



**Machine Tool Technology Diploma
Program Course Requirements
2010-2011**
revised 3/29/10

Student Name _____ **Student ID#** _____

Course #	Course Title	Credits	Lecture Hrs	Lab Hrs
----------	--------------	---------	-------------	---------

REQUIRED COURSES

___ MATH 1500	Applied Mathematics	3	3	0
___ MDFT 1110	Introduction to Parametric Modeling	2	1	2
___ MTRD 1160	CNC Setup and Operation	4	0	8
___ MTRD 1215	Intro to Milling Operations	3	1	4
___ MTRD 1221	Intro to Lathe Operations	2	0	4
___ MTRD 1265	CNC Programming and Process Planning	2	2	0
___ MTRD 2141	Geometric Tolerancing	1	1	0
___ MTRD 2144	Advanced CAD/CAM	2	2	0
___ MTRD 2145	Advanced CNC Milling Operations	3	0	6
___ MTRD 2147	Advanced CNC Turning Operations	2	0	4
___ MTRD 2154	CNC Operation	3	1	4
___ MTRD 2160	CAD/CAM	3	3	0
___ MTRD 2162	Workholding and Fixturing	3	1	4
___ MTRD 2221	CNC Milling Operations	5	1	8
___ MTRD 2223	CNC Turning Operations	2	1	2
___ RAST 1110	Introduction to Manufacturing	2	2	0
___ RAST 2150	Introduction to Robot Operations	2	1	2

Total **44**

GRADUATION REQUIREMENT **44**

*Denotes Prerequisites

Evaluator _____ **Date** _____



A COMMUNITY & TECHNICAL COLLEGE

Machine Tool Technology Diploma Program Course Requirements 2010-2011

Course #	Course Title	Credits	Lecture Hrs	Lab Hrs
FIRST SEMESTER				
MATH 1500	Applied Mathematics	3	3	0
MTRD 1160	CNC Setup and Operation	4	0	8
MTRD 1215	Intro to Milling Operations	3	1	4
MTRD 1221	Intro to Lathe Operations	2	0	4
MTRD 1265	CNC Programming and Process Planning	2	2	0
RAST 1110	Introduction to Manufacturing	2	2	0
MDFT 1110	Introduction to Parametric Modeling	2	1	2
	Total	18		
SECOND SEMESTER				
MTRD 2154	CNC Operations	3	1	4
MTRD 2160	CAD/CAM	3	3	0
MTRD 2162	Workholding and Fixturing	3	1	4
MTRD 2221	CNC Milling Operations	5	1	8
MTRD 2223	CNC Turning Operations	2	1	2
RAST 2150	Introduction to Robot Operations	2	1	2
	Total	18		
THIRD SEMESTER				
MTRD 2141	Geometric Tolerancing	1	1	0
MTRD 2144	Advanced CAD/CAM	2	2	0
MTRD 2145	Advanced CNC Milling Operations	3	0	6
MTRD 2147	Advanced CNC Turning Operations	2	0	4
	Total	8		
GRADUATION REQUIREMENT		44		

*Denotes Prerequisites

In order to receive a degree, diploma, or certificate from Central Lakes College, students must complete one-third of their credits at Central Lakes College. For programs exceeding 60 credits, a maximum of 20 semester credits must be completed at Central Lakes College.

CLC is committed to a policy of nondiscrimination in employment and education opportunity. No person shall be discriminated against in the terms and conditions of employment, personnel practices, or access to and participation in, programs, services, and activities with regard to race, sex, color, creed, religion, age, national origin, disability, marital status, status with regard to public assistance, sexual orientation, or membership or activity in a local commission as defined by law. This information is available in alternative format upon a 48-hour advance request by contacting Disability Services at 800-933-0346, ext. 8175. Minnesota Relay Service: 800-627-3529 or 612-297-5353.

3/10