

The background of the slide is a photograph of Lake Erie. The top half shows a pale, overcast sky with soft, greyish clouds. The bottom half shows the dark blue, choppy water of the lake, with small waves and ripples. The horizon line is visible in the middle of the image.

# Lake Erie Dissolved Oxygen Recent Conditions

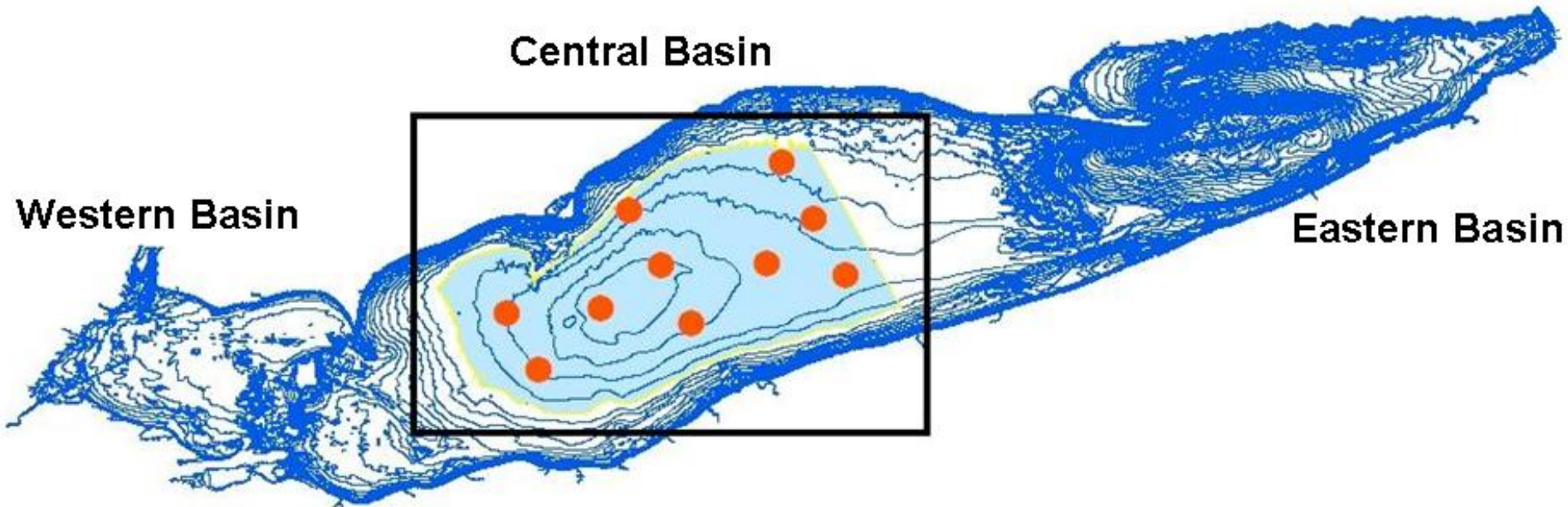
**Paul Bertram**

U.S. EPA Great Lakes National Program Office

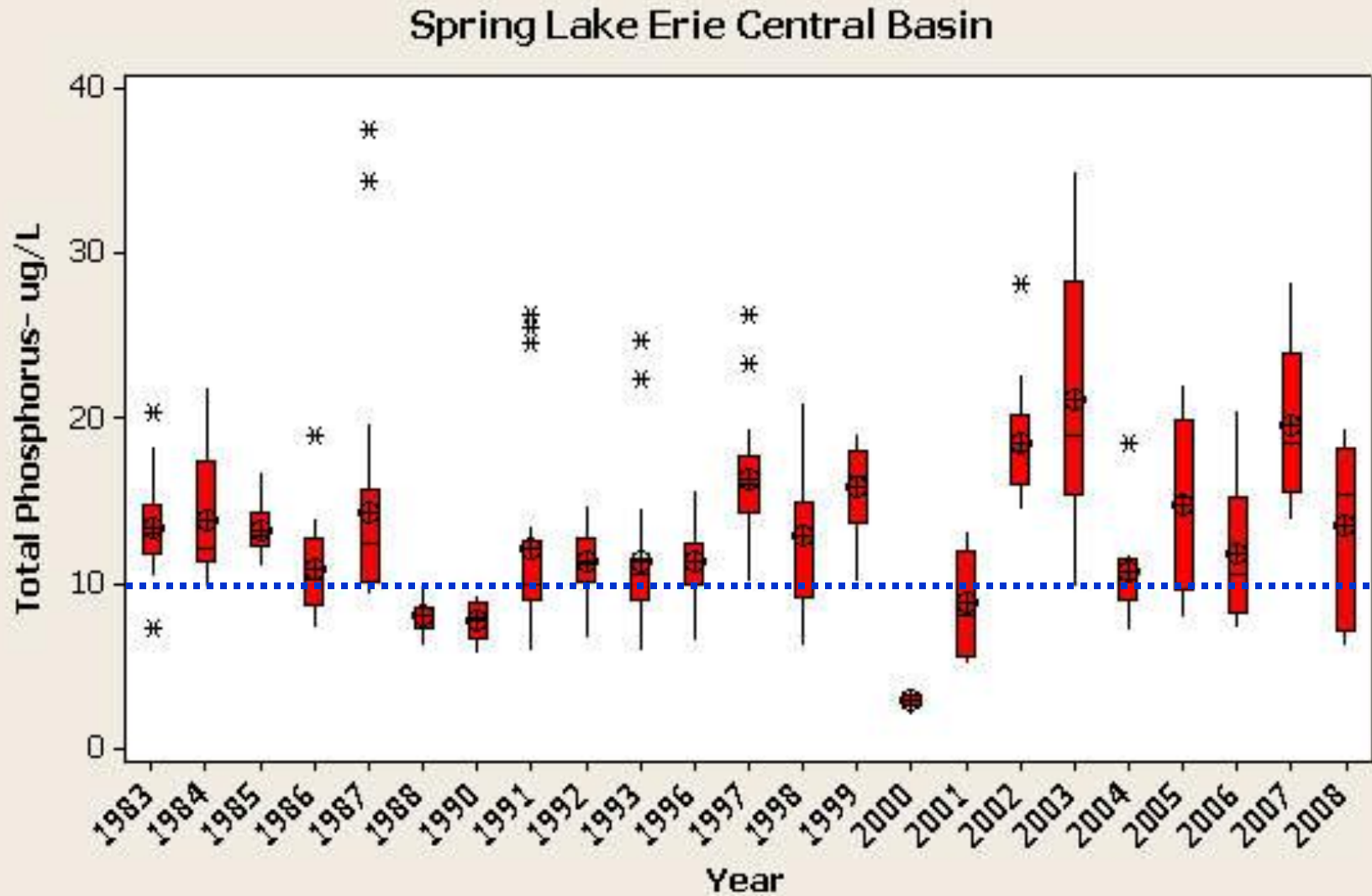
**Jeffery May**

Contractor to U.S. EPA Public Health Service

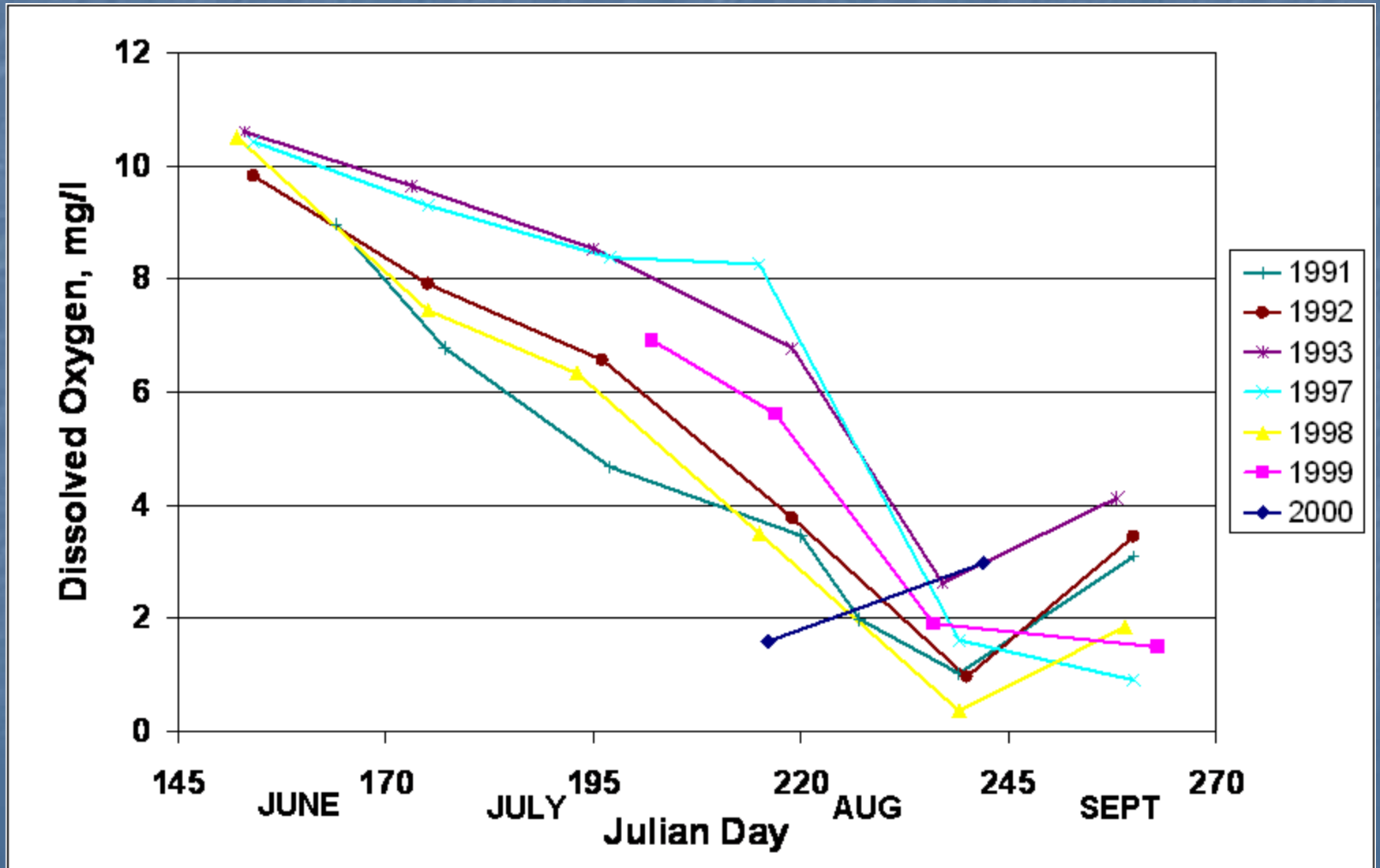
# Central Basin Sampling Stations



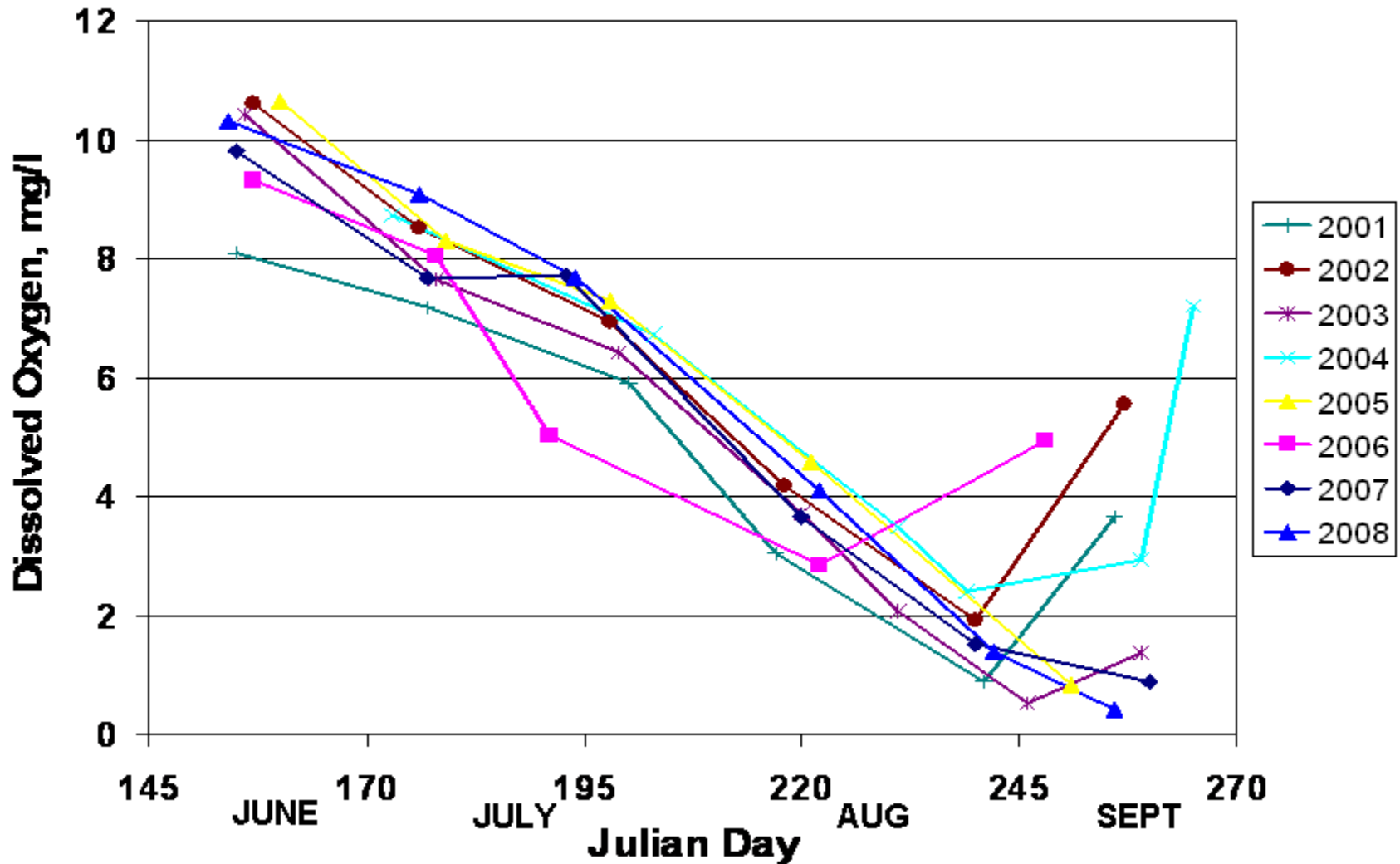
# Spring Lake Erie Central Basin



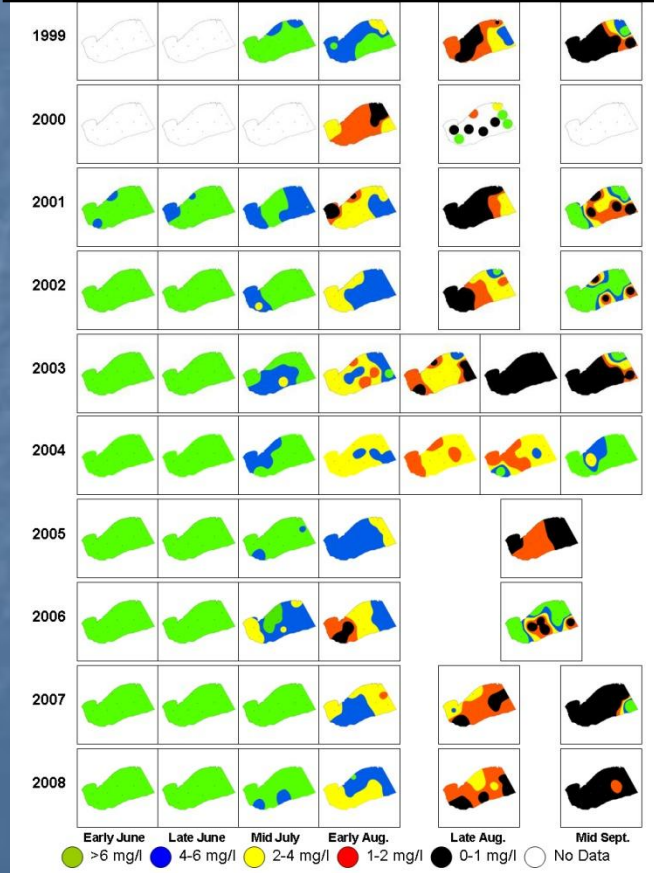
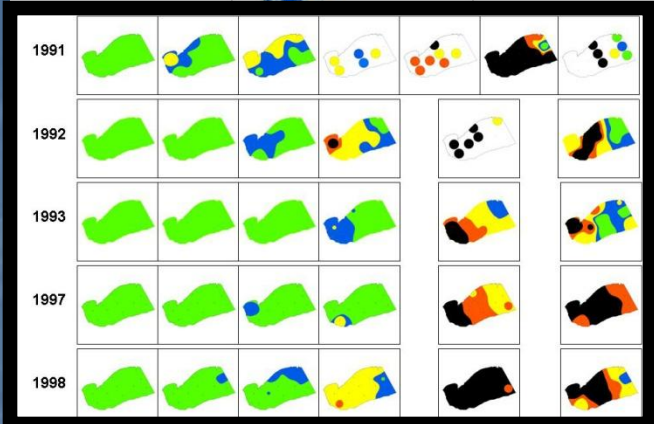
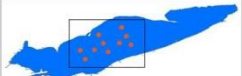
# Dissolved Oxygen Concentration Central Basin Hypolimnion



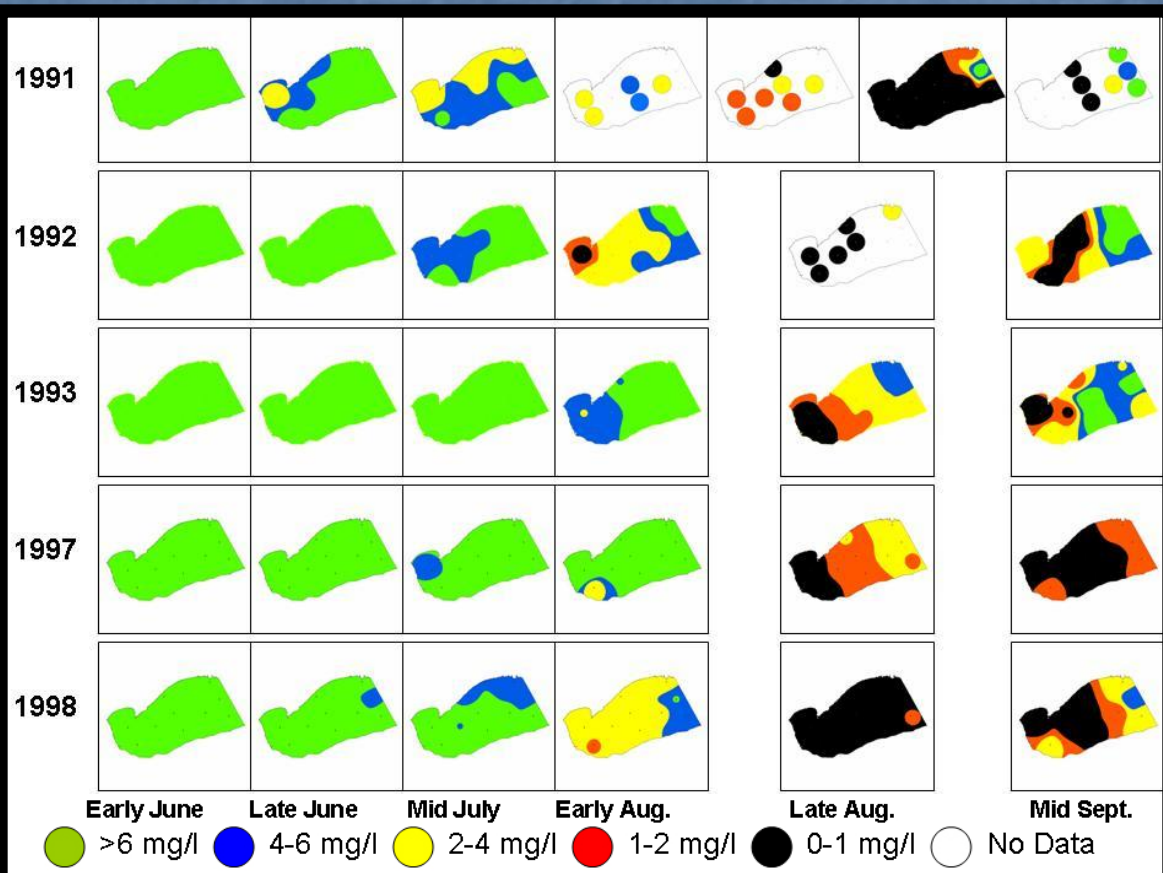
# Dissolved Oxygen Concentration Central Basin Hypolimnion



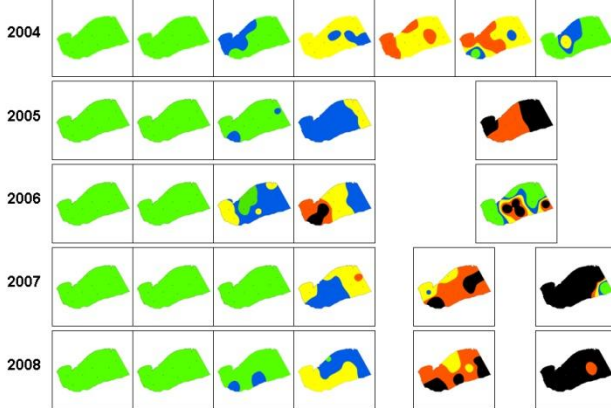
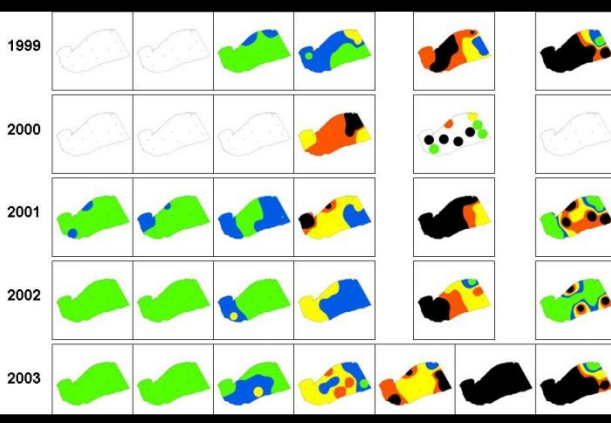
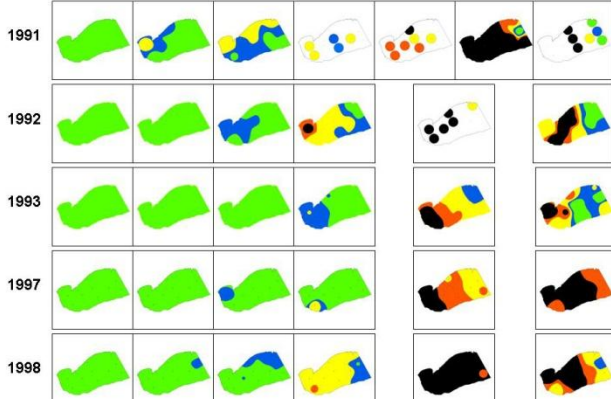
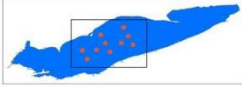
Lake Erie Central Basin Dissolved Oxygen Concentration



# D.O. Concentrations 1991-1998

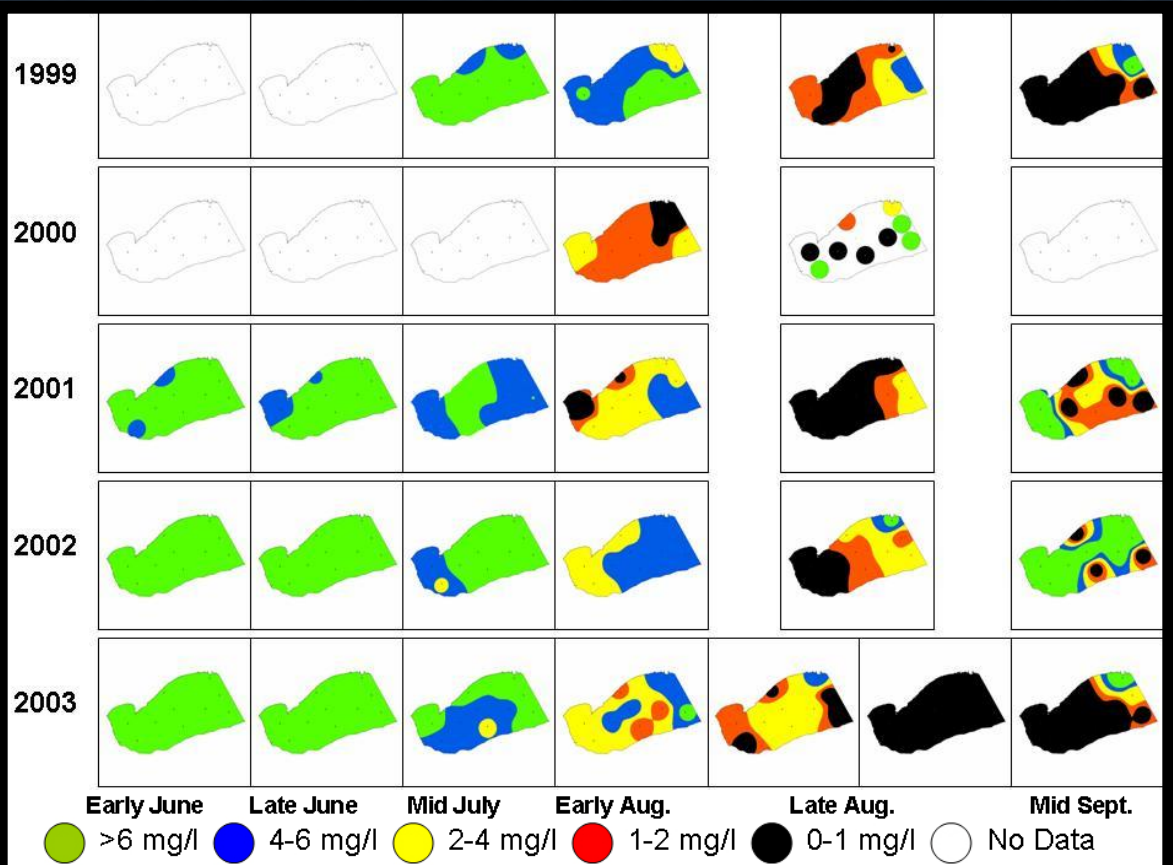


Lake Erie Central Basin Dissolved Oxygen Concentration

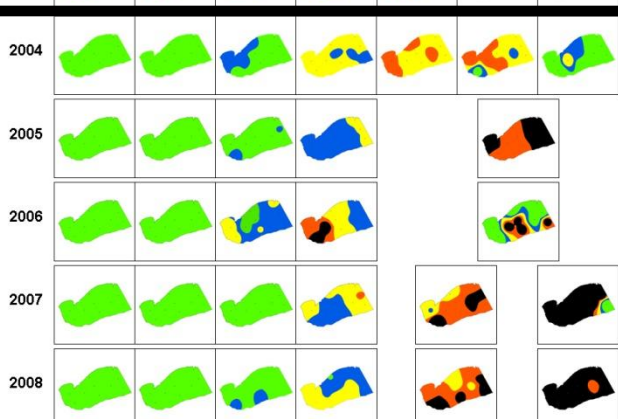
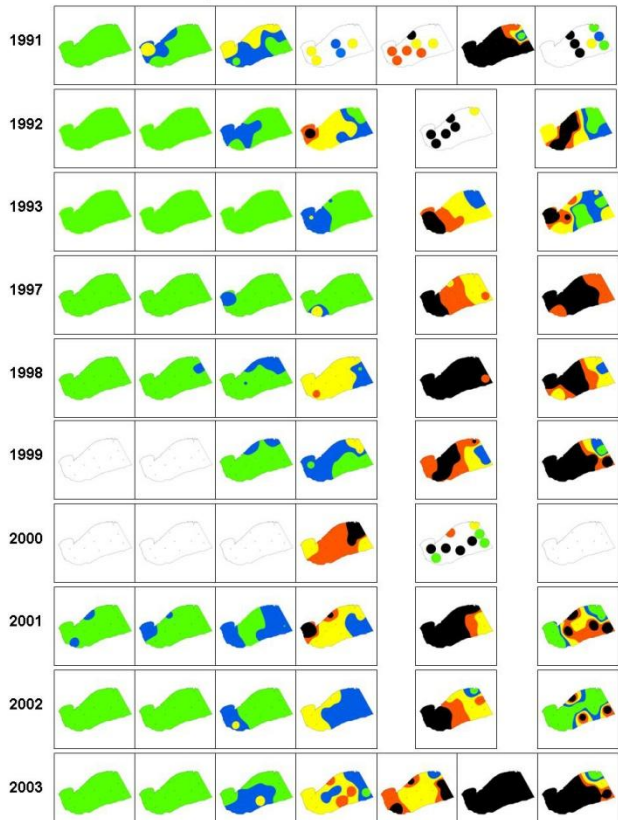
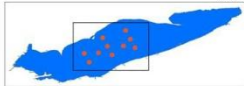


● >6 mg/l   
 ● 4-6 mg/l   
 ● 2-4 mg/l   
 ● 1-2 mg/l   
 ● 0-1 mg/l   
 ○ No Data

# D.O. Concentrations 1999-2003

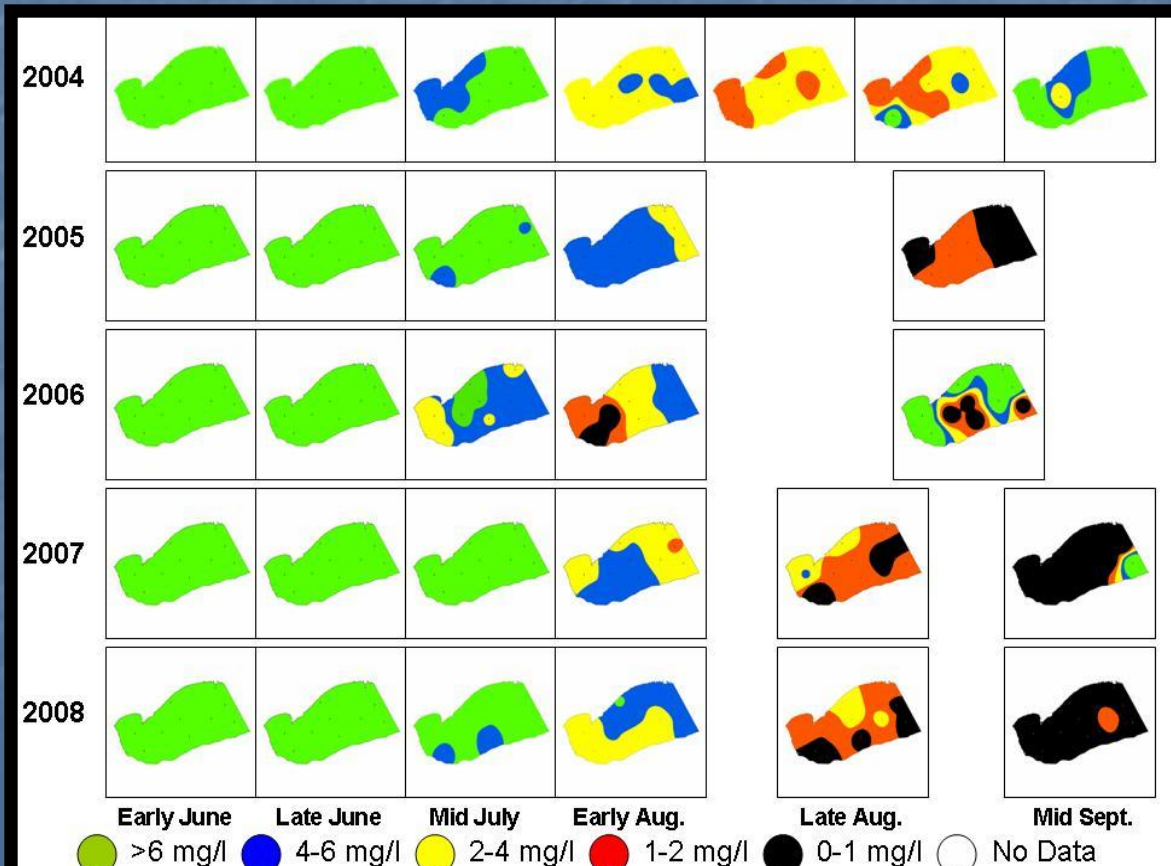


Lake Erie Central Basin Dissolved Oxygen Concentration



● >6 mg/l  
 ● 4-6 mg/l  
 ● 2-4 mg/l  
 ● 1-2 mg/l  
 ● 0-1 mg/l  
 ○ No Data

# D.O. Concentrations 2004-2008



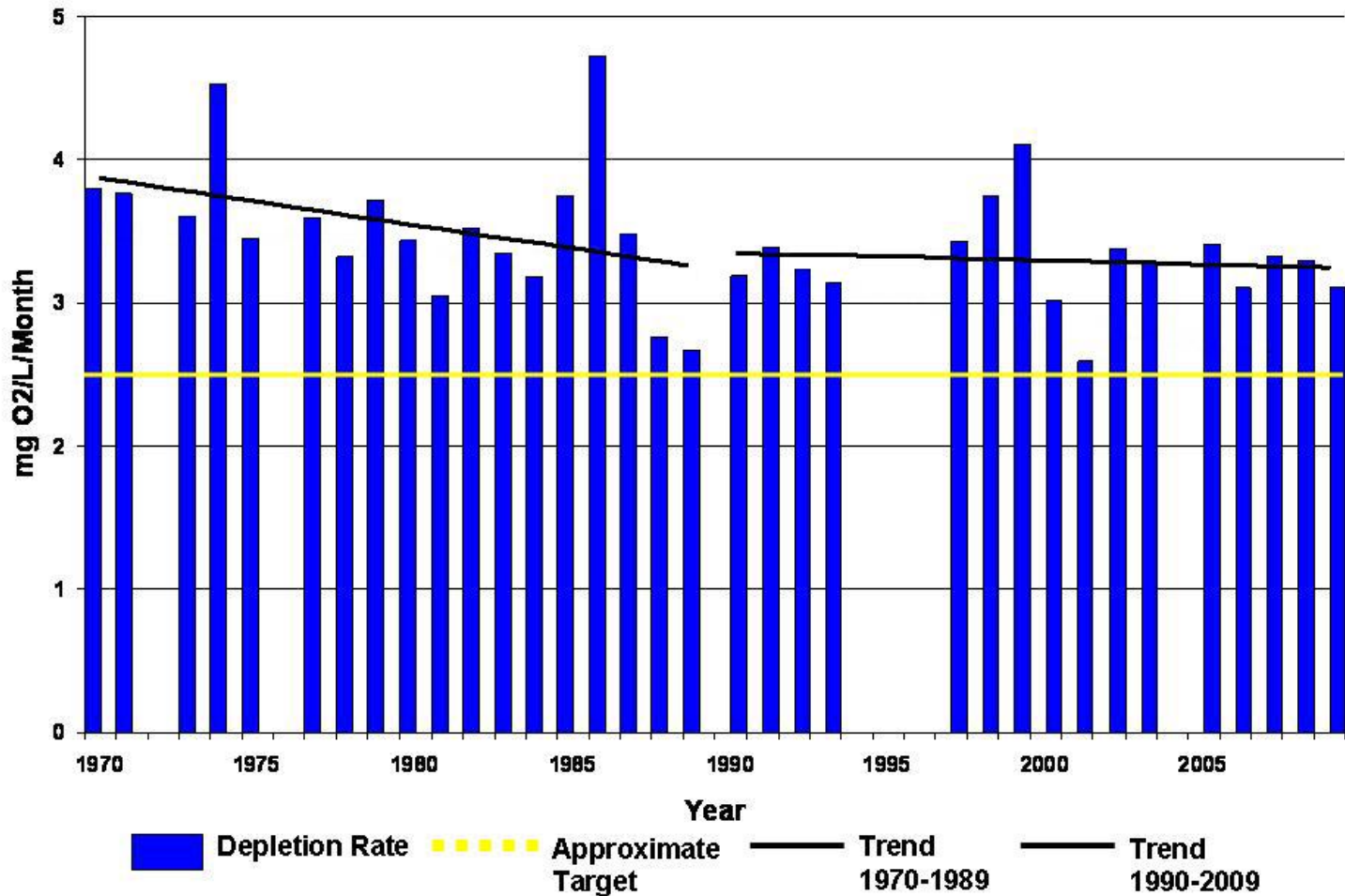


# Adjustments to D.O. Depletion Rate

- Vertical mixing across thermocline
- Temperature of hypolimnion
- Thickness of hypolimnion
- Seasonal Adjustment

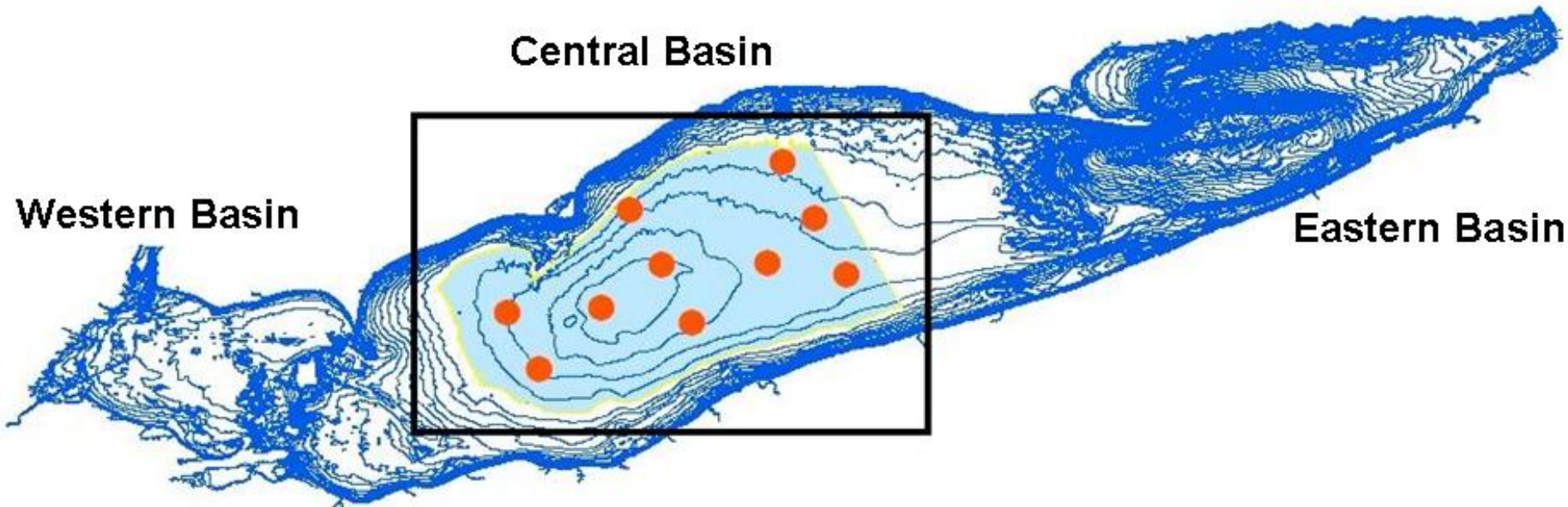
# Oxygen Depletion Rate in Central Basin

## Oxygen Depletion Rate in Lake Erie Central Basin



# GIS Analysis

- Defined study area
- More descriptive analysis



# Areal Extent of Anoxic Waters <1 mg/l

**Not Much  
Has  
Changed!**

