Flood

A flood is defined by the National Weather Service as an overflow of water onto normally dry land. The inundation of a normally dry area caused by rising water in an existing waterway, such as a river, stream, or drainage ditch. Ponding of water at or near the point where the rain fell. Flooding is a longer-term event than flash flooding: it may last days or weeks. Flash Floods are a flood caused by heavy or excessive rainfall in a short period of time, generally less than 6 hours. Flash floods are usually characterized by raging torrents after heavy rains that rip through river beds, urban streets, or mountain canyons sweeping everything before them. They can occur within minutes or a few hours of excessive rainfall. They can also occur even if no rain has fallen, for instance after a levee or dam has failed, or after a sudden release of water by a debris jam.

Clatsop County can also experience coastal flooding when powerful storms, usually in the winter time, produce a surge of seawater along beaches and allows for higher wave run up that normal. In these situations, and particularly when coincident with a high tide, low lying areas near the beaches, and streams that drain to the ocean, can fill with water and cause damage to homes and businesses.

With high annual rainfalls, and mountainous topography and a coastline subject to tides Clatsop County is pre-disposed is a likely place to experience flood events. One of the most notable flood events in recent history occurred in February 1996, Widespread major flooding affected the entire Pacific Northwest and was especially notable in western Oregon and Washington. The flooding was the culmination of a series of unusual weather events:

First, the fall and winter had above-normal precipitation, about 125 percent above normal, although snowpack was below normal. Second, in mid and late January, tremendous amounts of snow fell in mid and high elevations of the Cascades and coastal mountains, and significant snow accumulated even at low elevations. Third, the period of snow was followed by a deep freeze, with freezing rain, frost, and frozen ground. Fourth, the weather pattern changed dramatically in early February, with a strong subtropical jet (“pineapple express”) bringing warm, moist air to the region, which resulted in very heavy rain and rapid snowmelt.

Some river basins had 4-day rainfall totals exceeding 15 inches combined with another 10-15 inches of water equivalent in melted snow. Rivers rose rapidly February 6-9, with smaller creeks and rivers cresting on the 7th and 8th and larger rivers cresting on the 9th and 10th. There

were 8 fatalities in Oregon. Several of these were the result of people driving their cars into flooded areas and being swept away. Total damages across the Pacific Northwest exceeded $1 billion.

KNOW THESE TERMS:

Flood Watch:
Flooding is possible. Tune in to NOAA Weather Radio, commercial radio, or television for information.

Flash Flood Watch:
Flash flooding is possible. Be prepared to move to higher ground; listen to NOAA Weather Radio, commercial radio, or television for information.

Flood Warning:
Flooding is occurring or will occur soon; if advised to evacuate, do so immediately.

Flash Flood Warning:
A flash flood is occurring; seek higher ground on foot immediately.

Planning Resources

VIDEOS & PUBLIC SERVICE ANNOUNCEMENTS

"Turn Around Don't Drown" PSA https://youtu.be/eI6mIlHKrVY

ARTICLES & DOCUMENTS

Flood-- Facts & Information (NatGeo)
https://www.nationalgeographic.com/environment/natural-disasters/floods/

"Remembering the Big Storm"
https://www.oregonlive.com/oregonianextra/2008/11/remembering_the_big_st...

"The Great Coastal Gale of December 1 - 3, 2007"
https://climate.washington.edu/stormking/December2007.html

"Estimates of Twenty-First-Century Flood Risk in the Pacific Northwest Based on Regional Climate Model Simulations" https://journals.ametsoc.org/doi/full/10.1175/JHM-D-13-0137.1

"The Great Coastal Gale of 2007 Brought Neighbors Together"
https://www.washingtontimes.com/news/2017/dec/9/the-great-coastal-gale-o...

WEBSITES

Floods Ready.gov https://www.ready.gov/floods

National Flood Insurance Program (NFIP) https://www.floodsmart.gov

NOAA National Weather Service Program
https://water.weather.gov/ahps2/index.php?wfo=pqr

LOCAL RESOURCES

Sandbagging Resources https://www.co.clatsop.or.us/em/page/sandbagging-resources

Traffic Impacts https://www.co.clatsop.or.us/publicworks/page/traffic-impacts

Before a Flood

What is your flood risk? Your community officials are your best resources to learn about the history of flooding for your region. Ask whether your property is in the floodplain and if it is above or below the flood stage water level. Flood Insurance Rate Maps (FIRMs) are used to determine your…

Read More
Once the Flood Arrives

If you have to leave your home, remember these evacuation tips:

- Do not walk through moving water. Six inches of moving water can make you fall. If you have to walk in water, walk where the water is not moving. Use a stick to check the firmness of the ground in front of you.
- …

Read More
After the Flood

Flood dangers do not end when the water begins to recede.

- Listen for news reports to learn whether the community’s water supply is safe to drink.
- Avoid floodwaters; water may be contaminated by oil, gasoline, or raw sewage. Water may also be electrically charged from…

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