Electrical Engineering (MS)

Program Information

General Information
The MS degree program is intended for persons having an accredited baccalaureate degree in Electrical Engineering, but is available to those with other backgrounds. Applicants with other backgrounds should plan on taking some undergraduate background coursework. Students interested in the MS degree program should consult the Director of Graduate Studies in the Department of Electrical and Computer Engineering. The University of Louisville is accredited by the Commission on Colleges of the Southern Association of Colleges and Schools to award master’s degrees.

Degree Requirements
The program of study must be completed with a 3.00 GPA or better for all graduate courses used to satisfy degree requirements. Additionally, the program of study must be completed with a 3.00 GPA or better for all academic work attempted in graduate studies.

The requirements for the Master of Science degree are discussed in more detail in the Degree Requirements section of this catalog.

Admission Standards
The admission standards for the master of science program in electrical engineering are as follows:

1. All admission applications for the program shall include:
   - A completed application (http://louisville.edu/graduate/apply) for the Graduate School,
   - An application fee,
   - Results from the Graduate Record Examination (GRE),
   - At least two letters of recommendation, and
   - Official transcript(s) for all previous post-secondary coursework.
   All transcripts not in English must be certified as authentic and translated verbatim into English.

2. The minimum requirement for admission is the baccalaureate degree or its equivalent from an accredited institution.

3. The successful applicant will typically have an undergraduate grade point average of 3.00 or above (on a 4.00 scale).

4. The successful applicant will typically have a GRE combined Verbal and Quantitative Reasoning score of 295 or above.

5. International students whose primary language is not English must show English language proficiency by either TOEFL/IELTS score or demonstration of a degree award from an acceptable English language institution. The successful applicant will typically have a total TOEFL score of 80 or higher or overall IELTS score of 6.5 or higher.

Program Requirements
Remedial work may be specified for those applicants who, in the opinion of the faculty, do not have a sufficient background.

The minimum curricular requirements for the master’s program are:

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<thead>
<tr>
<th>Code</th>
<th>Title</th>
<th>Hours</th>
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<tbody>
<tr>
<td>ECE Electives</td>
<td>Master of Science Thesis or Paper in Electrical Engineering</td>
<td>15</td>
</tr>
<tr>
<td>Technical Electives</td>
<td>Master of Science Advanced Level Independent Project</td>
<td>9</td>
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<td>Select one of the following:</td>
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<td>6</td>
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<tr>
<td>Thesis or Paper Option</td>
<td>Master of Science Thesis or Paper in Electrical Engineering</td>
<td>3</td>
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<tr>
<td>Project Option</td>
<td>Master of Science Advanced Level Independent Project</td>
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<tr>
<td>Course-Only Option</td>
<td>Master of Science Advanced Level Independent Project</td>
<td>4</td>
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<tr>
<td>ECE Electives</td>
<td>Master of Science Advanced Level Independent Project</td>
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The master of science degree must be completed with a 3.00 GPA or better for all graduate courses used to satisfy degree requirements. Additionally, the master of science degree must be completed with a 3.00 GPA or better for all academic work attempted in graduate studies.

1. Electives must be chosen so that at least one-half of the credits counted toward the degree, exclusive of thesis, are 600-level; at least fifteen (15) credit hours of coursework must be in ECE.
2. Technical Electives can be ECE or non-ECE courses. Technical Electives must be approved by the department.
3. For the thesis/paper option, a student is required to select both an approved MS thesis/paper topic and the director and members of the thesis/paper committee during the first term of Graduate Studies. The thesis/paper director must give approval for enrollment in ECE 690.
4. Must include a course from a list of approved research/project courses, maintained by the Department.