## SEMESTER EXAMINATION-2021

## CLASS – CSE/V<sup>TH</sup> SEM, SUBJECT - LINUX AND SHELL PROGRAMMING PAPER CODE: BCE-0535, PAPER TITLE - LINUX AND SHELL PROGRAMMING

Time: 3 Hour Max. Marks: 70

Min. Pass: 40%

**Note:** Question Paper is divided into two sections: **A and B.** Attempt both the sections as per given instructions.

## **SECTION-A (SHORT ANSWER TYPE QUESTIONS)**

**Instructions**: Answer any FIVE questions in about 150 words each. Each question carries six marks. (5 X 6 = 30 Marks)

- Question-1: Differentiate between Linux and Windows operating system.
- Question-2: What do you understand by zombie and orphan processes? Explain how they can be managed?
- Question-3: Write commands to create file, directory, list files and directories, concatenate two files, remove files, remove directories.
- Question-4: Discuss command for changing file permissions using suitable example.
- Question-5: Explain TOP command in brief also name information it provides to user.
- Question-6: What is shell? List various available common shells.
- Question-7: Discuss the functions of passwd, pwd, cat & rmdir command in brief.
- Question-8: Discuss about pipes and redirection using suitable example.
- Question-9: Explain file permissions in Linux and also write a command by which you can know about different permissions on file.
- Question-10: Explain parent and child process with example.

## **SECTION-B (LONG ANSWER TYPE QUESTIONS)**

**Instructions:** Answer any FOUR questions in detail. Each question carries 10 marks. (4 X 10 = 40 Marks)

- Question-11: Discuss the architecture of Linux in detail and also explain features of Linux in brief.
- Question-12: Explain concept of RAID and different RAID levels in Linux. Also discuss benefits of using RAID in detail.
- Question-13: Crate two group G1 and G2. Create a new user UG1 and XG1 belonging to group G1 and user UG2 belonging to group G2. Create a file by user UG1 and delete that file by user XG1. Also make sure that the file cannot be deleted by UG2 but UG2 can read the file.
- Question-14: Explain red hat package manager (RPM) and five basic modes for RPM command in detail. Also discuss about Yellowdog Updater

- Modified (YUM) in brief.
- Question-15: Who is super user in Linux? Explain various user management commands.
- Question-16: Explain Linux file system structure in detail and also discuss Linux file system features in short.
- Question-17: Discuss various process related commands in Linux using suitable examples. How we can manage multiple processes?
- Question-18: What do you understand by user management in Linux? Create two users CSE1 and CSE2. Create a file by login as user CSE1 and delete that file by login as user CSE2.

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