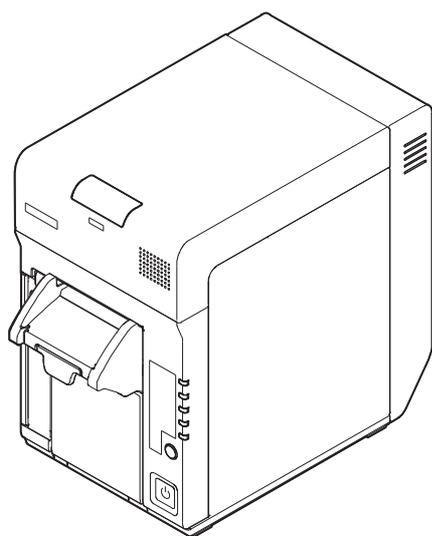


TM-C710

Technical Reference Guide



Product Overview

Describes features and general specifications for the product.

Setup

Describes setup and installation of the product.

Application Development Information

Describes how to control the printer and necessary information when you develop applications.

Handling

Describes how to handle the product.

Maintenance of the TM-C710

Describes to administrator for necessary information to administer TM-C710 in the system such as installing new printer or replacing the printer.

Cautions

- No part of this document may be reproduced, stored in a retrieval system, or transmitted in any form or by any means, electronic, mechanical, photocopying, recording, or otherwise, without the prior written permission of Seiko Epson Corporation.
- The contents of this document are subject to change without notice. Please contact us for the latest information.
- While every precaution has taken in the preparation of this document, Seiko Epson Corporation assumes no responsibility for errors or omissions.
- Neither is any liability assumed for damages resulting from the use of the information contained herein.
- Neither Seiko Epson Corporation nor its affiliates shall be liable to the purchaser of this product or third parties for damages, losses, costs, or expenses incurred by the purchaser or third parties as a result of: accident, misuse, or abuse of this product or unauthorized modifications, repairs, or alterations to this product, or (excluding the U.S.) failure to strictly comply with Seiko Epson Corporation's operating and maintenance instructions.
- Seiko Epson Corporation shall not be liable against any damages or problems arising from the use of any options or any consumable products other than those designated as Original Epson Products or Epson Approved Products by Seiko Epson Corporation.

Trademarks

Microsoft, Windows, and Windows Vista are either registered trademarks or trademarks of Microsoft Corporation in the United States and/or other countries.

EPSON is a registered trademark of Seiko Epson Corporation.

Exceed Your Vision is a registered trademark or trademark of Seiko Epson Corporation.

All other trademarks are the property of their respective owners and used for identification purpose only.

Copyright

The Ethernet interface model of this product includes software developed by the University of California, Berkeley, and its contributors.

©Seiko Epson Corporation 2013–2021.

For Safety

Key to Symbols

The symbols in this manual are identified by their level of importance, as defined below. Read the following carefully before handling the product.

 WARNING	You must follow warnings carefully to avoid serious bodily injury.
 CAUTION	Provides information that must be observed to prevent damage to the equipment or loss of data. <ul style="list-style-type: none">• Possibility of sustaining physical injuries.• Possibility of causing physical damage.• Possibility of causing information loss.
CAUTION	Provides information that must be observed to avoid damage to your equipment or a malfunction.
NOTE	Provides important information and useful tips.

Warnings



- **To avoid risk of electric shock, do not set up this product or handle cables during a thunderstorm.**
- **Be sure to use as power cable that complies with safety standards with a PE (power earth) terminal on the plug, and make sure to ground the product before use.**
Ignoring this may result in severe shock.
- **Never insert or disconnect the power plug with wet hands.**
Doing so may result in severe shock.
- **Handle the power cable with care.**
Improper handling may lead to fire or electric shock.
 - * Do not modify or attempt to repair the cable.
 - * Do not place any heavy object on top of the cable.
 - * Avoid excessive bending, twisting, and pulling.
 - * Do not place the cable near heating equipment.
 - * Check that the plug is clean before plugging it in.
 - * Be sure to push the plug all the way in.
- **Be sure to use the specified power source.**
Connection to an improper power source may cause fire or shock.
- **Do not place multiple loads on the power outlet.**
Overloading the outlet may lead to fire.
- **Shut down your equipment immediately if it produces smoke, a strange odor, or unusual noise.**
Continued use may lead to fire. Immediately unplug the equipment and contact your dealer or a Seiko Epson service center for advice.
- **Never attempt to repair this product yourself.**
Improper repair work can be dangerous.
- **Never disassemble or modify this product.**
Tampering with this product may result in injury or fire.
- **Do not allow foreign matter to fall into the equipment.**
Penetration by foreign objects may lead to fire.
- **If water or other liquid spills into this equipment, do not continue to use it.**
Continued use may lead to fire. Unplug the power cord immediately and contact your dealer or a Seiko Epson service center for advice.
- **If you open the DIP switch cover, be sure to close the cover and tighten the screw after adjusting the DIP switch.**
Using this product with the cover open may cause fire or electric shock.
- **Do not use aerosol sprayers containing flammable gas inside or around this product.**
Doing so may cause fire.

Cautions



- **Do not connect cables in ways other than those mentioned in this manual.**
Different connections may cause equipment damage or fire.
- **Be sure to set this equipment on a firm, stable, horizontal surface.**
The product may break or cause injury if it falls.
- **Do not use this product in locations subject to high humidity or dust levels.**
Excessive humidity and dust may cause equipment damage or fire.
- **Do not place heavy objects on top of this product. Never stand or lean on this product.**
Equipment may fall or collapse, causing breakage and possible injury.
- **To ensure safety, unplug this product before leaving it unused for an extended period.**
- **Do not remove the ink cartridge during transportation of the printer.**

Restriction of Use

When this product is used for applications requiring high reliability/safety, such as transportation devices related to aviation, rail, marine, automotive, etc.; disaster prevention devices; various safety devices, etc.; or functional/precision devices, etc., you should use this product only after giving consideration to including fail-safes and redundancies into your design to maintain safety and total system reliability. Because this product was not intended for use in applications requiring extremely high reliability/safety, such as aerospace equipment, main communication equipment, nuclear power control equipment, or medical equipment related to direct medical care, etc., please make your own judgment on this product's suitability after a full evaluation.

About this Manual

Aim of the Manual

This manual was created to provide information on development, design, and installation of POS systems and development and design of printer applications for developers.

Manual Content

The manual is made up of the following sections:

Chapter 1	Product Overview
Chapter 2	Setup
Chapter 3	Application Development Information
Chapter 4	Handling
Chapter 5	Maintenance of the TM-C710

Contents

■ For Safety	3
Key to Symbols	3
Warnings	4
Cautions	5
■ Restriction of Use	5
■ About this Manual	6
Aim of the Manual	6
Manual Content	6
■ Contents	7
<hr/>	
Product Overview	10
■ Features	10
■ Product Configuration	12
Interface	12
Color	12
Accessories	12
■ Parts Name and Function	13
Front Panel	13
Rear Panel	14
Buttons and Indicators	15
■ Status/Error Indications	17
■ Offline	18
■ Paper End Detection	18
■ Ink Replacement Request Detection	18
■ Paper Jam Detection	18
■ Buzzer Function	19
■ DIP Switches	19
■ Product Specifications	20
Operating Environment	21
Printing Speed	21
Barcodes/Two-Dimensional Symbols	22
Ink Cartridge	26
Print Area and Cut Positions	27
Electrical Characteristics	28
Reliability	28
Environmental Specifications	28
External Dimensions	30
■ Precautions	31

To Handle the Ink Cartridge.....	31
To Prevent Ink Waste.....	31
■ Restrictions	32

Setup 34

■ Flow of Setup	34
■ Installing the Printer	35
Important Notes on Installation.....	35
■ Connecting the USB/Ethernet Cable	37
■ Connecting the AC Adapter	39
■ Loading the Roll Paper	40
■ Loading the Ink Cartridge	42
■ Setting the Lane ID	44
■ Setting the Printer IP Address	45
■ Adding a TCP/IP Port	46
■ Installing the Printer Driver	49
For USB Interface Model.....	49
For Ethernet Interface Model.....	50
■ Installing Status API	51
■ Setting the DIP Switches	52

Application Development Information..... 53

■ Overview	53
■ Printer Driver	53
■ Status API	54
■ Sample Program	54
■ Software	56
Printer Driver.....	56
Administering network printers.....	56
Developing applications.....	56

Handling 57

■ Replacing the Ink Cartridge	57
■ Replacing the Roll Paper	58
■ Removing Jammed Paper	60

■ How to Use the Printer Driver	61
How to Display the Printer Driver	61
Registering User Defined Media.....	62
Favorite Setting	63
Information for User Definition	66
Buzzer Setting at the Time of Errors	67
Autocutting after Printing	68
Barcode Printing	69
2D Symbol Printing	78
Barcode and 2D Symbol Font Printing on .NET Environment	83
Functions of the Printer Driver.....	85
■ Uninstallation.....	89
Uninstalling the Printer Driver	89
Uninstalling Status API.....	91
■ Self-test	94
Procedure for the Self-test	94
■ Nozzle Check.....	95
Nozzle Check Using the Self-test	95
Nozzle Check Using the Printer Driver.....	95
■ Cleaning.....	96
Cleaning the Printer Case	96
Head Cleaning	96
■ Preparing for Transport	98
■ Storing Long-term	99
Before Long-term Storage	99
After Long-term Storage	99
■ Troubleshooting	101
Lighting and Flashing Error LED.....	101

Maintenance of the TM-C710..... 102

■ Necessary Information for an Administrator of the Printer.....	103
Printer Driver Functions	103
Destination for the Printer Driver Setting.....	104
Installing Multiple Printer Drivers on One Client Computer.....	105
■ Maintenance	106
Adding a Client Computer (for the Ethernet Interface Model).....	106
Adding a Printer.....	107
Adding a Paper Type/Changing the Print Setting.....	108
Replacing the Printer.....	108

Product Overview

This chapter describes features and functions of the product.

Features

The TM-C710 is a 4-color ink jet printer that offers high speed, full-color printing with the ease of operability and high reliability required for commercial applications. Its compact size fits easily on a counter.

Printing

- High-speed printing
 - * 130 mm/s {5.12"/s} (printing width 53 mm {2.09"}, 360 dpi × 180 dpi, unidirectional)
 - * 100 mm/s {3.94"/s} (printing width 53 mm {2.09"}, 360 dpi × 360 dpi, bidirectional)
 - * 90 mm/s {3.54"/s} (printing width 53 mm {2.09"}, 360 dpi × 720 dpi, bidirectional)
- Full color printing
 - * CMYK 4-color printing
 - * Each color has 4 gradations
 - * Print resolution: 360 dpi × 180 dpi, 360 dpi × 360 dpi, 720 dpi × 360 dpi

[dpi: dots per 25.4 mm (dots per inch)]

Handling

- Front operation (when replacing roll paper and ink cartridges)
- Drop-in roll paper method
- An autocutter as standard equipment

Reliability

- Uses pigment ink for excellent light-fastness and water resistance
- Fitted with automatic nozzle check system and automatic recovery function for missing dots

Printer driver

- Printing with a Windows printer driver.
- The printer has a built-in barcode font, which is available from .NET application.
- Supported OS
 - * For detailed information on supported operating systems, see the release note for the printer driver.

Status API

- Can transmit the printer status (such as printer and ink cartridge status, and print job information) to your applications, and can set the buzzer to beep when an error such as a cover open occurs.
- Dedicated sample program using Status API (program language: C + +, VB.NET, C#) is prepared.

Other features

- Compact size that fits unobtrusively on a counter
 - * Main unit footprint: W: 140 mm × D: 210 mm {5.51" × 8.27"}
- Ethernet interface and USB interface as standard equipment
- A buzzer as standard equipment

Product Configuration

Interface

USB interface (USB 2.0 high speed) and Ethernet interface (100 Base-TX/10 Base-T)

Color

EDG (Epson Dark Gray)

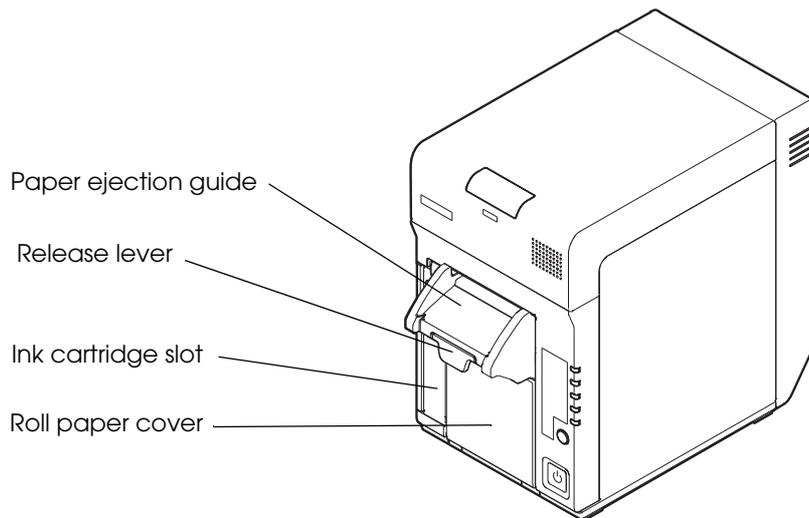
Accessories

Unpacking

- Ink cartridge (Model number: SJIC25P) (STARTER CARTRIDGE)
- Ink cartridge (Model number: SJIC25P)
- Roll paper
- AC Adapter (AC Adapter K, AC Adapter K1)
- AC cable
- TM-C710 Documents Disc
- Setup Guide

Parts Name and Function

Front Panel



Paper ejection guide:

Printed coupons are ejected along the paper ejection guide.

Release lever:

Pull the release lever to open the roll paper cover.

Ink cartridge slot:

Ink cartridge is loaded.

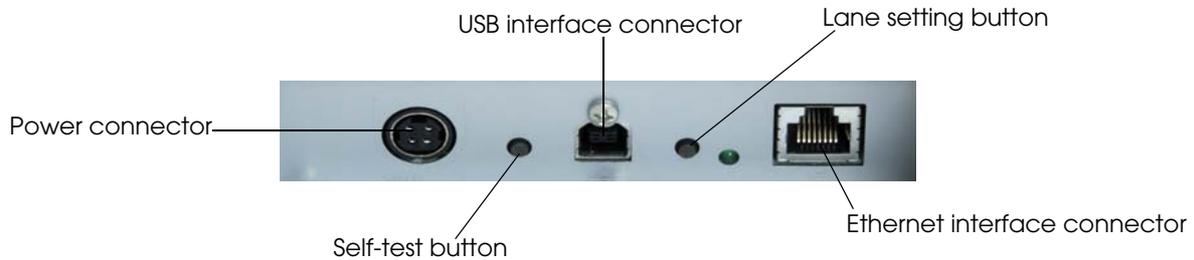
Roll paper cover:

Open the roll paper cover to load or replace roll paper.

CAUTION

Do not open the roll paper cover during printer operation. When the roll paper cover is opened during printing, printing stops, the printer automatically goes offline, and the Error LED lights. The data being printed is lost. When the cover is closed, the printer returns to online and the printable state.

Rear Panel



Power connector:

Connect a DC cable for the accessory AC adapter.

Self-test button:

Press the button to perform a self-test.

NOTE

You can check the printer status with the following items the self-test prints out.

- * Printer configuration
- * IP address
- * Firmware version
- * Serial number
- * Nozzle check pattern

USB interface connector:

Connect a USB cable when USB interface is used.

Lane setting button:

The printer executes the lane setting function after this button is held down for 5 seconds or longer continuously.

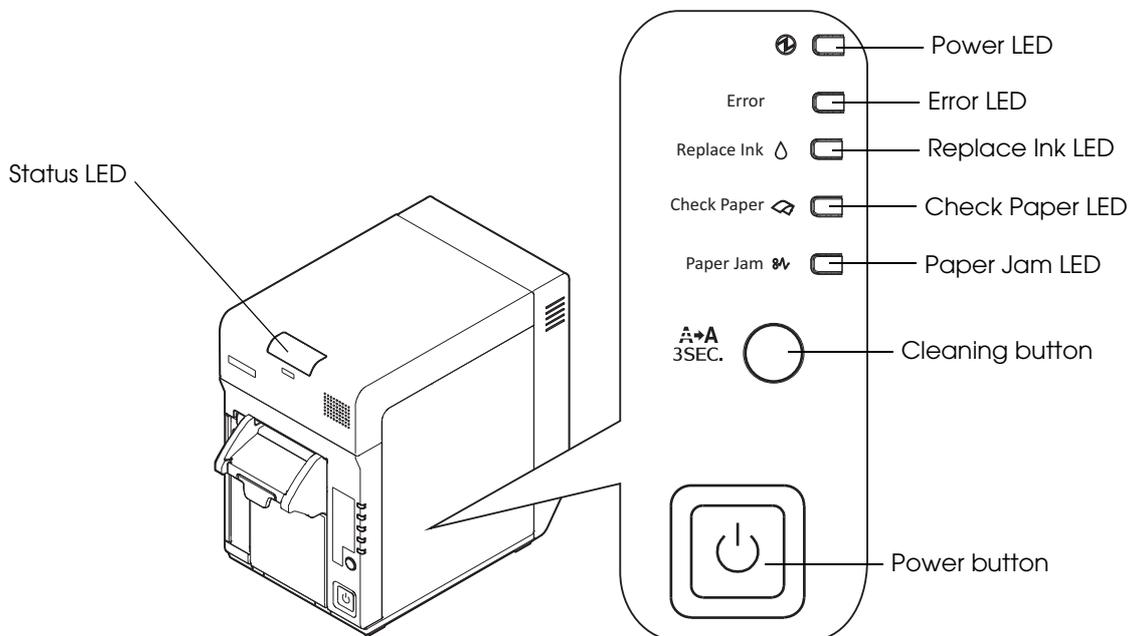
Ethernet interface connector:

Connect a LAN cable.

NOTE

For details how to connect the interface and power supply connector, see ["Connecting the USB/Ethernet Cable"](#) on page 37 and ["Connecting the AC Adapter"](#) on page 39.

Buttons and Indicators



Status LED (Green/Orange)

- The green LED lights when there is no error.
- The orange LED flashes when there is an error.

NOTE

The buzzer beeps when the Status LED flashes. For details on the buzzer function, see "[Buzzer Function](#)" on page 19.

Power LED (Green)

- Lights when the power is on.
- Flashes when the printer is initializing, cleaning, printing, or during an error state.

CAUTION

Before turning off the printer, wait more than 10 seconds (so that the print head cap closes) after the printer finishes operating.

Error LED (Orange)

- Lights when the printer is in the error state.
- Flashes when a fatal error or maintenance requirement occurs.

Replace Ink LED (Orange)

- Lights when no ink cartridge has been loaded or when the printer is requesting replacement of the ink cartridge.

Check Paper LED (Orange)

- Lights when no paper has been loaded.

Paper Jam LED (Orange)

- Lights when the paper is jammed.

NOTE

The printer status is also displayed with combinations of lighting and flashing of LEDs. See ["Status/Error Indications" on page 17](#) for details.

Cleaning button

- When printing is faint or dots are missing, press the Cleaning button for 3 seconds or more continuously to perform the print head cleaning.

NOTE

Do not press the cleaning button unless there is a problem with print quality. Unnecessary cleaning wastes ink.

Power button

- When DIP switch 1 is Off, the power is turned on after the Power button has been pressed while the power is off.
- When DIP switch 1 is Off, the power is turned off after the Power button has been pressed for 3 seconds or more while the power is on.
- When DIP switch 1 is On, the printer settings are reset after the Power button has been pressed for 3 seconds or more.

NOTE

- For 30 seconds after a reset, the printer and host cannot communicate.
- After resetting, the printer is in the same state as when the power is turned on.
- For details on the DIP switches, see ["DIP Switches" on page 19](#).

Status/Error Indications

The printer status is displayed by a combination of lighting and flashing of LEDs.

  : On
   : Flashing
  : Off

LED						Status/ Action
Power	Error	Replace Ink	Check Paper	Paper Jam	Status	
 or 		—	—	—		Roll paper cover is open. Close the roll paper cover.
 or 		—		—		No roll paper is loaded. Load new roll paper.
 or 			—	—		No ink cartridge is loaded or ink cartridge needs to be replaced. Load new ink cartridge.
 or 		—	—			Paper jam occurred. Remove jammed paper and load roll paper.
 or 						Fatal error occurred. Reset the printer. If the printer does not recover, the printer needs to be repaired.
 or 						Maintenance is required. The printer needs to be repaired.
						Software updating Wait for the updating to be completed.
	 or 	 or 	 or 	 or 		Lane setting Complete the lane setting. After the time-out of 30 seconds, the printer recovers from the lane setting mode.

Concerning the “—” column, this depends on the combination with other states.

Offline

The printer does not have an online/offline switch. Offline occurs:

- Between when the power is turned on (including the printer reset through the interface) and when the printer is ready to receive data.
- During a self-test.
- When the roll paper cover is open.
- During an error state.
- When the printer stops printing due to a paper-end.
- When the printer stops printing due to ink replacement request.
- When the printer is waiting for recovery from a high-temperature error.

NOTE

The printer can transmit or receive data from/to the host PC even when the printer is offline.

Paper End Detection

When roll paper is used up, printing stops, the printer automatically goes offline, and the Check Paper LED lights. The data being printed is lost.

When roll paper is replaced with a new roll, the printer returns to online and the printable state.

Ink Replacement Request Detection

When an ink cartridge is not loaded, the printer goes offline, and the Replace Ink LED lights.

When the ink replacement request is detected, the Replace Ink LED lights.

When the ink cartridge is replaced with a new one, the printer returns to online and the printable state.

Paper Jam Detection

When a roll paper jam occurs, the printer automatically goes offline, and the Paper Jam LED lights.

When you remove the jammed paper, never pull out the paper forcibly. When roll paper is replaced and roll paper cover is closed, the printer returns to online and the printable state.

Buzzer Function

The printer records the buzzer sound file in the NV memory, and beeps the file when the printer event occurs according to the table below.

Volume control: 2 levels (On/Off)

Printer event	Frequency	Beeping period	Pattern
Fatal error	2.0 KHz	Approx. 1.0 seconds	1 time
Maintenance requirement	2.5 KHz	Approx. 1.0 seconds	1 time
Cover open	3.0 KHz	Approx. 1.0 seconds	Continuous
Time to replace ink cartridge	3.0 KHz	Approx. 1.0 seconds	Continuous
Roll paper out	3.0 KHz	Approx. 1.0 seconds	Continuous
Paper jam error	3.0 KHz	Approx. 1.0 seconds	Continuous

DIP Switches

Setting the DIP switches to On or Off switches the following functions. See "[Setting the DIP Switches](#)" on page 52 for how to set the DIP switches.

Switch no.	Function	On	Off	Default
1	Operation of the power button	Reset (Power button is disabled)	Power On/Off (Power button is enabled)	Off
2	Internal use	Do not change		Off
3	Internal use	Do not change		Off
4	Internal use	Do not change		On

Product Specifications

Print method		Serial inkjet, dot matrix Four-color printing
Print direction		Bidirectional/unidirectional printing
Paper feed		Forward direction feed
Print width		53 mm {2.09"} maximum
Autocutting method		By separated-blade scissors
Autocut type		Partial cut (one center point uncut)
Roll paper supply method		Drop-in roll paper
Roll paper	Paper width	58 mm {2.28"} (57.5 ± 0.5 mm {2.26 ± 0.02"})
	Maximum diameter	90 mm {3.54"}
	Paper core	Outside diameter: 18 mm {0.71"} or larger
	Paper type	Plain paper, Light Matte Coated paper
Interface	Ethernet	Specification: IEEE 802.3-compliant Communication speed: 100BASE-TX/10BASE-T Supporting communication protocols: ARP, ICMP, IP, UDP, TCP, HTTP, DHCP, ENPC, SNMP, Port9100, APIPA (Microsoft Automatic Private IP Addressing) Factory setting: IP address setting mode: Manual IP address: 192.168.192.168 Lane number: 168 Host name: TM-C710-xxxxxx (xxxxxx sets the lowest 6 digits of MAC address.) Domain name: None
	USB	Specification: USB 2.0-compliant Communication speed: High-speed Device type: Self-powered device
Power supply		Power supplied by accessory AC adapter
AC adapter	Input voltage (rated)	100 to 240 V
	Frequency (rated)	50 to 60 Hz
Power consumption	Operating	Average approximately 30 W
	Idling	Average approximately 3 W

Main unit size (W × D × H)	140 × 210 × 222 mm {5.51 × 8.27 × 8.74"} (excluding the protrusion)
Mass	Approx. 5.2 kg (11.4 lb) (excluding ink cartridge and roll paper)

Operating Environment

Computers	PC/AT-compatible	
System requirements	CPU	Computers with a processor clock speed of 1 GHz or higher are recommended.
	RAM	RAM of 512 MB or more is recommended.

CAUTION

If the minimum configuration system requirements as shown above are not met, the printer may not perform well.

NOTE

- For detailed information about supported operating systems, see the release note for the printer driver.

Printing Speed

Input resolution (horizontal × vertical)	Graphic resolution (horizontal × vertical)	Print direction	Printing speed (53 mm printing width)
180 × 180 dpi	360 × 180 dpi	Unidirectional printing	130 mm {5.12"/s}
360 × 360 dpi	360 × 360 dpi	Bidirectional printing	100 mm {3.94"/s}
360 × 360 dpi	720 × 360 dpi	Bidirectional printing	90 mm {3.54"/s}

[dpi: dots per 25.4 mm (dots per inch)]

NOTE

- The printer speeds above are for continuous printing except during print head cleaning, autocutting, or starting/ending a job.
- Printing speed may be slower, depending on the data transmission speed.

Barcodes/Two-Dimensional Symbols

Barcodes/Two-dimensional symbols encodable by the printer driver

Barcode/two-dimensional symbol printing	Barcodes Identification rate: ANSI rank D (based on Seiko Epson Corporation standard)	UPC-A, UPC-E, JAN 8 (EAN 8), JAN 13 (EAN 13), CODE 39, CODE 128, GS1-128, GS1 DataBar Omnidirectional, GS1 DataBar Truncated, GS1 DataBar Limited, GS1 DataBar Expanded
	Two-dimensional symbols	Stack type: <ul style="list-style-type: none"> PDF417, GS1 DataBar Stacked, GS1 DataBar Stacked Omnidirectional, GS1 DataBar Expanded Stacked Matrix type: <ul style="list-style-type: none"> QR Code

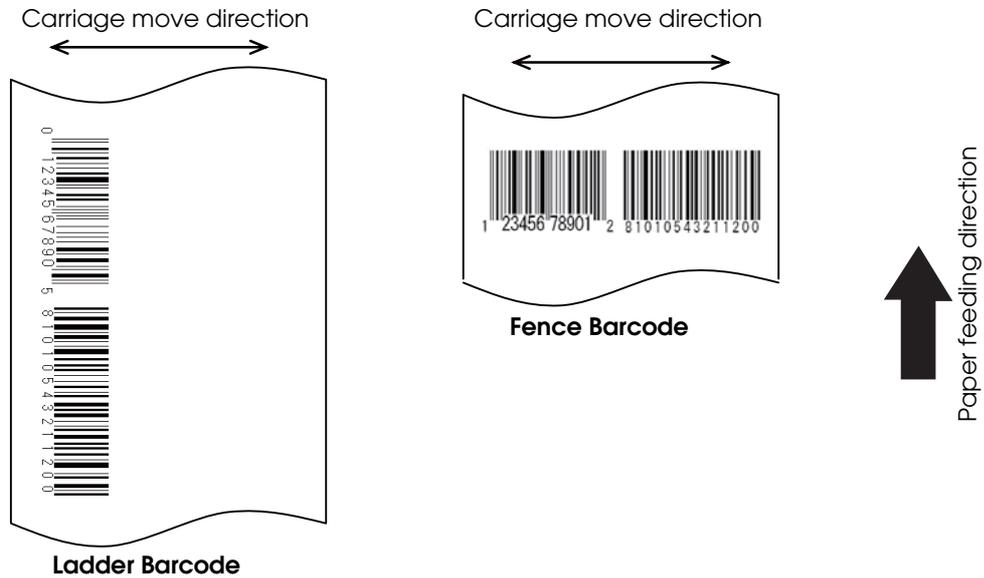
If you want to create graphic data for barcodes/two-dimensional symbols, create data which meet the following conditions.

CAUTION

- Use black as the print color of the barcode on blank paper (not pre-printed).
- When creating barcode/2-dimensional symbol data as the graphic data, use the input resolution in the table below. At other resolutions, the barcode reader may return errors.
- Because of the characteristics of the ink, it may penetrate the paper, and bars of printed barcodes may become thicker. This depends on the paper. Users can maintain the barcode recognition rate by methods such as ± 1 correction, reducing the data in a bar by one pixel and increasing the blank space by one pixel. Be sure not to use this method for the two-dimensional symbols.

Input resolution (horizontal × vertical)	Graphic resolution (horizontal × vertical)
180 × 180 dpi	360 × 180 dpi
360 × 360 dpi	360 × 360 dpi
360 × 360 dpi	720 × 360 dpi

Creating the graphic data for barcode



The following table shows the recommended value.

Paper type	Resolution	Barcode type	Bar width adjustment	Minimum module (by 360 dpi)		
				ANSI Grade D or higher	ANSI Grade C or higher	ANSI Grade B or higher
Plain	360 × 180 dpi	Fence barcode	Available	4 dots	-	-
		Ladder barcode		6 dots		
	360 × 360 dpi	Fence barcode		4 dots		
		Ladder barcode		6 dots		
	720 × 360 dpi	Fence barcode		4 dots		
		Ladder barcode		6 dots		
Light matte coated	360 × 180 dpi	Fence barcode	4 dots			
		Ladder barcode	6 dots			
	360 × 360 dpi	Fence barcode	4 dots			
		Ladder barcode	6 dots			
	720 × 360 dpi	Fence barcode	4 dots			
		Ladder barcode	6 dots			

-: Not supported

Creating the graphic data for two-dimensional symbol (stack type)

The following table shows the recommended value.

Paper type	Resolution	Print status	Minimum module (by 360 dpi)		
			ANSI Grade D or higher	ANSI Grade C or higher	ANSI Grade B or higher
Plain	360 × 180 dpi	No paper feed	6 dots	-	-
		With paper feed			
	360 × 360 dpi	No paper feed			
		With paper feed			
	720 × 360 dpi	No paper feed			
		With paper feed			
Light matte coated	360 × 180 dpi	No paper feed			
		With paper feed			
	360 × 360 dpi	No paper feed			
		With paper feed			
	720 × 360 dpi	No paper feed			
		With paper feed			

-: Not supported

Creating the graphic data for two-dimensional symbol (matrix type)

The following table shows the recommended value.

Paper type	Resolution	Print status	Minimum module (by 360 dpi)		
			ANSI Grade D or higher	ANSI Grade C or higher	ANSI Grade B or higher
Plain	360 × 180 dpi	No paper feed	6 dots	-	-
		With paper feed	8 dots		
	360 × 360 dpi	No paper feed	6 dots		
		With paper feed	8 dots		
	720 × 360 dpi	No paper feed	6 dots		
		With paper feed	8 dots		
Light matte coated	360 × 180 dpi	No paper feed	6 dots		
		With paper feed	8 dots		
	360 × 360 dpi	No paper feed	6 dots		
		With paper feed	8 dots		
	720 × 360 dpi	No paper feed	6 dots		
		With paper feed	8 dots		

-: Not supported

Ink Cartridge

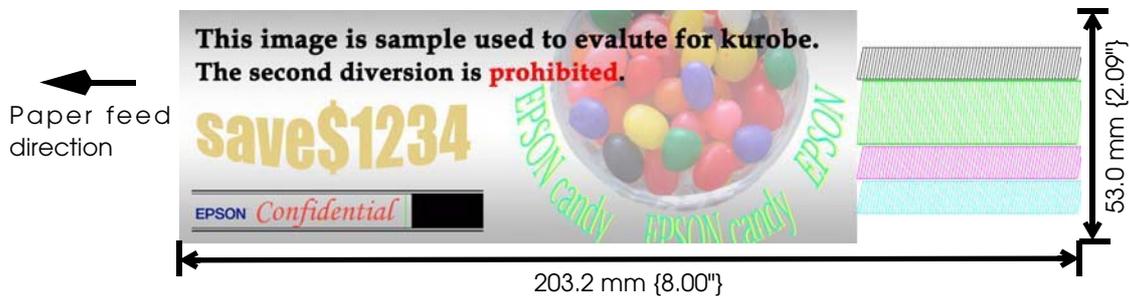
Type	4-color integrated exclusive ink cartridge	
Model number	SJC25P	
Ink color	Cyan, magenta, yellow, black	
Ink type	Pigment ink	
Number of sheets printable	4000 coupons per cartridge (Print area: 53.0 × 203.2 mm {2.09 × 8.00"}, total 803,000 shots, 360 dpi × 180 dpi on plain paper)	
Ink cartridge expiration	6 months after installation in a printer and 2 years after the production date, including a six-month expiration after installation in a printer.	
Storage temperature	Transported in the individual box	-20 to 60°C {-4 to 140°F}
	Stored in the individual box	-20 to 40°C {-4 to 104°F}
	Installed on the printer	-20 to 40°C {-4 to 104°F}

NOTE

- The number of sheets printable is calculated in a case when printing an average of 52 sheets in a 12-hour day (1 sheet per approximately 14 minutes) after replacing the ink cartridge with a new one.
- The number of sheets printable depends on the environment and conditions in use (content to print, print settings, paper type, print frequency, ambient temperature, etc.).

Printable area

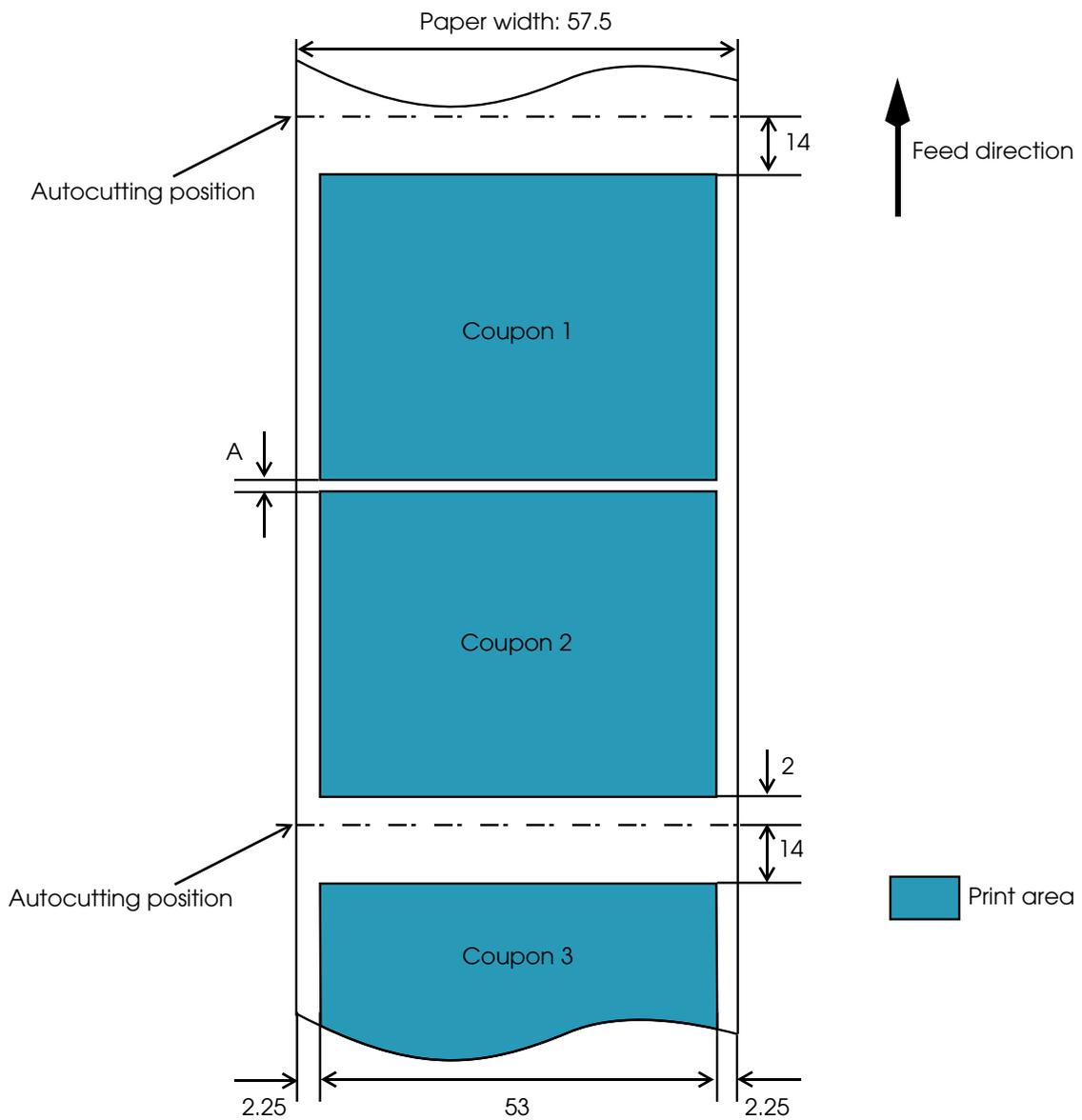
The illustration below shows a sample coupon used to calculate the end of life for the mechanism and the ink cartridge.



Print Area and Cut Positions

The print area and cut positions are shown below.

Resolution of the previous printing	Resolution of the next printing	Minimum top margin A
360 dpi × 180 dpi	360 dpi × 180 dpi	0 mm
360 dpi × 360 dpi	360 dpi × 360 dpi	0.21 mm {0.0083"}
720 dpi × 360 dpi	720 dpi × 360 dpi	0.21 mm {0.0083"}



(The values given are typical values. Units: mm)
The length of each coupon must be 66.8 mm or longer.

Electrical Characteristics

Power supply	Power supplied by dedicated AC adapter	
Input voltage (rated)	AC 100 to 240V	
Frequency (rated)	50/60 Hz	
Power consumption	Operating	Approximately 30 W
	Stand-by	Approximately 3 W

CAUTION

Be sure to use the dedicated AC adapter included in the product package.

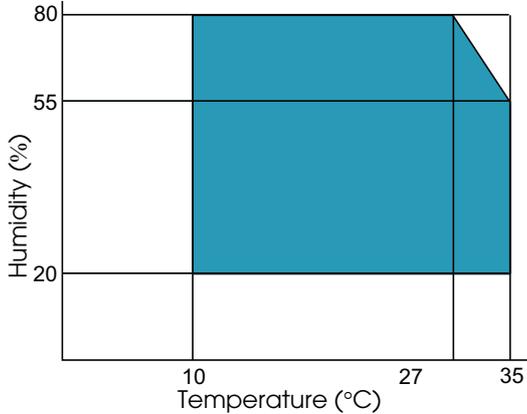
Reliability

Life	Mechanism	4 million passes (Corresponds to 500,000 coupons issued* ¹)
	Print head	6,000 million shots/nozzle (Corresponds to 10,760,000 coupons issued* ¹)
	Autocutter	500,000 cuts
MTBF		Approximately 180,000 hours

*1: When printing the coupon shown on [page 26](#).

Environmental Specifications

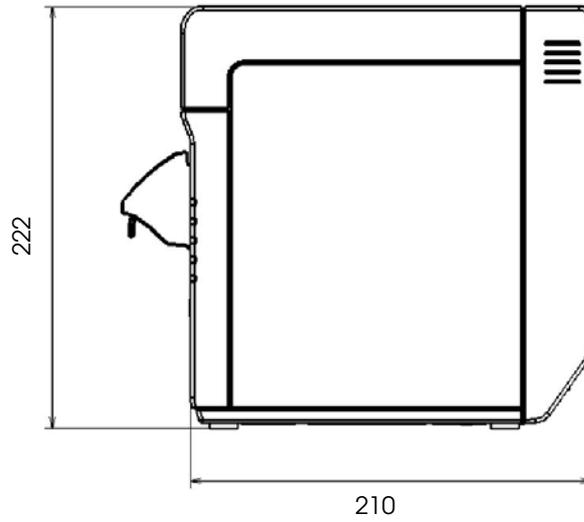
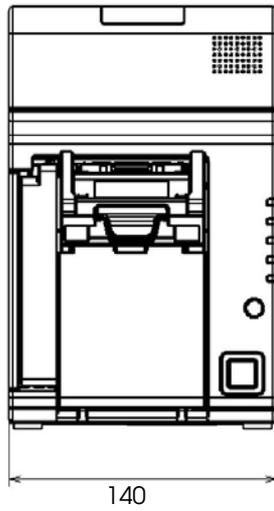
Absolute maximum rated	70°C {150°F}* ¹
Pressure (Operating/not operating)	700 to 1060 hPa (Corresponds to 0 to 2500 m {approximately 0 to 8202'} above sea level)

<p>Temperature/ Printing humidity</p>	<p>10 to 35°C {50 to 95°F}, 20 to 80% RH (no condensation)</p> 
<p>Barcode printing</p>	<p>15 to 35°C {59 to 95°F}, 20 to 80% RH (no condensation)</p>
<p>Storage</p>	<p>When packed: -20 to 60°C {-4 to 140°F}, 5 to 85% RH (no condensation, ink not loaded) (At -20°C or 60°C {-4°F or 140°F}: up to 120 hours)</p> <p>Ink loaded: -20 to 40°C {-4 to 104°F}</p> <p>(At -20°C {-4°F}: up to 120 hours)</p> <p>(At 0 to 30°C {32 to 86°F}: up to 6 months)</p> <p>(At 40°C {104°F}: up to 1 month)</p>

*1: This temperature must NOT be exceeded during operation or storage.

External Dimensions

- Height: 222 mm {8.74"}
- Width: 140 mm {5.51"}
- Depth: 210 mm {8.27"}



(Units: mm)

Precautions

To Handle the Ink Cartridge

- Keep ink cartridges out of the reach of children.
- Do not disassemble or refill the ink cartridge. Spills can result, and tampering with the cartridge may cause a malfunction of the printer.
- Ink can permanently stain clothing.
- Do not strike the ink supply opening. Doing so may cause ink to leak from the cartridge.
- Once you begin using an ink cartridge, there will be a residue of ink around the ink supply opening. Avoid touching the ink supply opening, and be careful where you put the cartridge to avoid getting ink on yourself or something else.
- Do not touch the green circuit board at the upper side of the ink cartridge. Doing so may affect the normal operation of the ink cartridge.
- Do not remove the ink cartridge from the printer, except when replacing it.
- After installing an ink cartridge, use it up within 6 months. Leaving the same ink cartridge in the printer too long may affect the normal operation of that ink cartridge.
- Use the ink cartridge by the expiration date, which is indicated on the box containing the ink cartridge and on the ink cartridge itself.
- The ink in the cartridge may freeze if stored at temperatures under $-20^{\circ}\text{C}\{-4^{\circ}\text{F}\}$, but once thawed at temperatures over $10^{\circ}\text{C}\{50^{\circ}\text{F}\}$, it can be used normally.
- Do not subject the ink cartridge to strong shocks or vibration.
- Ink life differs, depending on printer conditions, such as printing.
- Do not apply benzene, paint thinner, toluene, or ketone-based solvents to the ink cartridge. These solvents may damage the plastic.
- Disposal of the ink cartridge must comply with all relevant national or local laws, ordinances, and regulations.
- Do not transport a partially used ink cartridge. Doing so could result in leaking of ink.

To Prevent Ink Waste

Observe the following precautions to prevent ink waste.

- Do not plug in/pull out the power cable or push the Power button unnecessarily.
- Do not press the Cleaning button unless there is a problem with print quality.

Restrictions

Printer environment

- Drivers for TM printers (APD, OPS/JavaPOS) of Seiko Epson Corporation cannot be used for this printer.
The TM-C710 printer driver can be installed and used on a computer with the APD and OPS/JavaPOS installed.

Installation environment for the printer driver

- When the printer driver is installed using point and print, printing can be performed but the printer status cannot be obtained.
- When setting the printer driver using point and print, setting may be made by accessing the server via a network. Be sure to make the setting with the printer connected.
- When using a shared printer and a local printer on one client computer, install the printer driver for the local printer before installing the printer driver for the shared printer.
- When using this printer in the same environment as a version of the APD earlier than APD 4.03, Install the APD first, and then install the printer driver for this printer.

Install package of the printer driver

- The following settings are not reflected in the install package.
 - [Select the folder] in [Driver Preferences] in the [Driver Utilities] tab.
 - All information in [EPSON Log File Settings] in the [Driver Utilities]
 - Whether or not [Always show current settings.] in the [Current settings] screen is checked

Printing

- For the USB interface model, it takes time for the next printing if you turn the printer off and on after printing.
- The ink cartridge contains 4 colors of ink. Even when one particular color is specified, all 4 colors of ink are used for printing and for keeping the print head in good condition. When the ink level of even one color reaches the lowest limit, the printer stops printing.
- The colors of printouts may become abnormal if you tilt this printer or subject the printer to any shocks. When you move this printer after ink charging, check the colors by performing a test print.

If the colors of printouts are not normal, perform head cleaning. See "[Head Cleaning](#)" on page 96 for how to perform head cleaning.

- When printing image data, white lines (lines shown in white) or black lines (overlapping of image parts) may appear at about 1 inch intervals in the print result. By setting (Print Head Alignment) - (Media Feed Adjustment) in (Maintenance And Utilities) tab, this can be reduced but cannot be removed completely.
- When printing image data, change of color tone may appear at 1 inch intervals in the print result.

Setup

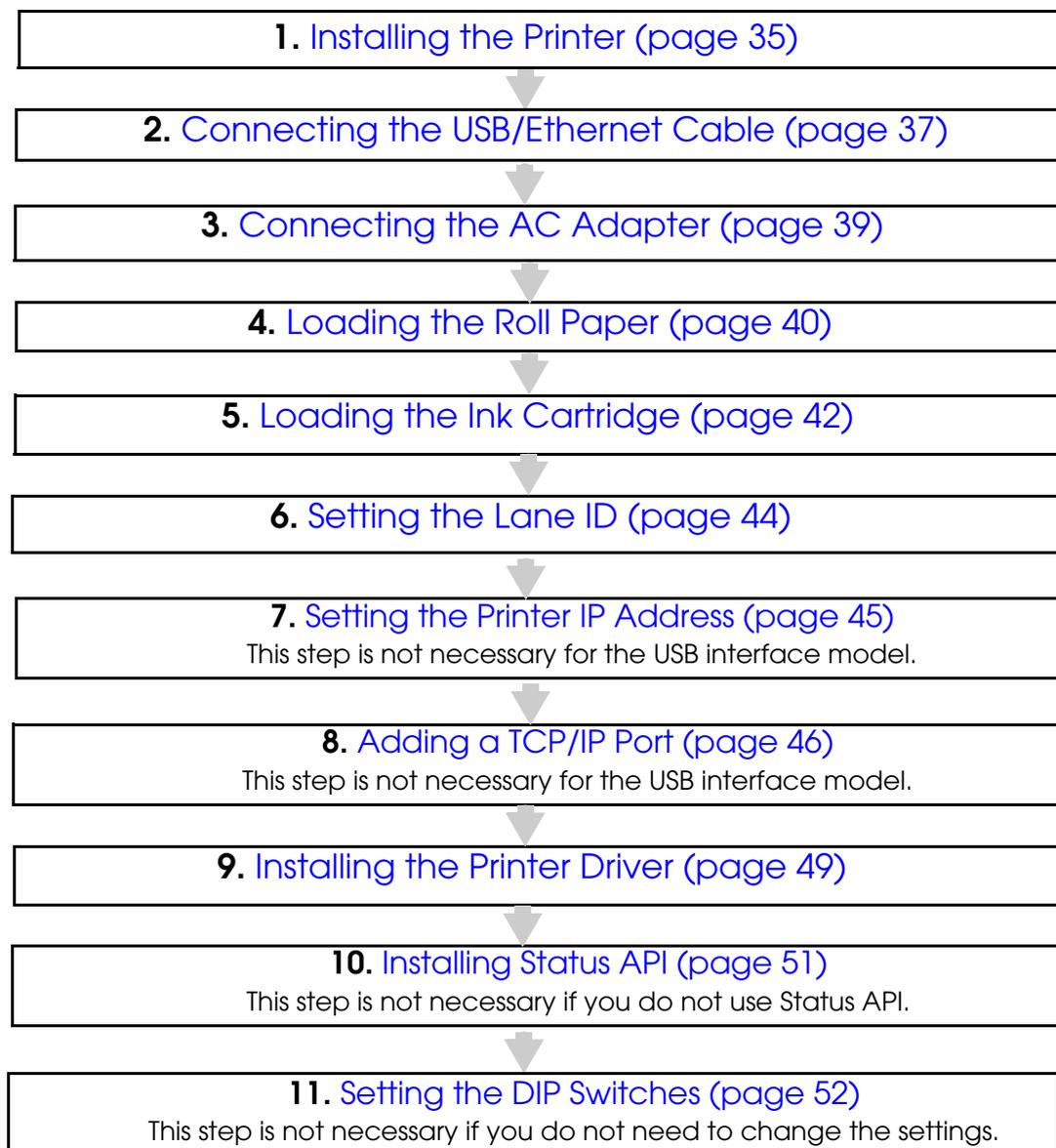
This chapter describes setup and installation of the product.

Flow of Setup

This chapter consists of the following sections along with the setup flow of the product.

CAUTION

Follow the flow of setup in order to prevent ink leakage.



Installing the Printer

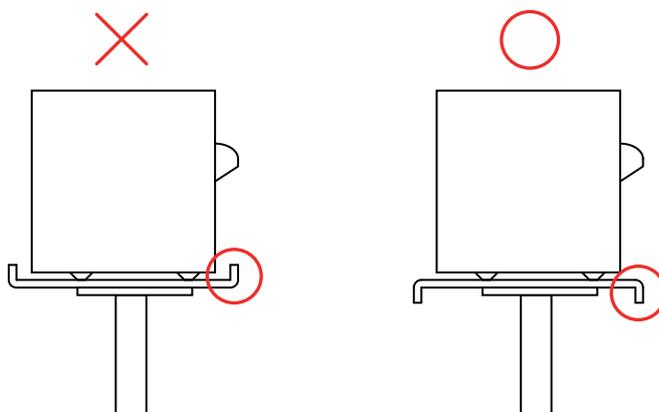
Install the printer in an appropriate location with sufficient space around it.

Important Notes on Installation

CAUTION

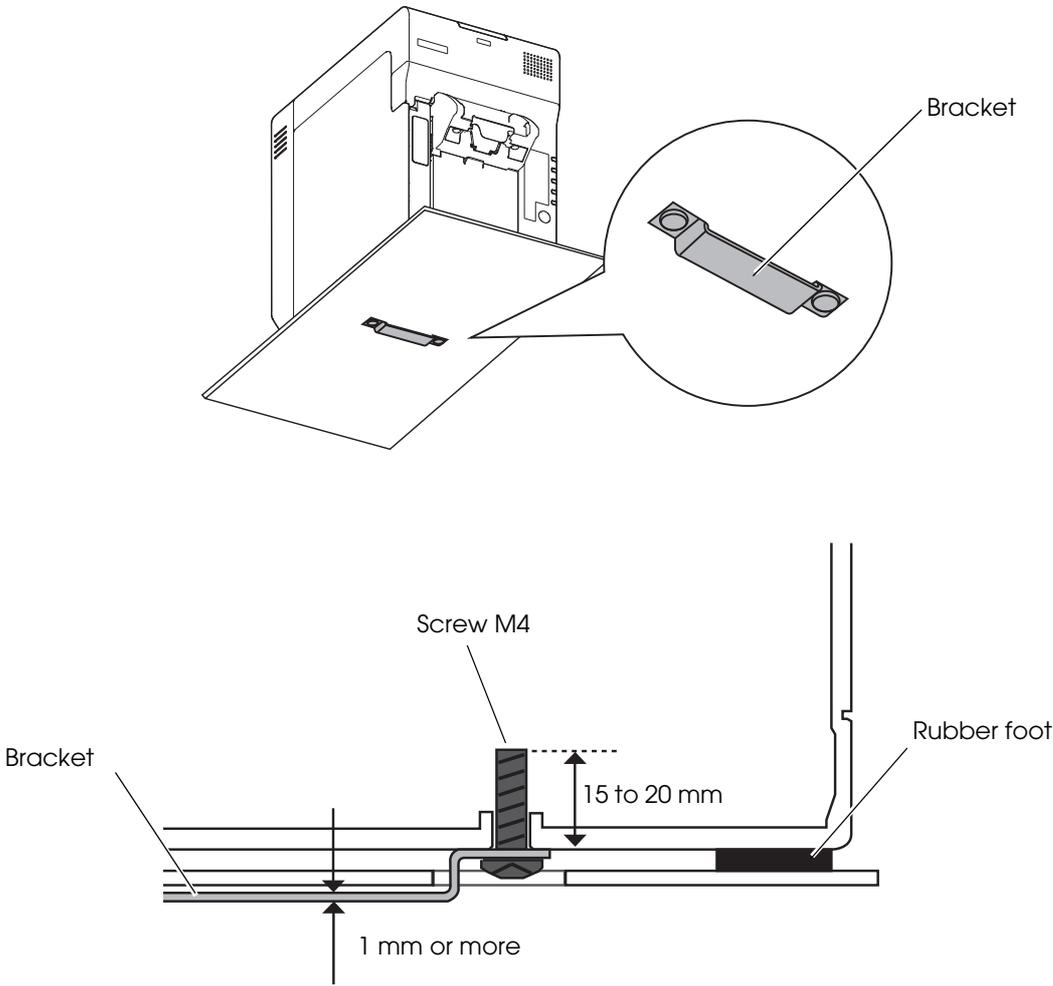
- Do not place the printer in a dusty place.
- Make sure no cables or other objects are caught under the printer.
- Do not put objects heavier than 700 g {1.5 lb} (two paper rolls) on the printer.
- Do not put beverages or vases on the printer.
- Do not tilt the printer during initial ink filling, printing, or head cleaning. Otherwise, ink may leak out of the printer.

- You must place the printer horizontally (back to front: $\pm 10^\circ$, right to left: $\pm 10^\circ$).
- Place the printer where the roll paper cover can open fully and the ink cartridge can be ejected, and be careful not to place an obstacle in front of the printer, especially when you install the printer on a mounting table.



- Be sure to avoid bumping the printer so that it is not exposed to strong impact during operation.

To prevent the printer from falling, use a bracket as shown below to secure the printer.



Connecting the USB/Ethernet Cable

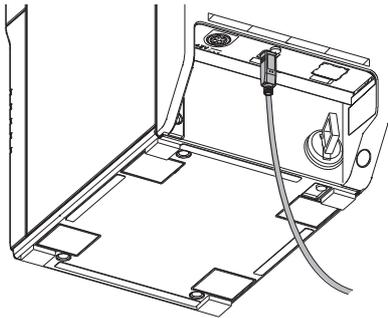
For the USB interface model, connect the USB cable, for the Ethernet interface model, connect the Ethernet cable to the printer.

CAUTION

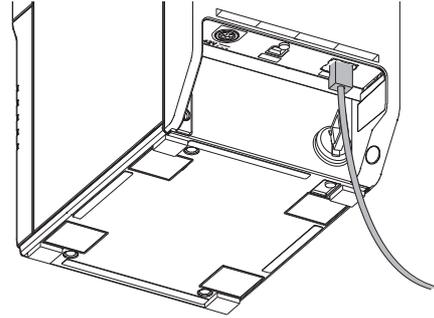
- Direct connection to an aerial LAN cable located outside may cause induced lightning to damage devices. When you use such cables, connect via devices that protect against surges.
- Do not plug an ordinary telephone line into the Ethernet connector.

- 1 Make sure the power is turned off for both the printer and the host computer.
- 2 For the USB interface model, connect the USB cable to the connector. For the Ethernet interface model, connect the Ethernet cable to the connector until it clicks.

USB interface model

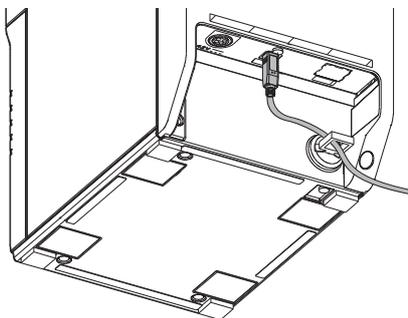


Ethernet interface model

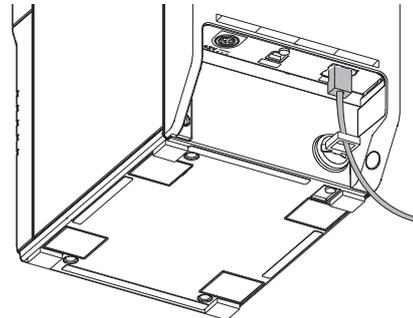


- 3 Secure the cable with the hook.

USB interface model



Ethernet interface model



-
- 4** For the USB interface model, connect the other side of the USB cable to a host computer. For the Ethernet interface model, connect the other side of the Ethernet cable to a network hub.

Connecting the AC Adapter

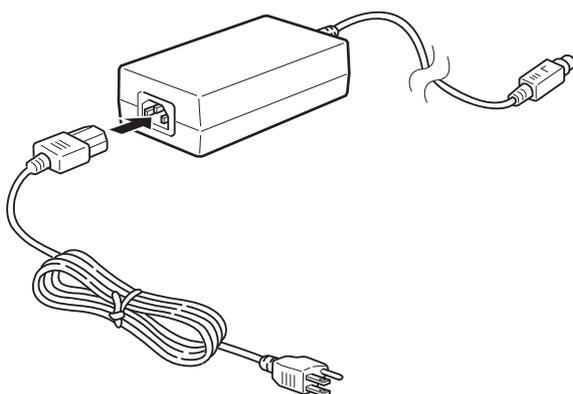


WARNING

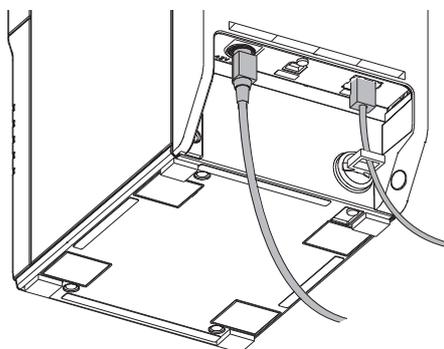
- **Always use the included AC adapter.**
Using a nonstandard power supply can result in electric shock or fire.
- **Should a fault ever occur in the AC adapter, immediately turn off the power to the printer and remove the AC cable from the outlet.**
- **Unplug the power cable of the AC adapter from the outlet before you plug/unplug the AC adapter into the printer.**
- **Make sure the wall socket power supply satisfies the rated voltage requirements of the AC adapter. Never insert the AC cable into a socket that does not meet the rated voltage requirements of the AC adapter.**
Doing so may result in damage to both the AC adapter and the printer.

Follow the steps below to connect the AC adapter.

- 1 Plug the accessory AC cable into the accessory AC adapter.



- 2 Plug the DC cable of the AC adapter into the printer's power connector (stamped "42V").



- 3 Plug the AC cable into the outlet.

Loading the Roll Paper

Follow the steps below to load the roll paper.

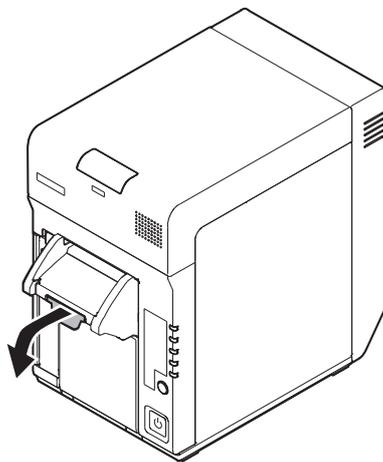
CAUTION

Do not touch the autocutter blade when you open the roll paper cover.
Otherwise, you may be injured.

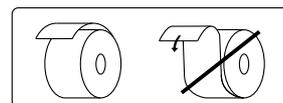
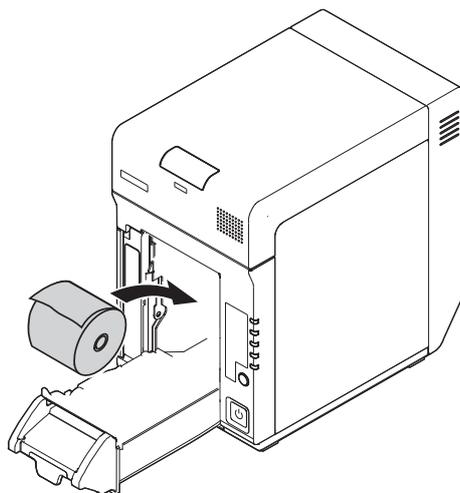
- 1 Turn the power on.
Make sure the Power LED is on.
- 2 Pull the release lever to the front to open the roll paper cover.

CAUTION

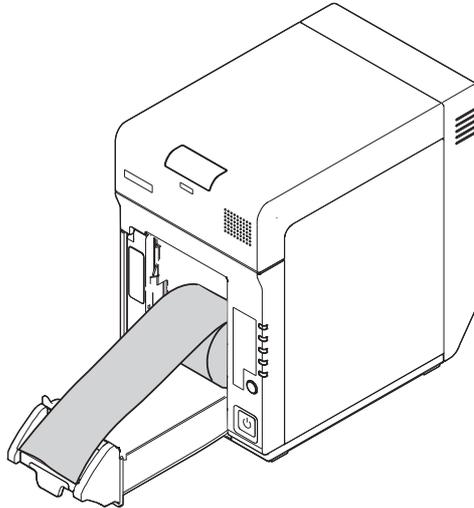
- Do not touch the release lever during printing, paper feeding, or cleaning.
- Do not touch the gears on the roll paper cover when you open it.



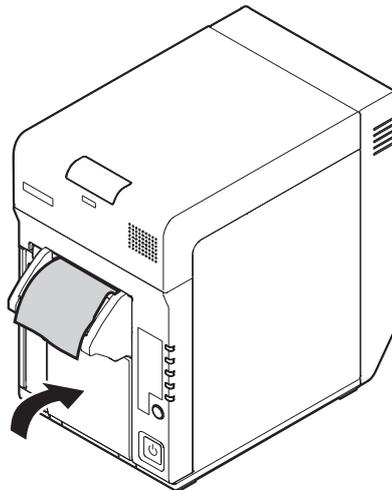
- 3 Load the roll paper in the orientation shown below.



- 4** Pull out the paper end to the paper exit, and then close the roll paper cover.



- 5** When the roll paper cover is closed, roll paper is automatically fed about 10 cm {3.9"}, and then autocutting is performed.

**NOTE**

After loading the roll paper, head cleaning may start automatically. Wait for cleaning to be completed.

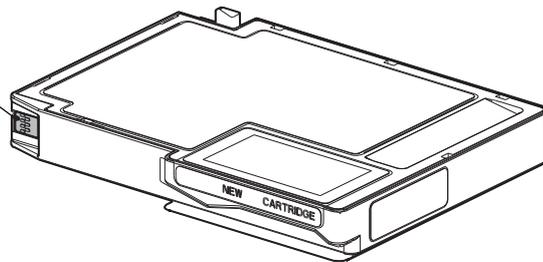
Loading the Ink Cartridge

Follow the steps below to load the ink cartridge.

CAUTION

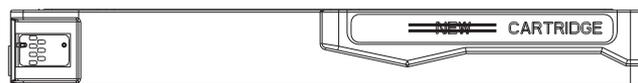
- When you start to use the printer, it takes about 4 minutes for initial ink filling. Never open the covers, press the Power button, or turn the printer off during initial ink filling (while the Power LED is flashing). Otherwise, initial ink filling will be performed again from the beginning. This wastes ink.
- Do not tilt the printer during initial ink filling. Otherwise, ink may leak out of the printer.
- Do not touch the inside of the ink cartridge slot. Doing so may cause ink adhesion or printer malfunction.
- Use only the ink cartridge specified by Seiko Epson, SJIC25P. Operation with another ink cartridge is not guaranteed.
- Do not touch the green circuit board at the side of the ink cartridge. Doing so may affect the normal operation of the ink cartridge.

Green circuit board

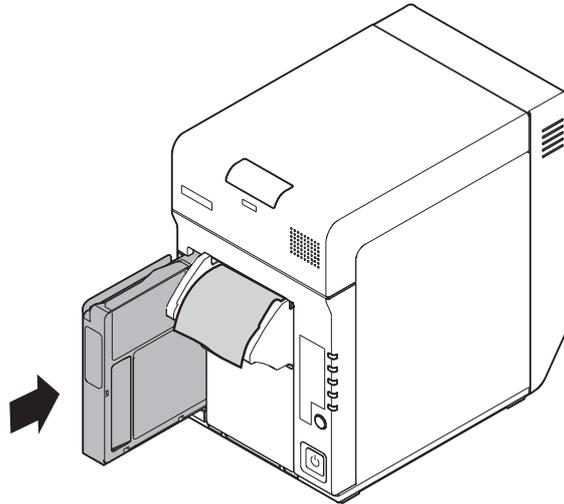


NOTE

- When install the ink cartridge for the first time, use the STARTER CARTRIDGE included with the printer.
- When using the product for the first time, ink filling also uses up some ink to make the product ready for printing.
- An ink cartridge has 4 different colors. Even when one specific color is specified for printing, ink of all colors is spent in printing and operations to maintain the print head in a good condition. If remaining ink of any of the ink cartridge reaches its lower limit amount, the printer stops printing.
- Since ink cartridges are designed to stop the operation before ink runs out completely to maintain the quality of the print head, some ink remains in the used ink cartridge.
- The used cartridge has a red line drawn through its label on the top.



- 1** Turn the power on.
Make sure that the Power LED is on.
- 2** Insert the ink cartridge arrow-side-up into the ink cartridge slot until it stops.



When the ink cartridge is installed for the first time, the  (Power) LED starts flashing, and ink charging starts. When ink charging finishes, the  (Power) LED stays on (not flashing).

Setting the Lane ID

You can set the printer lane ID manually or through the printer driver.

Follow the steps below to set the lane ID manually. When the lane ID is set manually, the value of the bottom byte in the IP address is automatically set to the same as the value of the set lane ID.

- 1 Push the Lane setting button for at least 5 seconds when the printer is in the idle mode.

The printer prints the following message and enters the lane ID setting mode.

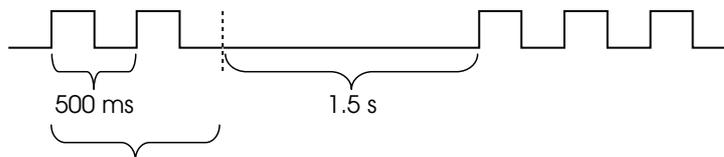
Lane ID Mode Started
Current ID: xxx

- 2 Set the third digit of the lane ID assuming decimal expression by pushing the Self-test button.

Assuming the initial setting value to be 0, the value increases by 1 in the following progression each time the Self-test button is pushed.

0 → 1 → 2 → 3 → 4 → 5 → 6 → 7 → 8 → 9 → 0

The following Paper Jam LED pattern enables you to confirm the selected value.



Repeats flashing as many times as the set value

- 3 Push the Lane setting button to fix the setting.
The printer moves on to the setting mode for the next digit.
- 4 Repeat steps 2 and 3 for the second and then the first digit.
After the first digit is set, the printer prints the following message.

Lane ID is xxx
Press the Lane button to confirm
Press the SelfTest button to cancel

NOTE

If the set lane ID is out of the range of 1-254, the following message is printed. The printer discards the set value and ends the lane ID setting mode.

Lane ID Mode Cancel
ID Range error
ID xxx

- 5** If the printed lane ID is correct, push the Lane setting button.
The printer stores the set lane ID and the IP address and ends the lane ID setting mode.

NOTE

- Push the Self-test button to cancel the set lane ID. Then the printer ends the lane ID mode.
- If 30 seconds or more elapses without any operations while the printer waits for user operation in the lane ID setting mode, the printer discards the set value and ends the lane ID setting mode.

Setting the Printer IP Address

This setting is necessary only for the Ethernet interface model.

Connect the printer to the network via a hub using the Ethernet cable.

Set an IP address to the printer with EpsonNet Config.

You can download EpsonNet Config from the following URL.

<http://download.epson-biz.com/?service=pos>



- **When Ethernet cables are installed outdoors, make sure devices without proper surge protection are cushioned by being connected through devices that do have surge protection.** Otherwise, the devices can be damaged by lightning.
- **Do not plug an ordinary telephone line into the Ethernet connector.**

CAUTION

Make sure the Ethernet cable is connected to the printer, and the printer is turned on.

Adding a TCP/IP Port

This procedure is necessary only for Ethernet model, and unnecessary for the USB interface model.

Follow the steps below to add a TCP/IP Port.

CAUTION

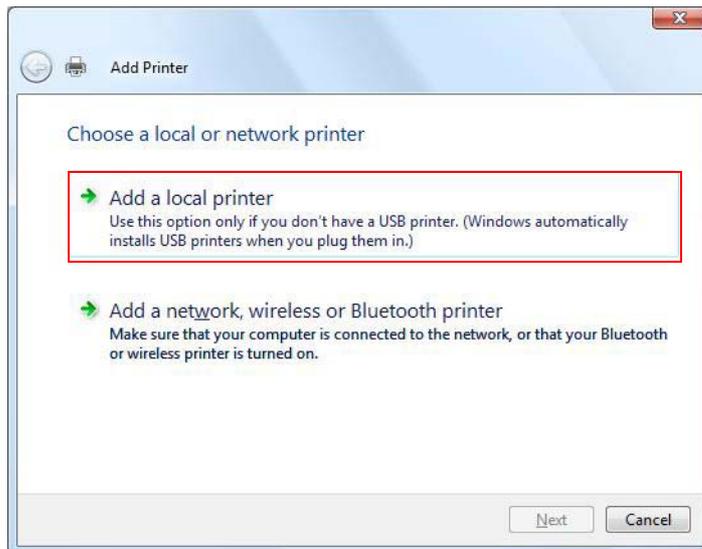
Make sure the Ethernet cable is connected to the printer, and the printer is turned on.

- 1 Select **(Start)** - **(Control Panel)** - **(Printer)** on the computer.

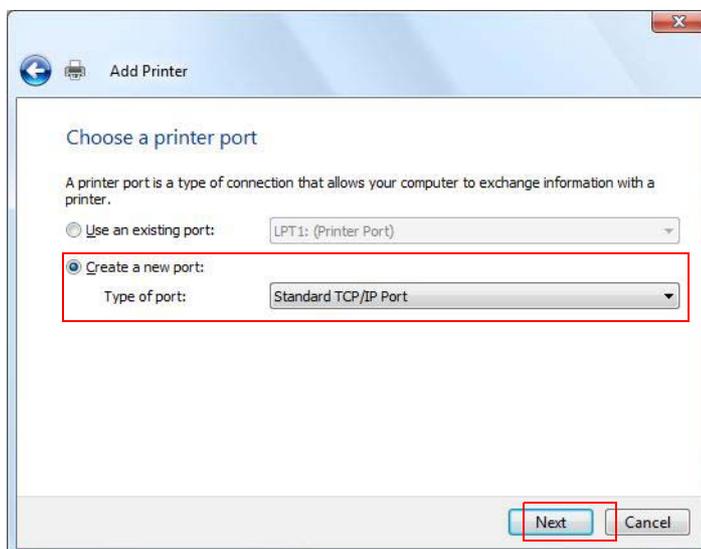
NOTE

Menus to select are different for each OS.

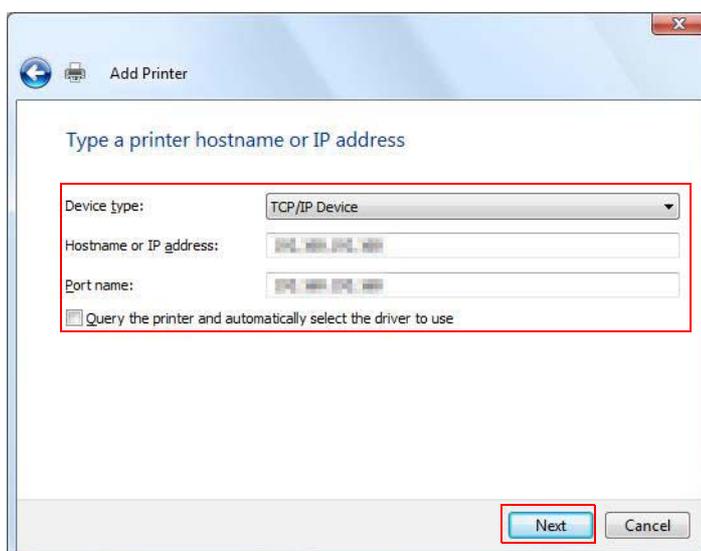
- 2 Select **(File)** - **(Add Printer)** from the menu.
- 3 Select **(Add a local printer)**.



- 4 Select **(Create a new port:)**, select **(Standard TCP/IP Port)** in “**Type of port,**” and click **(Next)**.

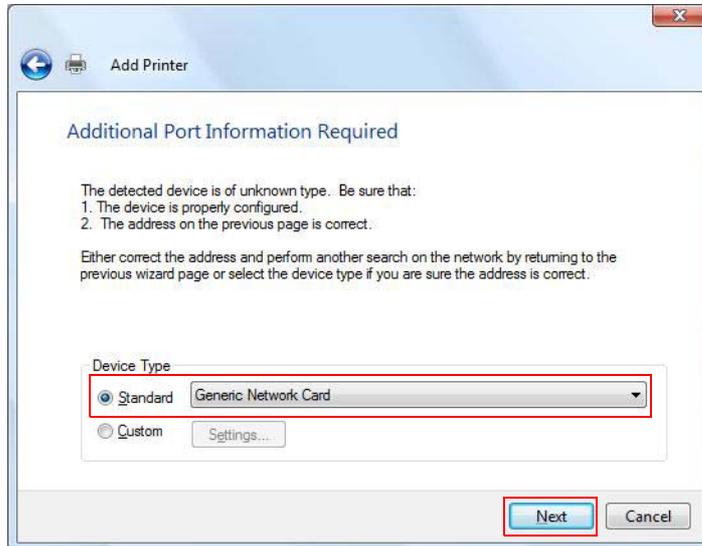


- 5 Set the items by referring to the table below, and click **(Next)**.

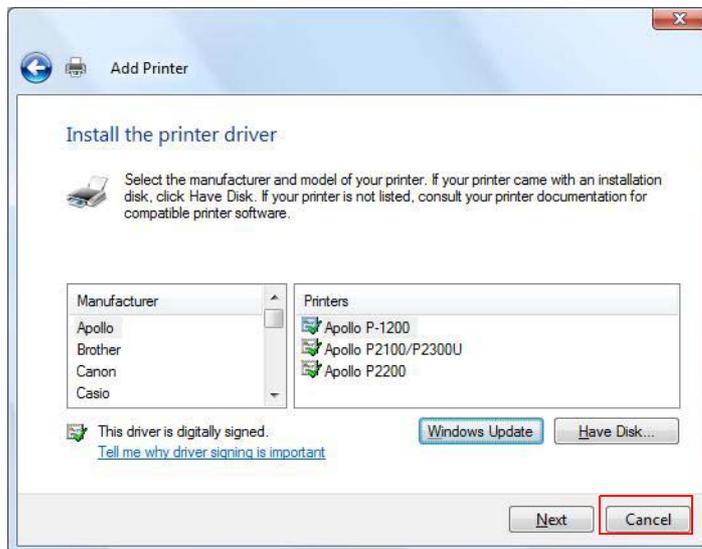


Item	Setting value
Device type	TCP/IP Device
Hostname or IP address	IP address set for the printer
Port name	Setting values in “Hostname or IP address” are automatically input.
Query the printer and automatically select the driver to use	Uncheck the checkbox.

- 6 Select **(Standard)**, and **(Generic Network Card)** in “**Device Type**.” Then click **(Next)**.



- 7 Click **(Cancel)**.
Do not install the printer driver in this step.



The addition of the TCP/IP port is completed.

Installing the Printer Driver

You can download Printer Driver for TM-C710 from the following URL.

<http://download.epson-biz.com/?service=pos>

The installation procedure is different between the USB interface model and the Ethernet interface model.

CAUTION

- Make sure to log on as an administrator to install the printer driver.
- Before installing, check the hardware requirements. (See ["Operating Environment"](#) on page 21.)

For USB Interface Model

Follow the steps below to install the printer driver.

- 1 Connect the printer to the computer.

CAUTION

Turn off the printer before installing. You need to turn it on during installation by following the instructions.

- 2 For a 32bit OS, double-click the icon "c71d32_xxxx.exe."
For a 64bit OS, double-click the icon "c71d64_xxxx.exe."
- 3 If the "User Account Control" screen is displayed, click **(OK)**.
- 4 Select **(EPSON TM-C710)**, and click **(OK)**.
- 5 Complete the installation by following the instructions displayed.

NOTE

- To display the printer driver, follow the steps below.
 1. Click [Start] - [Control Panel] - [Printer] (or [Printers or Faxes]).
 2. Right-click on [EPSON TM-C710] and click [Printing Preferences].
- For details on how to use the printer driver, see the printer driver help or ["How to Use the Printer Driver"](#) on page 61.

For Ethernet Interface Model

Before installing the printer driver, set an IP address to the printer, and add a TCP/IP port. (See "[Setting the Printer IP Address](#)" on page 45 and "[Adding a TCP/IP Port](#)" on page 46.)

CAUTION

- The printer driver for the Ethernet interface model cannot be installed with a USB interface model printer connected. In this case, turn off the USB interface model printer before installing the printer driver for the Ethernet interface model.
- Make sure the Ethernet cable is connected to the printer, and the printer is turned on.

Follow the steps below to install the printer driver.

- 1** For a 32bit OS, double-click the icon "c71d32_xxxx.exe."
For a 64bit OS, double-click the icon "c71d64_xxxx.exe."
- 2** If the "User Account Control" screen is displayed, click **(OK)**.
- 3** Select **(EPSON TM-C710)**, and click **(OK)**.
- 4** Complete the installation by following the instructions displayed.

NOTE

- To display the printer driver, follow the steps below.
 1. Click [Start] - [Control Panel] - [Printer] (or [Printers or Faxes]).
 2. Right-click on [EPSON TM-C710] and click [Printing Preferences].
- For details on how to use the printer driver, see the printer driver help or "[How to Use the Printer Driver](#)" on page 61.

Installing Status API

If you want to use Status API, install Status API after installing the printer driver. Programming Status API enables you to acquire the printer status with your application. The Status API and the sample programs are provided as the Epson TM-C710 SDK. You can download it from the following URL.

<http://download.epson-biz.com/?service=pos>

CAUTION

Install the printer driver before installing Status API. ("Installing the Printer Driver" on page 49.)

NOTE

To install it without displaying the window, add the command (/s /v"/qn") to the install file name for Status API.

e.g: c71sapi_xx.exe /s /v"/qn"

Follow the steps below to install Status API.

- 1 Double-click the icon "c71sapi_xx.exe."
- 2 The "EPSON TM-C710 StatusAPI - InstallShield Wizard" screen is displayed. Click **(Next)**.
- 3 Complete the installation by following the instructions displayed.

Setting the DIP Switches

Follow the steps below to change the DIP switch settings.



Turn the power off before removing the cover.

Otherwise, a short-circuit may cause the printer to malfunction.

CAUTION

DIP switch setting becomes enabled after turning the power on or completing reset by the interface.

- 1** Make sure that the printer is turned off.
- 2** Unscrew the screws to remove the rear cover.
The DIP switches are on the right side of the printer.



- 3** Set the DIP switches, using the tip of a tool, such as a small screwdriver.
- 4** Attach the rear cover.
For the DIP switch settings, see ["DIP Switches" on page 19](#).

Application Development Information

This chapter describes how to control the printer and gives information useful for printer application development.

Overview

The following is provided for use of this printer.

- ❑ A dedicated printer driver for Windows is available. For details on how to use the printer driver, see the printer driver help or "[How to Use the Printer Driver](#)" on page 61.
- ❑ A Status API that can be used with your applications is available.
- ❑ Various utilities and user's manuals are available.
- ❑ Dedicated sample programs for the TM-C710 are available.
Use them as a reference for developing applications.

CAUTION

This printer cannot use the APD or OPOS/JavaPOS provided by Epson.

Printer Driver

The printer driver has the following functions, so it is not necessary to implement them in applications.

- ❑ Barcode and 2D symbol fonts are implemented. The barcode and 2D symbol fonts can be printed using the font replacement function for .NET environment.
The barcode and 2D symbol font must be set in advance in the printer driver to use this function. (See "[Barcode Printing](#)" on page 69 and "[2D Symbol Printing](#)" on page 78 for details of how to make the setting.)
In the .NET environment, a TrueType font is specified to be replaced by barcode and 2D symbol fonts. The barcodes and 2D symbols can be printed by specifying a replaced TrueType font from the application. (See "[Barcode and 2D Symbol Font Printing on .NET Environment](#)" on page 83 for details about the font replacement function.)

Status API

With Status API, you can transmit the printer status (such as printer and ink cartridge status and print job information) to your applications, and can set the buzzer to beep when an error such as a cover open occurs.

(Header files and assembly files for .Net are included in the sample programs.)

Sample Program

Refer to the TM-C710 sample programs to develop the application using this printer.

□ Features of TM-C710 sample programs

- Programs are provided in the step-up method from the basic ones to the advanced ones. This helps you to learn how to control the printer.
- Program files are provided in the exe format and the source format.
- Header files and assembly files for .Net are provided.
(The assembly files for .Net are necessary to build a Status API-based application in the .Net environment.)
- Development environment: Visual Studio 2005/Visual Studio 6.0
- Development language: C++, VB.NET, C# (C# is not provided for some programs.)

□ Structure of TM-C710 sample programs

The following is the structure and language used for TM-C710 sample program.

Level	Program name	Specification	Language		
			C++	C#	VB.NET
Basic	Step 1. Printing characters	Basic print program	√	—	√
	Step 2. Printing barcodes	Sets barcode font in advance to use for print program.	√	—	√
	Step 3. Printing graphics	The program to print graphics	√	√	√
	Step 4. Confirming the printer status	Checks the printer condition before printing and executes error handling.	√	—	√

Level	Program name	Specification	Language		
			C++	C#	VB.NET
Basic	Step 5. Call-back process	When the condition of the printer changes, the printer can cause actions to occur in the application, and executes error handling.	√	—	√
	Complete basic features	The program from Step 1 to 5	√	√	√
Advanced	Monitoring the printer status and controlling print jobs	Cancels a print job when a paper end is detected.	√	—	√
	DEVMODE	Executes a 90-degree rotation or changes the number of copies in the application.	√	—	√
		Changes the number of copies in the application.	√	—	√
	Obtaining the print completion	Acquires the print completion.	√	√	√

Software

Various utilities are provided to system administrators and application developers.

Printer Driver

Software	Package	Explanation
Printer driver for Windows	Printer Driver for TM-C710	32 bit version and 64 bit version are available.

Administering network printers

Software	Package	Explanation
EpsonNet Config	EpsonNet Config (for Windows OS)	The user can set/check the network printer. Settings can be applied simultaneously to multiple printers.

Developing applications

Software	Package	Explanation
Status API	Epson TM-C710 SDK	Transmits the printer information (such as status of the printer and the ink cartridge, and print job information), and sets the buzzer to beep when an error occurs. Status API Reference Guide is included in the package.
Sample Program		Sample programs for using the TM-C710. (VB.NET and C++ for all programs. C# for some programs.) Header files and assembly files for .Net are included in the sample programs. (The assembly files for .Net are necessary to build a Status API based application in the .Net environment.)

You can download the above software from the following URL.

<http://download.epson-biz.com/?service=pos>

Handling

This chapter describes basic handling of the printer.

Replacing the Ink Cartridge

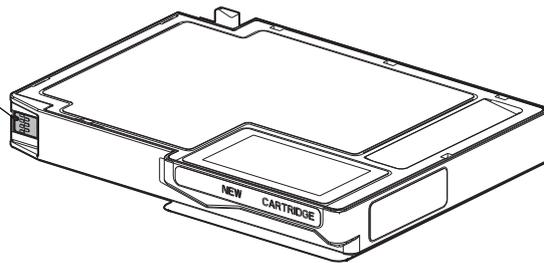
Printing is not possible if any of the four color inks needs replacement.

When the Replace Ink LED lights, the ink cartridge needs to be replaced. Follow the steps below to replace the ink cartridge.

CAUTION

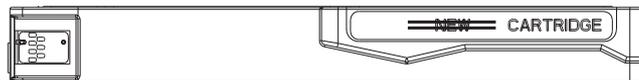
- Do not touch the inside of the ink cartridge slot. Doing so may cause ink adhesion or printer malfunction.
- Use only the ink cartridge specified by Seiko Epson, SJIC25P. Operation with another ink cartridge is not guaranteed.
- Do not touch the green circuit board at the side of the ink cartridge. Doing so may affect the normal operation of the ink cartridge.

Green circuit board



NOTE

- When the time to replace the ink cartridge has come, the ink cartridge is automatically ejected.
- An ink cartridge has 4 different colors. Even when one specific color is specified for printing, ink of all colors is spent in printing and operations to maintain the print head in a good condition. If remaining ink of any of the ink cartridge reaches its lower limit amount, the printer stops printing.
- Since ink cartridges are designed to stop the operation before ink runs out completely to maintain the quality of the print head, some ink remains in the used ink cartridge.
- The used cartridge has a red line drawn through its label on the top.



- 1** Turn the power on.
Make sure the Power LED is on.
- 2** Pull out the used ink cartridge to remove it.
- 3** Insert the new ink cartridge arrow-side-up into the ink cartridge slot until it stops.
When the ink replacement is finished, the Replace Ink LED goes out and the printer is ready for normal printing.

Replacing the Roll Paper

When the roll paper is out, the Check Paper LED and the Error LED light.

Follow the steps below to replace the roll paper.

CAUTION

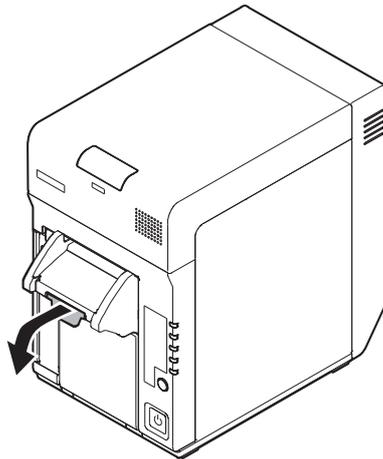
Do not touch the autocutter blade when you open the roll paper cover.

Otherwise, you may be injured.

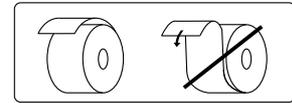
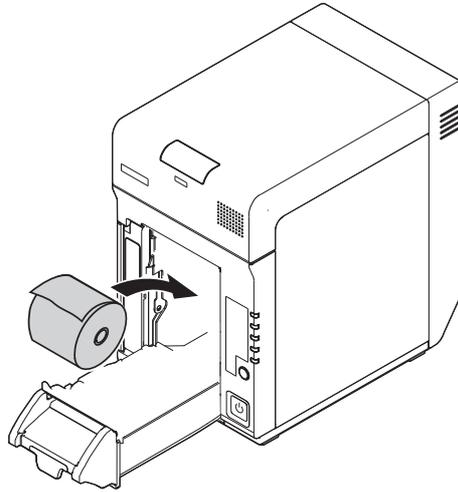
- 1** Turn the power on.
Make sure the Power LED is on.
- 2** Pull the release lever to the front to open the roll paper cover.

CAUTION

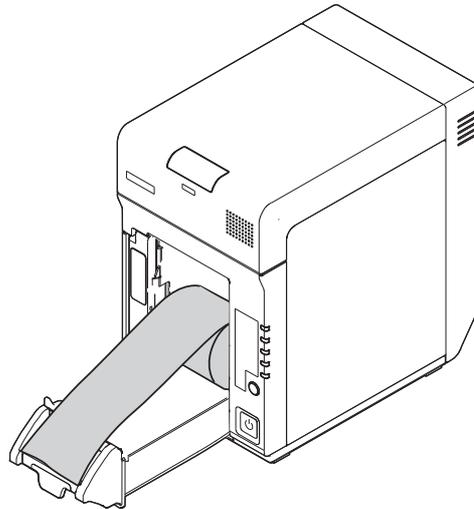
- Do not touch the release lever during printing, paper feeding, or cleaning.
- Do not touch the gears on the roll paper cover when you open it.



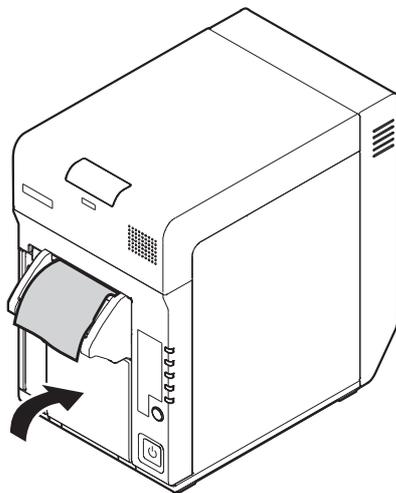
- 3** Remove the used roll paper core, if any.
- 4** Load the roll paper in the orientation shown below.



- 5** Pull out the paper end to the paper exit, and then close the roll paper cover.



- 6 When the roll paper cover is closed, roll paper is automatically fed about 10 cm {3.9"}, and then autocutting is performed.



NOTE

After loading the roll paper, head cleaning may start automatically. Wait for cleaning to be completed.

Removing Jammed Paper

When a roll paper jam occurs, the printer automatically goes offline, and the Paper Jam LED lights. Open the roll paper cover, and remove the jammed paper. When you remove the jammed paper, never pull out the paper forcibly.

When roll paper is reloaded and roll paper cover is closed, the printer returns to online and the printable state. For loading the roll paper, see "[Loading the Roll Paper](#)" on page 40.

How to Use the Printer Driver

The printer driver allows you to change the print settings and also provides some utilities such as checking the printer status and cleaning the print head.

How to Display the Printer Driver

- 1 Select **(Start)** - **(Control Panel)** - **(Printer)** on the computer.

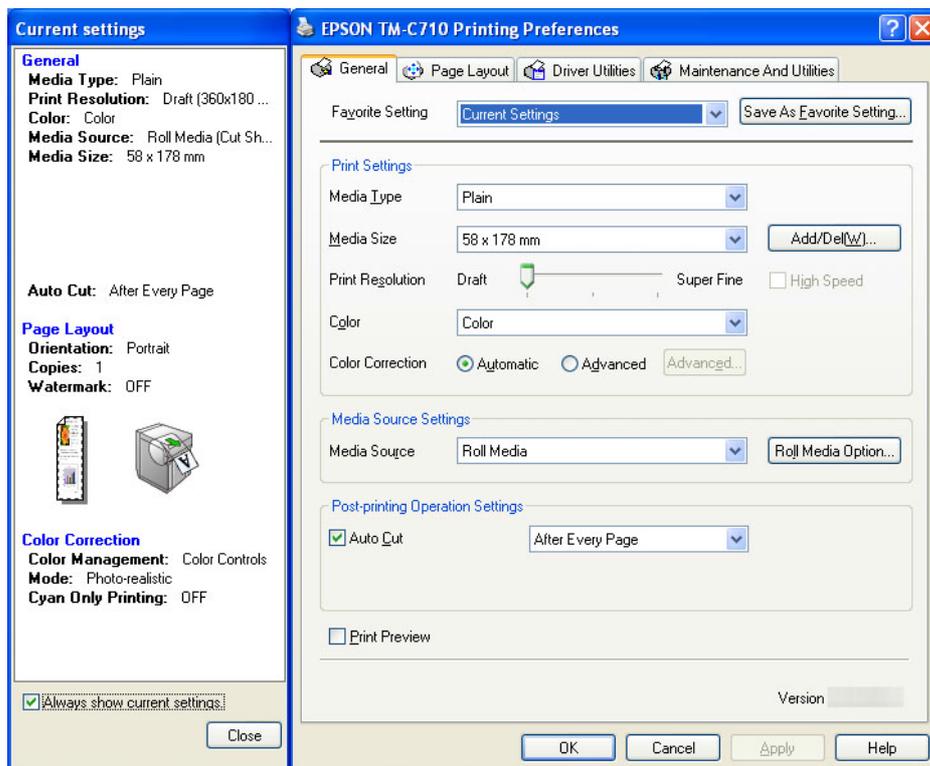
NOTE

Menus to select are different in each OS.

- 2 Right-click **(EPSON TM-C710)**, and click **(Printing References)**.
The printer driver screen is displayed.

NOTE

The above icon name is displayed when the printer's name registered as [EPSON TM-C710].



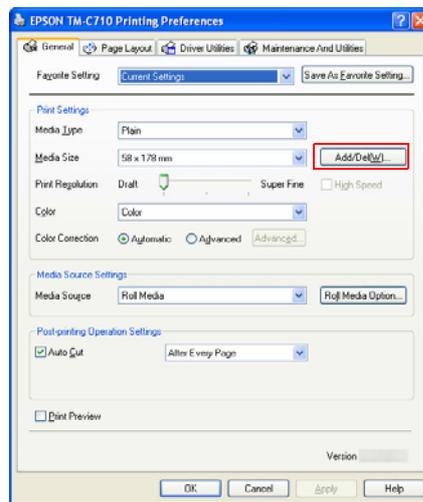
Registering User Defined Media

If the paper size to use is not in [Media Layout], register user defined media.

The registered layout will be stored in [Favorite Setting] to use from user applications.

Registering User Defined Media

- 1 Click **(Add/Del)** of **(Media Size)** on the **(General)** tab.

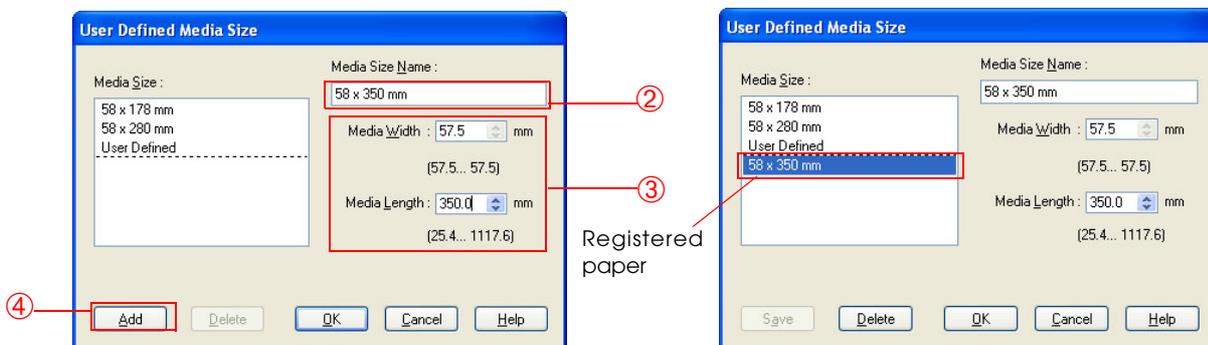


- 2 Enter **(Media Size Name)** on the displayed **(User Defined Media Size)** screen.

This is registered as a user defined media name.

- 3 Enter the size of the paper.

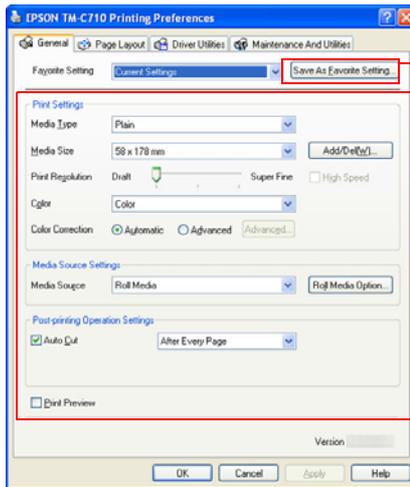
- 4 Click **(Add)**. The user defined media will be registered and displayed in the list of **(Media Size)**.



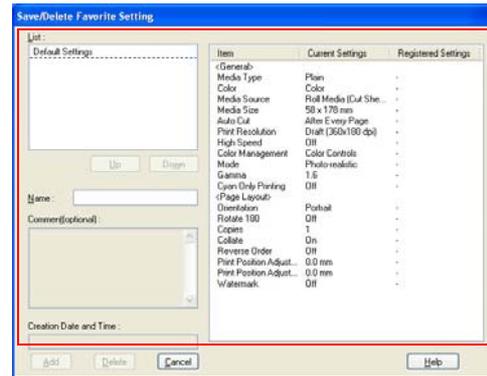
Favorite Setting

[Favorite Setting] is the function to administer several printer driver settings into one. The settings from the (General) and (Page Layout) tabs such as Media Type, Media Layout (including User Defined Media) are included.

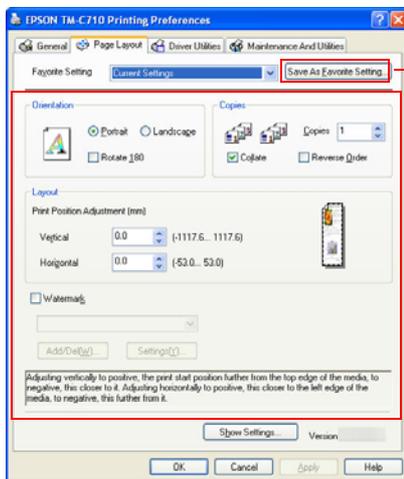
(General) tab



Favorite setting



(Page Layout) tab

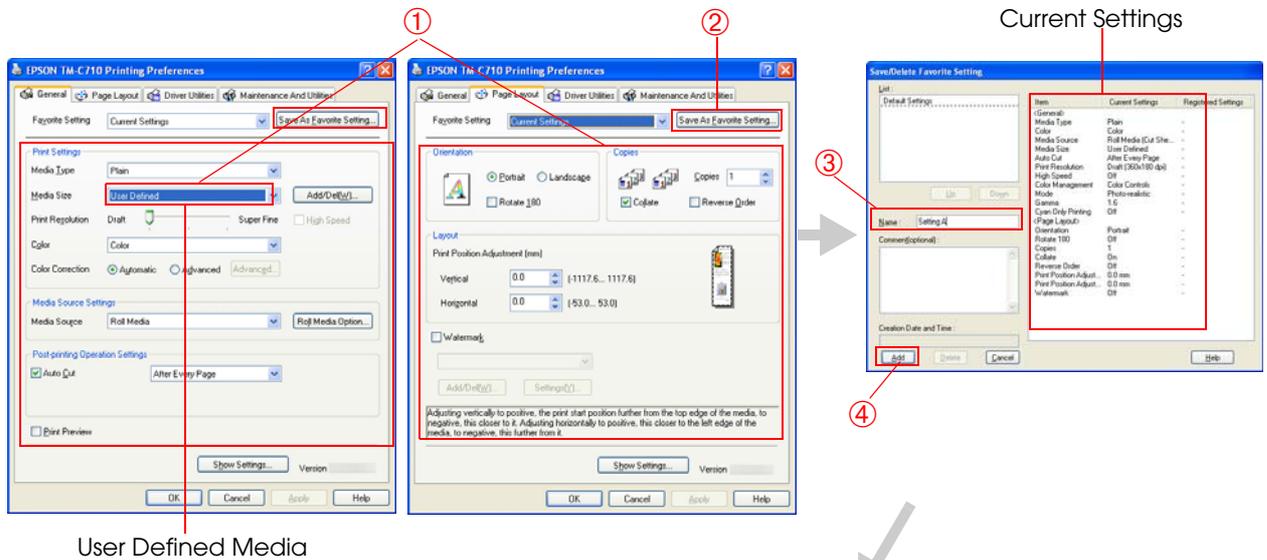


Features

- When printing from your application, the print setting registered in [Favorite Setting] can be selected as the default setting.
It is recommended to register the setting in favorite setting after executing print setting by clicking (Save As Favorite Setting).
- A number of settings can be registered in (Favorite Setting).
For example, if the print setting is registered in (Favorite Setting) for each defined-size coupon, the print setting can be completed by changing (Favorite Setting) when the coupon is changed. This prevents an error of setting change when changing the paper length.

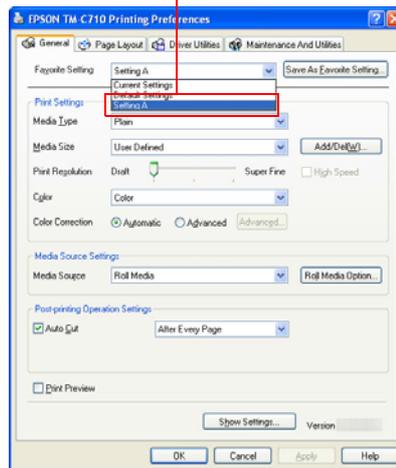
Registering print setting in (Favorite Setting)

- 1** Set the printer driver depending on paper to print.
Set settings on **(General)** and **(Page Layout)** tab. To set the paper of User Defined Media, select it from **[Media Size]**.
- 2** Click **(Save As Favorite Setting)** to display **(Save/Delete Favorite Setting)**.
The current setting will be displayed in the list on the right side.
- 3** Enter a print setting name.
- 4** Click **(Add)**.
The print setting will be registered in **(Favorite Setting)**.



User Defined Media

Registered in the Favorite Setting.



[Favorite Setting] includes the following settings.

- **Default Settings:** The default setting when installing the printer driver.
- **Current Settings:** The contents set in the (General) and (Page Layout) tabs. These contents are displayed in the current settings in (Current Setting) and the (Save/Delete Favorite Setting) window.
- **User Defined Setting:** The print setting defined by the user.

Information for User Definition

The user definition includes the following.

- User Defined Media
- Registering barcode font
- Replacing font in the .NET environment

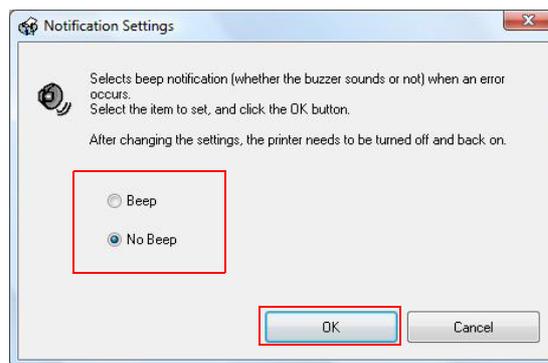
The user definition is set on each client computer. When a number of TM-C710 printer drivers are installed in one computer, these are used mutually.

Buzzer Setting at the Time of Errors

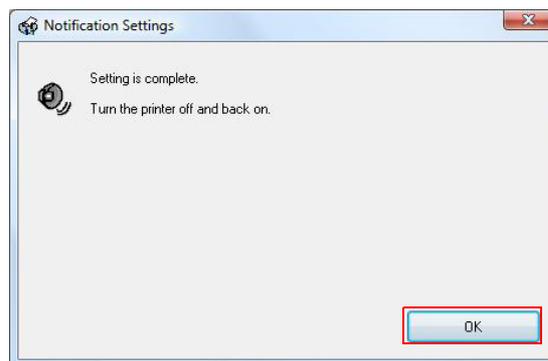
Whether the buzzer beeps when an error occurs can be set.

Follow the steps below to make the setting.

- 1 Turn on the printer.
- 2 Display the printer driver.
(For how to display, see ["How to Use the Printer Driver" on page 61.](#))
- 3 Select the **(Maintenance And Utilities)** tab, and click **(Notification Settings)**.
- 4 The following screen is displayed. Select the item to set, and click **(OK)**.



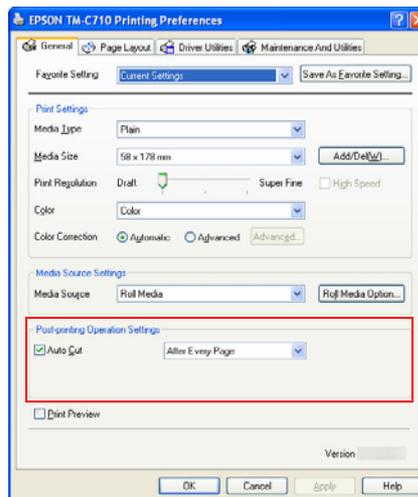
- 5 The following screen is displayed, and setting is completed. Click **(OK)** to exit.



Autocutting after Printing

Whether autocutting is performed after printing can be set in [Post-printing Operation Settings] in the [General] tab of the printer driver.

(For how to display the printer driver, see ["How to Use the Printer Driver"](#) on page 61.)



[Post-printing Operation Settings] includes the following settings.

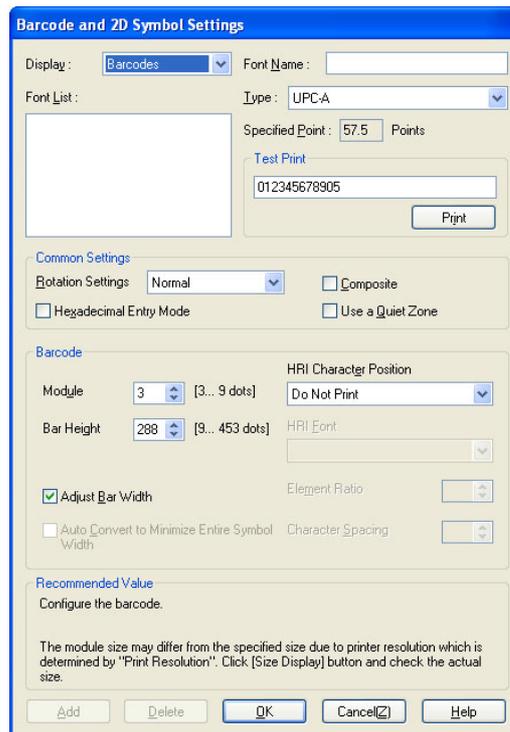
- Autocut: After Every Page/Only After Last Page
The printer feeds paper to the position where autocutting can be performed, and stops after autocutting.

Barcode Printing

The printer driver has a built-in barcode font. Barcode printing is available if a barcode is not created on the application side.

Setting the barcode font

Barcode print settings can be changed on [Barcode and 2D Symbol] on [Driver Utilities] tab.



1 Change settings of the following.

- Display: Select [Barcodes].
- Font Name: Input an arbitrary character string. ASCII characters only.
- Type: Select a barcode type from the following. The displayed items are changed accordingly. The following types are selectable.
 - * UPC-A
 - * JAN13(EAN)
 - * Code39
 - * GS1-128
 - * GS1 DataBar Truncated
 - * GS1 DataBar Limited
 - * UPC-E
 - * JAN8(EAN)
 - * Code128
 - * GS1 DataBar Omnidirectional
 - * GS1 DataBar Expanded

- **Rotation Settings:** Select a setting when printing the barcode rotated by the specified rate.
- **Hexadecimal Entry Mode:** Turn on the check box when the data for barcode is specified on Hexadecimal Entry Mode.
- **Composite:** Turn on the check box to print barcode with a composite symbol.

NOTE	Separate the data specified to a composite symbol and a barcode with “\ ” or “ \ Example: 1234567890\ 012345678905
-------------	---

- **Use a Quiet Zone:** Leaves a blank margin on the right and left side of barcodes for better readability.

NOTE	The barcode printing position is moved based on the amount of the margin.
-------------	---

- **Module:** Sets the thin element width in dots.

Category	Graphic resolution (dpi)	Rotation Settings	Adjust Bar Width*	Upper Line: Minimum Module (by 360 dpi)		
				ANSI Grade D or higher	ANSI Grade C or higher	ANSI Grade B or higher
Plain	360 × 180	Normal, Rotate180°	Available	4 dots	-	-
		Rotate90°, Rotate270°		6 dots	-	-
	360 × 360	Normal, Rotate180°		4 dots	-	-
		Rotate90°, Rotate270°		6 dots	-	-
	720 × 360	Rotate90°, Rotate270°		4 dots	-	-
				6 dots	-	-

Category	Graphic resolution (dpi)	Rotation Settings	Adjust Bar Width*	Upper Line: Minimum Module (by 360 dpi)		
				ANSI Grade D or higher	ANSI Grade C or higher	ANSI Grade B or higher
Light matte coated	360 × 180	Normal, Rotate180°	Available	4 dots	-	-
		Rotate90°, Rotate270°		6 dots	-	-
	360 × 360	Normal, Rotate180°		4 dots	-	-
		Rotate90°, Rotate270°		6 dots	-	-
	720 × 360	Rotate90°, Rotate270°		4 dots	-	-
				6 dots	-	-

- : Not supported

* : Bars of the printed barcode may be thickened since ink soaks into the paper. It is recommended to check [Adjust Bar Width].

CAUTION

When "Module" is set to an odd number and the resolution is changed by changing [Print Resolution], the printed barcode size may be changed. The barcode size can be checked by using the [Size Display] button.

- Bar Height: Sets the element height with dots. Specified dots indicate the actual print size.
- Adjust Bar Width: Narrows the element width when printing. Make sure to select it only when the barcode is not clear enough to be read.
- HRI Character Position: Select the position of the HRI characters. Select [Do Not Print] when not desired.

NOTE

The printing position is limited for some types.

- HRI Font: Select the HRI character font size.
- Element Ratio: Sets the thick element width by the ratio to the thin element width.
- Character Spacing: Sets the character spacing (interval) by the ratio to the thin element width.

2 Click (Add).

The selected barcode font is saved and the font name is added to the font list.

NOTE

- Up to 30 barcode fonts can be registered.
- The barcode font setting can be overwritten by clicking [Save] after selecting the font name from the font list and changing the setting.
- The barcode font setting can be deleted by clicking [Delete] after selecting the font name from the font list.
- Execute a test print according to the setting by clicking [Print] after inputting the text in the box.

Specifying the barcode data

Specify the barcode data by referring to the following descriptions.

About the composite symbol:

The composite component type is selected automatically depending on the digit number of the data.

Composite Component Type	Encodable Digit Number
CC-A	1 ~ 56 digits
CC-B	1 ~ 338 digits

About the HRI character:

When the total width of the HRI character is larger than that of the barcode, the HRI character width is set as the barcode width.

UPC-A

Normal

- Specify the data of 11 to 12 digits.
- The first digit is an unchecked number system character.
- For data of 11 digits, a check digit is automatically added.
- For data of 12 digits, the 12th digit is regarded as a check digit, but not proved.

Composite (difference from Normal)

- For data of 12 digits, the 12th digit is ignored, and a check digit is automatically added.

UPC-E

Normal

- Specify the data of 6 to 8, or 11 to 12 digits.
- For data of 6 digits, the specified data is not changed, and a check digit is automatically added.
- For data of 7 digits, the 2nd to 7th digits become the data characters, and a check digit is automatically added.

- For data of 8 digits, the 2nd to 7th digits become the data characters, and the 8th digit is regarded as a check digit, but not proved.
- For data of 11 digits, a check digit is automatically added.
- For data of 12 digits, the 12th digit is regarded as a check digit, but not proved.
- For data of 7 digits or more, specify "0" for the first digit, since it is regarded as a number system character.

Composite (differences from Normal)

- For data of 8 digits, the 8th digit is ignored, and a check digit is automatically added.
- For data of 12 digits, the 12th digit is ignored, and a check digit is automatically added.

JAN13(EAN)

Normal

- Specify the data of 12 to 13 digits.
- For data of 12 digits, a check digit is automatically added.
- For data of 13 digits, the 13th digit is regarded as a check digit, but not proved.

Composite (difference from Normal)

- For data of 13 digits, the 8th digit is ignored, and a check digit is automatically added.

JAN8(EAN)

Normal

- Specify the data of 7 to 8 digits.
- For data of 7 digits, a check digit is automatically added.
- For data of 8 digits, the 8th digit is regarded as a check digit, but not proved.

Composite (difference from Normal)

- For data of 8 digits, the 8th digit is ignored, and a check digit is automatically added.

Code39

- A maximum of 256 digits can be specified.
- When both or either one of start/stop code ('*') is not specified, it is automatically added.

Code128

- ❑ Specify the data of 2 to 255 digits.
- ❑ Specify either one of the code selection characters (CODE A, CODE B, CODE C) as a start code of the first 2 digits.
- ❑ A special character is indicated by combining '{' and the next character.
- ❑ When [Auto Convert to Minimize Entire Symbol Width] is checked, conversion is automatically performed so as to minimize the entire Code128 symbol width. With this function, there is no need to specify a code set; barcode printing can be performed simply by inputting data you want to convert into symbols.

When [Auto Convert to Minimize Entire Symbol Width] is unchecked, a code set must be manually specified. When code set C is specified, assume a generated two-digit number as an ASCII character decimal number and specify the corresponding ASCII character.

Example: 37": Specify as "%".

"65": Specify as "A".

"979899": Specify as "abc".

- ❑ When the character right after '{' is not any of the following, an error occurs.

Control Character	ASCII	Control Character	ASCII	Control Character	ASCII
SHIFT	{S	CODE C	{C	FNC3	{3
CODE A	{A	FNC1	{1	FNC4	{4
CODE B	{B	FNC2	{2	'{'	{{

- ❑ The HRI characters of the special character are described as below.

Control Character	HRI Character
SHIFT	Not printed
CODE A/B/C	Not printed
FNC1~4	Space is printed
Control character (00h ~1Fh, 7Fh)	Space is printed

GS1-128

- ❑ Specify the data of 2 to 255 digits.
- ❑ '(' is the delimiter for the application identifiers. (printed as the HRI character, but not encoded.)
- ❑ The start codes (CODE A, CODE B, CODE C) and the stop code are added automatically.
- ❑ A symbol character FNC1, that is described after the start code, is automatically added.
- ❑ When '*' is specified, a check digit is automatically calculated, and replaced with '*'.
- ❑ 2 digits of consecutive numbers must be specified as the application identifier. If it is not specified correctly, an error occurs.
- ❑ When '(01)' is specified as the application identifier, the 14th digit becomes a check digit, however, it is not proved when the check digit is specified. When the 14th digit is '*', the check digit is automatically calculated, and replaced with '*'.
- ❑ A special character is indicated by combining '{' and the next character.
- ❑ When the character right after '{' is not any of the following, an error occurs.

Control Character	ASCII	HRI Character
Control Character (00h ~ 1Fh, 7Fh)		Space is printed.
FNC1	{1	Space is printed.
FNC3	{3	Space is printed.
{	{{	{ is printed.
({((is printed.
)	})) is printed.
*	{*	* is printed.
Left parenthesis for the application identifier	((is printed.
Right parenthesis for the application identifier)) is printed.
Check digit position	*	Check digit is printed.

GS1 DataBar Omnidirectional/GS1 DataBar Truncated/GS1 DataBar Limited

- ❑ The first application identifier '01' is not included in the data.
- ❑ When printing the HRI characters, the first application identifier '01' is printed as '(01)' before the packing identification code.
- ❑ A check digit need not to be attached to the barcode data.
- ❑ When printing the HRI character, a check digit is printed after a product code.
- ❑ For GS1 DataBar Limited, specify '0' or '1' for the first digit.

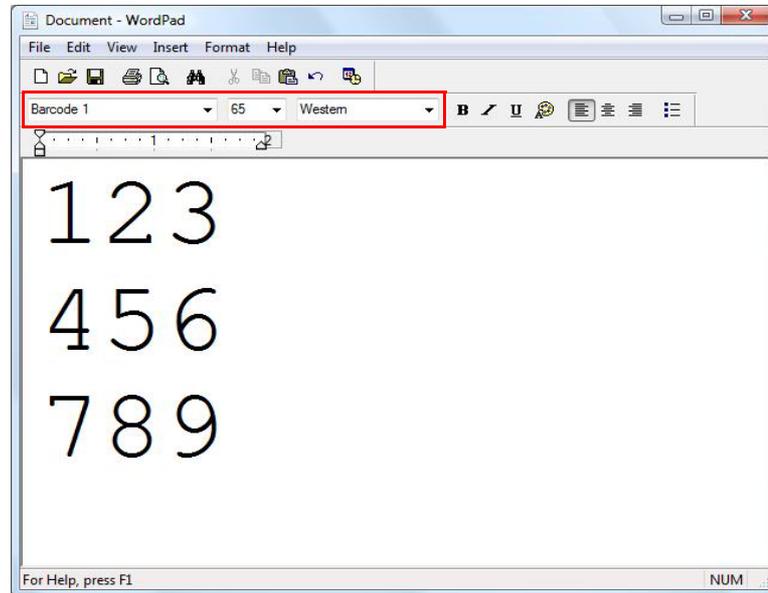
GS1 DataBar Expanded

- ❑ Specify the data of 2 to 255 digits.
- ❑ '(' is the delimiter for the application identifiers. (printed as the HRI character, but not encoded.)
- ❑ Be sure to include all the application identifiers in the data.
- ❑ When the first data is '01' after deleting application identifiers, left and right parenthesis, and '*' from the specified data, the 14th digit from the next of '01' is checked as a check digit. When it is not correct, an error occurs.
- ❑ When the next data of '01' is fewer than 14 digits, a check digit is not checked.
(The check digit is not automatically calculated, nor replaced with '*.' When '*' is specified, '*' is ignored, and the rest of the data is shifted by 1 digit.)
- ❑ Specify the special character using the following format.

Control Character	ASCII	HRI Character
FNC1	{1	Space is printed.
Left parenthesis for the application identifier	('(' is printed.
Right parenthesis for the application identifier)	')' is printed.
'*'	{*	Error
Skipped character	*	Not printed.

Printing method

Specify the selected barcode font, specified point and language to the printing data, and then print it.

**CAUTION**

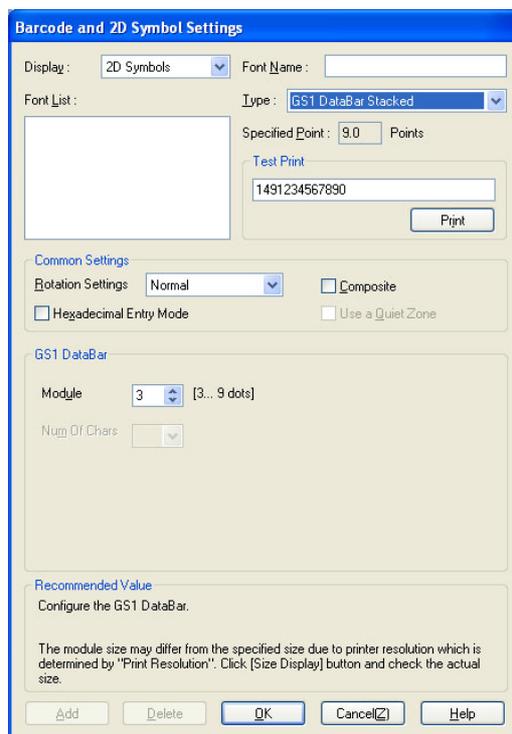
The font size of the barcode cannot be changed by [Specified Point] value. The barcode is not printed when other values are selected.

2D Symbol Printing

The printer driver has built-in 2D symbol fonts. 2D symbol printing is available if the 2D symbol is not created on the application side.

Setting the 2D Symbol font

2D symbol printing settings can be changed on [Barcode and 2D Symbol] on [Driver Utilities] tab.



1 Change settings of the following.

- Display: Select [2D Symbols].
- Font Name: Input an arbitrary character string. ASCII characters only.
- Type: Select a 2D symbol type. The displayed items are changed accordingly.
- Rotation Settings: Select a setting when printing the 2D symbol rotated by the specified amount.
- Hexadecimal Entry Mode: Turn on the check box when the data for 2D symbol is specified on Hexadecimal Entry Mode.

- **Composite:** Turn on the check box to print the 2D symbol with a composite symbol.



Separate the data specified to a composite symbol and a 2D symbol with “\|” or “|”. Describe the data in the order of the composite symbol and the 2D symbol.
Example: 1234567890\|012345678905

- **Use a Quiet Zone:** Leaves a blank margin on the right and left side of 2D symbols for better readability.



The 2D symbol printing position is moved based on the amount of margin.

2 Make settings of the following items according to the selected **(Type)**.

- **PDF417**

- *Module Width: Makes settings of the module width for PDF417.
- *Module Height: Makes settings of the module height for PDF417 by the ratio to the module width.
- *Column: Input the number of columns for PDF417.
- *Step: Input the number of steps for PDF417.
- *Truncation Symbol: Turn on this check box when making a symbol without the stop code.
- *Error Correction Level: Select an error correction level for PDF417. The data can be read even if the part of the symbol is broken, and restoration ratio becomes higher for bigger numbers.

- **QRCode**

- *Model: Select a QRCode model.
- *Module: Select the width of cell (module) for QRCode.
- *Version: Specify the version for QRCode. The number of characters that can be converted into 2D symbols is different depending on the version of QRCode.
- *Error Correction Level: Select an error correction level for QRCode. The data can be read if the part of the symbol is broken and restoration ratio becomes higher in the order of level L, M, Q, H.

- **GS1 DataBar Stacked**

- *Module: Sets the module width for GS1 DataBar Stacked.

- **GS1 DataBar Stacked Omnidirectional**

- *Module: Sets the module width for GS1 DataBar Stacked Omnidirectional.

- **GS1 DataBar Expanded Stacked**

- *Module: Sets the module width for GS1 DataBar Expanded Stacked.
- *Num Of Chars: Sets the maximum width for GS1 DataBar Expanded Stacked.

- The recommended values for the 2D symbols.

Recommended value for setting the barcode/2D symbol font (2D symbol of stack type)

Category	Graphic resolution (dpi)	Print Status*	Minimum Module (by 360 dpi)		
			ANSI Grade D or higher	ANSI Grade C or higher	ANSI Grade B or higher
Plain	360 × 180	No Paper feed	6 dots	-	-
		With Paper feed	6 dots	-	-
	360 × 360	No Paper feed	6 dots	-	-
		With Paper feed	6 dots	-	-
	720 × 360	No Paper feed	6 dots	-	-
		With Paper feed	6 dots	-	-
Light matte coated	360 × 180	No Paper feed	6 dots	-	-
		With Paper feed	6 dots	-	-
	360 × 360	No Paper feed	6 dots	-	-
		With Paper feed	6 dots	-	-
	720 × 360	No Paper feed	6 dots	-	-
		With Paper feed	6 dots	-	-

- : Not supported

* : Whether paper feed is performed during printing 2D symbol can be checked in [Display Media Feed Position] - [Display Print Preview] in the Print Preview function. For this function, see "[Print Preview](#)" on page 85.

3 Click **(Add)**.

The selected 2D symbol font is saved and the font name is added to the font list.

NOTE

- Up to 30 2D symbol fonts can be registered.
- The 2D symbol font setting can be overwritten by clicking [Save] after selecting the font name from the font list and changing the setting.
- The 2D symbol font setting can be deleted by clicking [Delete] after selecting the font name from the font list.
- Execute a test print according to the setting by clicking [Print] after inputting the text in the box.

Specifying the 2D symbol data

See the following description to specify the 2D symbol data.

NOTE

For the composite symbol and the HRI character, see ["Specifying the barcode data" on page 72.](#)

PDF417

- Calculated automatically when the digit number and the line number are 0.
- To specify other number than 0, make sure the multiplication of the digit number and the line number is under 928.

QRCode

- Size is determined by the specified version. If it does not fit in the specified version, it is changed automatically to the appropriate version.

GS1 DataBar Stacked /GS1 DataBar Stacked Omnidirectional

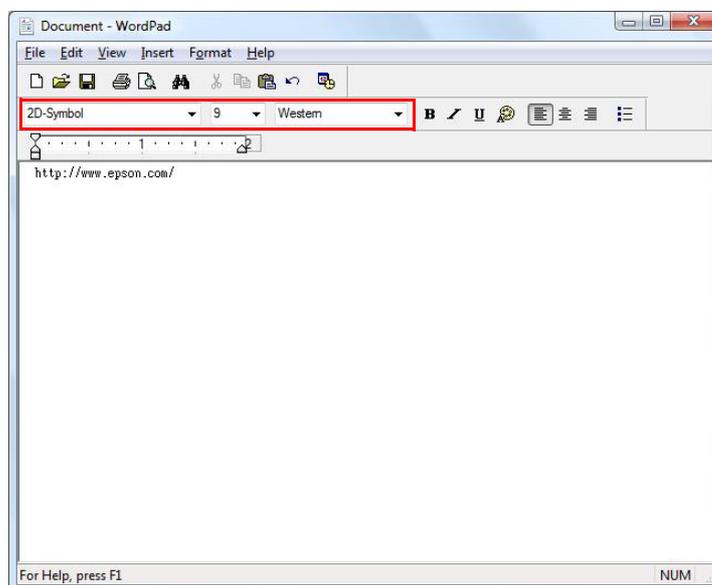
- Up to 13 digits of data can be specified.
- Do not specify the application identifier '01' for the head of the data.
- A check digit need not to be attached to the data.

GS1 DataBar Expanded Stacked

- Multiple line symbol version of GS1 DataBar Expanded. How to specify the data is the same as GS1 DataBar Expanded. (For details, see ["GS1 DataBar Expanded" on page 76.](#))

Printing method

Specify the selected 2D symbol font, specified point and language to the printing data, and print it.



CAUTION

The font size of the 2D symbol cannot be changed by [Specified Point] value.
The 2D symbol is not printed when other values are selected.

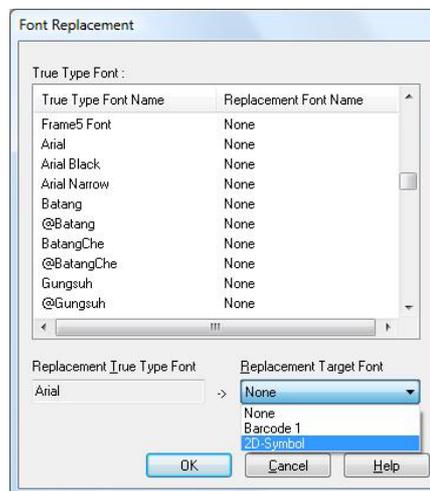
Barcode and 2D Symbol Font Printing on .NET Environment

Since .NET Framework supports only TrueType fonts and Open Type fonts, the barcode and 2D symbol fonts that are registered in the printer driver cannot be printed from an application. Therefore, TrueType fonts are replaced with barcode and 2D symbol fonts with the font replacement function of the printer driver. Barcode and 2D symbol fonts can be printed from applications under .NET Framework environment by this replacement function.

The name of the print data in the application remains as a TrueType font name, but changes to barcode and 2D symbol font when it is printed.

Font Replacement

Font Replacement is executed from (Font Replacement) on the (Driver Utilities) tab.



1 Make the following setting.

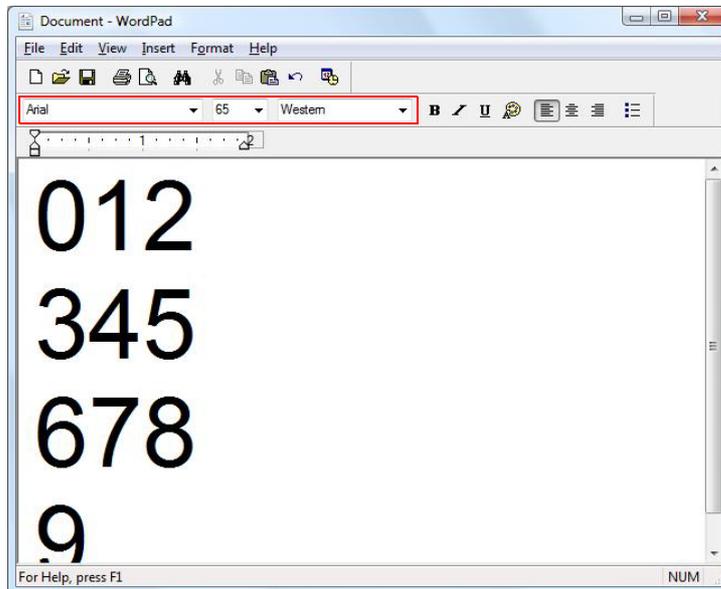
- Replacement TrueType Font
 - * Select the original TrueType Font.
- Replacement Target Font
 - * Select the target barcode and 2D symbol.

2 Click (OK).

TrueType font is replaced by barcode and 2D symbol font.

Printing barcodes and 2D symbols

Sets specified number of point, language of the replaced TrueType font by barcode and 2D symbol font to the print data.



NOTE

- The number of point for barcode and 2D symbol is specified; check it from [Barcode and 2D Symbol] on [Driver Utilities]. The barcode and 2D symbol cannot be printed if a value other than those specified is set.
- The original TrueType font can be used only for specifying barcode and 2D symbol; therefore, if other characters are specified, they cannot be printed. Make sure to use a TrueType font that will not be used for other printing.

Functions of the Printer Driver

The printer driver has “General,” “Page Layout,” “Driver Utilities,” and “Maintenance And Utilities” tabs to change various settings and for adjustments.

(General) tab

Favorite Setting

Selects one of the registered print settings from the list. This is the default setting when printing. Changes to setting when installing the printer driver if (Default settings) is selected.

Print Settings

Makes setting of Media Type, Media Size, Print Resolution, Color and Color Correction.

The user definition paper can be registered in Media Size.

Select print quality from (Normal) (High) and the following is the resolution of the printing.

Paper type	Print Resolution	Resolution (dpi) (Horizontal × vertical)
Plain	Draft	360 × 180
	Fine	360 × 360
	Super fine	720 × 360
Light matte coated	Draft	360 × 180
	Fine	360 × 360
	Super fine	720 × 360

Media Source Settings

Changes settings of Paper Source and Roll Paper Option setting.

Post-printing Operation Settings

Sets whether autocutting is performed after printing.

Print Preview

Displays the print preview before printing if this check box is turned on.

(Page Layout) tab

Favorite Setting

Selects one of the registered print settings from the list. This is the default setting when printing. Changes to setting when installing the printer driver if (Default Settings) is selected.

Orientation

Changes settings of the printing direction (Portrait, Landscape, Rotate 180).

Copies

Sets the number of prints.

Layout

Adjusts the printing position.

Watermark

By turning on this check box, text such as "Important" or a graphic can be printed as a watermark.

NOTE

The checkbox is grayed out unless [Roll Media Option] in the [General] tab is set to "Cut Sheet Mode".

CAUTION

Since the watermark is printed on top of the printed data, a barcode cannot be read when the barcode and the watermark overlap each other.

(Driver Utilities) tab

Barcode and 2D Symbol

Changes various settings of barcode fonts and 2D symbol fonts. This is user definition information.

NOTE

See ["Barcode Printing" on page 69](#) or ["2D Symbol Printing" on page 78](#) for the procedure of each printing.

Font Replacement

Makes settings to replace TrueType font with barcode and 2D symbol fonts under .NET environment.

NOTE

Use this to print the barcode and 2D symbol font in the .NET environment. One TrueType font is specified to use for printing barcodes and 2D symbol fonts.

Driver Preferences

Changes settings for various functions related to the printer driver.

EPSON Log File Settings

Changes settings for the saving method for quick analysis when an error occurs.

Import/Export Settings

Imports or exports all the settings on the printer driver as a file.

NOTE

This makes it easier to use the same settings for other printers.

(Maintenance And Utilities) tab

Makes the following settings to the printer.

Notification Settings

Sets whether the buzzer beeps when an error occurs.

Head Cleaning

Performs head cleaning. The result of the head cleaning can be checked by the nozzle check pattern printing.



See "[Head Cleaning](#)" on page 96 for the operating procedure of head cleaning.

Nozzle Check

Prints a nozzle check pattern to check if any nozzle is clogged or not.

Print Head Alignment

Adjusts misalignment of vertical lines, barcodes and paper feed during bidirectional printing.

This is to check the adjustment value using the roll paper included in the product package.

Normally this is not necessary for the user to make this adjustment since this is adjusted in the factory before shipping.

Daily Nozzle Check Service

Performs daily nozzle check at the specified time.

Uninstallation

To uninstall the printer driver, uninstall the printer driver and Status API separately.

- To uninstall the printer driver [page 89](#)
- To uninstall Status API [page 91](#)

Uninstalling the Printer Driver

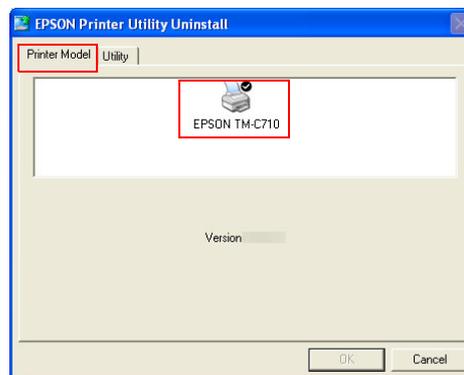
Follow the steps below to uninstall the printer driver.

- 1 Finish other operations on the computer.
- 2 Select **(Start)** - **(Control Panel)** - **(Uninstall a program)**.

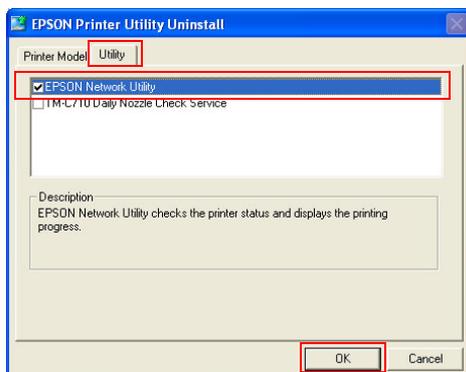
NOTE

Menus to select are different in each OS.

- 3 Select **(EPSON Printer Software)**, and click **(Uninstall/Change)**.
- 4 The following screen is displayed. Select the printer driver to be uninstalled from the **(Printer Model)** tab.



- 5 Check **(EPSON Network Utility)** in the **(Utilities)** tab, and click **(OK)**.



CAUTION

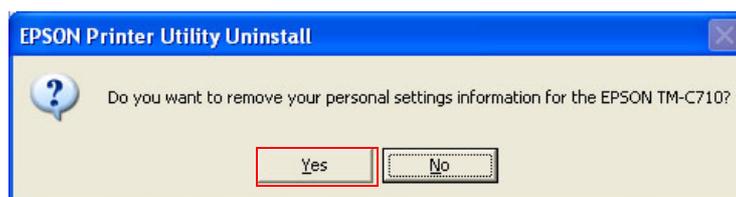
If you are using other Epson printers and more than one [EPSON Network Utility] is displayed, do not delete them. If they are displayed even if you are not using other Epson printers, check all of them to delete.

- 6 The screen to confirm uninstallation is displayed. Click **(Yes)**.

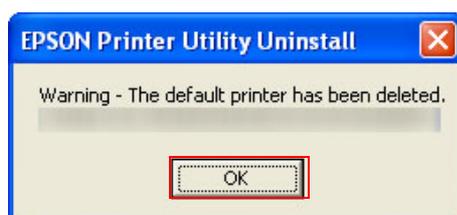


- 7 The confirmation screen to delete the personal setting information is displayed.

Click [Yes] to delete it, or click [No] to leave it.



- 8 If you have set the TM-C710 as the usual printer, another printer to be set for the usual printer after uninstalling is displayed. Click **(OK)**.



- 9 "Uninstallation complete." is displayed. Click **(OK)**.



The uninstallation of the printer driver is completed.

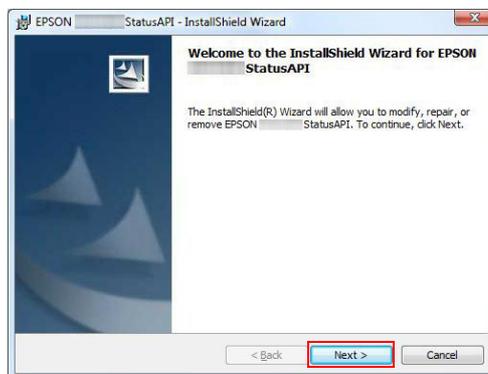
Uninstalling Status API

Follow the steps below to uninstall Status API.

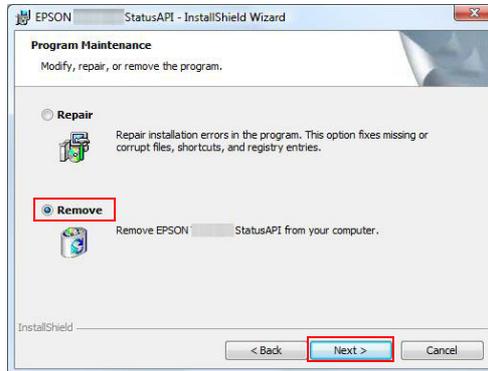
NOTE

To uninstall without displaying the screen, add the command `(/s /v"/qn REMOVE=ALL")` to the installation file name of Status API.
e.g: `c71sapi_xx.exe /s /v"/qn REMOVE=ALL"`

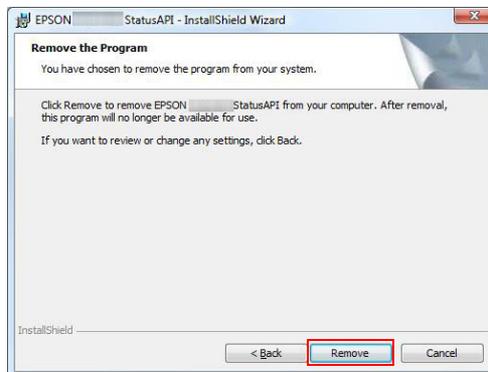
- 1 Finish other operations on the computer.
- 2 Double-click the icon "c71sapi_xx.exe."
- 3 Click **(Next)**.



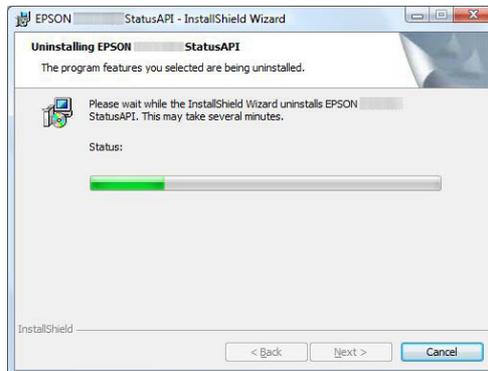
4 Select **(Remove)**, and click **(Next)**.



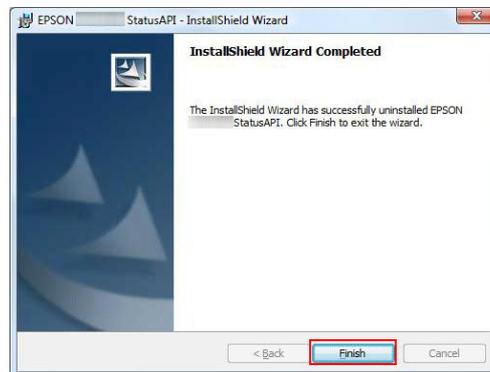
5 Click **(Remove)**.



Status API is uninstalled.



- 6 The uninstall completion screen is displayed. Click **(Finish)**.



The uninstallation of Status API is completed.

Self-test

Procedure for the Self-test

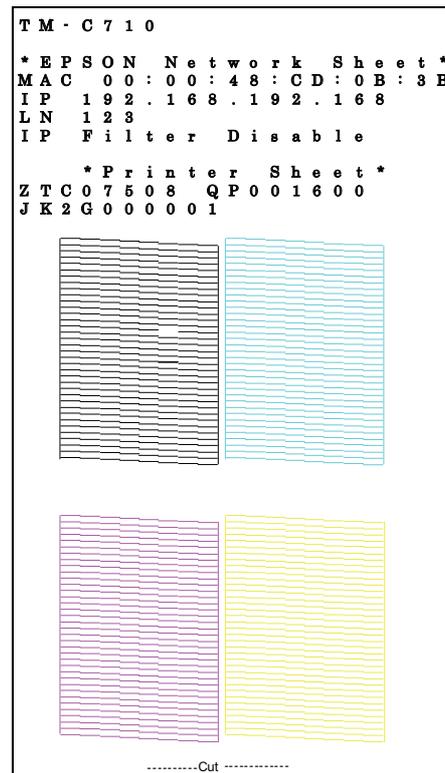
- 1 Check the following points before performing the self-test.
 - The roll paper is correctly set.
 - The roll paper cover is closed.
- 2 Press the self-test button.

There are two types of self-test, as described below.

 - Self-test without notification
Press the self-test button at the back of the printer for less than 5 seconds.
 - Self-test with notification
Press the self-test button at the back of the printer for 5 seconds or longer continuously.

The self-test result is printed.

- MAC address
- IP address
- Lane number
- IP filtering function status
- Firmware version
- Printer serial number
- Nozzle check pattern



When the self-test with notification is performed, the fact that the self-test was performed can be detected from the host PC. When the host PC detects the self-test information, the printer prints a test coupon including the host PC information. The user can verify the host PC system and communication functions.

Nozzle Check

Printing the nozzle check pattern enables you to check whether the nozzles are clogged or not. The nozzle check can be performed in two methods: by the self-test, and by the printer driver.

Nozzle Check Using the Self-test

- 1 Perform the self-test referring to ["Self-test" on page 94](#).
- 2 Check the printed nozzle check pattern.
If dots are missing, perform a head cleaning. (See ["Head Cleaning" on page 96](#).)

Nozzle Check Using the Printer Driver

- 1 Turn on the printer.
- 2 Set the roll paper correctly.
- 3 Display the print setting screen of the printer driver.
(For how to display, see ["How to Display the Printer Driver" on page 61](#).)
- 4 Click **(Nozzle Check)** in the **(Maintenance And Utilities)** tab.
- 5 Click **(Print)**.
- 6 Check the printed nozzle check pattern.
If dots are missing, perform a head cleaning. (See ["Head Cleaning" on page 96](#).)

Cleaning

Cleaning the Printer Case

To clean the printer case, wipe the dirt off the printer case with a dry cloth or a damp cloth. Be sure to turn off the printer before cleaning.

CAUTION

Never clean the product with alcohol, benzine, thinner, or other such solvents. Doing so may damage or break the parts made of plastic and rubber.

Head Cleaning

Perform a print head cleaning only when the printout is faint or dots are missing.

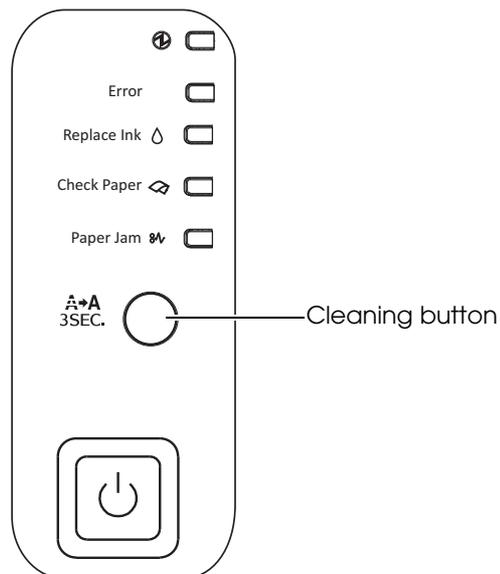
Head cleaning can be performed using two methods; the Cleaning button, or the printer driver.

CAUTION

- Do not turn off the printer or open the roll paper cover.
- When ink is low, head cleaning may not start or may stop during cleaning. In this case, head cleaning starts after a new ink cartridge is installed.

Head cleaning using the Cleaning button

- 1 Turn on the printer.
- 2 Press the Cleaning button for 3 seconds or more.
Head cleaning starts. The  (Power) LED flashes during the head cleaning.



When head cleaning finishes, the  (Power) LED stays on.

- 3 Perform a nozzle check to confirm the print result.
(For how to perform the nozzle check, see ["Nozzle Check" on page 95.](#))

4

Head cleaning using the printer driver

- 1 Turn on the printer.
- 2 Display the print setting screen of the printer driver.
(For how to display, see ["How to Display the Printer Driver" on page 61.](#))
- 3 Click **(Head Cleaning)** in the **(Maintenance And Utilities)** tab.
- 4 Perform the nozzle check to confirm the print result.
(For how to perform the nozzle check, see ["Nozzle Check" on page 95.](#))

Preparing for Transport

Follow the steps below to transport the printer.

CAUTION

Do not take the ink cartridge out of the printer when transporting it.

Leaving the printer without an ink cartridge may result in drying the print head and clogging.

- 1** Wait more than 10 seconds after the printer has finished its operation, and turn off the printer by pressing the power switch for more than 3 seconds.
- 2** Confirm that the  (Power) LED is off.
- 3** Remove the roll paper.
- 4** Pack the printer upright.

Storing Long-term

Before Long-term Storage

Once ink is filled in the printer (once you use the printer), follow the instructions below to store the printer for a long period.

CAUTION

- Do not remove the ink cartridge from the printer.
- To prevent missing dots, do not expose the printer to excessive vibration or shock during transport.

- 1** Run a self-test print.
- 2** When dots are missing, press the Cleaning button for 3 seconds or more to perform a head cleaning.
- 3** After head cleaning, run a self-test print again to make sure there are no missing dots. If there are still missing dots, repeat step 2.

NOTE

If printer output continually has missing dots, it may indicate that ink has dried out in the printer nozzles. In extreme cases, cleaning may not help to recover the missing dots, and the printer may require repair.

- 4** After the printer finishes its operations and the Power LED has changed from a flashing to a steady light, wait more than 10 seconds before unplugging the power cable.
The print head cap closes before unplugging the power cable from the outlet.
- 5** Store the printer in a cool (between 0-25°C {32-77°F}) and dark place.

After Long-term Storage

CAUTION

Do not turn off the power or open the printer covers during a head cleaning.

- 1** Check the expiration date of the installed ink cartridge.
The ink cartridge expires two years after manufacture or 6 months after the package is opened.

-
- 2** Turn on the printer; head cleaning starts.
 - 3** Run a self-test print, and make sure there are no missing dots.
 - 4** If there are missing dots, press the Cleaning button for 3 seconds or more to perform a head cleaning.

Troubleshooting

Lighting and Flashing Error LED

Recover from the error as follows when the Error LED is on or flashing.

(For LED lighting/flashing patterns, see ["Status/Error Indications" on page 17.](#))

- Make sure that the roll paper cover is closed.
Close the cover if it is open.
- When the Replace Ink LED is on, replace the ink cartridge with a new one.
- When the Check Paper LED is on, check whether the roll paper is out. If it is out, replace it with a new one.
- When the Paper Jam LED is on, check for a paper jam. If paper is jammed, remove the jammed paper referring to ["Removing Jammed Paper" on page 60](#), and install the roll paper correctly.
- Turn off the printer and then turn it back on. If the Error LED is still flashing, call your supervisor or a service person.

Maintenance of the TM-C710

This chapter describes the necessary information for an administrator of the TM-C710, such as how to distribute the printer driver and add/replace the printer, or manage the printer in the system.

Necessary information for an administrator of the printer ([page 103](#))

- Printer driver functions ([page 103](#))
- Destination for the printer driver setting ([page 104](#))
- Installing multiple printer drivers on one client computer ([page 105](#))

Maintenance ([page 106](#))

- Adding a client computer ([page 106](#))
- Adding a printer (without adding paper) ([page 107](#))
- Adding/changing the paper (changing the Favorite Setting) ([page 108](#))
- Replacing the printer ([page 108](#))

Necessary Information for an Administrator of the Printer

This section describes the necessary information for the administrator of the printer.

Printer Driver Functions

The TM-C710 printer driver has the following functions.

- ❑ Printing
- ❑ Printer driver settings
 - Print setting
 - Favorite setting
 - User defined setting
 - Printer driver operation setting
- ❑ Saving/importing the printer driver settings
 - The print setting, the favorite setting, the user defined setting, operation setting of the printer driver can be exported in a BSF file (extension: “.BSF”). Also, the printer driver setting can be made by importing the settings from the BSF file.

CAUTION

Export a BSF file from the current setting. When exporting it from the standard setting, the setting contents different from those in the current driver screen will be exported.

* Current setting:

Printer driver properties - [General] - [Printing Preferences] - [Driver Utilities]
- [Import/Export Settings]

* Standard setting:

Printer driver properties - [Advanced] - [Printing Defaults] - [Driver Utilities]
- [Import/Export Settings]

- ❑ Printer setting
 - Setting for printing
 - Setting for maintenance

Destination for the Printer Driver Setting

The following printer driver settings can be saved in a file.

Saved as a BSF file
Usage:
- Exporting/importing from the printer driver

Favorite Setting

General

Page Layout

Driver Utilities

User Defined Media

Installing Multiple Printer Drivers on One Client Computer

When installing multiple printer drivers on one client computer, there are separate setting items for each printer driver, and also common items for all the TM-C710 printer drivers. When a common setting item is changed in one printer driver, the same setting is applied to other TM-C710 printer drivers.

Item	Contents	Separate setting	Common setting
Print setting	(General) (including User defined Media) (Page Layout)	√	—
(Favorite Setting) list	The (Favorite Setting) list in which print settings are registered.	—	√
User defined information	User defined Media Barcode Font Font Replacement	—	√
Printer driver operation setting	—	√	—
EPSON Log File	—	—	√

Maintenance

This section describes the following contents.

- ❑ Adding a client computer (for the Ethernet interface model) ([page 106](#))
- ❑ Adding a printer ([page 107](#))
- ❑ Adding a paper type/changing the print setting ([page 108](#))
- ❑ Replacing the printer ([page 108](#))

Adding a Client Computer (for the Ethernet Interface Model)

To add a client computer, install the printer driver and make the settings by following the steps below.

- ❑ Item to be prepared by the administrator
 - The install package for the existing printer.
- ❑ What to do after distribution
 - Double-click the icon of the install package on the client computer to install the printer driver

Adding a Printer

Follow the steps below to add a printer to print on the same media as the existing printer.

USB interface model

❑ Preparation

- The install package for the existing printer

❑ What to do on the client computer after distribution

- ① Double-click the icon of the install package on the client computer to install the printer driver.
- ② Connect the printer and turn it on.

Ethernet interface model

❑ Items to be prepared by the administrator

- Network information for the printer to be added
- Install Package

Prepare the BSF file for the existing printer driver and the install package including the network information.

❑ What to do after distribution

- ① Set the network information for the printer to add using EpsonNet Config.
- ② Double-click the icon of the install package on the client computer to install the printer driver.

Adding a Paper Type/Changing the Print Setting

Follow the steps below to add a paper type or change the print setting of the printer driver on each client computer.

❑ Item to be prepared by the administrator

- The BSF file for the existing printer driver

Follow the steps below to create the BSF file

- ① Set the new paper type in the print setting for the existing printer driver, and register it to the [Favorite Setting]. Make sure the print setting for the existing paper type has also been registered.
- ② Place the print setting for the new paper at the top of the [Favorite Setting] list.
- ③ Export the BSF file.

❑ What to do on the client computer after distribution

- Import the BSF file in the printer driver.

NOTE

Be sure to register also the print setting for the existing paper type to the [Favorite Setting] list. Otherwise, it is deleted when importing the BSF file.

Replacing the Printer

When replacing a printer due to such causes as malfunction, follow the steps below.

USB interface model

In a system in which the USB interface model printers are connected to multiple client computers, you do not need to set the client computer when replacing the printer if you have set the same USB serial number to the printer.

You cannot connect more than one printer that has the same USB serial number to one client computer. It is possible only for a different client computer. The USB serial number can be changed with the TMUSB Identifier Utility (TMUSBID.exe).

NOTE

Normally, when a new USB interface model printer is connected, a new printer driver (printer queue) and a new USB port are created on the client computer. It is necessary to change the port when printing with the new printer from the application on the client computer.

❑ Preparation

Follow the steps below to copy the printer setting including the USB serial number to another printer.

- ① Set the USB serial number of the existing printer using the TMUSB Identifier Utility.
- ② Disconnect the existing printer from the computer.
- ③ Connect a new printer to the computer.

- ④ Set the same USB serial number as that of the existing printer to the new printer using the TMUSB Identifier Utility.

To set the same USB serial number to multiple printers, repeat ③ and ④ described above.

❑ Replacing procedure

- ① Disconnect the existing printer, and connect the new one on which the USB serial number has been set.
- ② You can print using the same printer port as before, since the same USB serial number is set. You do not need to change the client computer or the application.

Ethernet interface model

Set the new printer the network settings such as the IP address of the existing printer. Setting is made with EpsonNet Config. The printer driver setting is not necessary.

❑ Preparation

- Obtain the network information (such as IP address) of the existing printer using EpsonNet Config.

❑ Replacing procedure

- ① Disconnect the existing printer from the network.
- ② Connect the new printer to the network, and turn it on.
- ③ Make the network setting for the new printer according to setting information of the existing printer using EpsonNet Config.