

# standards

for pile burning

## pile burning

NSW RURAL FIRE SERVICE  
FIRE AND RESCUE NSW







*These standards explain how to safely conduct a pile burn and give due consideration to the effects of the pile burn on the environment.*

## PILE BURNS

Burning of cut and stacked vegetation is referred to as a pile burn.

Pile burns can be a useful method for reducing bush fire fuels, bush regeneration, property maintenance and agricultural activities. However, poorly managed pile burns can pose a bush fire risk and endanger lives, property and the environment.

Smoke from pile burns can also negatively impact your neighbours, the community and can contribute to local and regional air pollution. Depending on where you live, the smoke from pile burns may require an 'open burning' approval from your local council or the NSW Environment Protection Authority.

You should always consider other means of vegetation disposal such as composting, green waste, or taking to a waste facility prior to seeking to undertake a pile burn.

You should make yourself familiar with this document even if you do not require an approval and/or fire permit for your pile burn.

## APPROVALS AND PERMITS

In order to prepare a pile burn you may need to seek approval for the collection of the vegetation within the pile and the burning of the pile. The types of approvals required depends on the type of work and when and where you are planning to do it. See the RFS document *Before You Light That Fire* for further information on the approvals required.

### Environmental approvals

If the work is planned as part of hazard reduction, you should seek advice from the NSW Rural Fire Service (RFS) to determine whether you may be issued a Bush Fire Hazard Reduction Certificate. Alternatively, the NSW RFS can advise regarding other approvals.

### Fire permits

If the pile burn could be of danger to a building (at any time of the year) or the burn is during the Bush Fire Danger Period, you must have a Fire Permit issued by the RFS or Fire and Rescue NSW.

## CONSTRUCTION OF PILES

This standard provides advice regarding the construction of vegetation piles in order to allow safe and efficient burning.

- Material that is to be burnt must only be vegetation from the locality, not household or building material such as plastics, wooden pallets or cardboard boxes (please note it is illegal to burn treated timbers or tyres anywhere in NSW).
- Construct long and wide piles rather than excessively high piles. Piles that are too high produce more intense heat and retain heat for longer.
- Piles should not be greater than 2 m in length or width, and 1.5 m in height. Larger piles will produce more intense heat, will burn for longer and will be more difficult to manage safely.
- Logs over 150mm in diameter should not be added to piles.
- All material must be dead and dry before being burnt. If practical, place vegetation in an area where it will receive direct sunlight to allow the pile to dry out. This will allow for more efficient burning and will reduce the amount of smoke.
- No soft green weeds (such as wandering Jew, grasses, chick weed) should be added to a pile burn. These are most effectively disposed of by composting. Woody weeds such as lantana and privet are suitable. All noxious weeds must be treated according to the guidelines in the *Noxious Weeds Act 2003*.
- Where possible, construct piles on level ground. Fires will burn more quickly on slopes. If burning on a slope, stack logs to reduce the likelihood of them rolling downhill during the burn.

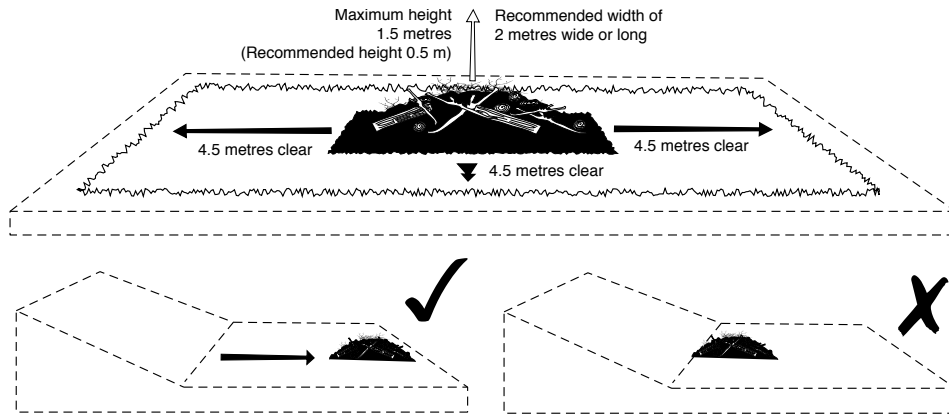
## NOTIFICATION

The law requires that you must notify all residents who adjoin the site of the pile burn at least 24 hours (unless otherwise specified in your fire permit) prior to the work. Other residents who might be affected by the pile burn should also be notified. The smoke produced from your pile burn has the potential to impact upon other people. Your neighbours may be exposed to smoke and may need to make preparations to avoid any negative impacts.

At least 24 hours (unless otherwise specified in your fire permit) before burning, you must notify your local RFS Fire Control Centre or Fire and Rescue NSW station of your intention to burn. The fire authority will record the information and monitor weather conditions.

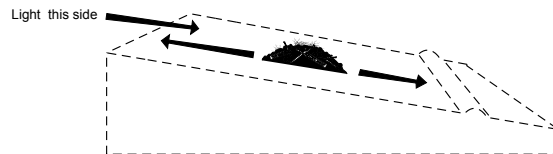
See the RFS document *Before You Light That Fire* for further information on notifications and potential penalties that may apply for failure to do so.

- DO NOT burn on a day declared as a Total Fire Ban by the RFS
- DO NOT burn on a no burn day as declared by the Office of Environment and Heritage
- DO NOT burn unless you have the necessary environmental approval and fire permit if required
- DO NOT burn unless you have notified your neighbours and the relevant fire authority



Keep distances from slope. If unable to move material off slope to flat land ensure extra clearance in fire break on uphill side of fire. (Usually 5x recommended distances for level site).

Branches and logs to be stacked up and down the slope, not across, to prevent burning material rolling downhill.



Light pile from a single point on the uphill side of the pile. Fire moves slower downhill. Remember fire travels uphill at up to 4x faster than level ground. Fire-generated up-draughts are increased on slopes. Prevailing winds can also affect fire behaviour.

Scrape a lip on the bottom side of your fire break to stop burning embers from rolling downhill and spreading the fire.

## BURNING OF PILES

The following safety measures will assist you in conducting a safe, effective pile burn.

- Before lighting the pile, ensure that you have suitable tools on hand (rakes and shovels) to conduct the burn and control any possible spot fires.
- Accelerants (such as petrol) must never be used in the pile.
- Ensure that there is a sufficient water supply and that you have a hose with appropriate water pressure that can reach around the pile to extinguish the fire (if required) and contain any spot fires.
- Ensure that you wear protective clothing such as heavy cotton pants, a long-sleeved shirt, leather work boots, work gloves and a wide-brimmed hat.
- Disturb piles immediately prior to lighting to scare away animals such as lizards and snakes which may be taking refuge within the pile.
- Consider the weather. Only light the pile if the weather conditions are calm. High wind speed may assist in smoke dispersal, but may also make the fire more difficult to contain. Contact your local RFS Fire Control Centre or NSW Fire and Rescue station for advice.
- Light the fire at one point. A pile that is lit at multiple points may burn with more intensity and may be difficult to contain.
- If the pile is on a slope, the ignition point should be upslope of the pile so that the pile ignites slowly (burning in a downhill direction).
- Supervise the burn constantly after lighting to ensure there are no spot fires in surrounding vegetation.
- Completely extinguish the pile immediately after the burn is finished. The spreading of burnt material after the burn may assist in allowing for smouldering material to be extinguished.

If multiple piles are to be burnt, burn only one pile at a time unless adequate resources and operators are present at each pile. You should also give consideration to the amount of smoke being produced if multiple pile burns are being conducted.

Burning of vegetation can potentially be hazardous. **Ultimately you are responsible for any fire you light and if it escapes you may be liable for the damage it causes.** Before you start you should be confident that you can carry out the burn.

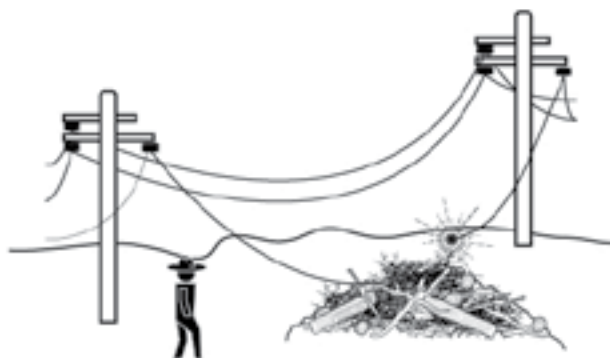
*All the Rural Fire Service documents mentioned in this brochure are available from your local RFS Fire Control Centre, or from the RFS website at [www.rfs.nsw.gov.au](http://www.rfs.nsw.gov.au)*



## Wrong



**WRONG:** Pile burns are not bonfires, they don't need to be high. This pile will be too hot. Pile Burns must be constructed from natural vegetation only, not household or building rubbish.



**WRONG:** Never construct piles under or near power lines. Smoke and ash can cause power lines to arc, and the heat will damage the lines.



**WRONG:** Don't pile vegetation around the base of trees or directly under low canopy. Don't plant new trees near piles that are planned for burning.



**WRONG:** Avoid piling vegetation close to neighbouring properties.

## Right



Makes the pile wide and long rather than high. This will spread the heat and be safer.



Give power lines a wide berth. Consider the radiant heat and smoke the burn will generate.



Try to choose a space with open canopy away from the base of trees. Wait until the piles have been burnt or removed before planting.



Stay away from fences and property boundaries. Consider local residents and their needs. Maintain a clear area between piles and any other combustible material.