



Jordan University of Science and Technology
Faculty of Engineering
Electrical Engineering Department

EE320 Electronic Circuits
Summer Semester 2019-2020

Course Catalog
3 Credit Hours. Small signal analysis of BJT and FET amplifiers. Multistage amplifiers. Frequency response of single and multistage amplifiers. Darlington pair amplifiers. Differential amplifiers. Operational amplifier theory and applications: summation, subtraction, integration and differentiation. Filters. Oscillators

Text Book	
Title	Microelectronics; Circuit Analysis and Design
Author(s)	Donald A. Neamen
Edition	4th Edition
Short Name	1
Other Information	

Course References

Short name	Book name	Author(s)	Edition	Other Information
2	Electronic Circuits	1. D. Schilling and Belove	3rd Edition	

Instructor	
Name	Dr. Walid Shahab
Office Location	E1L2
Office Hours	
Email	shahab@just.edu.jo

Class Schedule & Room

Section 1:

Lecture Time: Sun, Mon, Tue, Wed : 11:30 - 13:00

Room: منصة الكترونية

Prerequisites

Line Number	Course Name	Prerequisite Type
242201	EE220 Introduction To Electronics	Prerequisite / Pass

Tentative List of Topics Covered

Weeks	Topic	References
Weeks 1, 2, 3, 4, 5	Small-Signal Low-Frequency Analysis and Design	From 1
Week 6	Multi-Stage Amplifiers	From 1
Weeks 7, 8	Frequency Response	From 1
Weeks 7, 8, 9	Differential Amplifiers	From 1, From 2
Weeks 10, 11	Operational Amplifiers Theory	From 1
Weeks 11, 12, 13, 14, 15	Operational Amplifiers : applications	From 1, From 2

Mapping of Course Outcomes to Program Student Outcomes	Course Outcome Weight (Out of 100%)	Assessment method
Understand, design, and analyze single-stage BJT and FET amplifiers [25ABET1]	25%	
2. Understand, design, and analyze multi-stage BJT and FET amplifiers [10ABET1]	10%	
Understand, and study the frequency response of any BJT or FET amplifier [15ABET1]	15%	
4. Understand, design, and analyze differential amplifiers [20ABET1]	20%	
Understand, the theory and Applications of an operational Amplifier [30ABET1]	30%	

Relationship to Program Student Outcomes (Out of 100%)

ABET1	ABET2	ABET3	ABET4	ABET5	ABET6	ABET7
100						

Evaluation

Assessment Tool	Weight

First	30%
Second	20%
Final	50%

Date Printed: 2020-09-24