

Courses Catalogue

The current range of our courses fall into the following categories:

- Linux Courses
 - Linux Foundation for Beginners ([Course Details on Next Page](#))
 - Enterprise Linux System Administration ([In Preparation](#))
 - Enterprise Linux Networking Services ([In Preparation](#))

- Cisco Networking Courses
 - Cisco CCNA ([In Preparation](#))
 - Cisco CCNP ([In Preparation](#))

- Programming Courses
 - C# Programming ([In Preparation](#))
 - .NET Programming ([In Preparation](#))
 - JAVA Programming ([In Preparation](#))
 - C Programming ([In Preparation](#))
 - C++ Programming ([In Preparation](#))

- Microsoft Courses
 - Exam 70-410: Installing and Configuring Windows Server 2012 ([In Preparation](#))
 - Exam 70-411: Administering Windows Server 2012 ([In Preparation](#))
 - Exam 70-412: Configuring Windows Server 2012 Advanced Services ([In Preparation](#))

- Oracle Courses
 - Oracle Database 11g Administrator Certified Associate ([In Preparation](#))
 - Oracle Database 11g Administrator Certified Professional ([In Preparation](#))

- Open Source Courses
 - Apache Web Server Administration ([In Preparation](#))
 - Apache Tomcat Server Administration ([In Preparation](#))
 - MySQL Server Administration ([In Preparation](#))
 - PHP & MySQL Web Development ([In Preparation](#))

- IT Management Courses
 - ITIL Foundation V3 ([In Preparation](#))
 - Prince 2 ([In Preparation](#))
 - PMP ([In Preparation](#))

AST-001 – LINUX FOUNDATION FOR BEGINNERS

Recommended Class Length:

5 days, or Two Weekends, or 10 Evenings

Course Schedule & Pricing: (Please note that the course will NOT run with less than 5 Delegates)

To Book Your Course – Contact Us on one the following:				
Phone: +44 (0)1753 842 254		Mobile: +44 (0)7866755069		Email: enquiries@HiTekAcademy.co.uk
Batch No.	Weekday Dates (D) (9.30am – 4.30pm)	Weekend Dates (W) (9.30am – 5.30pm)	Evening Dates (E) (7.00pm – 10.00pm)	Price
Batch 1 (D, W, E)	4-8 March 2013	9/10 March 2013 & 16/17 March 2013	4-8 March 2013 & 11-15 March 2013	£1,500 £999.00
Batch 2 (D, W, E)	18-22 March 2013	23/24 March 2013 & 30/31 March 2013	18-22 March 2013 & 25-29 March 2013	£1,500 £999.00
Batch 3 (D, W, E)	1-5 April 2013	6/7 April 2013 & 13/14 April 2013	1-5 April 2013 & 8-12 April 2013	£1,500 £999.00
Batch 4 (D, W, E)	15-19 April 2013	20/21 April 2013 & 27/28 April 2013	15-19 April 2013 & 22-26 April 2013	£1,500 £999.00
Batch 5 (D, W, E)	6-10 May 2013	11/12 April 2013 & 18/19 April 2013	6-10 May 2013 & 13-17 May 2013	£1,500 £999.00

Course Introduction

Linux is a versatile operating system; it can provide services that meet personal needs, office computing needs, small business needs, medium size business needs, as well as large enterprise computing needs. In addition, Linux is easy to learn, configure, and administer. Each new release, make Linux easier and easier to use. In this course, we will look at the possible uses of Linux, and discover its true power as a computing platform. Many prominent organisations implement Linux as their operating system of choice.

A mix of theory and practice is followed throughout the course, with emphasis on learning by doing. To facilitate learning by doing, an abundance of examples are provided in each unit and most lessons. In fact there are many examples in this course demonstrating every new Linux concept and skill.

Current Version: V1.0

Prerequisites:

Students should be comfortable with computers. No familiarity with Linux or other UNIX operating systems is required.

Supported Distributions:

The course is suitable for any Linux distribution with emphasis on:

- Red Hat Enterprise Linux 6
- Centos 6
- Ubuntu 10.04 LTS
- SUSE Linux Enterprise 11

Detailed Course Outline:

1. Unit 1: Introduction to Linux

- Lesson 1-1: Computers and Operating Systems
- Lesson 1-2: Operating Systems Hardware Support
- Lesson 1-3: The Operating System Kernel
- Lesson 1-4: Evolution of UNIX and Linux Operating Systems
- Lesson 1-5: Most Widely Used UNIX Flavours
- Lesson 1-6: Most Widely Used Linux Distributions
- Lesson 1-7: Popular Uses of Linux

2. Unit 2: Start Using Linux

- Lesson 2-1: Identifying Yourself – The Linux User
- Lesson 2-2: What is a Linux Shell? Why is it needed?
- Lesson 2-3: Logging In and Out of a Linux System
- Lesson 2-4: The Linux Command Structure
- Lesson 2-5: Switching Users
- Lesson 2-6: Getting Help When Needed

3. Unit 3: The Linux Filesystem – Concepts

- Lesson 3-1: Introduction to Linux Filesystem
- Lesson 3-2: The Linux Filesystem Hierarchy Standard (FHS)

4. Unit 4: Linux Filesystem – File & Directory Operations

- Lesson 4-1: Working with Files & Directories
- Lesson 4-2: Copying Files & Directories
- Lesson 4-3: Moving and Renaming Files & Directories
- Lesson 4-4: Creating and Removing Files
- Lesson 4-5: Creating and Removing Directories
- Lesson 4-6: Determining File Type or Content
- Lesson 4-7: Using Nautilus File Manager

5. Unit 5: Linux Filesystem – Additional Topics

- Lesson 5-1: Linux Partitions & Filesystems
- Lesson 5-2: More on Inodes
- Lesson 5-3: Hard & Soft (Symbolic) Links
- Lesson 5-4: Revisiting the Seven Fundamental File Types
- Lesson 5-5: Checking Free Space & Disk Usage
- Lesson 5-6: Handling Removable Media
- Lesson 5-7: Archiving and Compressing Files & Directories

6. Unit 6: Users, Groups, and Permissions

- Lesson 6-1: The Linux User - Revisited
- Lesson 6-2: The Linux Groups
- Lesson 6-3: Linux File and Directory Security
- Lesson 6-4: Changing File and Directory Ownership
- Lesson 6-5: Changing File and Directory Permissions
- Lesson 6-6: Changing Permissions Using Nautilus
- Lesson 6-7: Switching User Accounts - Revisited
- Lesson 6-8: User and Group Management Tools
- Lesson 6-9: Determining Logged In Users
- Lesson 6-10: Determining Default Permissions
- Lesson 6-11: Linux Special Permissions

7. Unit 7: The vim Text Editor

- Lesson 7-1: Introducing the vim Text Editor
- Lesson 7-2: The vim Editor – Modes of Operation
- Lesson 7-3: Vim Editing Operations
- Lesson 7-4: Advanced vim Editing Operations

8. Unit 8: Introducing the BASH Shell

- Lesson 8-1: What is a Shell?
- Lesson 8-2: Command-Line Shortcuts
- Lesson 8-3: Command-Line Expansion & Substitution
- Lesson 8-4: The GNOME Terminal
- Lesson 8-5: The BASH Shell Environment
- Lesson 8-6: Writing Simple BASH Shell Scripts

9. Unit 9: Standard Input/Output/Error & Pipes

- Lesson 9-1: Standard Input, Standard Output & Standard Error
- Lesson 9-2: Special Linux Files
- Lesson 9-3: Linux Pipes & Command Grouping

10. Unit 10: Linux Tools for Manipulating & Analyzing Text

- Lesson 10-1: Tools for Extracting Text
- Lesson 10-2: Extracting Text by Keyword – The grep Command
- Lesson 10-3: Extracting Text by Column – The cut Command
- Lesson 10-4: The paste and join Command
- Lesson 10-5: Tools for Analyzing Text
- Lesson 10-6: The diff and patch Commands
- Lesson 10-7: The aspell and tr Commands
- Lesson 10-8: The sed Command
- Lesson 10-9: The awk Command

11. Unit 11: Searching for Files

- Lesson 11-1: Using the find Command
- Lesson 11-2: The locate Command & GNOME Search Tool

12. Unit 12: Linux Processes

- Lesson 12-1: Working with Processes

13. Unit 13: Basic System Configuration Tools

- Lesson 13-1: TCP/IP Network Configuration

- Lesson 13-2: Printing in the Linux Environment
- Lesson 13-3: Setting Date & Time for the System

14. Unit 14: Networking Client Tools

- Lesson 14-1: The Secure Shell (SSH)
- Lesson 14-2: The rsync Tool
- Lesson 14-3: File Download Tools

15. Unit 15: Software Installation

- Lesson 15-1: Software Installation Using RPM
- Lesson 15-2: Software Installation Using Debian

16. Appendix A: What Is Next? The Linux Career Roadmap

- The Linux Career Roadmap
- The Linux Power User
- The Linux Systems Administrator
- The Linux Developer
- The Linux Applications Developer
- The LAMP (Linux, Apache, MySQL, PHP) Stack
- The Embedded Linux Systems Engineer