



**AS-M2010103**

Seat No. \_\_\_\_\_

**B. C. A. (Sem. IV) (Non CBCS) Examination**

**March / April – 2016**

**CS-22 : Operating Systems Concepts with  
UNIX / LINUX**

*(Old Course)*

Time : 3 Hours]

[Total Marks : 100

**Instructions :** (1) All questions are compulsory.  
(2) Figures on right side indicate marks of questions.

**1** Answer the following questions : (any **four**) **20**

- (1) Explain function of OS.
- (2) Explain PCB
- (3) What is scheduling ? Explain any one.
- (4) Explain process state transition diagram.
- (5) Explain UNIX architecture.

**2** Answer the following questions : (any **four**) **20**

- (1) What is Memory? Explain contiguous memory allocation ?
- (2) Explain virtual memory.
- (3) Explain paging and segmentation.
- (4) Explain redirection and piping.
- (5) Explain types of shell.

**3** Answer the following question : (any **four**) **20**

- (1) Explain for loop.
- (2) Explain VI editor.
- (3) Explain types of files.
- (4) Explain System variable.
- (5) Explain login commands.

- 4 Attempt the following commands : (any **ten**) **20**
- (1) grep
  - (2) cat
  - (3) ls
  - (4) bc
  - (5) mount
  - (6) rm
  - (7) uniq
  - (S) umask
  - (9) ps
  - (10) sort
  - (11) cmp
- 5 Attempt any four shell script : **20**
- (1) Write a shell script to reverse the entered number.
  - (2) Write a shell script to check whether no is armstrong or not.
  - (3) Explain decision statement in Unix.
  - (4) Explain file security in unix.
  - (5) What is shell? Explain shell variable.
-