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Student Organization:
SkillsUSA

ENGINEERING

REQUIRED COURSES:

CODE:	DESCRIPTION:
175001	Introduction to Engineering Design
175002	Principles of Engineering
175007	Digital Electronics
177013	Aerospace Engineering

GRADUATION SEALS AVAILABLE:

Industry Recognized Credential Seal
Earn 12 Points worth of IRC's

Technology Seal
Pass two Microsoft Office Certification Exams

Ohio Means Job Readiness Seal
Complete OMJ Readiness Seal Validation Form

SCAN

PROGRAM VIDEO

Project Lead The Way (PLTW) is the leading provider of rigorous and innovative Science, Technology, Engineering, and Mathematics (STEM) education curricular programs used in middle and high schools across the U.S. STEM education is at the heart of today's high-tech, high-skill global economy. For America to remain economically competitive, our next generation of leaders–the students of today–must develop the critical-reasoning and problem-solving skills that will help make them the most productive in the world. STEM education programs like the one offered by PLTW engage students in activities, projects, and problem-based learning, which provides hands-on classroom experiences. Students create, design, build, discover, collaborate and solve problems while applying what they learn in math and science. PLTW's comprehensive curriculum for engineering science has been collaboratively designed by PLTW teachers, university educators, engineering professionals, and school administrators to promote critical thinking, creativity, innovation, and real-world problem-solving skills in students. The PLTW curriculum is founded in the fundamental problem-solving and critical-thinking skills taught in traditional career and technical education (CTE), but at the same time integrates national academic and technical learning standards and STEM principles.

ENGINEERING

INDUSTRY RECOGNIZED CREDENTIAL (IRC) OPPORTUNITIES:

INDUSTRY CREDENTIAL	VENDOR/PROVIDER	IRC POINTS
Microsoft Office Specialist Word 2019	Certiport	3
Microsoft Office Specialist Excel 2019	Certiport	3
Microsoft Office Specialist PowerPoint 2019	Certiport	3
Microsoft Office Specialist Outlook 2019	Certiport	3

TRANSCRIPTED IN-STATE TRANSFERABLE CREDIT OPPORTUNITIES:

COLLEGE/UNIVERSITY	DEGREE/COURSES	POTENTIAL CREDITS
Cuyahoga Community College	Introduction to Robotics	2
Cuyahoga Community College	Basic Robotics with Math	2
OHE | CTAG	Engineering Design (175001)	3
OHE | CTAG	Digital Electronics (175007)	4

ARTICULATION AGREEMENTS:

No Articulations Agreements Available at this Time

ENGINEERING

Required Courses:
Ohio Department of Education required courses taught within the career-technical program.

Industry-Recognized Credential (IRC) Opportunities:
Each Ohio Department of Education approved industry-recognized credential has been assessed a point value based on employer demand and other factors to allow students the opportunity to bundle credentials for graduation. Career-technical education credentials primarily reflect education, industry licenses, industry certificates and postsecondary degrees.

Transcripted In-State Transferable Credit/CTAGs:
Alignment between secondary and postsecondary career-technical education content. Earned college credits are transferable to Ohio public institutions of higher education (OHE).

Articulation/Bilateral Agreements and Opportunities:
A partnership between institutions (PCSD and colleges/universities) to recognize credits which will be accepted when a student enrolls into a college or university to pursue a specific degree program.

OHIO HIGHER EDUCATION CREDIT TRANSFER TOOL

CTAG transferable credits are earned through career technical WebXam assessments (See REQUIRED COURSES on the first page) and are alignments between secondary (high school) and postsecondary (e.g., college) institutions.

The postsecondary institution retrieves and verifies data if the students check the box on their WebXam(s) giving consent. Support for acquiring CTAGs varies at postsecondary institutions. Students should notify the postsecondary institutions of their available CTAG transferable credits.

STEP 1: *Pass PCSD Career Tech Program WebXam(s) and ensure the box at the end of the exam is checked allowing Ohio institutions to obtain score(s).*
STEP 2: *Contact postsecondary counselor and inform them of the CTAG transferable credits in the following areas:*

175001 Engineering Graphics
175007 Digital Electronics

STEP 3: *Notify the postsecondary Registrar's office, Tech Prep office, or department chair as applicable.*