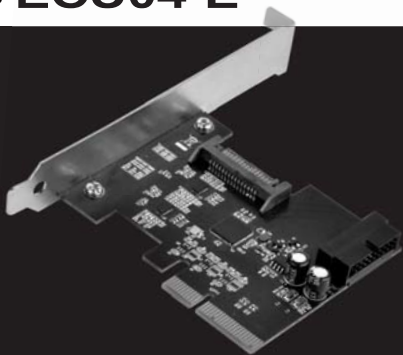




SILVERSTONE®
Designing Inspiration

Expansion Cards **ECU04-E**



USB 3.1 PCI Express card with internal 19pin connector

Installation and system optimization guide:

The following manual and guides were carefully prepared by the SilverStone engineering team to help you maximize the potential of your SilverStone product. Please keep this manual for future reference when upgrading or performing maintenance on your system. A copy of this manual can also be downloaded from our website at:

<http://www.silverstonetek.com>

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• Introduction

The SilverStone ECU04-E is a PCI-E Gen 2.0 x2 expansion card with one internal 19pin USB 3.1 connector (supporting two ports). It adds two redriver chips over the original ECU04 design for vastly improved performance over longer cable connections. This ensures dual 10Gbps bandwidth transfer rate can be maintained for up to 2 meters* compared with just 1 meter per USB 3.1's specified limitation. The ECU04-E is also backwards compatible with USB 3.0/2.0/1.1 and supports UASP (USB Attached SCSI Protocol) for enhanced performance. For operating systems with XHCI (eXtensible Host Controller Interface), the ECU04-E will easily install without the need for any drivers because it also supports XHCI. For those looking to upgrade or add additional USB 3.1 ports or devices to their computer, the ECU04-E is a great starting point.

**• Features**

- Includes ReDriver ASIC chips for overcoming 1 meter cable length limitation*
- Includes USB 3.1 internal 19pin connector
- PCI-E Gen 2.0 x2, throughput up to 10Gbps
- Compliant with eXtensible Host Controller Interface (XHCI) specification Revision 1.1
- Compliant with USB Attached SCSI Protocol (UASP) Revision 1.0
- Includes optional low profile slot cover for supporting low profile cases

• Specifications

Model No.	SST-ECU04-E
Power requirement	5V via SATA 15pin power connector
Form factor	Low profile - PCI-E 2.0 x2 (10Gbps)
USB 3.1 controller	ASMedia ASM1142
ReDriver ASIC	Pericom PI3EQX1002B
USB ports	Internal 19pin connector for dual USB 3.1 ports
Transmitting speed	USB 3.1 (10Gbps), USB 3.0 (5Gbps), USB 2.0 (480Mbps), USB 1.1 (12Mbps)
Operating system support	Windows 7 (32bit/64bit)**, 8/8.1/10 (32bit/64bit)***, Ubuntu/Linux/Mac OS****
Power Management	Support USB 3.1 and USB 2.0 link power management
Current protection	Support over current detection and protection
Extra	UASP function

* Total cable length includes case internal cabling plus external cabling. Sub-par cable thickness/quality and external port design/quality may also reduce supported length required for maximum performance.

** If your OS version is Windows 7 or earlier, please install driver (available from SilverStone website) prior to using the ECU04-E.

*** Windows 8, 8.1, or 10 supports ECU04-E automatically so you do not need to install additional driver for it.

**** User should check for XHCI function in Ubuntu/Linux or Mac OS, if computer system supports XHCI function then it can support ECU04-E automatically without additional driver installation.

Installation Guide

01

ENGLISH

Install ECU04-E into PCI-E slot on the motherboard

DEUTSCH

Installieren Sie die ECU04-E im PCI-E-Steckplatz am Motherboard

FRANÇAIS

Installez l'ECU04-E dans l'emplacement PCI-E de la carte mère

ESPAÑOL

Instale el ECU04-E en el zócalo PCI-E de la placa base

ITALIANO

Installare ECU04-E nell'alloggio PCI-E sulla scheda madre

РУССКИЙ

Установите карту ECU04-E в слот PCI-E на системной плате

繁體中文

將ECU04-E安裝於主機板上的PCI-E插槽

簡體中文

将ECU04-E安装于主板上的PCI-E插槽

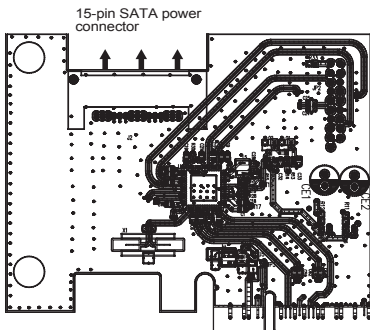
日本語

マザーボードのPCI-EスロットにECU04-Eをインストールします

한국어

메인보드의 PCI-E 슬롯에 ECU04-E를 설치합니다

02

**ENGLISH**

Connect to 15pin SATA power connector

DEUTSCH

Mit einem 15-poligen SATA-Stromanschluss verbinden

FRANÇAIS

Connexion au connecteur d'alimentation SATA à 15 broches

ESPAÑOL

Enchufe el conector de potencia SATA de 15 pines

ITALIANO

Collegare al connettore di alimentazione SATA a 15 pin

РУССКИЙ

Подключите 15-контактный разъем питания SATA

繁體中文

將15pin SATA電源線接上

简体中文

将15pin SATA电源线接上

日本語

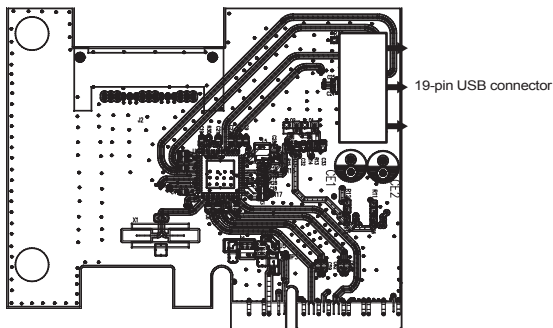
15ピンSATA電源コネクタに接続します

한국어

15핀 SATA 전원 커넥터에 연결합니다

Installation Guide

03

**ENGLISH**

Connect to internal 19pin USB 3.1 connectors (refer to illustration)

DEUTSCH

Mit internen 19-poligen USB 3.1-Anschlüssen verbinden (Vgl. Abbildung)

FRANÇAIS

Connexion aux connecteurs internes USB 3.1 à 19 broches (voir l'illustration)

ESPAÑOL

Enchufe los conectores internos USB 3.1 de 19 pines (consulte la ilustración)

ITALIANO

Collegare ai connettori interni USB 3.1 a 19 pin (Fare riferimento all'illustrazione)

РУССКИЙ

Подключите встроенные 19-контактные разъемы USB 3.1 (см. рисунок)

繁體中文

連接內接19pin USB 3.1線材 (請參考圖示)

簡體中文

连接内接19pin USB 3.1线材 (请参考图示)

日本語

内部19ピンUSB 3.1コネクタに接続します (図を参照)

한국어

내장형 19핀 USB 3.1 커넥터에 연결합니다 (그림 참조)

04**ENGLISH**

Plug in your USB 3.1 device and enjoy the 10Gbit/s USB 3.1 super speed transfer rate

DEUTSCH

Schließen Sie Ihr USB 3.1-Gerät an und genießen die USB 3.1-Super-Speed-Übertragungsgeschwindigkeit von 10 Gbit/s

FRANÇAIS

Branchez votre périphérique USB 3.1 et bénéficiez du taux de transfert de 10 Gbit/s de l'USB 3.1 SuperSpeed

ESPAÑOL

Conecte su dispositivo USB 3.1 y disfrute de la súper velocidad de transferencia de 10Gbit/s de USB 3.1

ITALIANO

Collegare il dispositivo USB 3.1 per apprezzare la velocità di trasferimento Super Speed USB 3.1 10 Gbit/s

РУССКИЙ

Подключите устройство с интерфейсом USB 3.1 и передавайте данные со скоростью 10 Гбит/с через разъем USB 3.1

繁體中文

連接USB 3.1裝置並開始享受高速傳輸速度

簡體中文

连接USB 3.1装置并开始享受高速传输速度

日本語

デバイスを接続して、USB 3.1の超高速転送速度10Gbit/sを実感できます

한국어

USB 3.1 장치를 연결하면 10Gbit/s USB 3.1 초고속 전송 속도를 이용할 수 있습니다

Attention

1. In windows 7 or previous version, please install the ASM1142 driver to enable SuperSpeed USB 3.1 performance.
2. Windows 8, 8.1, or 10 supports ECU04-E automatically so you do not need to install additional driver for it.
3. User should check for XHCI function in Ubuntu/Linux or Mac OS, if computer system supports XHCI function then it can support ECU04-E automatically without additional driver installation.

DEUTSCH

Achtung

1. Unter Windows 7 oder älteren Versionen installieren Sie bitte den ASM1142-Treiber zur Realisierung von USB 3.1-Super-Speed-Leistung.
2. Windows 8, 8.1 oder 10 unterstützen die ECU04-E automatisch, wodurch Sie keinen zusätzlichen Treiber installieren müssen.
3. Nutzer sollten Ubuntu/Linux oder Mac OS auf XHCI-Funktion prüfen; falls das Computersystem XHCI unterstützt, kann die ECU04-E automatisch ohne zusätzlichen Treiber genutzt werden.

FRANÇAIS

Attention

1. Sur Windows 7 ou les versions précédentes, veuillez installer le pilote ASM1142 pour bénéficier des performances de l'USB 3.1 SuperSpeed.
2. Windows 8, 8.1 et 10 prennent en charge automatiquement l'ECU04-E; vous ne devez donc pas installer de pilote supplémentaire dédié.
3. L'utilisateur doit vérifier la présence de la fonction XHCI dans Ubuntu/Linux ou Mac OS ; si le système informatique prend en charge la fonction XHCI il peut prendre en charge automatiquement l'ECU04-E sans installation de pilote supplémentaire.

ESPAÑOL

Atención

1. En Windows 7 o versiones previas, por favor instale el controlador ASM1142 para activar el rendimiento de súper velocidad de USB 3.1.
2. Windows 8, 8.1, u 10 acepta el ECU04-E automáticamente, por lo que no necesita instalar controladores adicionales.
3. El usuario debería comprobar la función XHCI en Ubuntu/Linux o Mac OS, si el sistema acepta la función XHCI, entonces aceptará el ECU04-E automáticamente sin necesidad de instalar controladores adicionales.

ITALIANO

Attenzione

1. Su Windows 7 o versione precedente, installare il driver ASM1142 per consentire le prestazioni USB 3.1 SuperSpeed.
2. Windows 8, 8.1, o 10 supporta automaticamente ECU04-E, quindi non è necessario installare alcun driver aggiuntivo.
3. È necessario verificare la funzione XHCI su Ubuntu/Linux o Mac OS; se il sistema del computer supporta la funzione XHCI allora può supportare automaticamente ECU04-E senza installazione di driver aggiuntivi.

Installation Guide

РУССКИЙ

Внимание

1. В ОС Windows 7 или предыдущих версиях установите драйвер ASM1142 для включения функции SuperSpeed USB 3.1.
2. В ОС Windows 8, 8.1, или 10 карта ECU04-E поддерживается автоматически, поэтому установка дополнительного драйвера не требуется.
3. Пользователь должен проверить наличие функции XHCI в ОС Ubuntu/Linux или Mac OS, если ОС компьютера поддерживает функцию XHCI, то карта ECU04-E поддерживается автоматически без необходимости установки дополнительного драйвера.

繁體中文

注意事項

1. 若您使用 Windows 7 或舊版作業程式，請先安裝 ASM1142 驅動程式，然後再開始享受高速傳輸速度的 ECU04-E。
2. ECU04-E 已經支援 Windows 8, 8.1 或 10，所以當您使用 ECU04-E 時，不用安裝驅動程式就可使用。
3. 當您使用 ECU04-E 前，請確認您的 Ubuntu/Linux 或 Mac 作業系統是否支援 XHCI 功能，若已經支援 XHCI 功能，不用安裝驅動程式就可使用。

簡體中文

注意事项

1. 若您使用 Windows 7 或旧版作业程序，请先安装 ASM1142 驱动程序，然后再开始享受高速传输速度的 ECU04-E。
2. ECU04-E 已经支持 Windows 8, 8.1 或 10 所以当您使用 ECU04-E 时，不用安装驱动程序就可使用。
3. 当您使用 ECU04-E 前，请确认您的 Ubuntu/Linux 或 Mac 操作系统是否支持 XHCI 功能，若已经支持 XHCI 功能，不用安装驱动程序就可使用。

日本語

注意

1. Windows 7 または以前のバージョンでは、SuperSpeed USB 3.1 機能を有効にするには ASM1142 ドライバをインストールしてください。
2. Windows 8, 8.1 および 10 では自動的に ECU04-E に対応するので、ドライバを別途インストールする必要はありません。
3. Ubuntu/Linux または Mac OS において XHCI 機能への対応の有無はユーザーによる確認が必要です。コンピューターシステムが XHCI 機能に対応している場合は、ドライバの別途インストールは不要で自動的に ECU04-E に対応します。

한국어

주의

1. Windows 7 이전 버전의 경우, SuperSpeed USB 3.1 성능을 사용하려면 ASM1142 드라이버를 설치하십시오.
2. Windows 8, 8.1 또는 10은 ECU04-E를 자동으로 지원하기 때문에 드라이버를 추가적으로 설치할 필요가 없습니다.
3. 사용자는 Ubuntu/Linux 또는 Mac OS에서 XHCI를 확인해야 하고, 컴퓨터 운영 체제가 XHCI 기능을 지원할 경우 드라이버의 추가 설치 없이 ECU04-E를 자동으로 지원할 수 있습니다.

有毒有害物质/元素及其化学含量表

部件名称	铅 Pb	汞 Hg	镉 Cd	六价铬 Cr (VI)	多溴联苯 PBB	多溴二苯醚 PBDE
bracket (金属)	○	○	○	○	○	○
螺丝	○	○	○	○	○	○
ECU04-E PCBA	○	○	○	○	○	○
包材	○	○	○	○	○	○

○：表示该有毒有害物质在该部件所有均质材料中的含量均在
SJ/T11363-2006标准规定的限量要求以下。

×：表示该有毒有害物质在该部件材料中的含量超出
SJ/T11363-2006标准规定的限量要求。

本表中有×的部件均符合欧盟RoHS法规，即欧盟第2002/95/EC号指令要求。

产品合格证

检验员：检01

生产日期：见产品条码

制造商：东莞市银石贸易有限公司

Warranty

This product has a limited 1 year warranty in North America and Australia.

For information on warranty periods in other regions, please contact your reseller or SilverStone authorized distributor.

Warranty terms & conditions

- Product component defects or damages resulted from defective production is covered under warranty.
Defects or damages with the following conditions will be fixed or replaced under SilverStone Technology's jurisdiction.
 - Usage in accordance with instructions provided in this manual, with no misuse, overuse, or other inappropriate actions.
 - Damage not caused by natural disaster (thunder, fire, earthquake, flood, salt, wind, insect, animals, etc...)
 - Product is not disassembled, modified, or fixed. Components not disassembled or replaced.
 - Warranty mark/stickers are not removed or broken.Loss or damages resulted from conditions other than ones listed above are not covered under warranty.
- Under warranty, SilverStone Technology's maximum liability is limited to the current market value for the product (depreciated value, excluding shipping, handling, and other fees). SilverStone Technology is not responsible for other damages or loss associated with the use of product.
- Under warranty, SilverStone Technology is obligated to repair or replace its defective products. Under no circumstances will SilverStone Technology be liable for damages in connection with the sale, purchase, or use including but not limited to loss of data, loss of business, loss of profits, loss of use of the product or incidental or consequential damage whether or not foreseeable and whether or not based on breach of warranty, contract or negligence, even if SilverStone Technology has been advised of the possibility of such damages.
- Warranty covers only the original purchaser through authorized SilverStone distributors and resellers and is not transferable to a second hand purchaser.
- You must provide sales receipt or invoice with clear indication of purchase date to determine warranty eligibility.
- If a problem develops during the warranty period, please contact your retailer/reseller/SilverStone authorized distributors or SilverStone <http://www.silverstonetek.com>.
Please note that: (i) You must provide proof of original purchase of the product by a dated itemized receipt; (ii) You shall bear the cost of shipping (or otherwise transporting) the product to SilverStone authorized distributors. SilverStone authorized distributors will bear the cost of shipping (or otherwise transporting) the product back to you after completing the warranty service; (iii) Before you send the product, you must be issued a Return Merchandise Authorization ("RMA") number from SilverStone. Updated warranty information will be posted on SilverStone's official website. Please visit <http://www.silverstonetek.com> for the latest updates.

Additional info & contacts

For North America (usasupport@silverstonetek.com)

SilverStone Technology in North America may repair or replace defective product with refurbished product that is not new but has been functionally tested.

Replacement product will be warranted for remainder of the warranty period or thirty days, whichever is longer. All products should be sent back to the place of purchase if it is within 30 days of purchase, after 30 days, customers need to initiate RMA procedure with SilverStone Technology in USA by first downloading the "USA RMA form for end-users" form from the below link and follow its instructions.

<http://silverstonetek.com/contactus.php>

For Australia only (support@silverstonetek.com)

Our goods come with guarantees that cannot be excluded under the Australian Consumer Law.

You are entitled to a replacement or refund for a major failure and for compensation for any other reasonably foreseeable loss or damage.

You are also entitled to have the goods repaired or replaced if the goods fail to be of acceptable quality and the failure does not amount to a major failure.

Please refer to above "Warranty terms & conditions" for further warranty details.

SilverStone Technology Co., Ltd. 12F No. 168 Jiankang Rd., Zhonghe Dist.,
New Taipei City 235 Taiwan R.O.C. + 886-2-8228-1238
(standard international call charges apply)

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