

COMSC 239, Computer Organization and Architecture II

3 credits, 3 hours lecture, 3 hours lab

Course Description

Review of digital circuits, combinational systems, memory, register transfer, control logic design, CPU design, and advanced topics on micro-architectures.

Pre and Co-requisites

COMSC 229

Course Learning Outcomes (CLOs)

Upon successful completion of the course, the student shall be able to:

CLO 1 manipulate Boolean logic

CLO 2 design and build combinational circuits to perform a variety of tasks

CLO 3 design and build sequential circuits to perform a variety of tasks

CLO 4 reduces both sequential and combinational circuits.

CLO 5 builds a simple CPU which will include registers, ALU, data path and all the necessary circuitry required to decode and execute program code presented in a binary format.

Evaluation

Assessment Type	Percentage
Quizzes	10%
Assignments	10%
Mid- term	25%
Final Exam	35%
Lab	20%

Course Completion Requirements

Minimum passing mark of D or 50% is required.

Grading Scale

4.0 Grade Scale	Alpha Grade	Percentage Grade
4.0	A+	93-100
4.0	A	85-92.9
3.7	A-	80-84.9
3.3	B+	77-79.9
3.0	B	74-76.9
2.7	B-	70-73.9
2.3	C+	67-69.9
2.0	C	64-66.9
1.7	C-	60-63.9
1.3	D+	55-59.9
1.0	D	50-54.9
0.0	F	0-49.9

Land Acknowledgement

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