

PENDING MNSCU APPROVAL

## **Medical Device Engineering Technology** **Core Certificate** **2008-2009**

**Program Information:** This one-year certificate program prepares individuals for entry in the career fields of medical device engineering technology. Coursework will transfer in its entirety to Bemidji State University and may transfer in part or entirely to Minnesota State University-Moorhead and the University of Minnesota, and other postsecondary institutions. Students should meet with a representative of the transfer institution when planning class schedules. For additional information about the medical device engineering technology degree, visit the college Web site at <http://www.AnokaRamsey.edu>.

**Program Goals:** By completing this certificate, students will achieve the following learning goals: 1) write effectively for documentation requirements of the medical device industry; 2) use computers and computer software related to medical device engineering technology. 3) develop capacity to operate, maintain and troubleshoot manufacturing equipment and machines using software interface and diagnostic tools; 4) develop understanding of manufacturing properties and biocompatibility of metals, plastics, composites, adhesives and other materials; 5) demonstrate competency in manufacturing, quality, and inspection tools including microscopes, measurement and testing equipment; 6) develop capacity to create and customize parts design, understand product specifications and model part performance.

**Program Admission:** To apply for admission to the medical device engineering technology degree program, identify medical device engineering technology as your major on your application form. You must also complete the MDET admissions form.

**General Information:** College-level competence in English, writing, and mathematics should be acquired before entering the MDET program.

**Developmental Courses:** Some students may need preparatory courses in the areas of English or mathematics. Courses numbered below 1000 will not apply toward the Certificate Program.

<b>Program Core Requirements</b>		<b>20 credits</b>
BMED xxxx Writing/Documentation for Medical Device Ind.	3	3
MDET xxxx Mechatronics I+ Overview of Automation Tech.	3	3
MDET xxxx Mechatronics II	4	4
MDET xxxx Manufacturing Materials/Process	3	3
BMED 2300 Intro to Quality Assurance	3	3
MDET xxxx CAD/Computer-aided Design	2	2
MDET xxxx Measurement and Verification Technologies	2	2

  

**Program Sequence:** The sequence that follows is suggested for full-time students. Part-time students will need more time to complete this program; many courses are offered in the evening.

<u>Fall Semester</u>		<u>Spring Semester</u>	
MDET xxxx (Mech I)	3	MDET xxxx (Mech II)	4
MDET xxxx (CAD)	2	MDET xxxx (Mfg Mat/Pro)	3
MDET xxxx (Meas.+ Ver. Tech.)	2	BMED 2300 (Quality)	<u>3</u>
BMED xxxx (Writing)	<u>3</u>	Total	10
Total	10		

You are encouraged to contact a counselor or an advisor or *Ask Us* on the Web site ([www.anokaramsey.edu](http://www.anokaramsey.edu)), for course planning assistance and information about transfer credit evaluation.

**NOTE:** The requirements of this program are subject to change without notice. Students should refer to the current catalog to determine the limits to earn a degree.