UAT 169: MOBILE TECHNOLOGY FOR THE CONSTRUCTION INDUSTRY (UA 3055)

History

1. Dec 4, 2025 by Sera Bird (sabird)

Viewing: UAT 169 : Mobile Technology for the Construction Industry (UA 3055)
Last approved: 2025-12-04T08:05:37Z
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Effective Term
Winter 2026

Rationale and proposal summary
Course change to reflect current trends and technology in the industry.

Course Cover

Full Course Title
Mobile Technology for the Construction Industry (UA 3055)

Transcript Title
Mobile Tech Cnstrc Inds UA3055

Subject Code
UAT - United Association Training

Course Number
169

Department
United Assoc Dept (UAT Only) (UATD)

Banner Division
ATP

Division/College
Adv Tech/Public Serv Careers (AT)

Org Code
28200

Course Description
In this course, students will examine current mobile technologies available and utilized in the construction industry, including Bluebeam Revu and Revizto. Topics will include utilizing 2D apps and software to markup, collaborate, and manage documents on the go. Students will also explore the capabilities of advanced 3D model coordination and collaboration in the field. By the end of this course, students will be equipped with the knowledge and skills to optimize construction workflows, improve project communication, and boost productivity. The title of this course was previously Mobile Technology (UA 3055). Limited to United Association program participants.

Has this course been approved for online or online blended?
Yes

Grading method
Standard Letter, Audit

CIP Code
469999 - Construction Trades, Other.

Occupational Indicator
Yes

ACS Code
130

Degree Attributes
BCL - Below College Level Pre-Reqs

Credit hours, contact hours, repeatability

Repeatable for additional credit
No

Course credits
1.5

Lecture contact hours
22.5

Lab contact hours
1.5

Total Contact Hours
24
Expected Total Contact Hours
24

Prerequisites and prerequisite skill levels

College-Level Math
No Level Required

College-Level Reading and Writing
College-level Reading and Writing

Approved Level I Prerequisite:
Academic Reading and Writing Levels of 6

Course Assessment Plan
Learning Outcome

Outcome
Demonstrate the use of construction software and mobile technologies for project management.

Assessment #1

Assessment Tool
Outcome-related skills demonstration

Anticipated Next Assessment Year
2025

Anticipated Next Assessment Term
Summer

Assessment Cycle
Every Three Years

Anticipated assessment population
All students from all sections

How the assessment will be scored
Skills checklist

Who does the scoring?
U.A. instructors

Standard of success
80% of the students will score 80%or higher.

Assessment #2

Learning Outcome

Outcome
Demonstrate enhanced communication, collaboration, and productivity skills using mobile technology.

Assessment #1

Assessment Tool
Outcome-related skills demonstration

Anticipated Next Assessment Year
2025

Anticipated Next Assessment Term
Summer

Assessment Cycle
Every Three Years

Anticipated assessment population
All students from all sections

How the assessment will be scored
Skills checklist

Who does the scoring?
U.A. instructors

Standard of success
80% of the students will score 80% or higher.

Assessment #2

Learning Outcome

Outcome
Demonstrate enhanced project management skills using construction software.

Assessment #1

Assessment Tool
Outcome-related presentation

Anticipated Next Assessment Year
2025

Anticipated Next Assessment Term
Summer

Assessment Cycle
Every Three Years

Anticipated assessment population
All students from all sections

How the assessment will be scored
Observational checklist

Who does the scoring?
U.A. instructors

Standard of success
80% of the students will score 80% or higher.

Assessment #2

Course Objectives

	Objective(s)
1.	Demonstrate the basic functions of an iPad.
2.	Discuss the implementation of technologies into local programs at students' Training Centers.
3.	List functions and limitations of mobile hardware.
4.	Review the Bluebeam Revu Mobile and Revizto User Guides and manufacturer's recommendations.
5.	Demonstrate Bluebeam Revu Mobile software for construction-related tasks, including markup, annotation, document management, and collaboration on mobile devices.
6.	Demonstrate Revizto software for construction project management, including setting up projects, managing 3D models, creating and managing issues, collaborating with team members, and utilizing clash detection tools effectively.
7.	Discuss situational safety, setup, and operation of software, including Bluebeam and Revizto.
8.	Discuss how Bluebeam Revu Mobile enhances productivity and efficiency in construction workflows, including advanced tools for quantity takeoff, document organization, customization, and automation of repetitive tasks.
9.	Discuss Revizto software for construction project management, including setting up projects, managing 3D models, creating and managing issues, and collaborating with team members.
10.	Discuss advanced skills and applications available for Bluebeam Revu and Revizto.
11.	Discuss the benefits and return on investment (ROI) of Bluebeam Revu Mobile to enhance productivity and efficiency in construction workflows, including advanced tools for quantity takeoff, document organization, customization, and automation of repetitive tasks.
12.	Demonstrate integrating Building Information Modeling (BIM) data, conducting clash detection, generating project documentation, collaborating on mobile devices, and implementing efficient project communication practices.

General Education Area(s)

Area 1: Writing
No

Area 2: 2nd Writing or Communication/Speech
No

Area 3: Mathematics
No

Area 4: Natural Science
No

Area 5: Social and Behavioral Science
No

Area 6: Arts and Humanities
No

MTA General Education
No

Review

Is conditional approval requested?
No

Is this course currently conditionally approved, and you are now submitting it for full approval?
No

Key: 8820

Washtenaw Community College Comprehensive Report

UAT 169 Mobile Technology (UA 3055)
Effective Term: Fall 2020

Course Cover

Division: Advanced Technologies and Public Service Careers
Department: United Association Department
Discipline: United Association Training
Course Number: 169
Org Number: 28200
Full Course Title: Mobile Technology (UA 3055)
Transcript Title: Mobile Technology (UA 3055)
Is Consultation with other department(s) required: No
Publish in the Following:
Reason for Submission: New Course
Change Information:
Rationale: New United Association Course
Proposed Start Semester: Fall 2020
Course Description: In this course, students will examine current mobile technologies and applications that are available for use in the construction industry. Students will explore resources as well as develop and utilize a plan to integrate these technologies into apprenticeship programs at their local Training Centers. In addition, students will present a five-minute lesson plan for class discussion and critique. Limited to United Association program participants.

Course Credit Hours

Variable hours: No
Credits: 1.5
The following Lecture Hour fields are not divisible by 15: Student Min ,Instructor Min
Lecture Hours: Instructor: 22.5 **Student:** 22.5
The following Lab fields are not divisible by 15: Student Min, Instructor Min
Lab: Instructor: 1.5 **Student:** 1.5
Clinical: Instructor: 0 **Student:** 0

Total Contact Hours: Instructor: 24 **Student:** 24
Repeatable for Credit: NO
Grading Methods: Letter Grades
Audit
Are lectures, labs, or clinicals offered as separate sections?: NO (same sections)

College-Level Reading and Writing

College-level Reading & Writing

College-Level Math

Requisites

General Education

Degree Attributes
Below College Level Pre-Reqs

Request Course Transfer

Proposed For:

Student Learning Outcomes

1. Demonstrate the basic functions of the mobile hardware platform.
   Assessment 1
   Assessment Tool: Skills demonstration
   Assessment Date: Fall 2020
   Assessment Cycle: Every Three Years
   Course section(s)/other population: All
   Number students to be assessed: All
   How the assessment will be scored: Skills checklist
   Standard of success to be used for this assessment: 80% of the students will score 80%or higher.
   Who will score and analyze the data: U.A. instructors

2. Identify and demonstrate the use of technologies such as Plangrid, Bluebeam, Procore, Autodesk, and eSub.
   Assessment 1
   Assessment Tool: Skills demonstration
   Assessment Date: Fall 2020
   Assessment Cycle: Every Three Years
   Course section(s)/other population: All
   Number students to be assessed: All
   How the assessment will be scored: Skills demonstration checklist
   Standard of success to be used for this assessment: 80% of the students will score 80% or higher.
   Who will score and analyze the data: U.A. instructors

3. Prepare and present a five-minute lesson plan of a discussed technology.
   Assessment 1
   Assessment Tool: Presentation
   Assessment Date: Fall 2020
   Assessment Cycle: Every Three Years
   Course section(s)/other population: All
   Number students to be assessed: All
   How the assessment will be scored: Observational checklist
   Standard of success to be used for this assessment: 80% of the students will score 80% or higher.
   Who will score and analyze the data: U.A. instructors

Course Objectives

1. Discuss and navigate the provided mobile hardware.
2. Demonstrate the basic functions of an iPad.
3. Discuss the implementation of technologies into local programs at students' Training Centers.
4. List functions and limitations of mobile hardware.
5. Navigate the hardware management software and their capabilities.
6. Discuss the operation of Plangrid, Bluebeam, Procore, Autodesk, and eSub.
7. Navigate resources for emerging technologies being developed for future use.
8. Review construction project processes, and identify areas that can benefit from technology.
9. Discuss the benefits, labor savings, and Return on Investment (ROI) of purchasing and utilizing technologies for a construction project.
10. Prepare and present a lesson plan to be used at the student's local Training Center.

New Resources for Course

Course Textbooks/Resources

Textbooks
Manuals
Periodicals
Software

Equipment/Facilities

Reviewer	Action	Date
Faculty Preparer:		
Tony Esposito	*Faculty Preparer*	*Jul 14, 2020*
Department Chair/Area Director:		
Marilyn Donham	*Recommend Approval*	*Jul 14, 2020*
Dean:		
Jimmie Baber	*Recommend Approval*	*Jul 14, 2020*
Curriculum Committee Chair:		
Lisa Veasey	*Recommend Approval*	*Jul 15, 2020*
Assessment Committee Chair:		
Shawn Deron	*Recommend Approval*	*Jul 21, 2020*
Vice President for Instruction:		
Kimberly Hurns	*Approve*	*Jul 28, 2020*