Water Quality Program

Harmful Algal Blooms (HABs) in Oregon:
Background, Causes, and Testing

March 5th, 2019

Presentation to the House Energy and Environment Committee

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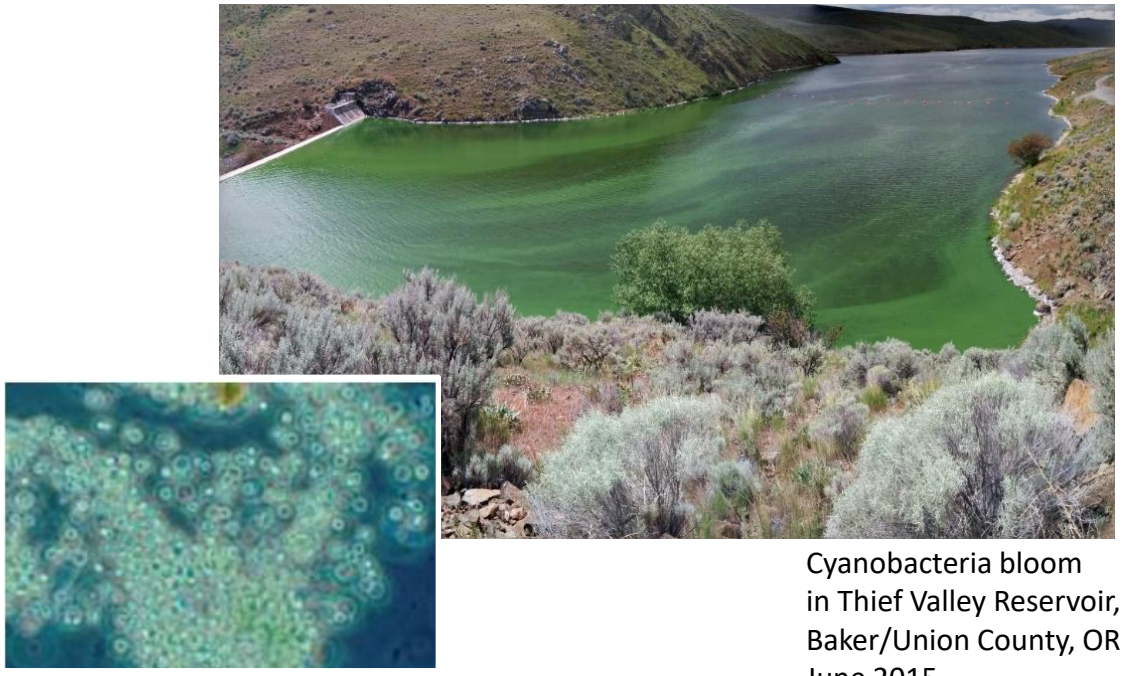
What are Harmful Algal Blooms?

- Excessive growth of single-celled aquatic plants
  - Toxin-producing cyanobacteria
- Potential health, economic and environmental consequences



Cyanobacteria bloom
in Thief Valley Reservoir,
Baker/Union County, OR
June 2015

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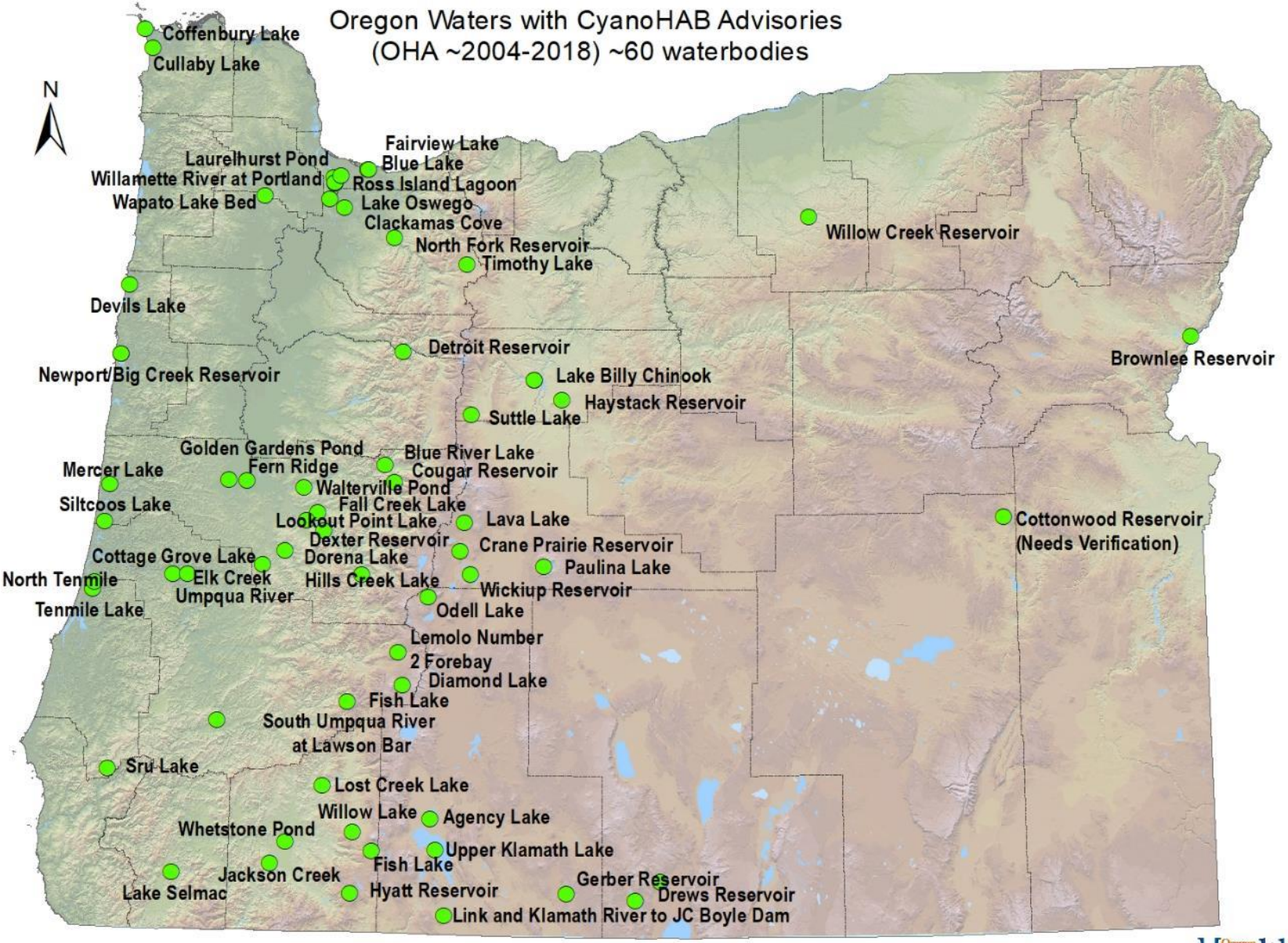
Where have CyanoHABs occurred?



What causes CyanoHABs?

<u>Causes are waterbody specific and may include one or more of the following factors:</u>

- Increasing inputs of nutrients
  - Natural and human-based sources
- Warming temperatures
- Slow moving water
- Invasive species

CyanoHAB in Upper Klamath Lake, Klamath County, OR
June 2018
Source: https://sentinel.esa.int/

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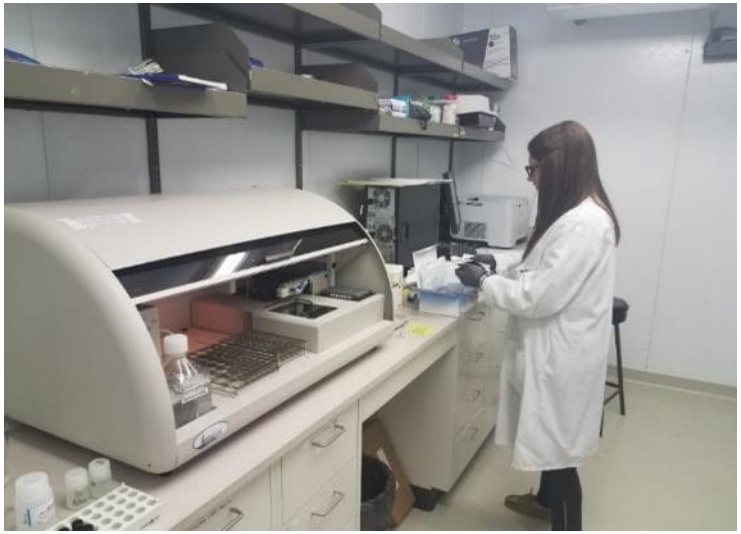
Bloom response and Cyanotoxin detection

- Roles & Responsibilities
- Pre-2018
- Detroit Reservoir Response



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Salem Issues Another Drinking Water Advisory Over Cyanotoxins

by **Ericka Cruz Guevarra** Follow OPB June 6, 2018 10:53 a.m. | Updated: June 7, 2018 5:23 p.m. | Portland, Ore.

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What can we do to better protect Oregonians from CyanoHABs?

- Refine sampling methodology and requirements for optimal efficiency and accuracy
- Increase capacity to proactively detect and mitigate blooms across the state
- Increase assessment of waterbodies with repeated CyanoHABs to determine causes and solutions

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Questions?

CyanoHAB in Lake Billy Chinook, August 2016
Source: www.ktvz.com

CyanoHAB in Ross Island Lagoon, July 2015
Source: www.kptv.com

Documents can be provided upon request in an alternate format for individuals with disabilities or in a language other than English for people with limited English skills. To request a document in another format or language, call DEQ in Portland at 503-229-5696, or toll-free in Oregon at 1-800-452-4011, ext. 5696; or email deqinfo@deq.state.or.us.

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