

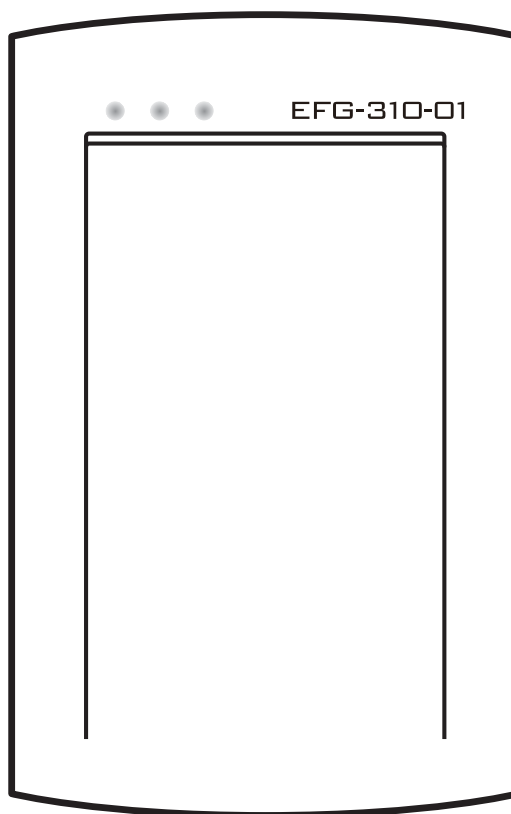
CSH-07334

## Users Manual

**welcat**  
Over the Wave

### IC Card/IC Tag Reader/Writer CSH-07334

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## US Regulations

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:

- (1) this device may not cause harmful interference, and
- (2) this device must accept any interference received, including interference that may cause undesired operation.

### Note:

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the

instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation.

If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- - Reorient or relocate the receiving antenna.
- - Increase the separation between the equipment and receiver.
- - Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- - Consult the dealer or an experienced radio/TV technician for help.

### Warning:

You are cautioned that changes or modifications not expressly approved by the party responsible for compliance could void your authority to operate the equipment.

# Trademarks

Microsoft, MS are the U.S. Microsoft Corporation's registered trade-marks or the trademarks in the U.S. or other countries.

Windows XP, Windows 2000 are the U.S. Microsoft Corporation's registered trade-marks or the trademarks in the U.S. or other countries.

my-d is the Infineon Technologies Inc.'s registered trade-marks or the trademarks.

I•CODE is the NXP Semiconductors Inc.'s registered trade-marks or the trademarks.

Tag-it is the Texas Instruments Inc.'s registered trade-marks or the trademarks.

FerVIDfamily is the Fujitsu Inc.'s registered trade-marks or the trademarks.

The products and corporate names which are described in addition are the registered marks or brand of each enterprise.

# SAFETY PRECAUTIONS

- Be sure to read these precautions before using this product in order to insure safe operation of the equipment.
- Keep this User's Manual on hand for future reference whenever you may need it.

Strict observance of these warning and caution indications are **MUST** for preventing accidents which could result in bodily injury and substantial property damage. Make sure you fully understand all definitions of these terms and related symbols given below, before you proceed to the text itself.



## Danger

This symbol indicates an item that can result in death or serious personal injury if ignored and emergency of warning when dangerously generated is high.



## Warning

This symbol indicates an item that can result in death or serious personal injury if ignored.



## Caution

This symbol indicates an item that can result in serious personal injury or material damage if ignored.

Meaning of Symbols.



A diagonal line through a circle indicates something you should not do



A black circle indicates something you must do.



A triangle inside indicates something you should be careful about.

Be sure to observe the following matters to prevent injury to the users and others and possible damage to the property.

# Observe strictly



## Warning



Observe the display of the danger that the manufacturer of the personal computer and peripherals used is directing and warning and attention strictly when you use the product.



Do not attempt disassemble or modify the products, which may result in injury, electric shock, excessive heat, fire.



Do not use this product in a place in danger of catching fire and exploding.

Using it in a place generating flammable gas and dusts can cause explosion and fire.



Do not use this product near the electric device which processes highly precise control and a weak signal.

It may influence electric devices (such as medical treatment electric device, fire alarm, automatic door, other automatic control apparatus, etc.) to generate malfunction etc.



Do not put a foreign substance into the inside of a main body.

When a foreign substance or a liquid go into the inside of the main body, stop use, and inform the store of purchase.

When it is then used, it will become accidents, such as an electric shock and a fire, or the cause of failure.



Do not bring close to chemicals.

Do not use and keep it near chemicals or in the place which chemicals touch.

It becomes accidents, such as an electric shock and a fire, or the cause of failure.



This product is not developed, not intended, not permitted to use this product for the equipment, (atomic energy control, aircraft flight control, air traffic control, mass transport control, life support system, and weapon control systems, hereinafter "High Safety Required Use"), whose failure could threaten directly human life or affect human body.



## Warning



Do not place or use the products in the hot, high humid or dusty places such as a fire side, a stove side, under the burning sun, etc. Doing so could cause a fire, burn, bodily injury, or serious damage to property.



Do not place or use products in high humid or dusty areas. Doing so could cause a fire, burn, bodily injury, or serious damage to property.



Do not put in in water, and sprinkle water by strong power. If water will gets into the products, resulting in failure, fire or electrical shock.



Do not give the high impact. Do not drop, do not throw out, and do not beat the main body. It becomes malfunction of the main body, and the cause of failure.



Do not put it in an unstable place. Apparatus drops or falls down and it causes an injury and a failure of the apparatus.



Do not put it in the place which an infant's hand reaches. It becomes cause, such as an injury.



Only use the specified our peripherals.

### Caution

This product is communication equipment using 13.56MHz radio wave. Interference may be generated depending on how and where it is used. To decrease the effect by the interference, we recommend you make a mutual check in advance before installation.

The product may affect the operation of radio astronomical unit, medical or other equipment. Take special care when using the product in an environment where such equipment is being used. When installing or repairing this product, it is also necessary to use caution against human exposure to radio waves for a long period.

## Bundled items

- CSH-07334 Unit..... 1
- USB cable..... 1
- Brief manual.....2
- RDID sticker..... 1
- CD-ROM..... 1

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# Introduction

Thank you for purchasing our IC tag/IC card reader writer “CSH-07334”.

CSH-07334 is a reader writer compatible with IC/cards/IC tags of the following makers.

- Infineon Technologies “my-d”
- Texas Instruments “Tag-it HF-I”
- NXP Semiconductors “I-CODE1” “I-CODE SLI”
- Fujitsu “FerVIDfamily”

It is a guidance type read/write communication equipment (model designation acquired) that can read multiple tags collectively (anti-collision function).

This user manual describes how to use the hardware of the CSH-07334 unit and the driver software.



We are happy if CSH-07334 is useful for improving efficiency of your business.

This product conforms to the RoHS Directive.

RoHS :Abbreviation of Restriction of the use of the certain Hazardous Substances in electrical and electronic equipment

RoHS is a regulation of harmful substance enforced by the European Union for electronic and electric equipment, which prohibits the use of six substances consisting of lead, hexavalent chromium, mercury, cadmium and two different types of bromine-based fire retardants, namely PBB (polybrominated biphenyl) and PBDE (polybrominated diphenyl ether) .

## Notational Information

	Indicates a note you can refer to.
	Indicates a caution.
CSH-07334	IC Card / IC Tag Reader/Writer CSH-07334.



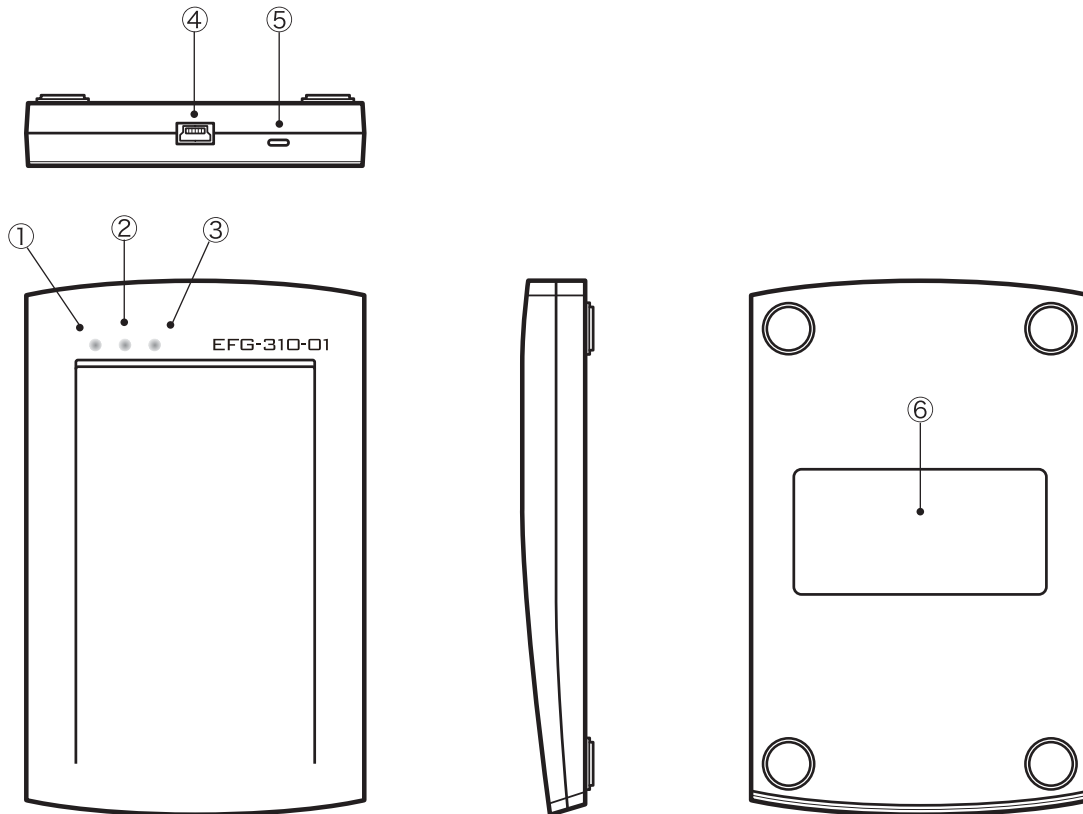


# Chapter 1

## Hardware



## 1-1 Part names and functions



① PW LED

This lights up in red when the power is turned on.

② R/W LED

This lights up in green when the equipment reads and writes a card (tag).

③ RF LED

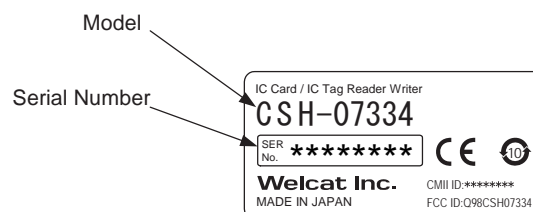
This lights up in yellow when the radio wave is outputted.

④ USB connector

Connect the attached USB cable with PC.

⑤ Buzzer sound hole

⑥ Product nameplate



## 1-2 Specification of CSH-07334

### 1-2-1 Environmental condition

Item	Specification
Working temperature	0 to 40°C (There should be no rapid temperature change and condensing.)
Working humidity	20 to 80%
Storage temperature	-10 to 50°C (There should be no rapid temperature change and condensing.)
Storage humidity	10 to 90%

### 1-2-2 Hardware specification

Indicator LED	PW LED	Red	Lights up when the power is turned on.
	R/W LED	Yellow	Lights up when the radio wave is outputted.
	RF LED	Green	Lights up for reading and writing (user application control enabled)
Buzzer	Sounds for reading and writing or user application		
Size	81 (W) ×128 (D) ×17 (H) mm		
Weight	81g		
Power	USB bus power Maximum consumption current 250mA		
External interface	Standard	Compliant with USB Specification Rev 1.1 (High Power device)	
	Device class	COM class	
	Cable length	1.0m	
RFID part	Radio frequency	13.56MHz	
	Radio output	Maximum 100mW	
	Reading distance	0 to 5cm*1	
	Compatible tag	Tag-it HF-I, I-CODE SLI, my-d, FerVID family*2, I-CODE1	

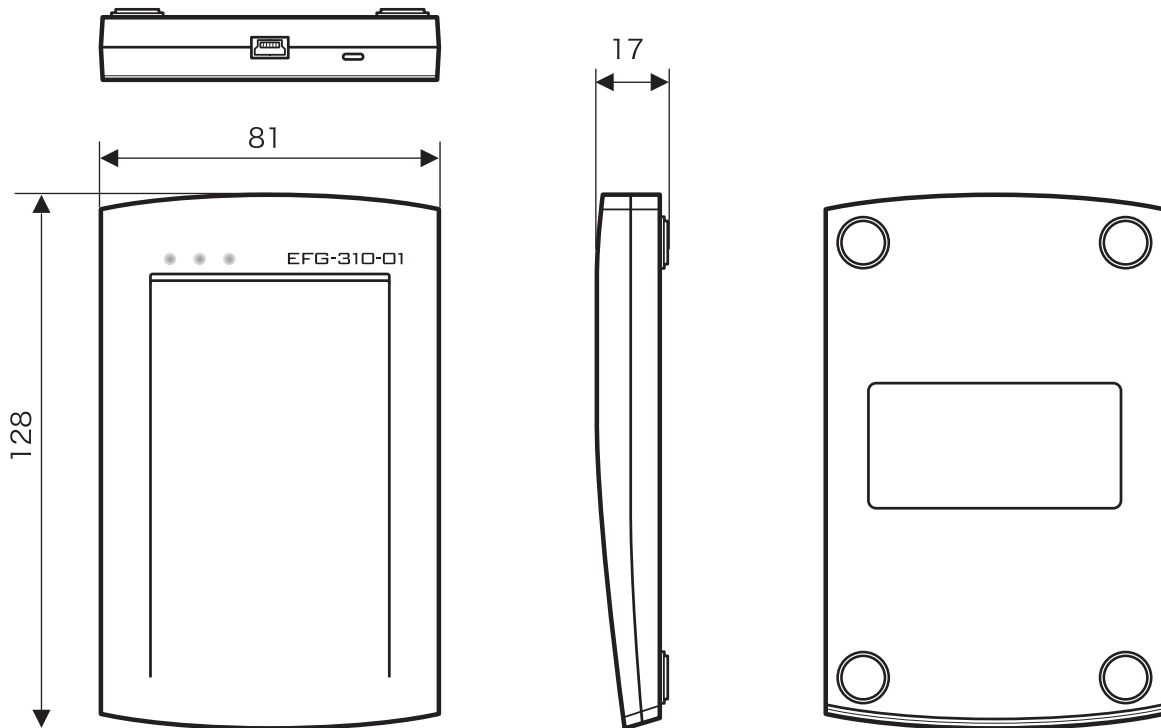
\*1 This may vary depending on the performance of the tag and the environment.

\*2 Compatible FerVID family is MB89R116/MB89R118.

**Caution**

Be sure to use a self-power HUB to connect it using a USB HUB.

### 1-2-3 Appearance specification



### 1-2-4 Operating environment

●Compatible OS (Japanese version)

- Windows XP
- Windows 2000

●Environment

- CD-ROM drive  
Required to install the driver
- USB connector  
One required to connect this product (A type)

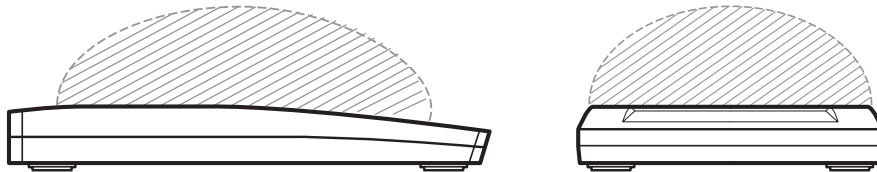
### 1-2-5 Communication interface specification

- Connector: USB miniB type connector
- Terminal function: Compliant with USB Specification Rev1.1
- Device class: COM class compliant with ( "Communication Device Class Abstract Control Model" )

## 1-3 How to hold the IC card/IC tag

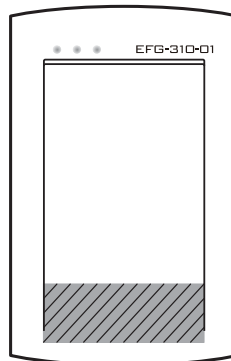
This equipment accesses the IC card/IC tag in the range shown by the shaded area in the figure below. Be careful not to let it go beyond the range during access.

Communication range: About 5cm from the center of the unit when the tag and the unit are held horizontally (for the credit card size)



### ■ To use a small tag

Use it within the following range.

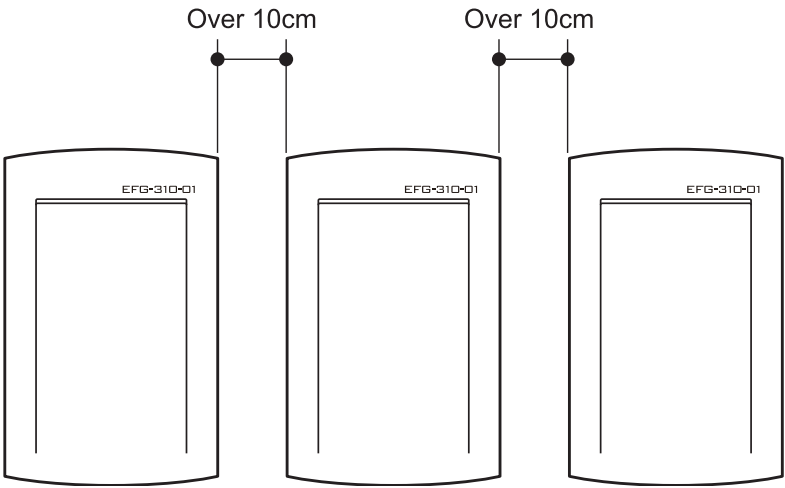


### Caution

If the tag used is extremely small, reading it may fail.

■ To use CSH-07334 laid side-by-side

To use CSH-07334 laid side-by-side, isolate CSH-07334 by about 10cm. If the distance is too close, the communication performance may be affected.



A large rectangular area in the top right of the slide features a green marbled texture. The marbling consists of swirling, vein-like patterns in various shades of green, ranging from dark forest green to lighter, almost white-green highlights.

# Chapter 2

Software

A thin, horizontal bar with the same green marbled texture as the larger block above it, positioned below the word 'Software'.

## 2-1 How to install the driver software

### 2-1-1 Installing the driver software

Install the driver software of CSH-07334 according to the following procedure.

**Caution**

Install the driver software before connecting CSH-07334.

**Operation**

- ① Turn on the power of your PC and start Windows.

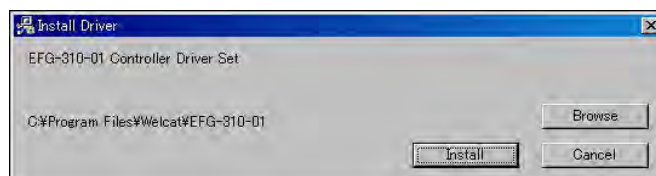
**Caution**

Log in with a system administrator authorization.

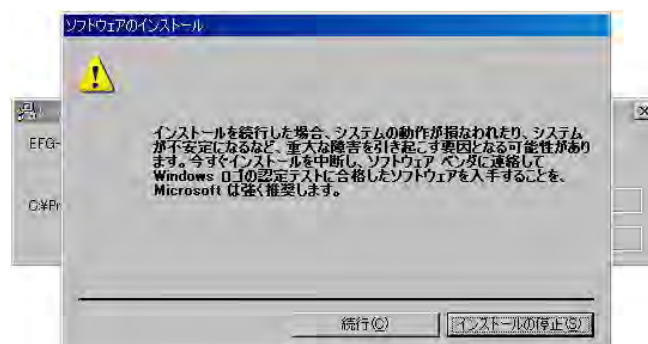
- ② Insert the CD-ROM bundled with the product into the CD-ROM drive.
- ③ Click [My computer]→[CD-ROM drive]→[CSH-07334]→[drivers]→[PreInstaller.exe].
- ④ Select a folder to install the driver and press the [Install] button.

**Caution**

The Welcat folder is created in the Program Files folder before installation by default.



- ⑤ The following screen appears during installation.

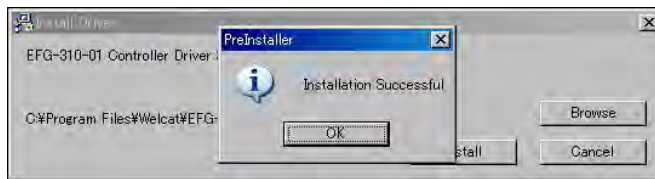


Microsoft performs a qualification procedure for PC units and peripheral devices in an organization called WHQL. CSH-07334 has not been qualified as of February, 2006.

Click [Continue] here to continue installation of the driver of CSH-07334.



- ⑥ When the following screen appears, click [OK] and take out the CD-ROM.



- ⑦ Use the attached cable to connect CSH-07334 to your PC.

If you use Windows2000, the installation operation is complete.

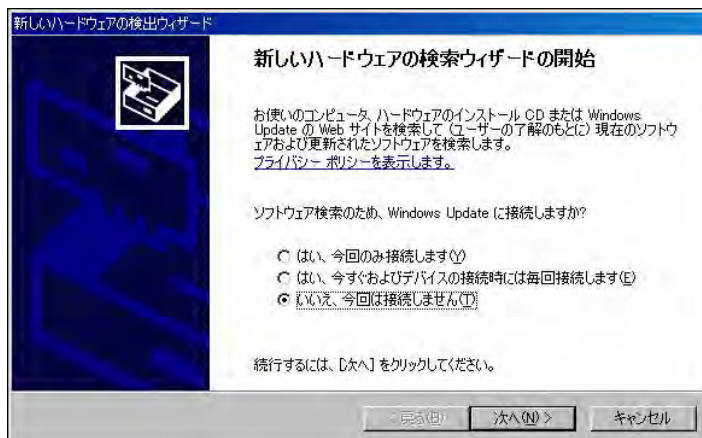
If you use WindowsXP, proceed to "2-1-2 Connecting to Windows XP"(P.2-3).

## 2-1-2 Connecting to Windows XP

If you use Windows XP, carry out the following setting after installing the driver software (P.2-2).

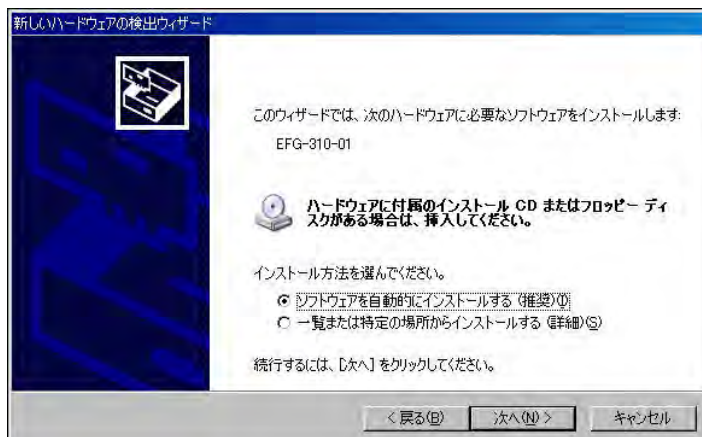
### Operation

- ① When you connect CSH-07334 to your PC, the following screen appears.

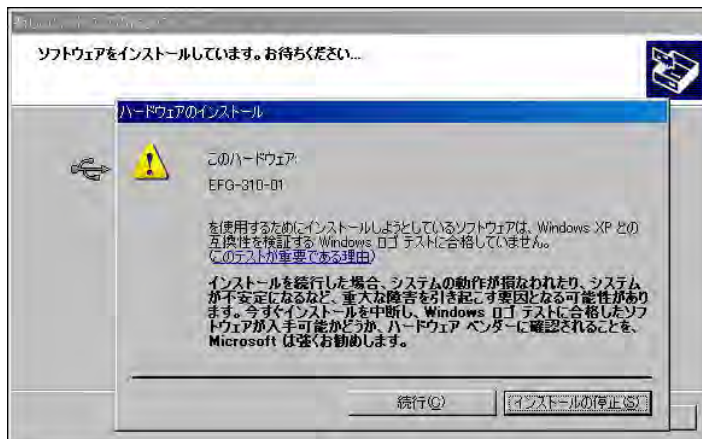


Select [No, I don't connect this time] and proceed to the next.

- ② Select [Install software automatically] and proceed to the next.



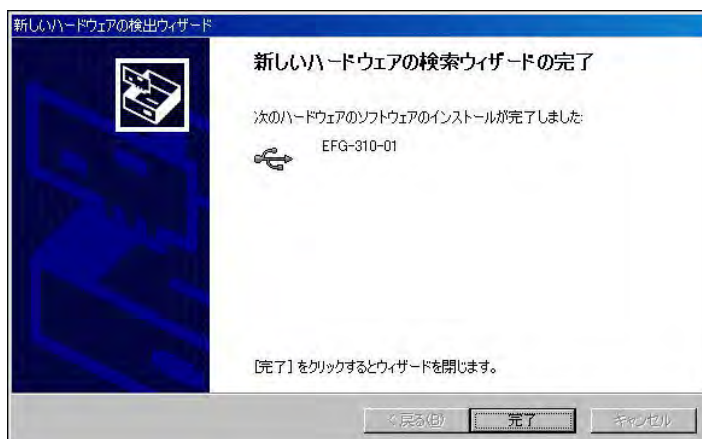
- ③ The following screen appears during installation.



Microsoft performs a qualification procedure for PC units and peripheral devices in an organization called WHQL. CSH-07334 has not been qualified as of February, 2006.

Click [Continue] here to continue installation of the driver of CSH-07334.

- ④ When the following screen appears, the driver of CSH-07334 has been installed.  
Click [Complete].



After this, installation of the driver starts again. Repeat the same procedure as that described in ① through ④.

## 2-2 Checking after connection

After installing the driver software, check if CSH-07334 is correctly connected.

### Operation

- ① Right-click [My Computer] and select [Property] or [Control].
- ② Double-click [Port (COM and LPT)] on the device manager screen ("Device manager" tab) and check that CSH-07334 is displayed.

The COM number varies depending on the environment of your PC.

- ③ When you have finished checking, close the screen.

**Caution**

Every time the USB port to which this product is connected changes, you need to install the driver software. In that case, install it in the same procedure.

## 2-3 Uninstalling the driver software

Uninstall the driver according to the following procedure.

### Operation

- ① Select [Adding and deleting programs] from [Control panel].
- ② Select [e-front CSH-07334 Controller] from the list and press [Change and delete] button to delete it.

#### Caution

- Keep CSH-07334 connected to your PC to uninstall the driver.
- Remove CSH-07334 from your PC after you have uninstalled the driver.

A large rectangular area in the top right of the page with a green marbled texture.

## Chapter 3

FAQ (Frequently asked questions)

A horizontal bar with a green marbled texture, matching the one above.

## 3-1 FAQ (Frequently asked questions)

This section describes frequently asked questions, troubles, items requiring checking to resolve those troubles and reference pages on this manual. Make an inquiry to our Website for those troubles you can not resolve here.

**Q : I connected CSH-07334 before installing the driver.**

**A :** Install the driver manually.

The driver software is included in the [Drivers] folder of the bundled CD-ROM. See the folder to install the driver.

**Q : CSH-07334 does not operate properly after installing the driver.**

**A :** The USB cable may not be connected properly.

Check that the USB connector is fully inserted into the USB port of your PC.

**A :** The driver may not be properly installed.

Install the driver in the following procedure again.

- ① See “2-3 Uninstalling the driver software” (P.2-6) to uninstall the driver.
- ② Turn off the power of your PC, remove CSH-07334 and turn on the power of your PC.
- ③ See “2-1-1 Installing the driver software” (P.2-2) to install the driver again.

**A :** CSH-07334 may be misidentified.

Install the driver in the following procedure again.

- ① When [Other devices] is displayed by [Device manager]  
Right-click [Unknown device] or [USB Device] displayed below and click [Delete].
- ② When [Other devices] is not displayed  
Select [Device (by connection)] from [Display] and check if there is [Unknown device] or [USB Device] under the USB host controller. If you find one, select the device and click [Delete] button.  
If you can't find any by searching, restart your PC and install the driver from the beginning again.
- ③ Turn off the power of your PC, remove CSH-07334 and turn on the power of your PC.
- ④ See “2-1-1 Installing the driver software” (P.2-2) to install the driver again.

**Q : A “!” mark is put on the beginning of “CSH-07334” on the [Device manager] screen.**

**A :** The driver may not be properly installed.

Install the driver in the following procedure again.

- ① See “2-3 Uninstalling the driver software” (P.2-6) to uninstall the driver.
- ② Turn off the power of your PC, remove CSH-07334 and turn on the power of your PC.
- ③ See “2-1-1 Installing the driver software” (P. 2-2) to install the driver again.

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IC Card / IC Tag Reader / Writer  
CSH-07334  
Users Manual

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