# 2022-23 ACADEMIC PROGRAMS

# 2022-2023 INDUSTRIAL TRAINING (ASINDT)

#### Program is also available online

#### Description

This program gives indentured journeymen of the United Association or Ironworkers, the opportunity to apply their work as certified apprentice instructors toward an associate in science degree in Industrial Training. Students will complete the general education courses, five summer instructor training sessions, and receive prior learning credits for experience in an area of specialization such as plumbing, pipefitting, HVAC, sprinkler fitting and ironworking.

#### Articulation

Eastern Michigan University, several BS degrees; Ferris State University, Bachelor degree. Copies can be obtained from the Counseling Office, a program advisor, or from the Curriculum and Assessment Office Web site: https://www.wccnet.edu/learn/transfer-wcc-credits/articulation-agreements.php .

#### **Admissions Requirements**

Open only to United Association and Ironworker instructors.

#### **Course Requirements**

## **Major/Area Requirements**

Class	Title	Minimum Credits
	UA students must complete a minimum '	
	additional credits from a combination of require	d
	teaching methods courses and technical upda	te
	courses (UAT courses).	
	Ironworker students must complete 15 credi	ts
	from a combination of required teaching method	ls
	courses and technical update courses (IWT courses	5).
Total		12

#### **General Education Requirements**

Class	Title	Minimum Credits
Writing	Elective(s)	6
UAT 210	Public Speaking*	1.5
UAT 213	Planning, Teaching and Assessing Effective Lesson - Advanced*	s 1.5
Math	Elective(s)	3
Nat. Sci.	Elective(s)	3
	Nat. Sci. Lab Elective(s)	3
Soc. Sci.	Elective(s)	6
Arts/Human.	Elective(s)	6
	General Education Elective(s) (0-2 credits) to reach minimum 30 General Education Credits	a 2

Total

#### **Total Credits Required: 44**

Accurate as of 02/22/2023 Information is subject to change without notice.

#### Concentrations

## Architectural and Ornamental Ironworker (AOIW)

Class IWA 120 Introduction to Ironwork 3	Title	Minimum Credits
IWA 122 Ironworker - General Rigging 2 IWA 131 Introduction to Metal Building 2		
	nd	
IWA 201 Introduction to Welding 3 IWA 224 Labor and Trade History 1		
IWA 265 Advanced Architectural and Ornamen Ironwork 6	al	
Total		19

32

#### **Total Credits Required: 63**

#### HVAC Specialty (HVTC)

Class Title UAE 140 Introduction to HVACR Service Technician Practices 3 UAE 142 Soldering and Brazing 3 UAE 144 Refrigeration 2 UAE 146 Air Conditioning 2 UAE 148 Electrical Controls 2 UAE 150 DC Electronics 2 UAE 152 Advanced Electrical Controls and Pneumatic Controls 3 UAE 154 Advanced Air Conditioning and Refrigeration 3 UAE 156 Air and Water Balancing and Motor Alignment 3 UAE 158 Advanced HVACR Practices 3 Total

#### **Total Credits Required: 70**

#### Journeyman Ironworker (JMIW)

Class Title IWA 120 Introduction to Ironwork 3 IWA 122 Ironworker - General Rigging 2 IWA 131 Introduction to Metal Building 2 IWA 141 Introduction to Reinforcing Ironwork 3 IWA 155 Rigging/Machinery Mover II 3 IWA 161 Introduction to Architectural and Ornamental Ironwork 2 IWA 172 Introduction to Structural Features 4 IWA 201 Introduction to Welding 3 IWA 224 Labor and Trade History 1 IWA 272 Advanced Structural Features 3 Total

#### **Total Credits Required: 70**

#### **Metal Building Erector (MTBE)**

Title Class IWA 120 Introduction to Ironwork 3 IWA 122 Ironworker - General Rigging 2 IWA 131 Introduction to Metal Building 2 IWA 161 Introduction to Architectural and Ornamental Ironwork 2 IWA 172 Introduction to Structural Features 4 IWA 201 Introduction to Welding 3 IWA 224 Labor and Trade History 1 IWA 235 Advanced Metal Building 2 Total

#### **Total Credits Required: 63**

#### **Pipefitter Specialty (PIPE)**

Class Title UAF 102 Introduction to Arc Welding, Soldering, and Brazing 3 UAF 120 Introduction to Pipefitter Practices 3 UAF 122 Drawing Interpretation and Plan Reading 2 UAF 124 Oxy Fuel Cutting and Shielded Arc Welding 2 UAF 126 Hydronic Heating and Steam Systems 2 UAF 128 Refrigeration and Electrical Controls 2 UAF 130 Advanced SMAW Welding 3 UAF 132 Advanced Pipefitter Topics 3 UAF 134 Controls and Instrumentation 3 UAF 136 GTAW Welding 3 Total 26 **Total Credits Required: 70 Plumber Specialty (PLUM)** 

Title

Class

2 2022-23 Catalog - Washtenaw Community College

**Minimum Credits** 

26

**Minimum Credits** 

26

Minimum Credits

19

**Minimum Credits** 

**Minimum Credits** 

UAP 100 Introduction to Plumbing Practices 3 UAP 102 Introduction to Arc Welding, Soldering and Brazing 3 UAP 104 Drawing Interpretation and Plan Reading 2 UAP 106 Oxy Fuel Cutting and Shielded Arc Welding 2 UAP 108 Water Supply and Drainage 2 UAP 110 Customer Service Techniques 2 UAP 112 Plumbing Fixtures and Appliances 3 UAP 114 Plumbing Codes and Regulations 3 UAP 116 Medical Gas and Backflow Prevention Techniques 3 UAP 118 Advanced Plumbing Practices 3 Total

#### **Total Credits Required: 70**

# **Reinforcing Ironworker (REIW)**

Class	Title	Minimum Credi
IWA 120 Introduction to Ironwork 3		
IWA 122 Ironworker - General Rigging 2		
IWA 141 Introduction to Reinforcing Ironwork 3		
IWA 201 Introduction to Welding 3		
IWA 224 Labor and Trade History 1		
IWA 241 Advanced Reinforcing Ironwork 7		
Total		19

#### **Total Credits Required: 63**

# **Rigger/Machinery Mover (RGMM)**

Class	Title	Minimu
IWA 120 Introduction to Ironwork 3		
IWA 122 Ironworker - General Riggir	וg 2	
IWA 151 Rigging/Machinery Mover I	3	
IWA 155 Rigging/Machinery Mover I	13	
IWA 191 Reinforced Iron and Structu	ires for Rigging 4	
IWA 201 Introduction to Welding 3		
IWA 224 Labor and Trade History 1		
Total		19

#### **Total Credits Required: 63**

## Sprinkler Fitter Specialty (SPRF)

Class UAR 160 Introduction to Sprinkler Fitter Practices 3 UAR 162 Basic Drawing and Introduction to Automatic Sprinklers 3 UAR 164 Reading Automatic Sprinkler Pipin Drawings 2 UAR 166 Installation of Sprinkler Systems 2 UAR 168 Architectural Working Drawings an Blueprint Reading for Sprinkler Fitters 2 UAR 170 Sprinkler Water Supply and The Automat Sprinkler 2 UAR 172 Types of Fire Protection Systems an Alarms 3 UAR 174 Special Application Sprinkler Systems an Hydraulics 3 UAR 176 Human Relations 3 UAR 178 Technical Writing 3 Total	io Ig ic Id	Minimum Credit
Total Credits Required: 70		

Title

# **Trade Related Elective Credits (TRI)**

Class Trade Related Elective Credits (19-26) 19-26 Total

## **Total Credits Required: 63**

26

dits

num Credits

dits

**Minimum Credits** 

19