



XGT Panel

XP Series

Troubleshooting Manual

XP30-TTA (B)

XP30-BTA (B)

XP30-BTE

XP40-TTA

XP40-TTE

XP50-TTA (B)

XP70-TTA (B)

XP80-TTA (B)

XP90-TTA (B)



Safety Instructions

Read this manual carefully before servicing or inspecting this equipment.

Keep this manual within easy reach for quick reference.

Quick Reference Table

The following tables contain situations frequently encountered by users while working with PLC.

Refer to the typical and practical situations in the table to quickly and easily locate answers to your questions.

Situation	Reference
XGT Panel does not turn on.	P. 32
The product is stopping at Windows CE screen.	P. 32
The product cannot go to the project screen.	P. 32
I would like to know about the information of DIP switches.	P. 13
The responded part is different when touching.	P. 36
The touch does not work.	P. 36
The product is stopping at Loading screen.	P. 32
I would like to know about the information of USB setting.	P. 24
I would like to test each communication port whether they work well.	P. 29
RS232 communication does not work.	P. 37
RS422/485 communication does not work.	P. 37
Ethernet communication does not work.	P. 37
Does the protective film have to be removed?	P. 18
I would like to know about the error code information.	P. 40
I would like to know about how to do maintenance.	P. 38
I would like to adjust the contrast range.	P. 27

Contents



● QUICK REFERENCE TABLE	1
● INTRODUCTION	3
Manual Structure	3
● APPLICABLE PRODUCTS	4
● PRODUCTS IDENTIFICATION	5
● RELEVANT MANUALS	7
● SAFETY PRECAUTIONS	8
● REVISION HISTORY	10
1 BASIC SYSTEM CONFIGURATION	11
1.1 System Configuration	11
1.1.1 The name and function of each part	11
1.1.2 Safety information when using the product	18
2 TROUBLESHOOTING	20
2.1 System setting	20
2.1.1 Touch Calibration	20
2.1.2 Communication Setting	21
2.1.3 Other Setting	24
2.2 Diagnosis	28
2.2.1 Communication Diagnosis	28
2.2.2 Screen Diagnosis	30
2.2.3 Touch Diagnosis	30
2.2.4 Battery Diagnosis	31
2.3 Troubleshooting when fault occurs	32
2.3.1 Booting Problem	32
2.3.2 Touch Problem	36
2.3.3 Communication Problem	37
3 MAINTENANCE	38
3.1 Maintenance	38
3.2 Daily Maintenance	38
3.3 Periodical Maintenance	39
4 ERROR CODE LIST	40
4.1 Error Message during Execution of Program	40

Introduction

Manual Structure



1 Basic System Configuration

1.1 System Configuration

- 1.1.1 The name and function of each part
- 1.1.2 Safety information when using the product

This chapter contains the hardware features and system configurations.

2 Troubleshooting

2.1 System setting

- 2.1.1 Touch Calibration
- 2.1.2 Communication Setting
- 2.1.3 Other Setting

This chapter contains the basic setting, communication setting, touch setting and environment of XGT panel.

2.2 Diagnosis

- 2.2.1 Communication Diagnosis
- 2.2.2 Screen Diagnosis
- 2.2.3 Touch Diagnosis
- 2.2.4 Battery Diagnosis

This chapter contains the diagnosis function of XGT panel. The product can be diagnosed through this chapter.

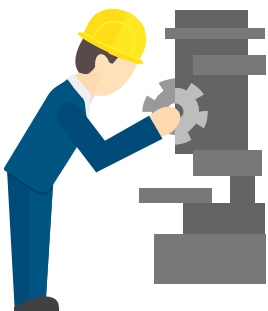


2.3 Troubleshooting when fault occurs

- 2.3.1 Booting Problem
- 2.3.2 Touch Problem
- 2.3.3 Communication Problem

This chapter contains the recommended actions when facing the malfunction.

If the malfunction is not solved, contact your vendor or LS IS directly.



3 Maintenance

- 3.1 Maintenance
- 3.2 Daily Maintenance
- 3.3 Periodical Maintenance

This chapter contains the maintenance and inspections. There are daily and periodic inspections.

4 Error Code List

4.1 Error Message during Execution of Program

This chapter contains the error code and recommended actions.

Applicable Products

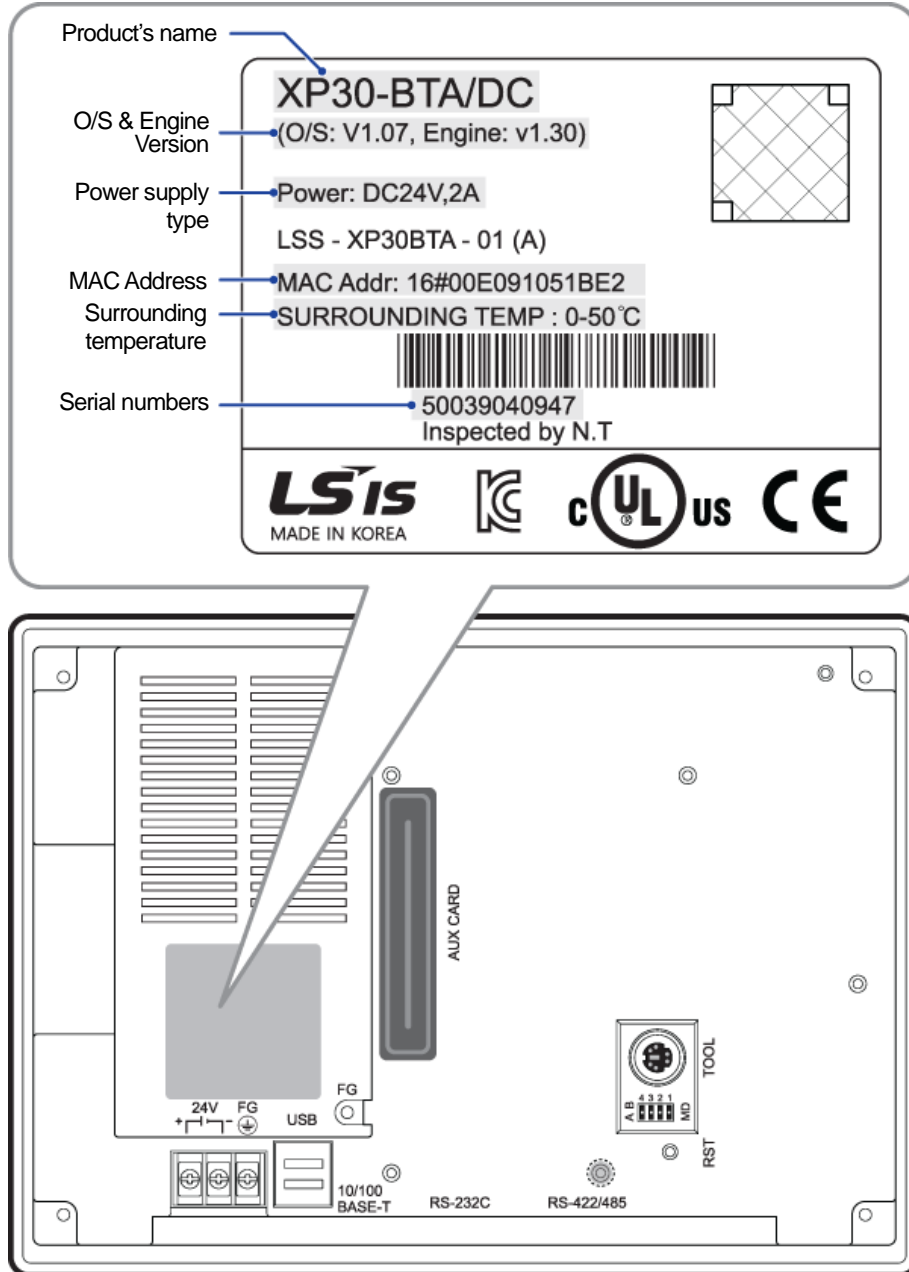
This troubleshooting manual should be used for the following products:

Item		Model		
XP Series	Mono type	General	XP30-BTA/DC	
		Economic	XP30-BTE/DC	
	Color type	General	XP30-TTA/DC	
			XP40-TTA/DC	
			XP50-TTA/DC	
			XP70-TTA/AC	
			XP70-TTA/DC	
			XP80-TTA/AC	
			XP80-TTA/DC	
			XP90-TTA/AC	
			Economic	XP30-TTE/DC
				XP40-TTE/DC
	XP50-TTE/DC			

Products Identification

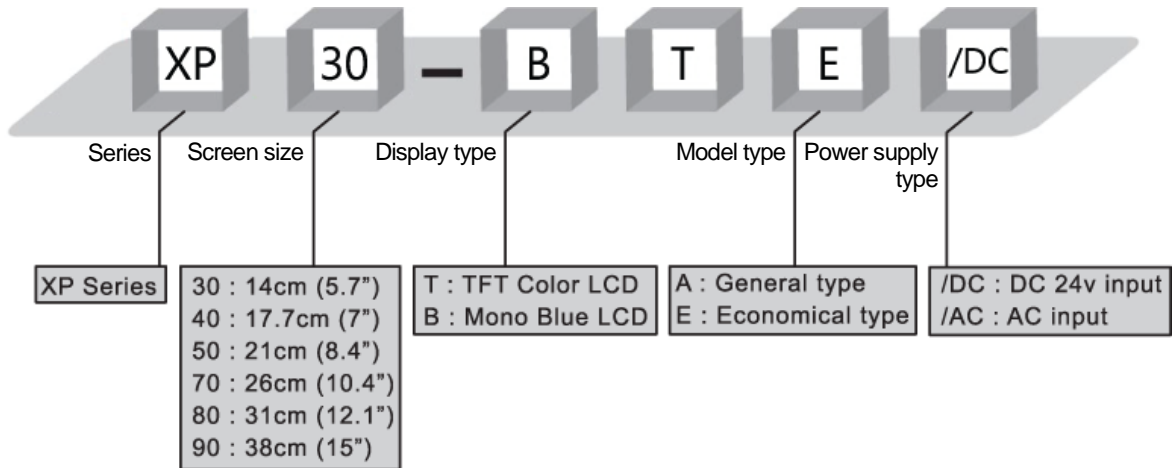
- 1) The product naming method of XGT Series as described below. The following description will help you classify XGT Series product.

Ex) XP30-BTA/DC



2) The basic information can be recognized by product label. Please refer to detail information of product as below:

Ex) XP30-BTA/DC



Title	Description
Product's name (XP30-BTA/DC)	Indicates the name of the product
O/S & Engine version (O/S: V1.07, Engine: V1.30)	Indicates the O/S & Engine version of the product
Power supply type (Power: DC24V, 2A)	Indicates the information of power supply type
Mac Address (MAC Addr: 16#00E091051BE2)	Indicates the information of MAC Address
Surrounding temperature (SURROUNDING: TEMP 0~50°C)	Indicates the surrounding temperature which the product can operate
Serial numbers (50039040947)	Serial numbers consist of 11-digit numbers

Relevant Manuals

The troubleshooting manual also related to following manuals. Please refer to following manuals for your reference.

You can connect our website (<http://www.lsis.com/>) and download the information as a PDF file.

Title	Description	Remarks
XGT Panel Hardware User's Manual	It describes how to use the specifications of system configuration of XGT panel(Human Machine Interface)	
XGT Panel Software User's Manual(XP-Builder)	It describes how to use screen data, communication, environment setting, logging/recipe data backup, simulator and other functions in XP-builder.	
XGT Panel Communication User's manual	It describes how to use wiring diagram, communication setting between control devices like PLC, Inverter and XGT Panel.	

Safety Precautions

For your safety and effective operation, please read the safety instructions thoroughly before using the product.

Instructions are separated into “Warning” and “Caution”, and the meaning of the terms is as follows;

Warning

This symbol indicates the possibility of serious injury or death if some applicable instruction is violated

Caution

This symbol indicates the possibility of slight injury or damage to products if some applicable instruction is violated.

Safety instruction

Warning

- Install a safety circuit external to the HMI to protect the whole control system in case of external power supply trouble. Serious trouble may occur to the entire system due to erroneous output/operation of the HMI.
- Be sure to turn off the HMI and external power before wiring. Otherwise, it may result in an electric shock or damage to the product.
- Do not touch the terminals while power is on. Otherwise, it may cause electric shock or erroneous operation.
- Turn off the PLC and external power when cleaning or tightening the terminal. Otherwise, it may cause electric shock or erroneous operation.
- Do not charge, disassemble, heat, short circuit, solder, etc. the battery. Mishandling the battery may cause overheating, crack, fire and may result in injury or fire.

Caution

- In/output signal or communication cable should be at least 100mm apart from high-voltage/power wires. Otherwise, it may cause erroneous output/operation.
- Use the HMI in an environment that meets the general specification contained in this manual or datasheet. Otherwise, it could result in electric shock, fire, erroneous operation or deterioration.
- In case of much vibration in the installed environment, be sure to insulate the HMI from direct vibration. Otherwise, it could result in electric shock, fire or erroneous operation.
- Be sure not to let foreign substances such as conductive debris inside the product. Otherwise, it could result in electric shock, fire or erroneous operation.
- Wire correctly by checking each of the product's rated voltage and terminal layout. Otherwise, it may result in fire, electric shock or erroneous operation.
- Tighten terminal screws with specified torque when wiring. If terminal screws are loose, it may result in short circuits, fire or erroneous operation.
- Use the exclusive HMI 3-type grounding for the FG terminal. If not grounded, it may result in erroneous operation.
- Be sure not to let any foreign substances such as wiring debris inside the module. Such debris may cause fire, damage or erroneous operation.
- Do not disassemble PCB from the product case or modify the product. Otherwise, it may result in fire, electric shock or erroneous operation.
- Prior to installing or disassembling the module, let all the external power off including HMI power. If not, electric shock or abnormal operation may occur.
- Use cellular phone or walky-talky at least 30cm away from the PLC. Otherwise, it may result in erroneous operation.
- When disposing of this product or battery, treat it as industrial waste. Otherwise, it may cause poisonous pollution or explosion.

Revision History

Version	Date	Remarks	Page
V1.0	2015.07	1. First Edition	-

1 Basic System Configuration

The following information should be checked in advance before the diagnosis function and troubleshooting.

1.1 System Configuration

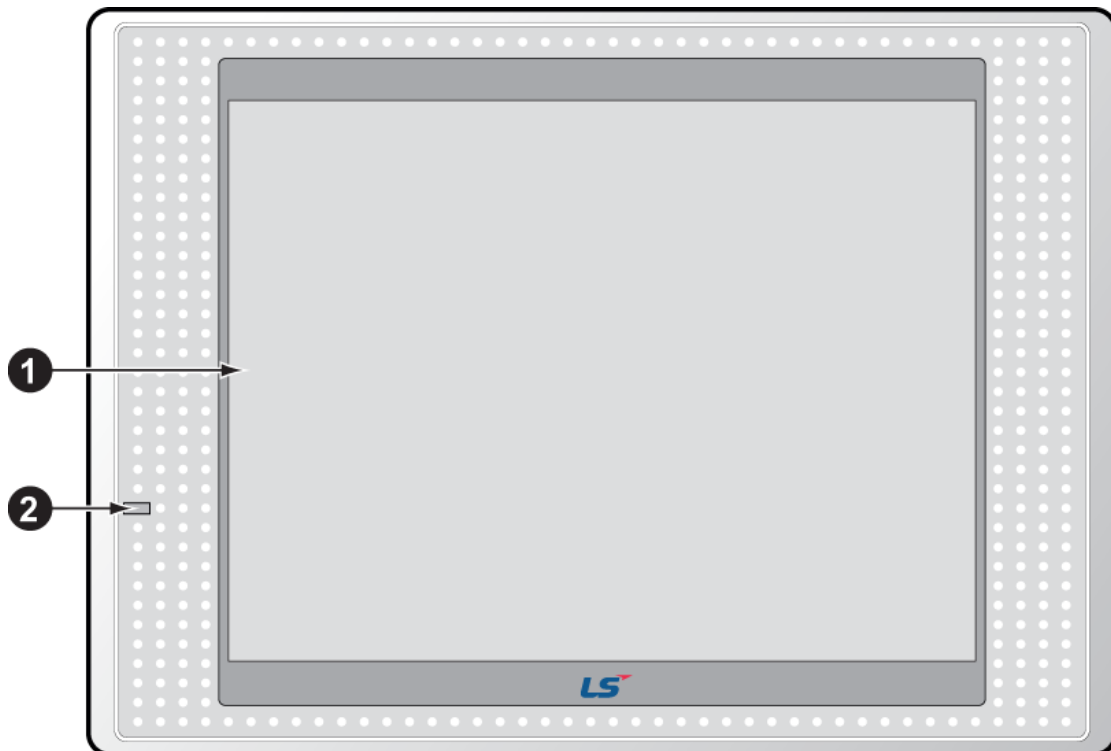
1.1.1 The name and function of each part

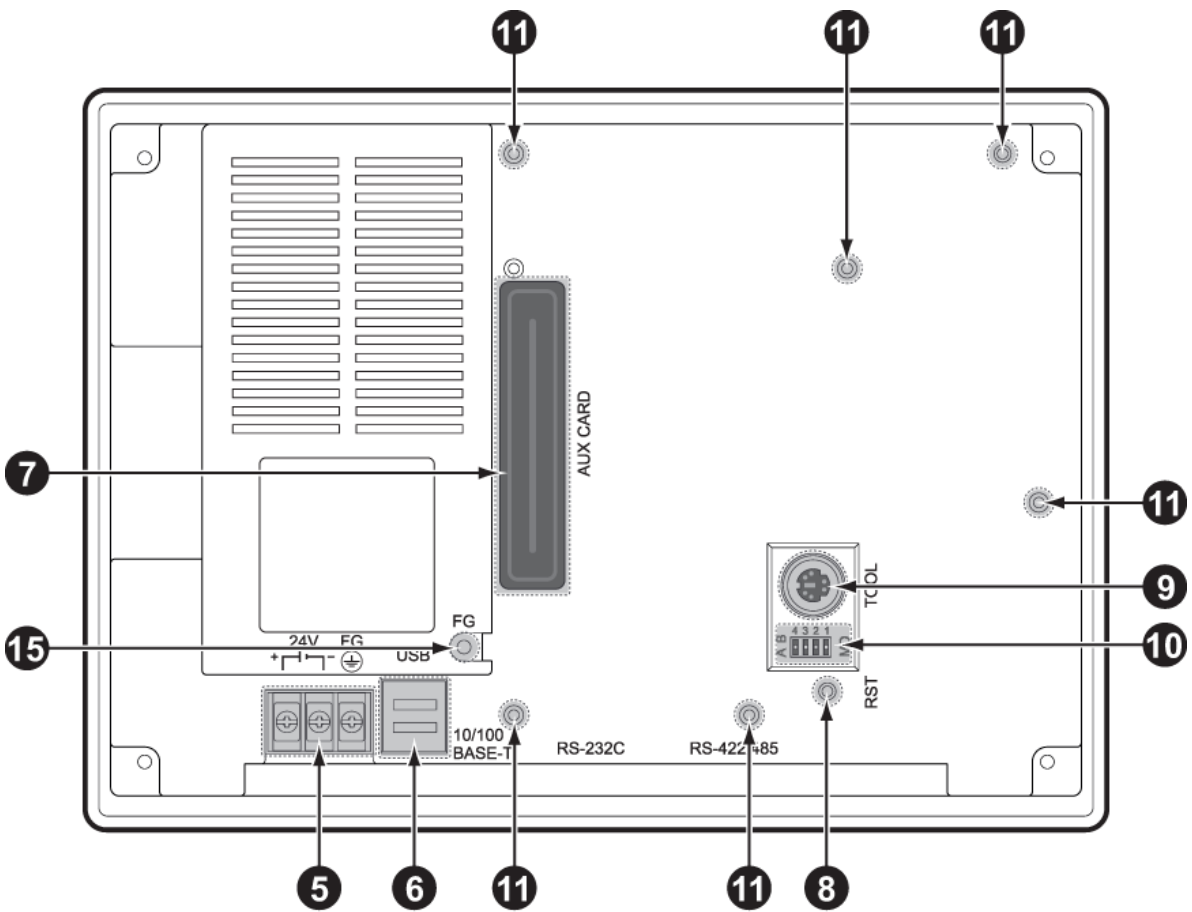
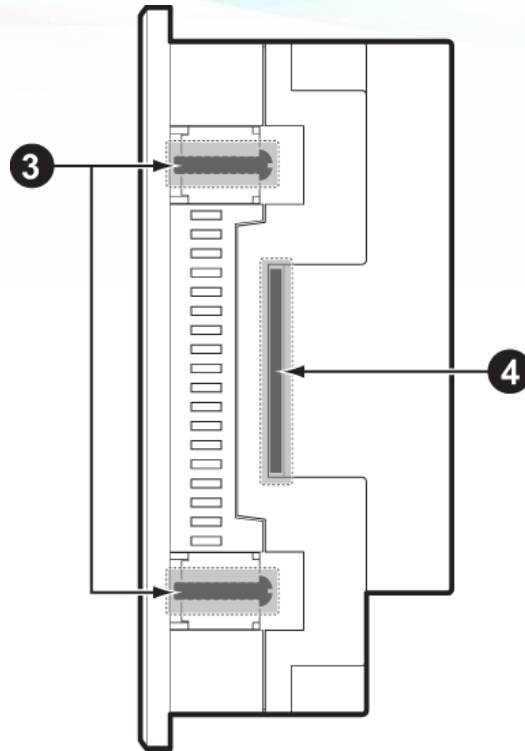
Following contents are the name of parts and functions.

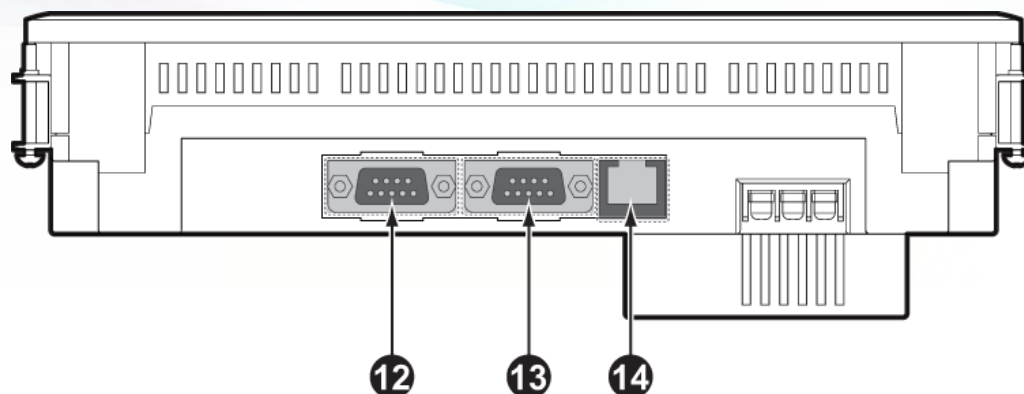
Caution

- The setting switches (DIP switches) in the back side of the product are used for software upgrade, watchdog function. Do not use these switches during the operation.

■ XP30/50/70/80-TTA, XP30-BTA



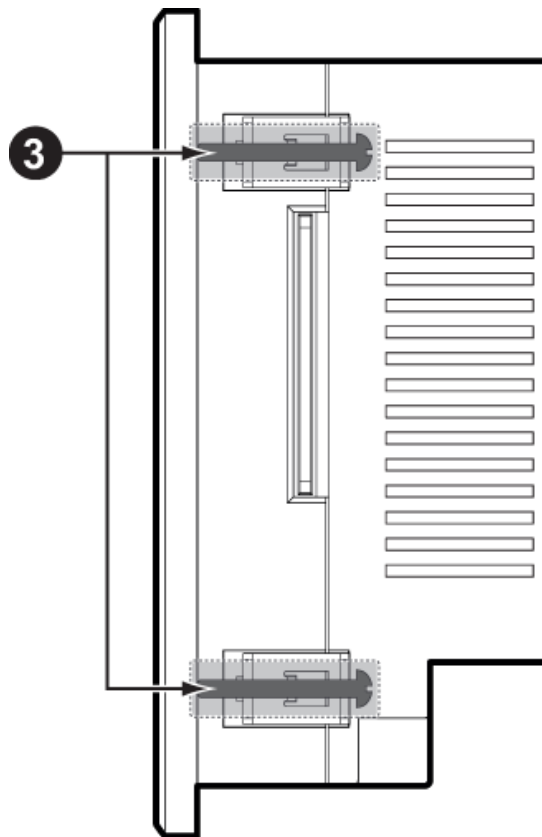
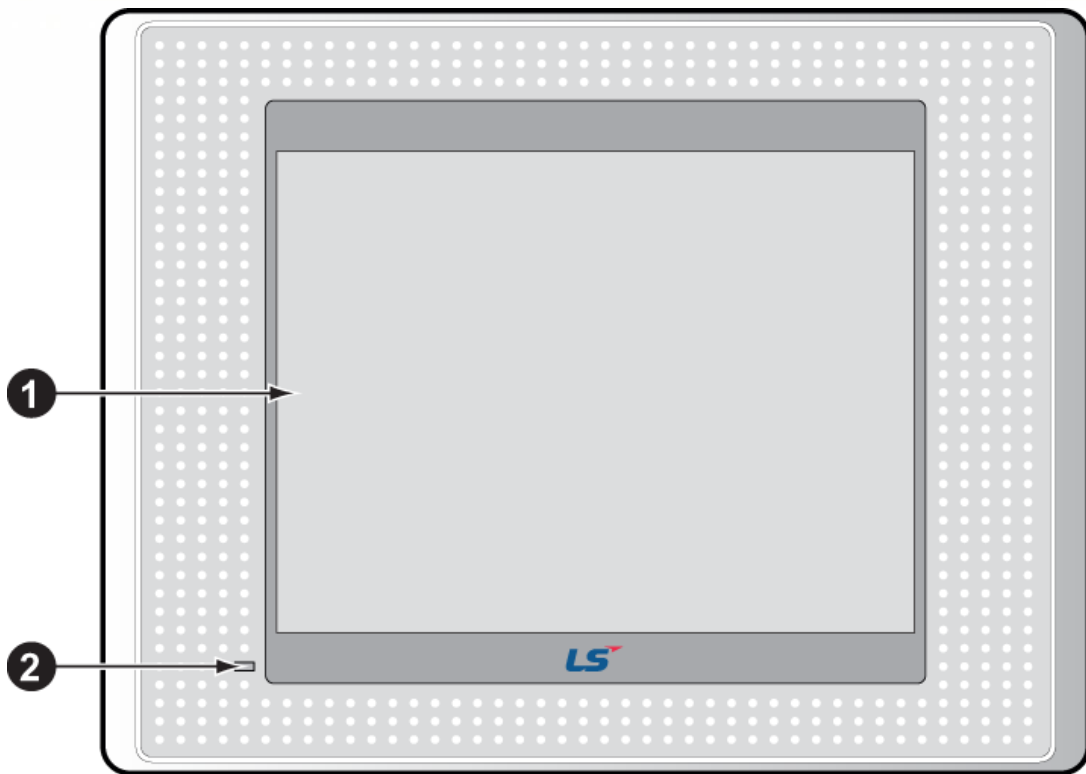


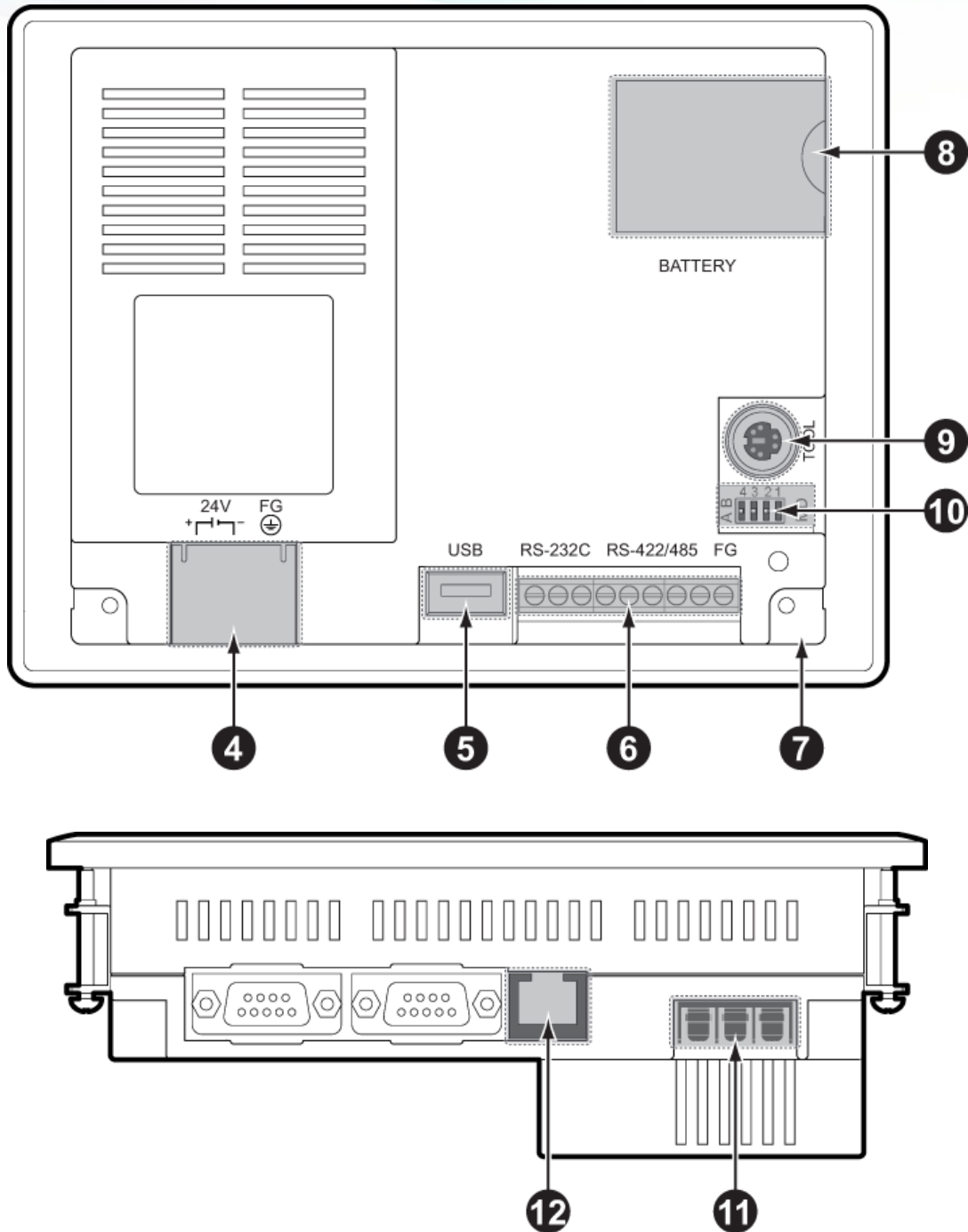


No.	Name	Description		
1	Front view	1) Analog touch panel: User touch input 2) LCD: screen indication		
2	LED Status	Indicates operation status of device		
		<table border="1"> <tr> <td>Green</td> <td>Normal RUN status (monitoring, downloading the project data) Initializing the status when booting (HMI does not operate)</td> </tr> <tr> <td>Red</td> <td>Error occurs (communication error, project data error)</td> </tr> </table>	Green	Normal RUN status (monitoring, downloading the project data) Initializing the status when booting (HMI does not operate)
Green	Normal RUN status (monitoring, downloading the project data) Initializing the status when booting (HMI does not operate)			
Red	Error occurs (communication error, project data error)			
3	Panel fixed part	XGT Panel is fixed at panel by bracket.		
4	CF card interface	1) Logging/recipe/screen data backup 2) Upgrade of windows CE is available.		
5	Power connection terminal	It consists of power input and FG terminal.		
6	USB interface	It consists of 2 ports. 1) USB memory connection: logging/recipe/screen data backup 2) USB memory connection: project data transmission/backup 3) User interface connection: use of mouse/keyboard 4) Printer connection: printing is available		
7	Extension port	Extension module installation		
8	Reset switch	Hardware reset switch		
9	TOOL interface	RS-232C interface 1) project data transmission 2) logging/recipe/alarm/screen data backup 3) machine software upgrade		
10	DIP Switches 4 3 2 1 B A	Device setting switch		
		No.1	Reserved	
		No.2	A setting	Normal operation (default)
			B setting	When upgrading Windows CE
		No.3	A setting	Watchdog On (default)
			B setting	Watchdog Off
No.4	A setting	RS-422/485 Terminal Switch On (120Ω)		
	B setting	RS-422/485 Terminal Switch Off (120Ω)		

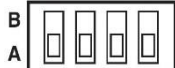
No.	Name	Description
11	Extension module fixation hall	Extension module fixation hall
12	RS-422/485 connector	RS-422/485: PLC/control machine communication
13	RS-232C connector	RS-232C: PLC/control machine communication
14	Ethernet terminal	Ethernet: 10Base-T / 100Base-TX 1) Project data transmission 2) logging/recipe/alarm/screen data backup 3) machine software upgrade 4) PLC/control machine communication
15	FG terminal	FG terminal hole for extension module

- XP30-BTE, XP30-TTE, XP40-TTA(TTE), XP50-TTE





No.	Name	Description	
1	Front view	1) Analog touch panel: User touch input 2) LCD: screen display	
2	LED Status	Indicates operation status of module.	
		Green	Normal RUN status (monitoring, downloading the project data) Initializing mode when booting (HMI does not Ready)
		Red	Error occurs (communication error, project data error)

No.	Name	Description		
3	Panel fixed part	XGT Panel is fixed at panel by bracket.		
4	Power terminal cover	Prevention from electric shock		
5	USB interface	1) USB memory connection: logging/recipe/screen data backup 2) USB memory connection: project data transmission/backup 3) User interface connection: use of mouse/keyboard 4) Printer connection: printing is available		
6	Communication interface	RS-232C, RS-422/485: For communication with controller (PLC)		
7	Reset switch	Hardware reset switch		
8	Battery cover	Open or close when replacing the battery		
9	Tool interface	RS-232C interface 1) Project data transmission 2) Logging/recipe/alarm/screen data backup 3) Machine software upgrade		
10	DIP Switches 	Module setting switch		
		No.1	Reserved	
		No.2	A setting	Normal operation (default)
			B setting	When upgrading Windows CE
		No.3	A setting	Watchdog On (default)
			B setting	Watchdog Off
		No.4	A setting	RS-422/485 Terminal Switch On (120Ω)
			B setting	RS-422/485 Terminal Switch Off (120Ω)
11	Power terminal	It consists of power input and FG terminal		
12	Ethernet terminal	Ethernet: 10Base-T / 100Base-TX 1) Project data transmission 2) logging/recipe/alarm/screen data backup 3) machine software upgrade 4) PLC/control machine communication ※ Supported on XP40-TTA		

Remark

- Refer to XGT Panel communication User's manual for the detailed information regarding communication wiring and connection.
- Refer to XGT panel hardware User's manual for the detailed information regarding the installation.
- XP30-BTE, XP30 (50)-TTE, XP40-TTE (Economic models) do not support Ethernet communication.

1.1.2 Safety information when using the product

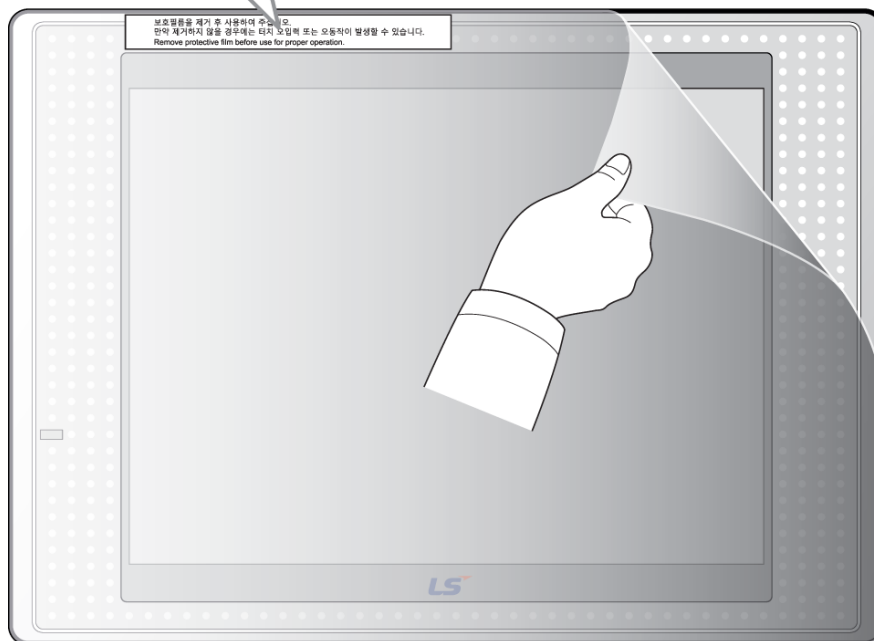
■ Removal of the protective film

Before using the product, remove the protective film attached to the front cover. If the protective film is not removed, it may cause the product to malfunction or result in touch input errors.

보호필름을 제거 후 사용하여 주십시오.

만약 제거하지 않을 경우에는 터치 오입력 또는 오동작이 발생할 수 있습니다.

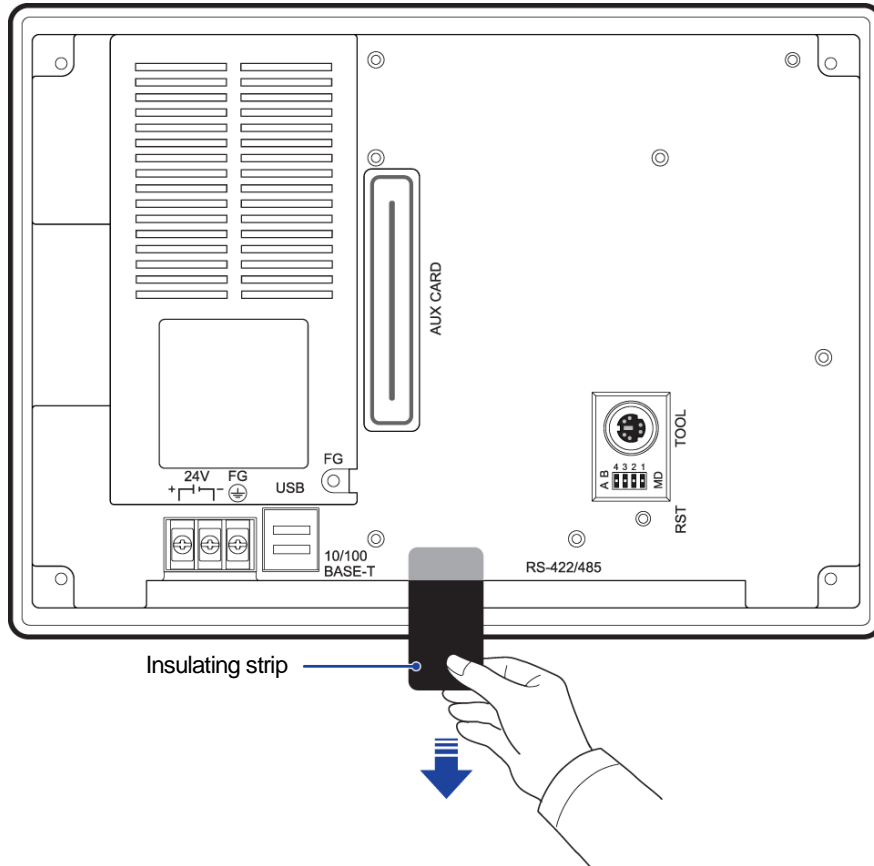
Remove protective film before use proper operation.



■ Removal of the battery terminal insulating strip

An insulating strip is installed on the battery terminals to prevent battery discharge. The back-up function starts once the strip is removed.

To remove the insulating strip, pull it downwards in the direction shown below.



⚠ Warning

- '/DC' products are rated for a DC 24 V power supply. '/AC' products are rated for AC 100-240 V power supplies.

⚠ Caution

- Do not drop the device or expose it to physical impact.
- Do not disassemble the device. If the device is disassembled the product warranty will be void and LSIS will not accept responsibility for damages.
- Do not allow objects, such as metal filings or cable off-cuts inside the product.
- Ensure that the mounting brackets are fixed tightly if the product is used in an environment that is affected by vibration.

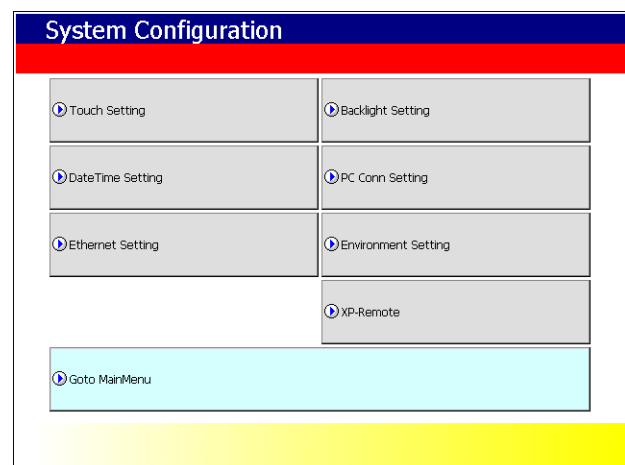
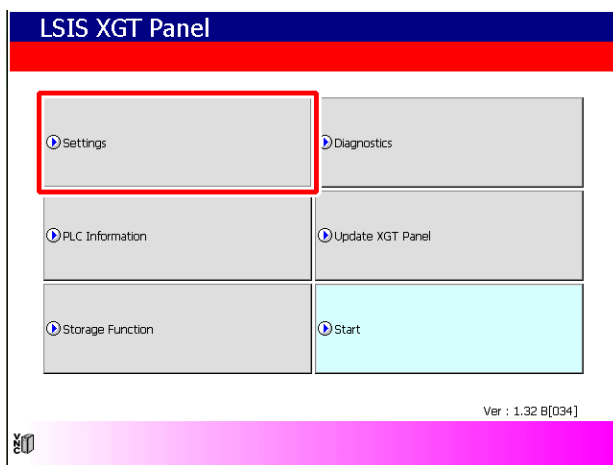
2 Troubleshooting

Following contents describe basic inspection and resolution method. Please contact or visit our service center to troubleshoot the problem if it cannot be resolved.

2.1 System setting

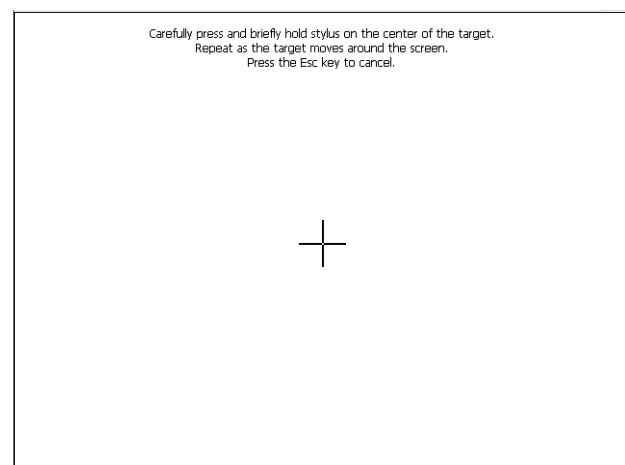
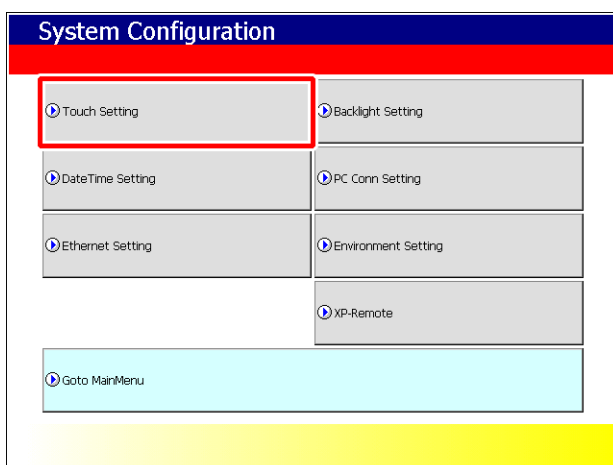
It describes the system configuration including XGT Panel's touch setting, communication setting, and other settings

If you click [Settings] button in XGT Panel menu page, you can set various options for XGT Panel



2.1.1 Touch Calibration

XGT Panel provides touch calibration function. If you click [Touch setting] button in System Configuration, the calibration page shows up. Please refer to the instruction shows on the page and complete the calibration.



If you touch two points simultaneously after [Allow Multi-touch] option is checked, XGT Panel recognizes midpoint of them.

Remark

- (1) Touch precision is calibrated initially. If precision error is big, it might hard to be reset by screen touch. In this case, please connect an USB mouse to XGT Panel and do touch calibration easily..
- (2) When touch location changes during operation, please re-calibrate the touch precision as below:
Touch calibration setting page will show up if you touch 5 times consecutively on an empty space.

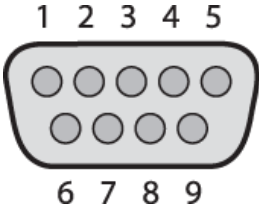
2.1.2 Communication Setting

Communication parameters between XGT Panel and other devices can be set in XP-Builder.

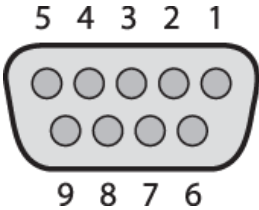
Please refer to XP-Builder User's manual to set in detail. User's manual can be downloaded on official webpage:
<http://www.lsis.com>

The basic information port settings and communication settings are as below:

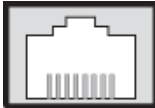
■ Communication port setting

RS232C																				
Specification	Port	Description																		
1) Connector type: D-Sub 9P, male 2) Cable maximum length: 15m 3) Shielded cable recommended		<table border="1"> <tr><td>1</td><td></td></tr> <tr><td>2</td><td>Receive Data</td></tr> <tr><td>3</td><td>Transmit Data</td></tr> <tr><td>4</td><td></td></tr> <tr><td>5</td><td>Signal Ground</td></tr> <tr><td>6</td><td></td></tr> <tr><td>7</td><td></td></tr> <tr><td>8</td><td></td></tr> <tr><td>9</td><td></td></tr> </table>	1		2	Receive Data	3	Transmit Data	4		5	Signal Ground	6		7		8		9	
1																				
2	Receive Data																			
3	Transmit Data																			
4																				
5	Signal Ground																			
6																				
7																				
8																				
9																				

RS422/485

Specification	Port	Description																		
1) Connector type: D-Sub 9P, female 2) Cable maximum length: 15m 3) Shielded cable recommended		<table border="1"> <tr><td>1</td><td></td></tr> <tr><td>2</td><td></td></tr> <tr><td>3</td><td>Frame Ground</td></tr> <tr><td>4</td><td>TX+</td></tr> <tr><td>5</td><td>TX-</td></tr> <tr><td>6</td><td>Signal Ground</td></tr> <tr><td>7</td><td></td></tr> <tr><td>8</td><td>RX+</td></tr> <tr><td>9</td><td>RX-</td></tr> </table>	1		2		3	Frame Ground	4	TX+	5	TX-	6	Signal Ground	7		8	RX+	9	RX-
1																				
2																				
3	Frame Ground																			
4	TX+																			
5	TX-																			
6	Signal Ground																			
7																				
8	RX+																			
9	RX-																			

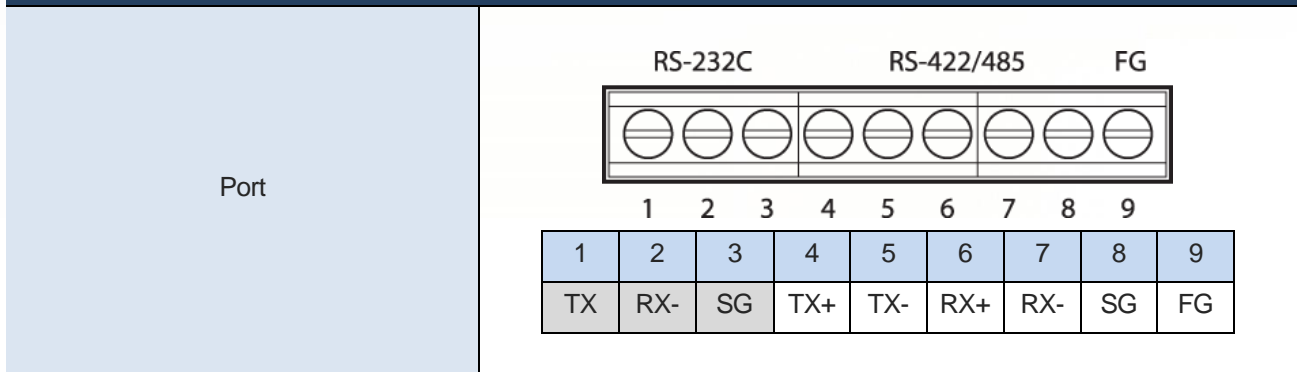
Ethernet

Port																	
																	
	<table border="1"> <tr> <td>8</td> <td>7</td> <td>6</td> <td>5</td> <td>4</td> <td>3</td> <td>2</td> <td>1</td> </tr> <tr> <td></td> <td></td> <td>RX-</td> <td></td> <td></td> <td>RX+</td> <td>TX-</td> <td>TX+</td> </tr> </table>	8	7	6	5	4	3	2	1			RX-			RX+	TX-	TX+
8	7	6	5	4	3	2	1										
		RX-			RX+	TX-	TX+										

Remark

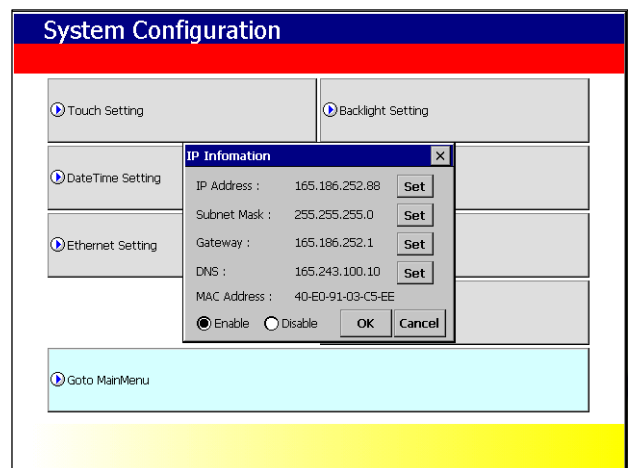
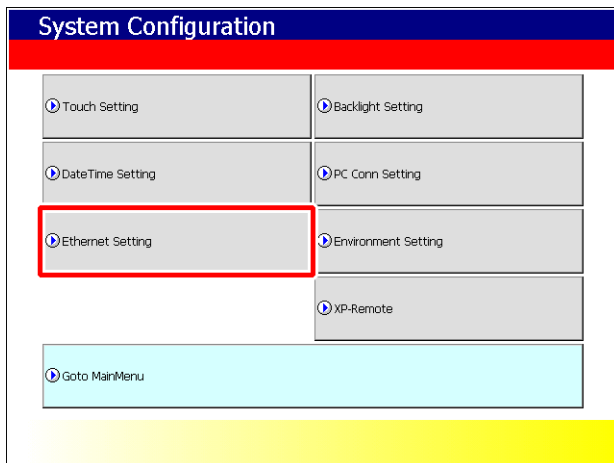
TTE and BTE type do not support Ethernet function

TTE and BTE (Terminal block type)

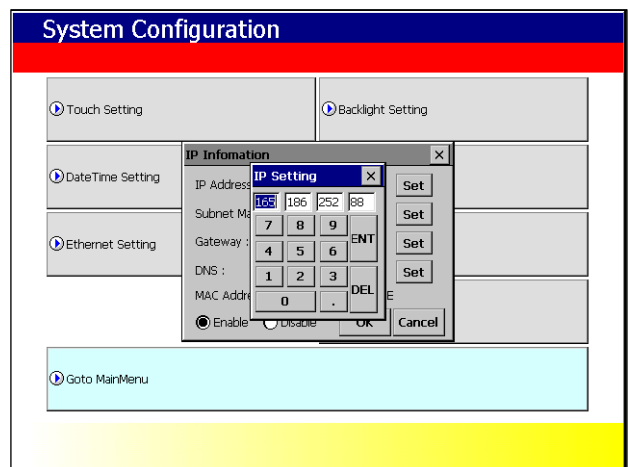
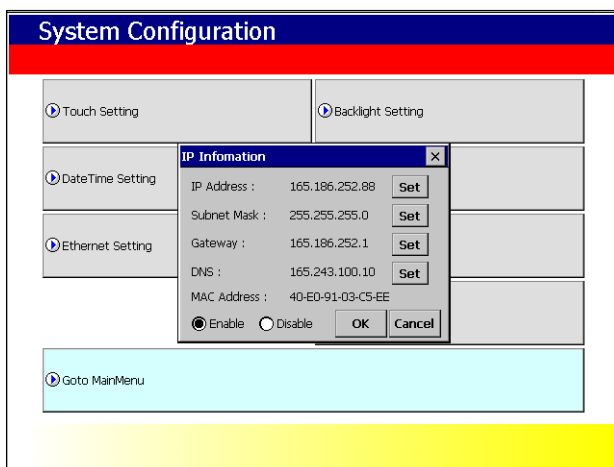


■ Ethernet setting

If you click [Ethernet Setting] button in [System Configuration], you can change IP in XGT Panel for Ethernet communication.



Click [Set] button to change IP address, Subnet Mask and Gateway respectively.



Please check the 'Enable' option to activate these parameters

Remark

We recommend the following method, when connecting with PC solely.

- 1) XGT Panel setting
 - IP Address : 192.168.0.10
 - Subnet Mask : 255.255.255.0
 - Gateway : 192.168.0.1
- 2) PC setting
 - IP Address : 192.168.0.11
 - Subnet Mask : 255.255.255.0
 - Gateway : 192.168.0.1

(Differentiate last value of two IP Address)

* XP30-BTE, XP30(50)-TTE do not support Ethernet communication.

2.1.3 Other Setting

■ USB setting

XGT-Panel provide USB 2.0 Host port, hence USB mouse/keyboard/memory sticks are available for use. Considering various kinds of USB memory sticks, there might be recognition error due to different specification. Please refer to following test procedure to confirm your USB stick is available for use.

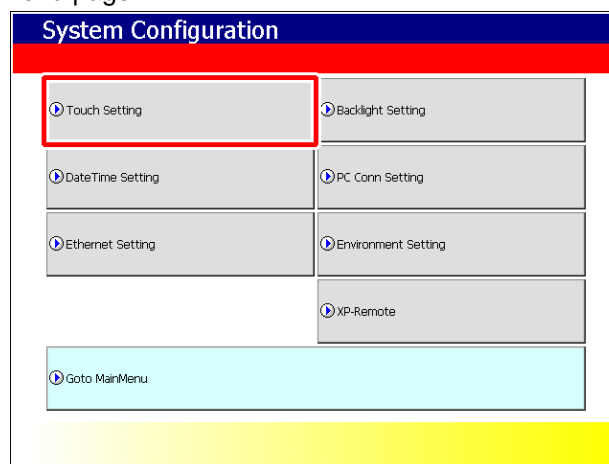
1. USB memory stick recognition test

If your memory stick cannot be recognized in XGT Panel, please refer to following procedure to test.

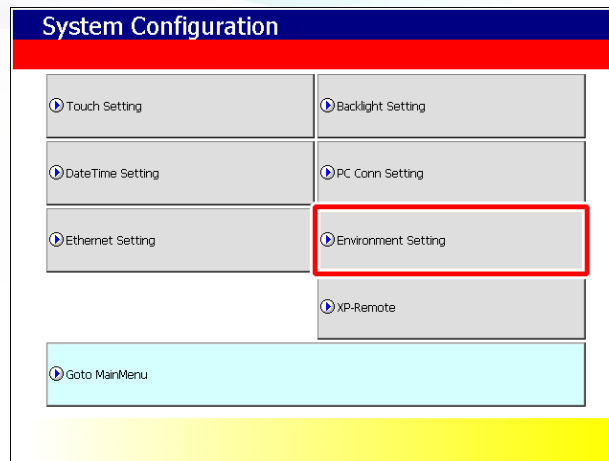
(1) USB Reset Power function

If USB Reset Power function is used, power of XGT Panel will consistently reset until the USB memory stick is recognized, before XP-Runtime page shows up. This function can be activated in System configuration.

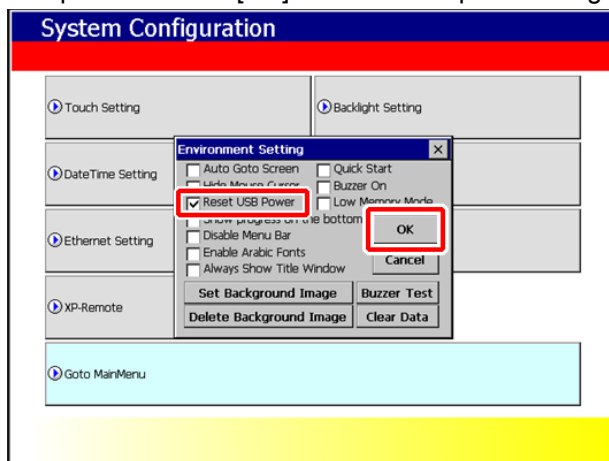
1) Click [Settings] button in menu page



2) Click [Environment Setting] button.



3) Check "Reset USB Power" option and click [OK] button to complete setting



This function is activated initially. If XGT Panel cannot recognize USB memory stick though this function was set, please deactivate the function and then check it again. If it is still cannot be recognized, there's problem with the memory stick.

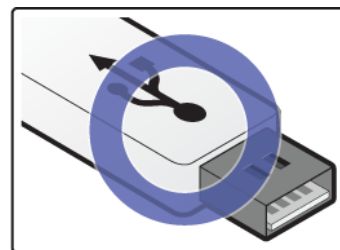
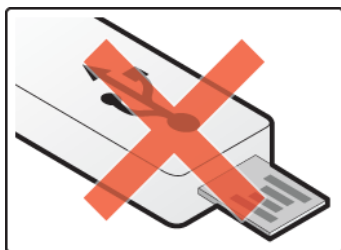
(2) Recommended type of USB memory stick

USB memory sticks using in XGT Panel are installed in industrial area, hence it is easily affected by electrical noise.

Therefore, we highly recommend you to use following type of USB memory stick.

1) Shielded USB type recommended

Please use second type of USB stick which is shielded, and avoid using first type of stick which is easily affected by electrical noise.



2) USB 2.0 memory sticks recommended

XGT Panel is optimized with USB 2.0 Host port. Hence we recommend you to use USB 2.0 memory stick and if you use USB 3.0 memory sticks, please check whether it can be used with USB 2.0 port.

3) USB power limitation

XP series HMI provide 2 USB Host port(Economic type provide 1 port), and each port limits 250mA current in it. The USB memory stick cannot be power supplied if the current over 250mA, hence please check the capability of your memory stick.

2. Recommended USB memory stick product

Following products can be used regardless of USB Reset Power function.

- (1) Recommended USB memory stick for 'USB Reset Power ON/OFF' both used

Product name	Manufacturer
U1_Xm-Mini 4GB	AXXEN

- (2) Recommended USB memory sticks for 'USB Reset Power OFF' used

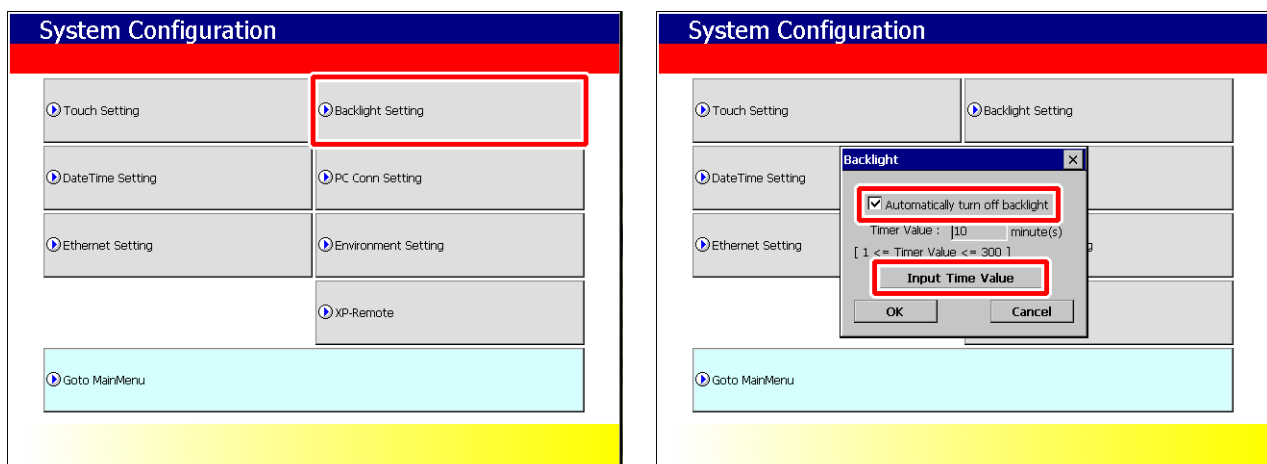
Product name	Manufacturer
UJ3 32GB	LG
PLEO Max 4GB	Samsung
Cruzer Z36 8GB	SAN DISK

Remark

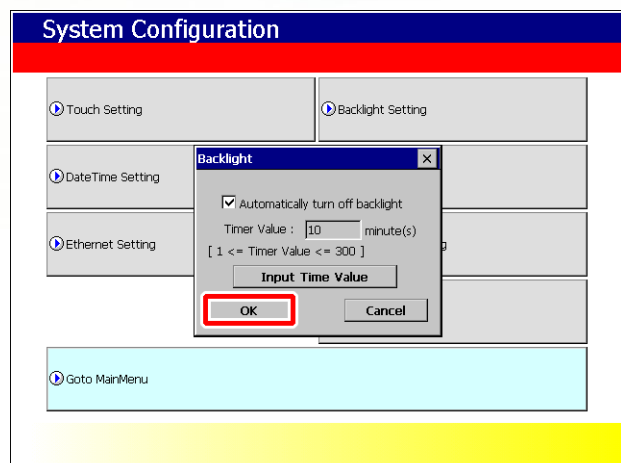
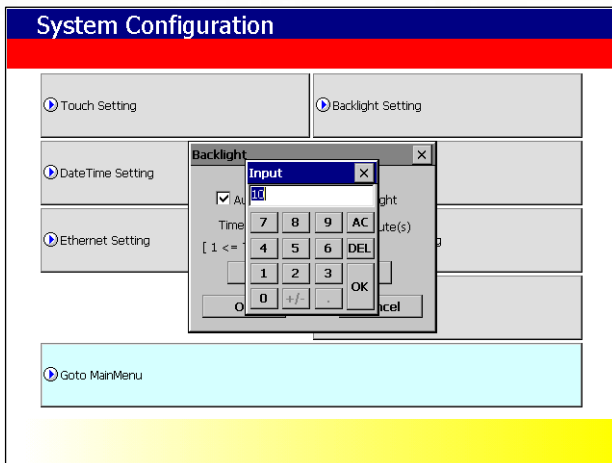
- (1) We tested recommended USB sticks regarding recognition by XGT-Panel, hence we do not responsible for performance and A/S of these products.
- (2) USB sticks may not be recognized due to capability even though the product name is same.
- (3) Products listed above may not be recognized by design alteration in the future
- (4) Above list will be updated.

■ Backlight setting

If you click [Backlight Setting] button in [System Configuration] as follows, setting screen shows up



If you want to use screensaver function, please check 'Automatically turn off backlight' option and input the appropriate time value.

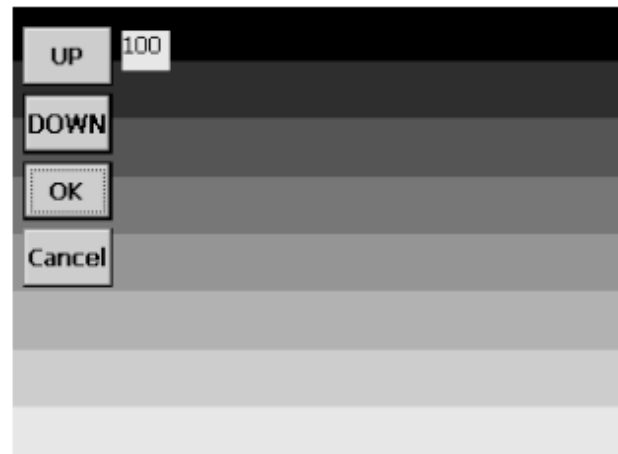
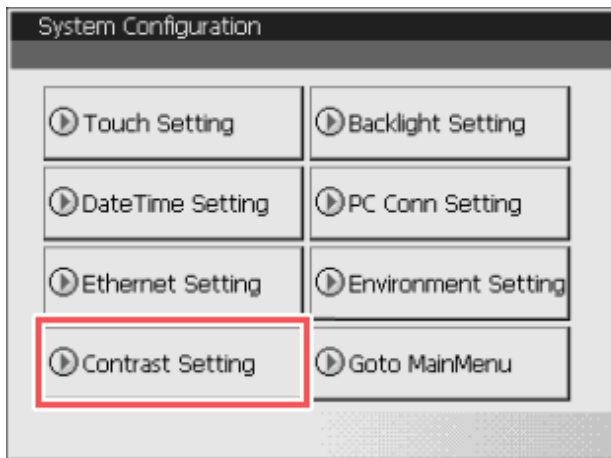


If you input 10 in time value, backlight turns off after 10 minutes of no use. If you touch the panel, backlight turns off again.

■ Contrast setting (only for XP30-BTA, BTE /DC)

This setting is only available for mono type XP30-BTA/BTE.

If you press [Contrast Setting] button on [System Configuration] screen, you can adjust mono LCD's contrast..



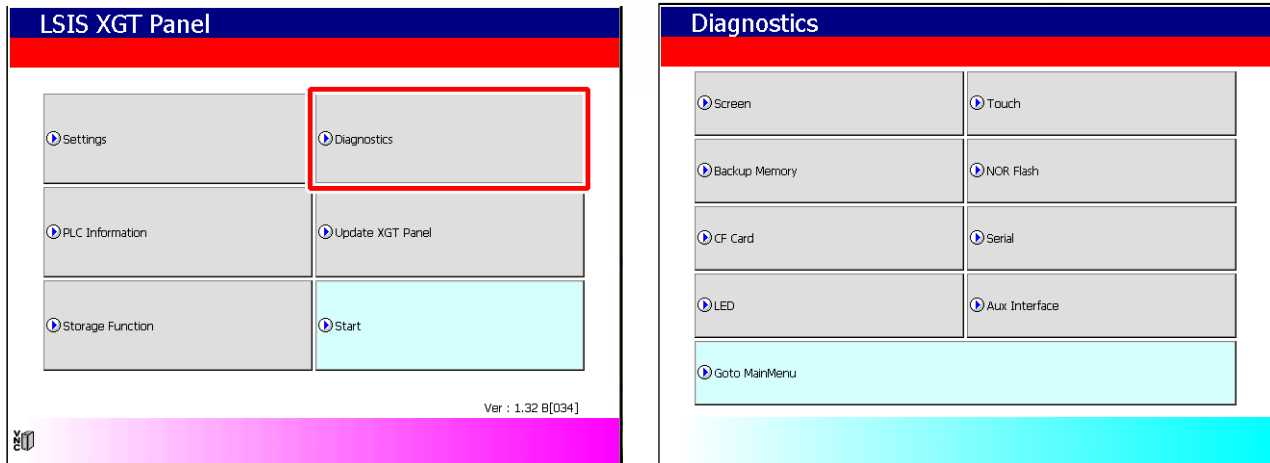
UP button increase the contrast and DOWN button decrease the contrast. Contrast range is within 0~100.

This setting is also available during operation. If you touch the screen for 3 seconds, [Con.] shows up. Then you can adjust the contrast by click the [Con.] button.

2.2 Diagnosis

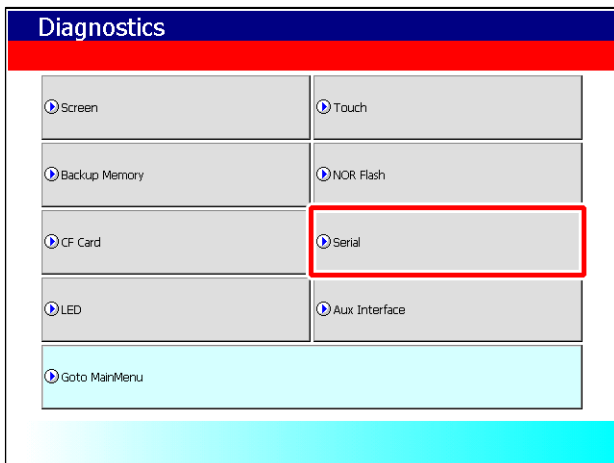
Following contents describe how to diagnose functions of XGT Panel like communication, screen and touch function.

If you click [Diagnostics] button on the XGT Panel's menu page, diagnosis page will shows up.



2.2.1 Communication Diagnosis

If you click [Serial] button, you can diagnose serial ports of XGT Panel. XGT Panel support self-diagnosis function for serial ports and it is called 'loop-back' test.



The purpose of Loop back test is to diagnose communication port by product itself. Therefore, a customized connector is used for this test – loop-back connector.

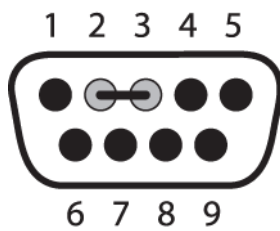
Following figures are wiring instruction of loop back connector for different ports. For the serial port diagnosis, please refer to following pictures to make a loop-back terminal first.

RS-232C(6 pin) tool port loop back connector should be made as follows:

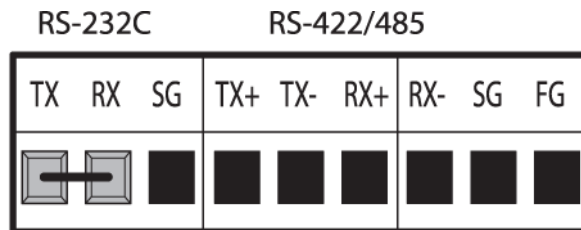


(Connect pin No.2 and 6)

RS-232C port loop back connector should be made as follows

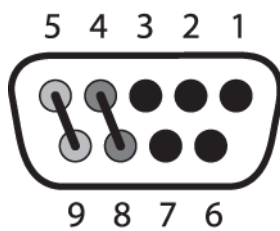


(Connect pin No. 2 and 3)

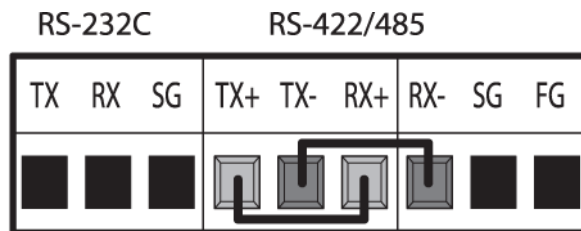


(Connect TX and RX)

RS-422/485 port loop back connector should be made as follows:



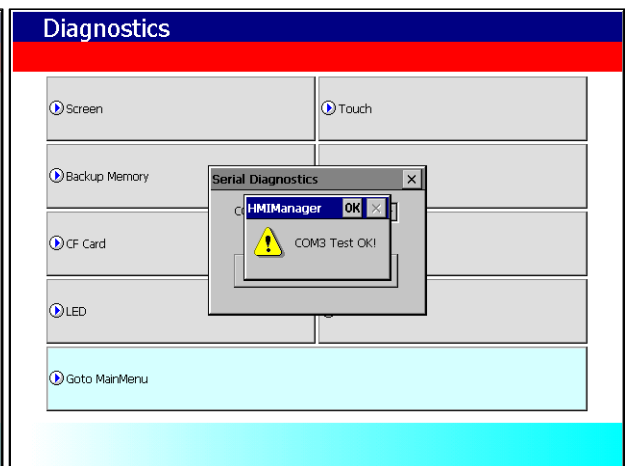
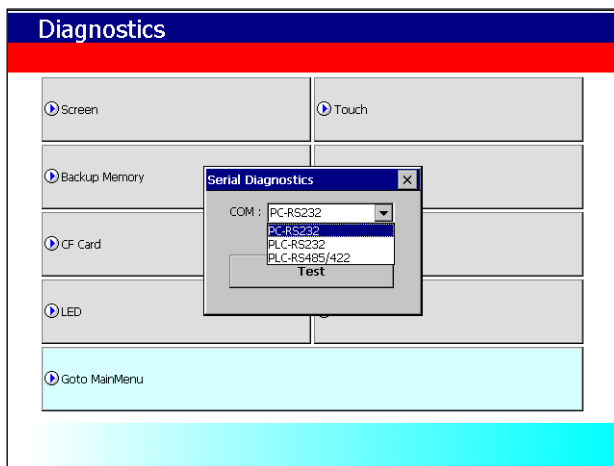
(Connect pin No.4 and 8, pin No.5 and 9)



(Connect TX+ and RX+, TX-and RX-)

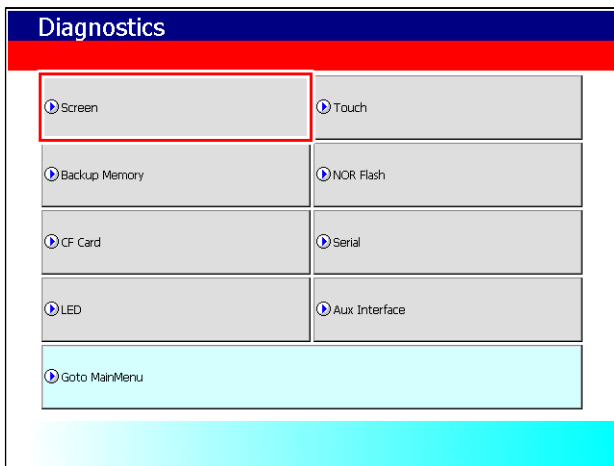
After connected loop-back terminal, select the port you want to inspect and then click 'Test'.

If the port is normal, then the OK message will popup, otherwise, it will shows FAILED message.



2.2.2 Screen Diagnosis

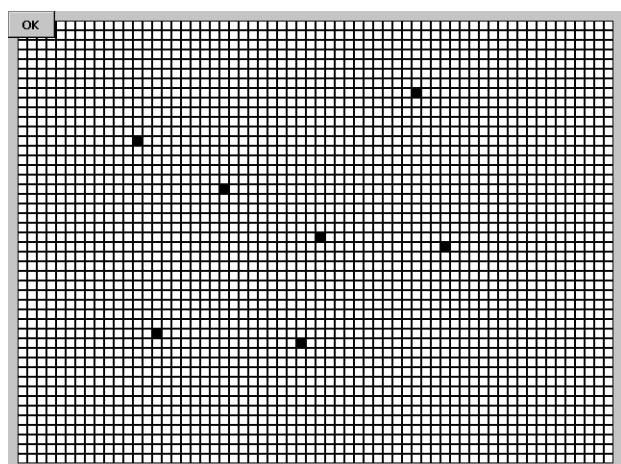
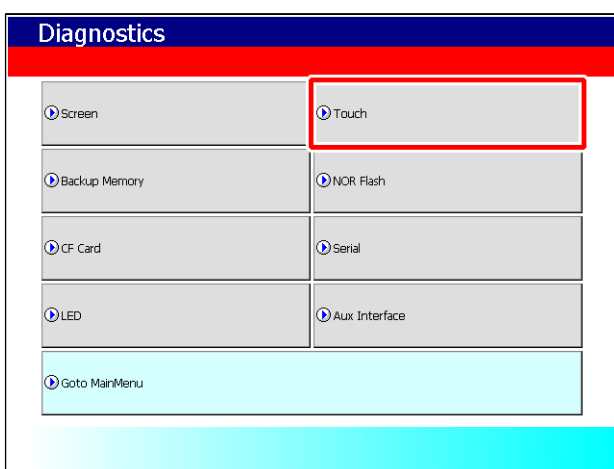
If you click [Screen] button, a red page will show up. And if you touch the screen, then the screens turn to green page. Similarly if you touch the screen on this diagnosis page, the screen will continuously change into diverse color with buzzer. Please refer to page color to check whether the color precision is correct. For XP30-BTA/DC product, screen changes into 8 steps' light. After all screen for diagnosis pass, then click [Close] button which is showed up on upper left corner of last page.to back to main menu



Item	XP30-BTA(BTE)	XP30-TTA(TTE)	XP40-TTA(TTE)	XP50-TTA(TTE)	XP70-TTA	XP80-TTA	XP90-TTA
Display	BLACK > 8 Gray steps Scale screen > WHITE	RED > GREEN > BLUE > BLACK > WHITE > Diagram					

2.2.3 Touch Diagnosis

If you click [touch] button, you can see the following page. You can touch this page to diagnose whether the touch location is correct. Please click [OK] button to quit from the page.

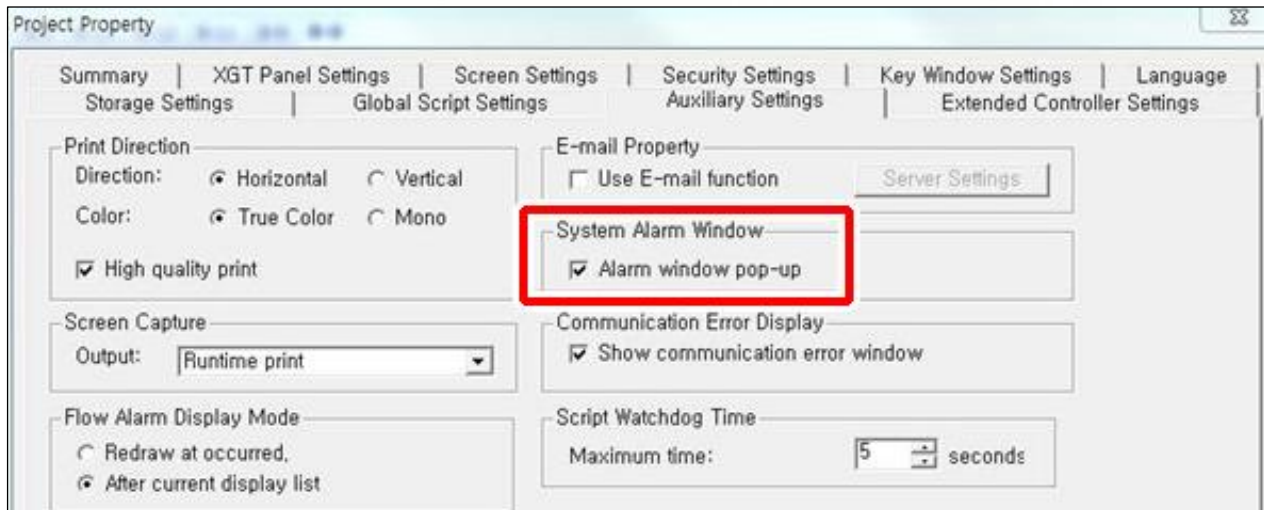


If the touched location is not correct, reset the Touch setting (Please refer to 2.2.1 Touch Calibration).

2.2.4 Battery Diagnosis

Following content describes message popup function in XGT Panel when internal battery used up. If you set this function, XGT Panel can automatically diagnose when the battery is not available for use. Please refer to following steps to activate this function to protect unnecessary loss.

Operate XP-Builder -> Project Property -> Activate 'Alarm window pop-up'






2.3 Troubleshooting when fault occurs

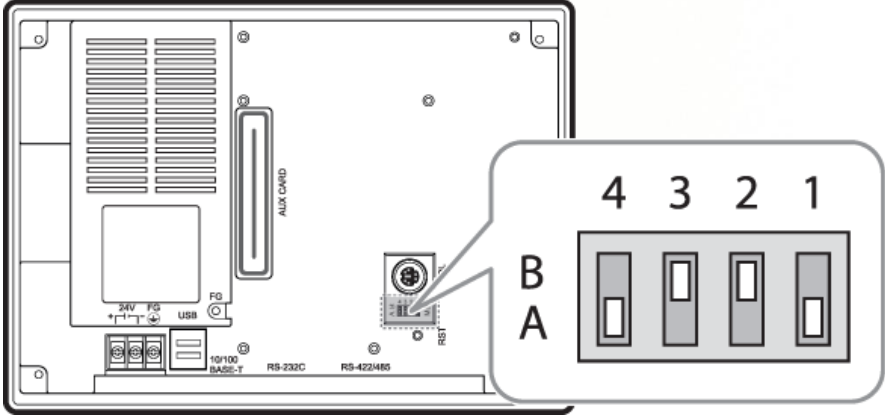
2.3.1 Booting Problem



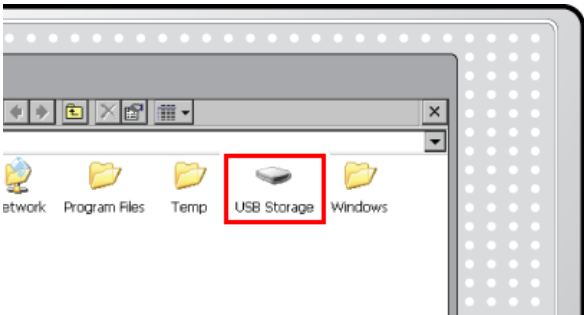
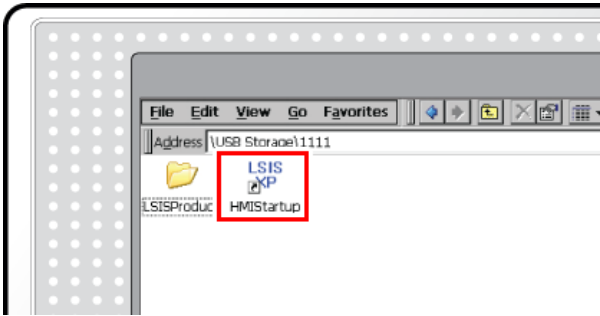
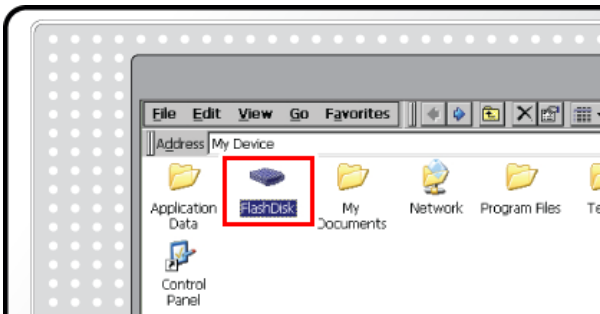
XGT Panel may have booting problems after power supplied

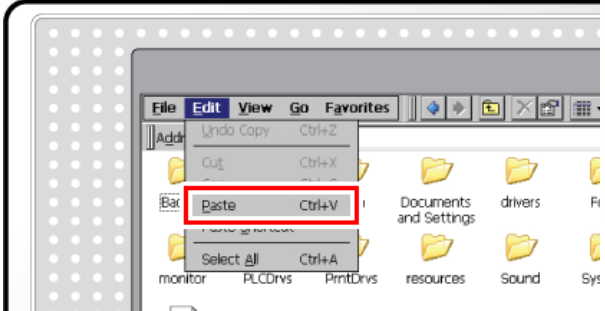
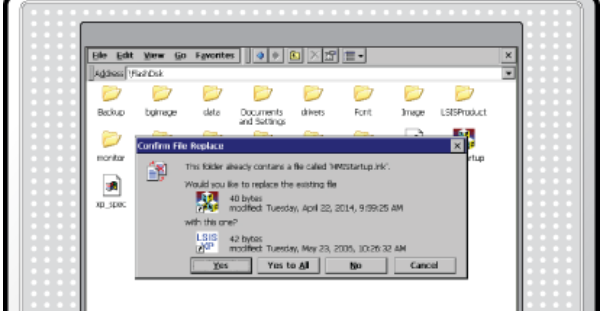
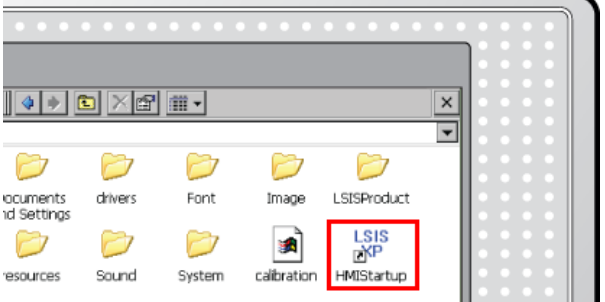
In this case, please check the wire status of power supply and whether the power supply works normally

If there's no problem with the power supply, please refer to following content to troubleshoot.

Fault phenomenon	Cause	Resolution
(1) Screen do not turn on after power supplied 	XGT Panel does not set to booting mode HW fault	Set the dip switches(refer to following content) Please contact the nearest service office
(2) Stop at Windows CE loading page 	Windows OS file is damaged	Please contact the nearest service office
(3) XGT Panel cannot turn to main menu page (Stop at Windows CE page) 	Startup file is damaged or deleted	'Startup' file recover(refer to following content)

Cause	Resolution – Set the dip switches
<p>XGT Panel does not set to booting mode</p>	<p>Please check the dip switches are set as following picture.</p> 

Fault phenomenon	Resolution – Engine file recover	
<p>XGT Panel cannot turn to main menu page (Stop at WindowsCE page)</p> 	<p>Initial startup file – HMIManager.exe might be damaged or deleted. Please replace or copy/paste the file into XGT Panel. The file can be download on LSIS official website: www.lsis.com Please refer to following step to troubleshoot.</p>	
	Figure	Step
	<p>1</p> 	<p>Click the lower left corner of Windows CE page, and click the [Windows Explorer]</p>
	<p>2</p> 	<p>Click the [USB Storage]</p>
	<p>3</p> 	<p>Copy the HMISStartup.exe that you save in the USB memory stick (This file can be downloaded on LSIS official website: www.lsis.com)</p>
<p>4</p> 	<p>Click the [Flash Disk]</p>	

	<p>5</p> 	<p>Paste the "HMISStartup.exe" file into [Flash Disk].</p>
	<p>6</p> 	<p>Please replace the original file if it is exist</p>
	<p>7</p> 	<p>Double click the HMISStartup.exe to operate main menu and check whether it works normally</p>

Remark

(1) You can find HMISStartup.exe from XP-Builder installed folder
 – [Program files] -> [LSIS] -> [XP Builder 1.3x] -> [XP-Runtime], then you can see following 3 folders:



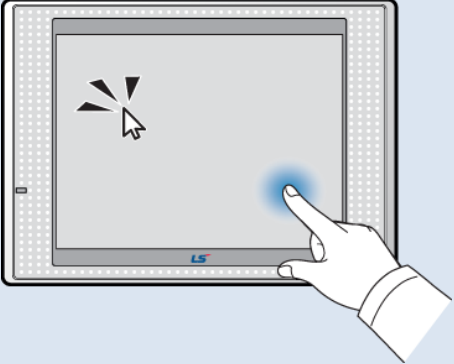

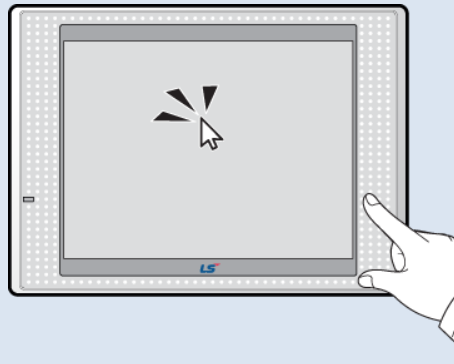
These 3 folders are engine file for XGT Panel. (ECONOMIC is for BTE/TTE type)
 Please copy the Startup.exe from the folder, and paste it to your USB memory stick(Change the file name as HMISStartup)

(2) If XGT Panel still not work normally after replacing startup file, please replace the engine folder in [FlashDisk] similarly(Change the folder name as "LSISProduct")

2.3.2 Touch Problem

Please confirm the protect sheet is removed before troubleshooting. Protect sheet is only for temporary protection. This is totally different from other devices like smart phone, hence please remove it before using XGT Panel.

Regarding touch problems, please refer to following content to troubleshoot.

Fault phenomenon	Cause	Resolution
(1) Not appropriate point responded.. 	Calibration not set appropriately Touch cover might be damaged.	Touch calibration (refer to Touch setting) Please contact the nearest service office
(2) No response after touch the screen 	Touch cover might be damaged	Please contact the nearest service office
(3) Screen operates without touch 	Touch cover or CPU might be damaged	Please contact the nearest service office

2.3.3 Communication Problem

XGT-Panel is used together with various kinds of equipment, hence it is easily affected by external noise. Especially it is easily affected when XGT Panel is used together with other brand's product, because of different communication specification.

Following contents contain basic information for communication problem troubleshooting, hence please contact LSIS service center in detail or contact the customer hotline of other brand

Fault phenomenon	Cause	Resolution
(1) RS-232C communication error	RS232C port damaged	Refer to 2.2.1 Communication Diagnosis
	Communication cable damaged or inappropriate cable is used	Replace the cable
	Communication circuit damaged	Please contact the nearest service office
(2) 485/422 communication error	RS485/422 port damaged	Refer to 2.2.1 Communication Diagnosis
	Communication circuit damaged	Please contact the nearest service office
(3) Ethernet communication error	Ethernet IP Address setting error	Refer to 2.1.2 Communication Setting
	unappropriate Ethernet cable is used or damaged	Replace the cable
	Ethernet port of XGT-Panel, PC, or connected device is damaged	Check the port

3 Maintenance

To keep the XGT Panel best, examine the XGT Panel.

3.1 Maintenance

Because an error may be developed by environment, the periodic maintenance is needed. You should check the following categories once or twice every 6 months.

Maintenance category		Judgment standard	Measure
Power		Within the power change range (Within -15% / +10%)	Modify the source of electric power in order to be in the fluctuation range of a permissible voltage.
Environment	Operating temperature	0 ~ + 50 °C	Modify the operating temperature and humidity to be proper.
	Operating humidity	10 ~ 85%RH	
	Vibration	No vibration	Use the anti-vibration rubber and make a count measure.
Getting loose of power terminal		There is no unwinding	Screw the unwound terminal.
Getting loose of communication connector		There is no unwinding	Screw the unwound terminal.
Reserved part		Amount of reserved part and reservation Check the status	Refill the insufficiency and improve the reservation.

3.2 Daily Maintenance

Check the following daily..

Maintenance category	Maintenance contents	Judgment standard	Measure
Status of panel adhesion	Check the unwound screw of the bracket	Fixed firmly	Wind the screw
Getting loose of power terminal	Getting loose of power terminal screw	There is no unwinding	Wind the screw
	Reduce the distance between compressed terminals.	Keep the proper distance.	Correction
Status of communication connector	Unwinding of fixed screw	There is no unwinding	Wind the screw

3.3 Periodical Maintenance

Check the followings once or twice every six months and take measure.

Maintenance category		Maintenance method	Judgment standard	Measure
Environment	Surrounding temperature	Measure through temperature/Hygrometer Measure of corrosive gas	0 ~ + 50℃	Modify it to meet the general standard. (environment standard in the panel)
	Surrounding humidity		10 ~ 85%RH	
	Surrounding pollution degree		There is no corrosive gas.	
XGT Panel Status	Unwinding, swing	Shake the XGT Panel	Fixed firmly	Wind the screw
	Dust, foreign matter adhesion	Check visually	There is no adhesion	-
Connection status	Unwinding of screw	Wind the screw by driver	There is no unwinding.	Wind the screw
	Reduce the distance between compressed terminals.	Check visually	Keep the proper distance.	Correction
	Unwinding of connector	Check visually	There is no unwinding.	Wind the fixed screw of connector
Power voltage maintenance		Check the power voltage of input terminal of power by test	AC 100~240V : AC 85~264V DC 24V : DC19.2~28.8V	Supply power modification
Battery		Check when battery is exchanged and voltage drop is indicated (It is expressed by system alarm)	Check the total of power stoppage time and guarantee duration There is no battery voltage drop indication	If guarantee duration is exceeded even though there is no battery voltage drop indication, change the battery.
LCD Backlight maintenance		Check visually	Check the guarantee duration	When error occurs, change the backlight.
Touch status	Touch location error	Check at the Diagnostics of XGT Panel	Appropriate touch location	Reset at the setting of XGT Panel.
	Touch pad malfunction	Check visually	There is no damage or scratch/pollution	When error occurs, change touch pad.

4 Error Code List

4.1 Error Message during Execution of Program

In case that problems occur during execution of XGT Panel including the start of device, diagnosis of device and environment setting, project download, monitoring of control device, and error messages occur as type of box. At this time the message indicates the code made by 4 digit number. The front 2 number indicate code of object and work, the rear 2 number is message number. In case that the present error message is indicated as [0101], an error message occurs when doing diagnosis about the status of NVRAM. When an error message occurs, refer to the row's number and sequence and find the category of reason and measure.

Object	Error code		Occurrence location	Error message	Reason and measure
	Type	Address			
Device diagnosis	0x01	0x01	XGT Panel	NVRAM Data Access... FAILED!	Failed to check whether backup memory is normal or not. If this symptom is repeated, contact the near Customer Service Center.
		0x02	XGT Panel	BATTERY STATUS...NOT GOOD!	Backup data is not valid. If this symptom is repeated when turning power off and on, remove XGT Panel's power and exchange the battery.
		0x03	XGT Panel	Write Operation FAILURE!	The built-in Flash disk has an error. Contact the near Customer Service Center.
		0x04	XGT Panel	Read Disk Information Error!	The built-in Flash disk has an error. Contact the near Customer Service Center.
		0x05	XGT Panel	Write Operation FAILURE!	Check that CF card is empty, and equip CF card and test again. If same symptom is repeated, CF card or CF card slot of XGT Panel may have a problem.
		0x06	XGT Panel	Read Disk Information Error!	Check that CF card is empty, and equip CF card and test again. If same symptom is repeated, CF card or CF card slot of XGT Panel may have a problem.
Device setting	0x02	0x01	XGT Panel	Invalid timeout value.	You inputted the wrong time which is not within backlight setting time range. Input the effective time.
Device setting	0x02	0x02	XGT Panel	Not found XGT Panel configuration file.	There is no setting information data of XGT Panel. If this symptom is repeated when turning power off and on, contact the near Customer Service Center.
		0x03	XGT Panel	Please enter an integer between 0 and 255.	When setting IP, the values within 0~255 are effective. Input the value within the above range.
Viewing device information	0x03	0x01	XGT Panel	No project in XGT Panel.	Now, there is no downloaded project so you can't see connection information. Download the project from XP-Builder.
XGT Panel Update	0x04	0x01	XGT Panel	Failed to Start Engine. Please update engine again.	Because of update error or Flash disk error, program can't be executed. If you can update, redo the above procedure.

Object	Error code		Occurrence location	Error message	Reason and measure
	Type	Address			
Switch	0x05	0x01	XGT Panel	Invalid password.	There is password in the each object. When editing the project downloaded in the present device, input the designated password at the project property information.
Number indication device / Number input device	0x06	0x01	XGT Panel	Can't write Data.	Because of communication error, the value can't be inputted. Check the communication status and input again.
		0x02	XGT Panel	No input Data.	You tried to input with no value. Input the value
		0x03	XGT Panel	Exceeded the max length.	You exceed the maximum length to input.
		0x04	XGT Panel	Exceeded the minimum Value.	You exceed the maximum value to input.
		0x05	XGT Panel	Exceeded the maximum Value.	You exceed the minimum value to input.
		0x06	XGT Panel	Invalid at Input Case.	When you input the value, input can't be done because of wrong input. Check the input condition of each object in the Builder and input again.
Lamp	0x07	None			
Character indication device/ Character input device	0x08	None			
Message	0x09	None			
Clock	0x0A	None			
Animation	0x0B	None			
Graph	0x0C	None			
Window	0x0D	None			
Part	0x0E	None			
History alarm	0x0F	None			
Flow alarm	0x20	None			
System alarm	0x21	None			
Scheduler related	0x22	None			
Recipe related	0x23	None			
Logging related	0x24	None			
Data list	0x25	None			
Project download	0x26	0x00	XGT Panel	Abnormal send-payload. Please download project again.	Communication status is abnormal. Check the connection of communication cable.

Object	Error code		Occurrence location	Error message	Reason and measure
	Type	Address			
Project download	0x26	0x01	Builder	There's no Password File.	This message shows up when making it newly because there is no password setting file in the device. When making it newly, it is initialized with no password.
		0x02	Builder	Failed to Create Password File.	It make new password setting file when there is no password setting file. But downloading is stopped when it fails to make this file because of device error. If this problem is repeated, Contact the near Customer Service Center.
		0x03	Builder	Invalid Backup Media.	Communication status is abnormal. Route information is not correct to save project data. If this problem is repeated, Contact the near Customer Service Center.
		0x04	Builder	Failed to Create Initial Version File.	In case that the version information file doesn't exist in the device, that file is made newly. In case that the device has error and fails to make that file, download is stopped. If this problem is repeated, Contact the near Customer Service Center.
		0x05	Builder	File Size Error.	There is version information file. In case that because of error of device, it fails to read version information, because the device doesn't know version, download is stopped. If this problem is repeated, Contact the near Customer Service Center.
		0x06	Builder	Failed to get Project ID.	In case of not reading file where project property is included, download is stopped. If this problem is repeated, Contact the near Customer Service Center.
		0x07	Builder	Failed to read history alarm data.	In case of not reading information about alarm history because of error of NVRAM, download is stopped. If this problem is repeated, Contact the near Customer Service Center.
		0x08	Builder	Failed to read CF Card information.	Project is set to store data at CF card equipped at device. By the way, now it can't read information about CF card. Check the installation status of CF card and if it is normal, check the CF card. If this problem is repeated, contact Customer Service Center.
		0x09	Builder	Failed to read USB information.	Project is set to store data at USB storage device equipped at device. By the way, now it can't read information about USB storage device. Check the installation status of USB storage device and if it is normal, check USB storage device. If this problem is repeated, contact Customer Service Center.

Object	Error code		Occurrence location	Error message	Reason and measure
	Type	Address			
Project download	0x26	0x0A	Builder	Failed to read Flash memory information.	In case that it can't know information about memory status, download is stopped. If this problem is repeated, contact Customer Service Center.
		0x0B	Builder	Failed to clear Temp Directory.	In case that because of error of Flash Disk, it can't delete the directory made temporarily for download because of error of Flash Disk, download is stopped. If this problem is repeated, contact Customer Service Center.
		0x0C	XGT Panel	Failed to delete Font File. Please reboot XGT Panel.	In case that it fail to delete the font file of previous project because of error of XGT Panel, download is stopped. If this problem is repeated, contact Customer Service Center.
		0x0D	XGT Panel	Failed to delete Image File. Please reboot XGT Panel.	In case that it fail to delete the image file of previous project because of error of XGT Panel, download is stopped. If this problem is repeated, contact Customer Service Center.
		0x0E	XGT Panel	Failed to delete Sound File. Please reboot XGT Panel.	In case that it fail to delete the sound file of previous project because of error of XGT Panel, download is stopped. If this problem is repeated, contact Customer Service Center.
		0x0F	XGT Panel	There's no downloaded project. It needs to download whole project	It can't download part or fixed part in case there is no downloaded project. In case of this, download again. If this problem is repeated, contact Customer Service Center.
		0x10	Builder	Backup path is invalid. Please check the path that project is downloaded.	When user change the storage location of project data including image and font, if there is not respective routine, it make newly. By the way, download is stopped in case it fails to make newly. When it is designated as CF card, it can occur in case CF card is not installed. If this problem is repeated and not referred in the above, contact Customer Service Center.
		0x11	XGT Panel	Failed to delete previous project archive. Please reboot XGT Panel.	The project backup file downloaded already can be deleted because of error of XGT Panel. Reboot XGT Panel. If this problem is repeated, contact Customer Service Center.
		0x12	XGT Panel	Failed to delete past project data files. Please download project again.	When downloading, the log data area in the NV-RAM is initialized in case of selecting previous project's the monitor data deletion option. By the way, in case of failing this, downloading is stopped. If this problem is repeated, contact Customer Service Center.

Object	Error code		Occurrence location	Error message	Reason and measure
	Type	Address			
Project download	0x26	0x15	XGT Panel	Failed to initialize LOGGING area in NV-RAM. Please download project again.	When downloading, the log data area in the NV-RAM is initialized in case of selecting previous project's the monitor data deletion option. By the way, in case of failing this, downloading is stopped. If this problem is repeated, contact Customer Service Center.
		0x16	XGT Panel	Failed to initialize RECIPE area in NV-RAM. Please download project again.	When downloading, the alarm history in the NV-RAM is initialized in case of selecting the previous project's monitor data deletion option. By the way, in case of failing this, downloading is stopped. If this problem is repeated, contact Customer Service Center.
		0x17	XGT Panel	Failed to initialize ALARM area in NV-RAM. Please download project again.	The downloaded font file is moved into original storage location but when this fails, downloading is stopped. If this symptom is repeated, contact Customer Service Center.
		0x18	XGT Panel	Failed to install font files. Please download project again.	The project data is divided into several files according to the contents but when this fails, downloading is stopped. If this symptom is repeated, contact Customer Service Center.
		0x19	XGT Panel	Failed to unmarshall download file. Please download project again.	The data divided according to the contents is moved to the original storage location but when this fails, downloading is stopped. If this symptom is repeated, contact Customer Service Center.
		0x1A	XGT Panel	Failed to install new project data files. Please download project again.	The downloaded project is not installed normally because of error of the Flash Disk. Download the project again. If this symptom is repeated, contact Customer Service Center.
		0x1B	XGT Panel	Failed to merge data files. Please download project again.	The downloaded project zip file is moved to the original storage location but when it fails, downloading is stopped. If this symptom is repeated, contact Customer Service Center.
		0x1C	XGT Panel	Failed to save new project archive. Please download project again.	There is a program to reboot engine program after downloading in the device but when it fails, this message shows up. But because the downloading is completed if you reboot engine directly, it works normally. The program name to reboot is startup.exe and it can be installed by engine upgrade function.
		0x1D	XGT Panel	Failed to XGP Panel startup program. Please update XGT Panel Software.	It can't find software to reboot XGT Panel. Update the XGT Panel.

Object	Error code		Occurrence location	Error message	Reason and measure
	Type	Address			
Project download	0x26	0x1E	XGT Panel	Project data is not downloaded. Please download project again.	The project data was not downloaded normally because of communication error. Check the connection status of communication cable and If this symptom is repeated, contact Customer Service Center.
		0x1F	XGT Panel/ XP-Builder	Failed to read Version information file. Please download project again.	There is version information file but when it can't read file normally because of the device error, downloading is stopped because it doesn't know version. If this symptom is repeated, contact Custom Service Center
Project download from USB storage device	0x27	0x51	XGT Panel	Cannot find project data in USB Storage	There is no USB or device status of USB is not good or project is not saved properly.
		0x52	XGT Panel	Project information file is not in USB Storage.	The project is not saved normally in the USB. Check whether there is XP_Project folder and [project name].inf in the USB or not.
		0x53	XGT Panel	Failed to read project information file.	It can't read project information file because the project is not saved in the USB normally. Save the project again from XP-Builder to the USB.
		0x54	XGT Panel	Device type is not matched.	The connected device type is not same as the device type set in the project in the USB. In case of this, project can't be downloaded into the device. Edit the project again or download according to the connected device.
		0x55	XGT Panel	Cannot read user password.	Information about the password can't be red because of the device error. If this symptom is repeated, contact Customer Service Center.
		0x56	XGT Panel	Password is not matched.	When saving the project, the password inputted by user is not same as present connection password. Input correct password and save the project.
		0x57	XGT Panel	Cannot read XGT Panel software version.	There is version information file but when it can't read file normally because of the device error, downloading is stopped because it doesn't know version. If this symptom is repeated, contact Customer Service Center.
		0x58	XGT Panel	XGT Panel software is old version. Please update XGT Panel.	The version of XP-Builder where project is saved is not compatible with present XGT Panel. Update the XGT Panel.
		0x58	XGT Panel	XP-Builder is old version. Please update XP-Builder.	The version of XP-Builder where project is saved is not compatible with present XGT Panel. Update the XGT Panel.

Object	Error code		Occurrence location	Error message	Reason and measure
	Type	Address			
Project download from USB storage device	0x27	0x59	XGT Panel	Cannot read download data format version.	There is storage structure version information file. But when it can't read this file because of the device error, downloading is stopped because it doesn't know the version. If this symptom is repeated, contact Customer Service Center.
		0x5A	XGT Panel	Download data format version is not matched. Please update XGT Panel.	Data storage type is not correct. Update XGT Panel.
		0x5A	XGT Panel	Download data format version is not matched. Please update XP-Builder.	Data storage type is not correct. Update the XP-Builder.
		0x5B	XGT Panel	Data file path is invalid.	There is no project data file at designated location. Check the connection status of USB and if there is no error, save the project to USB again.
		0x5C	XGT Panel	Download file name length is invalid.	The name of project data file is not saved correctly. Save the project at the USB again. If this symptom is repeated, contact Customer Service Center.
		0x5D	XGT Panel	Cannot find download file.	The project data file can't be found. Save the project data file at the USB again. When this symptom is repeated, check the USB. If there is no error, contact Customer Service Center.
		0x5E	XGT Panel	Download file size is invalid.	The project data file is not saved correctly. Save the project data file at the USB again. When this symptom is repeated, check the USB. If there is no error, contact Customer Service Center.
		0x5F	XGT Panel	Cannot find project backup file.	The project backup file which should be downloaded is not downloaded because of communication error. Download again.
		0x60	XGT Panel	Project backup file size is invalid.	The project backup file is saved incorrectly. Save the project at the USB storage equipment again. When this symptom is repeated, check the USB storage equipment and if the USB is normal, contact Customer Service Center.
		0x61	XGT Panel	Font file name length is invalid.	The font file's name is saved incorrectly. Save the project in the USB again. If this symptom is repeated, contact Customer Service Center.
		0x62	XGT Panel	Font file is not downloaded.	The font file which is needed for project is not saved in the USB storage equipment. Save the project in the USB. If this symptom is repeated, contact Customer Service Center.

Object	Error code		Occurrence location	Error message	Reason and measure
	Type	Address			
Project download from USB storage device	0x27	0x63	XGT Panel	Font file size is invalid.	The font file is not saved correctly. Save the project at the USB. Save the project at the USB. If this symptom is repeated, check the USB and if the USB is normal, contact Customer Service Center.
		0x64	XGT Panel	Cannot unmarshall download file.	The data can't be analyzed because the project data file is not saved correctly. Save the project at the USB again. If this symptom is repeated, check the USB and if the USB is normal, contact Customer Service Center.
		0x65	XGT Panel	Cannot delete previous project data.	The data of the project can't be deleted because of device error. If this symptom is repeated, check the USB and if the USB is normal, contact Customer Service Center.
		0x66	XGT Panel	Cannot move new font files.	Downloaded font file is moved to the original storage location. But when it fails, the downloading is stopped. If this symptom is repeated, contact Customer Service Center.
		0x67	XGT Panel	Cannot move new project data files.	The project data classified according to the content is moved to the original storage location. But when it fails, the downloading is stopped. If this symptom is repeated, contact Customer Service Center.
		0x68	XGT Panel	Cannot move project backup file.	The downloaded project zip data is moved to the original storage location. But when it fails, the downloading is stopped. If this symptom is repeated, contact Customer Service Center.
XGT Panel booting	0x28	0x01	XGT Panel	Previous instance is not terminated.	XGT Panel software was already started. Reboot the device. If this symptom is repeated, contact Customer Service Center.
		0x02	XGT Panel	Start Server Fail. Restart XGT Panel	The XGT Panel software can't initialize the communication status normally. Check the communication status again. If this symptom is repeated when communication is normal, contact Customer Service Center.
		0x03	XGT Panel	Failed to Start Echo Server.	The XGT Panel software can't initialize the communication status normally. Check the communication status again. If this symptom is repeated when communication is normal, contact Customer Service Center.
		0x04	XGT Panel	Failed to accept connection.	The XGT Panel software can't initialize the communication with the XP-Builder normally. Check the communication status again. If this symptom is repeated when communication is normal, contact Customer Service Center.

Object	Error code		Occurrence location	Error message	Reason and measure
	Type	Address			
XGT Panel booting	0x28	0x05	XGT Panel	Failed to rename UpdateNew.exe	In the present XGT Panel the new updated XGT Panel software's name cannot be changed. After rebooting the XGT Panel, update again. When rebooting, if you can't start engine, delete \\FlashDisk\LSISProduct\UpdateNew.exe in the XGT Panel. Then if you touch Update.exe and execute the XGT Panel, it can be update mode. Try update again. If this symptom is repeated, contact Customer Service Center
		0x06	XGT Panel	Failed to Delete Update.exe.	The new module is downloaded by the XGT Panel update but the previous module is not deleted. Reboot the device. If the XGT Panel software is not started normally, touch \\FlashDisk\LSISProduct\Update.exe in the XGT Panel. At this time, if XGT is set as update mode, update again. If this symptom is repeated, contact Customer Service Center.
Communication between other XP Builder-XGT Panel	0x29	0x30	XGT Panel	Failed to modify password file.	The device connection password can't be modified because of error of Flash Disk of XGT Panel. Reboot the device. If this symptom is repeated, contact Customer Service Center.
		0x31	XGT Panel	Password-related command transmission payload error	It failed to set and modify password because of communication status error. If this symptom is repeated, contact Customer Service Center.
		0x32	XGT Panel	There is no XGT Panel connection setting file.	The connection setting file of XGT Panel can't be found.
		0x33	XGT Panel	Modified content can't be saved in the XGT Panel connection setting file.	The modified information can't be saved at the connection setting file of XGT Panel. If this symptom is repeated, contact Customer Service Center.
		0x34	XGT Panel	Failed to set the time	The XGT Panel's time can't be set. If this symptom is repeated, contact Customer Service Center.
XGT panel S/W update	0x30	0x21	XGT Panel/XP-Builder	Failed to Create Initialized Module Version File.	Because the each module version information can't be read because of XGT Panel's error, it failed to initialize. If this symptom is repeated, contact Customer Service Center.
		0x22	XGT Panel/XP-Builder	Module version file size is invalid.	The each module version information can't be read because of XGT Panel's error. If this symptom is repeated, contact Customer Service Center.
		0x23	XGT Panel/XP-Builder	Can't Read module version file.	The each module version information can't be read because of XGT Panel's error. If this symptom is repeated, contact Customer Service Center.

Object	Error code		Occurrence location	Error message	Reason and measure
	Type	Address			
XGT panel S/W update	0x30	0x24	XP-Builder	There's no file to download.	The version information list to update is empty. Check the module folder newly designated at XP-Builder and if there is no error, download XGT Panel module and try update again. If this symptom is repeated, contact Customer Service Center.
		0x25	XP-Builder	Downloaded file is not Module to download.	The wrong file which is not in the new module list of XGT Panel is downloaded. Try update of XGT Panel again. If this symptom is repeated, contact Customer Service Center.
		0x26	XGT Panel	Not enough space in flash memory.	The space to copy new module in XGT Panel is not enough. After deleting the unnecessary file or backing up the previous file to the movable storage equipment, try update again. If this symptom is repeated after deleting, contact Customer Service Center.
		0x27	XGT Panel	Failed to Copy module ~.dll	The new module is not installed because of XGT Panel's error. After rebooting the device, touch \\FlashDisk\LSISProduct\Update.exe and set the device as update mode. Then update again. If this symptom is repeated, contact Customer Service Center.
		0x28	XGT Panel	Failed to Start Engine. Please update engine again.	To reboot the engine is not available because of wrong file which is developed by downloading wrong module or communication error. Touch \\FlashDisk\LSISProduct\Update.exe and set the device as update mode. Then update again. If this symptom is repeated, contact Customer Service Center.
		0x2A	XGT Panel	Failed to Write Data to Module version File.	It is failed to record the version information during update of XGT Panel. If this symptom is repeated, contact Customer Service Center.
		0x2B	XGT Panel	There's no downloaded file.	To reboot the engine is not available because of wrong file which is developed by downloading wrong module or communication error. Touch \\FlashDisk\LSISProduct\Update.exe and set the device as update mode. Then update again. If this symptom is repeated, contact Customer Service Center.

Object	Error code		Occurrence location	Error message	Reason and measure
	Type	Address			
XGT panel S/W update	0x30	0x2C	XGT Panel	Current state is not authorized.	To reboot the engine is not available because of wrong file which is developed by downloading wrong module or communication error. Touch \\FlashDisk\LSISProduct\Update.exe and set the device as update mode. Then update again. If this symptom is repeated, contact Customer Service Center.
		0x2D	XGT Panel	Module to download is not listed up yet.	To reboot the engine is not available because of wrong file which is developed by downloading wrong module or communication error. Touch \\FlashDisk\LSISProduct\Update.exe and set the device as update mode. Then update again. If this symptom is repeated, contact Customer Service Center.
		0x2E	XGT Panel	Failed to Initialize Update program.	XGT can't be set as update mode because of XGT Panel error. After downloading new XGT Panel module through homepage, etc., copy UpdateNew.exe file among new module to the \\FlashDisk\LSISProduct\ directory of XGT Panel through the movable storage equipment. Then reboot the XGT Panel and go update mode and update again. If this symptom is repeated, contact Customer Service Center.