



Announcing DES-4221 Specialist - Implementation Engineer PowerEdge M1000e, FX, VRTX Exam Retirement

The **Specialist - Implementation Engineer PowerEdge M1000e, FX, VRTX** certification (DES-4221) will be retired on February 2, 2024.

How will this impact you?

This exam is no longer available. We recommend you consider other Dell Proven Professional Certifications to meet your training and certifications needs. We can help you achieve and validate critical skills for integrating and managing technology aligned with customer outcomes.



Specialist - Implementation Engineer, PowerEdge M1000e, FX, VRTX Version 1.0 Certification Description



[Proven Professional Website](#)

[Education Services Community](#)

Certification Overview

This certification validates the ability to perform intermediate skill level tasks to successfully install, configure, manage and troubleshoot either of the M1000e, FX2, or VRTX modular platforms.

Certification Requirements

To complete the requirements for this certification you must:

- Achieve one of the following Associate level certifications*
 - Associate - PowerEdge Version 1.0
 - Associate - PowerEdge Version 2.0
 - Dell Certified Associate – PowerEdge
 - Dell Certified Professional – PowerEdge
 - Specialist – Implementation Engineer, PowerEdge Version 1.0
 - CompTIA Server+
- Pass the following Implementation Exam
 - [DES-4221 Specialist - Implementation Engineer, PowerEdge M1000e, FX, VRTX Exam](#)

Note: These details reflect certification requirements as of September 27, 2019.

The Proven Professional Program periodically updates certification requirements. *Please check the [Proven Professional CertTracker](#) website regularly for the latest information and for other options to meet the Associate level requirement.

Dell Inc.
Hopkinton
Massachusetts
01748-9103
1-508-435-1000
In North America
1-866-464-7381

DES-4221 Specialist - Implementation Engineer PowerEdge M1000e, FX, VRTX Exam

Exam Description



Duration

90 Minutes
(65~ Questions)

Pass Score: 63

Practice Test

Exam [DES-4221](#)

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Overview

This exam is a qualifying exam for the **Specialist - Implementation Engineer, PowerEdge M1000e, FX, VRTX** track.

This exam focuses on installing, configuring and managing the Dell PowerEdge legacy modular server products.

Dell Technologies provides free practice tests to assess your knowledge in preparation for the exam. Practice tests allow you to become familiar with the topics and question types you will find on the proctored exam. Your results on a practice test offer one indication of how prepared you are for the proctored exam and can highlight topics on which you need to study and train further. A passing score on the practice test does not guarantee a passing score on the certification exam.

Products

Products likely to be referred to on this exam include but are not limited to:

- PowerEdge Modular Server Components
- PowerEdge M1000e VRTX, FX

Exam Topics

Topics likely to be covered on this exam include:

M1000e, FX2, and VRTX Introduction and Components (18%)

- Describe roles, functions, and features of the M1000e, FX2, and VRTX modular solutions
- Describe how to configure and operate the KVM
- Describe the cooling subsystem on the M1000e
- Describe purpose and features of the CMC

Chassis Management Controller (CMC) (26%)

- Explain how to initially configure the CMC using the LCD and configure chassis and ports using the CMC
- Explain CMC licensing and different communication methods to the CMC
- Compare and contrast various PCIe slot assignments
- Describe how to configure multi-chassis management and explain the CMC redundancy options in the M1000e/FX2/VRTX
- Describe the FlexAddress, Extended storage, power usage and policies on a CMC
- Capture and deploy server profiles and describe the firmware update procedures

Networking and Storage (17%)

- Describe the features of SPERC redundancy and shared storage configuration in the VRTX
- Explain networking interconnects and Fabrics in the M1000e
- Explain the networking interconnects, PCIe, and Fabrics in the VRTX plus mapping
- Explain networking infrastructure and nodes in the FX2 Chassis

System Management Tools (11%)

- Describe how to access and navigate iDRAC and how to use iDRAC Service Module
- Describe how to access, navigate and configure LLC and System Setup Utility

Troubleshooting (28%)

- Describe how to access, interpret and save error codes, messages and error logs
- Describe how to troubleshoot with the CMC
- Describe design of various troubleshooting tests
- Describe how to troubleshoot with the iDRAC
- Explain how to use Easy Restore, iDRAC, Direct and SupportAssist Collection

The percentages after each topic above reflects the approximate distribution of the total question set across the exam.

Recommended Training

The following curriculum is recommended for candidates preparing to take this exam.

Please complete the following courses

Course Title	Course Number	Mode	Available
Dell EMC PowerEdge M1000e Installation, Implementation and Administration	ES102SVR00875	On-Demand	5/31/2019
Dell PowerEdge FX2 Installation, Implementation and Administration	ES102SVR00383	On-Demand	5/31/2019
Dell PowerEdge VRTX Installation, Administration and Troubleshooting	ES102SVR00384	On-Demand	5/31/2019

Note: These exam description details reflect contents as of **September 27, 2019**.

The Proven Professional Program periodically updates exams to reflect technical currency and relevance. Please check the Proven Professional website regularly for the latest information.



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