

# Refrigerant Recovery and Charging Learning Systems for R-134a/R-410a

T7031/T7032



T7031



T7032



Interactive Multimedia

## Learning Topics:

- Refrigerant Fundamentals
- Environmental Regulation of Refrigerants
- Ultrasonic, Dye, & Halide Leak Detectors
- Using Gas Pressurization or Soap for Leak Detection
- Pressure & Temperature Measurement
- Operation of Compound Gauges
- Refrigerant Recovery & Recycling
- Refrigerant Handling & Storage Procedures
- Refrigerant Charging Methods
- Charging Blended Refrigerants

Amatrol's Refrigerant Recovery and Charging Learning Systems for R-134a (T7031) and R-410a (T7032) teach aspiring HVACR technicians the critical hands-on skills they need to succeed on the job. Learners will work with real equipment, such as: a recovery machine, manifold gauges, submersible cooler, temperature probe, filter dryer, low side liquid charger, vacuum pump, and micron vacuum gauge.

In addition to developing hands-on skills with real equipment, learners will use Amatrol's interactive multimedia eLearning curriculum to cover a wide variety of relevant refrigerant recovery and charging topics, including: refrigerant fundamentals, leak detection, pressure and temperature measurement, refrigerant recovery and recycling, and refrigerant charging.



## Technical Data

Complete technical specifications available upon request.

### T7031:

Mobile Workstation  
Recovery Machine  
Charging Hose Set  
Temperature Probe  
Valve Core Removal Tools  
Manifold Gauge Set  
Submersible Cooler  
Electronic Scale  
Filter Dryer  
Multimedia Curriculum (M19162)  
Instructor's Guide (C19162)  
Installation Guide (D19162)  
Student Reference Guide (H19162)  
Additional Requirements:

Learning system that uses refrigerant R-134a (T7082 or T7082A)

Customer-supplied refrigerant & recovery tank  
Instructor with EPA 608 Certification for United States customers or equivalent protocol for local authorities outside the US  
Computer (Visit [www.amatrol.com/support/computer-requirements](http://www.amatrol.com/support/computer-requirements) for details.)

### Utilities Required:

Electric (120V/60Hz/1ph)

### T7032:

Mobile Workstation  
Recovery Machine  
Charging Hose Set  
Temperature Probe  
Valve Core Removal Tools  
Manifold Gauge Set  
Submersible Cooler  
Electronic Scale  
Filter Dryer  
Liquid Vaporizer  
Multimedia Curriculum (M19175)  
Instructor's Guide (C19175)  
Installation Guide (D19175)  
Student Reference Guide (H19175)  
Additional Requirements:

Learning system that uses refrigerant R410a (950-GEO, T7100, or T7130)

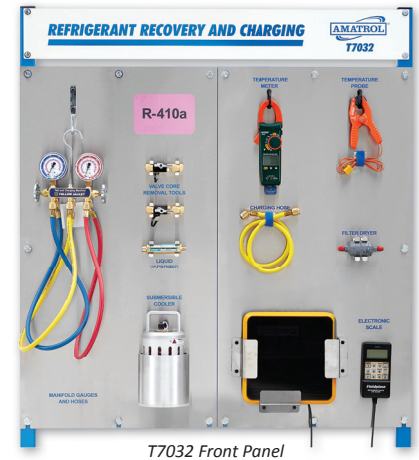
Customer-supplied refrigerant & recovery tank  
Instructor with EPA 608 Certification for United States customers or equivalent protocol for local authorities outside the US  
Computer (Visit [www.amatrol.com/support/computer-requirements](http://www.amatrol.com/support/computer-requirements) for details.)

### Utilities Required:

Electrical (120V/60Hz/1ph)

## Practice Refrigerant Recovery & Charging Skills on Real-World Equipment

When it comes to learning important refrigerant recovery and charging skills, there's simply no substitute for hands-on experience with real equipment that technicians will encounter on the job. That's why Amatrol's Refrigerant Recovery and Charging Learning Systems for R-134a/R-410a feature a wide variety of real industrial HVACR equipment, such as: a recovery machine, manifold gauge set, submersible cooler, valve core removal tool, temperature probe, filter dryer, electronic refrigerant scale, charging hose set, low side liquid charger, multimeter with thermocouple input/display, vacuum pump, and micron vacuum gauge.



T7032 Front Panel

## Interactive Multimedia eLearning Curriculum

Amatrol's curriculum features a highly-interactive, multimedia format that includes stunning 3D graphics and videos, voiceovers of all text, and interactive quizzes and exercises designed to appeal to learners with different learning styles. The T7031/T7032 curriculum teaches learners the fundamentals of refrigerant recovery and charging. For example, learners will study relevant topics, such as leak detection, pressure and temperature measurement, refrigerant recovery and recycling, and refrigerant charging.



The combination of theoretical knowledge and hands-on skills solidifies understanding and creates a strong basis for pursuing more advanced skills. For example, learners using these systems can expect to learn critical hands-on skills, including:

- Using a refrigerant pressure-temperature chart
- Using soap to check for refrigerant system leaks
- Using a compound gauge to measure refrigeration system pressure
- Removing a service valve core
- Using the superheat method to determine refrigeration system charge

## Student Reference Guides

Sample copies of the Refrigerant Recovery and Charging Student Reference Guides are also included with the systems for your evaluation. Sourced from the systems' curriculum, the Student Reference Guides take the entire series' technical content contained in the learning objectives and combines them into perfectly-bound books. Student Reference Guides supplement these courses by providing condensed, inexpensive reference tools that learners will find invaluable once they finish their training, making them the perfect course takeaways.

## Related HVACR Training Systems

Want to explore more advanced HVACR topics? Be sure to check out Amatrol's other HVACR training systems, including the Residential Heat Pump Troubleshooting Learning System (T7100) and the Residential Mini-Split Heat Pump Learning System (T7130). Both systems feature Amatrol's interactive multimedia eLearning curriculum and real, industrial HVACR equipment to teach critical hands-on skills.



T7130

