

Data Sheet

PRIMERGY RX1440 M2 Rack Server

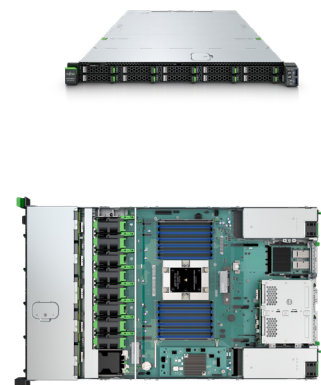
Scalable server for memory intensive business applications

Fujitsu offers a fantastic blend of systems, solutions and expertise to guarantee maximum productivity, efficiency and flexibility, delivering confidence and reliability. PRIMERGY servers deliver workload-optimized x86 industry standard systems for any workload and business demand. Since there is no single server solution to meet all these needs, Fujitsu offers a broad server portfolio consisting of expandable tower servers, versatile rack-mount servers, density-optimized multi-node servers as well as GPU servers purpose-built for the demands of AI and VDI. While all these systems are designed to handle multiple workloads, each server is optimized for specific use cases. Whatever the size of your business – large enterprise with multiple sites, or a small or medium-sized company with limited space and budget – with the right choice of server, your IT can become the business enabler you have always wanted it to be.

PRIMERGY RX1440 M2

The PRIMERGY Server RX1440 M2 is a mono-socket 1U rack server that delivers impressive performance together with exceptional memory configuration options. Powered by the 4th or 5th Gen AMD EPYC™ processors and huge DDR5 memory, the server system is ideal for traditional and emerging workloads such as AI machine learning, HCI, VDI solutions, and other data intensive workloads. The PRIMERGY RX1440 M2 can be equipped with the 4th or 5th Gen AMD EPYC™ CPU featuring up to 160 cores. PRIMERGY RX1440 M2 provides a Platform Firmware Resilience (PFR) feature to help protect against platform firmware attacks and is designed to detect and correct them before they can compromise or disable the machine. Along with enhanced DDR5 memory technology supporting 6,000 MT/s, the server features enormous memory capacity of up to 6TB provided by 24 DIMM slots. The instructions per clock increase of the latest AMD EPYC™ processors compared to the previous

generation as well as the large maximum memory size provide great AI machine learning, analytics, and application density. The design of the server offers balanced expandability with up to 10 hot-plug 2.5" storage devices (opt. Upgrade kit +3x or 2x 2.5-inch rear bays) as well as up to 3 (+1) PCIe 5.0 expansion slots. In order not to waste the disk capacity in the front of the chassis, the system also offers other advanced features such as SSD SATA M.2 devices for efficient boot requirements. PCIe 5.0 delivers double the I/O performance over PCIe 4.0, provides 128 PCIe lanes. Moreover, the server can be equipped with different kinds of NVIDIA GPU cards. The PRIMERGY RX1440 M2 comes with two redundant 900 / 2400W high-efficiency (Titanium Level) power supply units and in total 7 +1 hot-plug redundant fan modules with speed control providing efficient system cooling.



Features & Benefits

Main Features	Benefits
<p>EFFICIENT, HIGH PERFORMANCE COMPUTING</p> <ul style="list-style-type: none"> With up to 160 cores in a single-socket configuration, 24 DIMMs, 6 TB memory capacity, as well as support for up to 10 (+3) storage devices, the PRIMERGY RX1440 M2 server system is ideal for traditional and emerging workloads such as generative AI machine learning, analytics, VDI solutions, HPC and other data-intensive workloads. The PRIMERGY supported processor offerings include a wide range of core counts (from 8 cores up to 160 cores), frequencies (up to 5 GHz), the latest DDR5-5600 and DDR5-6400 memory modules, cache capacities, TDP levels and competitive cost points. <p>EXPANDABILITY AND DENSITY</p> <ul style="list-style-type: none"> The server system offers the possibility of using up to 10 (+2 or +3) x 2.5-inch storage devices. There is also the option of expanding the server using a total of 3x PCIe plus 1x internal RAID 5.0 slots. The server can be equipped with different kinds of NVIDIA GPU cards. <p>AGILE INFRASTRUCTURE MANAGEMENT</p> <ul style="list-style-type: none"> Infrastructure Manager (ISM) provides seamless, holistic management ensuring that IT infrastructures retain the dynamic flexibility required to support ever-changing business demands. Two versions of ISM are available. ISM Advanced is a powerful, fully featured version offering comprehensive infrastructure management capabilities such as support for multiple hardware configurations, physical and virtual network connection indicators and firmware baseline updates. A free entry-level version, ISM Essential, provides essential monitoring and firmware update of all supported devices, including servers, storage and network switches. <p>SECURITY</p> <ul style="list-style-type: none"> PRIMERGY RX1440 M2 equipped with AMD EPYC™ 9004 / 9005 processor boast a set of advanced security features, called AMD Infinity Guard, which includes the AMD secure processor, Secure Memory Encryption (SME), and Secure Encrypted Virtualization (SEV). All of these features help minimize potential attack surfaces as software is booted and executed and processes your critical data. 	<ul style="list-style-type: none"> The versatile PRIMERGY RX1440 M2 server with AMD EPYC™ 9004 / 9005 processors shortens time to value for IT organizations running demanding workloads. Agile and data-driven companies modern platforms that scale easily and are optimized for application performance. The PRIMERGY RX1440 M2 is built upon a mono system architecture but provides high amount of cores, exceptional broad memory configuration options and flexibility to meet performance demands. As you scale your infrastructure, scale your profitability with Fujitsu Software Infrastructure Manager (ISM). ISM enables organizations to have centralized control over the entire data center, which includes servers, storage, networking, as well as power and cooling using a single user interface. Designed with security in mind, AMD EPYC™ 9004 / 9005 series processors help protect your CPU, applications, and data. With features such as AMD Secure Boot, there is an improved layer of security and firmware advanced persistent threats are mitigated. Platform Firmware Resilience (PFR) is provided by the PRIMERGY RX1440 M2.

Technical details

PRIMERGY RX1440 M2				
Base unit	PRIMERGY RX1440 M2	PRIMERGY RX1440 M2	PRIMERGY RX1440 M2	PRIMERGY RX1440 M2
Housing types	Rack	Rack	Rack	Rack
Storage drive architecture	8x 2.5-inch SAS/SATA	4x 3.5-inch SAS/SATA	10x 2.5-inch SAS/SATA/PCIe	10x 2.5-inch SATA/NVMe
Power supply	Hot-plug	Hot-plug	Hot-plug	Hot-plug
Product Type	Mono Socket Rack Server	Mono Socket Rack Server	Mono Socket Rack Server	Mono Socket Rack Server
Mainboard				
Mainboard type	D4130			
Chipset	System on Chip (SoC)			
Processor quantity and type	1 x AMD EPYC™ 9004 series processor / AMD EPYC™ 9005 series processor			
AMD EPYC 9004 Series				
	AMD EPYC™ 9124 (16C, 3.0 GHz, TLC: 64 MB, 200 W)			
	AMD EPYC™ 9174F (16C, 4.1 GHz, TLC: 256 MB, 320 W)			
	AMD EPYC™ 9184X (16C, 3.55 GHz, TLC: 768 MB, Max Boost: 3.80 GHz, 320 W)			
	AMD EPYC™ 9224 (24C, 2.5 GHz, TLC: 64 MB, 200 W)			
	AMD EPYC™ 9254 (24C, 2.9 GHz, TLC: 128 MB, 200 W)			
	AMD EPYC™ 9274F (24C, 4.05 GHz, TLC: 256 MB, 320 W)			
	AMD EPYC™ 9354P (32 C, 3.25 GHz, TLC: 256 MB, 280 W)			
	AMD EPYC™ 9384X (32 C, 3.1 GHz, TLC: 768 MB, 320 W)			
	AMD EPYC™ 9454P (48C, 2.75 GHz, TLC: 256 MB, 290 W)			
	AMD EPYC™ 9534 (64 cores, 2.45 GHz, TLC: 256 MB, 280 W)			
	AMD EPYC™ 9554P (64 cores, 3.1 GHz, TLC: 256 MB, 360 W)			
	AMD EPYC™ 9634 (84C, 2.25 GHz, TLC: 384 MB, 290 W)			
	AMD EPYC™ 9654P (96 cores, 2.4 GHz, TLC: 384 MB, 360 W)			
	AMD EPYC™ 9754 (128C, 2.25 GHz, TLC: 256 MB, Max Boost: 3.10 GHz, 360 W)			
AMD EPYC 9005 series				
	AMD EPYC™ 9015 (8C, 3.6 GHz, TLC: 64 MB, Max Boost: 4.10 GHz, 6000 MT/s, 125 W)			
	AMD EPYC™ 9115 (16C, 2.6 GHz, TLC: 64 MB, Max Boost: 4.10 GHz, 6000 MT/s, 125 W)			
	AMD EPYC™ 9135 (16C, 3.65 GHz, TLC: 64 MB, Max Boost: 4.30 GHz, 6000 MT/s, 200 W)			
	AMD EPYC™ 9355 (32 C, 3.55 GHz, TLC: 256 MB, Max Boost: 4.40 GHz, 6000 MT/s, 280 W)			
	AMD EPYC™ 9375F (32 C, 3.8 GHz, TLC: 256 MB, Max Boost: 4.80 GHz, 6000 MT/s, 320 W)			
	AMD EPYC™ 9455 (48C, 3.15 GHz, TLC: 256 MB, Max Boost: 4.40 GHz, 6000 MT/s, 300 W)			
	AMD EPYC™ 9475F (48C, 3.65 GHz, TLC: 256 MB, Max Boost: 4.80 GHz, 6000 MT/s, 400 W)			
	AMD EPYC™ 9555 (64 cores, 3.2 GHz, TLC: 256 MB, Max Boost: 4.40 GHz, 6000 MT/s, 360 W)			
	AMD EPYC™ 9575F (64C, 3.3 GHz, TLC: 256 MB, Max Boost: 5.00 GHz, 6000 MT/s, 400 W)			
	AMD EPYC™ 9655 (96 cores, 2.6 GHz, TLC: 384 MB, Max Boost: 4.50 GHz, 6000 MT/s, 400 W)			
	AMD EPYC™ 9745 (128C, 2.4 GHz, TLC: 256 MB, Max Boost: 3.70 GHz, 6000 MT/s, 400 W)			
	AMD EPYC™ 9845 (160C, 2.1 GHz, TLC: 320 MB, Max Boost: 3.70 GHz, 6000 MT/s, 390 W)			
Processor notes	single CPU support, no exchange of CPU generation			
Memory slots	24 (24 DIMMs per CPU)			
Memory slot type	DIMM (DDR5)			
Memory capacity (min. - max.)	16 GB - 6 TB			
Memory protection	Advanced ECC			
Memory notes	for the Genoa system, Mix and match of modules with different capacity and rank or from different manufacturers weren't possible.			

Standard memory modules	16 GB (1 module(s) 16 GB) DDR5, registered, ECC, 4,800 MT/s, PC5-38400, DIMM, 1Rx8			
	16 GB (1 module(s) 16 GB) DDR5, registered, ECC, 5,600 MT/s, PC5-44800, DIMM, 1Rx8			
	32 GB (1 module(s) 32 GB) DDR5, registered, ECC, 4,800 MT/s, PC5-38400, DIMM, 1Rx4			
	32 GB (1 module(s) 32 GB) DDR5, registered, ECC, 4,800 MT/s, PC5-38400, DIMM, 2Rx8			
	32 GB (1 module(s) 32 GB) DDR5, registered, ECC, 5,600 MT/s, PC5-44800, DIMM, 1Rx4			
	32 GB (1 module(s) 32 GB) DDR5, registered, ECC, 5,600 MT/s, PC5-44800, DIMM, 2Rx8			
	64 GB (1 module(s) 64 GB) DDR5, registered, ECC, 4,800 MT/s, PC5-38400, DIMM, 2Rx4			
	64 GB (1 module(s) 64 GB) DDR5, registered, ECC, 5,600 MT/s, PC5-44800, DIMM, 2Rx4			
	96 GB (1 module(s) 96 GB) DDR5, registered, ECC, 5,600 MT/s, PC5-44800, DIMM, 2Rx4			
	128 GB (1 module(s) 128 GB) DDR5, registered, ECC, 4,800 MT/s, PC5-38400, DIMM, 4Rx4			
	256 GB (1 module(s) 256 GB) DDR5, registered, ECC, 4,800 MT/s, PC5-38400, DIMM, 8Rx4			
	256 GB (1 module(s) 256 GB) DDR5, registered, ECC, 5,600 MT/s, PC5-44800, DIMM, 8Rx4			
	Interfaces			
USB 3.x ports	4 x USB 3.0 (2x rear, 2x front)			
Graphics (15-pin)	1 x VGA (1x rear)			
Serial 1 (9-pin)	1 x Serial (1x rear)			
Management LAN (RJ45)	1 x dedicated management LAN port for iRMC S6 (10/100/1000 Mbit/s)			
Onboard or integrated Controller				
RAID controller	All hardware storage controller options are described under Components For dedicated base units front AND rear storage drives may be connected to a single controller. Please see relevant system configurator for configuration options and restrictions.			
LAN Controller	Dynamic LoM via OCP slot; OCPv3 compliant Optional OCP adaptors: 4 x 1 Gbit/s Ethernet (RJ45) 2 x 10 Gbit/s Ethernet (RJ45) 4 x 10 Gbit/s Ethernet (RJ45) 2 x 10 Gbit/s SFP+ 4 x 10 Gbit/s SFP+ 2 x 25 Gbit/s SFP28 4 x 25 Gbit/s SFP28 2x 100 Gbit/s QSFP28 All supported features are described in relevant system configurator.			
Remote management controller	Integrated Remote Management Controller (iRMC S6, 1024 MB attached memory incl. graphics controller)			
GPU / coprocessor	GFX/GPU support for dedicated base units. Please see relevant WebArchitect for details and restrictions.			
Trusted Platform Module (TPM)	Infineon / TPM 2.0 module, FIPS; TCG compliant (option)			
Slots				
Slot Notes	Standard Rear Type: 3x HHHL PCIe slot + 2x OCPv3 Optional Rear Type 1: 2x FHHL PCIe slot + 2x OCPv3 Optional Rear Type 2: 2x 2.5" HDD + 1 x FHHL PCIe slot 2x OCPv3 Stretch Goal: 3x 2.5" HDD + 2x OCPv3			
Drive bays (Base unit specific)				
Storage drive bays	Up to 10: 10x 2.5-inch SATA/SAS/NVMe (PCIe SSD)			
Accessible drive bays	1 x 5.25/9.5mm for DVD-RW/Blu-ray			
Notes accessible drives	All possible options described in relevant system configurator.			
Optional hard disk bays	2x/3x 2.5-inch hot-plug SAS/SATA/PCIe rear option			
Drive bays (Base unit specific)				
Storage drive bays	up to 8x 2.5" (SFF) hot-plug drives (SAS/SATA)	up to 4x 3.5" (LFF) hot-plug drives (SAS/SATA)	up to 10x 2.5" (SFF) hot-plug drives (SAS/SATA)	up to 10x 2.5" (SFF) hot-plug drives (PCIe_NVMe)
Optional accessible drives	Ultra slim 9.5mm optical drive (optional)	Ultra slim 9.5mm optical drive (optional)		
General system information				
Number of fans	8			
Fan configuration	The fans are controlled to guarantee a reliable system cooling in combination with utmost silence.			
Fan notes	FOXCONN/ PIA060M12H-P11-AB			

Operating panel

Operating buttons	On/off switch ID button Reset button NMI button
Status LEDs	At system front side: Power (DC-On: green / AC-On: white) Identification(Blue-on: Activated by ID switch / Blue-flashing: Activated by IRMC) CSS (orange) Customer self service(Orange-on: Pre-failure detected /Orange-flashing: Error) Global error LED(Orange-on: Pre-failure / Orange-flashing: Error) LAN link/transfer(Green-on: LAN link / Green-Flashing: LAN transfer) LAN speed(Off: 10 Mbit/s / Green: 100 Mbit/s / Yellow: 1000 Mbit/s) Hard disks access (green)

BIOS

BIOS features	UEFI compliant BIOS Flash EPROM update by software BIOS settings save and restore IPv4/IPv6 remote PXE support IPv4/IPv6 remote PXE & iSCSI boot support MCTP support Local BIOS update from USB device Secure boot support
---------------	--

Operating Systems and Virtualization Software

Certified or supported operating systems and virtualization software	Windows Server 2022 Datacenter Windows Server 2022 Standard VMware vSphere™ 8.0 VMware vSphere™ 7.0 SUSE® Linux Enterprise Server 15 Red Hat® Enterprise Linux 8
Operating system release link	http://docs.ts.fujitsu.com/dl.aspx?id=d4ebd846-aa0c-478b-8f58-4cfbf3230473
Operating system notes	Support of other Linux derivatives on demand Use of certified or supported operating systems and virtualization software is subject to proactive acceptance of the respective License Agreements/ EULAs/ Subscription and support terms of the Software manufacturer as applicable for the relevant Software whether preinstalled or optional. The software may only be available bundled with a software support subscription which – depending on the Software - may be subject to separate remuneration.

Infrastructure and Server Management

DC Infrastructure Management	Infrastructure Manager (ISM) Essential Edition Advanced Edition
Server Management	ServerView Agentless Service (SVAS) ServerView ESXi CIM Provider ServerView Installation Manager (SVIM) ServerView Update Manager Express (UME)
Management notes	For further information regarding ISM and ServerView Suite see dedicated data sheets.
Manageability link	http://docs.ts.fujitsu.com/dl.aspx?id=9e92297a-16fb-4c69-8559-e38e7b42fee6

Dimensions / Weight

Rack (W x D x H)	483 x 842 x 43 mm
Height Unit Rack	1 U
19" rackmount	Yes
Weight	up to 18.9 kg
Weight notes	Actual weight may vary depending on configuration
Rack integration kit	Rack integration kit

Environment

Operating ambient temperature	10 - 35 °C
-------------------------------	------------

Environment

Operating temperature note	PRIMERGY servers are designed for the usage with operating temperatures of up to 35°C. There could be configurations that are not able to work within this normal operation class. Please use the Fujitsu WebArchitect (www.fujitsu.com/configurator/public) to get detailed information on the corresponding configurations.
Operating relative humidity	8 - 85% (non condensin), maximum dew point 21°C (non condensing)
Operating environment	FTS 04230 – Guideline for Data Center (installation specification)
Operating environment link	http://docs.ts.fujitsu.com/dl.aspx?id=e4813edf-4a27-461a-8184-983092c12dbe
Noise emission	According to ISO9296
Sound pressure (LpAm)	34 dB(A) (idle) / 38 dB(A) (operating) typical Values
Sound power (LWAd; 1B = 10dB)	5.2 B (idle) / 5.7 B (operating) typical Values
Noise notes	Noise emissions depends on operation modes, system configuration and ambient temperature.

Electrical values

Power supply configuration	1x hot-plug power supply or 2x hot-plug power supply for redundancy
Hot-plug power supply redundancy	Yes
Active power (max. configuration)	2,608.6 W
Apparent power (max. configuration)	2570 VA
Heat emission (max. configuration)	9391.0 kJ/h (8900.9 BTU/h)
Rated current max.	12A (100-127 V) / 15A (200-240 V)
Power supply	900W hot-plug, 94% (Platinum efficiency), 100-240V, 50 / 60Hz 900W hot-plug, 96% (Titanium efficiency), 200-240V, 50 / 60Hz 1600W hot-plug, 94% (Platinum efficiency), 100-240V, 50 / 60Hz 1600W hot-plug, 94% (Platinum efficiency), 200-240V, 50 / 60Hz 2200W hot-plug, 94% (Platinum efficiency), 100-240V, 50 / 60Hz 2400W hot-plug, 96% (Titanium efficiency), 100-240V, 50 / 60Hz

Compliance

Product	PRIMERGY RX1440 M2
Model	PR1440A
Global	CB RoHS (Substance limitations in accordance with global RoHS regulations) WEEE (Waste electrical and electronical equipment)
Germany	GS
Europe	CE
USA/Canada	NRTLc/us FCC Class A ICES-003 / NMB-003 Class A
Japan	VCCI Class A + JIS 61000-3-2
South Korea	KC
China	CCC
Australia/New Zealand	RCM
Taiwan	BSMI
Compliance link	https://sp.ts.fujitsu.com/sites/certificates
Compliance notes	There is general compliance with the safety requirements of all European countries and North America. National approvals required in order to satisfy statutory regulations or for other reasons can be applied for on request. * Warning: This is a class A product. In a domestic environment this product may cause radio interference in which case the user may be required to take adequate measures.
Manufacturer	Fsas Technologies Inc. 13-2, Nakamaruko, Nakahara-ku, Kawasaki-shi, Kanagawa, 211-0012, Japan

Components

Optical drives	Blu-ray Disc™ Triple Writer, (6x BD-RW, 8x DVD, 24x CD), ultraslim, SATA I DVD Super Multi ultra slim , (8x DVD; 24x CD), ultraslim, SATA I
-----------------------	--

SSD SAS 2.5-inch

SSD SAS, 22.5Gb/s, 960 GB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 800 GB, Write-Intensive, hot-plug, 2.5-inch, enterprise, 10 DWPD
SSD SAS, 22.5Gb/s, 15.36 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 15.36 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD
SSD SAS, 22.5Gb/s, 7.68 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 7.68 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD
SSD SAS, 22.5Gb/s, 6.4 TB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3 DWPD
SSD SAS, 22.5Gb/s, 3.84 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 3.84 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD
SSD SAS, 22.5Gb/s, 3.2 TB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3 DWPD
SSD SAS, 22.5Gb/s, 1.92 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 1.92 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD
SSD SAS, 22.5Gb/s, 1.6 TB, Write-Intensive, hot-plug, 2.5-inch, enterprise, 10 DWPD
SSD SAS, 22.5Gb/s, 1.6 TB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3 DWPD
SSD SAS, 12 Gb/s, 800 GB, Write-Intensive, hot-plug, 2.5-inch, enterprise, 10 DWPD
SSD SAS, 12 Gb/s, 800 GB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3 DWPD
SSD SAS, 12 Gb/s, 400 GB, Write-Intensive, hot-plug, 2.5-inch, enterprise, 10 DWPD
SSD SAS, 12 Gb/s, 15.36 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD
SSD SAS, 12 Gb/s, 7.68 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD
SSD SAS, 12 Gb/s, 6.4 TB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3 DWPD
SSD SAS, 12 Gb/s, 3.84 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD
SSD SAS, 12 Gb/s, 3.2 TB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3 DWPD
SSD SAS, 12 Gb/s, 1.92 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD
SSD SAS, 12 Gb/s, 1.6 TB, Write-Intensive, hot-plug, 2.5-inch, enterprise, 10 DWPD
SSD SAS, 12 Gb/s, 1.6 TB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3 DWPD

SSD SAS 3.5-inch

SSD SAS, 22.5Gb/s, 960 GB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 800 GB, Write-Intensive, hot-plug, 3.5-inch, enterprise, 10 DWPD
SSD SAS, 22.5Gb/s, 15.36 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 15.36 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD
SSD SAS, 22.5Gb/s, 7.68 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 7.68 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD
SSD SAS, 22.5Gb/s, 6.4 TB, Mixed-use, hot-plug, 3.5-inch, enterprise, 3 DWPD
SSD SAS, 22.5Gb/s, 3.84 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 3.84 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD
SSD SAS, 22.5Gb/s, 3.2 TB, Mixed-use, hot-plug, 3.5-inch, enterprise, 3 DWPD
SSD SAS, 22.5Gb/s, 1.92 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 1.92 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD
SSD SAS, 22.5Gb/s, 1.6 TB, Write-Intensive, hot-plug, 3.5-inch, enterprise, 10 DWPD
SSD SAS, 22.5Gb/s, 1.6 TB, Mixed-use, hot-plug, 3.5-inch, enterprise, 3 DWPD
SSD SAS, 12 Gb/s, 800 TB, Write-Intensive, hot-plug, 3.5-inch, enterprise, 10 DWPD
SSD SAS, 12 Gb/s, 800 GB, Mixed-use, hot-plug, 3.5-inch, enterprise, 3 DWPD
SSD SAS, 12 Gb/s, 400 GB, Write-Intensive, hot-plug, 3.5-inch, enterprise, 10 DWPD
SSD SAS, 12 Gb/s, 7.68 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD
SSD SAS, 12 Gb/s, 3.84 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD
SSD SAS, 12 Gb/s, 3.2 TB, Mixed-use, hot-plug, 3.5-inch, enterprise, 3 DWPD
SSD SAS, 12 Gb/s, 1.92 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD
SSD SAS, 12 Gb/s, 1.6 TB, Write-Intensive, hot-plug, 3.5-inch, enterprise, 10 DWPD
SSD SAS, 12 Gb/s, 1.6 TB, Mixed-use, hot-plug, 3.5-inch, enterprise, 3 DWPD

SSD SATA 2.5-inch

SSD SATA, 6 Gb/s, 960 GB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1.5 DWPD
SSD SATA, 6 Gb/s, 960 GB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SATA, 6 Gb/s, 960 GB, Mixed-use, hot-plug, 2.5-inch, enterprise, 5.0 DWPD
SSD SATA, 6 Gb/s, 960 GB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3 DWPD, SED
SSD SATA, 6 Gb/s, 480 GB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1.5 DWPD
SSD SATA, 6 Gb/s, 480 GB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SATA, 6 Gb/s, 480 GB, Mixed-use, hot-plug, 2.5-inch, enterprise, 5.0 DWPD
SSD SATA, 6 Gb/s, 480 GB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3 DWPD, SED
SSD SATA, 6 Gb/s, 240 GB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1.5 DWPD
SSD SATA, 6 Gb/s, 240 GB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1.0 DWPD
SSD SATA, 6 Gb/s, 7.68 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SATA, 6 Gb/s, 7.68 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1.0 DWPD
SSD SATA, 6 Gb/s, 7.68 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 0.6 DWPD
SSD SATA, 6 Gb/s, 3.84 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1.2 DWPD
SSD SATA, 6 Gb/s, 3.84 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SATA, 6 Gb/s, 3.84 TB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3.5 DWPD
SSD SATA, 6 Gb/s, 3.84 TB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3 DWPD, SED
SSD SATA, 6 Gb/s, 1.92 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1.5 DWPD
SSD SATA, 6 Gb/s, 1.92 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SATA, 6 Gb/s, 1.92 TB, Mixed-use, hot-plug, 2.5-inch, enterprise, 5.0 DWPD
SSD SATA, 6 Gb/s, 1.92 TB, Mixed-use, hot-plug, 2.5-inch, enterprise, 3 DWPD, SED

SSD SATA 3.5-inch

SSD SATA, 6 Gb/s, 960 GB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1.5 DWPD
SSD SATA, 6 Gb/s, 960 GB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SATA, 6 Gb/s, 960 GB, Mixed-use, hot-plug, 3.5-inch, enterprise, 5.0 DWPD
SSD SATA, 6 Gb/s, 960 GB, Mixed-use, hot-plug, 3.5-inch, enterprise, 3 DWPD, SED
SSD SATA, 6 Gb/s, 480 GB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1.5 DWPD
SSD SATA, 6 Gb/s, 480 GB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SATA, 6 Gb/s, 480 GB, Mixed-use, hot-plug, 3.5-inch, enterprise, 5.0 DWPD
SSD SATA, 6 Gb/s, 480 GB, Mixed-use, hot-plug, 3.5-inch, enterprise, 3 DWPD, SED
SSD SATA, 6 Gb/s, 240 GB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1.5 DWPD
SSD SATA, 6 Gb/s, 240 GB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1.0 DWPD
SSD SATA, 6 Gb/s, 7.68 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SATA, 6 Gb/s, 7.68 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1.0 DWPD
SSD SATA, 6 Gb/s, 7.68 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 0.6 DWPD
SSD SATA, 6 Gb/s, 3.84 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1.2 DWPD
SSD SATA, 6 Gb/s, 3.84 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SATA, 6 Gb/s, 3.84 TB, Mixed-use, hot-plug, 3.5-inch, enterprise, 3.5 DWPD
SSD SATA, 6 Gb/s, 3.84 TB, Mixed-use, hot-plug, 3.5-inch, enterprise, 3 DWPD, SED
SSD SATA, 6 Gb/s, 1.92 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1.5 DWPD
SSD SATA, 6 Gb/s, 1.92 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SATA, 6 Gb/s, 1.92 TB, Mixed-use, hot-plug, 3.5-inch, enterprise, 5.0 DWPD
SSD SATA, 6 Gb/s, 1.92 TB, Mixed-use, hot-plug, 3.5-inch, enterprise, 3 DWPD, SED

HDD 2.5-inch

HDD SAS, 12 Gb/s, 600 GB, 10,000 rpm, 512n, hot-plug, 2.5-inch, enterprise
HDD SAS, 12 Gb/s, 300 GB, 10,000 rpm, 512n, hot-plug, 2.5-inch, enterprise
HDD SAS, 12 Gb/s, 2.4 TB, 10,000 rpm, 512e, hot-plug, 2.5-inch, enterprise
HDD SAS, 12 Gb/s, 1.8 TB, 10,000 rpm, 512e, hot-plug, 2.5-inch, enterprise
HDD SAS, 12 Gb/s, 1.2 TB, 10,000 rpm, hot-plug, 2.5-inch, enterprise

HDD 3.5-inch

HDD SATA, 6 Gb/s, 8 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, business critical
HDD SATA, 6 Gb/s, 6 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, business critical
HDD SATA, 6 Gb/s, 4 TB, 7,200 rpm, 512n, hot-plug, 3.5-inch, business critical
HDD SATA, 6 Gb/s, 2 TB, 7,200 rpm, 512n, hot-plug, 3.5-inch, business critical
HDD SAS, 12 Gb/s, 20 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, business critical
HDD SAS, 12 Gb/s, 18 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, business critical
HDD SAS, 12 Gb/s, 16 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, business critical
HDD SAS, 12 Gb/s, 14 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, business critical
HDD SAS, 12 Gb/s, 12 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, business critical
HDD SAS, 12 Gb/s, 8 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, business critical
HDD SAS, 12 Gb/s, 6 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, business critical
HDD SAS, 12 Gb/s, 4 TB, 7,200 rpm, 512n, hot-plug, 3.5-inch, business critical
HDD SAS, 12 Gb/s, 2 TB, 7,200 rpm, 512n, hot-plug, 3.5-inch, business critical

PCIe SSD & SATA DOM SSD

PCIe-SSD SFF, 800 GB, Write-Intensive, hot-plug, 2.5-inch, Flash drive, 100 DWPD
PCIe-SSD SFF, 400 GB, Write-Intensive, hot-plug, 2.5-inch, Flash drive, 100 DWPD
PCIe-SSD SFF, 15.36 TB, Read-Intensive, hot-plug, 2.5-inch, Flash drive, 1.0 DWPD
PCIe-SSD SFF, 12.8 TB, Mixed-use, hot-plug, 2.5-inch, Flash drive, 3.0 DWPD
PCIe-SSD SFF, 7.68 TB, Read-Intensive, hot-plug, 2.5-inch, Flash drive, 1.0 DWPD
PCIe-SSD SFF, 6.4 TB, Mixed-use, hot-plug, 2.5-inch, Flash drive, 3.0 DWPD
PCIe-SSD SFF, 3.84 TB, Read-Intensive, hot-plug, 2.5-inch, Flash drive, 1.0 DWPD
PCIe-SSD SFF, 3.2 TB, Mixed-use, hot-plug, 2.5-inch, Flash drive, 3.0 DWPD
PCIe-SSD SFF, 1.92 TB, Read-Intensive, hot-plug, 2.5-inch, Flash drive, 1.0 DWPD
PCIe-SSD SFF, 1.6 TB, Write-Intensive, hot-plug, 2.5-inch, Flash drive, 100 DWPD
PCIe-SSD SFF, 1.6 TB, Mixed-use, hot-plug, 2.5-inch, Flash drive, 3.0 DWPD

SED

SSD SAS, 22.5Gb/s, 800 GB, Write-Intensive, hot-plug, 2.5-inch, enterprise, 10 DWPD, SED
SSD SAS, 22.5Gb/s, 15.36 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 15.36 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 7.68 TB, Read-Intensive, hot-plug, 3.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 7.68 TB, Read-Intensive, hot-plug, 2.5-inch, enterprise, 1 DWPD, SED
SSD SAS, 22.5Gb/s, 1.6 TB, Write-Intensive, hot-plug, 2.5-inch, enterprise, 10 DWPD, SED
SSD SAS, 12 Gb/s, 800 GB, Write-Intensive, hot-plug, 2.5-inch, enterprise, 10 DWPD, SED
SSD SAS, 12 Gb/s, 400 GB, Write-Intensive, hot-plug, 2.5-inch, enterprise, 10 DWPD, SED
SSD SAS, 12 Gb/s, 1.6 TB, Write-Intensive, hot-plug, 2.5-inch, enterprise, 10 DWPD, SED
HDD SAS, 12 Gb/s, 600 GB , 10,000 rpm, 512n, hot-plug, 2.5-inch, enterprise, SED
HDD SAS, 12 Gb/s, 300 GB, 10,000 rpm, 512n, hot-plug, 2.5-inch, enterprise, SED
HDD SAS, 12 Gb/s, 20 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, enterprise, SED
HDD SAS, 12 Gb/s, 18 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, enterprise, SED
HDD SAS, 12 Gb/s, 16 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, enterprise, SED
HDD SAS, 12 Gb/s, 14 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, enterprise, SED
HDD SAS, 12 Gb/s, 12 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, enterprise, SED
HDD SAS, 12 Gb/s, 8 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, enterprise, SED
HDD SAS, 12 Gb/s, 6 TB, 7,200 rpm, 512e, hot-plug, 3.5-inch, enterprise, SED
HDD SAS, 12 Gb/s, 2.4 TB, 10,000 rpm, 512e, hot-plug, 2.5-inch, enterprise, SED
HDD SAS, 12 Gb/s, 1.8 TB, 10,000 rpm, 512e, hot-plug, 2.5-inch, enterprise, SED
HDD SAS, 12 Gb/s, 1.2 TB , 10,000 rpm, 512n, hot-plug, 2.5-inch, enterprise, SED

SCSI / SAS Controller

PSAS CP 2100-8i LP SAS Ctrl. 12 Gbit/s 8 ports int. PCIe 3.0 x8
Fujitsu PSAS CP 2200-16i LP Host Bus Adapter 24 Gbit/s 16 GT/s 16 ports int.
Broadcom® PSAS CP600i LP SAS Ctrl. 12 Gbit/s PCIe 3.0 x8
Broadcom® PSAS CP600e LP SAS Ctrl. 12 Gbit/s PCIe 3.0 x8

RAID Controller	<p>pre-configured RAID1 Array for M.2 in PDUAL,</p> <p>Fujitsu PRAID EP680i LP, RAID 5/6 Ctrl., SAS/SATA 12 Gbit/s, NVMe-PCIe 16 GT/s, 16 ports int. RAID level: 0, 1, 10, 5, 50, 6, 60, 8 GB, Optional FBU based on LSI SAS3916</p> <p>Fujitsu PRAID EP680e LP, RAID 5/6 Ctrl., SAS 12 Gbit/s, 8 ports ext. RAID level: 0, 1, 10, 5, 50, 6, 60, 8 GB, Optional FBU based on LSI SAS3516</p> <p>Fujitsu PRAID EP640i LP, RAID 5/6 Ctrl., SAS/SATA 12 Gbit/s, 8 ports int. RAID level: 0, 1, 10, 5, 50, 6, 60, 4 GB, Optional FBU based on LSI SAS3908</p> <p>Fujitsu PRAID EP 3258-16i LP, RAID 5/6 Ctrl., SAS/SATA 24 Gbit/s, NVMe-PCIe 16 GT/s, 16 ports int. RAID level: 0, 1, 10, 5, 50, 6, 60, 8 GB, Optional FBU</p> <p>Fujitsu PRAID EP 3254-8i LP, RAID 5/6 Ctrl., SAS/SATA 24 Gbit/s, 8 ports int. RAID level: 0, 1, 10, 5, 50, 6, 60, 4 GB, Optional FBU</p> <p>Fujitsu PRAID EP 3252-8i LP, RAID 5/6 Ctrl., SAS/SATA 24 Gbit/s, 8 ports int. RAID level: 0, 1, 10, 5, 50, 6, 60, 2 GB, Optional FBU</p> <p>Broadcom® PRAID CP600i LP, RAID Ctrl., SAS/SATA 12 Gbit/s, 8 ports int. RAID level: 0, 1, 10, No FBU support</p>
Fibre Channel controller	<p>Fibre Channel Host Bus Adapter 1 x Qlogic QLE2770-FJ-BK LC-style</p> <p>Fibre Channel Host Bus Adapter 2 x Qlogic QLE2772-FJ-BK LC-style</p> <p>Fibre Channel Host Bus Adapter 1 x 32 Gbit/s Emulex LPE35000-M2-F MMF LC-style</p> <p>Fibre Channel Host Bus Adapter 2 x 32 Gbit/s Emulex LPE35002-M2-F MMF LC-style</p> <p>Fibre Channel Host Bus Adapter 1 x Qlogic QLE2870-FJ-BK MMF LC-style</p> <p>Fibre Channel Host Bus Adapter 2 x Qlogic QLE2872-FJ-BK MMF LC-style</p> <p>Fibre Channel Host Bus Adapter 1 x Emulex LPE36000-M64-F MMF LC-style</p> <p>Fibre Channel Host Bus Adapter 2 x Emulex LPE36002-M64-F MMF LC-style</p> <p>Fibre Channel Host Bus Adapter 1 x 16 Gbit/s Qlogic QLE2690 LC-style</p> <p>Fibre Channel Host Bus Adapter 2 x 16 Gbit/s Qlogic QLE2692 LC-style</p> <p>Fibre Channel Host Bus Adapter 1 x 16 Gbit/s Emulex LPe31000-M6-F MMF LC-style</p> <p>Fibre Channel Host Bus Adapter 2 x 16 Gbit/s Emulex LPe31002-M6-F MMF LC-style</p>
	<p>InfiniBand HCA 1 x 200Gb/s PCIe x16 QSFP for the US market max. one IB HCA 200Gb controller can be installed (Mellanox)</p>
GPU computing card	<p>NVIDIA® A2, 200GB/s, 16GB GDDR6, N/A, PCIe 4.0 x8</p> <p>-, xxxGB/s, 24GB GDDR6, N/A, PCIe 4.0 x16</p> <p>NVIDIA® T400 4GB, 4 GB, 384 cores, 4GB, N/A, PCIe x16, 3 x miniDP</p>
Rack infrastructure	<p>Cable Arm 1U for PRIMECENTER- and 3rd-party racks</p> <p>Rackmount kit partial extraction (400mm). tool less mounting for general use, length variable 559-890mm.</p> <p>Rackmount kit full extraction (870mm). tool less mounting for general use, length variable 559-890mm. If consider to shipment with Rack and earthquake, suggest to fix RMK with security screw.</p>
Notes	
Compatibility	<p>If and to the extent a list of components or certain compatibilities are specified in the product data sheet, these component lists and compatibility specifications are exhaustive. Using deviating or other system components and applications together with the product may but does not necessarily have to lead to compatibility problems. A final statement and/or commitment on the compatibility of such deviating or other system components and applications can only be provided after a corresponding verification through a dedicated compatibility testing.</p>
Continuity management	<p>The product may in connection with and depending on the specific configuration include elements to support time- and performance-critical applications, however high availability (e.g., 99.9999%) and failsafe performance is not a standalone product feature. If and to the extent the product is to be used in such business-critical environments, it is within the sole responsibility of the user to set up the specific additional technical features (e.g., Storage Cluster), redundancies, and operational conditions as required to ensure such high availability or failsafe performance.</p>
Security	<p>The properties of the product provide a baseline for product security and therefore end-customer IT security. However, these properties are not sufficient on their own to protect the product from all existing threats, such as intrusion attempts, data exfiltration and other forms of cyberattacks. To customize security settings, please use the configuration options as available for the respective product. During operation, the IT security of this product is within the responsibility of the respective administrator/end-user of the product. Please note, that Fsas Technologies Inc. as a manufacturer does not make any policy prescriptions or advocacy statements regarding IT security best practices and/or general product operation.</p>

Warranty

Manufacturer warranty period	3 years
Warranty type	Onsite warranty
Warranty Terms & Conditions	http://support.ts.fujitsu.com/warranty/Index.asp?LNG=COM
Product Support - the perfect extension	
Support Pack Options	Globally available in major metropolitan areas: 9x5, Next Business Day Onsite Response Time 9x5, 4h Onsite Response Time (depending on country) 24x7, 4h Onsite Response Time (depending on country)
Recommended Service	24x7, Onsite Response Time: 4h - For locations outside of EMEA please contact your local Fujitsu partner.
Service Lifecycle	at least 5 years after shipment, for details see https://support.ts.fujitsu.com/
Service Weblink	http://www.fujitsu.com/emeia/products/product-support-services/

More information

Fujitsu products, solutions & services

In addition to PRIMERGY RX1440 M2, Fujitsu provides a range of platform solutions. They combine reliable Fujitsu products with the best in services, know-how and worldwide partnerships.

Fujitsu Portfolio

Built on industry standards, Fujitsu offers a full portfolio of IT hardware and software products, services, solutions and cloud offering, ranging from clients to datacenter solutions and includes the broad stack of Business Solutions, as well as the full stack of Cloud offerings. This allows customers to select from alternative sourcing and delivery models to increase their business agility and to improve their IT operation's reliability.

Computing Products

www.fujitsu.com/global/products/

Software

www.fujitsu.com/software/

More information

Learn more about PRIMERGY RX1440 M2, please contact your Fujitsu sales representative or Fujitsu Business partner, or visit our website.
<http://www.fujitsu.com/global/products/computing/servers/primergy/rack/rx1440m2/>

Fujitsu green policy innovation

Fujitsu Green Policy Innovation is our worldwide project for reducing burdens on the environment.

Using our global know-how, we aim to contribute to the creation of a sustainable environment for future generations through IT.

Please find further information at <http://www.fujitsu.com/global/about/environment>



Copyrights

All rights reserved, including intellectual property rights. Designations may be trademarks and/or copyrights of the respective owner, the use of which by third parties for their own purposes may infringe the rights of such owner. For further information see <https://www.fujitsu.com/global/about/resources/terms/>
Copyright 2024 Fujitsu LIMITED

Disclaimer

Please note that the data sheet reflects the technical specification with the maximum selection of components for the named system and not the detailed scope of delivery. The scope of delivery is defined by the selection of components at the time of ordering. The product was developed for normal business use. Technical data is subject to modification and delivery subject to availability. Any liability that the data and illustrations are complete, actual or correct is excluded. Designations may be trademarks and/or copyrights of the respective owner, the use of which by third parties for their own purposes may infringe the rights of such owner.

Contact
Fujitsu LIMITED

Website: www.fujitsu.com
2024-12-04 WW-EN