SURESH GYAN VIHAR UNIVERSITY Accredited by NAAC with 'A' Grade		**INTERNAL ASSIGNMENT - 1**
Course	BCA	**Introduction to Operating System**
Semester	3	
Total Marks:	15	

Q.1. **Write answers for any two questions from below. (5 marks each – Word limit – 500)**

A. Differentiate between UNIX and Windows based operating systems.

B. Explain in detail the role of Operating system as a resource Manager.

C. What are MVT and MFT job scheduling algorithms? When are they used? Write any five differences between MVT and MFT.

Q.2. **Write short notes on all of the following topics (1 mark each - Word limit - 100)**

A. CPU utilization

B. DMA(Direct Memory Access

C. Semaphore

D. No preemption condition

E. Look and C-Look scheduling

SURESH GYAN VIHAR UNIVERSITY Accredited by NAAC with 'A' Grade		INTERNAL ASSIGNMENT - 2
Course	BCA	Introduction to Operating System
Semester	3	
Total Marks:	15	

Q.1.   Write answers for any two questions from below. (5 marks each – Word limit – 500)

A.   Why page replacement algorithms are required? What happens without page replacement algorithms? Explain any one Page Replacement algorithms with a suitable example?

B.   Internal and external fragmentations are common in the Operating System memory management. What are the ways to calculate the internal and external fragmentations?

C.   What is Dinning-Philosophers problem? Narrate the situation of dinning philosopher's problem. Also write a code to demonstrate the Dinning Philosopher's situation.

Q.2.   Write short notes on all of the following topics (1 mark each - Word limit - 100)

A.   Dead lock

B.   Process Progress

C.   Context switch

D.   Tree structure directory

E.   Disk scheduler