



COOLCHANGE

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Enforcement activities in the RAC industry

Between 1 July 2018 and 30 June 2019, Department of the Environment and Energy conducted the following compliance and enforcement activities:

Infringement notices

The Department fined two companies and an individual for offences under the *Ozone Protection and Synthetic Greenhouse Gas Management Act 1989* (the Act).

Two companies each received a fine for \$12,600, for importing equipment containing scheduled substances without an appropriate licence. The import into Australia of equipment containing scheduled substances is prohibited unless the correct licence or exemption is held. One of the companies involved was a major automotive retailer who was aware of its obligations under the Act at the time of the import.

A refrigeration mechanic was fined \$2,520 for discharging a scheduled substance, HFC-410a, while installing an air conditioning system. The refrigeration mechanic holds permits issued by the Australian Refrigeration Council (ARC) under the Ozone Protection and Synthetic Greenhouse Gas Management Regulations 1995 and was aware of their obligations when the discharge occurred. It is an offence under section 45B of the Act to engage in conduct that results in a discharge not in accordance with the Regulations.

For further information refer to 'Environment takes action on synthetic greenhouse gas offenders' www.environment.gov.au/mediarelease/environment-takes-action-synthetic-greenhouse-gas-offenders

R32:
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World Ozone Day – 32 years and healing

September 16 was World Ozone Day. The theme for this year's World Ozone Day was '32 years and healing'. World Ozone Day commemorates the date of signing in 1987 of the Montreal Protocol on Substances that Deplete the Ozone Layer.

The ozone layer protects life on earth by absorbing ultra-violet (UV) radiation from the sun. UV radiation causes many problems from skin cancer and cataracts in people to damaged farm crops. The ozone layer is like sunscreen for the earth. Ozone Depleting Substances (ODS), including some refrigerants, damage the ozone layer, allowing more UV radiation from the sun to pass through, causing harm to our health and lifestyle.

As a signatory to the Montreal Protocol, the international environmental treaty created in 1987 and designed to protect the ozone layer, Australia has in place the *Ozone Protection and Synthetic Greenhouse Gas Management Act 1989* (the Act) and associated regulations, designed to protect the environment by reducing emissions of ODS. The Refrigeration and Air Conditioning (RAC) permit scheme plays an important role by controlling the trade, use and recovery of ODS refrigerants, as well as synthetic greenhouse gas refrigerants also controlled under the Act.

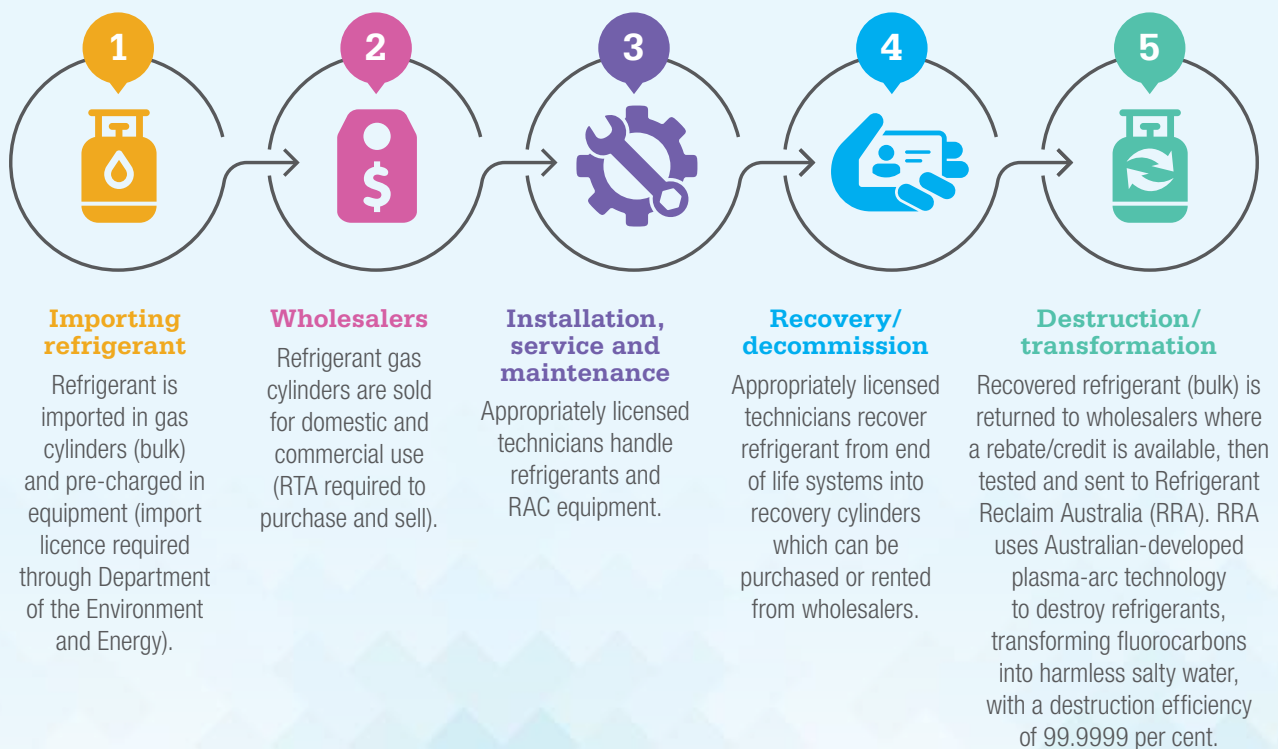
The latest Scientific Assessment of Ozone Depletion completed in 2018, shows that parts of the ozone layer have recovered at a rate of 1-3% per decade since 2000. At projected rates, the Southern Hemisphere is expected to make a full recovery in the 2050s and Polar Regions by 2060.



The RAC industry has contributed greatly to this success and should be proud of this achievement.

Controlled refrigerants in Australia – how it all works

ODS refrigerants (CFCs, HCFCs) and synthetic greenhouse gas refrigerants (HFCs) can damage the ozone layer and contribute to climate change if emitted into the atmosphere. As a result, their import, purchase/sale, use, recovery and destruction is controlled under the Act and associated regulations. The below diagram shows how this works and how the RAC industry plays a vital role in minimising emissions of these gases into the atmosphere.





Fast Facts

R32 refrigerant

In Australia, R32 refrigerant is mainly used in split system air conditioners. R32 is a scheduled substance so a Refrigerant Handling Licence is required to use this refrigerant, and a Refrigerant Trading Authorisation is required to purchase it.

R32 is mildly flammable. For more information on how to handle flammable refrigerants, refer to the Flammable Refrigerants Safety Guide from the Australian Institute of Refrigeration, Air Conditioning and Heating (AIRAH) online at www.pointsbuild.com.au/airah under 'managing health and safety risks for flammable refrigerants'.

For further information on R32 refrigerant, contact your refrigerant wholesaler.

- ✓ R32 (difluoromethane) has a global warming potential of 675 (R410a: 2,090)
- ✓ Non-ozone depleting
- ✓ Boiling point: -51.7°C
- ✓ Critical temperature: 78.4°C
- ✓ Oil: POE (Poly Olester Oil)
- ✓ Mildly flammable, non-toxic, with a safety classification of A2L
- ✓ Only reclaim into approved R32 reclaim cylinders
- ✓ Due to the flammable nature of R32, different charging and recovery procedures are required
- ✓ Only use R32-approved equipment when using R32

RAC advertising and stationery

Refrigerant Trading Authorisation (RTA) holders

It is mandatory for RTA holders to display their RTA number on any advertising and stationery materials promoting services permitted under the RTA. Including your RTA number on advertising and stationery helps consumers with their decision to engage a business that holds a RTA and employs licensed technicians to carry out air conditioning and refrigeration services.

This also ensures businesses who have a RTA can be easily separated from businesses that don't.

Refrigerant Handling Licence (RHL) holders

RHL holders not employed or hired by the holder of a RTA must include their licence number on advertising and stationery materials.

Advertising and stationery materials

- radio and TV advertisements
- signage (including vehicles)
- webpages and online advertisements
- print advertising (papers, Yellow Pages)
- stationery: invoices, receipts and quotes
- any other medium where the permit holder is offering or advertising services permitted under the permit.



TIPS

RTA/RHL number placement and size should be considered in the context of the advertising and be clearly visible to the consumer.

If you are advertising only a business name and contact number (e.g. White Pages) and there is no mention of air conditioning or refrigeration services, you are not required to advertise your RTA/RHL number.

Where a business has two or more branches, and where individual branches do not hold a RTA, the parent RTA number must be placed on all advertising and stationery materials.

The RTA/RHL number must be placed on existing stationery. The number can be stamped or written on existing stationery, as long as it is provided on both the original and duplicate.

COOL RUNNINGS P/L
123 Business Lane
NSW 2200
P 1300 300 300
E cool@runnings.com.au

INVOICE

SERVICES

COOL RUNNINGS
Refrigeration and air conditioning
Installation, servicing and maintenance

P 1300 300 300 E cool@runnings.com.au

Refrigerant record keeping – good for the environment, good for business

ARC field officers have identified insufficient refrigerant record keeping as one of the main areas for non-compliance during permit holder visits.

At a permit holder visit, Refrigerant Trading Authorisation (RTA) holders are required to provide evidence of up-to-date records (a minimum of two quarters) showing the amounts of refrigerant purchased, sold and recovered for destruction (bulk amounts only i.e. cylinders) during each quarter.

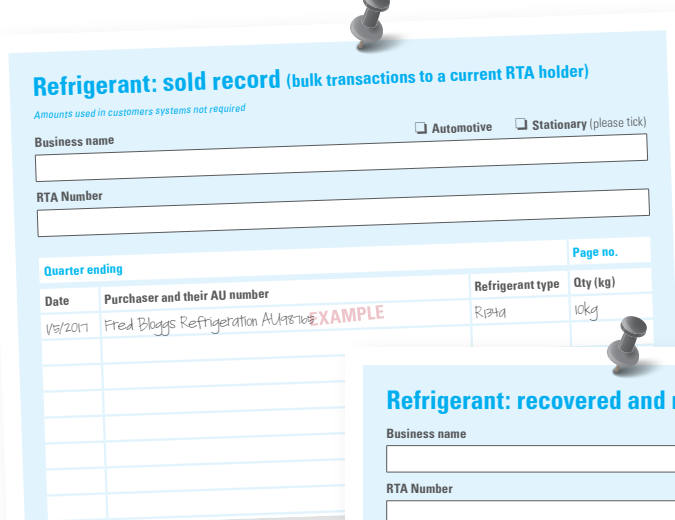
What does this mean?

- Purchased – When you bought cylinders from a wholesaler.
- Sold – Only bulk amounts are required (i.e. cylinders), not amounts you add to systems during repair/maintenance.
- Recovered – How many recovery cylinders you returned to the wholesaler for destruction.

Ensuring you are keeping accurate and up-to-date records of refrigerant in your workplace not only reduces the risk of refrigerant emissions, it also provides records for your business to identify any discrepancies in refrigerant use in the workplace.

To help technicians and businesses with their refrigerant record keeping, the ARC provides free templates for all RTA reporting requirements on its website.

Visit www.arctick.org/refrigerant-trading-authorisation/business-reporting-templates-and-guides/




Refrigerant: sold record (bulk transactions to a current RTA holder)
Amounts used in customers systems not required

Automotive Stationary (please tick)

Business name
RTA Number

Quarter ending

Date	Purchaser and their AU number	Refrigerant type	Qty (kg)	Page no.
1/3/2017	Fred Blogs Refrigeration AU187105	R134a	10kg	EXAMPLE



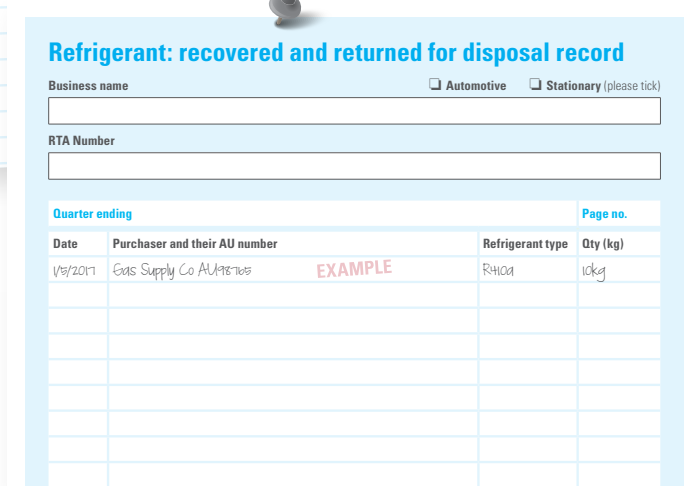
Refrigerant: purchase record

Automotive Stationary (please tick)

Business name
RTA Number

Quarter ending

Date	Supplier and branch	Refrigerant type	Qty (kg)	Page no.
1/3/2017	Gas Supply Co Branchtown	R134a	10kg	EXAMPLE



Refrigerant: recovered and returned for disposal record

Automotive Stationary (please tick)

Business name
RTA Number

Quarter ending

Date	Purchaser and their AU number	Refrigerant type	Qty (kg)	Page no.
1/3/2017	Gas Supply Co AU187105	R410a	10kg	EXAMPLE

Images used as examples only.

RAC equipment components – do they comply with the Standards?

The ARC has been made aware of retailers selling aluminium pair coil pipe with copper ends. This pair coil pipe does not meet Australian Standards.

Components used in air conditioning and refrigeration equipment need to be 'fit for purpose' and comply with relevant Australian Standards.

Refrigerant pipe, for example, must comply with *AS/NZS 1571: Copper – Seamless tubes for air conditioning and refrigeration*. This is especially important for split system air conditioning equipment as R410a and R32 are high pressure refrigerants and may require a greater wall thickness, depending on the diameter of the pipe and the refrigerant used.

Pair coil pipe should be insulated seamless copper. It must comply with AS/NZS 1571 requirements, and the insulation must comply with the requirements of *AS/NZS 4859.1: Thermal insulation materials for buildings – General criteria and technical provisions*, and the Australian Building Code (Specification J5-2(d) (BCA Vol 1) and Part 3.12.5 (BCA Vol 2)).

For more information on the Australian Standards visit www.standards.org.au



Energy Efficient Communities Program

On 28 February 2019, the Minister for Energy announced the Energy Efficient Communities Program which aims to deliver up to three million tonnes of greenhouse gas abatement to 2030.

The EEC Program will deliver \$50 million of grants to help businesses and community organisations improve energy efficiency practices and technologies and better manage energy consumption to reduce their power bills.

Businesses and community organisations will be able to apply for funding for a range of activities including equipment upgrades, installation and use of energy monitoring systems, and development of energy audits and feasibility studies. Grants of up to \$12,500 will be available for community organisations, up to \$20,000 for small businesses and up to \$25,000 for large energy consuming businesses. Large energy consuming businesses will be required to make a co-contribution of one dollar for every government dollar received.

Heating and cooling consume a significant proportion of energy used in buildings. Businesses and organisations may be able to apply for grants to replace existing split system air conditioning units with new split system air conditioning units that are more energy efficient.

Newer split system air conditioners are more efficient due to significant technological improvements in recent years. The Energy Rating website [energyrating.gov.au](https://www.energyrating.gov.au) provides calculators for estimating energy use.

Applications for the EEC Program will open in October 2019 for community organisations and early 2020 for businesses.

For more information, visit <https://www.energy.gov.au/government-priorities/energy-programs/energy-efficient-communities-program>

COAG looks at mandating 'smart' demand response capabilities for air conditioners

The Council of Australian Governments (COAG) Energy Council is currently looking at the impacts of requiring new air conditioners to be 'smart' demand response capable. If implemented, this change would be made in July 2021.

Permit holders should be aware of this potential change as it may influence the type of systems you work with and the advice you provide to your customers. Demand response technology refers to 'the rapid modification of appliance operation in response to changes in the condition of the grid' which can assist with management of peak energy demand events. Peak demand events, often prompted by extreme weather, result in major spikes in electricity usage. These events have a disproportionate impact on network costs as they often require expensive investment to increase network capacity and to maintain the reliability of the electricity supply.

The South Australian Government is leading this consultation under the Energy Equipment Efficiency (E3) Program and will look at a number of appliances including air conditioners up to 19kW cooling capacity. The proposed changes would require new appliances to comply with the full range of demand response modes in the relevant part of AS/NZS 4755. Consumers purchasing this demand response capable equipment would then be able to decide whether to activate this capability in return for agreed financial incentives.

To read more visit <http://energyrating.gov.au/document/consultation-paper-smart-demand-response-capabilities-selected-appliances>

How's your mental health?

Almost half of all Australians aged 16 to 85 years will experience mental illness at some point in their life. The most common conditions are: anxiety, affective disorders (especially depression) and substance use disorders (especially alcohol use).

One quarter of Australians aged 16 to 85 years will experience an anxiety condition during their lifetime. According to Australian tradesperson support group Mates in Construction, 190 Australians working in the construction industry die by suicide each year.

It might not be traditional for tradespeople to open up about their emotions or mental well-being, but statistics like this show how important it is to be aware of your, or your colleagues', mental health. Looking after your mental health can play a big part in making sure you're able to do your job well and enjoy life outside of work.

These conditions can be serious but help is available.

Beyond Blue is an Australian, independent non-profit organisation working to address issues associated with depression, suicide, anxiety disorders and other related mental disorders. They have a useful list of national helplines and websites for people to get the help they need. To find out more visit www.beyondblue.org.au/get-support/national-help-lines-and-websites

Mates in Construction is another valuable resource. To find out more, visit www.matesinconstruction.org.au



Changed your contact details? Licensed staff changed? Update your details online

To ensure you receive your permit renewal reminders from the ARC and keep up-to-date with permit related information, it is important the ARC has the correct details for you, your business and licensed staff.

If you or your business' situation changes, visit the website, login to the self-service portal, and change your details.

Refrigerant Handling Licence

<https://arctick.org/refrigerant-handling-licence/change-details/>

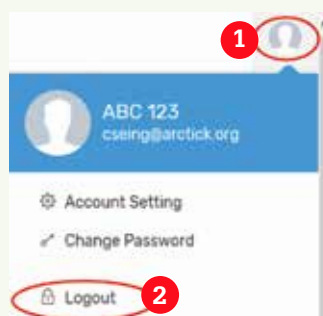
- Update phone/mobile, residential/postal address and email address.

Refrigerant Trading Authorisation

<https://arctick.org/refrigerant-trading-authorisation/change-details/>

- Update company, contacts, branches, employees, equipment and risk management plan.

Don't forget to save your changes and logout when finished.



To logout, click

