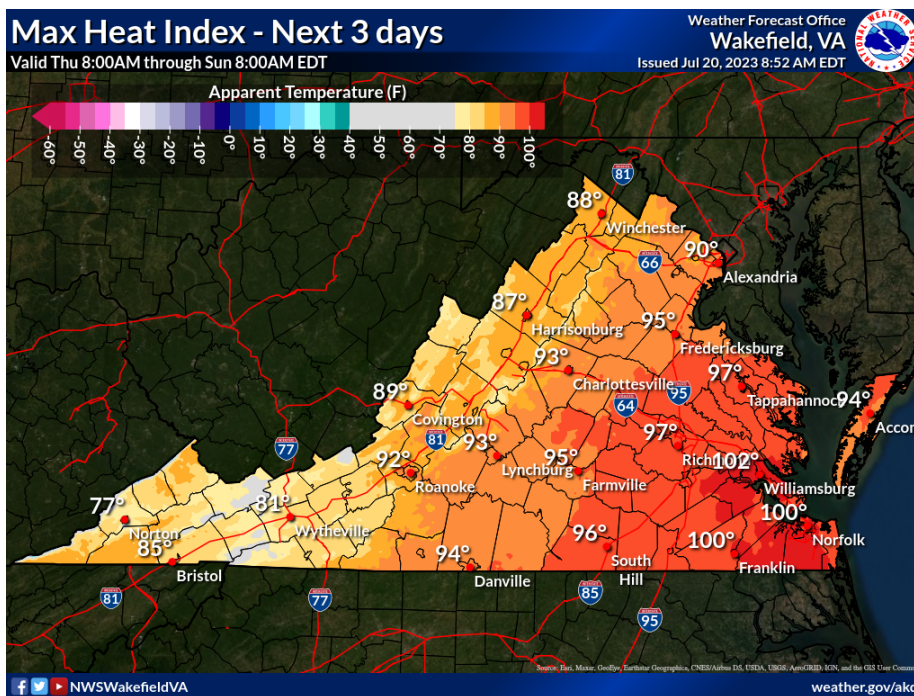


July 21, 2023

## Key Takeaways

- Hazardous heat is expected across much of Virginia today, with the heat index exceeding 90 degrees, with the potential to hit triple digits in a few areas. The National Weather Service recommends "extreme caution" with heat indexes in this range. Temperatures are expected to cool over the weekend.
- Avian flu outbreaks among domestic mammals recently, including among domestic cats in Poland and fur farms in Finland, are raising concerns about the ongoing spread of the disease.
- The total number of Canadian wildfires declined, and there are no uncontrolled wildfires burning in Quebec. The overall number of fires remains high, however. Wildfire smoke is not expected to impact Virginia's air quality significantly over the next few days.
- A Pfizer facility damaged by a tornado, along with the potential for strikes or bankruptcies affecting major shipping companies, have raised medical supply chain concerns.
- Six small earthquakes struck Southwest Virginia within a month.

## Key Figures



## COVID-19

**18%**

Chance that the WHO will identify a new COVID-19 Variant of Concern before 2024. (Metaculus forecast)

## Heat-Related Illness

**101 degrees**

The heat index expected in Norfolk at 4PM on Friday.

**65%**

The share of Virginians living within a 15-min drive of a cooling center in 2022.

**7%**

The share of Virginians in poverty living within a 15-min drive of a cooling center in 2022.

## Wildfires

**548 of 887**

The number of uncontrolled wildfires in Canada, out of the total number of active fires.

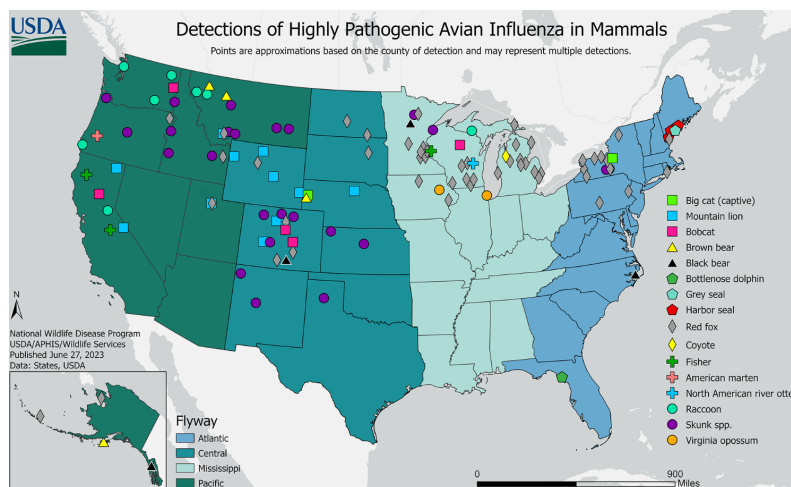
**Spotlight:**  
 Avian flu in domestic mammals

*Forecasts are italicized*

## Spotlight

- **Last week, the WHO urged countries to work together to manage avian flu, noting the ongoing outbreak poses risks to humans.** Noting avian flu has affected at least 26 mammal species in 10 countries, the WHO, the World Organization of Animal Health, and the Food and Agriculture Organization of the UN, urged countries to work together across sectors to address the outbreak.
- **WHO also issued an alert describing an outbreak among cats in Poland.** 29 of 46 cats, including a captive caracal, tested were positive, and 25 died or were euthanized. [Media reports](#) indicate that at least some of the cats were fed raw poultry purchased at supermarkets. No human infections were associated with the outbreak.
- **Finland reported avian flu was detected in 10 fur farms.** [Most](#) of the farms housed blue foxes, but minks and silver foxes also tested positive.
- **Five dogs and a cat tested positive** on an Italian farm experiencing an avian flu outbreak earlier this month.

## Avian Flu in Domestic Mammals



The USDA has reported 198 detections of avian flu among [mammals](#) in the US since April 2022. Though detections are widespread, there are no reported detections among land mammals in the Southeast. With the exception of a captive "big cat" there have been no reports of avian flu among domestic mammals in the US. The last detection among [domestic poultry](#) occurred in May, though detections among [wild birds](#) continue. Image Source: [USDA](#)

## Other News

- **Early indicators hint at the start of COVID-19 growth.** Nationally, Emergency Department visits for COVID-19 and wastewater viral loads have both ticked up slightly. At the same time, hospitalization and death rates remain quite low. It is unclear if this is the start of a new COVID-19 wave or random noise. [Epidemiologists suggest](#) the timing fits the former as most COVID-19 waves start in mid-summer.
- **Virginia shows no clear signs of COVID-19 growth.** [COVID-like illness visits](#) remain low and [no wastewater facilities](#) are reporting significant growth in Virginia. Hospitalizations are up slightly, but no higher than rates seen in May.
- **National rate of excess deaths returns to normal.** Despite the signs of new growth, the [U.S. hit a milestone](#) recently when the total excess death rate returned to historically normal rates. During the peak of the pandemic, death rates reached near 30% above normal.
- **FDA approves new monoclonal antibody for RSV.** The virus remains the #1 cause of hospitalization for babies. The treatment [cut hospitalization rates by about 75%](#) in trials. Already licensed in the UK and EU, the CDC expects to finalize approval for domestic use in the coming weeks.
- **Pfizer facility crippled by EF-3 tornado.** The affected factory produces "25% of all sterile injectable medicines used in U.S. hospitals" (mainly anesthesia, anti-infectives, and paralytics). The loss of the factory could lead to long-term medication shortages as Pfizer rebuilds.
- **Medical supply chains threatened.** The potential for a strike by UPS workers and concurrent bankruptcy by major LTL carrier Yellow Freight, has the [potential to disrupt supply chains](#) for all industries including healthcare.
- **Landslides block roads in Lynchburg.** Clean-up efforts are underway but officials are still trying to determine if more reinforcement is needed along roadside slopes.
- **Six small earthquakes hit SW Virginia within a month.** Seismologists note that these tremors could be foreshocks preceding a much [larger earthquake](#), but could also be normal activity.
- **Rural Virginians have limited access to cooling centers.** As heatwaves continue to batter the country, researchers note that cooling centers are mostly concentrated in urban areas. A 2022 study found that Southwest and Southside Virginia were particularly affected by this lack of access.