



NGV Essentials and Safety Practices CNG Fuel System Inspector Training CNG Fuel System Inspector Certification

Centre Area Transportation Authority (CATA)
2081 W. Whitehall Road, State College, PA 16801

May 15 to 18, 2018

Tuesday, May 15 – 10 AM to 5 PM

Wednesday, May 16 – 8 AM to 5 PM

Thursday, May 17 – 8 AM to 5 PM

Friday, May 18 – 8 AM to 12 PM

Lodging: Courtyard by Marriott (1730 University Drive, State College, PA 16801)
\$119/night plus taxes. Reservations: (814) 238-1881. Room block is for May 14 to May 17.
Rooms will be released April 24 (or when sold out).

Course Registration: Email Sara Bowden, PennTRAIN Coordinator, at sara@ppta.net. Please provide attendee name, title, organization, email address, phone number, and name & email address of agency contact.

Note: *We will work with agencies and the CNG implementation schedule to ensure the training opportunities available complement the schedule to the maximum extent possible, which in some cases could mean this registration does not follow our typical “first-come, first-served” approach. We thank you in advance for your understanding in light of the special circumstances.*

Attire: Casual.

Note: *Some of the training will be in a classroom. Some will be in the maintenance shop. Please dress accordingly.*

Meals: Breakfast will be provided at the Courtyard by Marriott. Breaks and lunch will be provided at CATA during the training. Dinner is “on your own.”

Fee: \$290 per person. [Cancellation Policy](#) for PennTRAIN.

Course Description

Training will begin with breakfast each morning at the Courtyard by Marriott State College. From there, attendees will carpool together to CATA for the class for the majority of the day.

NGV Essentials and Safety Practices

With a focus on safety, the Essentials and Safety Practices training course teaches technicians and support team members the fundamentals of working with natural gas as a vehicle fuel and both CNG and LNG fuel systems. *This course is a prerequisite for technicians who will take CNG Fuel System Inspector Training.*

The learning objectives for this course include:

- Describe the properties and characteristics of natural gas.
- Identify the differences between natural gas and other liquid fuels.
- Identify all major low- and high-pressure CNG fuel system components; describe their operation and safety precautions.
- Describe the differences between dedicated, bi-fuel and dual-fuel NGVs.
- Identify and employ safety practices when working with natural gas-powered vehicles.
- Be familiar with CNG fueling station equipment safety devices, operation and fueling procedures.
- Identify CNG and LNG depressurizing and defueling methods and the related safety precautions.

CNG Fuel System Inspector Training

The CNG Fuel System Inspector Training ("Course") is a two-day course intended to fully prepare your technicians to become qualified Compressed Natural Gas (CNG) Fuel System Inspectors as recommended by FMVSS and NGV2. The Course teaches attendees the proper techniques for inspecting the entire on-board CNG fuel system, including fuel storage cylinders. The Course also provides instruction on satisfying the National Highway Transportation Safety Administration requirement that all on-board vehicle CNG fuel storage cylinders be visually inspected every three years or 36,000 miles, whichever comes first, and after any vehicle accident or fire.

In short, your technicians will learn the proper methods to use to ensure vehicle fuel system safety and integrity.

The learning objectives for this course include:

- Describe the properties and characteristics of natural gas
- Identify the four types of CNG cylinders, their construction methods, certification requirements, current and past manufacturers
- Identify the causes of cylinder failure

- Identify all codes and standards that apply to CNG cylinders and other fuel system components
- Identify all CNG high-pressure components, and their purpose.
- Identify and assess CNG cylinder and fuel system installations.
- Interpret all information from a CNG cylinder label.
- Describe the steps and methods to safely perform a CNG fuel system inspection in conformance with established standards.
- Describe the final disposition process for CNG cylinders and fuel system components.
- Describe the defueling options for CNG powered vehicles

CNG Fuel System Inspector Certification

This CNG Fuel System Inspector Certification provides an independent assessment of the knowledge and application of skills necessary for technicians to competently conduct a CNG fuel system inspection according to all applicable codes and standards, and industry best practices. Certification designates that participants have sufficiently demonstrated the work-related knowledge, skills and competencies required to perform the tasks of a CNG fuel system inspector.

The CNG Fuel System Inspector Certification exam consists of 60 multiple choice questions and participants will have 3 hours to complete the exam. A minimum score of 80% is required to obtain certification. Certification is valid for 5 years from the date of issue. Participants who do not pass the exam will be allowed one complimentary re-take.