



Electrical Engineering with Medicine

Department of Electrical and Computer Engineering

The Department of Electrical and Computer Engineering, together with the Schulich School of Medicine and Dentistry, offer a combined degree program leading toward a Bachelor of Engineering Science degree and an MD degree. The combined program takes seven years rather than eight years if both degrees were pursued separately. The program is aimed at high-achieving students and requires high admission performance standards. Combined studies in Engineering and Medicine prepare students for a career in technology dependent medicine.

Admission and Program Structure

The admission process involves two steps. The first one involves admission into the Engineering program. Students follow the common first year of the Engineering program. Afterwards, they must be admitted into the Electrical Engineering program (Option F: Electrical Engineering and Medicine), which they follow for an additional two years. Admission is competitive and limited. The second step of the admission process involves admission to the MD program. In order to be eligible, students must attain a sufficient grade average during the Engineering part of the program (the minimum GPA for W2010 admission is 3.7), must meet minimum performance standards in MCAT, and must attend a personal interview with the Schulich School of Medicine and Dentistry. The MCAT must be written before the third year of Engineering (for the following year's admission). Students must apply to the MD program by the deadlines established by the Ontario Medical School Application Service (OMSAS). Admission to the Engineering part of the combined program does not guarantee admission to the MD part of the program. The Schulich School of Medicine has designated three (3) spots for Engineering students pursuing the Engineering and Medicine combined program. More detailed admission requirements may be found at: <http://www.schulich.uwo.ca/education/admissions/medicine/index.php>. Please note that this program is only open to Canadian citizens or Permanent Residents of Canada.

First year program (2010-2011): Applied Math 1413, Eng Sci 1050, Physics 1026, Applied Math 1411a/b, Chemistry 1024a/b, Eng Sci 1021a/b, Eng Sci 1022a/b/y, Eng Sci 1036a/b, 1.0 non-technical elective.

Second year program (2011-2012): Applied Math 2415, Computer Sci 1037a, ECE 2205a, ECE 2277a, ECE 2240a, ECE 2231b, ECE 2233b, ECE 2236b, ECE 2241b, MME 2234b, Business 2299.

Third year program (2012-2013): Applied Math 3415a, ECE 3330a, ECE 3332a, ECE 3337a, Eng Sci 2211F, Stat Sci 2141a, ECE 3331b, ECE 3333b, ECE 3336b, ECE 3370b, ECE 3375b, Eng Sci 4498G.

Fourth year program (2013-2014): ECE 4437a, 0.5 Electrical Engineering technical elective, regular Year 1 of the MD program.

Fifth & sixth year programs (2014-2015 & 2015-2016): Regular Years 2 & 3 of the MD program.

Seventh year program (2016-2017): ECE 4416, regular Year 4 of the MD program less the Advanced Communication Skills course.

Note: Students who are not admitted to the MD program after third year must complete the following courses in their fourth year to obtain the B.E.Sc. degree: ECE 4416, five 0.5 Electrical Engineering technical electives, 0.5 non-technical elective taken from the approved list.