GENERAL MECHANICS (GENMC)

GENMC-100 BASIC AUTOMOTIVE SYSTEMS 2 Credits
Provides an overview of automotive system operations, maintenance, and basic repair procedures. Subjects discussed include time management, proper use of tools, use of sealants and lubricants, belts and hoses, starting and charging systems, braking and suspension systems, engine theory, transmissions, and comprehensive vehicle inspections.

GENMC-102 ELECTRICAL 6 Credits
Instruction covers basics of components and the technical aspects of repair and overhauling instrumentation, ignition, charging, and starting systems. Demonstration and hands-on experience to diagnose and repair automotive electrical systems and wiring diagrams will be covered in a laboratory environment. Components will be tested and repaired to manufacturers' specifications. Quality, cleanliness, and work attitude are stressed.

GENMC-103 POWER TRAINS LECTURE AND LAB 6 Credits
Study of various types of manual transmissions and transaxles, drivelines, clutches, flywheels, rear axles, and differentials found in modern automobiles and light trucks. Operation and repair of various components of power trains and their interrelationships provided.

GENMC-105 ENGINES LECTURE AND LAB 6 Credits
Study of principles and practical application in the repair and overhaul of the engine block, cylinder heads and valve train including camshaft, timing gears and chains, identification and replacement of defective parts, and operation of related machine tools. Technical materials are related to components used in engine blocks, cylinder heads, valve trains or similar mechanized applications.

GENMC-115 CHASSIS, SUSPENSION, AND BRAKES LEC/LAB 6 Credits
Chassis, suspension alignment and repair, theory and service of power and manual steering gears, wheel and tire diagnosis and balance, and all types of brakes and controls found in the modern automobile and light truck. Shop experience in suspension and steering adjustment, repair and alignment, power steering service, tire and wheel balancing, brakes and controls, and the care and use of related tools, instruments and equipment. Other shop projects may be assigned to fit individual needs.

GENMC-126 SAFETY 2 Credits
General principles are needed to foster a safe attitude and work environment. Topics covered include hazardous materials, safe use of equipment and tools, an introduction to the occupation, and health and safety concerns in the work place. Students are required to take first aid and CPR training.

GENMC-190 DIRECTED STUDY IN GENERAL MECHANICS 1-12 Credits
Individual instruction and self-study established to meet specific training objectives. May be repeated. Credits earned may not be directly applicable to degree or certificate.