

Recipe Function

Sample Screen Manual

Mitsubishi Electric Corporation

Using the Samples

The sample screen data and files such as the instruction manual can be used upon agreement to the following matters.

- (1) This data is available for use by customers currently using or considering use of Mitsubishi products.
- (2) The intellectual property rights of the files provided by Mitsubishi (hereinafter referred to as the "Files") belong to Mitsubishi.
- (3) Alteration, reproduction, transfer or sales of the Files is prohibited.
- (4) This does not apply when the content, in part or full, is used for Mitsubishi products incorporated in a device or system created by the customer. Furthermore, this does not apply to the transfer, reproduction, reference or change of layout in the specifications, designs or instruction manuals of built-in products prepared by the customer using Mitsubishi products.
- (5) Mitsubishi will not be held liable for any damages resulting from the use of the Files or the data extracted from the Files. The customer is responsible for all use.
- (6) If any usage conditions are appended to the Files, those conditions must be observed.
- (7) The Files may be deleted or the contents changed without prior notice.
- (8) When using the Files, please always read the corresponding manuals and related manuals indicated therein. Please pay special attention to safety, and correctly handle the product.

CONTENTS

CONTENTS	3
REVISIONS	4
1. OUTLINE.....	5
2. SYSTEM CONFIGURATION.....	5
3. GOT	5
3.1 System Applications That Are Automatically Selected	5
3.2 Controller Setting of Screen Design Software	5
3.3 Ethernet Setting of Screen Design Software	5
4. SCREEN SPECIFICATIONS	6
4.1 Display Language.....	6
4.2 Screen Transition	6
4.3 Explanation of Screens.....	7
4.3.1 Changeover - Registration Screen (B-30001).....	7
4.3.2 Changeover - Operation Screen (B-30002).....	8
4.3.3 Pattern Switching - Registration Screen (B-30003).....	9
4.3.4 Pattern Switching - Operation Screen (B-30004).....	10
4.4 Device List.....	11
4.4.1 Devices of the controller	11
4.4.2 GOT internal devices	11
4.5 Comment List	11
4.6 Script List.....	12
4.6.1 Project script	12
5. BINARY FILE → UNICODE TEXT/CSV FILE CONVERSION	13
6. TEMPLATES.....	14

REVISIONS

Sample Screen Manual

Date	Control No.*	Description
2013/8/19	BCN-P5999-0116	First edition

* The Control No. is noted at the lower right of each page.

Project Data

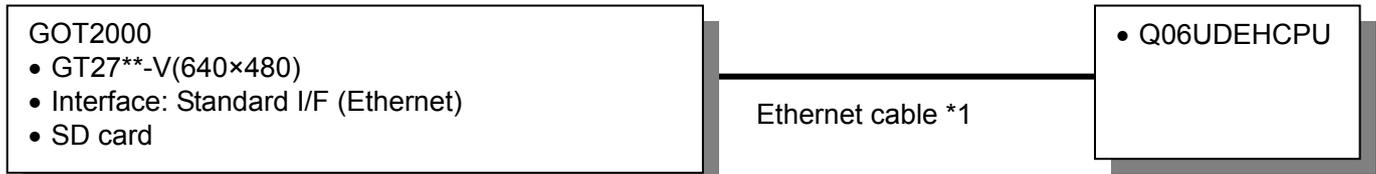
Date	Project data	GT Designer3*	Description
2013/8/19	Recipe_V_Ver1_E.GTX	1.100E	First edition

* The version number of screen design software used to create the project data is listed. Please use the screen design software with the listed version or later.

1. OUTLINE

This manual explains the sample screens of GOT2000 when using the recipe function.

2. SYSTEM CONFIGURATION



*1 For more details about the cable, please refer to the "GOT2000 Series Connection Manual (Mitsubishi Products)".

3. GOT

3.1 System Applications That Are Automatically Selected

Type	System application name		
Standard Function	Standard System Application		
	Standard Font	Japanese	
Communication Driver	Ethernet Connection	Ethernet (MELSEC), Q17nNC, CRnD-700, Gateway	
Extended Function	Standard Font	Chinese (Simplified)	
	Outline Font	Gothic	Alphanumeric/Kana
			Japanese (Kanji)
			Chinese (Simplified)

3.2 Controller Setting of Screen Design Software

Detail Setting

Item	Set value	Remarks
GOT NET No.	1	
GOT Station No.	2	
GOT Ethernet Setting	Refer to table below	
GOT Communication Port No.	5001	
Retry (Times)	3	
Startup Time (Sec)	3	
Timeout Time (Sec)	3	
Delay Time (ms)	0	

GOT Ethernet Setting

Item	Set value	Remarks
Reflect GOT Ethernet setting in the GOT	Checked	
GOT IP Address	192.168.3.18	
Subnet Mask	255.255.255.0	
Default Gateway	0.0.0.0	
Peripheral S/W Communication Port No.	5015	
Transparent Port No.	5014	

3.3 Ethernet Setting of Screen Design Software

	Host	Net No.	Station	Unit type	IP address	Port No.	Communication
1	*	1	1	QnUD(P)V/QnUDEH	192.168.3.39	5006	UDP

4. SCREEN SPECIFICATIONS

4.1 Display Language

The language of the text displayed on the screen can be switched between Japanese, English and Chinese (Simplified). The text strings in each language are registered in the columns No. 1 to No. 3 in the comment group No. 255 as shown below. When the column No. is set in the language switching device, the language corresponding to the column No. will appear.

Column No.	Language
1	English
2	Japanese
3	Chinese (Simplified)

4.2 Screen Transition



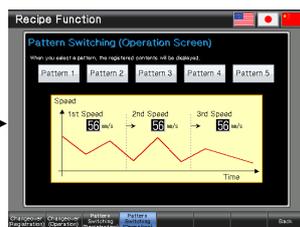
Base screen B-30001: Changeover - Registration Screen



Base screen B-30002: Changeover - Operation Screen



Base screen B-30003: Pattern Switching - Registration Screen



Base screen B-30004: Pattern Switching - Operation Screen

4.3 Explanation of Screens

4.3.1 Changeover - Registration Screen (B-30001)



Outline

This screen is used to register the changeover data (to store the values in the recipe file in the SD card).

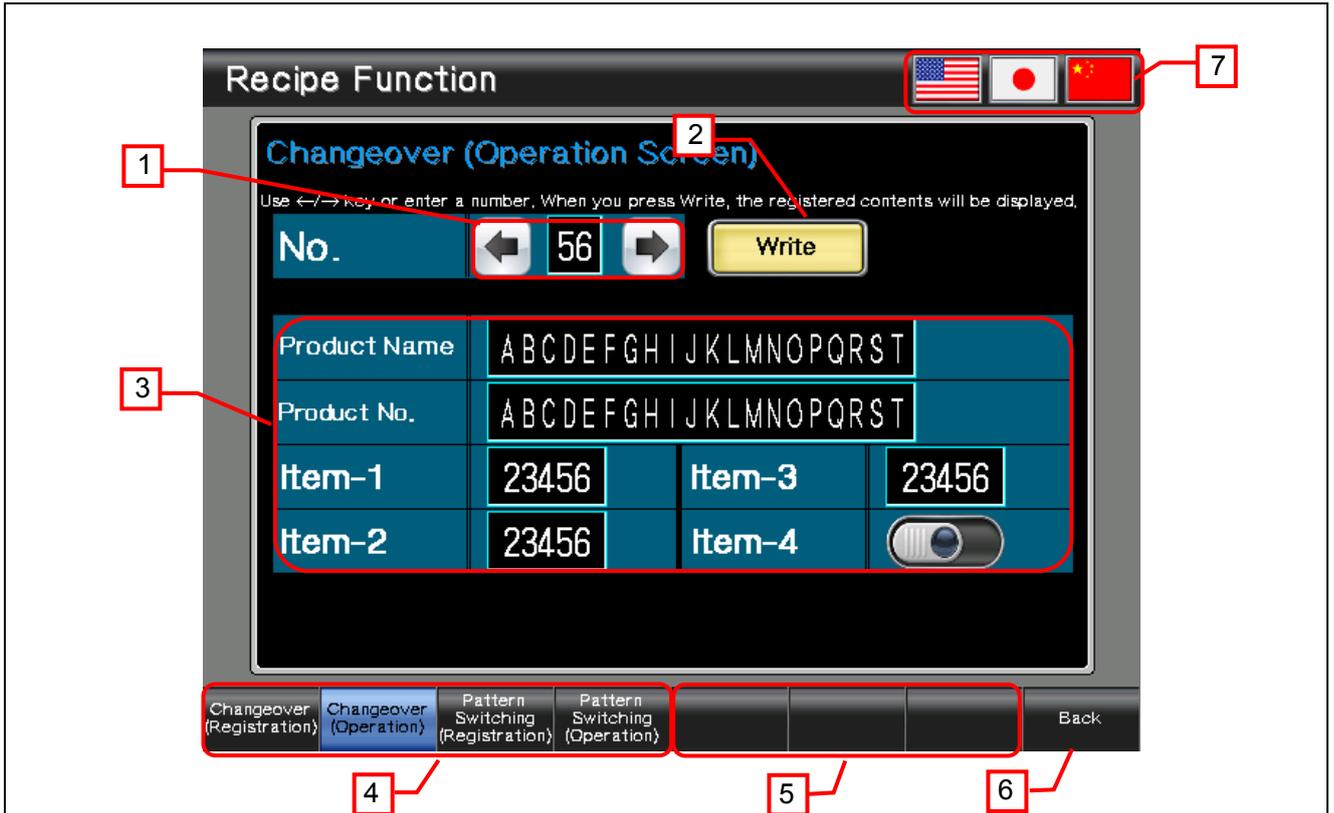
Description

1. Specify the number (record No.) to be registered within the range of 1 to 10.
2. Enter a value in each field.
Product Name, Product No : Enter an arbitrary character string.
Item-1 to Item-3 : Enter an arbitrary value.
Item-4 : Set to ON or OFF.
3. The values entered in 2 are saved in the recipe file in the SD card. (The recipe No. 30001 read trigger turns ON. The trigger turns OFF after one second.)
4. Switches to each screen. The blue switch indicates the currently displayed screen, thus selecting this switch will not switch the screen.
5. These are reserved switches for base screen switching.
6. Switches to the previously displayed screen.
7. Switches the display language.

Remarks

- Recipe No. 30001 is used.
- The #7 switch also switches the system language corresponding to the display language.
- The recipe file is a binary file that requires conversion before being displayed or edited on a personal computer. For more details, please refer to "5. BINARY FILE → UNICODE TEXT/CSV FILE CONVERSION".

4.3.2 Changeover - Operation Screen (B-30002)



Outline

This screen is used to display the data registered on the B-30001 Changeover - Registration Screen (the values stored in the recipe file in the SD card).

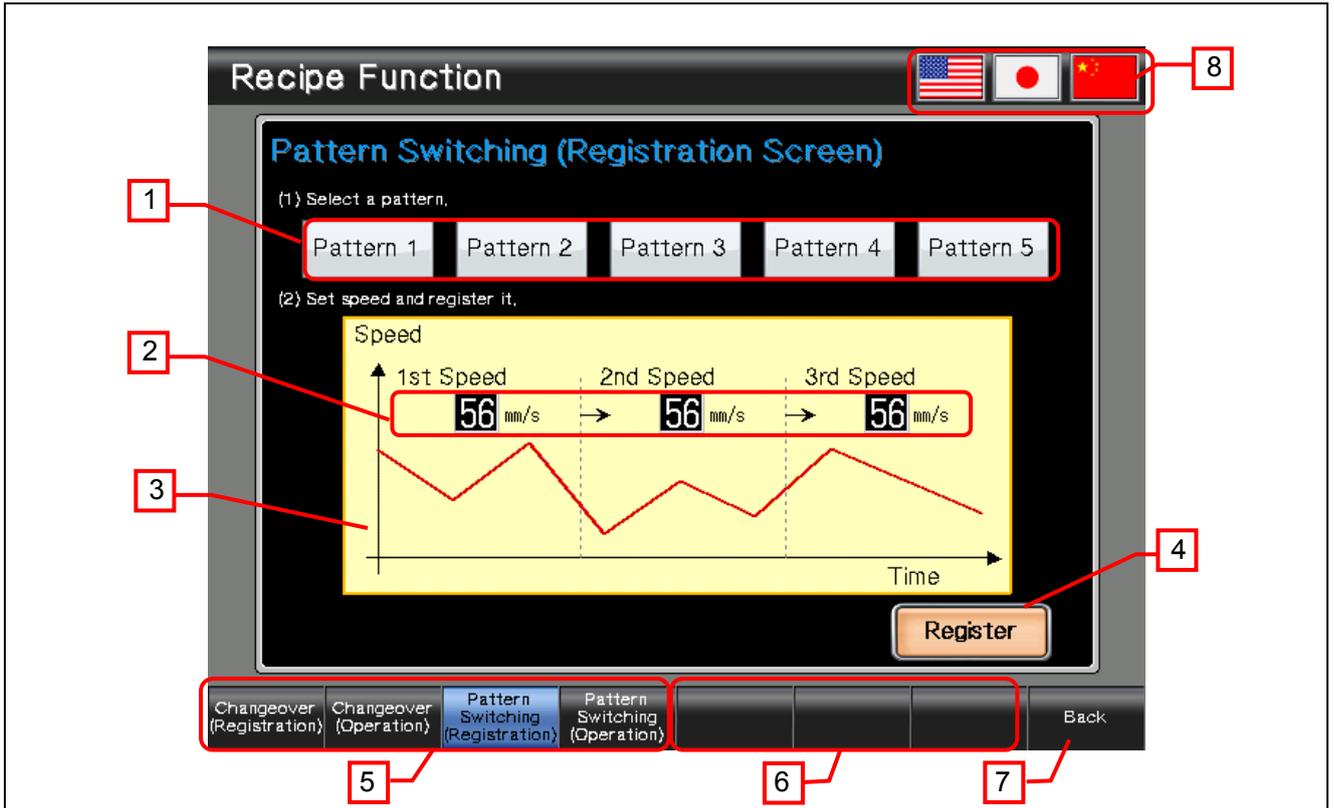
Description

- Specify the No. of the data to display (No. registered on the B-30001 Changeover - Registration Screen).
 - : Specify the No. by incrementing/decrementing in units of 1 within the range of 1 to 10.
 - Value : Specify the No. by entering a value within the range of 1 to 10.
- Displays the value of the recipe file stored on the SD card in each field described in step 3. (The advanced recipe No. 30001 write trigger turns ON. The trigger turns OFF after one second.) Touch this touch switch after specifying the No. in 1.
- Displays the data of the specified No.
 - Product Name, Product No. : Displays the registered character string.
 - Item-1 to Item-3 : Displays the registered value.
 - Item-4 : Displays the ON or OFF lamp.
- Switches to each screen. The blue switch indicates the currently displayed screen, thus selecting this switch will not switch the screen.
- These are reserved switches for base screen switching.
- Switches to the previously displayed screen.
- Switches the display language.

Remarks

- Recipe No. 30001 is used.
- The #7 switch also switches the system language corresponding to the display language.
- The recipe file is a binary file that requires conversion before being displayed or edited on a personal computer. For more details, please refer to "5. BINARY FILE → UNICODE TEXT/CSV FILE CONVERSION".

4.3.3 Pattern Switching - Registration Screen (B-30003)



Outline

This screen is used to register the speed pattern (to store the values in the recipe file in the SD card).

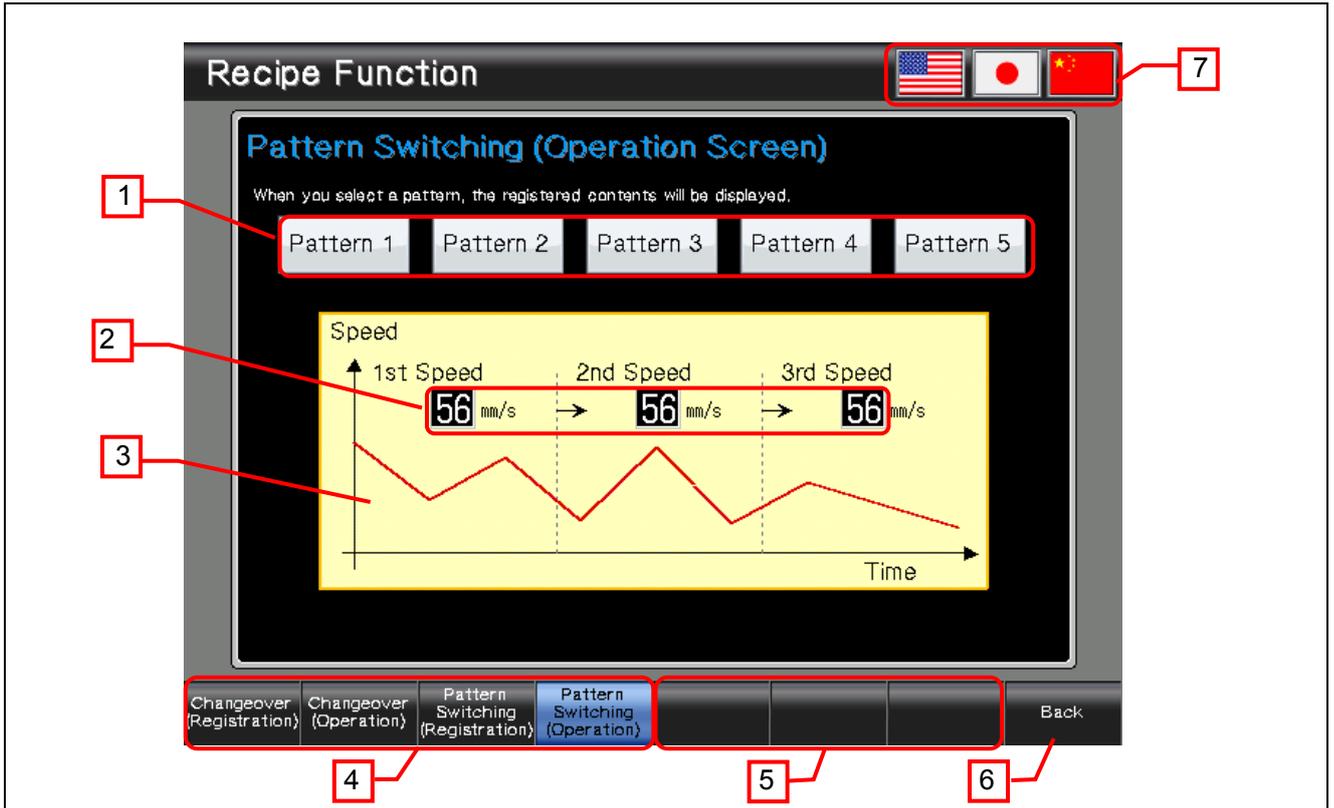
Description

1. Select the pattern to be registered from Pattern 1 to Pattern 5 (Record No. 1 to No. 5).
2. Enter the speed within the range of 0 to 99.
3. The speed entered in 2 is displayed in a scatter graph. The graph display is updated when each speed is entered.
4. The values set in 2 are stored in the recipe file in the SD card. (The recipe No. 30002 read trigger turns ON. The trigger turns OFF after one second.)
5. Switches to each screen. The blue switch indicates the currently displayed screen, thus selecting this switch will not switch the screen.
6. These are reserved switches for base screen switching.
7. Switches to the previously displayed screen.
8. Switches the display language.

Remarks

- Recipe No. 30002 is used.
- The #8 switch also switches the system language corresponding to the display language.
- The recipe file is a binary file that requires conversion before being displayed or edited on a personal computer. For more details, please refer to "5. BINARY FILE → UNICODE TEXT/CSV FILE CONVERSION".
- A project script is set to write the default values for the scatter graph into devices when the GOT is started. For more details about scripts, please refer to "4.6 Script List".

4.3.4 Pattern Switching - Operation Screen (B-30004)



Outline

This screen is used to display the data registered on the B-30003 Pattern Switching - Registration Screen (the values stored in the recipe file in the SD card).

Description

1. Select the number of the pattern to be displayed (pattern registered on the B-30003 Pattern Switching - Registration Screen). (The recipe No. 30002 write trigger also turns ON. The trigger turns OFF after one second.)
2. The speed for the pattern selected in 1 is displayed.
3. The speed for the pattern selected in 1 is displayed in a scatter graph. The graph display is refreshed when the switch described in 1 is touched.
4. Switches to each screen. The blue switch indicates the currently displayed screen, thus selecting this switch will not switch the screen.
5. These are reserved switches for base screen switching.
6. Switches to the previously displayed screen.
7. Switches the display language.

Remarks

- Recipe No. 30002 is used.
- The #7 switch also switches the system language corresponding to the display language.
- The recipe file is a binary file that requires conversion before being displayed or edited on a personal computer. For more details, please refer to "5. BINARY FILE → UNICODE TEXT/CSV FILE CONVERSION".
- A project script is set to write the default values for the scatter graph into devices when the GOT is started. For more details about scripts, please refer to "4.6 Script List".

4.4 Device List

Some of the devices used for settings of the on-screen switches and lamps, etc., are also used for common settings in scripts, etc. Using [Batch Edit] is recommended to change these devices in a batch. For more details about using [Batch Edit], please refer to the "GT Designer3 (GOT2000) Help".

4.4.1 Devices of the controller

Type	Device No.	Application
Bit	Not used	
Word	Not used	

4.4.2 GOT internal devices

Type	Device No.	Application
Bit	GB40	Script No. 30001 trigger (always ON)
	GB60100	Recipe (No. 30001) write trigger
	GB60101	Recipe (No. 30001) read trigger
	GB60110	Recipe (No. 30001) Item-4
	GB60200	Recipe (No. 30002) write trigger
	GB60201	Recipe (No. 30002) read trigger
Word	GD60000	Base screen switching
	GD60021	Language switching
	GD60022	System language switching
	GD60100 to GD60109	Recipe (No. 30001) Product Name
	GD60110 to GD60119	Recipe (No. 30001) Product No.
	GD60120 to GD60122	Recipe (No. 30001) Item-1 to Item-3
	GD60130	Recipe (No. 30001) record No. device
	GD60200	Recipe (No. 30002) 1st Speed
	GD60201	Recipe (No. 30002) 2nd Speed
	GD60202	Recipe (No. 30002) 3rd Speed
	GD60210 to GD60218	Scatter graph
	GD60230	Recipe (No. 30002) record No. device
	GD60300 to GD60302	Recipe common settings

4.5 Comment List

Comment Group No.	Comment No.	Where comments are used
255	No.1 to No.6	All screens
	No.7	B-30001
	No.8	B-30002
	No.9 to No.11	B-30001
	No.12	B-30002
	No.13 to No.19	B-30001, B-30002
	No.20	B-30001, B-30003
	No.21	B-30002
	No.23	B-30003
	No.24	B-30004
	No.25 to No.34	B-30003, B-30004
	No.43, No.44	B-30003
	No.45	B-30004

4.6 Script List

Item	Settings
Project Script	Specified
Screen Script	Not specified
Object Script	Not specified

4.6.1 Project script

Script No. 30001			
Script name	Script30001	Comment	Scatter graph display
Data type	Signed BIN16	Trigger type	Rise, GB40
[w:GD60210]=0;	//Set 0 to X Device of Scatter Graph in Base Screen 30003, 30004		
[w:GD60211]=10;	//Set 10 to X Device of Scatter Graph in Base Screen 30003, 30004		
[w:GD60212]=40;	//Set 40 to X Device of Scatter Graph in Base Screen 30003, 30004		
[w:GD60213]=45;	//Set 45 to X Device of Scatter Graph in Base Screen 30003, 30004		
[w:GD60214]=75;	//Set 75 to X Device of Scatter Graph in Base Screen 30003, 30004		
[w:GD60215]=80;	//Set 80 to X Device of Scatter Graph in Base Screen 30003, 30004		
[w:GD60216]=110;	//Set 110 to X Device of Scatter Graph in Base Screen 30003, 30004		
[w:GD60217]=120;	//Set 120 to X Device of Scatter Graph in Base Screen 30003, 30004		
[w:GD60218]=0;	//Set 0 to Y Device of Scatter Graph in Base Screen 30003, 30004		

5. BINARY FILE → UNICODE TEXT/CSV FILE CONVERSION

The recipe file created with the recipe function is a binary file (*.G2P). To display and edit the recipe file on a personal computer, it must be converted into a Unicode text file or CSV file. The following methods can be used to convert the file.

- (1) Conversion using GT Designer3
 1. Save the binary file on the personal computer.
 2. Select the [Tools] - [Resource Data Conversion] - [Recipe File] menu of GT Designer3.
- (2) Conversion using the utility
Select the G2P file in the [Recipe Information] of the utility. Then touch or .
- (3) Conversion using the devices
 1. Specify the [External Control Information] settings (Recipe Common Setting) and set the [File Conversion External Control] (Recipe (File Save tab)).
 2. Write the recipe No. in the recipe No. storage device, and turn on b8 (recipe file convert signal) of the external control device.

For more details, please refer to 2."Operation using recipe files" in 9.3.2 "How to use the recipe" in the "GT Designer3 (GOT2000) Help".

6. TEMPLATES

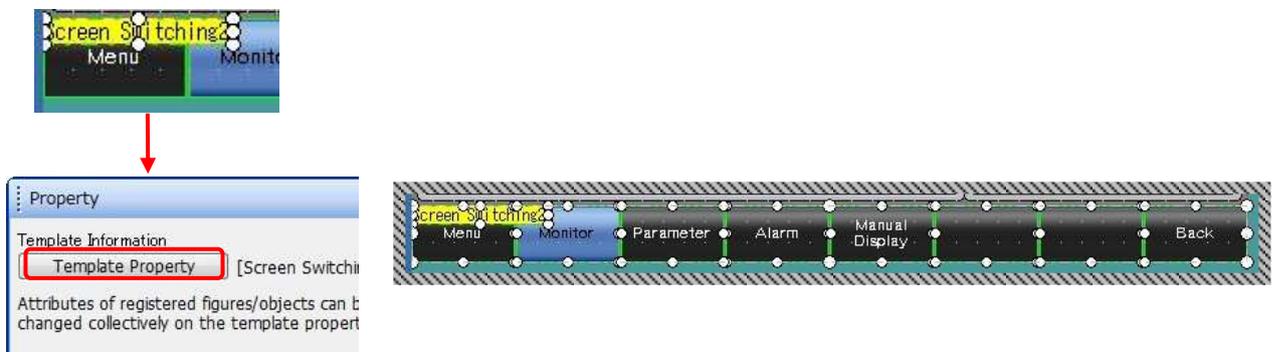
Templates are a group of figures and objects. Related settings are grouped into template attributes and registered, so the devices and colors can be easily changed in a batch. For more details about changing the attribute settings, please refer to the "GT Designer3 (GOT2000) Help".



The template information is only displayed on the screen design software's editing screen. It is not displayed on the GOT display screen.

Example: Changing a font

- (1) Select [Template Information], and click on [Template Property] (or double-click [Template Information]).



- (2) Click on [Font], and select the new font.

