

APCONT: CONSTRUCTION TECHNOLOGY

Completed Workflow

1. HVAD Chair (bmartindale@wccnet.edu)
2. AT Dean (krue@wccnet.edu,esamulski@wccnet.edu)
3. C&A Assistant (aabooker@wccnet.edu)
4. Curricular Systems Coordinator (cacevans@wccnet.edu)
5. C&A Coordinator (sabird@wccnet.edu)
6. C&A Director (bjlinford@wccnet.edu)
7. Before Comm review (aabooker@wccnet.edu)
8. Before Comm review (aabooker@wccnet.edu)
9. Comm Review step (sabird@wccnet.edu)
10. After Comm review (sabird@wccnet.edu,bjlinford@wccnet.edu)
11. Curriculum Committee Chair (rvanwagnen@wccnet.edu)
12. Assessment Committee Chair (jhale15@wccnet.edu)
13. Before VPI (sabird@wccnet.edu)
14. Vice President for Instruction (hbhirth@wccnet.edu; brtucker@wccnet.edu)
15. Curricular Systems Coordinator (cacevans@wccnet.edu)

Approval Path

1. 2026-02-25T18:54:29Z
Brian Martindale (bmartindale): Approved for HVAD Chair
2. 2026-02-25T20:44:11Z
Kyrsten Rue (krue): Approved for AT Dean
3. 2026-03-05T20:36:12Z
Ben Linford (bjlinford): Approved for C&A Assistant
4. 2026-03-05T20:38:35Z
Carol Evans (cacevans): Approved for Curricular Systems Coordinator
5. 2026-03-05T20:55:13Z
Ben Linford (bjlinford): Approved for C&A Coordinator
6. 2026-03-05T20:57:12Z
Ben Linford (bjlinford): Approved for C&A Director
7. 2026-03-06T20:13:11Z
Ben Linford (bjlinford): Approved for Before Comm review
8. 2026-03-06T20:13:39Z
Ben Linford (bjlinford): Approved for Before Comm review
9. 2026-03-13T20:33:00Z
Ben Linford (bjlinford): Approved for Comm Review step
10. 2026-03-17T14:07:57Z
Ben Linford (bjlinford): Approved for After Comm review
11. 2026-03-19T17:29:01Z
Randy Van Wagnen (rvanwagnen): Approved for Curriculum Committee Chair
12. 2026-03-26T14:51:07Z
Jessica Hale (jhale15): Approved for Assessment Committee Chair
13. 2026-03-27T17:13:00Z
Sera Bird (sabird): Approved for Before VPI
14. 2026-03-30T12:50:32Z
Brandon Tucker (brtucker): Approved for Vice President for Instruction
15. 2026-03-30T13:20:08Z
Carol Evans (cacevans): Approved for Curricular Systems Coordinator

History

1. Dec 3, 2025 by cladmin-sgafrick
2. Jan 13, 2026 by Carol Evans (cacevans)
3. Mar 30, 2026 by mahagood

Viewing: APCONT : Construction Technology

Changes proposed by: mahagood

Program Cover

Program Name

Construction Technology

Transcript Title

Construction Technology

Department

Heating, Ventilation, A/C Dept

Division/College

Adv Tech/Public Serv Careers

Academic Level

Credit

Program Code

APCONT

Type of Award

Associate of Applied Science

Does this program lead to licensure?

Yes

Describe the licensure/certification

Michigan State Builder's License Exam prep

Is this intended to be an embedded program?

No

Is this program occupational?

Yes

Is it state approved?

No

Program Occupation

High Demand Occupation

High Skill Occupation

High Wage Occupation

CIP Code

522001 - Construction Management, General.

Purpose

Rationale

Adding ENG 111X as option

Effective Catalog

Fall 2026

Proposed Effective Term

Other

Program Curriculum

Minimum Credits Required for the Program: 61

Full-Time Students

| First Semester | | Credits |
|---|---|-----------|
| CON 108 | Introduction to Construction Technology | 2 |
| ENG 111 or ENG 111X | Composition I or Composition 1 | 4 |
| MTH 157 | Technical Mathematics | 3 |
| CMG 130 | Construction Site Safety and OSHA Regulations | 3 |
| Soc. Sci. Elective(s) (https://coursecatalog.wccnet.edu/academics/general-education/#socbehavsci) | | 3 |
| Credits | | 15 |
| Second Semester | | Credits |
| CON 104 | Construction Framing I | 3 |
| CMG 180 | Application of Construction Materials | 3 |
| CON 235 | Construction - Building Codes and Prints | 3 |
| Arts/Humanities Elective(s) (https://coursecatalog.wccnet.edu/academics/general-education/#arthuma) | | 3 |
| Speech/Comp. Elective(s) (https://coursecatalog.wccnet.edu/academics/general-education/#writing) | | 3 |
| Credits | | 15 |
| Third Semester | | Credits |
| CON 105 | Construction Framing II | 3 |
| CON 204 | Construction Finishes - Interior | 3 |
| CON 205 | Construction Finishes - Exterior | 3 |
| CON 255 | Construction Concrete and Masonry | 3 |
| Nat. Sci. Elective(s) (https://coursecatalog.wccnet.edu/academics/general-education/#naturalsci) | | 3 |
| Credits | | 15 |
| Fourth Semester | | Credits |
| CMG 225 | Construction Builders License | 4 |
| CON 230 | Construction Production | 3 |
| CON 240 | Construction - Advanced Finishes and Techniques | 3 |
| CON 260 | Construction Remodeling | 3 |
| CON 270 | Construction Mechanicals | 3 |
| Credits | | 16 |
| Total Credits | | 61 |

Part-Time Students

| First Semester | | Credits |
|---|---|----------|
| CON 108 | Introduction to Construction Technology | 2 |
| MTH 157 | Technical Mathematics | 3 |
| Soc. Sci. Elective(s) (https://coursecatalog.wccnet.edu/academics/general-education/#socbehavsci) | | 3 |
| Credits | | 8 |
| Second Semester | | Credits |
| CON 104 | Construction Framing I | 3 |
| CMG 130 | Construction Site Safety and OSHA Regulations | 3 |
| CON 235 | Construction - Building Codes and Prints | 3 |
| Credits | | 9 |
| Third Semester | | Credits |
| ENG 111 or ENG 111X | Composition I or Composition 1 | 4 |
| Arts/Humanities Elective(s) (https://coursecatalog.wccnet.edu/academics/general-education/#arthuma) | | 3 |
| Credits | | 7 |
| Fourth Semester | | Credits |
| CON 105 | Construction Framing II | 3 |
| CON 204 | Construction Finishes - Interior | 3 |
| CON 205 | Construction Finishes - Exterior | 3 |
| Credits | | 9 |
| Fifth Semester | | Credits |
| CON 230 | Construction Production | 3 |
| CON 240 | Construction - Advanced Finishes and Techniques | 3 |

| | | |
|---|---------------------------------------|-----------|
| CON 260 | Construction Remodeling | 3 |
| Credits | | 9 |
| Sixth Semester | | |
| Nat. Sci. Elective(s) (https://coursecatalog.wccnet.edu/academics/general-education/#naturalsci) | | 3 |
| Speech/Comp. Elective(s) (https://coursecatalog.wccnet.edu/academics/general-education/#writing) | | 3 |
| Credits | | 6 |
| Seventh Semester | | |
| CON 255 | Construction Concrete and Masonry | 3 |
| CMG 180 | Application of Construction Materials | 3 |
| Credits | | 6 |
| Eighth Semester | | |
| CMG 225 | Construction Builders License | 4 |
| CON 270 | Construction Mechanicals | 3 |
| Credits | | 7 |
| Total Credits | | 61 |

Program Description for Catalog

This Associate of Applied Science degree provides students with a hands-on pathway for entering the construction industry. Courses are carefully selected to align with the specific skill sets required for a variety of construction tasks, including framing, finishes, mechanical systems, and advanced masonry. Students will gain experience with production processes, advanced construction techniques, and the interpretation and application of building codes. This program helps students prepare to sit for the Michigan State Builder's License Exam.

Upon completion of this degree, students will earn three credentials:

- Construction Technology I Certificate (CTCON1)
- Construction Technology II Advanced Certificate (CVCON2)
- Associate of Applied Science in Construction Technology (APCONT)

Program Description for Marketing

n/a

Admission/Eligibility Requirements

Program admission requirements

Program Admission Requirements

An Academic Math level of 3 is required for CON 204, 205, 230, 235, 240, 255, 260, and 270.

Additional program information (articulation, accreditation, advisors)

Program Assessment Plan

Learning Outcome

Learning Outcome

Sketch the floor plans, elevations, and sections needed to construct residential structures.

Assessment #1

Assessment Tool

Outcome-related portfolio project

Anticipated assessment population

All students from all sections

Standard of success to be used for this assessment

80% of students will score 80% or higher.

Who will score and analyze the data?

Departmental faculty

Scoring/evaluation tool (attach if possible)

Departmentally-developed rubric

Assessment #2

Learning Outcome

Learning Outcome

Pour and finish concrete projects used in light frame construction.

Assessment #1

Assessment Tool

Lab projects

Anticipated assessment population

All students from all sections

Standard of success to be used for this assessment

80% of students will score 80% or higher.

Who will score and analyze the data?

Departmental faculty

Scoring/evaluation tool (attach if possible)

Departmentally-developed rubric

Assessment #2

Learning Outcome

Learning Outcome

Sequence necessary steps in home construction.

Assessment #1

Assessment Tool

Written departmental exam

Anticipated assessment population

All students from all sections

Standard of success to be used for this assessment

80% of students will score 80% or higher.

Who will score and analyze the data?

Departmental faculty

Scoring/evaluation tool (attach if possible)

Answer key

Assessment #2

Learning Outcome

Learning Outcome

Demonstrate safe and effective techniques for successful residential or light frame remodels.

Assessment #1

Assessment Tool

Outcome-related lab project

Anticipated assessment population

All students from all sections

Standard of success to be used for this assessment

80% of students will score 80% or higher.

Who will score and analyze the data?

Departmental faculty

Scoring/evaluation tool (attach if possible)

Departmentally-developed rubric

Assessment #2

Budget

Anticipated budget: Faculty (include estimated amounts if possible)

N/A

Anticipated budget: Training/Travel (include estimated amounts if possible)

N/A

Anticipated budget: Materials/Resources (include estimated amounts if possible)

N/A

Anticipated budget: Facilities/Equipment (include estimated amounts if possible)

N/A

Additional Information

Is this a substantive change?

Yes

Do you anticipate this change will have an impact on the staffing, equipment, or space needs for this program?

No

Please confirm that any departments potentially impacted by the program changes have been consulted - for example, consider the Advising team, Marketing, other Academic programs that may partially overlap with this program, Scheduling, Registrar, Articulation, etc. If you need help determining which departments should be consulted, please contact the C&A office.

Yes

Reviewer Comments

Ben Linford (bjlinford) (2026-03-05T20:36:27Z): Pulled forward to Carol 3/5/26 to expedite review

Ben Linford (bjlinford) (2026-03-05T20:55:09Z): Pulled forward to CAD 3/5/26 to expedite review

Key: 156

Construction Technology (AAS)

Catalog Effective Term: Fall 2025

Program Code: APCONT

Credential: Associate in Applied Science

High Demand Occupation, High Wage Occupation

This Associate of Applied Science degree provides students with a hands-on pathway for entering the construction industry. Courses are carefully selected to align with the specific skill sets required for a variety of construction tasks, including framing, finishes, mechanical systems, and advanced masonry. Students will gain experience with production processes, advanced construction techniques, and the interpretation and application of building codes. This program helps students prepare to sit for the Michigan State Builder's License Exam.

Upon completion of this degree, students will earn three credentials:

- Construction Technology I Certificate (CTCON1)
- Construction Technology II Advanced Certificate (CVCON2)
- Associate of Applied Science in Construction Technology (APCONT)

Program Admission Requirements

An Academic Math level of 3 is required for CON 204, 205, 230, 235, 240, 255, 260, and 270.

Minimum Credits Required for the Program: 61

+ Full-Time Students

| First Semester | | Credits |
|--|---|-----------|
| CON 108 | Introduction to Construction Technology | 2 |
| ENG 111 | Composition I | 4 |
| MTH 157 | Technical Mathematics | 3 |
| CMG 130 | Construction Site Safety and OSHA Regulations | 3 |
| Soc. Sci. Elective(s) | | 3 |
| Credits | | 15 |
| Second Semester | | |
| CON 104 | Construction Framing I | 3 |
| CMG 180 | Application of Construction Materials | 3 |
| CON 235 | Construction - Building Codes and Prints | 3 |
| Arts/Human. Elective(s) | | 3 |
| Speech/Comp. Elective(s) | | 3 |
| Credits | | 15 |
| Third Semester | | |
| CON 105 | Construction Framing II | 3 |
| CON 204 | Construction Finishes - Interior | 3 |
| CON 205 | Construction Finishes - Exterior | 3 |
| CON 255 | Construction Concrete and Masonry | 3 |

| | | |
|--|---|-----------|
| <u>Nat. Sci. Elective(s)</u> | | 3 |
| | Credits | 15 |
| Fourth Semester | | |
| <u>CMG 225</u> | Construction Builders License | 4 |
| <u>CON 230</u> | Construction Production | 3 |
| <u>CON 240</u> | Construction - Advanced Finishes and Techniques | 3 |
| <u>CON 260</u> | Construction Remodeling | 3 |
| <u>CON 270</u> | Construction Mechanicals | 3 |
| | Credits | 16 |
| | Total Credits | 61 |

+ Part-Time Students

| First Semester | | Credits |
|--|---|----------|
| <u>CON 108</u> | Introduction to Construction Technology | 2 |
| <u>MTH 157</u> | Technical Mathematics | 3 |
| <u>Soc. Sci. Elective(s)</u> | | 3 |
| | Credits | 8 |
| Second Semester | | |
| <u>CON 104</u> | Construction Framing I | 3 |
| <u>CMG 130</u> | Construction Site Safety and OSHA Regulations | 3 |

PROGRAM PROPOSAL FORM

- Preliminary Approval** – Check here when using this form for preliminary approval of a program proposal, and respond to the items in general terms.
- Final Approval** – Check here when completing this form after the Vice President for Instruction has given preliminary approval to a program proposal. For final approval, complete information must be provided for each item.

| | | |
|--|--|---|
| <p>Program Name:</p> <p>Division and Department:</p> <p>Type of Award:</p> <p>Effective Year (new programs are always effective in the Fall term):</p> <p>Initiator:</p> | <p><u>Construction Technology</u></p> <p><u>Advanced Technologies and Public Service Careers</u></p> <p> <input type="checkbox"/> AA <input type="checkbox"/> AS <input checked="" type="checkbox"/> AAS <input type="checkbox"/> Cert. <input type="checkbox"/> Adv. Cert. <input type="checkbox"/> Post-Assoc. Cert. <input type="checkbox"/> Cert. of Comp. </p> <p><u>Fall 2025</u></p> <p><u>Matthew Hagood</u></p> | <p>Program Code:</p> <hr/> <p>CIP Code:</p> <p><u>52.2001</u></p> |
| <p>Program Features Program's purpose and its goals. Criteria for entry into the program, along with projected enrollment figures. Connection to other WCC programs, as well as accrediting agencies or professional organizations. Special features of the program.</p> | <p>Embedded Certificates: The program consists of two embedded certificates that students can earn as they work through the program. Both of these certificates are already offered here at WCC:</p> <ul style="list-style-type: none"> • Construction Technology I (CTCON1) • Construction Technology II (CVCON2) <p>Purpose and Goals</p> <p>The Construction Technology Associate of Applied Science Degree is designed to provide students with the technical knowledge and hands-on skills necessary to excel in the construction field. The program's goals include:</p> <ul style="list-style-type: none"> • Preparing students for careers in residential, commercial, and industrial construction through practical training. • Developing competencies in construction framing, finishes, production, and mechanics. • Equipping students with knowledge of construction codes, licensing, and startup processes. <p>Projected Enrollment Figures:</p> <ul style="list-style-type: none"> • First Year Enrollment: 20-25 students. • Growth Potential: 30-40 students within three years as industry demand increases for skilled talent in construction. <p>Connection to Other WCC Programs:</p> <ul style="list-style-type: none"> • Strong alignment with WCC's existing Advanced Technologies and Skilled Trades programs, allowing the integration of courses covering | |

| | |
|---|--|
| | <p>site safety and technical math (e.g., CMG 130 and MTH 157).</p> <ul style="list-style-type: none"> • Opportunities for students to transition into related fields like HVACR, welding, and advanced manufacturing. <p>Accreditation/Professional Connections:</p> <ul style="list-style-type: none"> • The program content meets OSHA standards for safety training. • Focus on compliance with local and national building codes. • Collaboration with construction trade organizations to enhance job placement and internship opportunities. <p>Special Features:</p> <ul style="list-style-type: none"> • Hands-On Learning: Courses such as Construction Framing (CON 104, CON 105), Advanced Finishes and Techniques (CON 240), and many others, provide practical experience. • Comprehensive Coverage: The program covers interior and exterior finishes, construction mechanics, advanced masonry and remodeling techniques. • Industry-Ready Curriculum: Emphasis on licensing, contracts, and codes ensures students are prepared for regulatory and operational aspects of construction. • Elective Flexibility: Students can select Arts/Humanities, Speech/Communication, Natural Sciences, and Social Sciences electives to tailor their education to personal and professional goals. • Capstone Skills: Advanced courses in concrete and masonry (CON 255), remodeling (CON 260), and mechanical systems (CON 270) prepare students for specialized roles. |
| <p>Need</p> <p>Need for the program with evidence to support the stated need.</p> | <p>The construction industry is considered to have a “bright outlook” according to the Department of Labor. For Construction Laborers, southeast Michigan is above the national average, at \$48.5k annually – with a 2-year degree the earning potential is even higher. Lightcast analytics has tracked a 5-8% yearly increase in open construction positions on average over the past five years. This program is intended to help address the critical workforce shortages and skills gaps in the construction industry. The employment outlook identifies construction-related skilled trades as key areas for job growth and investment. These programs at Washtenaw Community College offer stackable credentials, enabling students to enter the workforce quickly while providing pathways for further education and career advancement.</p> |
| <p>Curriculum</p> <p>List the courses in the program as they should appear in the catalog. List minimum credits required. Include any notes that should appear below the course list.</p> <p>Associate degree programs must provide a semester by semester program layout.</p> | <p>See attached spreadsheet</p> |

| Budget | START-UP COSTS | | ONGOING COSTS |
|---|--|--------------|---------------|
| | Specify program costs in the following areas, per academic year: <i>This cost has been historically budgeted in the general fund.</i> | Faculty | \$ |
| | Training/Travel | 0 | |
| | Materials/Resources | 0 | 25,000.00 |
| | Facilities/Equipment | . | . |
| | Other | . | . |
| | TOTALS: | \$ | \$ 157,013.00 |
| Program Description for Catalog and Web site | This AAS degree provides students with a hands-on pathway for entering the construction industry. Courses are carefully selected to align with the specific skill sets required for a variety of construction tasks, including framing, finishes, mechanical systems, and advanced masonry. Students will gain experience with production processes, advanced construction techniques, and the interpretation and application of building codes. This program helps students prepare to sit for the Michigan State Builder's License exam. | | |
| Program Information | Accreditation/Licensure - Advisors - Advisory Committee - Admission requirements – A math level of 3 or MTH 257 or higher is required for CON 204, 205, 230, 235, 240, 255, 260, and 270. Articulation agreements - Continuing eligibility requirements - | | |

Assessment plan: Construction Technology concentration

| Program outcomes to be assessed | Assessment tool | When assessment will take place | Courses/other populations | Number students to be assessed |
|---|-----------------------------------|---------------------------------|--------------------------------------|--------------------------------|
| 1. Sketch the floor plans, elevations, and sections needed to construct residential structures. Embedded OC#3 | Outcome-related portfolio project | Fall 2026 | CON 235 (submitted for reactivation) | All students |
| 2. Pour and finish concrete projects used in light frame construction. (embedded OC #2) | Lab projects | Fall 2026 | CON 255 (submitted for reactivation) | All students |
| 3. Sequence necessary steps in home construction. (embedded OC #1) | Written departmental exam | Fall 2026 | CON 230 | All students |

| | | | | |
|---|-----------------------------|-----------|--------------------------------------|--------------|
| 4. Demonstrate safe and effective techniques for successful residential or light frame remodels. (embedded OC #3) | Outcome-related lab project | Fall 2026 | CON 260 (submitted for reactivation) | All students |
|---|-----------------------------|-----------|--------------------------------------|--------------|

Scoring and analysis plan:

1. Indicate how the above assessment(s) will be scored and evaluated (e.g. departmentally-developed rubric, external evaluation, other). Attach the rubric.

Outcomes 1, 2, and 4: Departmentally-developed rubric




Outcome 3: Answer key

2. Indicate the standard of success to be used for this assessment.

80% of students will score 80% or higher.

3. Indicate who will score and analyze the data.

Departmental faculty

| REVIEWER | PRINT NAME | SIGNATURE | DATE |
|--|----------------------|--|--------------|
| Department Chair/Area Director | Brian Martindale | Brian Martindale /s/ | 02/10/2025 |
| Dean | Eva Samulski | Eva Samulski /s/ | Feb. 9, 2025 |
| Please return completed form to the Office of Curriculum and Assessment (SC 257) or by email to curriculum.assessment@wccnet.edu. Once reviewed by the appropriate faculty committees, we will secure the signature of the VPI and President. | | | |
| Curriculum Committee Chair | Randy Van Wagnen | R Van Wagnen | Feb 28, 2025 |
| Assessment Committee Chair | Jessica Hale |  | 3/12/25 |
| Executive Vice President for Instruction | Dr. Brandon Tucker |  | 3/13/25 |
| <input type="checkbox"/> Approved for Development <input checked="" type="checkbox"/> Final Approval | Dr. Rose B. Bellanca |  | 3/25/25 |
| President | | | |
| Board Approval | | | 4/22/2025 |

Construction Technology (AAS)

| First Semester | | Credits |
|--------------------------|---|-----------|
| CON 108 | Introduction to Construction Technology | 2 |
| ENG 111 | Composition I | 4 |
| MTH 157 | Technical Math | 3 |
| CMG 130 | Construction Site Safety and OSHA Regulations | 3 |
| Soc. Sci. Elective(s) | | 3 |
| | Credits | 15 |
| Second Semester | | |
| CON 104 | Construction Framing I | 3 |
| CMG 180 | Application of Construction Materials | 3 |
| CON 235 | Construction - Building Codes and Prints | 3 |
| Arts/Human. Elective(s) | | 3 |
| Speech/Comp. Elective(s) | | 3 |
| | Credits | 15 |
| Third Semester | | |
| CON 105 | Construction Framing II | 3 |
| CON 204 | Construction Finishes - Interior | 3 |
| CON 205 | Construction Finishes - Exterior | 3 |
| CON 255 | Construction Concrete and Masonry | 3 |
| Nat. Sci. Elective(s) | | 3 |
| | Credits | 15 |
| Fourth Semester | | |
| CMG 225 | Construction Builders License | 4 |
| CON 230 | Construction Production | 3 |
| | | 3 |
| CON 240 | Construction - Advanced Finishes and Techniques | 3 |
| CON 260 | Construction Remodeling | 3 |
| CON 270 | Construction Mechanicals | 3 |
| | Credits | 16 |
| | Total Credits | 61 |

Students who follow this degree will earn the following:

Current Construction Technology I Certificate (CTCON1) - (CON 104, CON 105, CON 108, CON 204, CON 205, CON 255)

Current Construction Technology II Certificate (CVCON2) - (CMG 225, CON 230, CON 235, CON 240, CON 260, CON 270)

Associate of Applied Science in Construction Technology