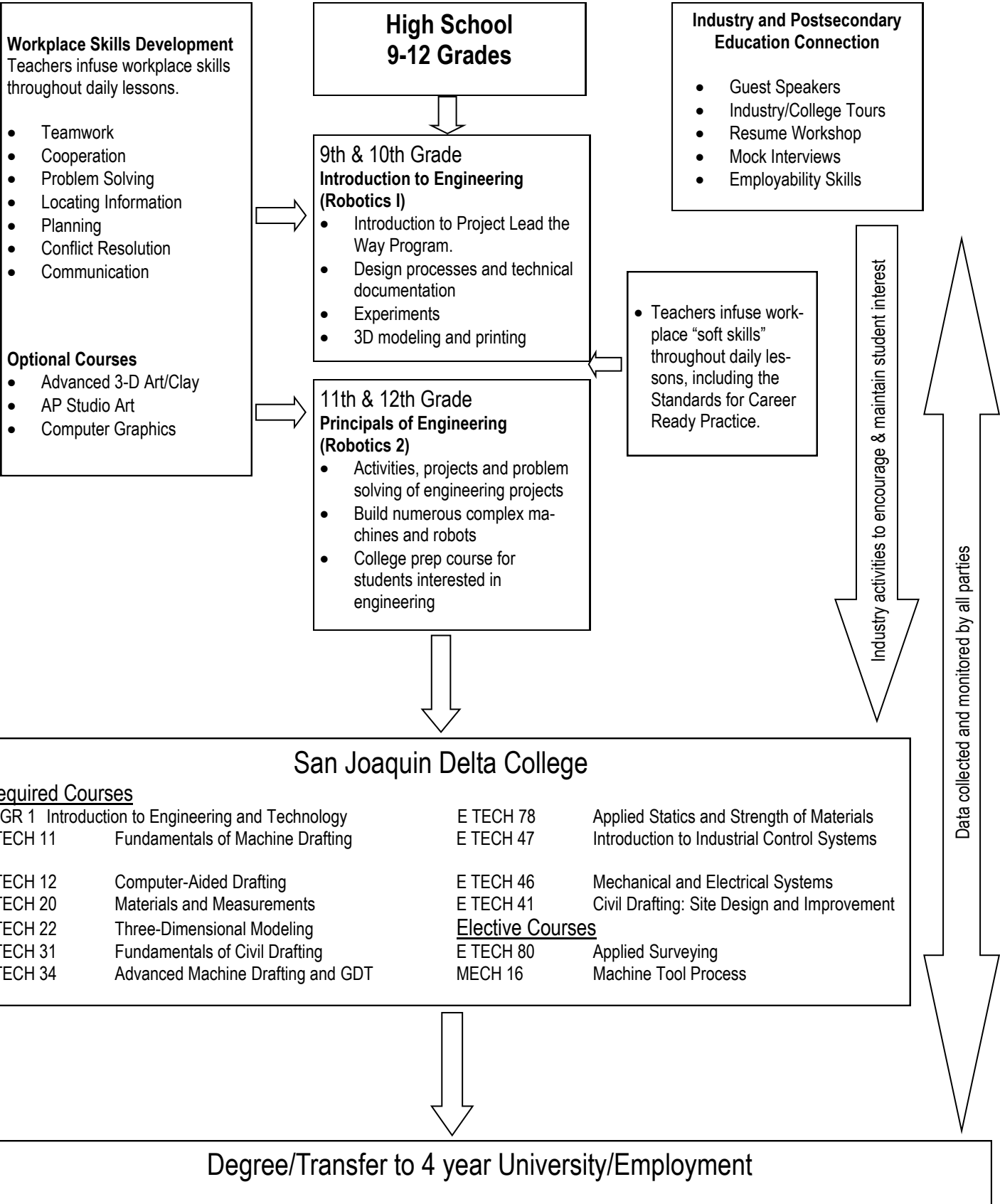


Engineering Pathway (CVHS)

CTE Sector: Engineering & Architecture—CTE Pathway: Engineering & Design



Program of Study Worksheet

This Program of Study should be customized with course titles and appropriate high school graduation requirements as well as college entrance requirements.

Industry Sector: Engineering & Architecture

Career Pathway: Engineering & Design Pathway - Central Valley High School

Program of Study: Engineering & Robotics

This Program of Study is a formalized Tech Prep articulated pathway Yes No

LEVELS	GRADE	English/ Language Arts	Math	Science	Social Studies	Career Technical Education Courses	Other Required Courses or Recommended Electives	SAMPLE Occupations Relating to this Pathway
SECONDARY	9	English 9	Math 1 or Acc Math 1	Physics in the Universe or Biology	Human Geography	Intro to Engineering	Computer Programming	Occupations requiring less than a Baccalaureate Degree -Computer Programmer -Network Administrator -Data Communications Spec. -Tech Writer Occupations requiring a Baccalaureate Degree -Network Engineer -Software Engineer
	10	English 10	Math 2 or Acc Math 2	Biology or Chemistry	World History or European History	Intro to Engineering	PE Drivers Ed Health	
	11	English 11	Math 2 or Acc Math 2 or Pre- Calculus	Chemistry or Physics	US History or AP US History	Intro to Engineering or Principals of Engineering	Foreign Language PE	
	12	English 12	Finite Math or Pre- Calculus or AP Calculus or AP Statistics	Physics or AP Physics or Anatomy Physiology	Principles of Democracy or AP Government or Economics	Principles of Engineering	Computer Graphics	
Sample of post-secondary courses at San Joaquin Delta College								
POSTSECONDARY	Year 13	<u>Required Courses</u> ENGR 1 Introduction to Engineering and Technology E TECH 11 Fundamentals of Machine Drafting E TECH 12 Computer-Aided Drafting			E TECH 78	Applied Statics and Strength of Materials		
	Year 14	E TECH 20 Materials and Measurements			E TECH 47	Introduction to Industrial Control Systems		
		E TECH 22 Three-Dimensional Modeling			E TECH 46	Mechanical and Electrical Systems		
	Year 15	E TECH 31 Fundamentals of Civil Drafting			E TECH 41	Civil Drafting: Site Design and Improvement		
Year 16	E TECH 34 Advanced Machine Drafting and GDT			<u>Elective Courses</u> E TECH 80 Applied Surveying MECH 16 Machine Tool Process				
Industry recognized certification, licenses, or credentials related to this pathway -Computer Programming Specialist -Computer Network Tech -Computer Network Admin.								

