

ELECTRONIC PRINTER for TOHNICHI Digital Torque Meters and Instruments EPP16M3 INSTRUCTION MANUAL

This is a Class B product based on the standard of the Voluntary Control Council for Interference by Information Technology Equipment (VCCI). If this equipment is used in domestic environments, radio disturbance may arise. When such trouble occurs, the user may be required to take corrective actions.

Introduction

Thank you very much for purchasing the EPP16M3, thermal printer designed for TOHNICHI digital meters and instruments. Read the 'Safety Instructions' and '1. Operating Precautions' carefully before using this printer for safe handling of it. Save these instructions for future reference.

Safety instructions

To use this equipment safely, or to protect damage to the equipment, the following symbols are used throughout this manual to highlight safety information.

	Warning	The symbol indicates that failure to observe these instructions or mishandling of this equipment could lead to severe injury or death.
	Caution	The symbol indicates that failure to observe these instructions or mishandling of this equipment could lead to injury or only property damage.

Examples of Symbols

- The symbol indicates caution (including DANGER or WARNING). The example in the left column indicates that caution or warning conditions exist.
- The symbol indicates the action is prohibited. The example in the left column indicates disassembly is prohibited.
- The symbol indicates a required operation that must be performed or an obligatory instruction. The example in the left column indicates unplugging is required.

Warning

	Do not use AC adapter and AC power cord. Failure to follow this instruction may result in overheating or inflammation, which may lead to fire or accidents.
	Do not bend the power cord forcibly, or place heavy objectives on the power cord. Doing so may damage the power cord and cause fire or electric shock. If the power cord is damaged, discontinue using it.
	Never disassemble the printer, the AC adapter, the AC power cord. Failure to follow this instruction may result in overheating or inflammation, which may lead to fire or accidents.

Caution

	Do not drop any metallic objects nor spill coffee, soft drinks, water and any other liquid.
	As the thermal head may be very hot immediately after printing, do not touch it. Be sure that the thermal head is cool before removing the paper jam or cleaning the thermal head.
	Do not plug or unplug the AC adapter and batteries with wet hand. It may result in electric shock, burn and failure.
	Do not use the printer in place where it will be exposed to excess moisture and where it is watered. It may result in electric shock, burn and failure.
	Remove the interface cable or AC adapter from the connector or the receptacle by holding the connector or the AC plug. Never pull the cable itself. Doing so may damage the cable or adapter.
	For following case, turn the printer power OFF, unplug the AC power cord from outlet. Continuous use may occur the printer failure, fire and electric shock. In case the problem is not cleared and fixed Emitting smoke, making unusual noise and odd smell from the printer The metallic object dropped or spilled liquid into the printer

1. Operating Precautions

Observe the following for safe and proper operation.

■Notes on use

- Do not subject the printer to strong shocks by dropping or hitting it.
- Turn off the power switch and keep the AC plug removed from the outlet when the unit is not used.
- Do not pull the paper from the exit. It may cause the damage or failure of the printer mechanism.

■Notes on treatment of thermal paper

- Store the paper in a dry, cool and dark place.
- Do not rub the paper with hard substance.
- Keep the paper away from organic solvent.
- Do not let the paper touched with vinyl chloride film, eraser or adhesive tapes for hours.
- Do not put the paper on diazo print or wet copy that has just been copied.

■Notes on installation

- Install the printer on a level or upright and stable surface.
- Avoid such places with:
Slanted surface, strong vibration, direct sunlight, full of dust, excessively high or low temperature, electromagnetic noise, corrosive gas
- To retain data for long term, make a copy and store it properly.**

2. Preparation

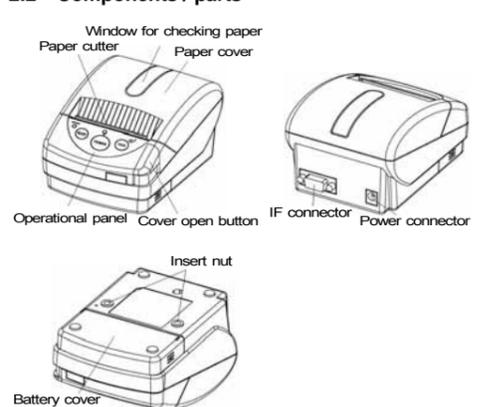
2.1 Unpacking

When unpacking the printer, make sure the following components are provided.

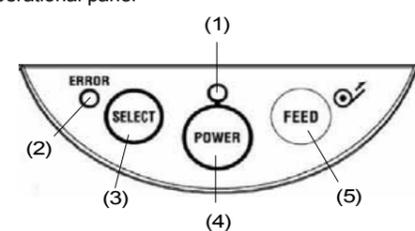
- Printer unit 1 unit
- Thermal paper (paper length 15m) 1 roll
- Instruction manual 1 volume
- AC adapter 1 piece
- AC power cord 1 piece

For ordering the thermal paper, contact our sales office or local distributors.

2.2 Components / parts



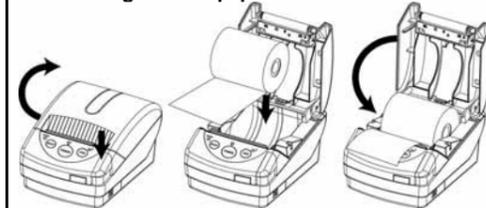
Operational panel



- (1) POWER LED : Indicates the status of the power.
- (2) ERROR LED : Indicates printer errors..
- (3) SELECT button : Selects the printer mode.
- (4) POWER button : Turns the power ON/OFF.
- (5) FEED button : Feeds the thermal paper while pressing this button.

3. Handling

3.1 Setting thermal paper



- Press the cover open button to open the paper cover.
- Set the paper roll as shown in the picture (Make sure the printing surface is correct, or it does not print properly)
- Close the paper with the tip end emerging from the tear bar.

Handle the tear bar carefully not to injure the finger or hand.

3.2 How to set to upright wall

Please ready two screws (M3x3mm), and set the printer to upright wall not sideling in the vicinity and from side to side, keeping power connector side down, using the insert nut in back side.

3.3 LED indication

When an error occurs, the POWER/ERROR LED lights or blinks depending on the type of errors.
:Turn ON for 0.1sec :Turn OFF for 0.1sec

Status	POWER (Green)	ERROR (Red)	Recovery
Standby printing	ON	OFF	***
Initializing	ON		Complete initialization
Recharging			Complete charging
Temperature error	ON		Cooling down
Paper empty	ON	ON	Put paper
Paper cover open	ON	ON	Close the cover
Low battery		OFF	Recharge battery
Excess recharge		ON	Contact Sanei
Upper limit voltage error	OFF	OFF	Contact Sanei
Lower limit voltage error		OFF	Contact Sanei

3.4 Self test print

Turning the power switch ON while pushing the FEED button starts self test print. The printer prints character sets and barcode.

3.5 HEX dump print

Data entered from the computer is printed in hexadecimal numbers. While pressing SELECT button, turn ON the power switch. When the mode selecting is printed, press the SELECT button, then starts the HEX dump mode.

3.6 Function set (Soft switch)

- Sets the printer function by Soft switch.
- While pressing the SELECT button, turn ON the power switch.
- After printing the mode selecting, push the FEED button to enter the function setting mode.
- When a message is printed, press the **FEED button for YES and the SELECT for NO.**
- The printer prints SETTING MODE END when ending.
- Setting items
Classified setting items are as follows.
 - COMMON SETTING : Common information
 - MODE-B SETTING : BL-58 compatible
 - INTERFACE SETTING : Interfaces

3.7 Maintenance

Clean the thermal head, the platen roller and Sensors periodically.
The details show in the Technical Guide.

	Before cleaning the printer, turn OFF the printer power and disconnect the AC adapter and remove the battery pack from the case.
	Never get liquid such as water into the printer.

3.8 Connection with the Tonichi product

A connecting cable is necessary to connect with the Tonichi products. Please refer to the section "4. Option". Regarding the printing method, please refer to operating instruction of the connected product

3.9 Connection with Compact Display(CD42)

Firstly, it is necessary to change data length setting of EPP16M3 and DIPSW of CD42.

Data length setting method of EPP16M3

- Power on while pressing "SELECT" button.
- "BIT LENGTH" is on by pressing "FEED" button 14 times.(Factory setting: 7BIT)
- "BIT LENGTH" becomes "8BIT" by pressing "SELECR" button.
- Setting is completed when "SELECT" button is pressed.

Changing DIP SW of CD42

- Unplug a power cable of CD42.
- Loosening 4 screws on upper side of CD42.
- Remove a case cover.
- Move a panel surface a little to upper.
- Flip up the 8th of DIPSW at the lower left.
- Put panel and cover back in place and turn it on.

* It is necessary to set "Prn" on external output setting.

4. Option

Connecting Code

- No.575 : CEM3,CTA2,CTB2 EPP16M3
- No.561 : LC, TDT, CD42, TCC EPP16M3
- No.383 : DOTE3, TME2, LC2, LC3, TDT2, TDT3, CD5 EPP16M3

Expendable item

- A Roll of Paper : No.1408

Battery pack

- Contact TOHNICHI if you need any further assistance.

4. Specifications

4.1 General specifications

- Command systems: ESC/POS, BL-58
- Print method: Direct line thermal
- Interface: Serial(RS-232C)
- Connector : D-sub 9pin Male
- Printing speed Max.80mm/sec
- (Dedicated AC adapter, Printing ratio 12.5% or less)
- Printing width/paper width 48mm/58mm
- Power source

- Dedicated AC adapter
- Part No. : BLS-120W
- Input : AC100V ~ 240V, 50/60Hz
- Output : DC9.0V 3.0A
- Dimensions (WxDxH, No protruding parts) 93mmx125mmx70mm
- Weight approx.265g (without thermal paper)

Operating environment

- Temperature When battery is used - 10 to +50
- When AC adapter is used 0 to +40
- Printing quality guarantee +5 to +40
- Humidity 20%RH to 85%RH (No condensation)

Storage environment

- Temperature - 20 to +60
- Humidity 10%RH to 90%RH (No condensation)
- Thermal paper Part No. : P-58-30
- Paper width : 58mm
- Length : approx.30m
- Outer diameter. : 50mm

EMC regulations

- VCCI CLASS B, FCC CLASS B, CE marking
- Input buffer 8k bytes

Updated printer drivers, specifications, and Technical Guide are listed in the Website. Windows is the registered Trademark of Microsoft Corporation. ESC/POS is registered Trademark of Seiko Epson Corporation. This instruction manual may be subject to change without notice due to product improvement.



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