

Panhandle

Public Health District

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For Immediate Release:

Air Quality and Your Health, Breathe Easier

The air we breathe is essential to living a healthy life. Understanding what can affect your air quality can ensure that you are taking all the necessary steps to keep your home and family healthy. This is part three of a three-part series on air quality to help address some common issues that can occur that affect your air indoors and out.

Let's Talk About Wildfire Smoke

Wildfire smoke is a mixture of gaseous pollutants, hazardous air pollutants, water vapor, and particle pollution. Particle pollution is the cause of health hazards. Particle pollution is a mixture of solid and liquid droplets which are suspended in the air.

Dry conditions increase the potential for wildfires in or near wilderness areas. Wildfires that burn near populated areas can have significant impact on property, livestock, and human health.

Health Effects of Wildfire Smoke

Health effects from wildfire smoke can be minor to relatively serious. Particle pollution affects the body's ability to remove inhaled foreign material and can worsen pre-existing conditions. Certain groups of people are at higher risk of health effects from wildfire smoke such as people with asthma or heart disease and:

- Children under 18
- Pregnant women
- Older adults
- People of lower socio-economic status
- Outdoor workers

Wildfire smoke during short-term exposure can cause breathing difficulties such as coughing or wheezing. Effects of a few days of exposure can cause bronchitis and reduced lung function as well as potential heart effects such as heart failure or heart attack. Exposure to smoke over longer periods of time can cause a drastic reduction in lung function and those with pre-existing conditions can have worsening health effects.

Air Quality Index

While mold and radon can be generally fixed to improve air quality, it is harder to predict the air quality during a wildfire due to wind, weather, and terrain. To monitor your air during a wildfire event,

using the Air Quality Index (AQI) is the best way to stay informed about what activities or precautions need to be taken. The AQI is a nationally uniformed color-coated index that measures ozone and particle pollution. Typically, the higher the AQI number, the greater level of pollution and the greater the health concern. There are six categories on the AQI;

- Green (0-50): Good air quality, little or not air pollution risk.
- Yellow (51-100): Moderate, acceptable air quality but some risk for those unusually sensitive to air pollution.
- Orange (101-150): Unhealthy for sensitive groups, the general public is usually less affected.
- Red (151-200): Unhealthy, some members of the general public may now experience health effects while sensitive groups can experience more serious health effects.
- Purple (201-300): Very unhealthy, there is an increased health risk for everyone
- Maroon (301 and higher): Hazardous, this is considered a health emergency condition and everyone is more likely to be affected.

Reducing exposure during poor air quality events is key to minimizing the impacts of particle pollution. Some steps can include consistently checking the air quality, checking to ensure your HVAC (heating, ventilation, and air condition) unit is filtering properly, using respirators, or buying portable air cleaners. Air quality can be monitored through the AirNow site from the EPA or by checking on air monitors installed throughout the Panhandle.

Additionally, several schools in the Panhandle area have installed PurpleAir monitors which show air quality in real-time. The general public can monitor these at any given time by visiting: <https://map.purpleair.com>. PurpleAir monitors measure real-time particulate matter concentrations and use the same color index as the AQI to show air quality. Several schools have their air monitor information listed on their websites, check today to see if your school is monitoring your outdoor air.

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