With the addition of the new 4C term, the Mechanical Engineering curriculum and course schedule offer more flexibility to all MENG students.

The changed Curriculum and Course Schedule are 100% compatible with our present course schedule. You may follow the old schedule if it fits to your need better, taking 6 courses per term in the 3rd and 4th year.

With the addition of the 4C term in the fall, you can take 5, rather than 6 courses per term in the 3rd and 4th year; have a 8 month co-op work term in the 4th year easily; complete your study at the end of any of the three 4th year terms: Spring, Summer or Fall; and you can take these three terms in any combinations and order. We now offer several key 4th year technical elective courses in the fall and the required Capstone Design Course MECH400 twice a year in both summer and spring.

**Available Fall Courses:**

In the fall (Sep – Dec), the following technical electives will be available:

- MECH410/520 Computer Aided Design and Engineering (offered in: F, K)
- MECH458/580 Mechatronics (offered in: F, S)
- MECH450/531 Advanced Fluid Dynamics (offered in: F)
- MECH499 Technical Project (offered in: F, K, S)
- MECH498 Honor Thesis (offered in: F, K, S)
- CSC349A Numerical Analysis (offered in: F, S)
- ENGR280/ECON180 Engineering Economics (offered in: F, K)

(F: Fall Term; K: Summer Term; and S: Spring Term)

**Expanded Representative Paths:**

<table>
<thead>
<tr>
<th></th>
<th>Year 1</th>
<th>Year 2</th>
<th>Year 3</th>
<th>Year 4</th>
<th>New Year 5</th>
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<tbody>
<tr>
<td><strong>Present Standard</strong></td>
<td>1A</td>
<td>1B</td>
<td>C1</td>
<td>2A</td>
<td>C2</td>
</tr>
<tr>
<td><strong>Present 2nd Option</strong></td>
<td>1A</td>
<td>1B</td>
<td>C1</td>
<td>2A</td>
<td>C2</td>
</tr>
<tr>
<td><strong>Present Fastest Path</strong></td>
<td>1A</td>
<td>1B</td>
<td>C1</td>
<td>2A</td>
<td>C2</td>
</tr>
<tr>
<td><strong>New Path 1 (Fastest)</strong></td>
<td>1A</td>
<td>1B</td>
<td>C1</td>
<td>2A</td>
<td>C2</td>
</tr>
<tr>
<td><strong>New Path 2 (Faster)</strong></td>
<td>1A</td>
<td>1B</td>
<td>C1</td>
<td>2A</td>
<td>C2</td>
</tr>
<tr>
<td>New 3 (8 month co-op)</td>
<td>1A</td>
<td>1B</td>
<td>C1</td>
<td>2A</td>
<td>C2</td>
</tr>
<tr>
<td><strong>New 4 (8 month co-op)</strong></td>
<td>1A</td>
<td>1B</td>
<td>C1</td>
<td>2A</td>
<td>C2</td>
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</tbody>
</table>

**Notes:**

1) CX - Coop Term #X;
2) * - The Path **New 4** needs good planning to take different courses in the two 4A terms;
3) Core Design Course MECH400 is offered in both 4A and 4B;
4) No 8-month co-op starts in the Summer Term due higher challenge for summer job placement;
5) - Six Course Term;
6) - Five Course Term;
7) CSC349A Numerical Analysis is presently offered in both Fall and Spring terms;
8) ENGR280/ECON180 Engineering Economics is presently offered in both Fall and Summer terms.

Objectives and Benefits:

1) Improve student’s learning quality and experience
   • Reduce students’ course load in 3rd and 4th year from 6 to 5 per term
   • Support 8 month co-op work terms in the 4th year
   • Start in Jan 2017 to change the Capstone Design Project MECH400 to a 3 credit hour course, offer it in both Spring and Summer Terms to provide better supervision and shop support
2) Address the bottleneck class size and lab space problem for several key elective courses, and the shortage of fall graduate courses (with jointly offered elective and graduate courses);
3) Facilitate the course taking pattern/actual schedule of most present students (5 courses/term), and retain the present 6 courses/term option.
4) Preserve the present academic requirements and be compatible with the present academic and co-op term path, without losing the present Electives and Specializations.
5) Form the foundation for further restructuring of all courses in different areas; and possible course reduction in the first and second year.