# Wildfires in Saskatchewan

## benefits



Wildfire is an important and natural part of Saskatchewan's boreal forest ecosystems. Plants and animals are well-adapted to fire; some even require it to thrive.

50°c

Jack pine cones need this temperature to open and release their seed.



### risks



Wildfires can threaten communities, essential infrastructure, timber and other human values. There is no place for unplanned, human-caused fires. Do your part to be FireSmart.

MAP

100+

Saskatchewan communities in or near the forest.



Fire releases nutrients to the soil

Removes diseased trees and harmful insects

Opens the forest canopy so sunlight can reach the forest floor



Fire threatens lives

Creates hardships for people, property and businesses

Impacts all utilities, including roads, power lines and communication towers

70 years

Large wildfires have been the norm in the boreal forest for thousands of years. On average, a given area of forest will burn every 70 years in natural boreal systems.



#### timber

On average, a 10,000-hectare wildfire in the commercial forest burns enough wood to build almost 10,000 homes.

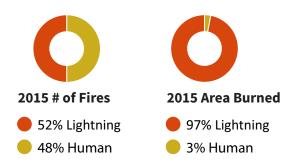
# Wildfires have only two causes

### lightning



The Ministry of Environment monitors lightning strikes through the fire season.

We can't prevent lightning, but we can track it. In 2015, lightning caused about half of all our wildfires but accounted for almost 97 per cent of the total area burned.



Lightning fires can start anywhere, including very remote areas, where it may be desirable to allow fires to play their natural role in the ecosystem.

#### people



Almost all early season wildfires are caused by people.

Every year, about half of Saskatchewan wildfires are started by human activity. These include:

- Campfires
- Industrial activity
- Clean-up projects that get away
- Vehicle and ATV exhaust
- Arson

Human-caused fires usually start in accessible areas, near communities and roads, posing a greater threat.



Human-caused wildfires are preventable.

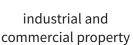
# What are the valuable things we protect?



human life, communities and homes

things important to people that could be negatively affected by wildfire







timber





# Saskatchewan Wildfire Management Priorities

#### Every wildfire is assessed

The ministry assesses every wildfire and makes a decision about the best way to manage every single fire. Many factors are considered, including:

Lives at risk	Weather
Location of the fire	Other wildfire activity
Features and areas threatened	Firefighter safety
Burning conditions	Potential ecological benefits

Saskatchewan's wildfire priorities guide decisions, allowing the ministry to:

- protect what's most important human life and communities are always the top priorities, followed by critical public infrastructure, major industrial infrastructure, commercial timber, remote structures and natural resources
- manage firefighting resources effectively
- let wildfire play its natural and beneficial role on the landscape



Wildfires outside arbitrarily chosen areas are simply allowed to burn, regardless of the threat.





The ministry assesses every wildfire, no matter where it is, and makes decisions about how to manage it. Fires threatening communities ALWAYS receive the highest priority.



When a wildfire is detected, the goal should always be to put it out as quickly as possible.



It is not always appropriate, or possible, to put out every wildfire. Effective management may mean protecting property in an area, or monitoring a remote fire.

> There is no such thing as a 'let-it-burn' policy in Saskatchewan.

Visit Saskatchewan.ca/fire for information to help you and your community prepare for wildfire.

# How do we find wildfires?

Spot a wildfire? or emergency

#### aircraft 35<sup>%</sup>



ministry

### staff 13<sup>%</sup>



ministry

### towers 10<sup>%</sup>



42 fitted with cameras

#### aircraft 5<sup>%</sup>



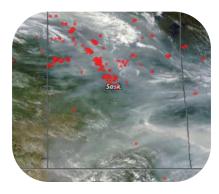
private and commercial

## public 31<sup>%</sup>



1-800-667-9660 | 911

#### other 6<sup>%</sup>



includes satellite imagery

# Saskatchewan fights wildfires

A CV580A air tanker has a load capacity of about 6,600 litres and can fly 483 km/hr.

#### ... from the air







<u>Saskatchewan's air tanker fleet</u> Four Convair 580A land-based air tankers

Six CL215 water skimming aircraft Seven 'bird dog' aircraft that guide the tankers





#### Contract helicopters

Short- and long-term contracts during the wildfire season

Used in initial attack, crew transport, water bucketing, reconnaissance for planning and mapping

In 2015, 74 helicopters worked on wildfires in Saskatchewan. Helicopter buckets can carry 350 to 3,800 litres of water, depending on the size of the machine.

In 2015, the Ministry of Environment hired almost 2,400 emergency firefighters to battle northern wildfires.

#### $\ldots$ on the ground



Heavy equipment
Crawler tractors expose
mineral soil to create
fire guards that limit
fire movement



#### **Ground crews**

- 1. Ministry staff
- 2. First Nations and northern community contract crews
- 3. Emergency fire personnel

#### ... behind the scenes



Specialized staff support the ministry's air and ground wildfire operations in many critical areas, including:

- Weather
- Geographic Information Systems and mapping
- Wildfire science
- Equipment maintenance and transport
- Radio communications
- Aircraft maintenance
- Safety
- Administration

# 2015 Wildfire Facts

## 35.5 million ← → 1.7 million

hectares of forest in Saskatchewan

total hectares burned

700,000

hectares burned in full response areas (10 times the previous 10-year average)



8 number of provinces that sent assistance to Saskatchewan (BC, Alberta, Manitoba, Ontario, Quebec, Nova Scotia, New Brunswick, Newfoundland and Labrador). Help also came from the Canadian Armed Forces, the U.S. Forest Service and South Dakota.

720 total number of wildfires (10-year average 482)

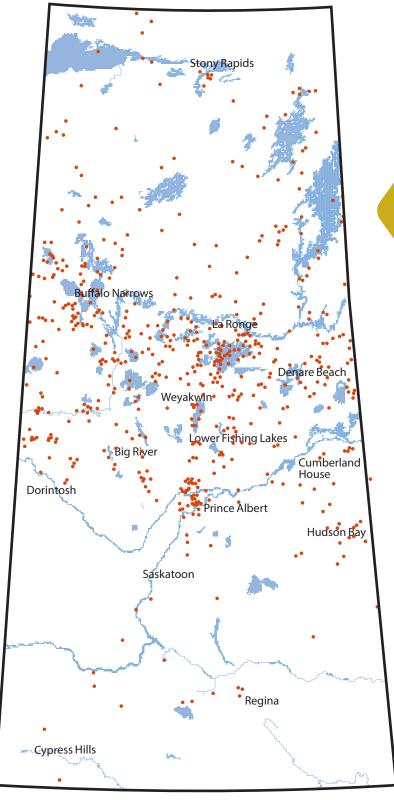
151 number of fires MORE than 100 hectares

508 number of fires LESS than 10 hectares

number of lives, serious injuries and communities lost to wildfire



# 2015 Wildfire Ignition Locations



Total area burned

1
7
million
hectares