12/11/2024 DATE
☑ REQUIRED COURSE
☑ ELECTIVE COURSE

TEC DIVISION
☐ NEW COURSE
☑ REVISION

Lake Land College

Course Information Form

COURSE NUMBER:	CAD-056		TITLE: (30 Characters Max)		CAD I						
SEM CR HRS:	2	Lecture:	1	Lab:	2				ECH:	3	
Course Level:	☐ Gen Ed / IAI ☐ Baccalaureate /Non-IAI		☑ Career/Technical ☐ Dev Ed/ Not in Degree Audit	Clinical Practicum:	0	Work-based Learning:	0	WBL ECH:	0		
COURSE PCS #	12 - 15.1302		IAI Code	N/A				Contact Hours (Minutes Per Week)			
Repeatable (Y/N):	Y	Pass/Fail (Y/N):	N	Variable Credit (Y/N):	N	Min:		Max:		16 Wks	150	8 wks	300
Prerequisites:	None										
Corequisites:	None										
Catalog Description: (40 Word Limit)	Basic theory of CAD. Students will learn to use a computer-aided drafting system to create simple to moderately complex technical drawings.										

List the Major Course Segments (Units)	Contact Lecture Hours	Contact Lab Hours	Clinical Practicum	Non-Clinical Internship/ SOE
CAD Hardware and Software	1	2		
Basic Drawing Tools	2	4		
Draw Commands	2	4		
Edit Commands	2	4		
View Commands	1	2		
Text Commands	1	2		
Dimensioning	2	4		
Drawing Setup	1	2		
Cross Hatching	1	2		
Blocks	2	4		
TOTAL	15	30	0	0

EVALUATION							
QUIZZES	☑	EXAMS	☑	ORAL PRES	☐	PAPERS	☐
LAB WORK	☑	PROJECTS	☐	COMP FINAL	☐	OTHER	☐

COURSE MATERIALS	
TITLE:	Applying AutoCAD 2012
AUTHOR:	Terry Wohlers
PUBLISHER:	Glencoe McGraw - Hill
VOLUME/EDITION/URL:	
COPYRIGHT DATE:	2012

MAJOR COURSE SEGMENT	HOURS	LEARNING OUTCOMES
		The student will be able to:
CAD Hardware and Software	3	1. Identify parts of a CAD system and their capabilities.
Coordinate Inputs	3	1. Use AutoCAD to create a simple drawing using coordinate input.
Basic Drawing Tools	3	1. Use Snap, Grid and Object Snap to gain drawing accuracy.
Draw Commands	3	1. Use simple draw commands such as line, circle and arc.
Additional Draw Commands	3	1. Construct drawings with complex draw commands.
Basic Edit Commands	3	1. Use simple Modify commands such as erase, copy and move.
Additional Edit Commands	3	1. Use more complex Modify commands.
View Commands	3	1. Use Zoom and Pan commands.
Text Entry	3	1. Create text in a drawing using various text styles.
Basic Dimensioning	3	1. Use AutoCAD's basic dimensioning capabilities.

Dimension Settings	3	1. Use dimension settings to control dimensions.
Drawing Setup	3	1. Calculate drawing plot scale, Units, Limits and related settings.
Cross Hatching	3	1. Use hatching to create a sectional drawing.
Blocks	3	1. Reuse parts of drawings by making blocks.
Inserting Blocks and Wblocks	3	1. Transfer data from one drawing to another.
	45	

Outcomes*	At the successful completion of this course, students will be able to:
Course Outcome	Understand how to use absolute, relative and polar coordinate entry methods in a CAD drawing.
Course Outcome	Learn the purpose of Draw commands and how to use them.
Course Outcome	Learn the purpose of Modify commands and how to use them.
Course Outcome	Learn to dimension a drawing and the purpose of the most common dimensioning commands.
Course Outcome	Learn to reuse drawing objects and to transfer them from one drawing to another using the Block, Wblock and Insert commands.
Primary Laker Learning Competency	Information & Technology Literacy: Students not only identify when information is necessary, but they also find, evaluate and use that information effectively with the appropriate technological tools.
Secondary Laker Learning Competency	Creative Thinking & Problem Solving: Students think creatively and solve problems by successfully combining knowledge in new ways.

**Course and program outcomes will be used in the software for outcomes assessment and should include at least 1 primary and 1 secondary Laker Learning Competency. Limit to 3-5.*