Hopewell Township Environmental Newsletter

A Publication of the Environmental Commission

Environmental Commission Members

Jerry Lewis - Chair
Jane Hankins - Vice Chair
Beth McClain - Secretary
Ken Strait - Liaison to
Land Use Board
Burt Doremus
Marion Carll
Cheryl Lalancette

Meetings

The Hopewell Township Environmental Commission meets the second Wednesday of each month @ 7 PM except for November and December when meetings are held the first Wednesday of the month. The meetings are open to the public and all are welcome to attend.

Newsletters are available on the township website and the township Facebook page. Printed copies available in the municipal building.

Resources for article:

https:// yaleclimateconnections.org/ 2019/07/wildfires-and-climatechange-whats-the-connection/

www. NJ DEP.gov

National Interagency Fire Commission @www.nifc.gov

Wildfires and Climate

The 2023 wildfire season is expected to be one of the most unpredictable yet, with higher temperatures and drier fuel sources putting fires at a greater risk.

Climate change has already led to an increase in average temperatures across many regions, which can result in longer wildfire seasons and an increased risk of lightning-caused fires. According to the Union of Concerned Scientists in a March 2020 updated report, there is a strong connection between climate change and wildfires.

Wildfire activity in the United States is changing dangerously, particularly in the west, as conditions become hotter and drier due to climate change. Past forest and fire management practices often exacerbate wildfire risk. Development patterns can both increase people exposed to wildfires and increase ignition sources that spark fires and smoke. Although fire has always been a natural—and beneficial—part of many ecosystems, climate change and other human-caused factors are fundamentally changing the frequency and intensity of wildfires in many places in the US and around the world.

Climate change contributes to more and bigger wildfires in a variety of ways. The rise in average global temperatures has led to higher spring and summer temperatures, and importantly an earlier onset of spring. This pattern has led to a rapid melting of spring snowpack, causing soils to dry out earlier and remain dry longer.



"I wonder how the forest is being affected by climate change?"

Tom Toro is a cartoonist and writer who has published over 200 cartoons in The New Yorker since 2010.

The New Jersey Forest Service's series of Pocket presentations includes a presentation "What's carbon got to do with it?" which will help you understand current climate trends in the state, the building blocks of climate change, how the actions we take now can influence what our future climate will look like, and how we can keep our forests healthy along the way. To reference specific topics within this presentation, see the links below:

What's Carbon
Got To Do With
It? | A New Jersey
Forest Service Pocket Presentation
on You tube

NJ Forest Service on Facebook

NJDEP/NJ Forest Fire Service/ nj.gov

On average of 1,500 wildfires damage or destroy 7,000 acres of New Jersey's forests each year.

Wildfires not only damage our woodlands, but are becoming an increasing threat to homeowners who live within or adjacent to forest environments and residents who utilize the state's great outdoors for various forms of recreation.

Since 1906 the New Jersey Forest Fire Service has been the agency responsible for protecting life, property, as well as the state's natural resources from wildfire.

Recreational Drones Near Wildfires Are Not Safe - If you fly, we can't!Learn more at FAA.gov After months of drying in the longer periods of higher temperatures, stressed forests have become more susceptible to infestations by bark beetles and other insects that thrive in warmer temperatures. These insects kill the trees making them susceptible to fires. Wet winters fueled by atmospheric river storms, followed by parched summers that dry out spring vegetation and transform it into kindling for wildfires in the fall. Human-caused climate change has exacerbated the hot and dry conditions that allow wildfires to ignite and grow. Over the past few years, some of these fires have exhibited extreme fire behavior, including alarming rotational patterns, creating their own clouds and wafting smoke across the continent. As wildfires grow in frequency, intensity, and the amount of area burned, they pose serious health risks. (CNN; Rachel Ramirez, June 10, 2023)

Smoke from wildfires contains volatile and semi-volatile organic compounds and nitrogen oxides that form ozone and organic particulates and other toxic pollutants – all of which can be dangerous and even deadly for sensitive populations. Wildfires also impact climate change because they emit massive amounts of carbon dioxide and other pollutants that can affect regional and even global climate. Wildfires are also expected to increase the risk for destructive mudslides, as landscapes laid bare by fire are drenched with winter rains.

NJ Firefighters at Work



A report from **USA Facts** gives the following data:

The National Interagency Fire Center (NIFC) states that as of September 15, 2021, 5.6 million acres an area, about the size of New Jersey burned in wildfires.

Wildfires from the last 10 years burned more than twice as many acres on average as fires in the 1980's.

There were 74,126 recorded wildfires in 2011 and 58,950 in 2020.

Approximately 4.6 million acres burned in 2019 and over 10 million acres in 2020. (That's the size of Mass and Conn combined.)

The average for 2011-2020 was about 7.5 million acres - more than twice as much as the 10 year average of 2.7 million acres from 1983-1992.

Between 2011 and 2020, 87.4% of wildfires were classified as human caused, while lightning strikes caused the rest.

Wildfires cause economic, personal property, business loss, health and environmental damage.

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