Sinclair Community College
444 E. Third St.
Dayton, OH 45402

Master Syllabus

CAT 1121 - Introduction to Revit & BIM

Division: Science, Mathematics and Engineering

Department: Civil Engineering Technology

Credit Hour Total: 3.0 **Lecture Hrs:** 2.0 **Lab Hrs:** 2.0

Prerequisite(s): CAT 1101

Date Revised: January 2015

Course Description:

Learn Building Information Modeling (BIM) techniques and methodology. Develop proficiency with Revit Architecture modeling software including: user interface, modeling techniques, proper modeling workflow and document generation. Learn rendering and animation communication techniques. Two classroom, two lab hours per week.

General Education Outcomes:

- Oral Communication Competency
- Written Communication Competency
- Critical Thinking/Problem Solving Competency
- Computer Literacy Competency
- Information Literacy Competency

Course Outcomes:

Revit interface
Develop working knowledge of Revit user interface to create, revise and communicate model components and systems.

Assessment Method: Portfolios
Performance Criteria:

Score of 70% or better

Building Information Modeling
Develop knowledge of BIM strategies and techniques. Learn appropriate methods of modeling techniques for creating architectural models, including both system and component families.

Assessment Method: Portfolios
Performance Criteria:

Score of 70% or better

Revit communication techniques
Learn appropriate methods of sharing Revit models using drawings, renderings, walk-throughs and animations.

Assessment Method: Portfolios
Performance Criteria:

Score of 70% or better

Revit workflow
Develop working knowledge of proper sequencing, worksharing and prioritization in development of Revit architectural models.

Assessment Method: Portfolios
Performance Criteria:

Score of 70% or better

Outline:

Software resources and support

User interface, project browser and library organization

System families and modeling techniques

Components and modeling techniques

Project organization and workflow

Rendering, animations and walk-throughs