**COURSE OUTLINE
COURSE: TUNE-UP and EMISSIONS 120**

**YEAR: 2023-2024**

**TEACHER: E. HARRIS**

**Resources: CDX Learning Systems - Online Automotive Resource**

Part 1: Introduction (3 Weeks)

* The Automobile- Automotive Systems, and Body Types
* Careers in Automotive
* Shop safety
* Operation and Layout of Shop and Equipment
* Basic Hand Tools
* Power Tools
* Special Tools
* Measuring Tools
* Fasteners
* Service Information

Part 2: Fuel Systems (2 Weeks)

* + Fuel Supply Systems
	+ Fuel Tanks and Pumps
	+ Types of Fuels

Part 3: Fuel Injection (3 Weeks)

* Types of Injection
* Engine Sensors
* Diagnosis and Repair of Electronic Fuel Injection

Part 4: On-Board Diagnostics and Scan Tools (3 Weeks)

* OBD II Systems
* Operating and Using Scan Tools
* Identifying, Diagnosing, and Erasing Diagnostic Trouble Codes

Part 5: Carburetion/ Diesel Injection Systems (1Week)

* Carburetor Fundamentals
* Carburetor Types
* Diesel Injection Fundamentals

Part 6: Intake Systems (1 Week)

* Intake and Exhaust Manifolds
* Air Cleaners
* Manifold Heat

Part 7: Emission Control Systems (3 Weeks)

* Air Pollution
* Emission Control Systems
* Monitoring Emission Controls
* OBD II Computer Monitoring
* Using Diagnostic Scan Tool to Test

Part 8: Tune Ups (2 Weeks)

* Procedures
* Specifications
* General Rules and Guidelines to Follow
* Regular Maintenance

EVALUATION:

THEORY - 40%

PRACATICAL - 40%
EXAM - 20%