

# SMOKE MANAGEMENT GUIDELINES

There are a few smoke management guidelines that need to be followed when doing prescribed burns.

- Obtain and use the weather forecasts
- Don't burn during pollution alerts or temperature inversions
- Comply with air pollution control regulations
- Burn when conditions are good for rapid dispersion
- Determine the direction and volume of smoke
- Notify local fire control office, nearby residents and adjacent landowners
- Use test fires to confirm smoke behavior
- Use backfires when possible
- Burn in small blocks
- Mopup along roads
- Be cautious of nighttime burning
- Have an emergency plan

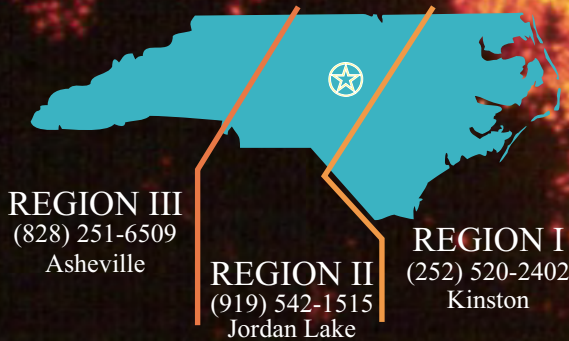


Secretary Governor  
Wayne McDevitt James B. Hunt Jr.,

# HOW TO REACH US...



Central Office  
Raleigh N.C.  
(919) 733-2162



## District Offices

<b>D1</b>	Asheville	(828) 667-5211
<b>D2</b>	Lenoir	(828) 757-5611
<b>D3</b>	Rockingham	(910) 997-9220
<b>D4</b>	New Bern	(919) 514-4764
<b>D5</b>	Rocky Mount	(252) 442-1626
<b>D6</b>	Fayetteville	(910) 484-0174
<b>D7</b>	Elizabeth City	(252) 331-4781
<b>D8</b>	Whiteville	(910) 642-5093
<b>D9</b>	Sylva	(828) 586-4007
<b>D10</b>	Lexington	(336) 956-2111
<b>D11</b>	Hillsborough	(919) 732-8105
<b>D12</b>	Mt. Holly	(704) 827-7576
<b>D13</b>	Fairfield	(252) 926-3041

## Other Offices

1	Goldsboro Forestry Center	(919) 731-7988
2	Griffiths Forestry Center	(919) 553-6178
3	Morganton Forestry Center	(828) 438-6270
4	Holmes Educational State Forest	(828) 692-0100
5	Gill State Forest- Crossnore Mountain Training Facility	(828) 733-5236 (828) 733-4242
6	Clemmons Educational State Forest	(919) 553-5651
7	Bladen Lakes State Forest	(910) 588-4964
8	Turnbull Creek Educational State Forest	(910) 588-4161
9	Rendezvous Mt. Educational State Forest	(336) 667-5072
10	Tuttle Educational State Forest	(704) 757-5608
11	Jordan Lake Educational State Forest	(919) 542-1154
12	BRIDGE I (Morganton)	(828) 438-6267
13	BRIDGE II (Crossnore)	(828) 765-5745

or contact your County Forest Ranger

Not all fire is bad...



# Prescribed Burning



The use of FIRE as a fire control and forest management tool...

# HISTORY OF PRESCRIBED BURNING

*The use of fire in the forests of the U.S. has come full cycle. Early settlers used fire to keep down brush for better access and hunting and to get rid of brush and timber so they could farm.*

*The increasing wildfire problem caused many foresters to advocate the exclusion of all fire from the woods. By the turn of the 20<sup>th</sup> century, however, foresters discovered that fire does play a role in Forest Management. Today prescribed burning has become an established resource management tool in southern pine forests.*

*A prescribed burn can be used for more than one purpose. There are essentially three types of prescribed burns: Site preparation burn, Understory and an Ecosystem burn.*

## Ecosystem Burn

There are several fire dependent species that need fire for regeneration and can not survive unless burned. Some are:

- Pond Pine
- Swamp Cyrilla
- Pocosin species
- Longleaf Pine
- Wire Grass



## Site Preparation Burn (for Reforestation)

Prescribed burning is useful in regenerating southern yellow pine by direct seeding, planting or natural regeneration.

- Low cost site preparation
- Less evasive or damaging than mechanical site preparation
- Burn only if necessary to plant tract; residual will rot if left alone

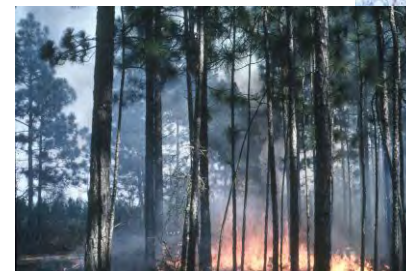


Understory Burning



## Hazard Reduction Burning

- Reduces fuel loading to prevent catastrophic fire
- Provides insurance that your timber stand will not be lost to fire
- Burns fuels at a time when you can control intensity of fire, reduce damage to residual stand
- Strategically located controlled burns can stop major fires (Ex. 1994 Croatan Fires)
- Intensity can be controlled by burning when weather and fuel moisture combine to produce the proper flame length



Results for a hazard reduction burn



Site Prep burn after harvesting



Results after burning...



After replanting

## Understory Burn

Using prescribed burning of the understory can limit competition with desired species and help wildlife habitats.

### Sivicultural Burning

- Controls competing species (usually hardwoods competing with pines for water, sun and nutrients)
- Improves conditions for wildlife by increasing availability and quality of food and habitat
- Controls spread of disease
- Reduces the cost of logging, site preparation and planting
- Used to thin stands that are too thick
- Maintains a park like vista (appearance, recreation, etc.)
- Reduces fire hazard
- Prepares seedbed for seeding

