## **Brooklyn College Department of Computer & Information Sciences**

## CISC 7310 [704X] Operating Systems I

37½ hours plus conference and independent work; 3 credits

Organization and programming of executive control systems. Batch processing, multiprogramming, multiprocessing, and time-sharing systems. File system organization and management. Access and protection control. Resource allocation. Control systems languages. Mathematical models of computer systems. This course requires a substantial amount of programming. (Not open to students who have completed a course in operating systems.)

## **Textbook**

Operating System Concepts (6th or 7th edition), by: Silberschatz, Galvin and Gagne

## **Course Outline**

Topic	Chapter
Overview/History of operating systems	2
Interrupts, I/O	1
Processes and Threads	3,4
CPU Scheduling	5
Memory Management	8
Test 1	
Discussion of Project	
Virtual Memory	9
Process Coordination, Semaphores	6
Deadlock	7
Disk Management	12 (part)
Test 2	
File Management	10, 11
Security	15
Final Exam	