

Transitioning to fluorine-free firefighting foam

Issued May 2019

EPA 1114/19: A ban on fluorinated firefighting foams¹ in South Australia came into effect on 30 January 2018 following an amendment of the [Environment Protection \(Water Quality\) Policy 2015](#) (WQ Policy) under the [Environment Protection Act 1993](#) (EP Act). Legislative requirements are set out in Section 13A of the Policy.

1 Introduction

A grace period of two years was granted to help industry meet the requirements of going fluorine-free, and this ends on **30 January 2020**, at which time fluorinated foams will be prohibited. Depending on the site and scenario, the transition to fluorine-free foams can be undertaken during servicing of firefighting equipment, or a longer-term transition plan may be necessary. Disposal pathways are outlined below, and any further information will be provided as soon as it is available.

2 Users of fluorinated firefighting foams

You will be required to transition to fluorine-free firefighting foams by 30 January 2020. From this day, a person must not use, or permit the use of, a fluorinated firefighting foam.

For **small quantities** of fluorinated foams such as hand-held extinguishers or drums, this transition may involve contacting your fire protection services provider and arranging for your systems to be transitioned to fluorine-free foams. Fluorinated firefighting foams must be disposed of appropriately, and fluorine-free foams must be accompanied by a product certification (ie fluorine content is clearly displayed on a label or document provided with the product).

For **large quantities** of fluorinated foams such as bulk tanks or piped foam distribution systems, this transition may involve engaging a suitably qualified consultant to undertake a review of internal processes, assess the suitability of different fluorine-free foam products, and formulate a transition plan (including decontamination of existing systems).

It is imperative that fire extinguishing systems are maintained to provide continuing protection of lives and property during the transition to fluorine-free firefighting foams. The EPA understands that in certain circumstances transition may not be achievable by 30 January 2020.

Should you propose a transition plan which extends past 30 January 2020, the EPA may consider an application for an exemption, which is an authorisation under the EP Act. An environment improvement program (EIP) will form a key part of that authorisation. Due to the potential complexity of assessments and the timeframe required to process and grant an exemption, applications should be submitted no later than **30 August 2019**. The EPA welcomes your application any time prior.

¹ https://www.epa.sa.gov.au/environmental_info/perfluorinated-compounds

For the EPA to consider an exemption application, it will be necessary for you to demonstrate the actions you propose to take and why you cannot be compliant with the ban by the deadline. This may include an assessment of what work has already been undertaken, such as removal of smaller extinguishers or tanks containing fluorinated foam, or why fluorine-free foams cannot currently be used at the site.

Should an exemption be granted, it will be conditional on you committing to an EIP. This plan must include what controls you have in place to secure a fluorine-free foam for your site, how you will transition to fluorine-free foams (including decontamination of existing systems), and a timeline for the proposed works to be completed. The guideline [Environment improvement programs – a drafting guide for licensees](#) (EPA 2004) provides further information.

3 Manufacturers and suppliers of fluorinated firefighting foams

You will be required to cease the supply of fluorinated foam by 30 January 2020. From this day, a person must not fill, or permit the filling of a fire extinguisher with a fluorinated firefighting foam, and a person must not supply a fluorinated firefighting foam.

Australian governments, including the SA EPA, have been working with fire protection service providers to prepare for the ban and the transition to fluorine-free foams. Manufacturers and suppliers of firefighting foams will need to demonstrate, through certification, that all of their products supplied in South Australia are fluorine-free.

Where fluorinated foams are removed from service at a site, they will need to be disposed in the manner outlined below. Any systems or extinguishers that are transitioned from a fluorinated foam to a fluorine-free foam will need to be decontaminated in accordance with the WQ Policy, and wastewater from the decontamination process will also need to be disposed of appropriately.

4 Disposal of existing fluorinated firefighting foams

Disposal of fluorinated foams to the environment is already strictly prohibited. Fire protection service providers can remove hand-held extinguishers, and licensed waste transporters can arrange for the safe collection and removal of larger volumes of fluorinated foams. All fluorinated foams need to be taken to a licensed facility that is authorised to receive this waste.

Further information

Legislation

[Online legislation](#) is freely available. Copies of legislation are available for purchase from:

Service SA Government Legislation Outlet
Adelaide Service SA Centre
108 North Terrace
Adelaide SA 5000

Telephone: 13 23 24
Facsimile: (08) 8204 1909
Website: shop.service.sa.gov.au
Email: ServiceSAcustomerservice@sa.gov.au

General information

Environment Protection Authority
GPO Box 2607
Adelaide SA 5001

Telephone: (08) 8204 2004
Facsimile: (08) 8124 4670
Freecall: 1800 623 445 (country)
Website: <https://www.epa.sa.gov.au>
Email: epainfo@sa.gov.au

Environment Protection (Water Quality) Policy 2015

Clause 13A – Prohibited firefighting foam and foam products

- (1) A person must not use, or cause or permit the use of, a prohibited firefighting foam.
Mandatory provision: Category A offence.
- (2) A person must not fill, or cause or permit the filling of, a fire extinguisher with a prohibited firefighting foam product.
Mandatory provision: Category B offence.
- (3) A person who refills, or causes or permits the refilling of, a fire extinguisher must ensure that, before transitioning the fire extinguisher from a prohibited firefighting foam product to a firefighting foam product that is fluorine-free –
- the fire extinguisher is thoroughly cleaned so as to remove, as far as reasonably practicable, any residual prohibited firefighting foam product or prohibited firefighting foam; and
 - any prohibited firefighting foam product, prohibited firefighting foam or wastewater produced in the cleaning process is collected, securely contained and disposed of to a facility, or stored in a manner, approved by the Authority.
- Mandatory provision: Category B offence.
- (4) A person must not supply a firefighting foam product unless the producer's certification of its fluorine content is clearly displayed on a label or document provided with the product.
Mandatory provision: Category B offence.
- (5) Subclause (1) does not apply until the relevant day in relation to the use of a prohibited firefighting foam by means of –
- a large fire extinguisher; or
 - a small fire extinguisher, provided that the firefighting foam product used to produce the prohibited firefighting foam was in the fire extinguisher before the commencement of this clause.
- (6) Subclause (2) does not apply until the relevant day in relation to the filling or refilling of a large fire extinguisher.
- (7) In this clause –
- class A fire** means a fire involving ordinary combustible material (other than liquids or gases) including wood, paper, cloth, plastics, rubber or other material comprised of organic carbon based compounds;
- class B fire** means a fire involving flammable or combustible liquids (and their fumes) including gasoline, petroleum, grease, oils, paints or other material with a low flashpoint;
- fire extinguisher** means a small fire extinguisher or large fire extinguisher;
- firefighting foam** means foam for preventing, controlling or extinguishing a class A or class B fire;
- firefighting foam product** means a concentrate or aqueous solution for use in a fire extinguisher for the production of firefighting foam;
- large fire extinguisher** means a fire extinguisher with a capacity of 90L or more, and includes –
- a fire extinguishing system on a fire truck; and
 - an on-site fixed fire extinguishing system; and
 - any pumps, pipes, hoses, nozzles, sprinklers, storage containers and any other equipment associated with such systems;
- prohibited firefighting foam** means firefighting foam produced from a prohibited firefighting foam product;

prohibited firefighting foam product means a firefighting foam product that contains a fluorinated organic compound or compounds, but does not include a firefighting foam product that is fluorine-free;

relevant day means the second anniversary following the day fixed by the Governor for this clause to come into operation;

small fire extinguisher means a fire extinguisher with a capacity of less than 90L, and includes a hand-held mobile fire extinguisher.