difference between the SRAM card and FPROM card:

SRAM	FROM
Supports the functions of POD memory manager and data logging, and transmission of screen data.	Supports transmission of screen data.
Data is partially readable and writable at any time.	Data is written and read all together. Data cannot be written or read partially.
Contains a battery. Replace the battery when it runs out.	No battery replacement is required.

* The FROM card cannot support any functions of memory manager and data logging.

The following memory cards supplied from Fuji Electric Co.,Ltd. are recommended.

◯SRAM

UG00K-S25K(256K) UG00K-S02M(2M)

UG00K-S51K(512K) UG00K-S04M(4M)

UG00K-S01M(1M)

◯FROM

UG00K-F25K(256K) UG00K-F01M(1M)

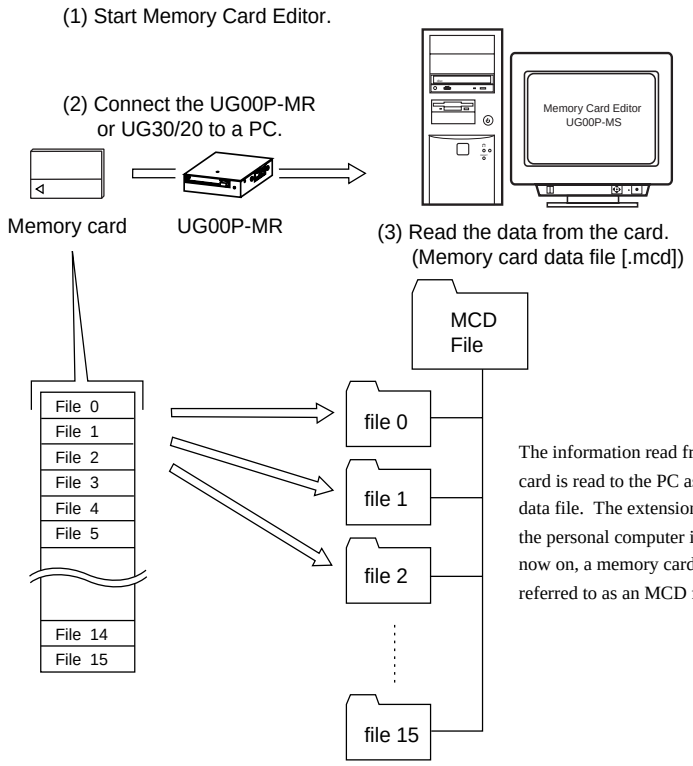
UG00K-F51K(512K) UG00K-F02M(2M)

Reading from the Memory Card

Use the data logging or memory manager function to read data stored in the memory card to a personal computer.

Operation Outline

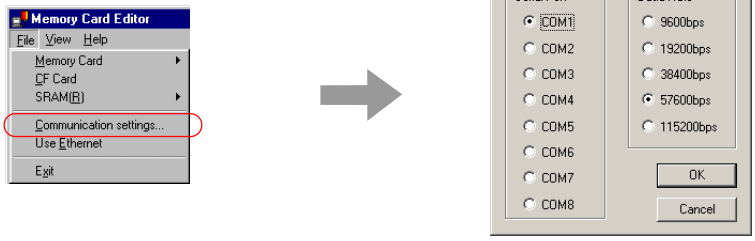
The read procedure is as follows.



The information read from the memory card is read to the PC as a memory card data file. The extension when saving on the personal computer is [.mcd]. From now on, a memory card data file will be referred to as an MCD file.

1) Before Connecting Memory card to a PC

1. Start Memory Card Editor.
2. Set the communication port and baud rate for communicating with a UG00P-MR or UG30/20 with a built-in card. Go to [File], click on [Communication Settings], and set the [Communication Detail] dialog.



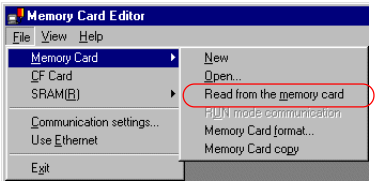
2) Connect UG00P-MR or UG30/20 with a Built-in Card Interface to the PC

Use a UG00C-T (RS232C cable for screen data transmission) to connect a personal computer to a UG00P-MR (with an AC adapter) that has a memory card inserted in it, or to UG30/20 with a built-in card interface that has a memory card inserted in it.

3) Read from the Memory Card

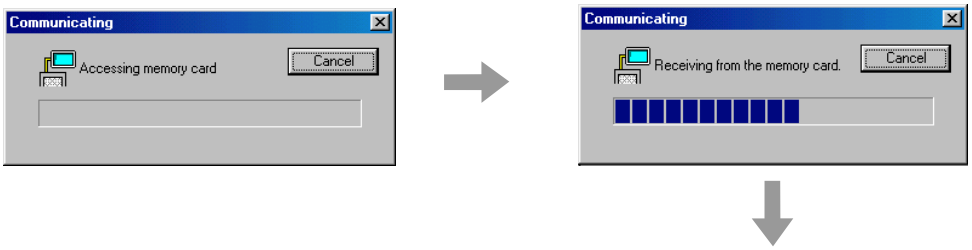
Click the [Read Memory Card] icon, or select [Read from the Memory Card] from [Memory Card] under the [File] menu.

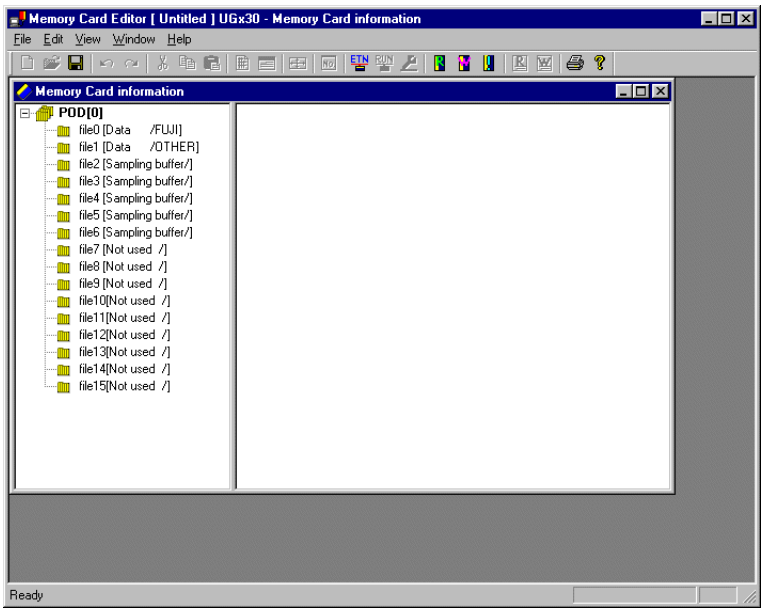
or



Clicking the [Read Memory Card] icon enables to read all the contents of a memory card.

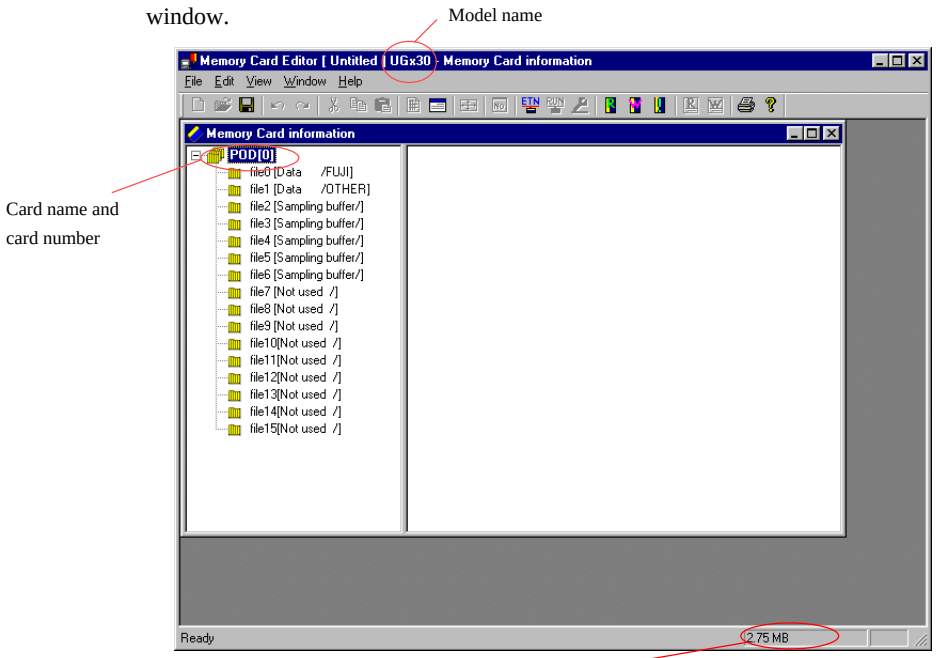
The messages "Accessing memory card" and "Receiving from the memory card" are displayed. When reading of the memory card is complete, the [Memory Card Information] window is displayed.





◆ [Memory Card Information] Window

Items such as the model and data size are displayed in the [Memory Card Information] window.



When card is selected, the entire memory card size is displayed. When file is selected, the file size is displayed (units: MB/kB/bytes).
(1kB = 1024 bytes)

◆ Calculation of File Size

The various file sizes are shown.

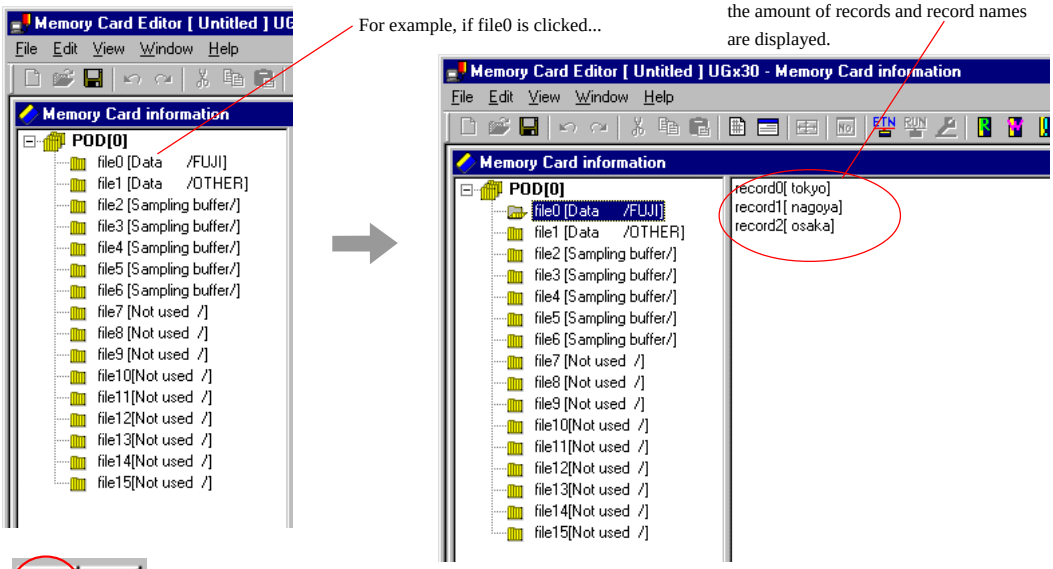
(Unit: bytes)

		Size
Memory Card Information 1)		2048
Data File		File size = (Bytes for Records + No. of Data × 2) × No. of Records
Buffering File	Bit Synchronize	File size = (No. of Words X 2 + 4) X No. of Samples
	Constant Sample	File size = (No. of Words × 2 + 4) × No. of Samples
	Bit Sample	File size = 6 X No. of Samples
	Alarm Function	File size = 6 × No. of Samples + 30 + No. of Words × 16 × 6 × 2
	Temp. Control Net. /PLC2	File size 2) = (No. of Words × 2 + 4) × No. of Samples

1) Memory card information always uses the byte amount shown above from the memory card top memory address.
2) [No. of Words] is the number of the words used for memory in the [Temp. Network/PLC2Way Table [No.]] set in [No. of Table].

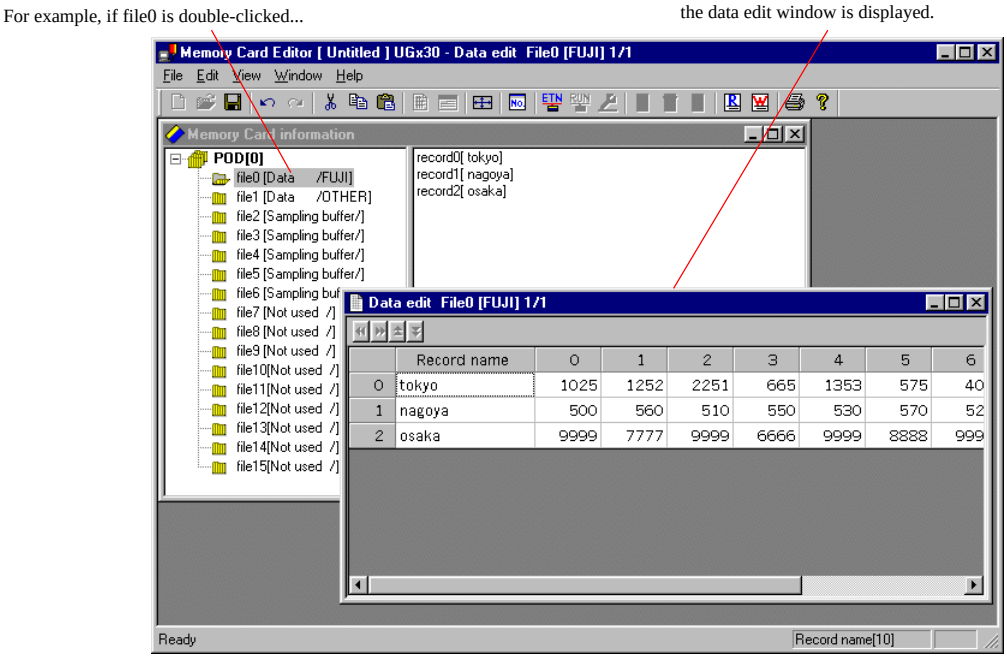
Checking and Editing File Contents

Each file's complete data is contained within the contents read from the memory card. When a you click on a file folder on the [Memory Card Information] window, the record names and sampling forms for that file are displayed on the right.



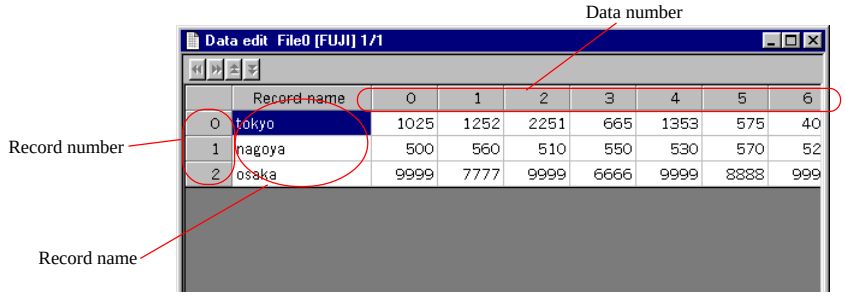
[Data File Edit] icon

To check more detailed contents, click the [Data File Edit] icon with the file selected, or double-click on a file. The file's data will be displayed in chart form.



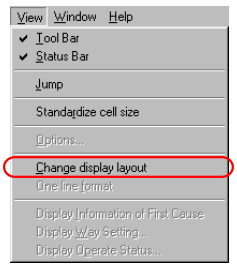
Depending on the file's type, the contents of the displayed data edit window will vary somewhat.

[Type: Data]

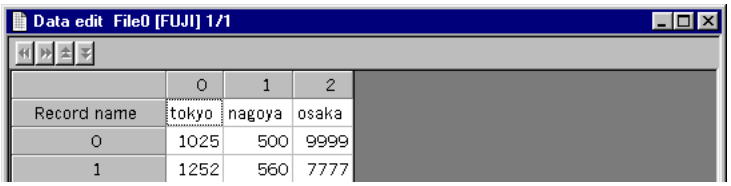


How to Change the Display Direction of the Chart Form in a Data File

The vertical display of a data file can be changed to the horizontal display. Also, the horizontal display can be changed to the vertical display.
Click [Change Display Layout] in the [View] menu with the Data edit window opened.

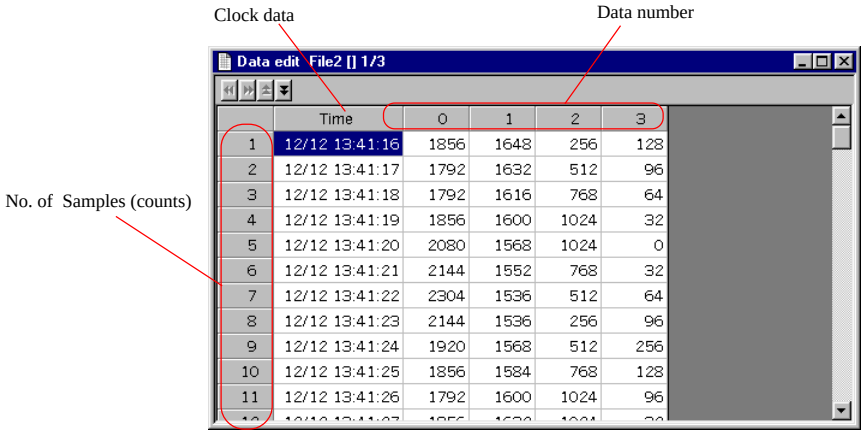


The display is changed with the direction reversed.



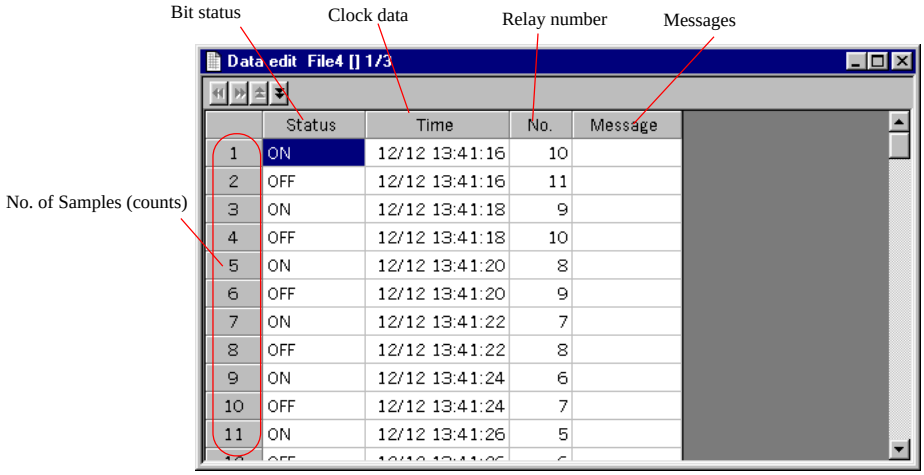
[Type: Sampling Buffer]

◆ [Sampling Method: Bit Synchronize] or [Constant Sampling]



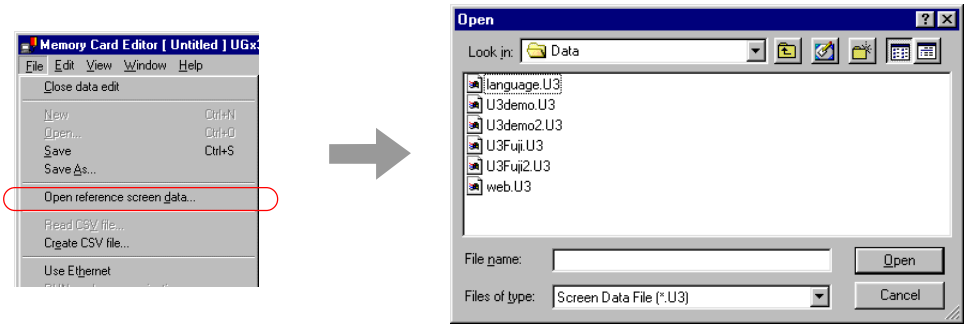
◆ [Sampling Method: Bit Sampling]

The default status for bit ON/OFF, clock, and relay number is as shown below. The message column is empty.

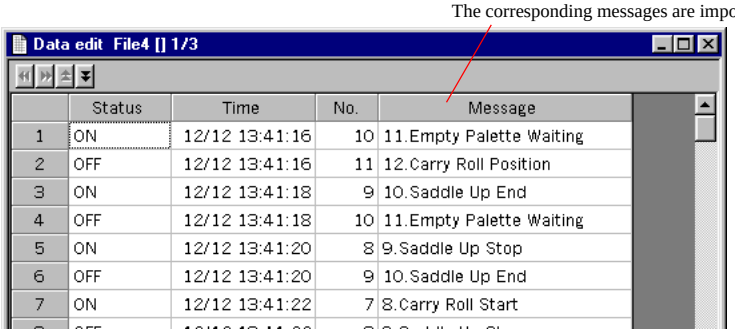


Follow the procedure below to import messages that are the same as those messages displayed.

1. When the data edit window is open, go to [File] and click on [Open Reference Screen Data...].
2. A file specification window like the one below is displayed. Select the original screen data file and click [Open].



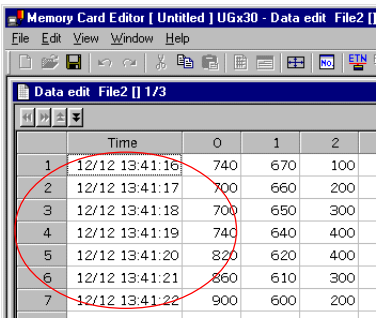
3. Messages applicable to each respective relay number are displayed in the [Message] column of the data edit window.



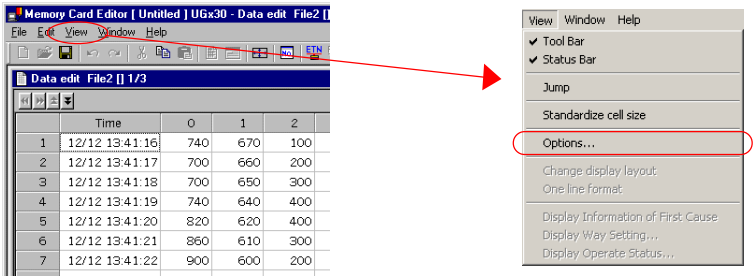
The messages for the last file referenced are read. Be sure to reference the original screen data file each time. If different screen data is referenced, it is impossible to import the correct messages.

Changing the Time Display

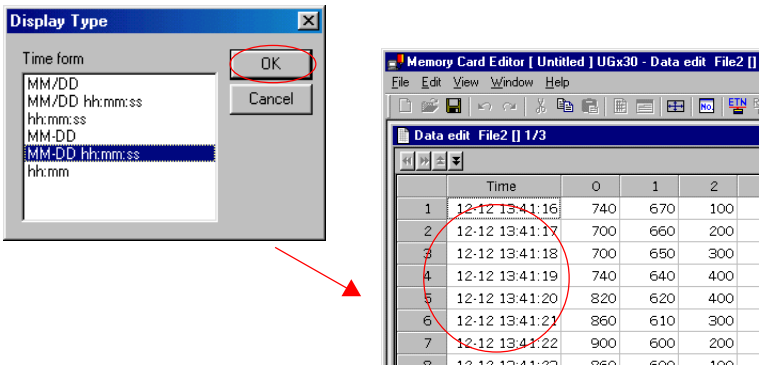
A [Type: Sampling Buffer] data file always includes a time display.
Default display status is [MM/DD hh: mm: ss], but the display type can be changed freely.



When the sampling buffer data edit window is open, go to [View] and click [Options].



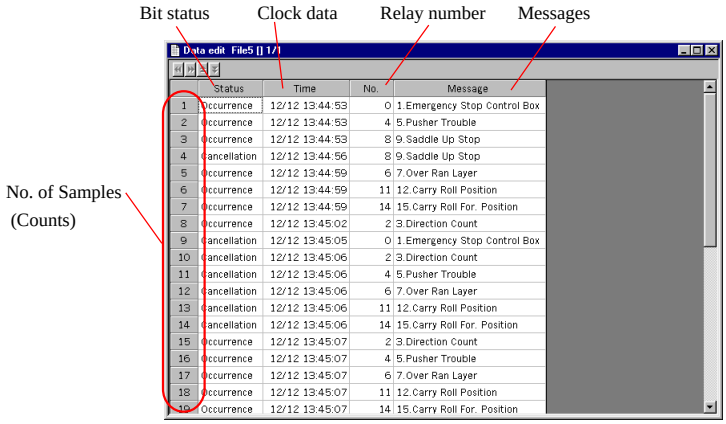
A [Display Type] dialog like the one following is displayed. For example, select [MM-DD hh:mm:ss] and click [OK].
The data edit window time display changes as shown below.



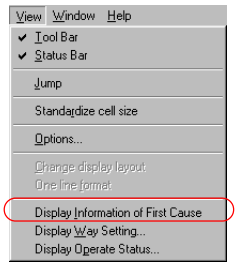
◆ [Sampling Method: Alarm Function]

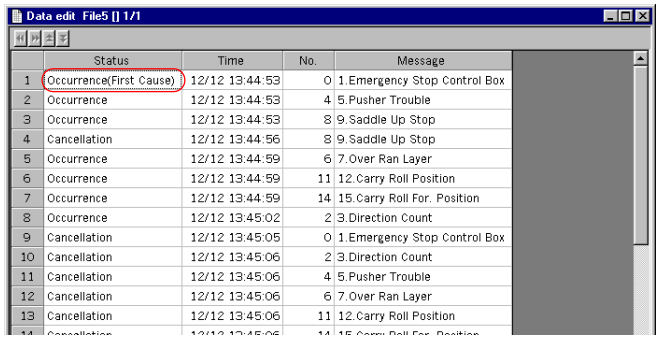
The default status for bit ON/OFF (=Occurrence/Cancellation), clock, relay number and message is shown below.

If the message is not shown, read the messages by referring to [Sampling Method: Bit Sampling]. When referring to the screen data, the setting of [Display Way Setting] in the [View] menu (see the next page) is automatically specified according to the setting of the screen data.

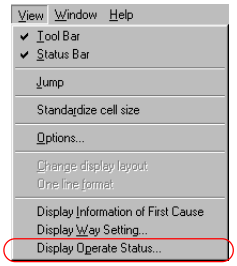


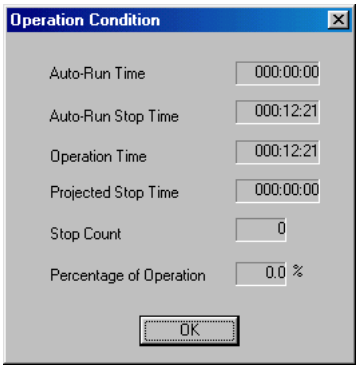
1. When checking the first cause, click [Display Information of First Cause] in the [View] menu. (Refer to the left menu.) The comment "First Cause" shows that it is the first cause as shown below.



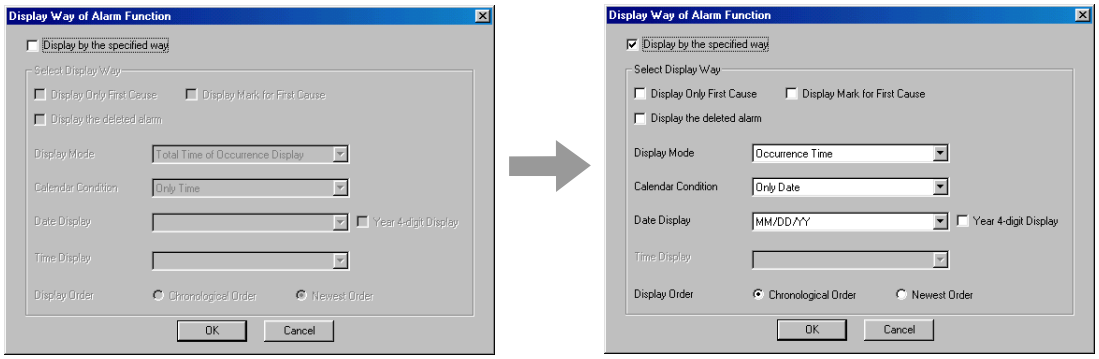


2. When displaying the operating status, click [Display Operate Status] in the [View] menu. Each condition is displayed on the [Operation Condition] dialog as follows.





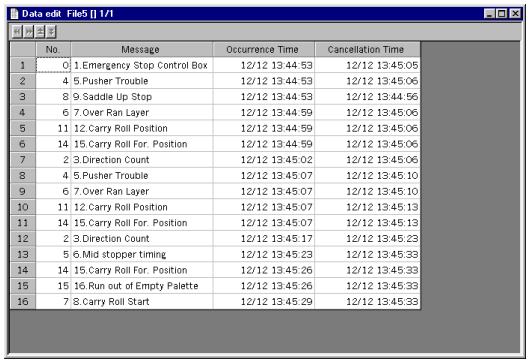
3. When displaying the same data as the one in UG30/20, click [Display Way Setting] in the [View] menu. The [Display Way of Alarm Function] dialog is displayed. Check [Display by the Specified Way]. The setting items for selection are displayed as follows.



When setting these items as same as in UG30/20, the same display is shown in this editor.

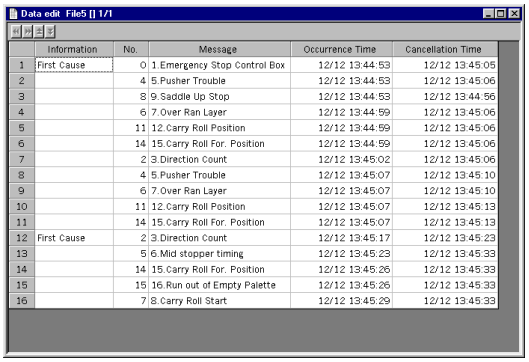
Example for setting as follows

Display Mode	Cancellation
Calendar Condition	Date and Time
Data Display	MM/DD
Time Display	hh:mm:ss
Display Order	Chronological Order



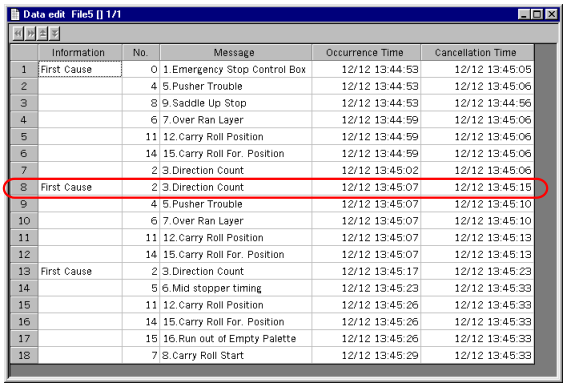
	No.	Message	Occurrence Time	Cancellation Time
1	0	1.Emergency Stop Control Box	12/12 13:44:53	12/12 13:45:05
2	4	5.Pusher Trouble	12/12 13:44:53	12/12 13:45:06
3	8	9.Saddle Up Stop	12/12 13:44:53	12/12 13:44:56
4	6	7.Over Ran Layer	12/12 13:44:59	12/12 13:45:06
5	11	12.Carry Roll Position	12/12 13:44:59	12/12 13:45:06
6	14	15.Carry Roll For. Position	12/12 13:44:59	12/12 13:45:06
7	2	3.Direction Count	12/12 13:45:02	12/12 13:45:06
8	4	5.Pusher Trouble	12/12 13:45:07	12/12 13:45:10
9	6	7.Over Ran Layer	12/12 13:45:07	12/12 13:45:10
10	11	12.Carry Roll Position	12/12 13:45:07	12/12 13:45:13
11	14	15.Carry Roll For. Position	12/12 13:45:07	12/12 13:45:13
12	2	3.Direction Count	12/12 13:45:17	12/12 13:45:23
13	5	6.Mid stopper timing	12/12 13:45:23	12/12 13:45:33
14	14	15.Carry Roll For. Position	12/12 13:45:26	12/12 13:45:33
15	15	16.Run out of Empty Palette	12/12 13:45:26	12/12 13:45:33
16	7	8.Carry Roll Start	12/12 13:45:29	12/12 13:45:33

About [Display Mark for First Cause], in UG30/20, "*" shows the first cause. In UG00P-MS, the characters, "First Cause," shows the first cause.



	Information	No.	Message	Occurrence Time	Cancellation Time
1	First Cause	0	1.Emergency Stop Control Box	12/12 13:44:53	12/12 13:45:05
2		4	5.Pusher Trouble	12/12 13:44:53	12/12 13:45:06
3		8	9.Saddle Up Stop	12/12 13:44:53	12/12 13:44:56
4		6	7.Over Ran Layer	12/12 13:44:59	12/12 13:45:06
5		11	12.Carry Roll Position	12/12 13:44:59	12/12 13:45:06
6		14	15.Carry Roll For. Position	12/12 13:44:59	12/12 13:45:06
7		2	3.Direction Count	12/12 13:45:02	12/12 13:45:06
8		4	5.Pusher Trouble	12/12 13:45:07	12/12 13:45:10
9		6	7.Over Ran Layer	12/12 13:45:07	12/12 13:45:10
10		11	12.Carry Roll Position	12/12 13:45:07	12/12 13:45:13
11		14	15.Carry Roll For. Position	12/12 13:45:07	12/12 13:45:13
12	First Cause	2	3.Direction Count	12/12 13:45:17	12/12 13:45:23
13		5	6.Mid stopper timing	12/12 13:45:23	12/12 13:45:33
14		14	15.Carry Roll For. Position	12/12 13:45:26	12/12 13:45:33
15		15	16.Run out of Empty Palette	12/12 13:45:26	12/12 13:45:33
16		7	8.Carry Roll Start	12/12 13:45:29	12/12 13:45:33

When displaying the messages deleted by the switch [Function: DEL] in UG30/20, check [Display the Deleted Alarm].



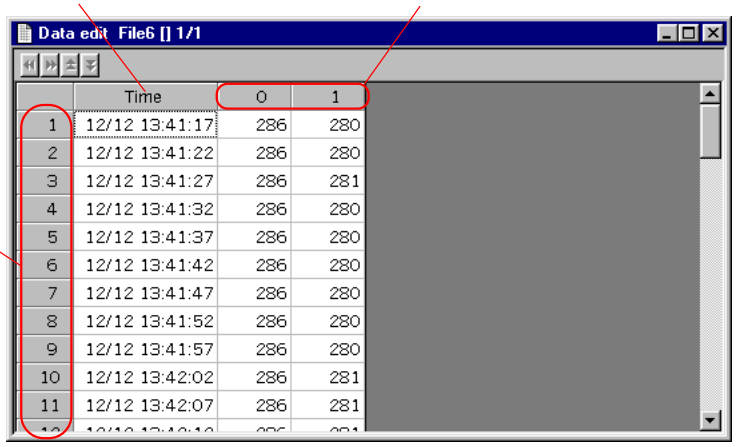
The message deleted by the [DEL] switch is displayed.

When unchecking [Display by the Specified Way], the default condition is displayed. (Refer to upper page 17.)

◆ [Sampling Method: Temp. CTRL/PLC2]

Clock data

Data No. used in [Temp. CTRL Network Table [No.]] specified in [Table No.] of [Buffering Area Setting]



No. of Samples (Counts)

Data File Edit

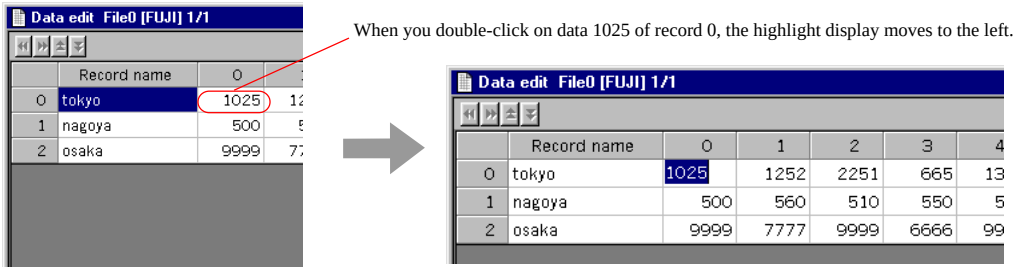
Changing Data

With the Memory Card Editor, it is possible to change data read from the memory card.

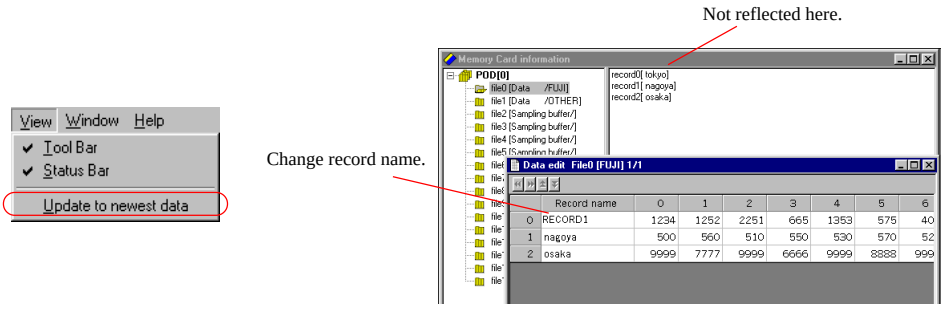
Data edit is only possible for a [Type: Data] file (memory manager function). A contents of a [Type: Sampling Buffer] file (data logging function) cannot be changed.

◆ Changing the Data Value/Record Name

When you double-click on the column that you wish to change in the previously opened edit window, the cursor moves to the left corner.
When new information is entered with the keyboard, the contents of the column are altered.



When the changed record name is not reflected in the [Memory Card Information] window, go to [View] and then click on [Update to Newest Data], and the record name that was changed will be displayed.

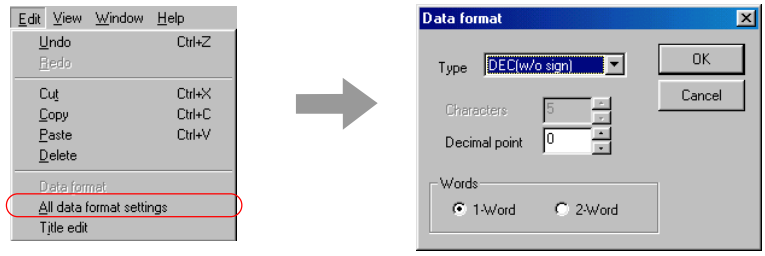


◆ Changing the Data Display Form

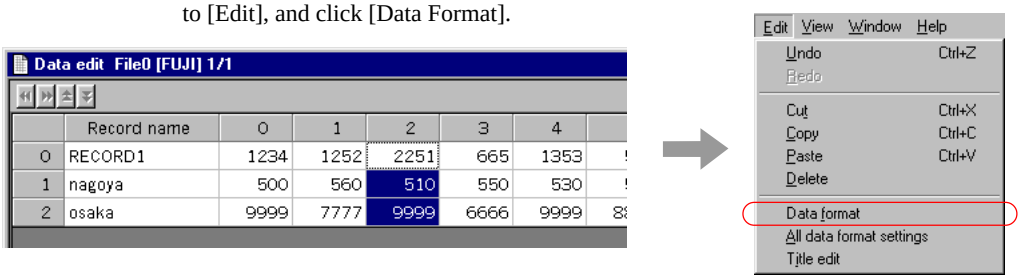
It is possible to change each column's display type by all, one column, or multiple columns.

To change all, go to [Edit] and click [All Data Format Settings]. When the [Data Format] dialog is displayed, set [Characters], [Decimal Point], and [Words].

For [Type: CHAR (characters)], set the number of characters.



To change the format of one column, use the cursor to select the column to change, go to [Edit], and click [Data Format].

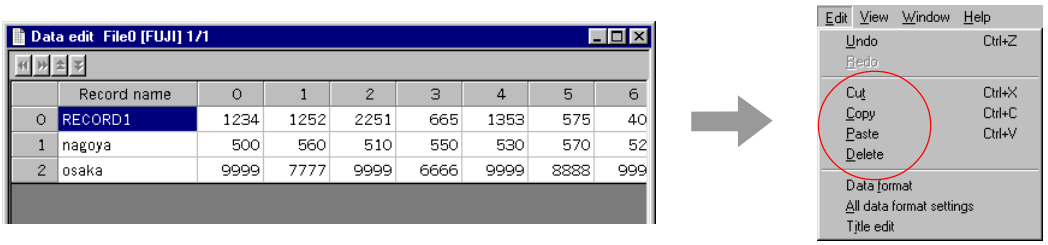


Items such as [Type] are changed in the same way as change all.

◆ Other Editing

○ Cut, copy, paste, and delete operations

These operations can be performed easily by selecting the applicable column with the cursor (multiple selections possible), and then going to the [Edit] menu, or by using the right-click menu and then clicking on the desired edit contents.



○ Return to undo/redo edit operations

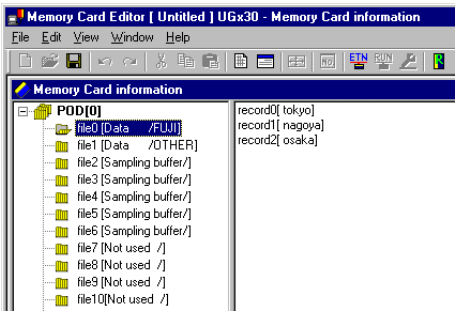
To erase the most recently performed edit operation, click [Undo]. To re-execute an operation that was erased, click [Redo].

Copying Data Format

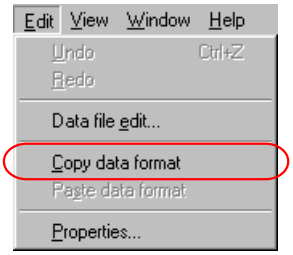
The data format specified in the previous setting, "◆ Changing the Data Display Form," can be copied to other file.
The following files can be copied.

Data		○
Sampling Buffer	Constant Sample	○
	Bit Synchronize	○
	Bit Sample	×
	Alarm Function	×
	Temp. Control Net.	○

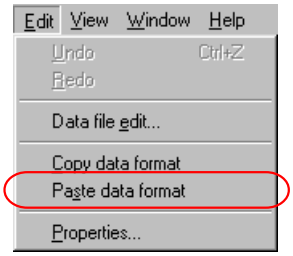
Select the file on the [Memory Card Information] window.



Click [Copy Data Format] in the [Edit] menu.



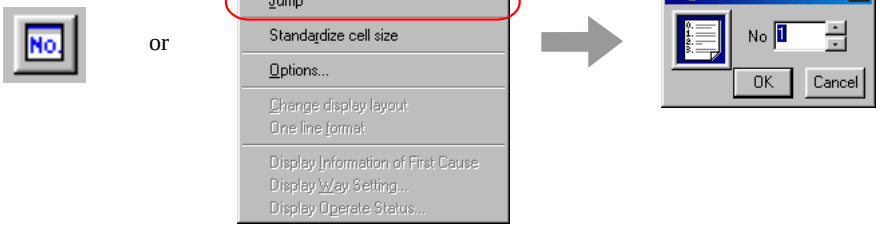
Select the file to format, and click [Paste Data Format] in the [Edit] menu.



Jump Function on Data Edit Sheet

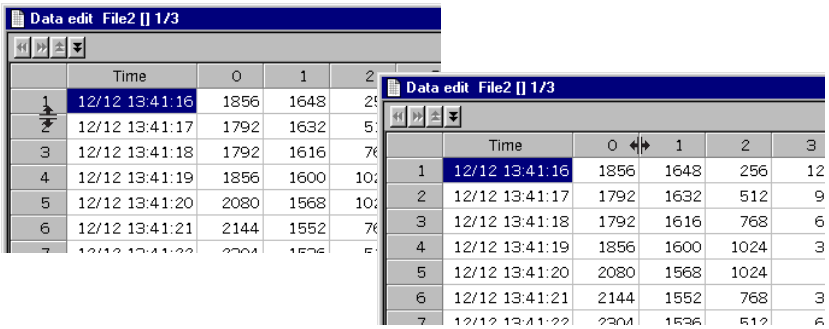
In a data edit sheet, up to 128 data can be displayed on each line/column per one page. If there are some pages in one sheet because of large file size, any page can be displayed quickly by using jump function.

Click the [Jump] icon or [Jump] in the [View] menu. The [Page No] dialog is displayed. Input the page number to be edited.

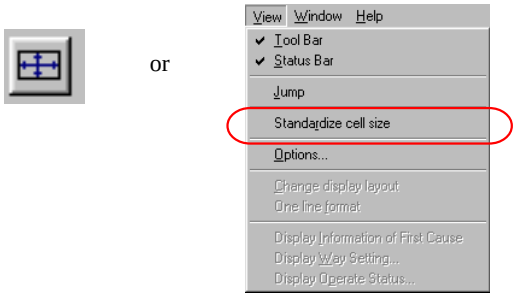


Changing Row Height and Column Width

To change the cell height or width, move the mouse to the boundary line as shown in the diagram to the right, and then drag the cursor until you reach the desired height/ width.

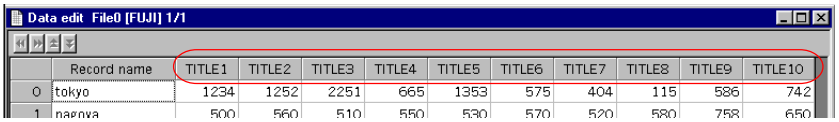


To return to the default height/width, click the [Standardize Cell Size] icon, or go to [View] and click [Standardize Cell Size].



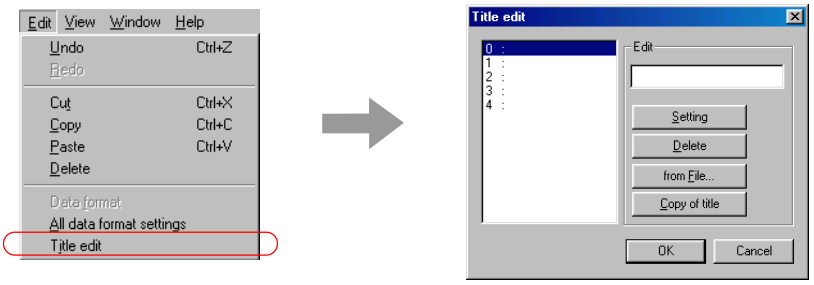
Title Edit

Title edit can be performed for bit synchronization and constant sampling in the data file and sampling buffer file.



◆ Title Edit Procedure

1) When you go to [Edit] and click on [Title Edit], the [Title Edit] dialog is displayed.
2) For [Edit], enter the characters that make up the title name.

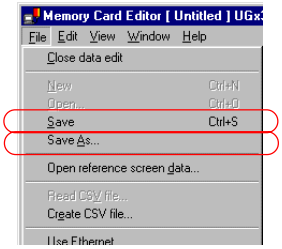


3) Select a number from the list box and click the [Setting] button.
4) The characters are set for the specified number.
5) To confirm, click the [OK] button. The title is set.
   To cancel, click the [Cancel] button.

- Multiple items can be selected by using the Ctrl key or the Shift key. The titles for all items selected will be deleted with the [Delete] button.
- It is possible to import titles from comma-delimited text files like a CSV file (e.g.: TITLE1, TITLE2, TITLE3, TITLE4) by clicking the [From File...] button.
- Clicking the [Copy of Title] button and entering the other file number enables the title of the file to be copied.

File Save

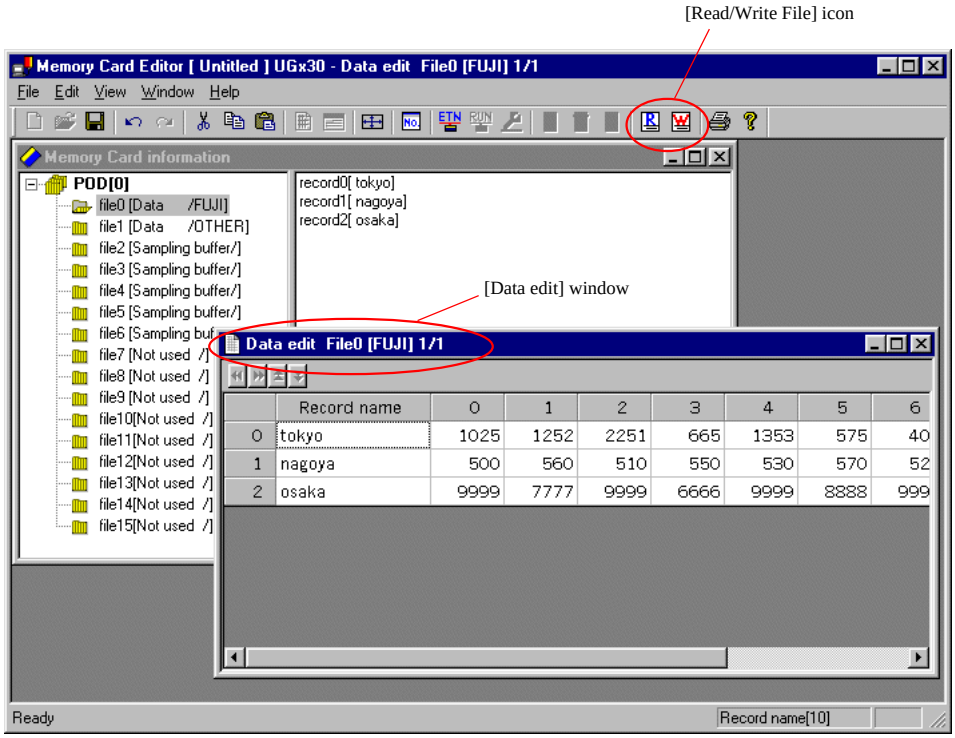
To save data that has been changed, go to [File] and click on [Save], or click on [Save As...]. A data file that has been changed is stored as an MCD file.



<Example> XXXX.mcd
File name Extension

Reading/Writing a File

In case of opening the [Data Edit] window on the Memory Card Editor, only the opened data file can communicate with a memory card.



File Reading

1. Click the [Read File] icon or [Read File] of [File] menu.
2. Read only the data from the file to be edited.

File Writing

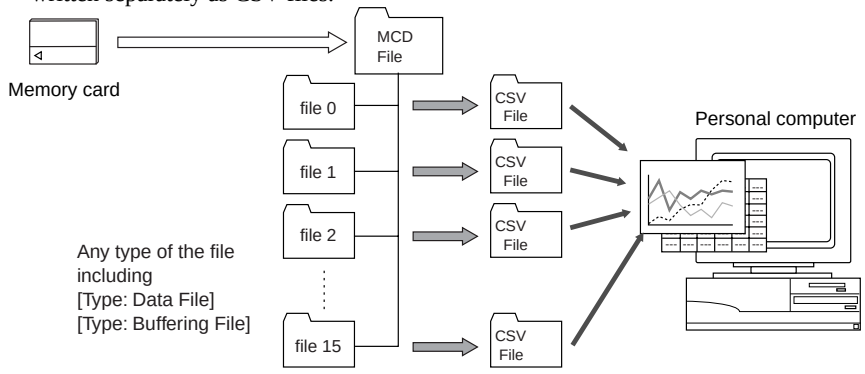
1. Click the [Write File] icon or [Write File] of [File] menu.
2. Transfer only the file data to be edited to a memory card.

When the edited file is [Type: Sampling Buffer], only reading is available. Writing is unavailable.

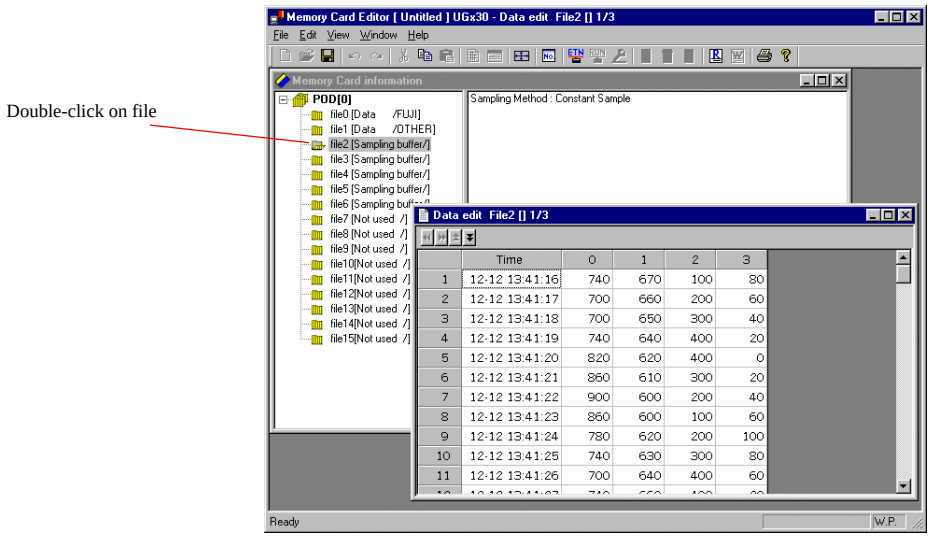
Creating and Reading a CSV File

Creating a CSV File

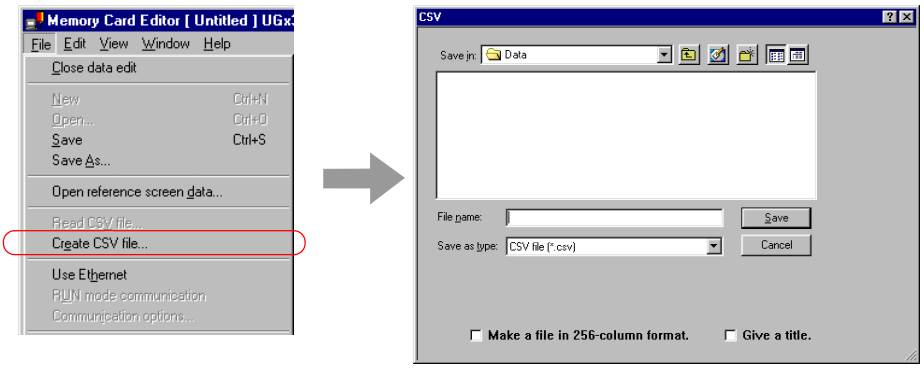
It is possible for each MCD file (both [Type: Data] and [Type: Sampling Buffer]) to be written separately as CSV files.



1. When you double-click on the desired file from the MCD file directory, the [Data Edit] window opens.

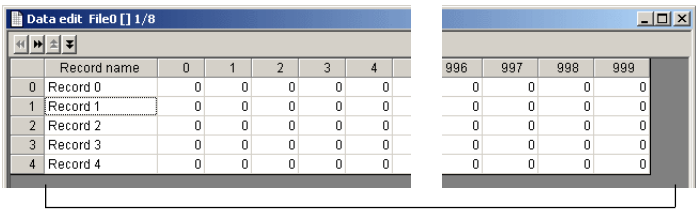


2. When you go to [File] and click on [Create CSV File...], a diagram like the one below is displayed. Specify a name and click [Save].

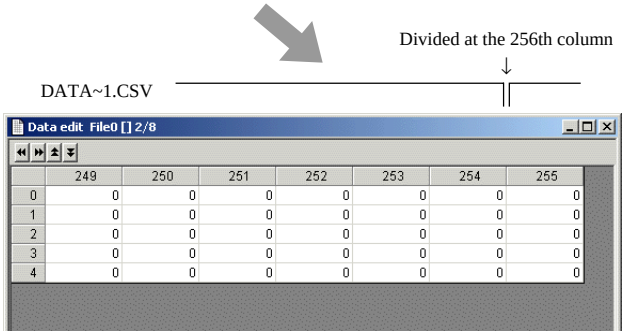


[☐ Make a File in 256-Column Format]

This setting is effective when the data count in a data file is 256 or more. When you save the data in a CSV file and edit it with Excel, only 256 columns can be displayed. If the data count is 256 or more, you cannot open the CSV file with Excel. If you check this item and save the file, the CSV file will be created automatically from "(the desired file name) ~1.CSV" with the available number of columns (= data count).

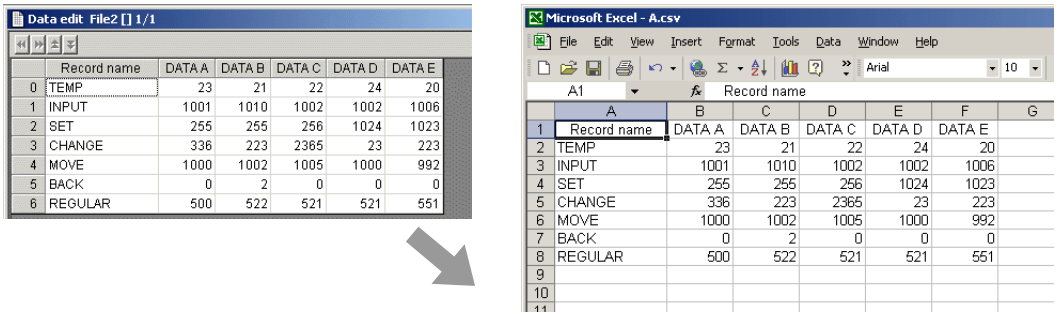


[Data count: 1000] + "Record name" column = 1001 columns



[☐ Give a Title]

Using the memory card editor function, each title in a data file can be edited. Check this box if you save the title as data when saving in a CSV data.



3. Specify the file name and click [Save].

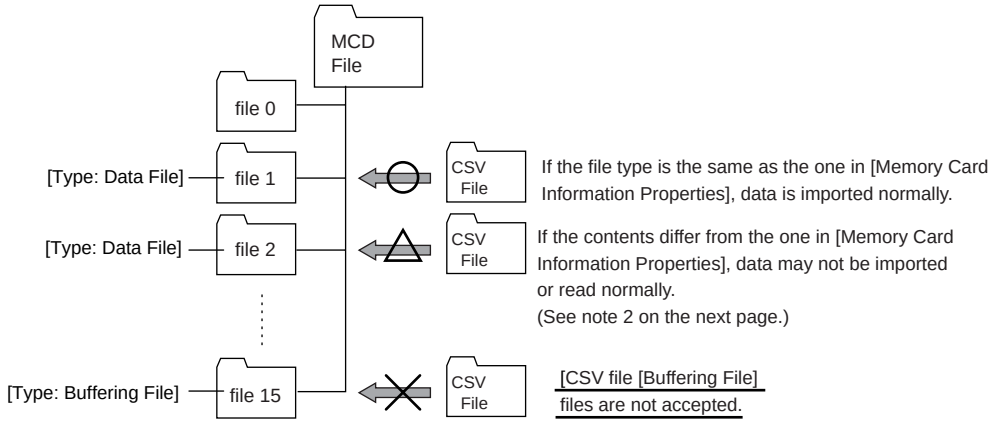
The data file currently open is saved as a CSV file.

Reading from a CSV File

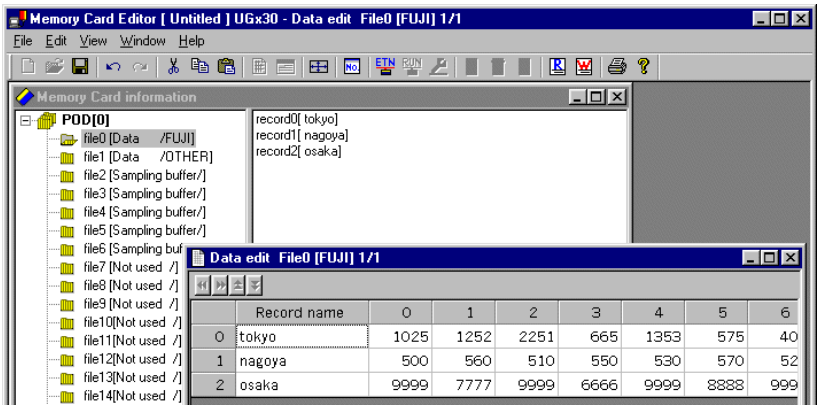
It is possible to read a CSV file into an MCD file.

<Note 1>

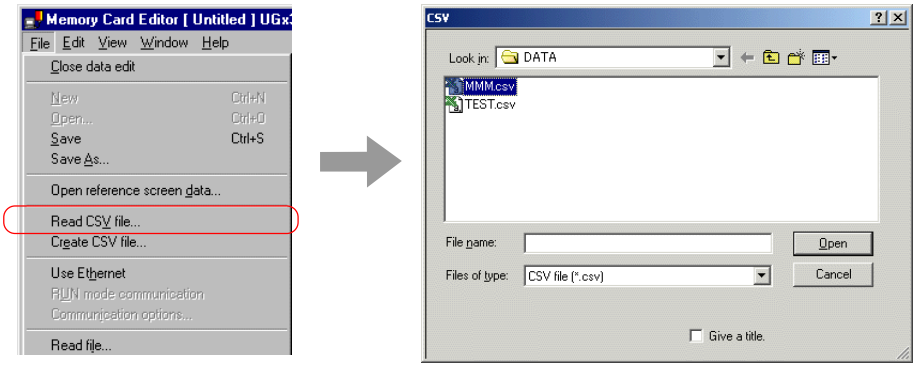
Reading is possible only for [Type: Data] data files.
([Type: Sampling Buffer] files are write-prohibited files.)



1. When you double-click on the desired file from the MCD file (although this must be a file of [Type: Data]), the [Data Edit] window opens.



2. When you go to [File] and click on [Read CSV File...], a dialog like the one below is displayed.

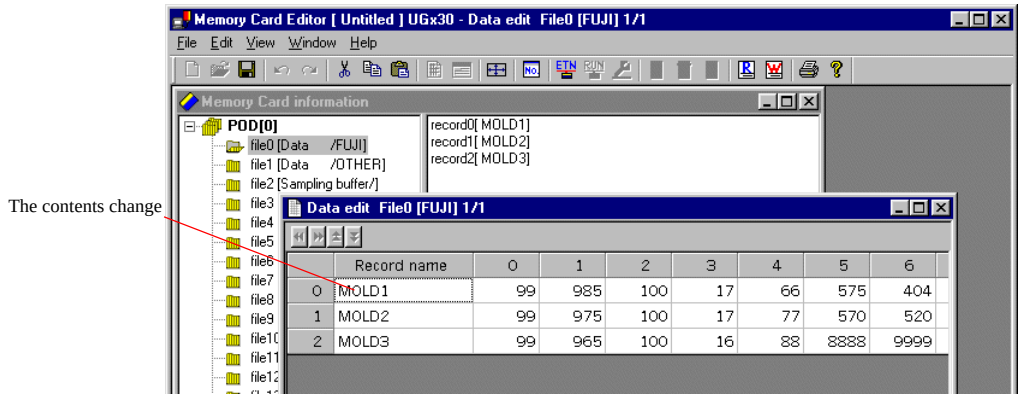


[☐ Give a Title]

Using the Memory Card Editor, each title in a data file can be edited. If you check this item and import a CSV file, the top line of the CSV file will be recognized as a title.

3. Specify the CSV file to be imported and click [Open].

4. The contents of the specified CSV file are written in the data file. To save the imported information, save the MCD file using [Save] or [Save As...].

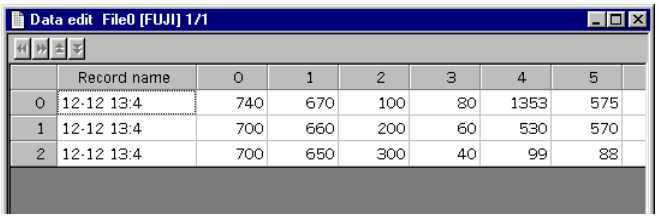


If the larger value of the decimal point than the specified value is set in a cell, the value is ignored. Also, the larger number of the characters than the specified number is entered, the number is ignored.

<Note 2>

When data format of CSV file to be read is different from the data format at the import destination, there are instances when the contents of the CSV data are not read normally.

For example, when you import a CSV file [Type: Sampling Buffer] into the data file, the data is imported forcibly and inaccurately into [Record Name] and other data.



Data Exchange between UG00P-MS and Spreadsheet (e.g. Excel)

In order to write the data in UG00P-MS to other software such as Excel, or write the data in Excel to UG00P-MS, it is necessary to convert the data into CSV file.

<e.g.>

◆ To write the data in UG00P-MS to Excel

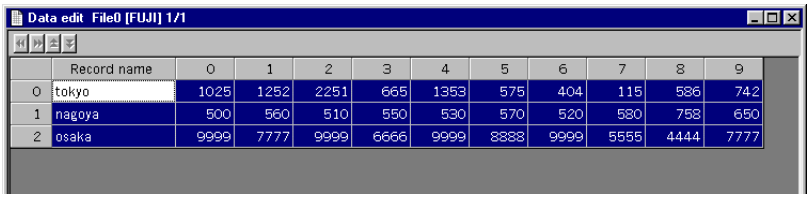
1) Create and save a CSV file in UG00P-MS by referring to "Creating a CSV File" previously described.
2) Start Excel, click [Open] from the [File] menu and select [Text Files (*.prn, *.txt, *.csv)] in [File of Type].
3) Select the file created in step 1) and click [Open]. Excel starts to read the data from UG00P-MS.

◆ To write the data in Excel to UG00P-MS

1) Click [Save As ...], select [Save as Type:] in [CSV (Comma delimited) (*.csv)], and save the file in Excel.
2) Start UG00P-MS, and read the data from Excel by referring to "Reading from a CSV File" previously described.

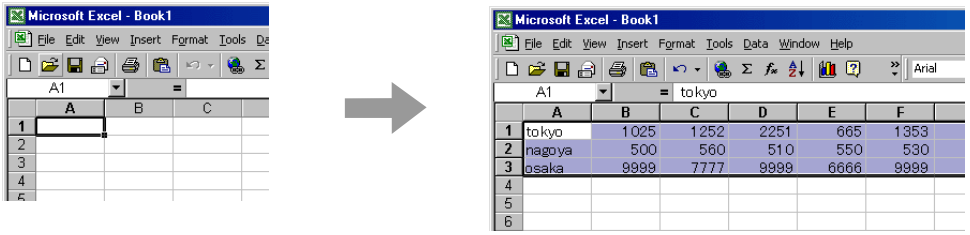
◆ In addition to the above method, the data can be exchanged by copy and paste commands. In this case, the data type is limited similar to the CSV file format. Refer to <Note 1> and <Note 2> on page 28 to 29.

1) Drag the area to copy on the data file of UG00P-MS, and copy it.
2) Start Excel, and paste the data on Excel.



	Record name	0	1	2	3	4	5	6	7	8	9
0	tokyo	1025	1252	2251	665	1353	575	404	115	586	742
1	nagoya	500	560	510	550	530	570	520	580	758	650
2	osaka	9999	7777	9999	6666	9999	8888	9999	5555	4444	7777

3) Also, it is possible to copy the data on Excel, and paste it on UG00P-MS.

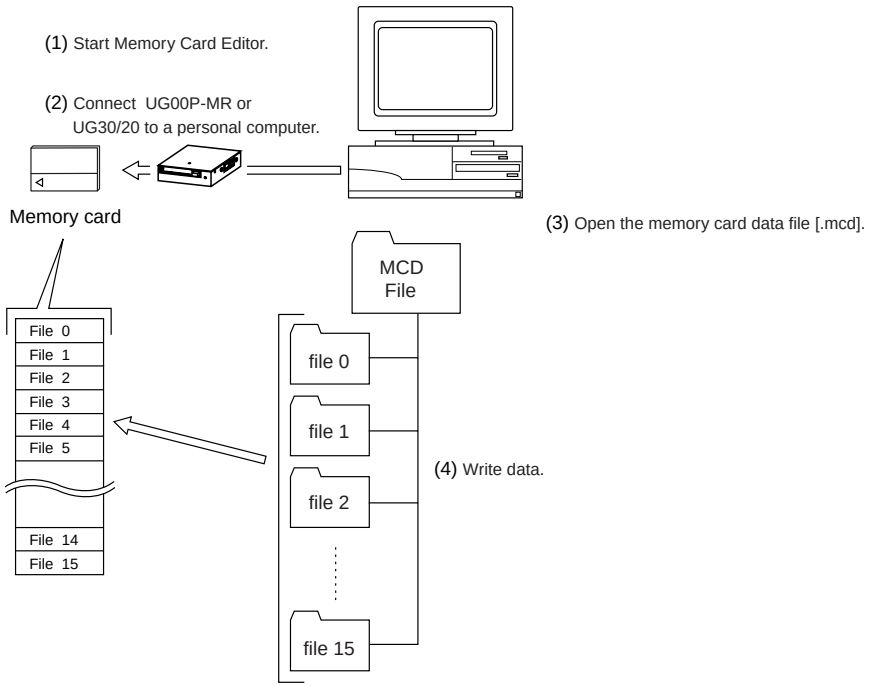


Writing to the Memory Card

After editing is completed, write the MCD file, which includes the data file, onto the memory card.

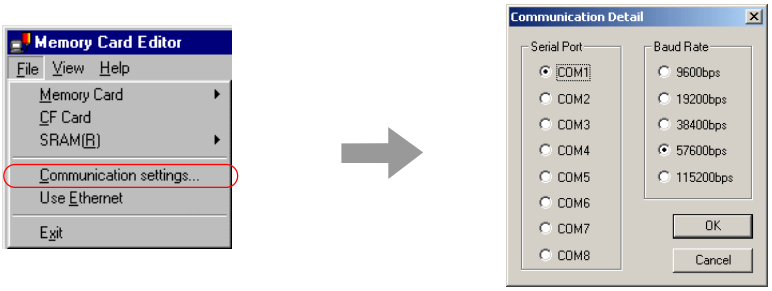
Operation Outline

The write procedure is as shown below.



1) Before connecting the memory card to a PC

1. Start Memory Card Editor.
2. Set the baud rate for communicating with UG00P-MR or UG30/20 with a built-in card interface. Go to [File] and click on [Communication Settings...], and then set the [Communication Detail] dialog.

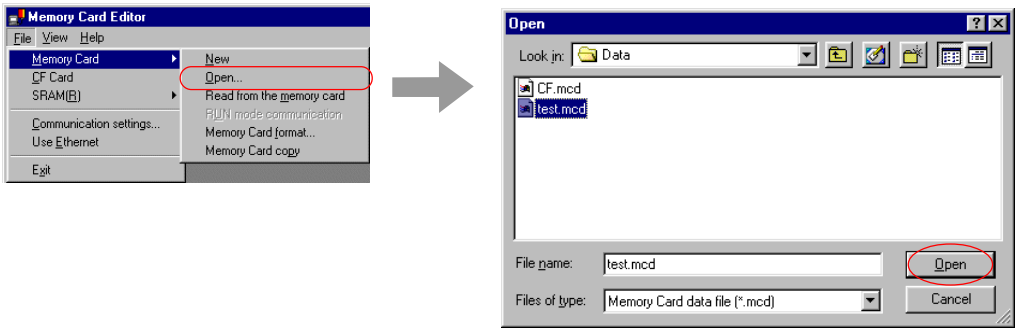


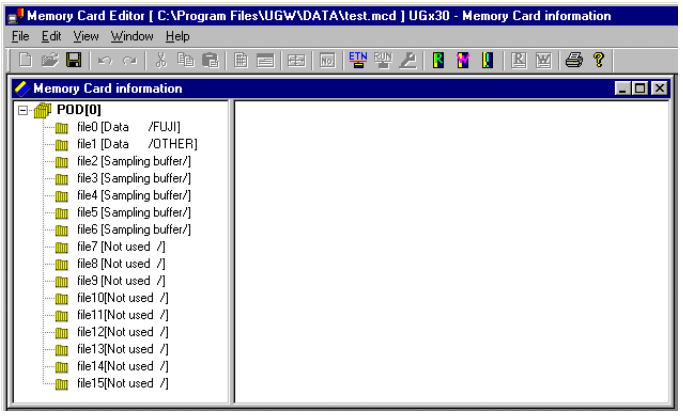
2) Connecting UG00P-MR to a PC

Use a UG00C-T (RS232C cable for screen data transmission) to connect a personal computer to a UG00P-MR (with an AC adapter) with a memory card inserted in it, or to UG30/20 with a built-in card interface with a memory card inserted in it.

3) Open an MCD file

Specify the MCD file to be written on the memory card by going to [File], [Memory Card] and then click [Open].





When this is done, the MCD file is open. (The name of the MCD file that is open is displayed above the editor title bar.)

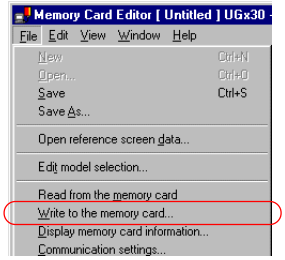
4) Write data on the memory card

Write MCD file contents onto the memory card.
When the MCD file format is the same as the format of the memory card inserted into UG00P-MR, writing takes place immediately.
When the format is different, confirm whether or not you wish to format the memory card and write.

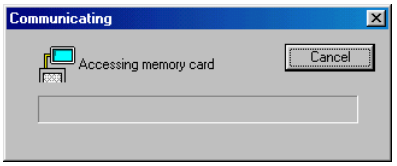
1. Click the [Write Memory Card] icon, or go to [File] and click on [Write to the Memory Card].

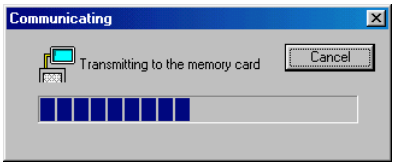
All the data of MCD file can be written by clicking the [Write Memory Card] icon.

or

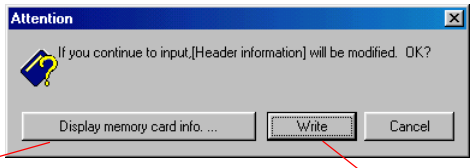


If the formats agree, a dialog like the one below indicating writing in process is displayed.
When the dialog disappears, this is an indication that MCD file contents have been written onto the memory card.



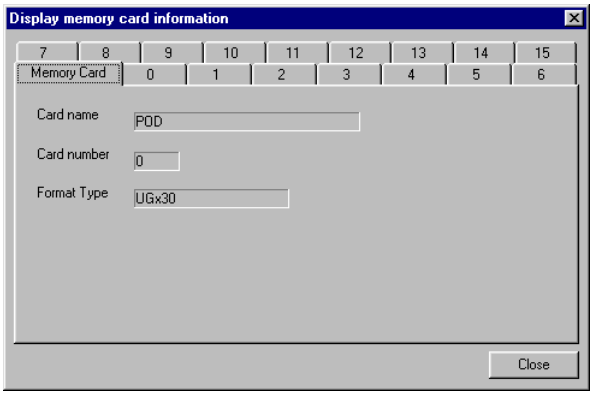


2. When the formats disagree, a window like the one below is displayed.



When you click here...

When you click here, data is written after the memory card is formatted.

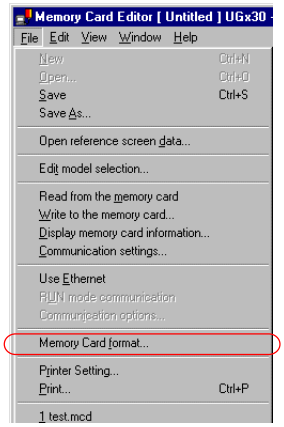


The memory card contents that were copied are displayed.

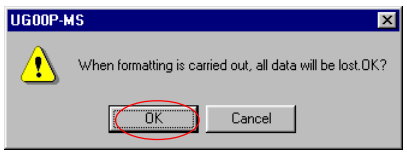
Formatting and Copying the Memory Card

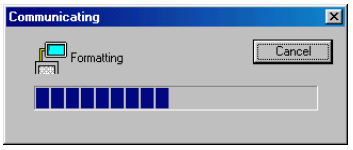
Memory Card Formatting

Formatting is performed after opening the MCD file in the editor and formatting the memory card with the same contents as the MCD file.
However, the MCD file card names, file names, record names, and data contents cannot be written on the memory card.



1. Connect the UG00P-MR to a personal computer.
2. Insert the memory card to be formatted into the UG00P-MR.
3. Start Memory Card Editor and open the MCD file.
4. Go to [File] and click on [Memory Card format...].
5. A warning message like the one shown below is displayed. When [OK] is clicked, the next dialog is displayed.



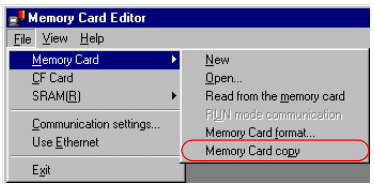


When the dialog disappears, this is an indication that the memory card and the MCD file are now in the same format.

A memory card which saves the screen data can not be copied.

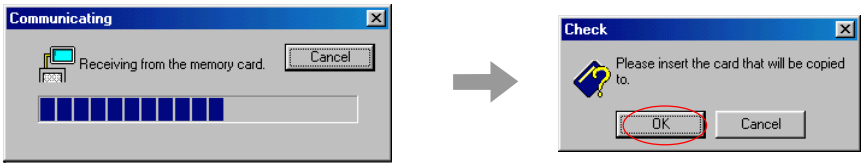
Memory Card Copying

Copying from one card to another is possible.
As long as they fall within the acceptable current use capacity range, it is possible to copy between an SRAM card and an SRAM card, an SRAM card and an FROM card, and an FROM card and an FROM card.
(For example, if only 256k are being used on a card with a 1M capacity, it is possible to copy on to the 256k card.)



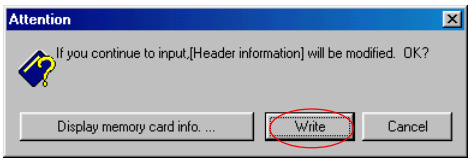
1. Connect the UG00P-MR to a personal computer.
2. Start Memory Card Editor.
3. Go to [File], [Memory Card] and click on [Memory Card Copy].
4. A confirmation dialog like the one below is displayed. Insert the memory card to be copied from into the UG00P-MR and click [OK].

5. After a dialog like the one shown below is displayed, the confirmation dialog will be displayed again. This time, insert the memory card that will be copied to into the UG00P-MR and click [OK].



6. If the capacity of the card that will be copied to is inadequate, the following message is displayed and copy is canceled.

7. If the capacity of the card that will be copied to is adequate but the format information varies from the card that is copied from, the following dialog is displayed. If you go ahead and click [Write], copy is executed.



Other Setting Items

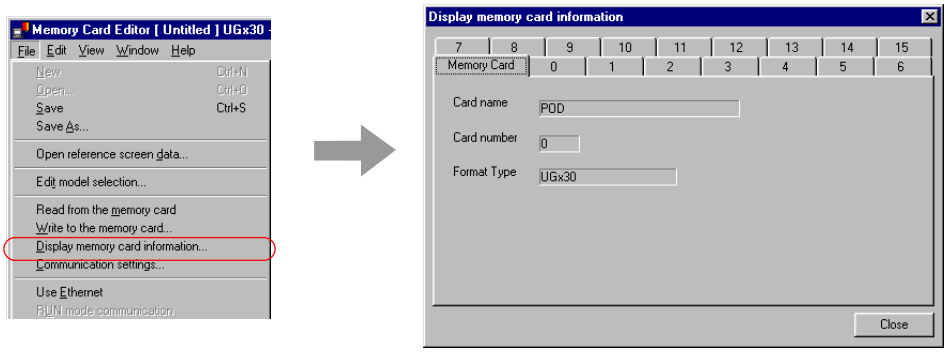
Checking Memory Card Information

From Editor, it is possible to check the contents of the memory card that is inserted into the UG00P-MR currently connected to a personal computer.

When you click the [Memory Card Information] icon or go to [File] and click on [Display Memory Card Information...], the dialog shown below will appear after a few moments.

or

Check contents by switching between the tab windows for file numbers 0 to 15.



Changing the MCD File Type (Properties)

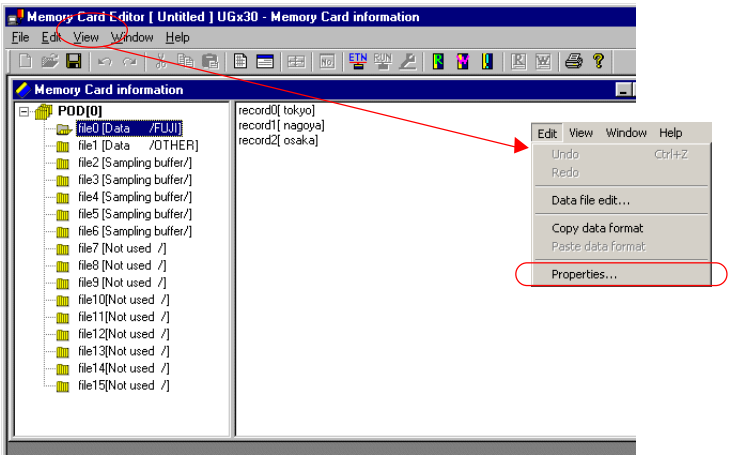
[Properties] icon

It is possible to change an MCD file's card name, file name, records, and data, among other things.

Select a card name or file in the [Memory Card Information] dialog, click the [Properties] icon, or go to [Edit], and click on [Properties].

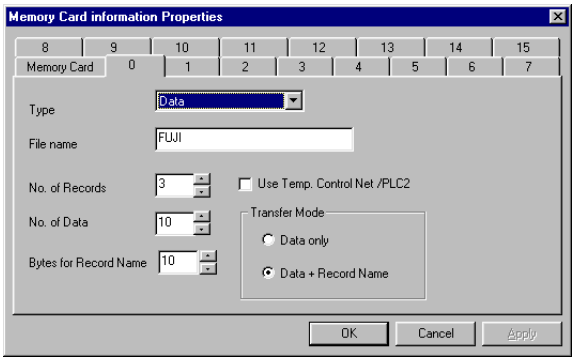
Shortcut

After selecting a file, display the [Memory Card Information Properties] with Shift key + Enter key.

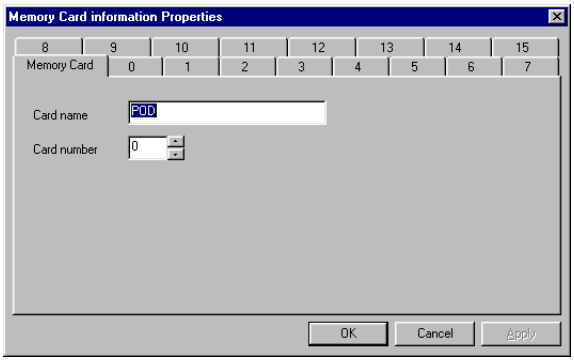


The [Memory Card Information Properties] dialog is displayed.

Items like the ones below can be changed on the [0] to [15] tab window.



[Card Name] and [Card Number] can be changed on the [Memory Card] tab window.

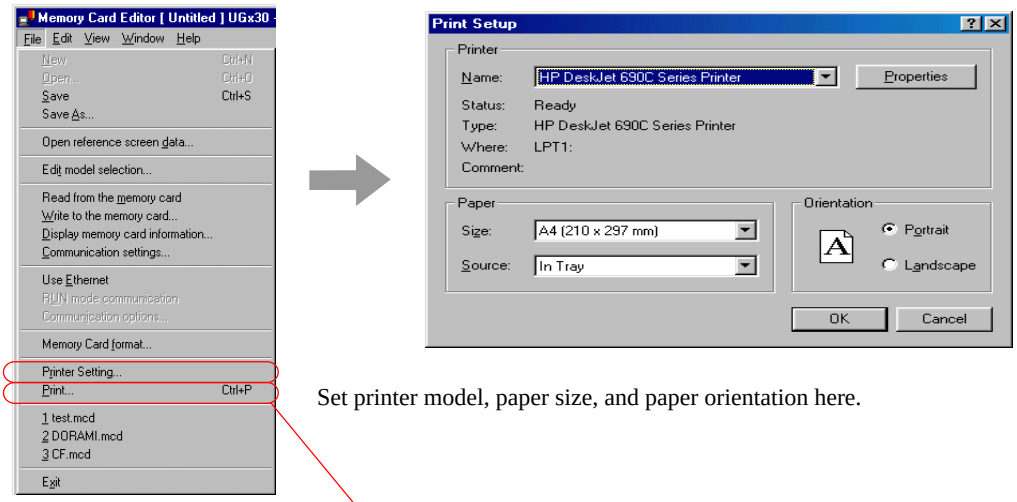


Printing

It is possible to print directly from Memory Card Editor.

◆ [Printer Setting]

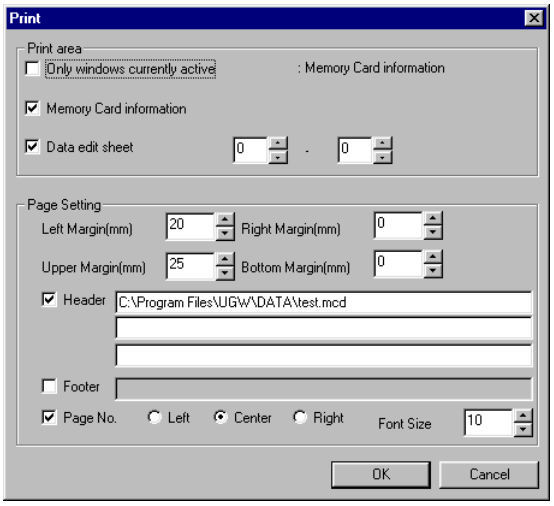
When you go to [File] and click [Printer Setting...], a [Print Setup] dialog like the one below is displayed.



Set printer model, paper size, and paper orientation here.

◆ [Print]

When you go to [File] and click [Print...], a [Print] dialog like the one below is displayed.

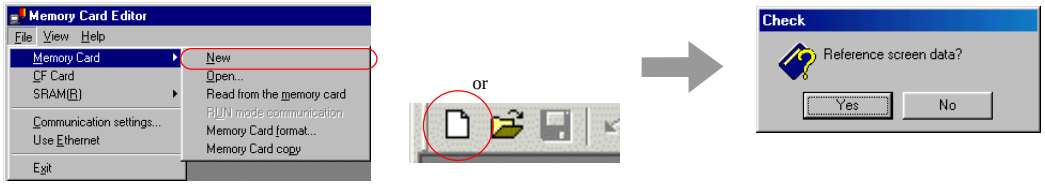


After you specify the print area and machine settings here and click [OK], printing takes place.

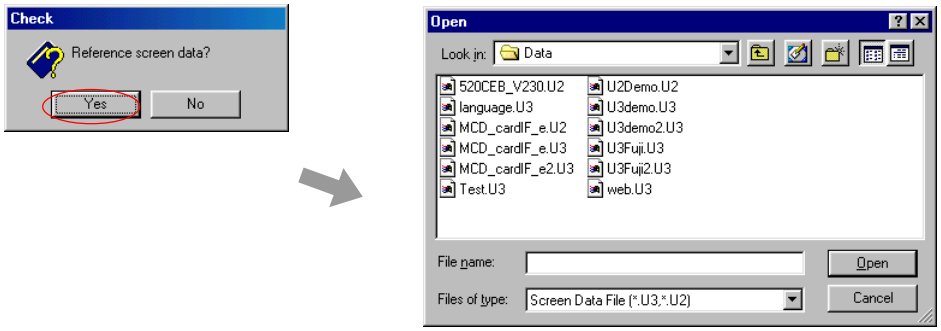
Creating a New MCD File

It is also possible to create a new MCD file on the editor instead of reading from the memory card.

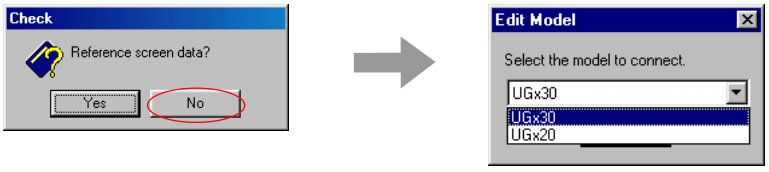
1. When you click the [New] icon or go to [File], [Memory Card] and click [New], a confirmation dialog like the one shown below is displayed.



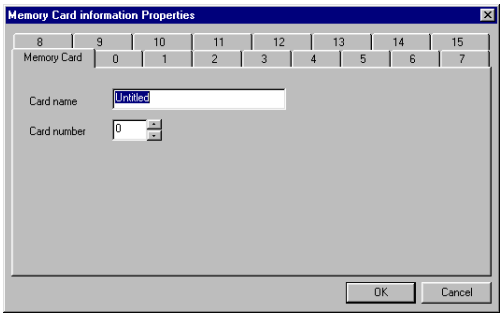
2. When you click on [Yes] and specify the screen data file that will be used as the source file, that setting is referenced and the MCD file format is automatically determined.



3. When you click on [No], the [Edit Model] dialog is displayed. Select the model to connect to and click [OK].



4. The [Memory Card Information Properties] dialog is displayed.
Set each setting item and the [Memory Card Information] dialog is displayed.



Set the necessary items.

Ethernet Connection

When connecting to the UG30/20 series which supports Ethernet communication, it is possible to read/write the information in a memory card connected to the UG30/20 via Ethernet.

Use UG20 system program version 1.200 or later.

Connection between UG30/20 and PC

1. UG30(high-performance type)

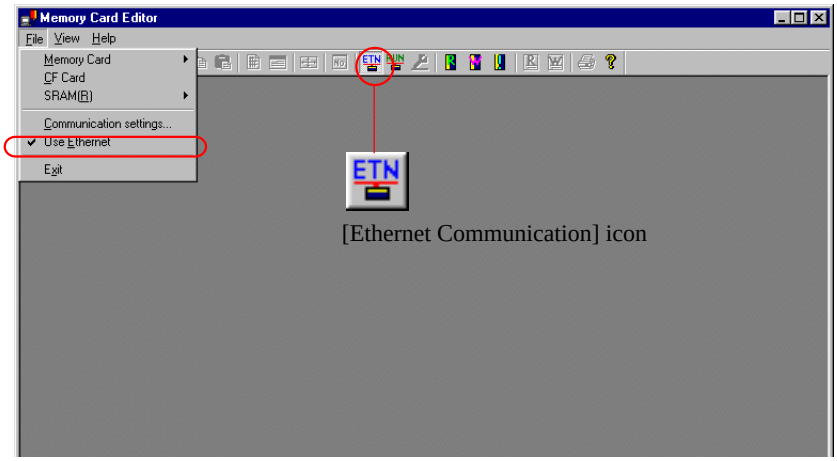
Connect the LAN port on the rear side of the UG30 to a PC using the cable for Ethernet.

UG30(standard type)/UG20

Connect UG03I-E on the rear side of UG30(standard)/UG20 to a PC using the cable for Ethernet.

2. Start UG00P-MS.

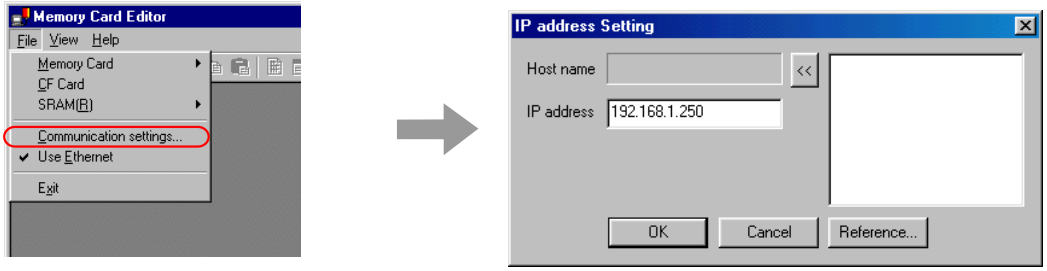
3. Click the [Ethernet Communication] icon, or [Use Ethernet] from [File] menu.



4. Click [Communication Settings] from [File] menu.

The [IP Address Setting] dialog is displayed.

5. Specify the IP address of UG30/20, and click [OK].



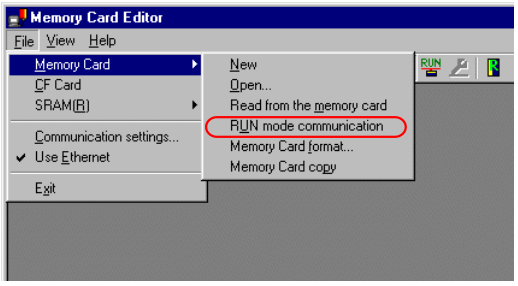
RUN Mode Communication

In case of Ethernet connection, RUN mode communication is available.
RUN mode communication can maintain RUN mode while communicating with a memory card without displaying the Main Menu (= communication stops).

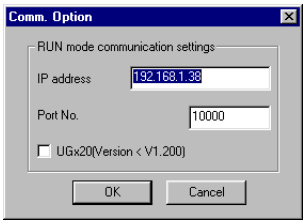
◆ Setting

1. When starting RUN mode communication, click the [RUN Mode Communication] icon, or go to [File], [Memory Card], and then click [RUN Mode Communication].

or



2. The [Comm. Option] dialog is displayed.



[IP Address]

Specify the IP address of the UG30/20.

[Port No.]

When the port number of UG30/20 is any other than 10000, specify the port number here.

If RUN mode communication is not selected, this setting is not necessary.

[☐ UG20 (Version < V1.200)]

Check this box if connecting via Ethernet to a UG20 which has the system program version 1.200 or earlier.

When the setting is complete, click [OK].

After clicking [OK], if you wish to confirm the settings of the [Comm. Option] dialog again, click the [Comm. Option] icon.

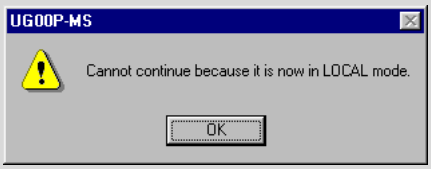
[Comm. Option] icon

◆ Reading/Writing Memory Card

1. Check if UG30/20 is in RUN mode, and click the [Read/Write Memory Card] icon, or [Read from the Memory Card/Write to the Memory Card] from [File] menu.

2. Communicate with a memory card.

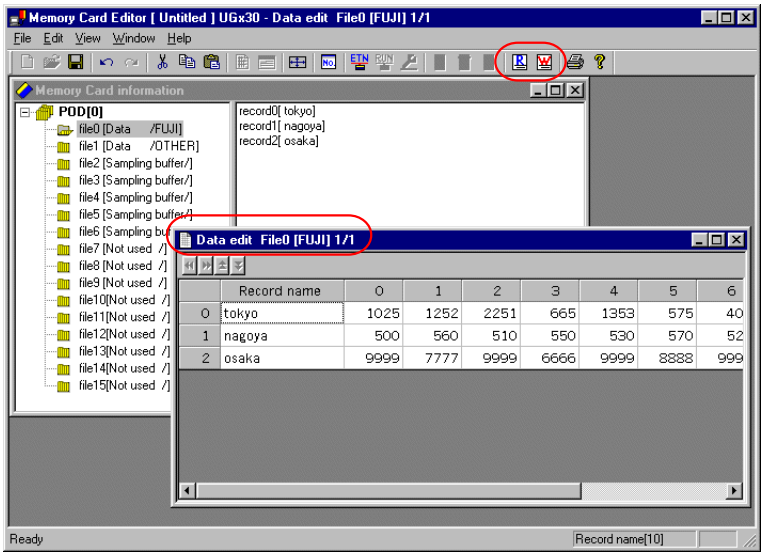
When UG30/20 displays the Main Menu, the following dialog is displayed. Make UG30/20 in RUN mode, or click [Read from the Memory Card/Write to the Memory Card] again after stopping RUN mode communication.



When clicking the [Write Memory Card] icon, only the data file is written. The sampling buffer file is not written.

◆ Reading/Writing File

1. Open the [Data Edit] window.



2. Check if UG30/20 is in RUN mode, and click the [Read/Write File] icon, or [Read/Write File] from [File] menu.

3. Communicate with a memory card.

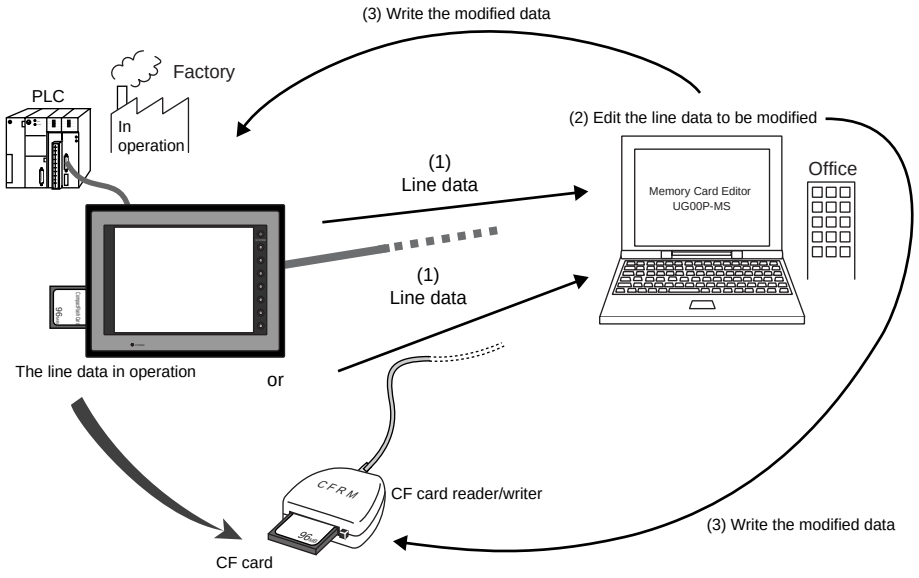
When connecting via Ethernet, the information of a memory card can be read or written without using RUN mode communication. In this case, the display of POD is automatically switched to the Main Menu while communicating with a memory card.

Make the [RUN Mode Communication] icon raised ( ). The way to read/write the data is the same as in RUN mode communication.

[CF Card]

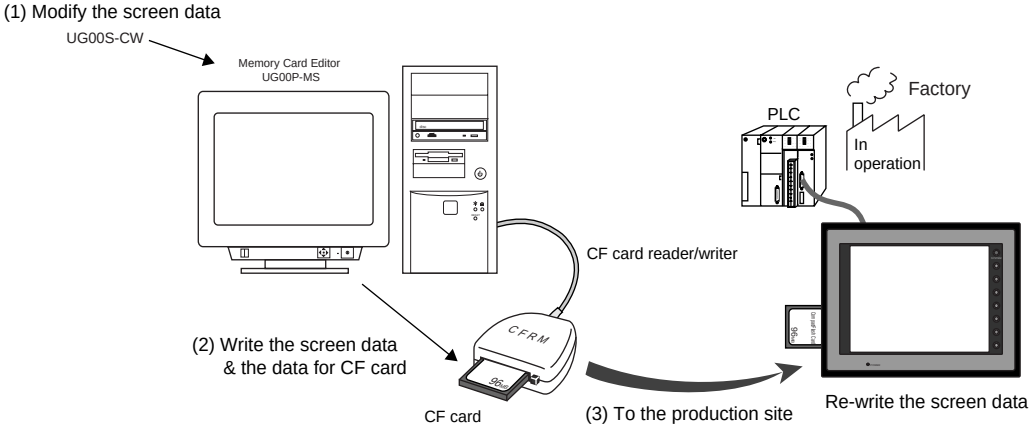
Operation Examples

Read from CF Card → Write to CF Card



(1) Read the line data in operation → (2) Modify the data → (3) Write the modified data

Write Screen Data & CF Card Data to CF Card

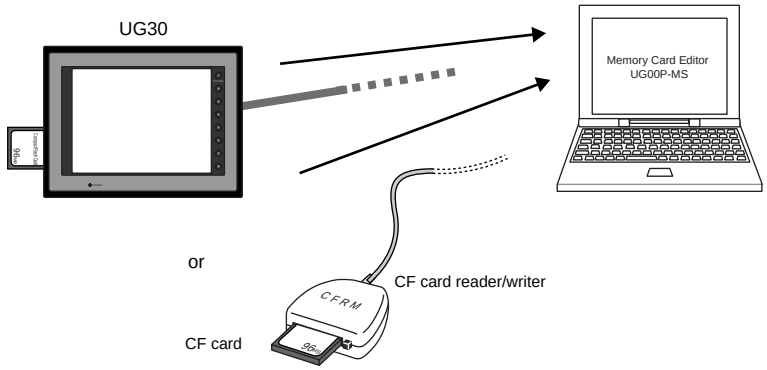


(1) Modify the screen data → (2) Write by UG00P-MS → (3) To the production site

Reading from a CF Card

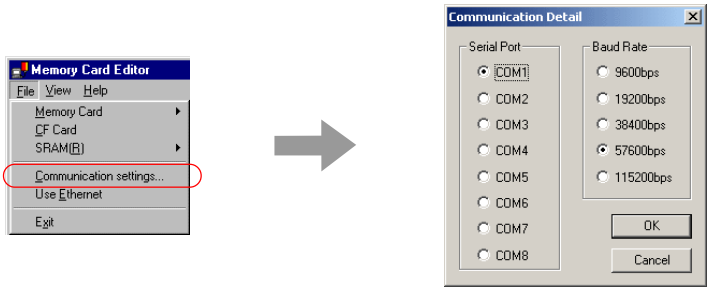
1. Start Memory Card Editor.

2. When reading the data from the UG30 which has a CF card inserted, set the communication settings first. If you access the CF card in a CF card reader/writer which is connected to a PC, go to step 3.



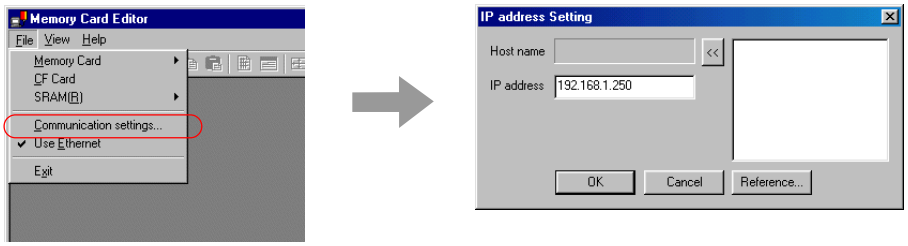
When using UG00C-T:

Click [Communication Settings] from the [File] menu. The [Communication Detail] dialog is displayed. Specify [Serial Port] and [Baud Rate] of your PC.

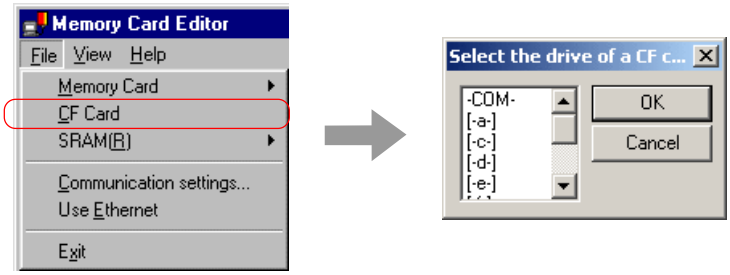


When using Ethernet communication:

1) Click [Use Ethernet] from the [File] menu. [Use Ethernet] is checked.
2) Click [Communication Settings] from the [File] menu. The [IP Address Setting] dialog is displayed. Specify the IP address of the UG30.

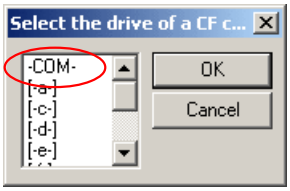


3. Click [CF Card] from the [File] menu.
The [Select the Drive of a CF C...] dialog is displayed.

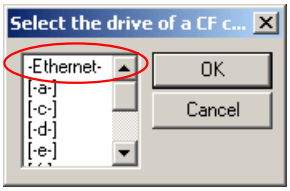


4. When reading from a CF card reader/writer:
Click the appropriate drive, and then click [OK].

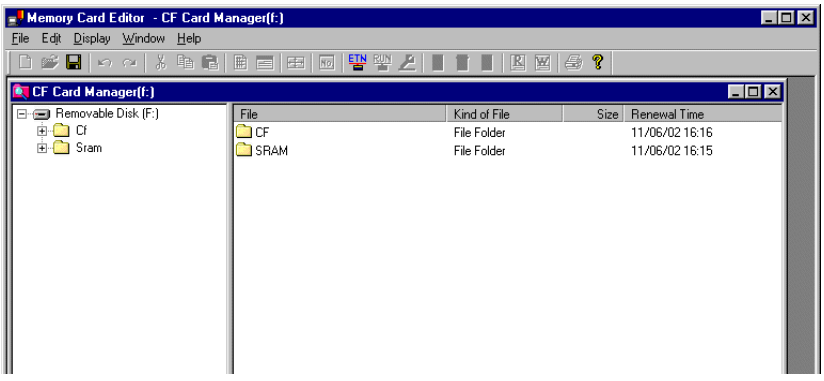
When reading from the UG30 via a UG00C-T:
Click [-COM-], and then click [OK].



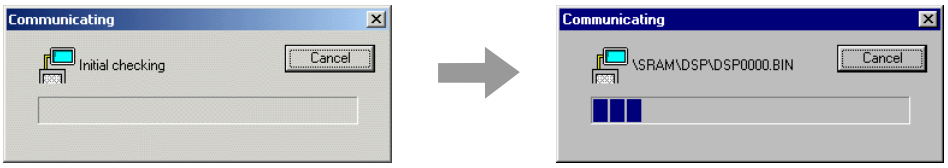
When reading from the UG30 via Ethernet:
Click [-Ethernet-], and then click [OK].



5. For the CF card reader/writer, the contents of the CF card are immediately displayed.



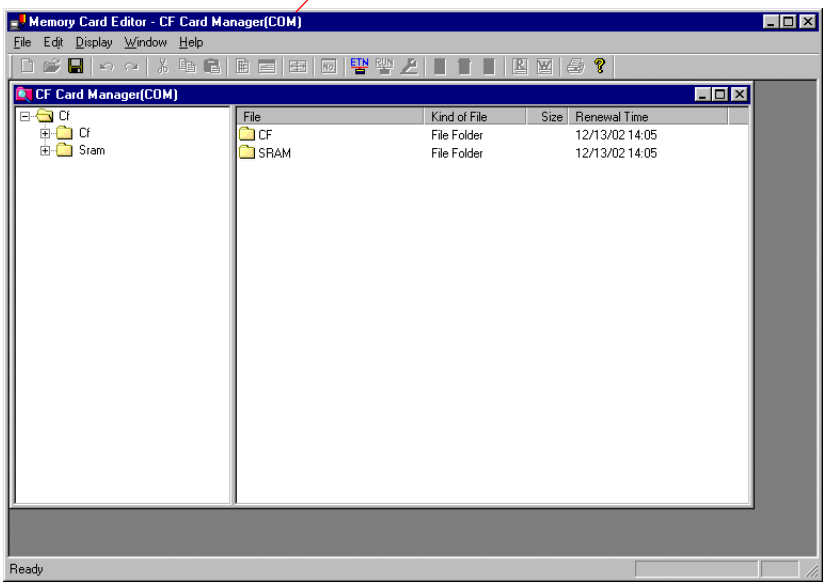
6. When reading data via the UG30, reading process will be started after the message "Initial checking" is displayed.



Because all the data in the CF card is read, the reading process may take a long time.

7. When reading is complete, the window as shown below is displayed.

When the UG30 reads via [COM], [COM] is displayed.
When it reads via Ethernet, [Ethernet] is displayed.



Editing a CF Card

The data read can be edited or converted.

Editing/Converting Data

Refer the following list to learn about editable or convertible data.

Folder Name	File Name	Edit *	Conversion
BITMAP	BMPxxxx.BIN	×	○ (→*.BMP)
CARD	MCMHEAD.BIN	×	○ (→*.MCD)
	MCMxxxx.BIN	○	○ (→*.MCD, *.CSV)
DSP	DSP0000.BIN	×	○ (→*.U3/U2)
FONT	xxxxx.FTD	×	×
HDCOPY	HDxxxx.JPG	×	×
	HDxxxx.BIN	×	○ (→*.BMP)
JPEG	xxxxx.JPG JPxxxxx.JPG	×	×
MEMO	MEMxxxx.BIN	×	○ (→*.BMP)
RECIPE	RECxxxx.CSV	×	×
SAMPLE	SMPxxxx.BIN	○	○ (→*.MCD, *.CSV)
	SMPxxxx.CSV	×	×
SNAP	VDxxxxx.JPG	×	×
SRAM	SRM0000.BIN	×	×
WAV	WAxxxx.WAV	×	×
WEBSERV	*.SHT, *.HTML etc.	×	×

*** "Conversion" means editing or modifying the data on the Memory Card Editor.**

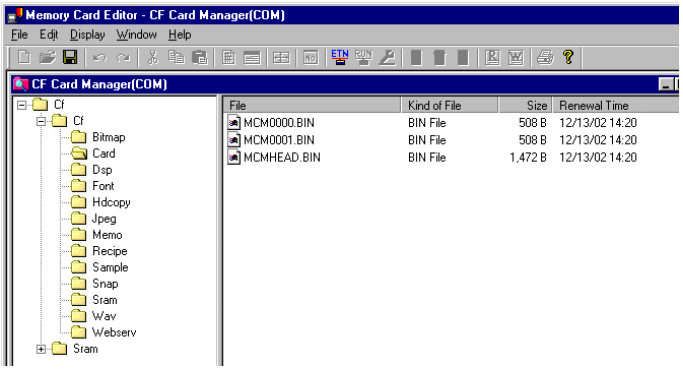
How to Edit the Data

The following two kinds of files are editable.

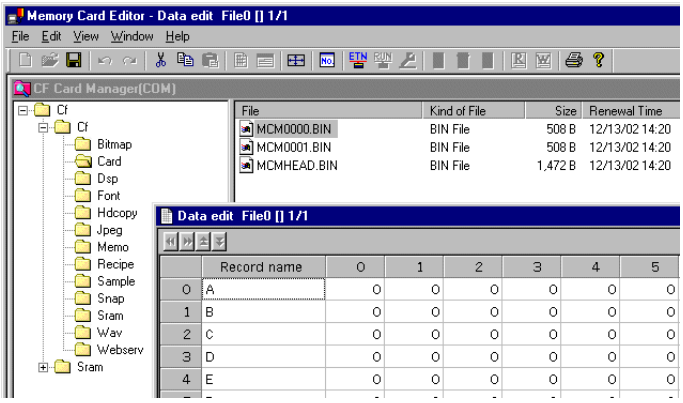
- MCMxxxx.BIN
- SMPxxxx.BIN

◆ MCMxxxx.BIN

1. Double-click the "MCMxxxx.BIN" file (in the "CARD" folder).



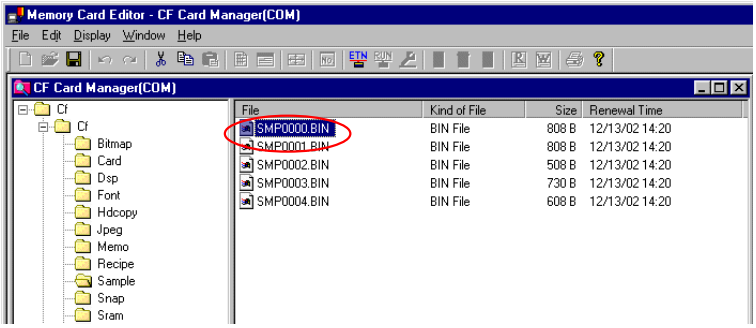
2. The data edit window is open as shown below.



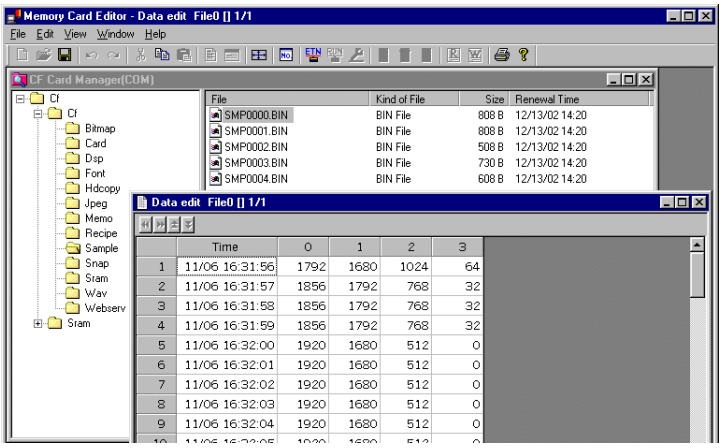
The structure of this window is the same as the [Type: Data] file that is displayed when [Memory Card] is selected. Refer to page 20 for the details of the editing method.

◆ SMPxxxx.BIN

1. Double-click the "SMPxxxx.BIN" file (in the "SAMPLE" folder).



2. The data edit window is open as shown below.



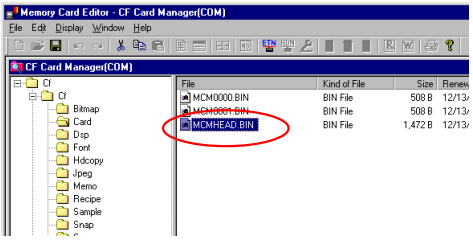
The structure of this window is the same as the [Type: Sampling Buffer] file that is displayed when [Memory Card] is selected. Refer to page 14 for the details of the editing method.

How to Convert the Files

The conversion targets are BIN files (the extension [*.BIN]). There are two conversion procedures depending on the file format.

◆ [Put BIN File Back]

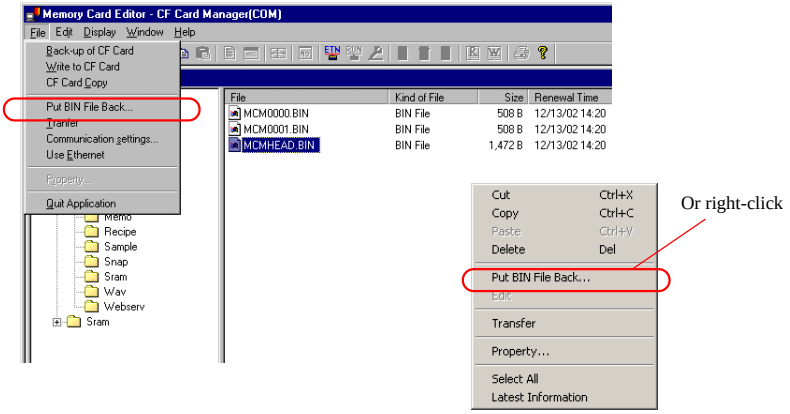
File	Extension after Conversion
• BMPxxxx.BIN	.BMP
• MCMHEAD.BIN	.MCD
• DSP0000.BIN	.U3, .U2
• HDxxxx.BIN	.BMP
• MEMxxxx.BIN	.BMP



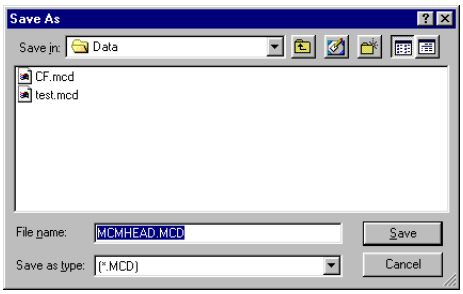
Follow the steps below.

1. Select the file to be converted.

2. Select [Put BIN File Back] from the [File] menu. Or right-click and select [Put BIN File Back].



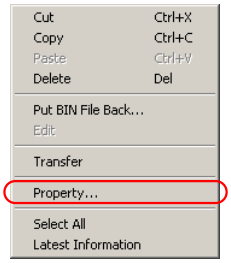
3. [Save As] dialog is displayed.
Specify the desired file name and click [Save].



4. The converted file is created in the specified folder.

Properties of a BIN File

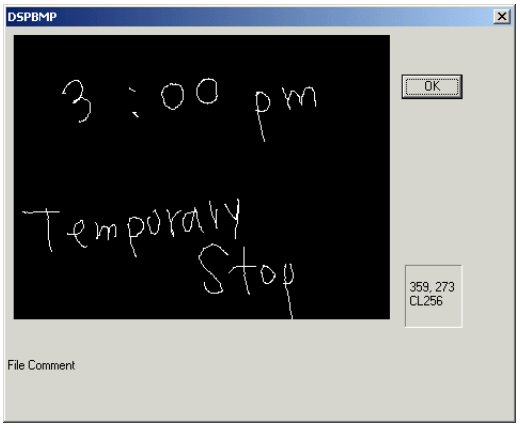
You can check information about each BIN file before conversion.



Ex.)

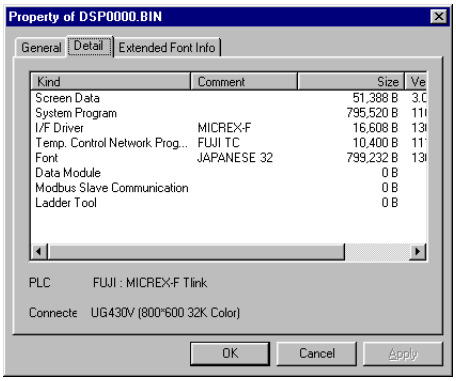
○ BMPxxxx.BIN and MEMxxxx.BIN

The Bitmap image is displayed.



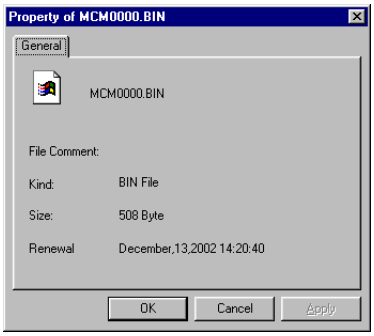
○ DSP0000.BIN

You can check the file type or version in the [Detail] tab window.



○ Other BIN Files

In the [General] tab window, the comment that you entered in the [File Comment of BIN File] field is displayed. ([File] → [Write to CF Card])



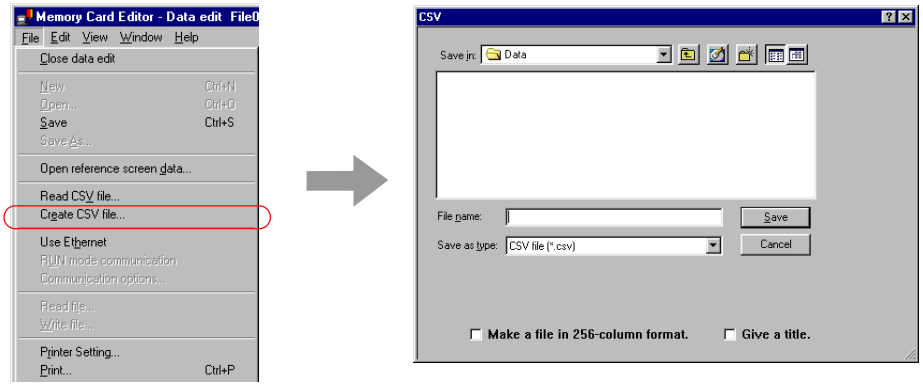
◆ Creating a CSV File

File	Extension after Conversion
• MCMxxxx.BIN	.CSV
• SMPxxxx.BIN	.CSV

Follow the steps below.

1. Double-click each file and keep it open.

2. Click [Create CSV File] from the [File] menu.
[Save As] dialog is displayed.

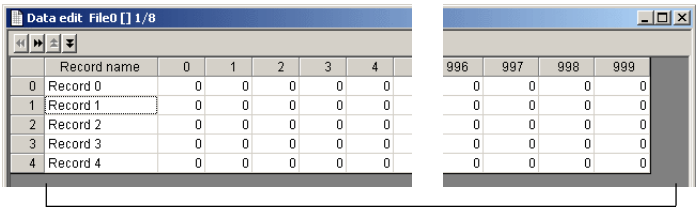


[☐ Make a File in 256-Column Format]

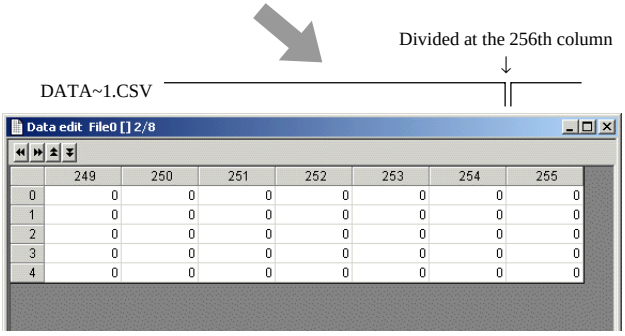
This setting is effective when the data count in a "MCMxxxx.BIN" file is 256 or more.

When you save the data in a CSV file and edit it with Excel, only 256 columns can be displayed. If the data count is 256 or more, you cannot open the CSV file with Excel.

If you check this item and save the file, the CSV files will be created automatically from "(the desired file name) ~1.CSV" with the available number of columns (= the number of data).



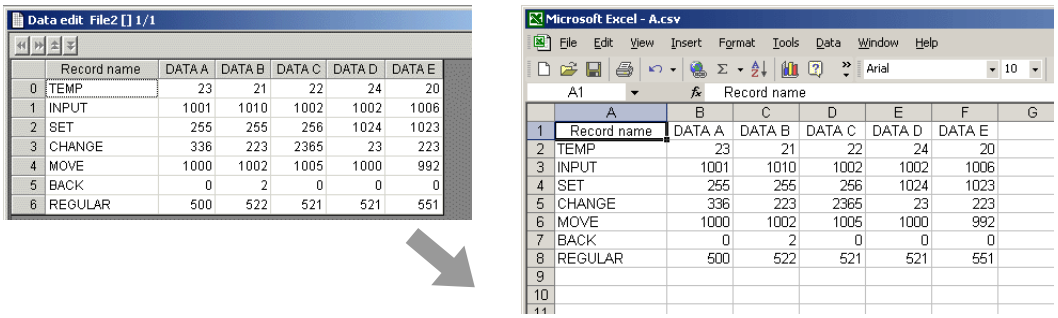
[The data count: 1000] + "Record name" column = 1001 columns



DATA~2.CSV
DATA~3.CSV
DATA~4.CSV
⋮
Any file is divided at the 256th column

[☐ Give a Title]

Using the memory card editor function, each title in a data file can be edited.
Check this box if you save the title as data when saving in a CSV data.

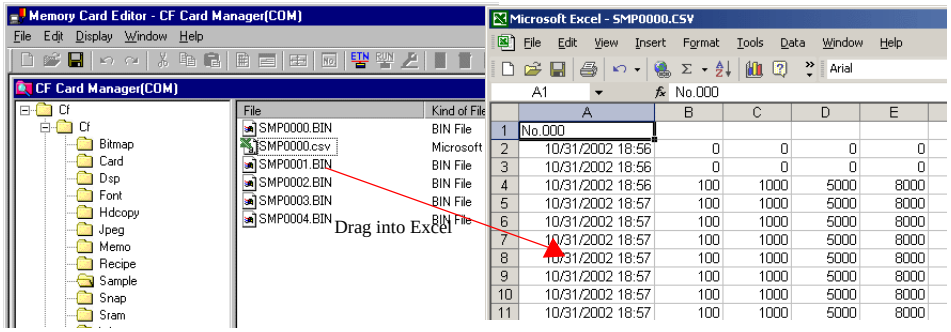


3. If you save with the desired file name, a CSV file will be created.

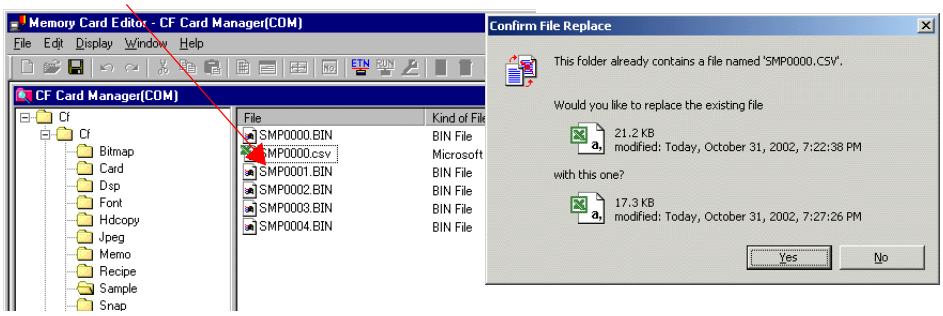
Alternate Operating Method (Drag & Drop)

A CSV file or a JPEG file can be confirmed on the Memory Card Editor, but cannot be displayed or edited. You can edit or display these files by dragging & dropping into the other applications.

For example, you can open the "SMP000.CSV" file in the "SAMPLE" folder by dragging it from the memory card editor and dropping it into Excel directly.



After modifying and saving, if you drag it back to the Memory Card Editor, the following confirmation message is displayed.



If you accept replacing the file, the modified date is stored in the "SAMPLE" folder.

Writing to a CF Card

There are three ways to write a data to a CF card.

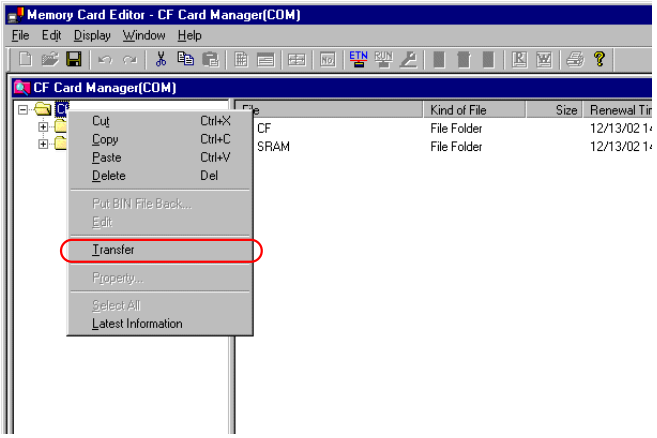
A) Batch Transfer

Because all the data in the CF card is read, reading process may take a long time.

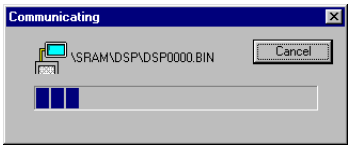
The following method is for batch writing of the data read from a CF card to the CF card after editing. Follow the steps below.

1. Display the list of the folders from the CF card in the Memory Card Editor.

2. Right-click the [CF] folder, and then click [Transfer].
(Or click the [CF] folder, then click [Transfer] from the [File] menu.)



3. All the contents of each folder under the [CF] folder are transferred to the CF card at once.



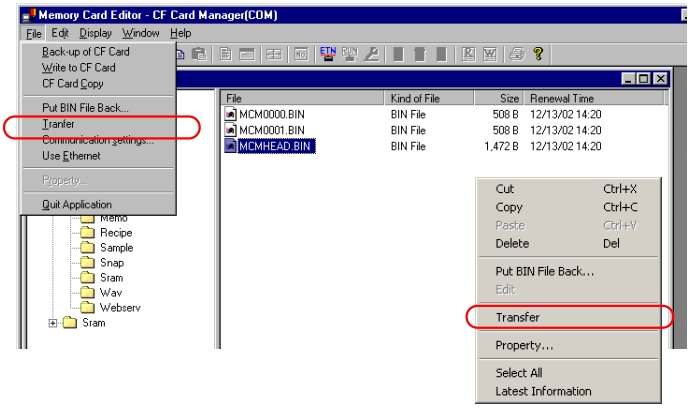
If you click [Cancel] while the data is being written, the data in the CF card may be corrupted. Be sure not to cancel the operation while the data is being written.

B) Individual Transfer

This is the method for writing modified data to the CF card after reading or data prepared on a PC. Follow the steps below.

1. Display the list of the folders from the CF card in the Memory Card Editor.

2. Right-click the file to be written or the folder which has that file, and then click [Transfer]. (Or click the file/folder, and then click [Transfer] from the [File] menu.)



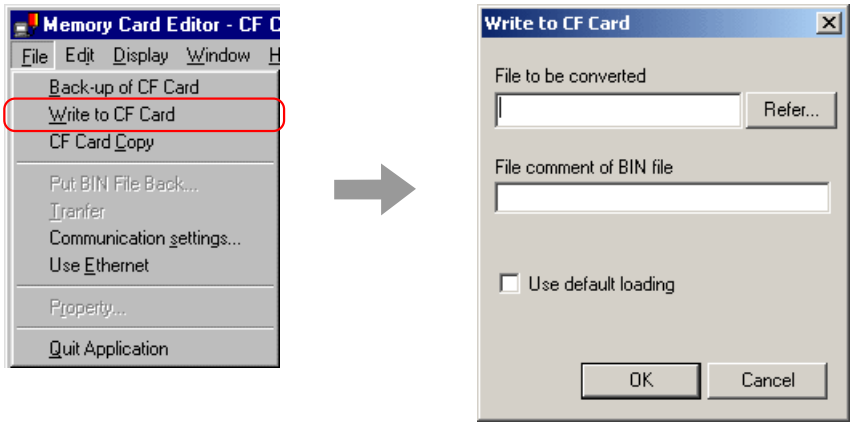
3. The selected file/folder is transferred to the CF card.

For a file prepared on a PC, it is recommended that you drag & drop it into the appropriate folder in the Memory Card Editor in advance.

C) Writing from a Screen Data File

Similar to the V-SFT CF Card Manager, by writing from the screen data file of the UG30/20 to the CF card, the appropriate file (WAV file, JPEG file, or Font file, etc.) for the screen data file is written automatically. Follow the steps below.

1. Select [Write to CF Card] from the [File] menu.
The [Write to CF Card] dialog is displayed.



[File to be Converted]
Click [Refer] and select the file you wish to write to the CF card. The extensions of the target files are [*.U3], [*.U2], or [*. MCD].

[*.MCD] File
When selecting a [*.MCD] file in the [Write to CF Card] dialog, the contents of the [*.MCD] file are written in the CF card format. The data actually only exists in the [CARD] folder or the [SAMPLE] folder.

[File Comment of BIN File]
Enter text when annotating the screen data file (DSP0000.BIN: BIN file) written to the CF card.

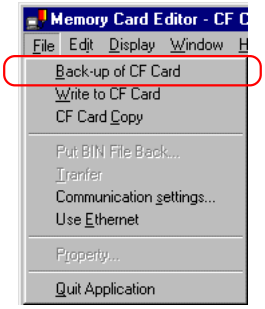
[☐ Use Default Loading]
Check this box when you perform "Auto Uploading of Screen Data."
For more information, refer to in "Chapter 23 CF Card" of the Reference Manual (Function).

2. When the setting is complete, click [OK]. The screen data file is saved as "DSP0000.BIN" (BIN file) in the [DSP] folder of the user folder on the CF card. At the same time, the specific extension is written to each folder on the CF card according to the screen data file setting.

Backing Up a CF Card

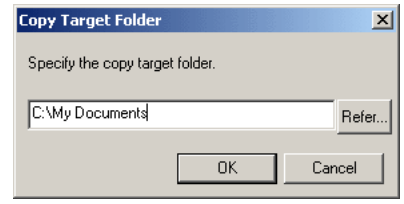
It is possible to save the data read from the CF card or the edited files.

1. Select [Back-up of CF Card] from the [File] menu.



2. When the [Copy Target Folder] dialog is displayed, click [Refer] and specify the copy target folder.

Ex.) When saving in the My Document folder in the C drive:



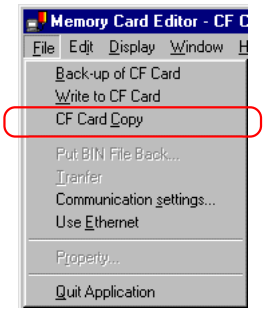
3. Click [OK]. The following message is displayed.

4. Click [OK]. The data on the CF card is copied to the copy target.
When the copy operation is complete, the following message is displayed.

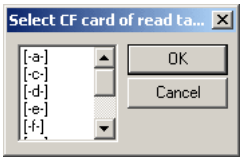
5. Make sure that the data is copied correctly using Explorer.

Copying a CF Card

1. Click [CF Card Copy] from the [File] menu.



2. Specify the CF card drive and click [OK].



3. The following message is displayed. Click [OK].

4. The following message is displayed. Remove the CF card from your PC and insert the target CF card. Click [OK].

5. The following message is displayed. Click [OK].

6. When the copy operation is complete, the following message is displayed.

[SRAM]

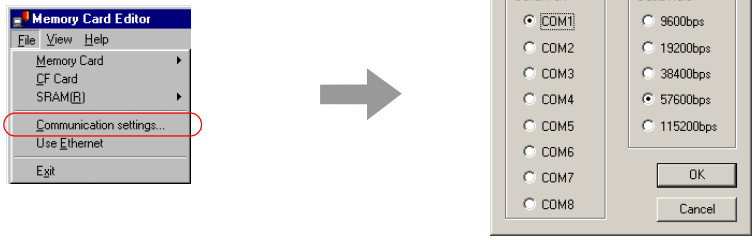
Read/Write data in a SRAM cassette and the built-in SRAM.

Reading from SRAM

1. Start Memory Card Editor.

2. When using UG00C-T:

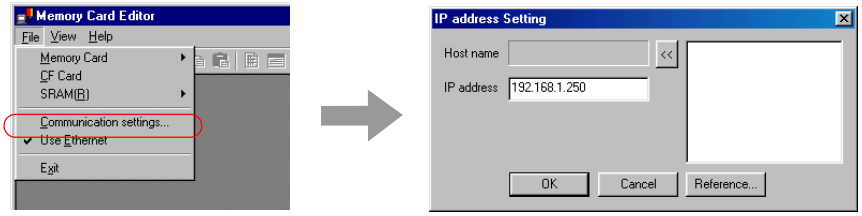
Click [Communication Settings] from the [File] menu. When the [Communication Detail] dialog is displayed, specify [Serial Port] and [Baud Rate] of your PC.



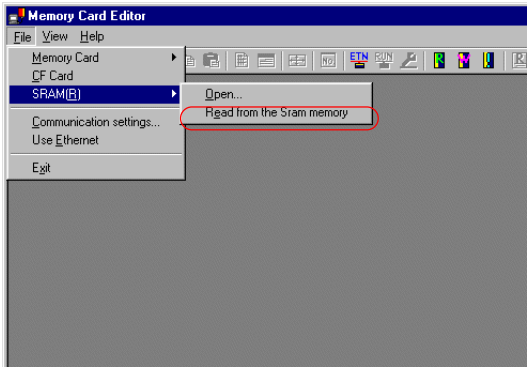
When using Ethernet communication:

1) Click [Use Ethernet] from the [File] menu. [Use Ethernet] is checked.

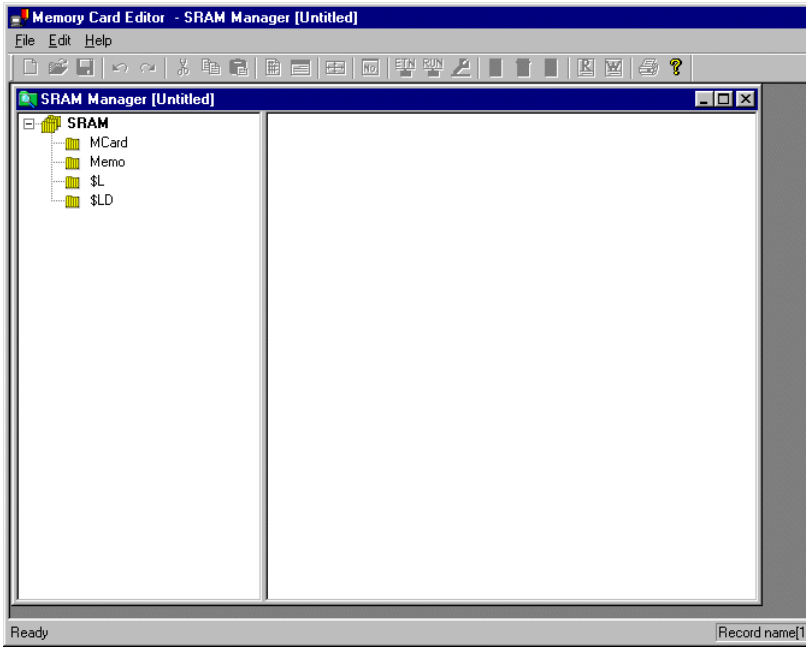
2) Click [Communication Settings] from the [File] menu. When [IP Address Setting] is displayed, specify the IP address of the UG30.



3. Go to [File], [SRAM], and then click [Read from the Sram Memory]. Reading data process is started.



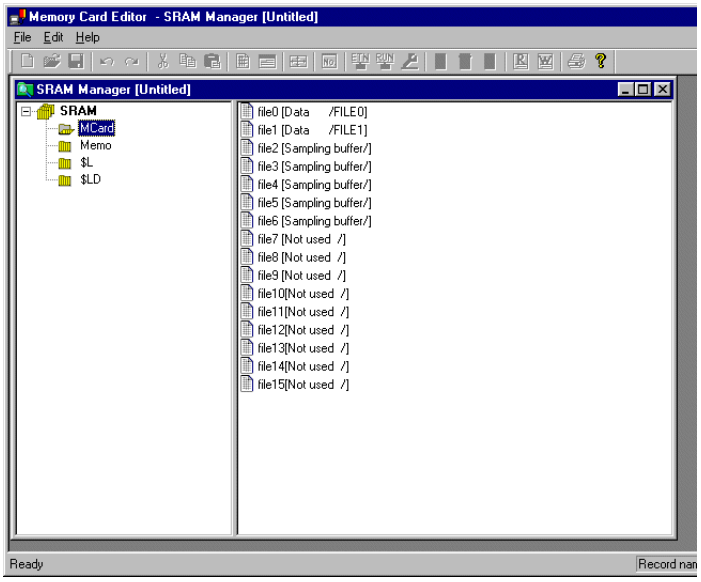
4. When reading is complete, the window shown below is displayed.



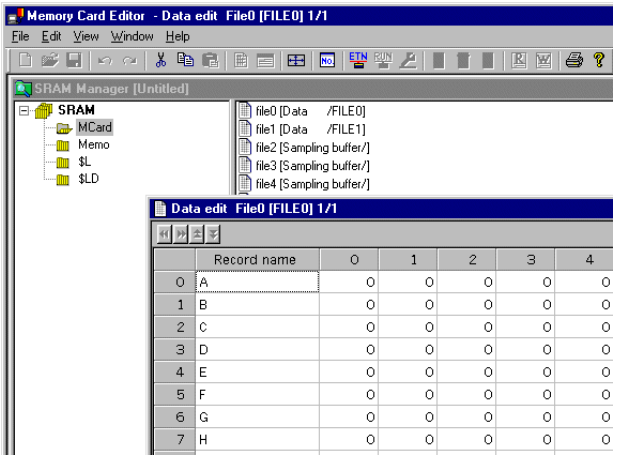
Editing SRAM

[MCard]

Click the [MCard] folder in the tree display in the left window.
Each file of the memory card emulation is displayed in the right window as shown below.

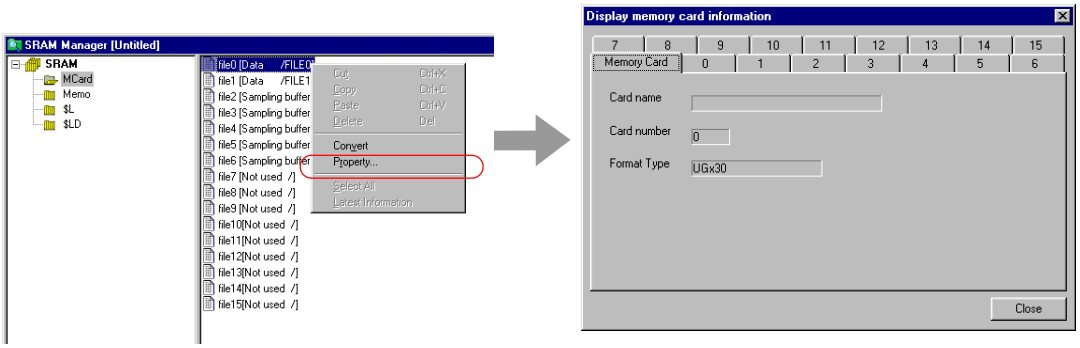


If you double-click each file, the contents of each file are displayed similar to the case where [Memory Card] is selected. The editing method is the same as the method described for [Memory Card]. For more information, refer to page 14.



◆ Confirming Properties

It is possible to confirm the setting items of the memory card emulation area. Right-click each file in the [MCard] folder, and then click [Property]. The [Display Memory Card Information] dialog is displayed as shown below.

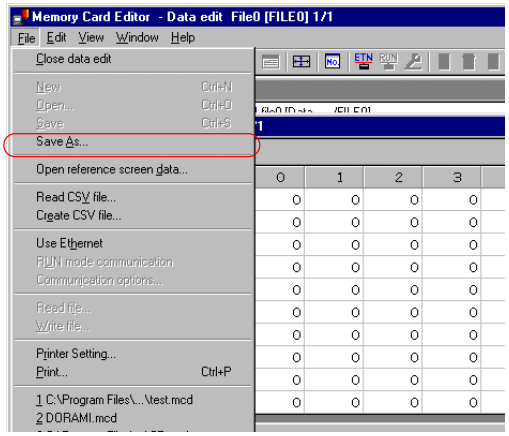


All 16 files in the [MCard] folder can be checked.

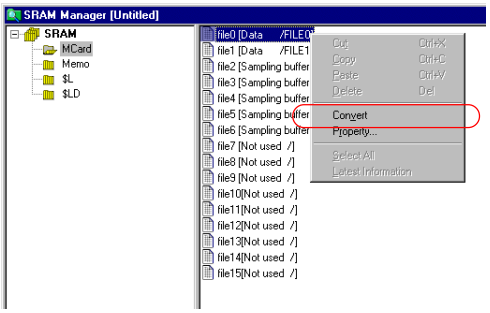
◆ Saving to a MCD File

It is possible to save the memory card emulation area as a [*.MCD] file.

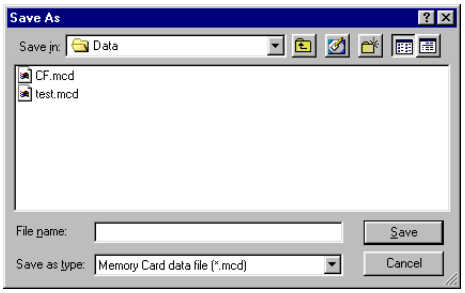
Click [Save As] in the [File] menu while the desired file in the [MCard] folder is open. Or right-click each file, and then click [Convert].



or



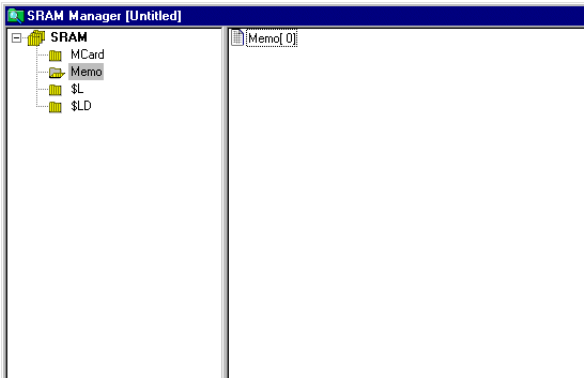
The [Save As] dialog is displayed as shown below. Specify the desired file name and click [Save].



After you save the MCD file, it is opened as memory card data, not as SRAM data. Open the file by clicking [File], [Memory Card], and then [Open], or clicking the [Open] icon.

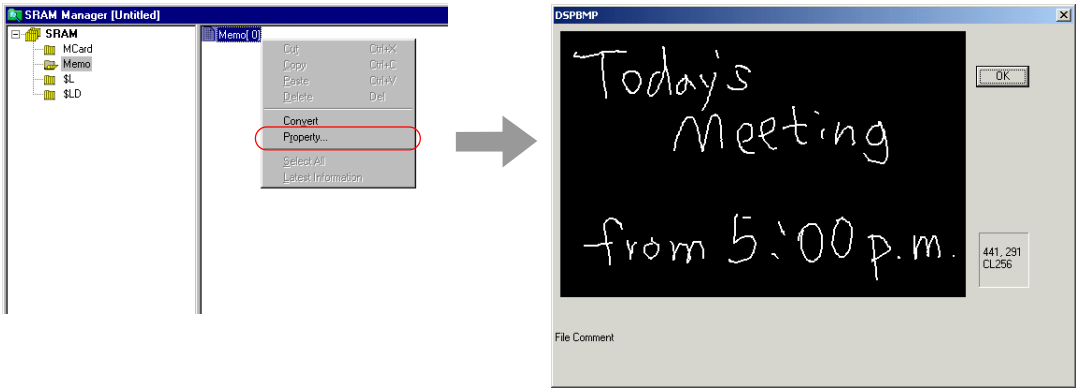
[Memo]

Click the [Memo] folder in the tree display in the left window.
Each of the memo pad data (No. 0~7) is displayed in the right window as shown below.



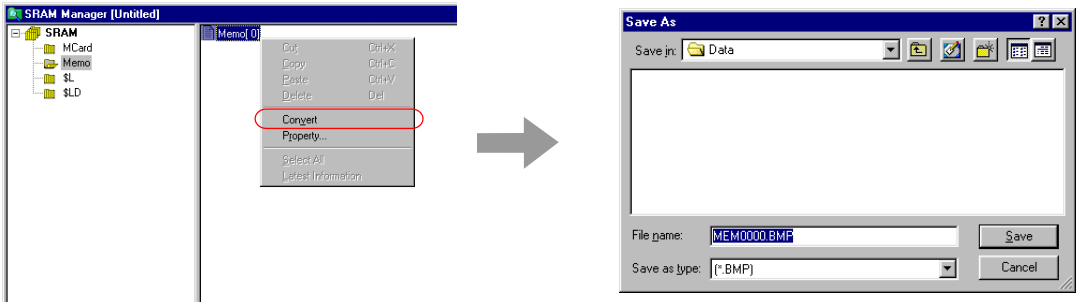
◆ Confirming Properties

The contents of the memo pad can be checked.
Right-click each file in the [Memo] folder, and then click [Property]. The following dialog is displayed.



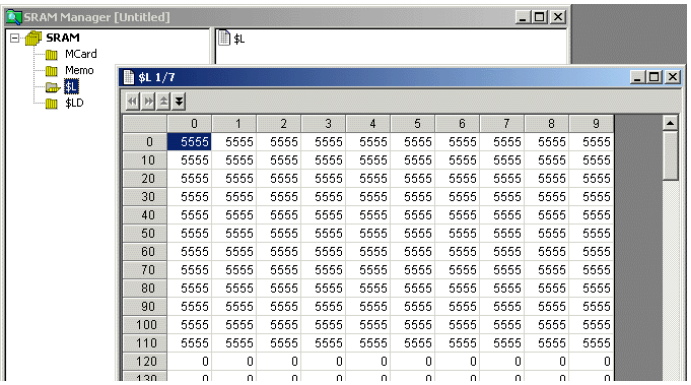
◆ Saving to a BMP File

It is possible to save the memo pad data as a [*.BMP] file.
Right-click each file in the [Memo] folder, and then click [Convert].
The [Save As] dialog is displayed as shown below. Specify the desired file name and click [Save].



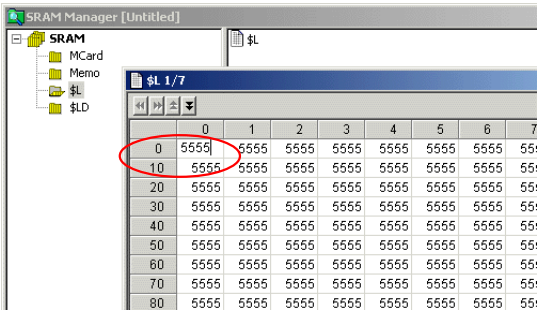
[$L] / [$LD]

Double-click the [$L] / [$LD] folder in the tree display in the left window. The following window is displayed respectively.



◆ Editing Data

It is possible to enter/modify the value in each address.
Click each cell to select. The value is modified by entering a numeric value with the keyboard.



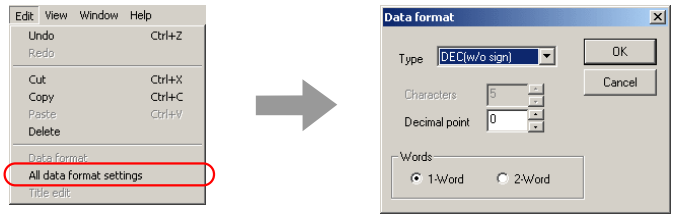
If you enter a value which does not correspond to a format (Ex: Write [HEX] to [DEC]), the data is ignored.

◆ Data Format Batch Settings

Modify the display formats in each address all at once.

You cannot set the display format for each cell individually.

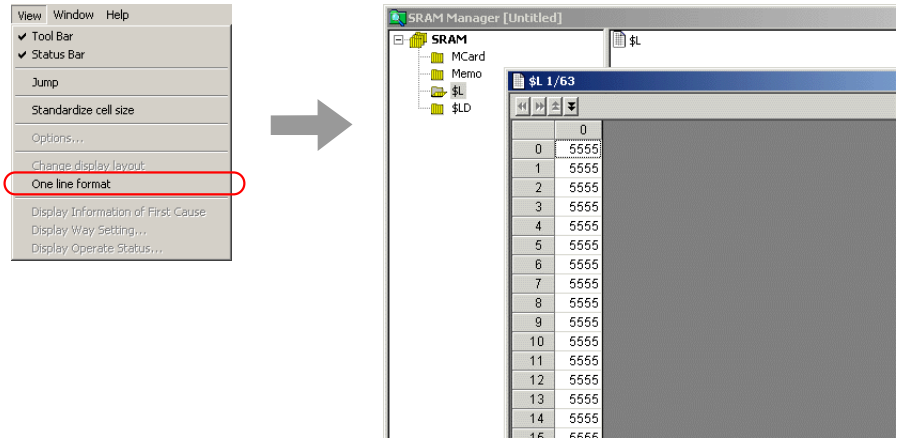
Click [All Data Format Settings] from the [Edit] menu. The [Data Format] dialog is displayed.



Specify the type or the decimal point. When you click [OK], all the cells are displayed in the format you set.

◆ Display Switching (10-column / 1-column)

It is possible to switch from 10-column display to 1-column display.
Click [One Line Format] from the [View] menu. The window is changed to the single column display.

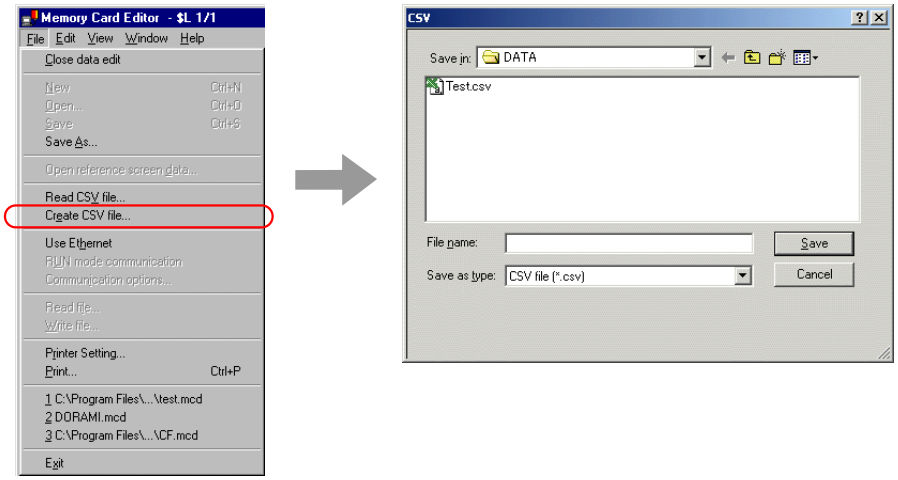


If you click [One Line Format] from the [View] menu again, the check mark is removed. The window is changed back to the original 10-column display.

◆ Saving to a CSV File

It is possible to save the contents of $L and $LD to a CSV file. Follow the steps below.

1. Click [Create CSV file] from the [File] menu.
The [CSV] dialog is displayed.

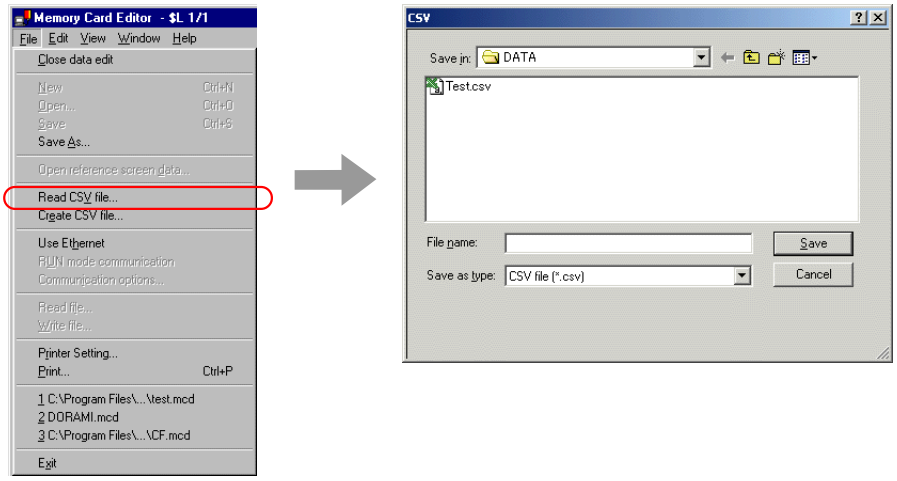


2. When you save with the desired file name, a CSV file will be created.

◆ Reading from a CSV File

It is possible to read the contents of a CSV file. Follow the steps below.

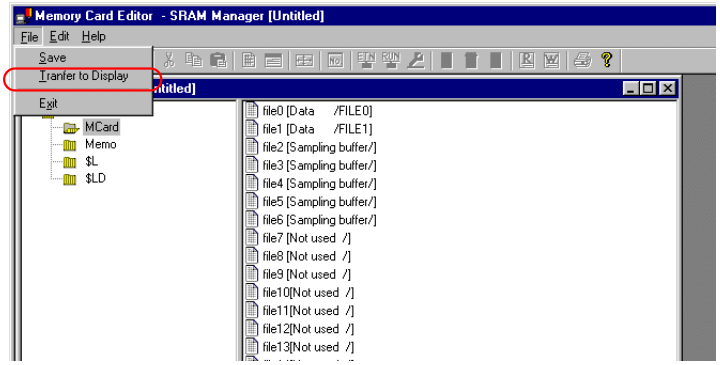
1. Click [Create CSV File] from the [File] menu.
The [CSV] dialog is displayed.



2. Select the file to be read and click [Open]. The contents of the CSV file are read.

Writing to SRAM

While displaying the [SRAM Manager] window, with the files in each folder closed, click [Transfer to Display] from the [File] menu.

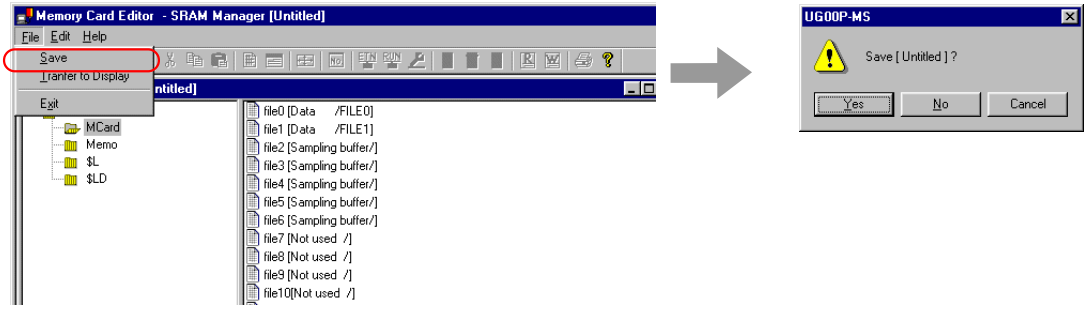


Write data.

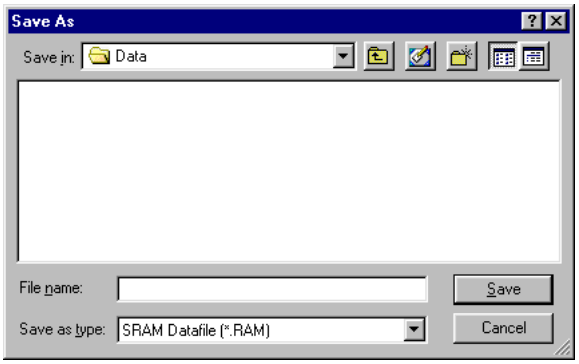
If you click [Cancel] while the data is being written, the data in the CF card may be corrupted. Be sure not to cancel the operation while the data is being written.

Saving SRAM

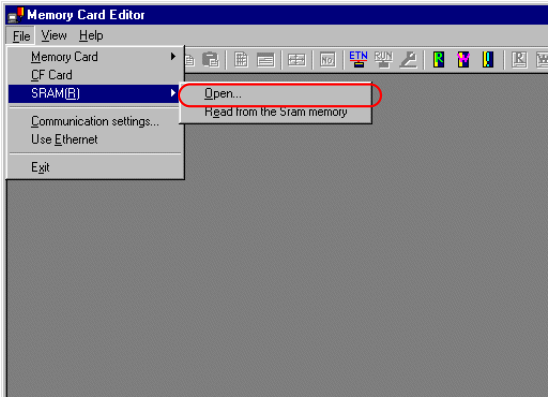
It is possible to save the read SRAM data as a [*.RAM] file.
Click [Save] from the [File] menu. The message "Save [Untitled]?" is displayed.



When you click [Yes], the [Save As] dialog is displayed. Specify the desired file name and click [Save]. It is saved as a RAM file.



When you open the file, you can go to [File], [SRAM], and then click [Open].



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