



Accredited Africa Training Institute for Capacity Development

Unit FO409, Hatfield Plaza · 1122 Burnett St, Hatfield 0028 · Pretoria, Gauteng · South Africa

Tel: +27 12 004 8389 · Mobile: +27 65 077 6310

Email: apply@aaticd.co.za · Website: www.aaticd.co.za

COURSE BROCHURE

Refrigeration Tools Identification Usage And Maintenance Training

Manufacturing, Engineering and Technology / Manufacturing and Assembly

Unit Standard 116335 · NQF Level 2 · 8 Credits · 5 Days

COURSE OVERVIEW

This course equips learners with the knowledge and practical skills to identify, use, and maintain refrigeration tools safely and effectively. It covers tool selection, proper handling techniques, routine maintenance procedures, and compliance with relevant safety standards. By the end of the course, participants will be able to perform tool-related tasks confidently in a refrigeration context.

Category	Manufacturing, Engineering and Technology
Subfield	Manufacturing and Assembly
Unit Standard	116335
Accreditation	SAQA Accredited · NQF Level 2 · 8 Credits
Duration	5 days
Training Method	Online, On-Campus, In-House
Certificate	Issued via AATICD LMS – verifiable online

LEARNING OUTCOMES

- Identify and describe the purpose of common refrigeration tools and equipment.
- Demonstrate correct and safe usage of hand tools, power tools, and specialised refrigeration instruments.
- Apply routine maintenance procedures to ensure tool longevity and accuracy.
- Analyse tool condition and determine when repair or replacement is necessary.
- Implement safety protocols when handling refrigerants and pressurised systems.
- Evaluate the suitability of tools for specific refrigeration tasks and system types.

WHO SHOULD ATTEND

- This course is designed for refrigeration technicians, maintenance personnel, and apprentices in the HVAC&R; industry who need to develop or enhance their practical tool skills.
- It is also suitable for supervisors and trainers seeking to standardise tool usage practices.

COURSE OUTLINE

Day 1: Introduction to Refrigeration Tools and Safety

- Overview of refrigeration systems and components.
- Types of hand tools: wrenches, screwdrivers, pliers, cutters.
- Power tools: drills, grinders, heat guns.
- Precision instruments: gauges, thermometers, vacuum pumps.
- Safety protocols: lockout/tagout, refrigerant handling.
- Introduction to tool storage and organization.

Day 2: Identification and Selection of Refrigeration Tools

- Refrigerant recovery tools: recovery units, cylinders, hoses.
- Evacuation tools: vacuum pumps, micron gauges.
- Charging tools: manifold gauges, charging scales, sight glasses.
- Tubing tools: tube cutters, flaring tools, swaging tools.
- Leak detection tools: electronic leak detectors, UV dye kits.
- Tool selection criteria: pressure ratings, compatibility.

Day 3: Proper Usage of Refrigeration Tools

- Manifold gauge operation: connecting, reading pressures, interpreting.
- Vacuum pump usage: setup, deep evacuation, holding vacuum test.
- Refrigerant recovery: procedures for liquid and vapour recovery.
- Charging methods: liquid charging, vapour charging, superheat/subcooling.
- Leak detection: electronic, ultrasonic, bubble methods.
- Tubing preparation: cutting, deburring, flaring, brazing.

Day 4: Maintenance and Care of Refrigeration Tools

- Cleaning procedures for hand tools and power tools.
- Lubrication of moving parts: wrenches, pliers, drill chucks.
- Calibration of manifold gauges, thermometers, and micron gauges.
- Troubleshooting common issues: sticking valves, worn seals.
- Basic repairs: replacing O-rings, hoses, and batteries.
- Developing a maintenance log and schedule.

Day 5: Practical Integration and Assessment

- Practical exercise: system diagnosis, recovery, evacuation, charging.
- Tool selection for each step of the service process.
- Troubleshooting tool malfunctions during the task.
- Final written assessment covering all unit standard outcomes.
- Review of key safety and maintenance practices.
- Feedback and certification guidance.

ASSESSMENT & CERTIFICATION

Delegates are assessed through exercises and a final test. A mark of **50% or above** earns an **AATICD Certificate of Completion**, issued digitally with a unique verification code. This course carries **8 NQF credits** at **NQF Level 2**.

PRICING (PER DELEGATE, EX-VAT)

Delegates	Training Method	Price per Delegate	Total
1	Online	R 23,000.00	R 23,000.00
1	In-House	R 29,900.00	R 29,900.00
1	On-Campus (Pretoria)	R 34,500.00	R 34,500.00

UPCOMING SESSIONS

Start	End	Method	Venue
10 Aug 2026	14 Aug 2026	On-Campus	Durban, South Africa
10 Aug 2026	14 Aug 2026	On-Campus	Abu Dhabi, UAE
10 Aug 2026	14 Aug 2026	On-Campus	Pretoria, South Africa
10 Aug 2026	14 Aug 2026	On-Campus	Dubai, UAE
10 Aug 2026	14 Aug 2026	On-Campus	Cape Town, South Africa
10 Aug 2026	14 Aug 2026	On-Campus	Mauritius
17 Aug 2026	21 Aug 2026	On-Campus	Dubai, UAE
17 Aug 2026	21 Aug 2026	On-Campus	Pretoria, South Africa

Contact us if no suitable date is listed – on-demand sessions can be arranged for groups.

HOW TO GET A QUOTE OR APPLY

1. **Get an instant quotation online:** visit www.aaticd.co.za, open the page for this course (Unit Standard 116335) and click **Get A Quote / Apply**. Select your training method and number of delegates – your quotation is generated immediately and emailed to you with the course brochure attached.
2. **Apply by email:** send the course title, your preferred training method (Online, In-House or On-Campus Pretoria), the number of delegates and your preferred dates to apply@aaticd.co.za – our team will reply with a formal quotation.
3. **Apply by phone or WhatsApp:** call **+27 12 004 8389** or WhatsApp **+27 65 077 6310** and we will prepare your quotation and reserve your seats.
4. **Confirm your booking:** accept the quotation and settle the invoice. As soon as payment is confirmed your delegates are enrolled and receive their AATICD LMS login details by email, along with joining instructions for their chosen training method.

Group discounts apply automatically – the more delegates you enrol, the lower the price per delegate. No payment is required to request a quotation.

Accredited Africa Training Institute for Capacity Development

Unit FO409, Hatfield Plaza, 1122 Burnett St, Hatfield 0028, Pretoria, Gauteng, South Africa
Tel: +27 12 004 8389 · WhatsApp: +27 65 077 6310 · apply@aatid.co.za · www.aatid.co.za