

CAREER & TECHNICAL EDUCATION

Real Skills for the Real World

Engineering

Design. Build. Innovate.

Enroll today!

cte.mpls.k12.mn.us



For more information please contact your counselor or email: cteinfo@mpls.k12.mn.us



Intro to Engineering Design – 95406*

Semester-long course, 1.0 credit

Do you like solving problems? In this course explore modern prototyping tools including 3D printers and scanners, laser engravers, and a variety of other lab tools to through individual and small group projects. Special attention is placed on 3D computer modeling to design, produce, and evaluate innovative products.

Principles of Engineering – 95416*

Semester-long course, 1.0 credit

Apply the engineering design process to solve real-world problems in fields such as mechanical engineering, robotics, infrastructure, environmental sustainability, and product design/development. Through individual and team activities, projects, and problems, you will practice common engineering design and development protocols – experimental design, prototyping, testing, project management, and peer review.

Digital Electronics – 95426*

Semester-long course, 1.0 credit

From smartphones to appliances, digital circuits are all around us. Interested in electrical engineering, electronics, or circuit design? In this course you will learn to solder and design circuits using combinational and sequential logic and are exposed to circuit design tools used in industry, including logic gates, integrated circuits, programmable logic devices, teamwork, engineering standards, and technical documentation.

Civil Engineering & Architecture – 95506*

Semester-long course, 1.0 credit

Ever wondered about what it took to design and build the city you live in? In this course you will take on the role of architect and civil engineer as you learn about residential and commercial buildings, site design and development, and standard engineering practices; develop skills in engineering calculations, technical representation, design documentation, and 3D architectural design.

Engineering Design & Development – 95506*

Semester-long course, 1.0 credit

Apply your engineering know-how and entrepreneurial skills in this capstone course. Design a patentable engineering product – initial concept through prototype and present your prototype to industry and manufacturing professionals.

*Course eligible for college credit.



MINNEAPOLIS
PUBLIC SCHOOLS