



#### **Teacher Page**

#### Time Frame

4 Class periods + Library Research + Class Presentations

#### **Key Words**

Wildfires Succession Natural Fire Prescribed Fire Fire Exclusion Policy Tillamook Burn

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## **OVERVIEW**

### Fire: Fight, Flight, or

**Coexistence?** has students examine the history of wildland fires and their impact on society in America. Exploring our approaches to living with fire, students will examine various fire management techniques including prescribed fires, fire suppression, and fire prevention. Students will take a closer look at the Tillamook burn in Oregon, and conduct a research project on wildfire history in another state. Students will also gain a better understanding of Smokey Bear and the role of symbols in information campaigns.



A wildfire in Yellowstone Park. Courtesy of <u>NOAA Paleoclimatology</u> <u>Program.</u>

## OBJECTIVES

#### National Council for History

The students will conduct historical research; obtaining historical data. (Historical Thinking, Standard: 4B)

The students will identify historical issues, evaluate alternative courses of action and formulate a position or course of action on an issue. (Historical Thinking, Standard: 5A, 5D, & 5E)

The students will learn how the rise of heavy industry and farming transformed the American people and land. (Era 6, Contemporary United States: Standard 1)

#### National Standards for Social Studies

The students will examine the ways in which institutions change over time, promote social conformity, and influence culture. They should be encouraged to use this understanding to suggest ways to work through institutional change for the common good. (Standard V: Individuals, Groups and Institutions)

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## LESSON PLAN

#### Day 1

Set the stage for this activity by leading a short group discussion answering the following questions:

What do you know about wildfires? Do you think wildfires are a problem? Have you ever seen an area that has experienced a wildfire? What do you think we should do about wildfires? What is a prescribed fire?

Now read the essay, "Wildfires: A History of the Blaze" (Student Pages 1-6) together as a class (silently at desk or out loud). Then do the Reading Comprehension Activity (Worksheet 1 Directions – Teacher Pages 4-5), Worksheet 1 (Student Pages 8-12). Assign Worksheet 2 (Student Page 13)

#### Day 2

Read the Tillamook story, "An Oregon Legend: From Ashes to Forest" (Student Pages 14-15).

Assign: Worksheet 3 Teacher Instructions (**Teacher Page 6**): Create a State Fire poster to relay wildfire information on your state and present it to the class later in the week. Hand out and discuss Worksheet 3, Rubric 1, and Rubric 2 (**Student Pages 16-18**).

#### Day 3

Watch Smokey Bear segments of The Greatest Good: a Forest Service Centennial Film. To obtain a copy of the film order here.

Assign: Worksheet 4 (**Teacher Page 7**): Create a New Character to be used in a Public Service Announcement promoting the necessity of fire for a healthy forest ecosystem. Hand out and discuss Rubric 3 (**Page 19**).

#### Day 4

Upon completion of Worksheet 3, have students present their state fire information poster (Note: This could be on day five or the following week, as time is available.)

#### Day 5

Teachers can choose from three assessment activities.

- <u>Application and Integration Exercise</u> (Student Page 20)
- <u>Test</u> (Student Pages 21-22)
- <u>Reflective Exercise (Student Page 23)</u>

Use the Answer Key to check answers (Teacher Pages 8-12)

## **CLASS EXTENSIONS**

- Arrange a field trip to a local forest and examine a burn site or arrange a filed trip to get a first hand look at fire fighting tools and equipment. Or invite a guest speaker from a local forest to discuss their firefighting tools, equipment and management plan in more detail.
- Have students conduct further research on smokejumpers and create a video, or write a
  newspaper article about the history of smokejumping. Student can learn more about the first
  smokejumping teams, first female smokejumpers, first African American smokejumpers, changes
  in smokejumper techniques, uniforms, etc. Basically allow students to find any new information
  that was not included in the Essay.

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## **Team Teaching Possibilities**

**Technology:** Students could conduct Internet research in their technology class. Students could also create some type of graph (using excel) or graphic for their State Fire Poster in Worksheet 3. Students could also create a PowerPoint presentation to use when presenting Worksheet 3.

English: Students could give their speeches from Worksheet 3 in English class.

Math: Using the Wildfire Timeline (Teacher Pages 13-16) have students graph the occurrences of major wildfires and the number of acres burned.

**Science:** Have students learn more about forest succession and research the ecological benefits of wildfires in the forest ecosystem.

# LINKS

**Forest History Society-**Bibliographic resources on wildfires and environmental history <u>http://www.foresthistory.org/Research/Biblio.html</u>. Also Ordering Resource for the related following films: The Greatest Good, Up in Flames, and Timber on the Move <u>http://www.foresthistory.org/Publications/films.html</u>.

**e-11th Hour** - Wildland Fires background and fact sheet. Information provided by the Federal Emergency Management Agency (FEMA) and the Bureau of Land Management (BLM). <u>http://www.e11th-hour.org/resources/backgrounders/wildfire.backgrounder.html</u>

**Oregon Department of Forestry -** Information on the Tillamook burn and the Oregon Department of Forestry. <u>http://www.oregon.gov/ODF/TSF/tillamook\_story.shtml</u>

**USDA Forest Service -** The Greatest Good: Forest Service Centennial film <a href="http://www.fs.fed.us/greatestgood/">http://www.fs.fed.us/greatestgood/</a>

## REFERENCES

Patent, Dorothy Hinshaw. Fire: Friend or Foe? New York: Clarion, 1998.

Pyne, Stephen J., America's Fires, Management of Wildlands and Forests. Durham, NC: Forest History Society, 1997.

Pyne, Stephen J. Fire: A Brief History. Seattle: University of Washington Press, 2001.

Goudsblom, Johan, Fire and Civilization. London, England; New York, New York: Penguin Books, 1992.

The Greatest Good: A Forest Service Centennial Film. 2005. Producers/Directors, Steve Dunsky and Dave Steinke. California. USDA Forest Service. 3 DVDs (300 minutes).

Up in Flames: A History of Fire Fighting in the Forest. 1984. Producer/Editor, Vester Dick. North Carolina. Forest History Society. VHS (29 minutes).

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## Worksheet 1: Teacher Directions

Essay Reading Comprehension Activity

This is a reading comprehension activity that is designed to involve all students.

- 1. Use the Activity cards provided (cut the rows apart and fold in half) or create your own on index cards using the questions/answers provided.
- 2. The items (or questions) in the left column are the front of the card. The items (or answers) in the right column are the back of the card.
- 3. After the students have read the essay, pass out the cards to each student or to pairs of students (depending on your class size). Explain to the students that the question on the front of their card does not coincide with the answer on the back of their card. It is simply part of the activity. The students should start out looking at the back (the answer-side) of the card and come up with a question they think it answers.
- 4. After you have allowed enough time for students to come up with answers, explain the activity. You will have one student begin the activity by reading the front (question) of their card. The student in the room who thinks their card answers that question should stand and read the answer to that question.
- 5. If the class is in agreement that that the answer is correct, then move on and have the "answer student" read their question. If every question is answered correctly the first student to read the question should be the last student to provide an answer. All cards should be used.

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#### Worksheet 1, Teacher Directions – continued

If you would like to create your own questions use the example below for help in setting up the activity.

Wildfires: A History of the Blaze Question and Answer Class Activity Example

What is the title of this essay?	Records of fire scars in fossilized trees, as well as other mineralized materials help prove this fact.
How do we know wildfires have been around since the beginning of time?	Tendency to move and change settlements frequently
What is nomadic?	most of North America was either on fire or had been burned mainly due to humans.
By the 1880's	Towers used for spotting fires in the National Forests
What are lookout stations?	One of the things this provided was financial aid for joint fire protection work between the US Forest Service and eligible State Forest Service agencies.

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## Worksheet 3: Student Wildfire Research Poster and Presentation (Teacher Instructions)

After reading about the Tillamook Burn and the impact wildfire had in Oregon, students will use the questions from Worksheet 3 (Student Page 16) to research wildfires in their own state or another state of their choice (You may prefer to have all of the students study only there state or you may allow them to select a state of their choice...this is really your call as the educator). The students should display the answers to these questions in a creative format on a poster. The poster should contain answers to all of the questions and at least three pictures, graphics or drawings related to wildfires and/or the research questions. Students can add additional information to the poster as they see fit. Students will present their poster to the class. (Note: This can be a group activity to save time.) Hand out and discuss Worksheet 3, Rubric 1 (Poster) and Rubric 2 (Presentation) (Student Pages 17 - 18). Be sure to let student know the expected length of their presentation. \*Presentation length will vary depending on class size and time available.

After presentations are complete have a class discussion about the discrepancies in findings. Why might there be discrepancies? (i.e. the publishing date of their informational source(s); where students found their information, etc.)

#### Ideas of places to search for this information:

\*Local library – indexes to old newspaper articles, encyclopedias, books containing your state's history or economic information

\*Internet – State website, State statistical site, State economic site, state forestry sites, USDA Forest Service website at <u>http://www.fs.fed.us/fire/</u>, National Interagency Fire Center website at <u>http://www.nifc.gov/faq.html</u>, GeoMac at <u>http://geomac.usgs.gov/</u>

\*Call, visit, or contact someone in the state forest, state park, fish & wildlife office, or department of natural resources in your area and ask if they can answer some of your wildfire research questions. If your state has significant public lands then you might try a representative of the U.S. Forest Service, Bureau of Land Management, U.S. Fish & Wildlife Service, or National Park Service. Teachers might consider having a person from one of these agencies come in to talk to the class after the presentations.

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## **Worksheet 4: Create a New Character**

(Teacher Instructions)

Describe the "New Character" project (directions below). Then have students watch *The Greatest Good*, Disc 1, Part III, Chapter 23 (WWII- chapter ends when Housing sign comes on stating "Wyatt Sees End of Lumber Bottleneck" – 3 minutes ) fast forward to Chapter 28 (Smokey Bear – end when Pres Eisenhower comes on - 2 minutes). Then have them watch The Greatest Good , Disc 3, Smokey Bear the Rudy Wendelin section (3 minutes) and the Smokey Bear Posters section (12 minutes) (20 minutes total playing time). If the Smokey Bear Poster section of the film is too long, students can also view the posters on-line in Smokey's vault <a href="http://www.smokeybear.com/vault/default.asp">http://www.smokeybear.com/vault/default.asp</a>.

#### "Create a New Character" Directions:

After watching sections of The Greatest Good to gain a better understanding of Smokey Bear, his message, and the reasons behind his message, you will create your own "new character." You are responsible to create a new character for the U.S. Forest Service or other natural resource agency that sends a new Public Relations message about fire. The new character should help explain and promote the importance of fire to forest ecosystems or promote the use of prescribed fire to reduce fuel loads. You should draw or build a model of this character. The picture or model should also contain some type of message or slogan similar to "Only you can prevent forest fires!" The message can be displayed in any creative way you would like; however, in some way it should communicate your basic message. Here is the New Character Rubric to give you a better idea of the expectations of this project. Let's go over the rubric and see if there are any questions before we begin. (Read & discuss Rubric 3 – **Student Page 19**)



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## TEACHER'S ANSWER KEY

Reading Comprehension Activity (Worksheet 1) Answers:

What is the title of this essay?	Wildfires: A History of the Blaze
How do we know wildfires have been	Due to records of fire scars in fossilized
around for at least 350 million years?	trees.
What is nomadic?	Tendency to move and change
	settlements frequently.
What is fire suppression?	Preventing fires from happening or
	stamping out any fires that occur as
	quickly as possible.
What are lookout stations?	Towers used for spotting fires in the National Forests
	One of the things this provided was
What was one thing the "Weeks Act,"	financial aid for joint fire protection work
passed by Congress in 1911, provided?	between the US Forest Service and
	State Forest Service agencies.
VALL at is the "40ANA Dalies"	A 1935 Forest Service policy to control a
What is the "10AM Policy"?	fire by 10AM the morning following its
	spotting.
What are fire lines?	An area cleared to the soil leaving
	nothing to fuel wildfires.
In 1944 who was introduced by the	Smokey Bear
In 1944 who was introduced by the USDA Forest Service?	Smokey Bear
	Smokey Bear "Only you can prevent forest fires!"
USDA Forest Service?	_
USDA Forest Service? What was Smokey Bear's slogan?	"Only you can prevent forest fires!"
USDA Forest Service? What was Smokey Bear's slogan?	"Only you can prevent forest fires!" He was created for use in public service announcements to teach Americans about the importance of preventing
USDA Forest Service? What was Smokey Bear's slogan? Why was Smokey Bear created?	"Only you can prevent forest fires!" He was created for use in public service announcements to teach Americans about the importance of preventing forest fires.
USDA Forest Service? What was Smokey Bear's slogan? Why was Smokey Bear created? True/False: Smokey Bear's image is	"Only you can prevent forest fires!" He was created for use in public service announcements to teach Americans about the importance of preventing forest fires. True, Smokey Bear's image is
USDA Forest Service? What was Smokey Bear's slogan? Why was Smokey Bear created?	"Only you can prevent forest fires!" He was created for use in public service announcements to teach Americans about the importance of preventing forest fires.
USDA Forest Service? What was Smokey Bear's slogan? Why was Smokey Bear created? True/False: Smokey Bear's image is protected by U.S. federal law.	"Only you can prevent forest fires!" He was created for use in public service announcements to teach Americans about the importance of preventing forest fires. True, Smokey Bear's image is protected by US federal law.
USDA Forest Service? What was Smokey Bear's slogan? Why was Smokey Bear created? True/False: Smokey Bear's image is protected by U.S. federal law. What are smokejumpers?	"Only you can prevent forest fires!" He was created for use in public service announcements to teach Americans about the importance of preventing forest fires. True, Smokey Bear's image is protected by US federal law. Parachuting forest firefighters
USDA Forest Service? What was Smokey Bear's slogan? Why was Smokey Bear created? True/False: Smokey Bear's image is protected by U.S. federal law. What are smokejumpers? When were the first smokejumpers	"Only you can prevent forest fires!" He was created for use in public service announcements to teach Americans about the importance of preventing forest fires. True, Smokey Bear's image is protected by US federal law.
USDA Forest Service? What was Smokey Bear's slogan? Why was Smokey Bear created? True/False: Smokey Bear's image is protected by U.S. federal law. What are smokejumpers? When were the first smokejumpers used to fight fires?	"Only you can prevent forest fires!" He was created for use in public service announcements to teach Americans about the importance of preventing forest fires. True, Smokey Bear's image is protected by US federal law. Parachuting forest firefighters 1940
USDA Forest Service? What was Smokey Bear's slogan? Why was Smokey Bear created? True/False: Smokey Bear's image is protected by U.S. federal law. What are smokejumpers? When were the first smokejumpers	"Only you can prevent forest fires!" He was created for use in public service announcements to teach Americans about the importance of preventing forest fires. True, Smokey Bear's image is protected by US federal law. Parachuting forest firefighters





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Worksheet 1 Answers continued:

How many smokejumpers does the Forest Service have today?	Today there are over 270 men and women smokejumpers in the Forest Service.
Who was the first female smokejumper and in what year did she jump?	Deanne Shulman, 1981
By the 1940s what did ecologists come to realize?	That fire was one of the main causes of change in many ecosystems in the United States.
Why in the 1970s did the National Park Service decide to let naturally occurring fires burn?	The idea was that suppression of naturally occurring fire had unnatural impacts on wild-land succession and ecosystems.
How many acres of land were burned in the 1988 Yellowstone fires?	1.2 million acres
What happens in natural fire management?	Wildfires started from natural causes such as lightning are allowed to burn without suppression.
The Grand Canyon and Los Alamos fires in 2000 are examples of what?	Prescribed burns that got out of control.
What is succession?	The recovery process when an area is disturbed that enables forest regeneration.
What is a prescribed fire?	A fire management tool where a fire is intentionally set in a skillful manner to achieve certain outcomes, such as to improve habitat for wildlife and livestock, to improve watershed, or to reduce hazardous build up of fire fuels in the hopes of preventing large wildfires in the future.
What is Smokey Bear teaching today?	Smokey is teaching not only fire prevention, but also about the import role fire plays in our ecosystem.
What is the one thing that is certain about fire management in the future?	Fire management techniques will always be changing



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# Teacher Answer Key Continued **Worksheet 2:**

#### Fire Suppression

1. Sentence: The policy was to prevent fires from happening and stamp out any fires that did occur as quickly as possible (**fire suppression**).

2. Definition: Answers will vary. Fire suppression - The idea of putting out all wildfires as soon as possible.

#### Fire Lines

1. Sentence: They would dig trenches or cut **fire lines** to clear an area to the soil.

2. Definition: Answers will vary. Fire lines – an area cleared of brush, debris, trees, etc so that only soil is exposed to help prevent the spread of wildfires.

#### Prescribed Fire

1. Sentence: In the1950s and 1960s, the U.S. Forest Service and the National Park Service began to experiment with **prescribed fires**, where fires are set on purpose in order to burn away material that could be harmful later.

2. Definition: Answers will vary. Prescribed fires - A fire set deliberately for the purpose of wildfire and forest management; sometimes used as a tool to prevent future wildfires.

#### Succession

1. Sentence: By the 1940s, ecologists recognized that fire was an important part of ecosystem function and that total suppression could interfere with natural patterns of **succession**, the recovery process when an area is disturbed that enables forest regeneration.

2. Definition: Answers will vary. Succession – the ecological idea that the forest will regenerate or re-grow after a disturbance such as fire.

#### Naturally Occurring Fires

1. Sentence: By the 1970s the National Park Service had introduced a fire management plan which allowed **naturally occurring fires**, lightning-caused fires, to burn without human influences or suppression.

2. Definition: Answers will vary. Naturally occurring fires – wildfires that begin because of a natural cause and not because of humans.

#### Natural Fire Management

1. Sentence: As early as 1930, some land managers started suggesting a return to **natural fire management.** 

2. Definition: Answers will vary. Natural Fire Management – the forest management idea of letting fires that occur naturally (like from lightning strikes) to burn and to not interfere with nature; allowing the natural fire cycle to occur.

### Worksheet 3:

Answers will vary depending on the state. Use the Rubric to help with grading the poster and presentation.

### Worksheet 4:

Projects will vary greatly. Use the Rubrics to help with grading the project.



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**Teacher Answer Key Continued** 

#### **Assessment 1** (Application Integration):

Projects will vary. The rubric was designed to help with grading.

### Assessment 2 (Test):

1. When was the U.S. Forest Service created and what was its original fire management plan?

The U.S. Forest Service was established in 1905 and their original fire management plan was complete fire suppression.

2. What are three changes that occurred in smokejumping since 1940?

Answers will vary but should include at least three of the following:

- Single engine to multi-engine planes for jumping
- The addition of female smokejumpers in 1981
- Parachute color changes from white to white and orange panels
- Parachute material changes from silk to "rip-stop" nylon
- Rip chord design changes
- Circumference of the parachute changed
- New fireproof (Kevlar) uniforms
- Food box dropped
- Fire shelters

3. Define: natural fire management, fire exclusion policy, and prescribed burns.

Natural fire management – fires started from natural causes such as lightning would be allowed to burn without suppression

Fire exclusion policy – complete fire suppression

Prescribed fire - a fire management tool where a fire is intentionally set, in a skillful manner, to achieve certain outcomes, such as to improve habitat for wildlife and livestock, to improve watershed, or to reduce hazardous build up of fire fuels in the hopes of preventing large wildfires in the future.

4. Explain two changes that occurred in public land management agencies as a result of the Yellowstone fires in 1988

Public land management agencies introduced fire management plans with stricter guidelines under which naturally occurring fires would be allowed to burn. They also began to better inform the public of the value and purpose of fire in forests.

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#### Teacher Answer Key Continued

5. List at least two factors which land use agencies are forced to consider when creating fire management plans.

Students might list any of the following:

• People are moving closer to forested lands and expect protection for themselves, their homes, and their property during wildfires so land use managers must take this into consideration.

• Public forest areas also often adjoin privately owned forest lands and a wildfire occurring on public lands could have an impact on a private forest owner.

- Environmental impacts
- Ecological impacts
- Economic impacts of wildfires.

6. Name at least three facts you learned about wildfires in your state.

Answers will vary depending on the posters your students present.

7. What was Smokey Bear's original message and why was he created?

Smokey's original message was "Only you can prevent Forest Fires!" His message was one of fire prevention and fire suppression. Smokey and his message were created as a public service announcement to inform people about the importance of preventing forest fires. Students might also talk about how Smokey was created around the time of World War II during a time when protecting our national natural resources was very important. And Smokey also often emphasized that fire prevention was good stewardship and an American duty to help support the war effort.

8. When did Smokey first add to his original message and what message did he add?

Smokey added to his original message in 2001. He now teaches not only fire prevention, but also about the important role fire plays in our ecosystem.

#### Assessment 3 (Reflective Exercise):

Editorials will differ.

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## Wildfire Timeline: (For Math Team Teaching Activity)

#### U.S. Major Wildfires Timeline

(does not include ALL major wildfires)

	Maine/Canada <u>Miramichi Fire</u>	After a summer of sparse rain, sporadic wildfires in Maine and the Canadian province of New Brunswick reached disastrous levels. Strong winds spurred the fires, which burned through forests and settlements in Maine and along the Miramichi River in Canada. Among the worst wildfires in North American history, the Miramichi fire burned 3 million acres, killed 160 people and left 15,000 homeless.
1849	Oregon <b>Siletz Fire</b>	800,000 acres burned
1853	Oregon <b>Yaquina Fire</b>	484,000 acres burned
1865	Oregon Silverton Fire	988,000 acres burned
	Wisconsin/Michigan Peshtigo Fire	The Peshtigo Fire burned more than 3.7 million acres in Wisconsin and Michigan. Federal authorities estimate at least 1,500 people died in the fire. Eight hundred died in Peshtigo, Wisconsin alone—nearly half the town's population. Despite the fire's extensive devastation and the fact that it killed more people than any fire since, the Peshtigo Fire was overshadowed at the time by the Great Chicago Fire, which began the same day.
Sept 1881	Michigan <u>Thumb Fire</u>	Located in the Thumb area of Michigan, the fire burned 1,000,000 acres in less than a day; 282 lives were lost; damage estimated at \$2,347,000.
	Minnesota Hinckley Fire	After one of the driest summers on record, small blazes converged to form a firestorm near Hinckley, Minnesota. The flames rushed through the city and surrounded towns in a matter of hours, burning 350,000 acres and killing 418 people.
	Washington/Oregon Yacolt Fire	The fire burned across more than 1,000,000 acres in Washington and Oregon. 38 lives were lost.
	New York Adirondack Fire	Fire burned 637,000 acres.

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-	Idaho/Montana <u>Great Fire of 1910</u>	Over two days and nights, several small blazes, hurricane-force winds and dry forests combined in Idaho and Montana to form what became known as the Great Fire of 1910. The flames burned about 3 million acres, making it one of the biggest wildfires ever recorded in North America, and killed 86 people. A forester later wrote that the fire was "fanned by a tornadic wind so violent that the flames
		flattened out ahead, swooping to earth in great darting curves, truly a veritable red demon from hell."
	Minnesota Cloquet-Moose Lake	Fire destroyed Cloquet, a sawmill town of 12,000, and left 450 dead; 250,000 acres burned; timberland and property losses estimated at \$30 million.
	Oregon Tillamook Burn	The Tillamook Burn became the collective name for the series of large fires that began in 1933 and struck at six-year intervals through 1951, burning a combined total of 355,000 acres. Oregon voters passed a constitutional amendment in 1948 authorizing \$12 million in bonds to rehabilitate the land.
October 1947	Maine	Wildfire destroyed part of Bar Harbor and damaged Acadia National Park. In all, 205,678 acres were burned and 16 lives were lost.
-	Montana Mann Gulch Fire	It was in this fire that 13 firefighters lost their lives attacking what looked like a small, routine flare up. This fire's "blow up" and the crews' response led to new smokejumper training and techniques.
	California Cleveland National Forest	Wildfire destroyed 40,000 acres in Cleveland National Forest and caused 11 deaths.
1987	California Siege of '87	640,000 acres burned; no lives were lost, but valuable timber lost in the Klamath and Stanislaus National Forests.
	Wyoming <u>Yellowstone</u>	During summer 1988, parts of Yellowstone National Park and surrounding areas were overwhelmed by continuous forest fires that scorched 36 percent of the park's 2,221,800 acres by the end of the season. Even with the work of firefighters from all over the country, it took the first September snowfalls of the year to extinguish the wildfires.

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	Colorado Storm King	A small, lightening-caused fire near Glenwood Springs escalated into an intense fire traveling over 500 feet per minute. Within five hours, the fire burned 2,115 acres and killed 14 firefighters. This again changed firefighting training and techniques.
1994	Montana	4,500 wildfires rage across Montana, burning 286,000 acres.
	Alaska Inowak	610,000 acres burned; fire threatened three villages. (See also <u>CIDI Incident Report</u> )
1998	Florida	Over 2,200 fires ravaged Florida, with over 80,000 people requiring evacuation. The fires caused \$390 million worth of timber losses and cost over \$133 million to fight.
	Northern New Mexico Los Alamos Fire	Prescribed fire started by National Park Service raged out of control, destroying 235 structures and forcing evacuation of more than 20,000 people. Blaze consumed an estimated 47,000 acres and threatened Los Alamos National Laboratory.
	Western U.S.: Alaska, California, Colorado, Idaho, Montana, New Mexico, Nevada, Oregon, Texas, Utah, Washington, and Wyoming	Dry conditions led to one of the most destructive forest fire seasons in U.S. history. About 7.2 million acres burned nationwide, nearly double the 10-year average. States hardest hit included AK, CA, CO, ID, MT, NM, NV, OR, TX, UT, WA, and WY.
	Deadwood, South Dakota Grizzly Gulch Fire	Grizzly Gulch wildfire burned more than 10,000 acres south of Deadwood.
	Pike National Forest, Colorado Hayman Fire	The Hayman fire consumed some 137,760 acres and 600 structures, making it the worst wildfire in Colorado's history.
	Central Arizona Rodeo/Chediski Fire	The 85,000-acre Rodeo fire, which had already been declared the worst in Arizona's history, merged with the Chediski fire to form a raging wildfire that consumed 468,638 acres and more than 400 structures.

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	California Cedar & Old fires	15 devastating forest fires burned for two weeks, primarily in San Diego County, Ventura County, Riverside County, and San Bernardino County, forcing more than 80,000 people to evacuate their homes and burning 800,000 acres. More than 15,500 firefighters battled the blazes that killed 24 people and destroyed 3,640 homes. The Cedar Fire in San Diego, which burned through 200,000 acres, was the largest fire in California's history.
		According to the California Department of Forestry and Fire Protection, human activity and lightning strikes sparked the wildfires.
		On May 7, 2004, federal and state officials approved \$317 million to help the fire-ravaged communities rebuild.
		According to the National Interagency Fire Center, more than 85,000 fires burned a total of 4,918,088 acres in the United States during 2003. (See also <u>CIDI Incident Reports</u>
July/Aug 2004	Alaska	Wildfires in Alaska burned more than 5 million acres, the worst year for Alaska fires.
Dec '05 – Mar '06	Texas and Oklahoma	Wildfires destroyed over 500 homes and over 500,000 acres. In Oklahoma, 33 of its 77 counties had wildfires, with damages well over \$10 million.
	Southern Plains States	Wildfires occurred in Texas, Oklahoma, southern Kansas, western Arkansas, and southern Missouri.