

# Techno India NJR Institute of Technology

## Linux Training

### Training Module

**Total Time: 1 Month**

#### Getting Started

- What is UNIX?
- A Brief History of UNIX
- Logging In
- Logging Out
- Try a Few More Commands
- Changing Your Password
- Using On-line Manuals

#### The File System – Files

- What is a File?
- The ls Command
- The cat Command
- The more and pg Commands
- The head and tail Commands
- The cp Command
- The mv Command
- The rm Command
- File names

#### The File System – Directories

- Hierarchical File System
- Pathnames
- The pwd Command – Print Working Directory
- The cd Command – Change Directory
- The mkdir Command – Make Directories
- The rmdir Command – Remove Directories
- The cp Command (again) – Copy Files
- Two useful directory names – . and ..

#### Editing With vi

- What is vi?
- The vi Buffering Process
- Command Mode and Insert Mode
- Modes Diagram
- Getting Started

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- Moving the Cursor Around
- Inserting Text
- Deleting a Character or Line
- Undo Last Command
- Opening a New Line
- Save Your Work or Abort the Session
- Review of vi Commands

### More Editing With vi

- Scrolling the Buffer
- Cursor Motion Commands – w, W, b, B, e, E
- Cursor Motion Commands – \$, ^, 0, G
- Cursor Motion Commands – f, t, F, T
- Delete Operator – d
- Change Operator – c
- Yank Operator – y
- Put Commands – p, P
- Searching For a Pattern – /, n, N, ?
- The join Command
- The file Command – :f
- Edit file Command – :e
- Cut and Paste Between Files
- Read file Command – :r
- Set options Command
- Set options Command – .exrc file

### Personal Utilities

- The date Utility
- The bc Utility
- The expr Utility
- The cal Utility
- The news Utility
- The id Utility
- The uname Utility
- The finger Utility
- The script Utility
- The clear Utility
- Appendix: The at and crontab Utilities

### Text Handling Utilities

- The grep Utility
- The tr Utility
- The cut Utility
- The paste Utility
- The sort Utility
- The wc Utility
- The diff Utility

- The lp Utility

### **File System Security**

- File Permissions
- The chmod Utility
- Directory Permissions
- The umask Command

### **File System Management Utilities**

- The find Utility
- The df Utility
- The du Utility
- Compressing Files
- The ln Utility
- The ulimit Utility
- The tar Utility

### **Communication Utilities**

- The write and talk Utilities
- The mesg Utility
- Mail Overview
- The mail Utility
- The mailx Utility

### **Using the Shell**

- What is a Shell?
- Which Shell?
- The Command Line
- Standard Input, Standard Output and Standard Error
- Using Default Standard In and Standard Output
- I/O Redirection
- Appending Output of a File
- Pipes
- The tee Utility