HP Education Services Course Overview
HP BladeSystem Administration (HE646S)

This 3-day course provides instruction on HP BladeSystem administration and management. Discussion of the portfolio overview ensures an understanding of components, configurations, and solutions.

**Audience**
- System administrators, engineers and consultants who will manage and monitor the HP ProLiant BladeSystem c-Class environment
- New HP BladeSystem customers or past customers who purchased Gen 8 or earlier HP blade servers

**Prerequisites**
HP recommends that students have attained the following credentials or levels of experience before taking this course:
- Introduction to HP ProLiant Servers (HE643S) or similar experience is recommended

**Course objectives**
- Explore the functional architecture of the ProLiant BL c-Class environment, including management infrastructure (Insight Display, Onboard Administrator), power and cooling and servers.
- Review the HP c-Class BladeSystem Portfolio and equipment capabilities.
- Introduce Virtual Connect (basic concepts)

**Benefits to you**
- Gain the ability to perform successful site planning and infrastructure design needed to deploy an HP c-Class BladeSystem solution
- Understand the various management tools and tasks required in the solution
- Be able to perform effective local and remote administration using HP Onboard Administrator

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**Next steps**
- HP Virtual Connect (HK758S)
- HP OneView Administration (H4C04S)
- HP Insight Control: Management Fundamentals (HK756S) and HP Insight Control: Management Master (HK757S)
Detailed course outline

Module 1: HP BladeSystem portfolio introduction (at a high level)
- Identify resources for information about the current HP c-Class BladeSystem portfolio
- Differentiate the two types of HP BladeSystem enclosures
- Identify HP BladeSystem ProLiant servers
- Identify HP Integrity server blades
- Describe other components in the c-Class portfolio:-HP BladeSystem adapters and mezzanines-HP BladeSystem interconnects-HP BladeSystem c-Class storage options
- Describe c-Class BladeSystem infrastructure management tools and solutions:-HP OneView management appliance-HP Smart Update solution-HP Smart Update Manager-HP Service Pack for ProLiant-HP Insight Control-HP Insight Online with Insight Remote Support
- Define the warranty and support options for HP BladeSystem solutions

Module 2: HP BladeSystem c-Class enclosures
- Describe the HP BladeSystem c-Class enclosures
- Describe the c-Class enclosure structure
- Explain c-Class enclosure signal pathing for mezzanines and interconnects
- Define the enclosure numbering scheme
- Explain how to access the HP Onboard Administrator

Module 3: HP BladeSystem c7000 enclosure and infrastructure configuration and management
- Describe the initial steps involved in setting up the c7000 enclosure using the:-HP Insight Display Initial Setup Wizard-HP Onboard Administrator (OA) First Time Setup Wizard
- Describe HP BladeSystem c-Class high availability features
- Describe the HP BladeSystem c-Class enclosure Onboard Administrator configuration options
- Describe configuration options with Onboard Administrator CLI

Module 4: HP BladeSystem power and cooling
- Explain how to configure power for an HP BladeSystem c-Class enclosure
- Explain how to control/view power consumption in a c-Class enclosure
- Describe HP intelligent location and power discovery services
- Describe the structural cooling components and features

Module 5: HP BladeSystem c-Class servers, storage, tape, and expansion blades
- Identify the distinctions between the HP ProLiant G7 and Gen8 servers
- Describe the technologies on the ProLiant system board:-Mezzanines-USB and SD cards-Embedded LOM and FlexibleLOM
- Identify c-Class Integrity servers and their requirements
- Describe server iLO interaction with the OA
- Manage certain options of your server blades from the OA GUI
- Describe the features and components of:-Storage blades-Tape blades-Expansion blades

Module 6: HP BladeSystem c-Class connectivity options
- Describe the HP BladeSystem c-Class interconnect module architecture
- List the BladeSystem c-Class interconnect modules:-Ethernet-Fibre Channel-InfiniBand-SAS
- Describe the mezzanine cards and slots available in the BladeSystem c-Class server blades
- Describe HP BladeSystem c7000 and c3000 enclosure port mapping

Module 7: HP Virtual Connect overview
- Define the benefits of HP BladeSystem solutions with HP Virtual Connect technology
- Describe Virtual Connect technology and its main components
- Identify ways to use Virtual Connect technology in a data center
- Describe the VC Flex technology
- Describe the VC FlexFabric Fibre Channel storage with 3PAR solution

Module 8: HP BladeSystem c-Class firmware
- Determine what firmware is embedded in various components in the enclosure and how to update it
- Explain how to access the HP SPP download and documentation
- Describe how to update firmware for the HP OA using:-HP SUM-EFM
- Explain how to implement HP BladeSystem c-Class enclosure firmware
- Explain how to update firmware embedded in the OA for a blade enclosure

For more information
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