

**GENERAL TECHNOLOGY  
STRUCTURAL AND PIPE WELDING PATHWAY  
Associate of Applied Science: 68 Credits**

<b>Associate of Applied Science</b>		<b>68 HRS</b>
TECH 12074 Technical Success Strategies	4	
TECH 11163 Workplace Writing (or higher)	3	
MATH 10103 Technical Math (or higher)	3	
HIST 21103/21203 US History I -OR II	3	
PLSC 20003 American Government	3	
TECH 12064 Technical Fundamentals	4	
WELD 20164 Fitting	4	
WELD 23464 Welding I – SMAW I	4	
WELD 23564 Welding II – SMAW II	4	
WELD 23665 Welding III – MIG (GMAW)	5	
WELD 23765 Welding IV – TIG (GTAW)	5	
WELD 22064 Pipe Welding – FCAW	4	
WELD 21164 Pipe Welding – GMAW	4	
WELD 24064 Pipe Welding – GTAW Low Alloy and Stainless Steel	4	
WELD 23064 Pipe Welding – GTAW Carbon Steel	4	
WELD 21065 Pipe Welding – SMAW	5	
WELD 22165 Pipe Welding – SMAW Stainless Steel	5	

<b>Technical Certificate: Welding Technology</b>		<b>30 HRS</b>
<i>TECH 11163 Workplace Writing*</i>	3	
<i>MATH 10103 Technical Math**</i>	3	
TECH 12074 Technical Success Strategies	4	
TECH 12064 Technical Fundamentals	4	
WELD 20164 Fitting	4	
WELD 23464 Welding I – SMAW I	4	
WELD 23564 Welding II – SMAW II	4	
WELD 23665 Welding III – MIG (GMAW)	5	
WELD 23765 Welding IV – TIG (GTAW)	5	

<b>Technical Certificate: Pipe Welding Technology</b>		<b>30 HRS</b>
<i>TECH 11163 Workplace Writing*</i>	3	
<i>MATH 10103 Technical Math**</i>	3	
TECH 12074 Technical Success Strategies	4	
WELD 22064 Pipe Welding – FCAW	4	
WELD 21164 Pipe Welding – GMAW	4	
WELD 24064 Pipe Welding – GTAW Low Alloy and Stainless Steel	4	
WELD 23064 Pipe Welding – GTAW Carbon Steel	4	
WELD 21065 Pipe Welding – SMAW	5	
WELD 22165 Pipe Welding – SMAW Stainless Steel	5	

<b>Certificates of Proficiency (CPs) for General Welding</b>		<b>HOURS</b>
<b>CP: SMAW Welding</b>		<b>12 HRS</b>
TECH 12064 Technical Fundamentals	4	
WELD 23464 Welding I – SMAW I	4	
WELD 23564 Welding II – SMAW II	4	
<b>CP: Structural and Pipe Fitting</b>		<b>8 HRS</b>
TECH 12064 Technical Fundamentals	4	
WELD 20164 Fitting	4	
<b>CP: MIG Welding</b>		<b>9 HRS</b>
TECH 12064 Technical Fundamentals	4	
WELD 23665 Welding III – MIG (GMAW)	5	
<b>CP: TIG Welding</b>		<b>9 HRS</b>
TECH 12064 Technical Fundamentals	4	
WELD 23765 Welding IV – TIG (GTAW)	5	

<b>Certificates of Proficiency (CPs) for Pipe Welding</b>		<b>HOURS</b>
<b>CP: GTAW Pipe Welding</b>		<b>8 HRS</b>
WELD 24064 Pipe Welding – GTAW Low Alloy and Stainless Steel	4	
WELD 23064 Pipe Welding – GTAW Carbon Steel	4	
<b>CP: SMAW Pipe Welding</b>		<b>10 HRS</b>
WELD 21065 Pipe Welding – SMAW	5	
WELD 22165 Pipe Welding – SMAW Stainless Steel	5	
<b>CP: GMAW/FCAW Pipe Welding</b>		<b>8 HRS</b>
WELD 21164 Pipe Welding – GMAW	4	
WELD 22064 Pipe Welding – FCAW	4	

**ADVISOR:** Tiana Kelly [tkelly@cccua.edu](mailto:tkelly@cccua.edu)

**Eligible for ARFuture Grant** [ADHE Scholarship Application Management System - Scholarship - ARFUTURE](#)

**PROGRAM INFORMATION:** Students must complete a Technical Certificate in Welding Technology prior to entering the Pipe Welding Certificate program. National Center for Construction Education and Research (NCCER) curriculum will be used for instruction toward both NCCER accreditation and American Welding certification; additional work experience may be necessary depending on the level of proficiency in various forms of welding developed during instruction.

**CAREER OPTIONS:** The Technical Certificates and Certificates of Proficiency focus on welding processes designed to develop the skills necessary for entry into industrial and commercial welding employment. Pipe Welding is an advanced welding program designed to prepare graduates for employment in pipe welding related jobs and/or higher paying jobs in general welding positions.



Score Requirements			
Subject	Next Gen	ACT	Accuplacer
Reading	230	17	78
Writing	255	17	83
Math	240	17	30

\* Workplace Writing is required if Reading and Writing scores are lower than required scores. Student must score above in both areas to test out of Workplace Writing.

\*\*If Math scores are lower than the required score, Technical Math is required. Reading scores are required for Technical Math. If Reading scores are below what is required, Workplace Writing is a co-req to Technical Math.