



# Northeast Regional Career & Technical Education Pathway Plan

## Cluster: Manufacturing

## Pathways: Production; Maintenance, Installation, and Repair

This Career Pathway can serve as a guide, along with other career planning materials, as students continue on a career path. Courses listed within this plan are only recommended coursework and should be individualized to meet each student's educational and career goals. 28 credits needed for graduation.

Student Name: \_\_\_\_\_

Grade: \_\_\_\_\_

School Name: \_\_\_\_\_

		Gr.8	Gr.9	Gr.10	Gr.11	Gr.12	Workbased Learning Experiences			
Academic	Language Arts		English I	English II	English III	English IV	<b>High School WBL</b>	Internships		
	Math		Math	Math II	Math III	Math IV	CTE Internships	Virtual Tours		
	Science		an Earth Science	Biology	a Physical Science		Job Shadowing	Apprenticeships		
	Social Studies		World History	Amer. Hist. I/II	Civics/Economics		Field Trips			
	Other		Health/PE				Classroom Speakers	<b>Workforce Dev WBL</b>		
		Students planning to attend a 4 year university should take two levels of the same foreign language.						Virtual Tours	Internships	
		Writing intensive coursework is highly recommended.						Skills USA aand TSA	Apprenticeships	
		Electives--Students choose from CTE Foundation & Enhancement options below.							On-the-job Training	
	CTE Preparation	Foundation	<b>Complete minimum of 4 courses to earn CTE Concentrator Status--one must be starred * course</b>						<b>Com College WBL</b>	Simulations
			<b>Foundational Options (or their CCP Equivalents)</b>						Shadowing	
						<b>Articulated College Credit Opportunities</b>				
		Welding I, II*III			Electrical I,II*			Welding I	WLD Cutting Processes	
		Cabinetmaking I, II*, III			Electronic I, II*			Welding II	WLD 121 GMAW (MIG) PCAW/Plate	
		Metals Manufacturing I, II*			Project Management I, II*, III			Welding III	WLD 122 GMAW (MIG) Plate/Pipe	
		Intro to Trades & Industrial Education			Advanced Manufacturing I, II*			Cabinetmaking I & II	CAB 111 Cabinetmaking I	
Enhancement		<b>Students Can Opt to Replace One Foundation Course Above with Enhancement Course</b>						Metals Manufacturing I & II	BPR 111, MAC111,MAC151	
		Ag Mechanics I			Microsoft Word & Powerpoint			Electrical I & II	ELC 113 Basic Wiring I	
		Microsoft Excel & Access			Personal Finance			Electronics I & II	ELC 112 and ELC126 or EGR 131	
Credentials	CTE Internship and/or Apprenticeship			Drafting I <a href="#">See state cluster doc for other options</a>						
	CRC (WorkKeys)			ETA EM1-Electron I			<a href="#">See state credentials by course document for credentials related to Metals Manufacturing I, II.</a>			
	OSHA 10 hour-Welding I			ETA EM4-Electron II						
	SMAW and GMAW-Welding II			ETA EM2-Electron III						
	SMAW ,GMAW, GTAW-Welding III			Investigate local offerings of <b>Certified Production Technician</b>						
	<b>Business/Industry Certification Options:</b> KAIZEN,LEAN Man., Six Sigma, AWS									
Career Counseling	<b>8th Grade</b>		<b>9-12th Grade</b>				<b>Career Diploma Endorsement Requirements</b>			
	Exploring Career Decisions learning styles inventory Career counseling plans grades 8 - 14+		ACT PLAN or comparable assessment ACT College Readiness Assessment				CTE Concentrator Status 2.6 Unweighted GPA Mimimum of one industry credential			