

## SA 245 Shell Scripting

### Summary

#### Duration

5 Days

#### Vendor

Sun

### Introduction

The Shell Programming for System Administrators course provides students with the skills to read, write, and debug UNIX shell scripts. The course begins by describing simple scripts to automate frequently executed commands and continues by describing conditional logic, user interaction, loops, menus, traps, and functions. This course is intended for system administrators who have mastered the basics of a UNIX Operating Environment (OE) such as the Solaris OE or Linux and who would like to read and understand the various boot scripts and write their own scripts to automate their day-to-day tasks. This course explores, in detail, the Bourne and Korn shell scripting languages.

### Prerequisites

Students should be able to:

- Use basic UNIX commands, such as rm, cp, man, more, mkdir, ps, and chmod
- Create and edit text files in vi or a text editor

### Objectives

- Upon completion of this course, students should be able to:
- Manipulate text files with grep, sed, and nawk
- Write reporting scripts
- Maintain existing scripts.
- Use flow control constructs, such as branching and looping
- Customize system-wide shell initialization files
- Develop and debug scripts
- Use local and environmental variables and shell metacharacters in scripts
- Use the exit status of a command to determine if the command succeeded or failed
- Develop interactive scripts
- Write a script that uses functions
- Write a script that uses a trap to catch a signal
- Access and process command-line arguments passed into a script
- Write sed scripts to perform noninteractive editing tasks
- Write nawk scripts to manipulate individual fields within a record
- Write nawk scripts to write reports based upon an input file
- Perform string manipulation and integer arithmetic on shell variables
- Develop a USAGE message to display when a script is invoked incorrectly

### Certifications & Exams

N/A