

M.S. IN ELECTRICAL ENGINEERING WORKSHEET

Name: _____ Z#: _____ Advisor: _____

Date of Admission: _____ Undergraduate Institution/Year: _____

GPA: _____ Major: _____ GRE/Year: _____

DEFICIENCY REQUIREMENTS:

Laboratory 1 is mandatory. In addition need to satisfy at least four more courses from the menu below.

Course No.	Course Title	Actual Course Title if Not Taken at FAU	Where	Grade
CDA 3331C	Intro to Microprocessor Systems			
EEL 3470	Electromagnetic Fields and Waves			
EEE 4361	Electronics 2			
EEL 4512	Communications Systems OR			
EEL 4652	Control Systems 1			
EEL 4656	Analysis of Linear Systems			
EEL 3118L	Laboratory 1 (Mandatory)			

GRADUATE MATH REQUIREMENT (3 credits):

Grade	Semester	Course Number/Name
		EEE 5502 Digital Processing of Signals
		EEL 5613 Modern Control
		EEL 5654 Controls II
		EEL 6482 Electromagnetic Theory 1
		EEL 6537 Detection Theory
		EEL 6935 Estimation Theory
		EOC 5172 Mathematical Methods in Ocean Engineering 1
		ISC 5451 Fractals and Chaos in the Life Sciences
		MAP 6264 Queueing Theory
		Any GRADUATE LEVEL course with a Math prefix (MAA, MAD, MAP, MAS, MAT, MHF, MTG, STA)

Thesis Option:

Grade	Semester	Course Number/Name
		EEL 6971 Master's Thesis Electrical Engineering
		EEL 6905 Directed Independent Study (maximum 3 credits)

Non-Thesis Option:

Grade	Semester	Course Number/Name
		EEL 6905 Directed Independent Study (maximum 6 credits) 3 credits must be a research-oriented directed independent study.

ELECTRICAL ENGINEERING GRADUATE COURSES:

Grade	Semester	Course Number/Name
		CDA 6214 Structured VLSI Design 1
		EEE 5321 CMOS Amplifiers
		EEE 5371 High Frequency Amplifiers

	EEE 5502	Digital Processing of Signals
	EEE 5557	Introduction to Radar Systems
	EEE 6323	RF CMOS VLSI Devices for Wireless Communications
	EEE 6374	RF Devices and Circuits
	EEE 6379	RF-Air Interface and Antennas in Wireless Communications
	EEE 6504	Adaptive Signal Processing
	EEE 6508	Advanced Signal Processing
	EEE 6585	Digital Processing Of Speech Signals
	EEL 5437	Microwave Engineering
	EEL 5500	Digital Communications Systems
	EEL 5613	Modern Control
	EEL 5654	Control Systems 2
	EEL 5661	Robotic Applications
	EEL 5934	Special Topics in Electrical Engineering
	EEL 6449	Fourier Optics and Holography
	EEL 6482	Electromagnetic Theory 1
	EEL 6504	Digital Communications 2
	EEL 6509	Digital Satellite Communication
	EEL 6532	Information Theory
	EEL 6537	Detection Theory
	EEL 6563	Fiber Optic Communication
	EEL 6593	Mobile Communication
	EEL 6597	Wireless Personal Communication Systems
	EEL 6621	Nonlinear Control Systems Engineering
	EEL 6682	Intelligent Control
	EEL 6819	Neural Complex and Artificial Neural Networks
	TCN 6120	Next Generation Telecommunications
	TCN 6122	Local Access & Internet Telecommunication Engineering

ELECTIVES: Any other graduate courses taught by CEECS faculty (such as Bioengineering BME courses, or other graduate courses taught in the College of Engineering & Computer Science). Restrictions: 6 credits for non-thesis students, 3 credits for thesis students.

Grade	Semester	Course Number/Name

Other Requirements:

RESEARCH PORTFOLIO

1. All students must maintain a departmental online Research Portfolio, in which they place files such as MS Thesis copy, papers, technical reports, design-oriented homework assignments and likewise material. The Research Portfolio will be inspected by the Graduate Advisor before graduation.
2. Non-thesis students must take 3 credits of EEL 6905 Directed Independent Study, intended as a one semester mini-research project done under the guidance of one of the Engineering faculty. The research must produce, at the least, a technical report that should be placed in the student’s online research portfolio.

THESIS OPTION (30 credits)

EEL 6971 _____ (6 Thesis credit hours)
 Total: 30 credit hours _____

NON-THESIS OPTION (33 credits)

Research-Oriented DIS (EEL 6905): Semester Taken _____ Research Advisor _____

Total: 33 credit hours _____

Research Portfolio: _____

Inspected by: _____

GPA (at least 3.0) _____

Advisor Signature: _____ Date: _____

SUMMARY OF MS-EEL DEGREE REQUIREMENTS

Minimum Degree Requirements:

Master of Science Degree Thesis Option (30 credits)

- Requires 6 credits of orally defended thesis (EEL 6971)
- Requires 24 credits of approved course work (5000 and 6000 level) with the following constraints:
 - **Minimum of 18 credits at the 6000 level**
 - Minimum of 12 credits in EE courses
 - A 3-credit graduate math course
 - *Note: No more than 3 credits of Directed Independent Study (DIS) (EEL 6905)*
 - Completion of Research Portfolio

Master of Science Degree Non-Thesis Option (33 credits)

- **Minimum of 18 credits at the 6000 level**
- A 3-credit graduate math course.
- A minimum of 18 credits must be completed in EE courses.
- *Note: No more than 6 credits of Directed Independent Study (DIS) (EEL 6905)-*
(3 credits of EEL 6905/Directed Independent Study must be one semester research with a CEECS faculty member. EEL 6905/ Directed Independent Study is mandatory for all non-thesis students).
- Completion of Research Portfolio.

Admission to Candidacy/Online Plan of Study

Students must apply for candidacy as soon as they are eligible. Students should prepare, in consultation with a graduate advisor, the online PLAN OF STUDY, i.e. the list of courses, for completing their degree requirements. All courses must be approved by the student's advisor.

A student is eligible to apply for candidacy (online plan of study) when:

1. A minimum of 9 credit hours as a graduate student have been completed.
2. A minimum of 3.0 GPA in all courses attempted as a graduate student has been maintained.

Normally no more than 15 credit hours of work completed before submitting your Plan of Study will be accepted toward degree program.

Students working toward the MS (thesis option) degree may not register for thesis until their **Plan of Study** has been approved.