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MEMORANDUM

TO: District Career and Technical Education Directors
Technical Center Directors
Florida College Occupational Deans

FROM: Rod Duckworth

DATE: March 31, 2014

SUBJECT: Available Summer Training for Florida Automotive Instructors

Automotive instructors are invited to participate in the 11th Annual Florida Automotive Instructors Summer Training Workshop to be held June 9-13 at Mid Florida Technical Institute in Orlando, Florida. This workshop is a cooperative effort between the Florida Automobile Dealers Association (FADA), the Central Florida Auto Dealers Association, the Florida Department of Education, Southeast Toyota Distributors, BMW, Honda, ACDelco, Snap-on Tools, Hunter Engineering, ProCut, ATech/Learning Labs, Gates, Bosch, CDX, Electude, Matco, National Institute for Automotive Service Excellence/National Automotive Technicians Education Foundations (ASE/NATEF), Jaeger/LJCreate and Consulab to provide automotive instructors with advanced training in the following areas:

BMW: BMW i3 All Electric Carbon Fiber Vehicle

This class will cover all major technical systems of the new BMW i3. The i3 boasts unique electric vehicle architecture with carbon passenger compartment and aluminum modules for the electric motor, high voltage battery and chassis.

Toyota: Maintenance and General Service

This entry-level technician's class provides the tools for an entry-level technician to perform his or her job duties as a Toyota maintenance technician. The class will cover the following topics:

- Introduction to Toyota Training
- The Toyota Information System – TIS
- Toyota Maintenance Overview
- Shop Safety
- Tools and Equipment
- Vehicle Preparation
- Vehicle Service Information
- Inspection, Adjustment, and Service
- ASM Consultation and Vehicle Delivery

Instructors attending this class will receive a printed copy of the instructors guide and technician handbook as well as all materials in a digital format.

Honda: Honda Service Information

Learn how to navigate through Honda's vast online resources. Attendees to this class will receive access to Honda's online repair and training information.

ACDelco: Body Controls – Network – Global Diagnostics

This course will help experienced technicians improve their diagnostic skills on electrical circuits. The course focuses on various electrical faults found on electronic module networking, intermittent electrical faults, identifying various serial data circuits and proper meter usage to diagnose electrical systems. The new GM Global Serial Data Architecture is also covered.

Consulab (morning): Teaching Basic Electricity & Electronics

The fundamentals of electricity/electronics seem to be a stumbling block for many automotive students and technicians. This seminar will offer what may be considered a non-traditional method of teaching these topics to students. We will examine instructional circuits and use hands on methods to look at Ohm's Law behavior from a simple series circuit to an automotive control circuit. The seminar will involve hands on exercises and will include a comprehensive handout.

(afternoon): Understanding Direct Fuel Injection

This new technology is rapidly being engineered into today's vehicles by more and more manufacturers. This seminar will present the basics of how GDI (gasoline direct injection) operates, the components that make up the system and some basic diagnostic procedures and what the industry is seeing with these vehicles. It is designed for instructors who have little experience with this technology and want to know more about it and how to teach this subject to their students.

Gates and Snap-on (combo class)

Gates (morning):

Explore root cause failures along with the effects they have on the Accessory Belt Drive System (ABDS), Timing Belt System, Coolant System and Fuel Line. During this session you will learn:

- Why belt noise is symptomatic of a system failure, not a belt issue.
- How loss of tension affects the accessory system as a whole.
- Three failure modes a tensioner demonstrates when it begins to fail.
- Why 95% of Timing belt system failures happen “after” you install a new belt.
- Why “**if**” certain conditions prevail in the coolant system, failure can be imminent.
- Why 90% of all fuel line hose sold is not compatible with today’s fuels.

Snap-on (afternoon): Utilizing your Snap-on Scanner/Scope in the classroom

The class will show how to maximize the record/playback features of the tool to allow students to record their own work, and verify meeting the NATEF Standards. Also covered is utilization of free Shop Stream Connect companion software to demonstrate concepts like Fuel Control Strategies.

ATech and Hunter Engineering (combo class)

ATech (morning): Electrical Perspectives

Typically, the most difficult concepts for new automotive students to grasp are electrical attributes (voltage, current, resistance and power) and Ohm’s Law. What happens when their measurements seem to contradict the “laws” they have been taught? In this session, we will build various circuits and use them to evaluate some different ways of presenting Ohm’s Law to students in order to help them comprehend the relationships between those attributes.

Deciphering Emissions

This seminar looks at tailpipe emissions from the perspective of using five-gas analyzer numbers to determine whether an engine is operating properly or not. Evaluation worksheets will be provided to instructors for use in their classes when instructing students to evaluate emissions from full rich to full lean as well as for determining the proper operation of O2 sensors.

Hunter Engineering (afternoon): Advanced Wheel Service

This is a three-part introduction to the newest service procedures for today’s vehicles using the latest advancements in technology.

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ProCut and Bosch (combo class)

ProCut (morning):

Rotor matching on-car brake lathe service.

Bosch (afternoon):

Aftermarket scan tool vs. OE (original equipment) tool
Factory software through M-VCI as factory tool (what OE's are available)
Toyota -Tech Stream, BMW-ISTA, GM-GDS2
Performing J2534 as part of known repairs
21st century technology

Friday: Optional classes to be held after the Trade Show:

CDX Update Class
Electude Update Class
Launch Tech Scanner Class

The training is open to all Florida automotive instructors and will be conducted by industry trainers at the facilities of Mid Florida Technical Institute, 2900 West Oak Ridge Road, Orlando, Florida 32809, from **June 9-13, 2014**. This training will satisfy NATEF (National Automotive Technicians Education Foundations) and AYES (Automotive Youth Education Systems) continuing education requirements.

****Space for this event is limited and registrations will be accepted on a first-come, first-served basis through May 1, 2014, via our online registration system. Please register at the link below:**

<http://www.flada.org/automotive-training>

The training is free, but travel, room and board are the responsibility of the individual or institution. If you have any questions about the training and/or registration, please contact Randy Houck via email at rhouck2@cfl.rr.com.

RD/eoj

cc: Eric Owens, director, Career and Technical Education Programs
Randy Houck, director, Florida AYES