Miami University

Department of Engineering Technology
Bachelor of Science in Applied Science—Completion Program
Major: Electro-Mechanical Engineering Technology
Sinclair Community College
Updated: July 17, 2008

This Bachelor of Science in Applied Science Completion Program is designed for students who have completed an associate degree in Electrical, Mechanical, Electro-Mechanical or similarly titled engineering technology programs. Graduates from other Engineering Technology programs will also receive favorable credit transfer. Through this program you can complete your BS degree by completing two-years of additional credit hours beyond your associate degree. Further information is available through www.ent.muohio.edu -- then click on distance learning.

Students entering this program must meet all Miami University admission requirements available at www.miami.muohio.edu or in the *Miami Bulletin*. For students who graduated from high school after 1985, these requirements include a foreign language in high school (two years) or college (one year). Students who do not meet these requirements at admission will still be admitted but must make up any deficiencies prior to graduating from Miami.

There are four areas of program requirements. About one-half of these requirements will be met while completing your associate degree. (Note—Miami is on semesters. This means 3 quarter credits transfer as 2 semester credits, 4 quarter credits transfer as 2.6 semester credits, and 5 quarter credits transfer as 3.3 semester credits.) In addition, students must meet the general requirements for graduation from Miami which include a minimum of 32 credit hours taken from Miami and 12 of the last 20 credit hours must be taken from Miami.

1. **Complete your associate degree in Electrical (Electronics), Mechanical, Electro-Mechanical (Automation and Control) or similarly titled Engineering Technology program at your current college.**

2. **Complete the Ohio Transfer Module at your institution. This Module is available at www.transfer.org; click on Ohio; click on Guest Login; click on Academic Programs; click on your college's name; click on or find Ohio Transfer Module. Have the registrar at your college stamp your transcript: "Ohio Transfer Module Complete". Advising for this module is available at your college. See the registrar or advising office.**

3. **Complete general education requirements specified by the Engineering Technology (ENT) department. *Included in the Ohio Transfer Module**

Miami Engineering Technology Requirements:	Take these at Sinclair:
One year of Freshman English (ENG 111, 112)	ENG 111* and 112* and 113*
ENG 215 Technical Writing	ENG 131 or 132
COM 135 Public Speaking or COM 136 Interpersonal Communication	COM 211* or COM 206
ECO 201 Microeconomics or ECO 202 Macroeconomics	ECO 216* or ECO 218*
Visual BASIC, C Programming, or similar course	EGR 261 or equivalent
MTH 123 Precalculus	MAT 117*
MTH 151 (Calculus I), MTH 251 (Calculus II)	MAT 201* and 202* and 203*
One year of Physics with lab (PHY 171, 172, 183, 184)	PHY 141* and 142* and 143* or PHY 131* and 132* and 133*
A Chemistry Course with lab (CHM 137141/, 144)	CHE 151* and CHE 152*

4. Complete all Engineering Technology (ENT) core courses, Miami Plan Thematic Sequence (MPT) courses, and Miami Plan Capstone courses (MPC).

Miami Requirements:	Where taken?
ENT Core courses (32 semester hours minimum), including those listed below. You should have taken some of these in your associate degree program. You can complete the remaining courses while taking the required Miami courses.	Sinclair
ENT 135 Computer-Aided Drafting (3)	ETD 199 or EET 116 CAD
ENT 151 Engineering Materials (3)	OPT 132 Metallurgy
ENT 192 Circuit Analysis (3)	EET 119
ENT 196 Electronics (3)	EET 114 Electronic Measurements
ENT 271 Mechanics I: Statics (3)	ETD 213 Statics
ENT 272 Strength of Materials (3)	ETD 222 Strength of Materials
ENT 291 Industrial Electronics (3)	EET 131
ENT 296 Programmable Controllers (3)	EET 281 Programmable Controllers
Take the following at Miami	
ENT 301 Dynamics (3)	Take from Miami
ENT 310 Fluid Mechanics (3)	HVA 286 with 'B' or better or take from Miami
ENT 311 Process Control Interface Design (3)	Take from Miami
ENT 316 Project Management (3)	Take from Miami
ENT 401 Computerized Instrumentation (3)	Take from Miami
ENT 412 Industrial Applications of Neural Networks and Fuzzy Logic (3)	Take from Miami
ENT 418 Electromechanical Control Systems (3)	Take from Miami
ENT 407 Modern Manufacturing Systems (3)	Take from Miami
ENT 497,498 Senior Design I, II (2, 2) also meets MPC requirement.	Take from Miami
STA 301 Applied Statistics (3) meets MPT (Thematic Sequence) requirement	Take from Miami
MTH 231 Discrete Math meets MPT requirement	Take from Miami

Miami University

Department of Engineering Technology
Bachelor of Science in Applied Science—Completion Program
Major: Mechanical Engineering Technology
Sinclair Community College
Updated: July 17, 2008

This Bachelor of Science in Applied Science Completion Program is designed for students who have completed an associate degree in Mechanical Engineering Technology. Graduates from other Engineering Technology programs will also receive favorable credit transfer but may have to complete some additional Mechanical Engineering Technology courses. Through this program you can complete your BS degree by completing two-years of additional credit hours beyond your associate degree. Further information is available through www.ent.muohio.edu -- then click on distance learning.

Students entering this program must meet all Miami University admission requirements available at www.miami.muohio.edu or in the *Miami Bulletin*. For students who graduated from high school after 1985, these requirements include a foreign language in high school (two years) or college (one year). Students who do not meet these requirements at admission will still be admitted but must make up any deficiencies prior to graduating from Miami.

There are four areas of program requirements. About one-half of these requirements will be met while completing your associate degree. (Note—Miami is on semesters. This means 3 quarter credits transfer as 2 semester credits, 4 quarter credits transfer as 2.6 semester credits, and 5 quarter credits transfer as 3.3 semester credits.) In addition, students must meet the general requirements for graduation from Miami which include a minimum of 32 credit hours taken from Miami and 12 of the last 20 credit hours must be taken from Miami.

1. **Complete your associate degree in Mechanical Engineering Technology program at your current college.**

2. **Complete the Ohio Transfer Module at your institution. This Module is available at www.transfer.org; click on Ohio; click on Guest Login; click on Academic Programs; click on your college's name; click on or find Ohio Transfer Module. Have the registrar at your college stamp your transcript: "Ohio Transfer Module Complete". Advising for this module is available at your college. See the registrar or advising office.**

3. **Complete general education requirements specified by the Engineering Technology (ENT) department. *Included in the Ohio Transfer Module**

Miami Engineering Technology Requirements	Take these at Sinclair
One year of Freshman English (ENG 111, 112)	ENG 111* and 112* and 113*
ENG 215 Technical Writing	ENG 131 or 132
COM 135 Public Speaking or COM 136 Interpersonal Communication	COM 211* or COM 206
ECO 201 Microeconomics or ECO 202 Macroeconomics	ECO 216* or ECO 218*
Visual BASIC, C Programming, or similar course	EGR 261 or equivalent
MTH 125 Precalculus	MATH 133
MTH 151 (Calculus I), MTH 251 (Calculus II)	MATH 201* and 202* and 203*
One year of Physics with lab (PHY 171, 172, 183, 184)	PHY 141* and 142* and 143* or PHY 131 and 132 and 133
A Chemistry Course with lab (CHM 137, 144)	CHE 151* and CHE 152*

4. Complete all Engineering Technology (ENT) core courses, Miami Plan Thematic Sequence (MPT) courses, and Miami Plan Capstone courses (MPC).

Miami Requirements	Take these at Sinclair
ENT 137 Introduction to Engineering Technology (1)	ETD 118
ENT 135 Computer Aided Drafting (3)	ETD 128 and ETD199 and ETD 280
ENT 235 Computer Aided Design (3)	ETD 101,or ETD 284, or ETD 287, or ETD 291
ENT 151 Engineering Materials (3)	OPT 132 or 133
ENT 152 Computer Aided Manufacturing I (3)	INT 109 and INT 113; or INT 112 and INT 113; or OPT 205
ENT 252 Computer Aided Manufacturing II (3)	INT 113 and INT 211 and INT 212 and INT 213
ENT 192 Circuit Analysis I (3)	EET 119 or EET 198
ENT 271 Mechanics I: Statics (3) ENT 272 Mechanics II: Strength of Materials (3) ENT 278 Mechanics III: Analysis of Machine Components (3)	Take all of these EDT 213, 214, 222, 245 Combining ETD 240 and 245 into ETD 245 (5 credit hours)
ENT 301 Dynamics (3)	Take from Miami
ENT 310 Fluid Mechanics (3)	HVA 286 with 'B' or better or take from Miami
ENT 312 Thermodynamics (3)	HVA 288 with 'B' or better or take from Miami.
ENT 314 Mechanisms for Mechanical Design (3)	Take from Miami
ENT 316 Project Management (3)	Take from Miami
ENT 333 Computational Methods for Engineering Technology (4)	Take from Miami
ENT 355 Introduction to Finite Element Analysis (3)	Take from Miami
ENT 415 Heat Transfer w/Applications (3)	Take from Miami
ENT 416 Topics in Mechanical Vibrations (3)	Take from Miami
ENT 497,498 Senior Design I, II (2, 2) also meets MPC requirement	Take from Miami
ENT 404 Experimentation Techniques (3)	Take from Miami
STA 301 Statistics meets MPT requirement	Take from Miami
MTH 231 Discrete Math meets MPT requirement	Take from Miami