Reg. No. \_\_\_\_\_\_\_\_\_\_\_\_



**End Semester Examination – Nov / Dec – 2019**

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| **Code :** | **17CA2015** | **Duration :** | **3hrs** |
| **Sub. Name :** | **SYSTEM ADMINISTRATION** | **Max. Marks :** | **100** |

**ANSWER ALL QUESTIONS (5 x 20 = 100 Marks)**

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| **Q. No.** | | **Sub Div.** | **Questions** | | | **Course Outcome** | **Marks** |
| 1. | | a. |  | What does a zcat command display? | | CO1 | 1 |
| b. |  | What is the purpose of slocate command? | | CO1 | 1 |
| c. |  | Write notes on Linux Operating System architecture. | | CO5 | 2 |
| d. |  | What are the components together create a Linux distribution? | | CO1 | 2 |
| e. |  | [What are the responsibilities of the System Administrator?](https://www.cyberciti.biz/faq/what-is-the-role-of-the-system-administrator/) | | CO2 | 14 |
| **(OR)** | | | | | | | |
| 2. | | a. |  | What is a GNU Project? | | CO1 | 1 |
| b. |  | Define shell. | | CO4 | 1 |
| c. |  | List out the points to be remembered when creating a file or directory in Linux. | | CO1 | 2 |
| d. |  | List out the strengths of Linux. | | CO2 | 2 |
| e. |  | Explain the file structure of Linux Operating System. | | CO2 | 14 |
|  | | | | | | | |
| 3. | | a. |  | Changing root directory of a process is done with \_\_\_\_\_\_\_\_ command. a) chroot b) renice c) mknod d) None | | CO4 | 1 |
| b. |  | Define script. | | CO4 | 1 |
| c. |  | What are the values used in setting file permissions? | | CO1 | 2 |
| d. |  | List down the standard channels used to perform input and output operations. | | CO5 | 2 |
| e. | i | Write short note on the following.  Various file types in Linux. | | CO6 | 7 |
|  | |  | ii | Keystrokes that are inserted into the document while working. | | CO5 | 7 |
| **(OR)** | | | | | | | |
| 4. | | a. |  | \_\_\_\_\_\_\_\_ Command is used to change the permission of a file.   1. chmod b) chroot c) mknod d) None | | CO4 | 1 |
| b. |  | Write down the use of Pipe Operation. | | CO1 | 1 |
| c. |  | List down the command options of lpr with description. | | CO1 | 2 |
| d. |  | List down the vi editing commands. | | CO1 | 2 |
| e. | i | Write short note on;  Information stored in inode. | | CO1 | 3 |
| ii | File types. | | CO1 | 5 |
| iii | List down the commonly available shells in Linux. | | CO3 | 3 |
| iv | Characteristics of good password. | | CO4 | 3 |
|  | | | | | | | |
| 5. | | a. |  | Which run level is used for system maintenance? | | CO1 | 1 |
| b. |  | Expand RPM and YUM. | | CO1 | 1 |
| c. |  | What is meant by direct loading? | | CO3 | 2 |
| d. |  | List down the various duties of kernel. | | CO4 | 2 |
| e. | i | List down the components of LILO boot mechanism. | | CO3 | 7 |
|  | |  | ii | List down the various ways of shutting down or rebooting system. | | CO5 | 7 |
| **(OR)** | | | | | | | |
| 6. | | a. |  | What is chained boot loaders? | | CO2 | 1 |
| b. |  | Which boot loader supports both direct and chain loading? | | CO2 | 1 |
| c. |  | Draw the flow of control in a booting process. | | CO4 | 2 |
| d. |  | List down the different run levels in Linux. | | CO4 | 2 |
| e. |  | Explain the packaging systems RPM and YUM. | | CO6 | 14 |
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| 7. | | a. |  | \_\_\_\_\_\_\_\_\_\_\_ command is used to assign a password to the user karunya. | CO1 | | 1 |
| b. |  | How can a user accounts be disabled? | CO1 | | 1 |
| c. |  | What does the entries in the /etc/passwd file refers to? | CO2 | | 2 |
| d. |  | List down the various domain names with the description. | CO4 | | 2 |
| e. |  | Write down the ways of Installing Linux OS. | CO5 | | 14 |
| **(OR)** | | | | | | | |
| 8. | | a. |  | Where Linux stores the account information? | CO1 | | 1 |
| b. |  | What is the role of usermod and groupmod commands? | CO1 | | 1 |
| c. |  | State the differences between RAM and ROM | CO1 | | 2 |
| d. |  | Write short note on Hard disk. . | CO4 | | 2 |
| e. |  | With a tabular format discuss how the user’s accounts are created and managed. | CO6 | | 14 |
|  |  | |  | **Compulsory**: | | | |
| 9. | | a. |  | \_\_\_\_\_\_\_\_\_\_\_\_ is called as epoch backup. | CO1 | | 1 |
| b. |  | What is backup media? | CO1 | | 1 |
| c. |  | Define striping. | CO1 | | 2 |
| d. |  | Compare various RAID levels. | CO4 | | 2 |
| e. | i | Define Backup and describe the different level of backups. | CO4 | | 5 |
|  | |  | ii | Explain how LVM works. | CO5 | | 9 |