#### Little Cuyahoga River Balanced Growth Plan Meeting

Wednesday, May 29, 2013 10:30 a.m.

Goodyear Branch Library 60 Goodyear Boulevard Akron. OH 44305

#### **Agenda**

#### I. Welcome and Introductions

- Meeting Goals

#### II. Water Sentinel Program – Sierra Club

- Water Quality Results from the First Year of Volunteer Monitoring in the Little Cuyahoga River
- Next Steps

#### III. Northeast Ohio Planning Overview – Maia Peck, NEFCO

- A Brief Overview of the Various Planning Efforts Ongoing in the Region
- How the Little Cuyahoga River Balanced Growth Plan Fits with these Other Planning Efforts

#### IV. Balanced Growth Work Session - Determining Priority Areas

- Review of the Community Priorities Survey
- Update on Individual Meeting with Communities
- June Meeting Format and Content
- Review Major Intersections Map

#### V. Watershed Updates

- Watershed Updates from Attendees

#### VI. Next Meeting

## Little Cuyahoga River Balanced Growth Plan Meeting

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#### Meeting Summary

#### I. Welcome and Introductions

- The meeting began with a brief summary of previous work done by NEFCO for the Little Cuyahoga River Balanced Growth Program Plan.
- Introduction of all meeting attendees.

#### II. Water Sentinel Program – Sierra Club

- Amanda Keith and Jack O'Toole presented "Little Cuyahoga River Water Quality Data 2012/2013"
- The graphics for the presentation were prepared by Sierra Club's Clean Water Fellow Alex Litofsky.
- The goals of the program is to monitor 36 sites once every 3 months for chemical and visual parameters. The data is provided to NEFCO for inclusion in their Balanced Growth Plan. The results will also be used to increase public awareness at various events.
- Over the past year 12 volunteers, led by Lead Water Sentinels Mary Trent and Jack O'Toole, collected the data.
- Maps of the sampling locations were shown. Also a graph of the 2012 rainfall record in Akron was displayed.
- Graphs of the results for water temperature, conductivity, pH, and nitrate were shown. Ms. Keith pointed out how the limitations of some of their sampling equipment were displayed on their graphs. For example, the pH strips used by the volunteers only showed pH values up to 8. Therefore, 71 pH readings were shown as having pH values above 8, but they could not determine how much above a pH of 8 the readings were with their current equipment.
- The results for all the chemical and physical parameters were shown by subwatershed. Ms. Keith pointed out that none of the watersheds were shown to be significantly better or worse than the other watershed based on their first year's results.
- Ms. Keith cautioned that this is the first year of sampling for the Sierra Club and there is little data from previous monitoring efforts for comparison. Ms. Keith did compare their results with Ohio EPA's 1996 monitoring results for water temperature, conductivity, pH, and nitrate. 1996 was the last year Ohio EPA assessed the watershed.

- In general, Ohio EPA samples for nitrate were higher and conductivity lower than the results attained by the Sierra Club.
- The next steps for the program are to improve the monitoring, training, and data collection methods by the volunteers. They will also examine the usefulness of the current parameters and determine if there are more useful parameters to monitor.
- They will also be conducing side-by-side monitoring with Ohio EPA in 2013 at select sites.
- A question was asked about the subwatersheds used to display the sampling location and results. Eric Akin from NEFCO said the watershed boundaries Sierra Club used are based on the boundaries used by the United States Geological Survey (USGS). He said he will work with the Sierra Club improve the mapping of the sampling sites.

#### III. Northeast Ohio Planning Overview – Maia Peck, NEFCO

- Ms. Peck gave a brief presentation titled "Planning Efforts: Little Cuyahoga River Watershed."
- Ms. Peck said multiple planning efforts are taking place in the watershed utilizing various implementation tools.
- A goal of NEFCO's Balanced Growth Plan is to be consistent with these other planning efforts.
- Local planning is being done to various degrees in the watershed by cities, villages, and townships. This planning is the basis for local zoning, capital improvements, etc.
- The Northeast Ohio Sustainable Community Consortium (NEOSCC) is conducting planning on a twelve county basis to encourage more efficient development patterns and community investments. Ms. Peck urged attendees to get involved with this effort.
- NEOSCC has compiled and mapped various planning data including population trends, land use, and zoning. This data can be useful in developing balanced growth plans.
- Portage County is developing a visioning plan to create an image of Portage County for development.
- Portage County has also mapped priority areas for protection with potential measures and actions.
- The Summit County Plan provides basis for subdivision regulations and riparian setback protecting natural resources.
- NEFCO completed the Middle Cuyahoga River Watershed Action Plan in 2012. Many of the communities in the Little Cuyahoga River Watershed are also in the Middle Cuyahoga River basin. For these communities there needs to be consistency between the two watershed planning efforts.

### IV. Balanced Growth Work Session - Determining Priority Areas Community Priority Survey

- Eric Akin from NEFCO passed out the latest version of the Community Priority Survey for the group to review and fill out.
- Mr. Akin said the survey will be distributed at meetings and events to help determine the development and conservation priorities for watershed communities. The survey will eventually be available on-line at NEFCO's website.
- It was suggested that Google Forms has a good on-line survey tool NEFCO should consider.
- NEFCO will use the results from the survey to map priority areas for review by the communities.

#### Future Meetings

- Mr. Akin asked the meeting attendees what format or information would be useful for upcoming Little Cuyahoga River meetings.
- It was suggested the NEFCO staff provide a summary of completed balanced growth plans. Specifically how others have determined and mapped priority areas. Mr. Akin said he has tried to avoid using approaches developed by other entities because the balanced growth process is very flexible. He said he wants the communities of the Little Cuyahoga River watershed to use their own process to determine priority areas. However, if reviewing what others have already done will help with determining priority areas in the watershed, then NEFCO will provide summaries of two or three completed balanced growth plans at a future meeting.
- The group requested a site visit to the City of Akron's Little Cuyahoga River Restoration Project near the new Goodyear Headquarters. Mr. Akin said he would schedule a site visit for the next meeting.

#### V. Watershed Updates

- No updates from members.

#### VI. Next Meeting

- Site Visit: Tuesday, July 9, 2013, at 99 Seiberling Street, Akron, OH 44312 (parking lot next to the Little Cuyahoga River).
- Start Time: 1:30 p.m.

# Planning Efforts: Little Cuyahoga Watershed

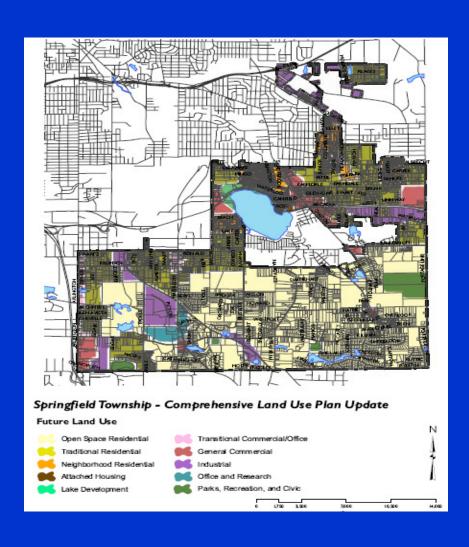
## Everybody's Planning

## Planning efforts

- Local
- Counties
- Local Communities
- Regional Efforts
- Watershed Efforts
- Various implementation tools land use, incentives, projects
- Need to be consistent

## Local

- Basis for zoning, capital improvements, etc.
- Local voice
- Various degrees of planning



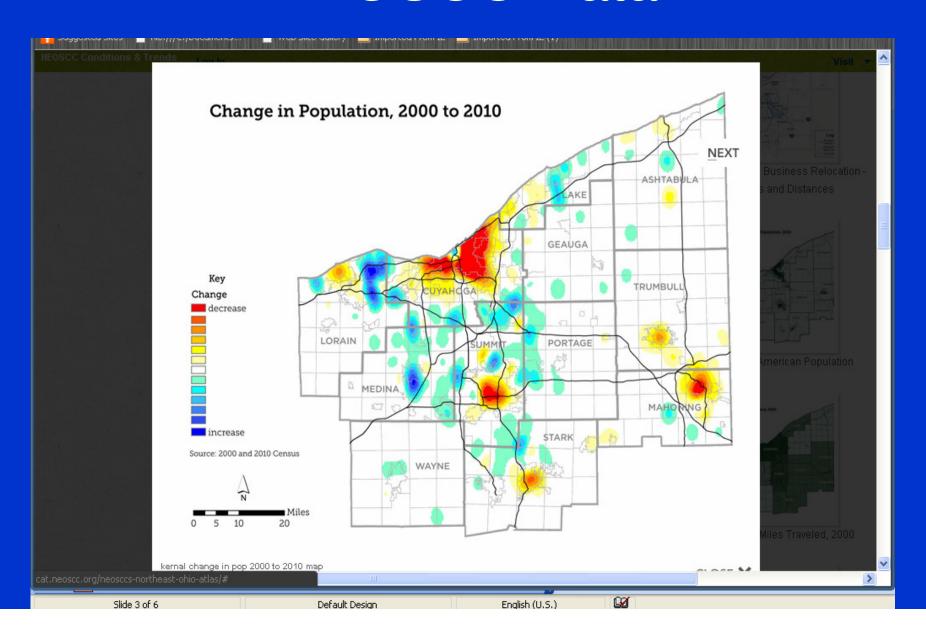
## NEOSCC

Purpose: Encourage more efficient development patterns and community investments in 12 counties.

- Scenario-development stage, workshops spring
- Later this spring/summer:
  - On-line development pattern survey/game
  - Two more workshops
  - Recommended strategies
  - Pilot projects
  - Vibrantneo.org
- PARTICIPATE, aware of results



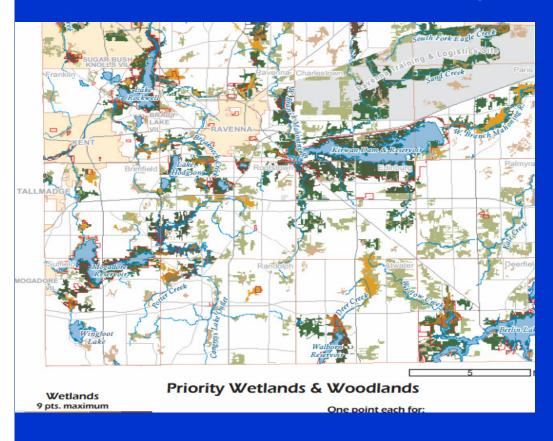
## **NEOSCC Data**



## Portage County Visioning

- Purpose to create an image of Portage County for development
  - Will result in a menu of voluntary measures that communities can take
  - No map yet, discussing general goals
  - Responsible party: Regional Planning Commission

# Portage Watershed Plan Priority Areas



- Identify priority areas for protection
- Identify potential measures, actions
- Considered many factors

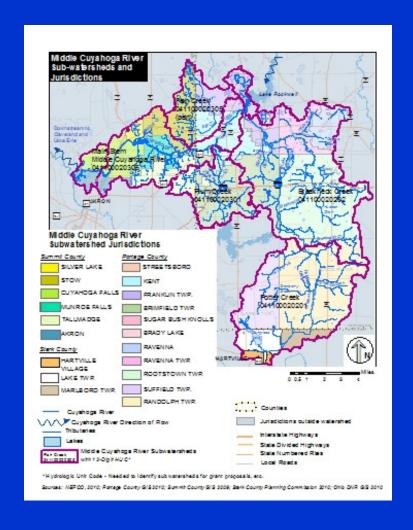
http://co.portage.oh.us/watershedmaps102006/5.%20Natural%20Resource%20Assessment.pdf

## Summit County Plan

- 2006 Plan provides basis for subdivision regulations and riparian setback protecting natural resources
- Emphasis on natural resources
- Stormwater best management practices receive additional points under "Smart Growth" for District 8 funding
- Will be updated after NEOSCC effort

# Middle Cuyahoga River Watershed Plan

- Endorsed, can be used for grants
- Identifies resources, impairments, actions
- Potential for overlap with Little Cuyahoga?
- http://www.nefcoplann ing.org/environmental



## Ohio Chapter Sierra Club Water Sentinel Program

## Little Cuyahoga River Water Quality Data 2012/2013

Presented by Amanda Keith and Jack O'Toole Contact: <a href="mailto:amanda.keith@sierraclub.org">amanda.keith@sierraclub.org</a>

\*\*Graphs developed by Clean Water, Fellow of Awesome\*\*
Alex Litofsky – Case Western Reserve Graduate 2013

## LCR Monitoring Project

- Goal 1: Monitor the Little Cuyahoga River and its tributaries for signs of pollution using visual and chemical parameters.
- Goal 2: Monitor 36 sites every three months to establish trends and better understand seasonal variation (sites chosen based on OEPA historical sampling).
- Goal 3: Partner with NEFCO and provide copies of data to help promote a Balanced Growth Initiative Plan.
- Goal 4: Increase public awareness through watershed festivals, cleanup events, and educational workshops.

## LCR Monitoring Team

 12 volunteers led by Lead Water Sentinels Mary Trent and Jack O'Toole

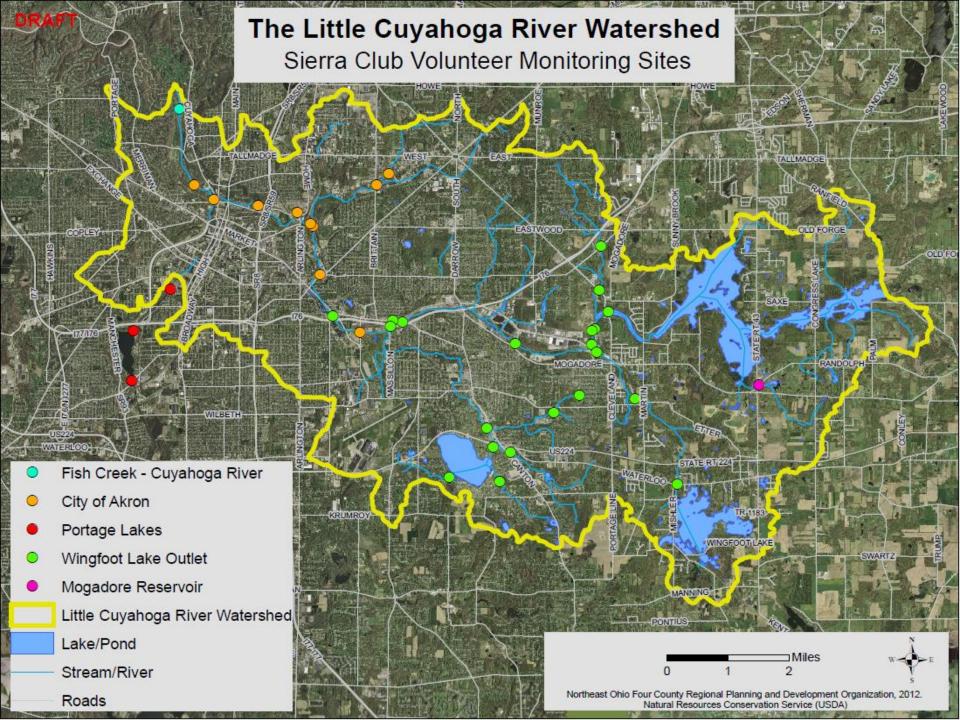
#### Chemical Parameters:

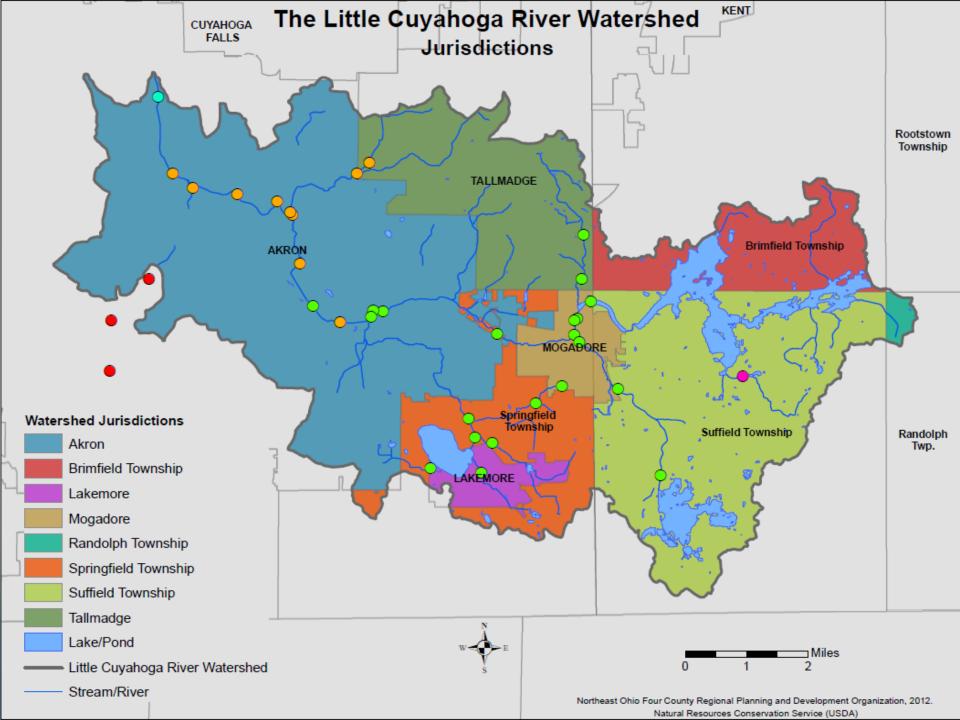
- Conductivity/TDS/Salinity
- Water Temperature
- Nitrate/Nitrite
- pH, Alkalinity, Hardness, and Chlorine

### Visual Parameters:

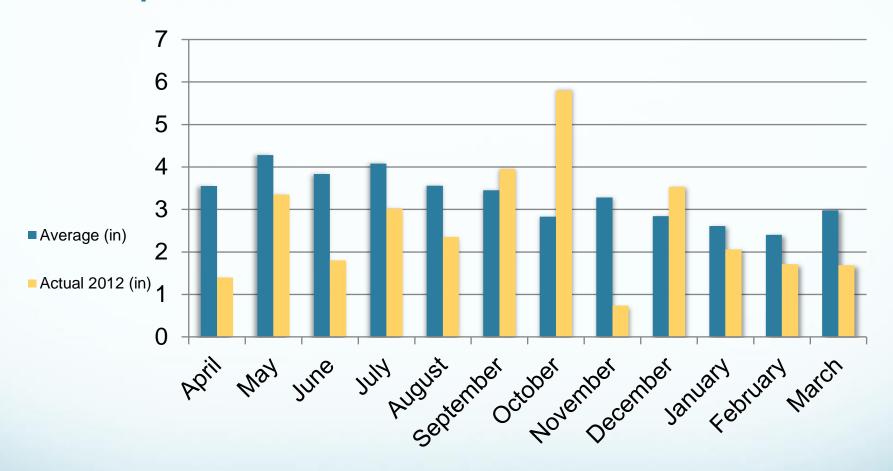
- Flow Rate
- Turbidity
- 48 Hr Rainfall
- General Observations







## Precipitation Records for Akron



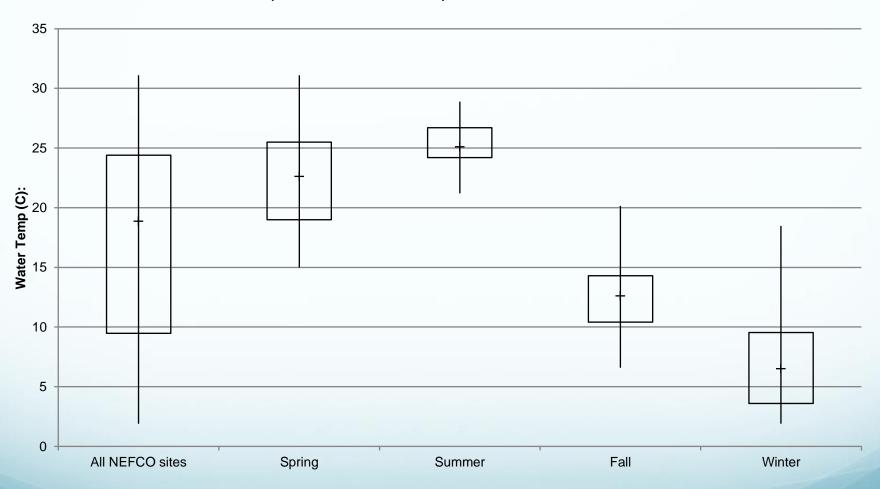
#### Sources:

Average Precipitation: <a href="https://www.weather.com">www.weather.com</a>

Actual 2012 Precipitation: wunderground.com/history

## **NEFCO Sites and Water Temperature**

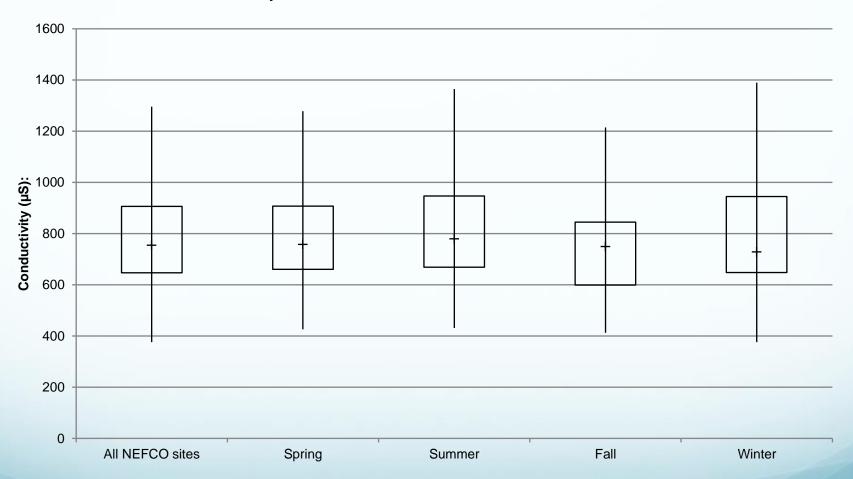
Water Temperature at time sample collected



Seasonal Variation in Water Temperature Present

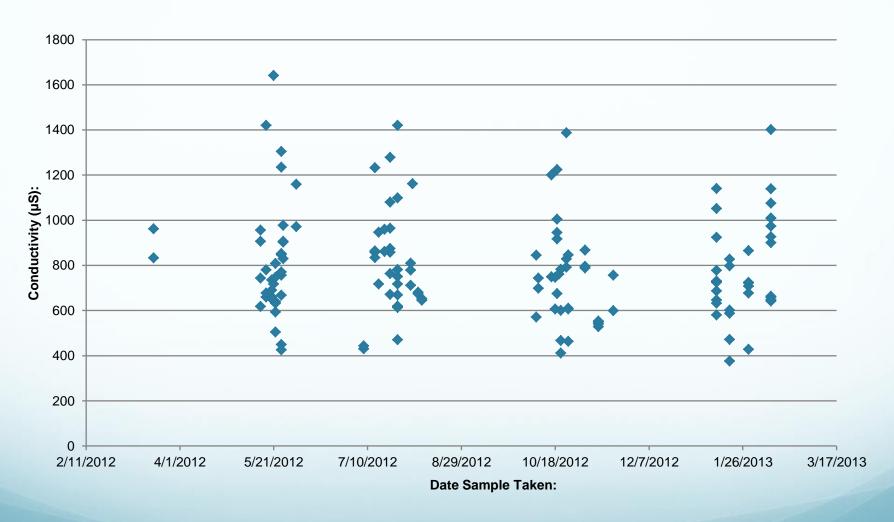
## **NEFCO Sites and Conductivity**

Conductivity indicates amount of metals and salt



Seasonal Variation in Conductivity Less Present

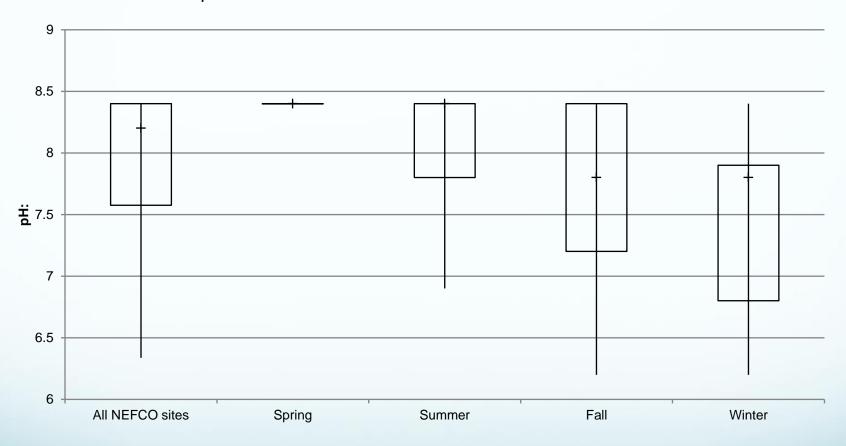
## **NEFCO Sites and Conductivity**



Individual Points show potential "Outliers" across Seasons

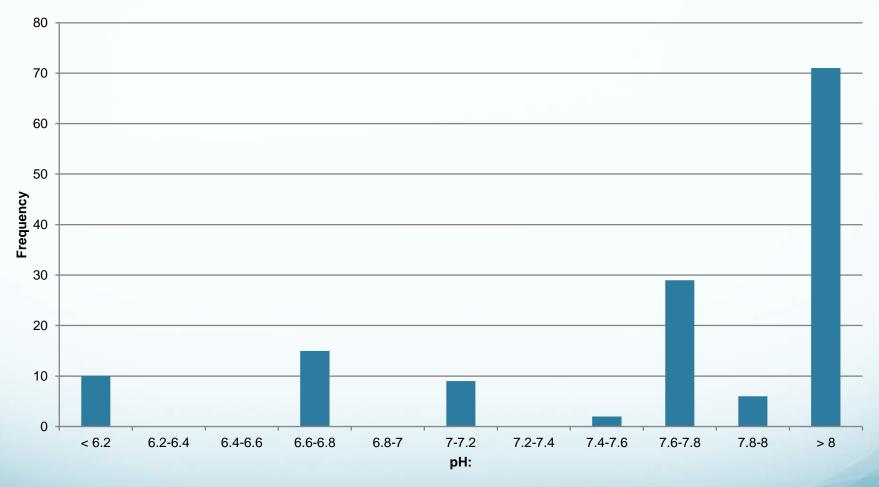
## NEFCO Sites and pH

pH indicates acidic or basic conditions



- All NEFCO sites, pH range: 7.5 8.5
- Spring: 8.4 with little variation
- Fall and Winter: both have large variation

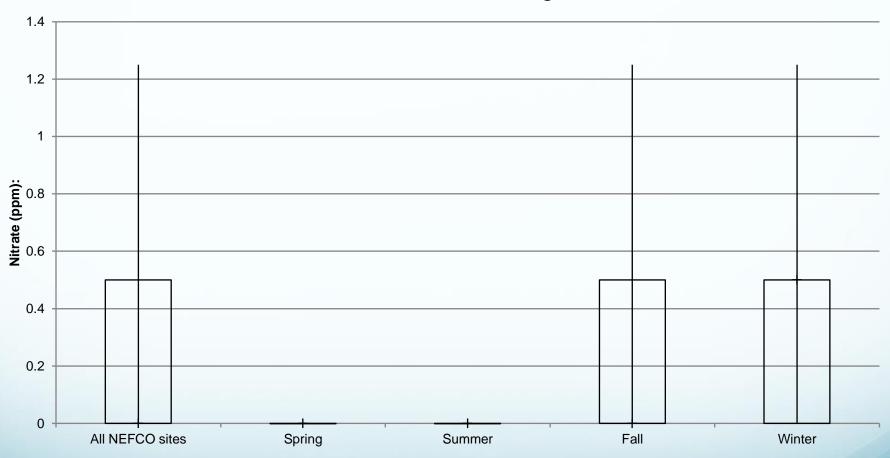
## NEFCO Sites and pH Frequency



pH higher than 8.0: 71 times (basic conditions) pH lower than 6.2: 10 times (acidic conditions)

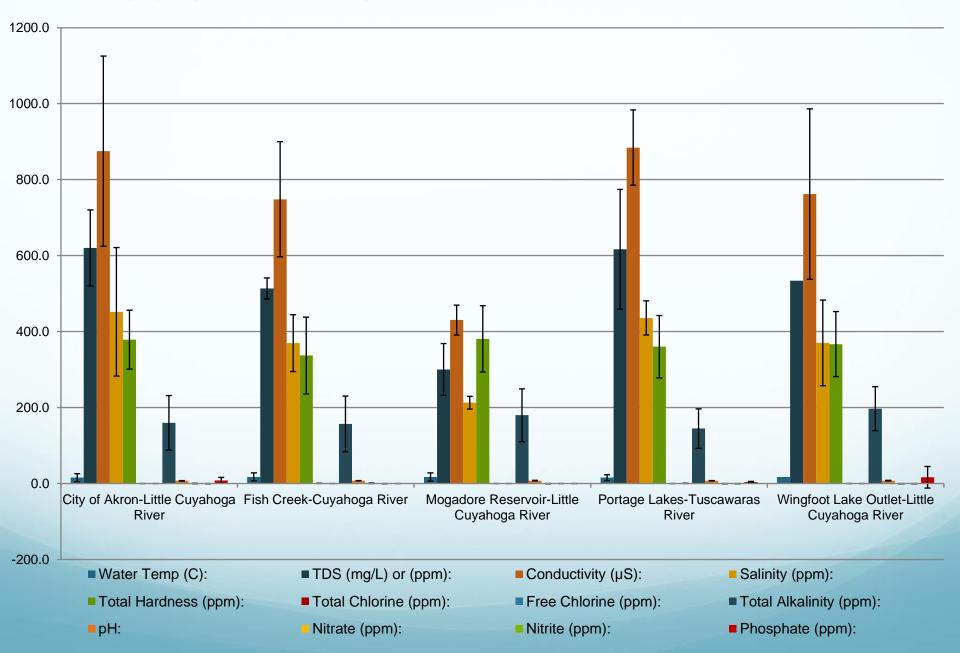
## **NEFCO Sites and Nitrate**

Nitrate indicates level of nutrients, sewage, fertilizer, and/or runoff

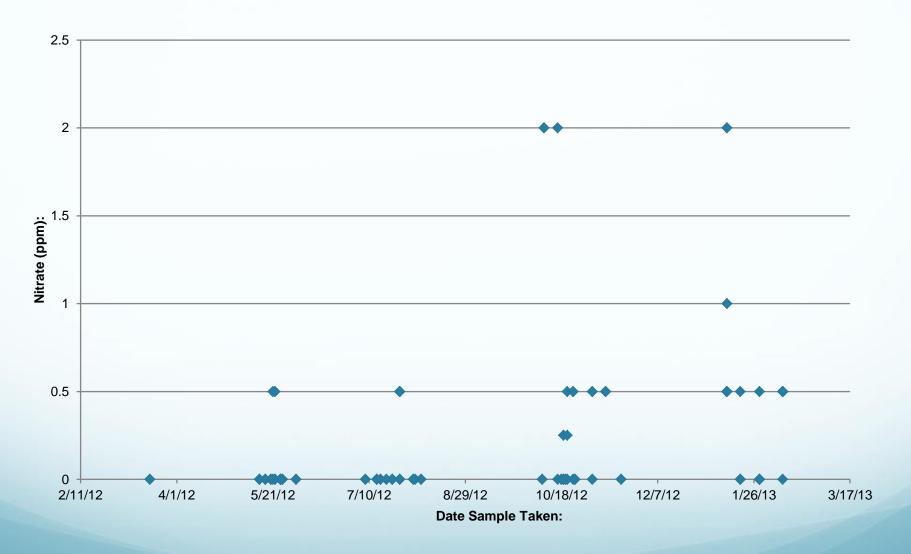


Spring/Summer Nitrate Averages: 0 Fall/Winter Nitrate Averages: 0 – 0.5

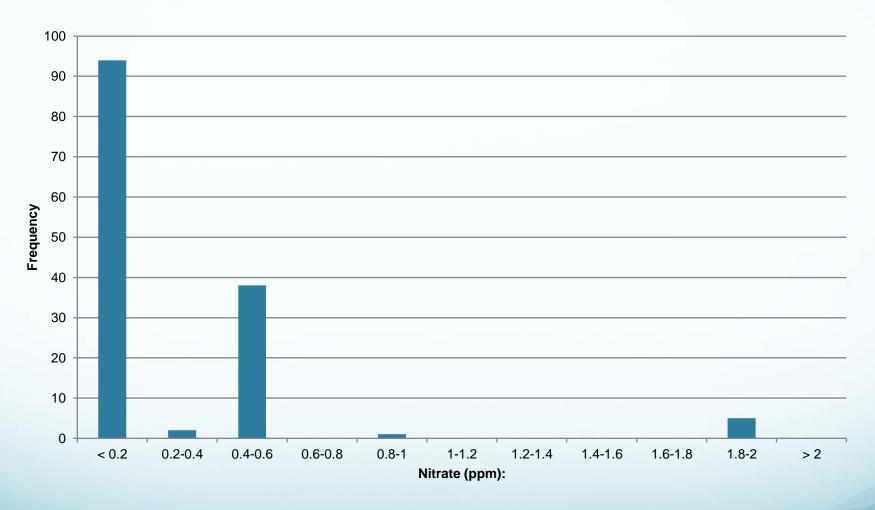
### **NEFCO Sites with Standard Deviation**



## **NEFCO** sites and Nitrate

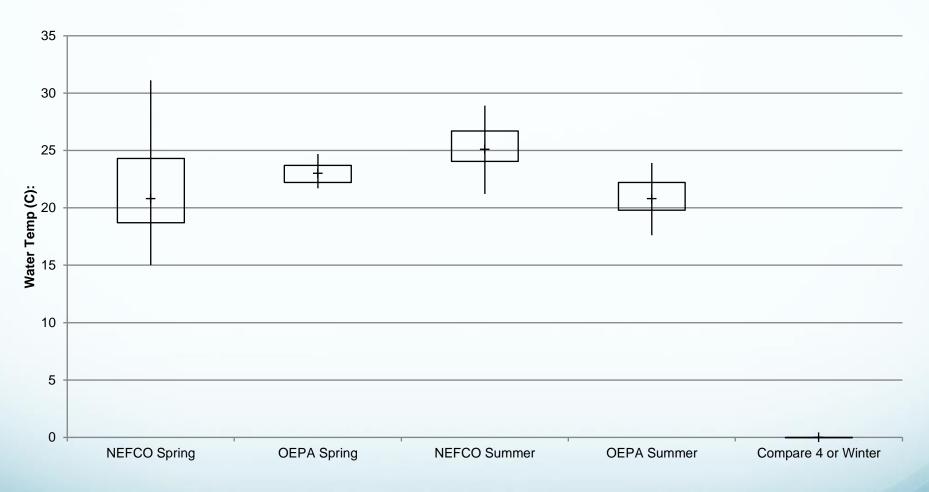


## **NEFCO** sites and Nitrate

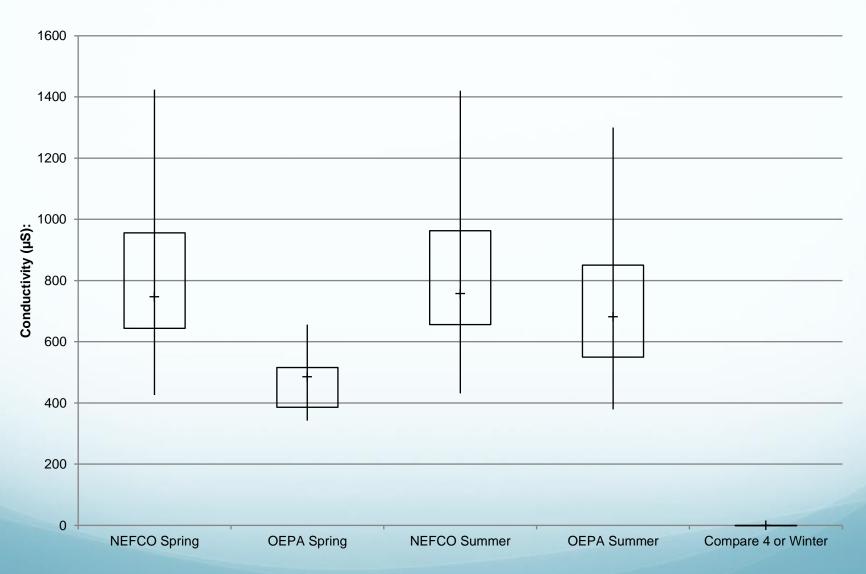


Nitrate less than 0.2: 94 times

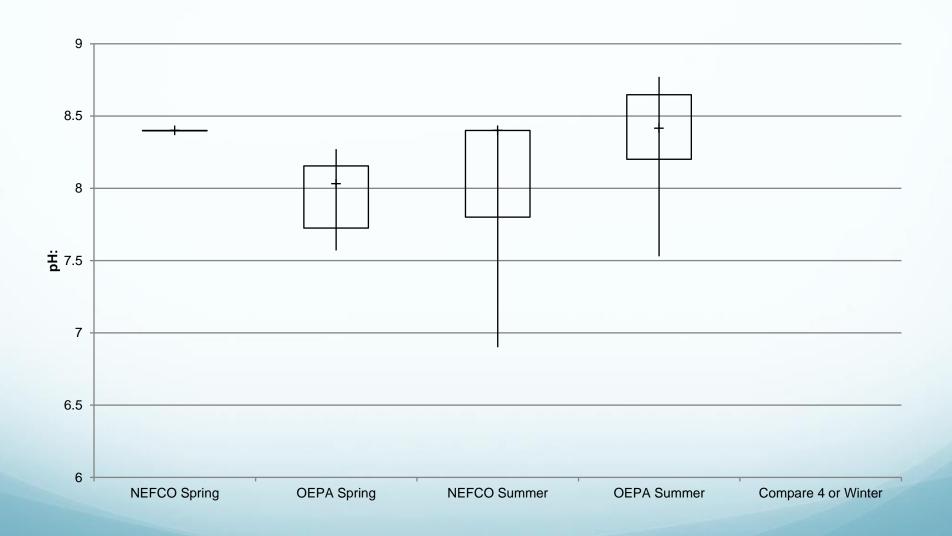
# OEPA and NEFCO Comparisons (1996 vs. 2013/2013): Water Temperature & Spring and Summer



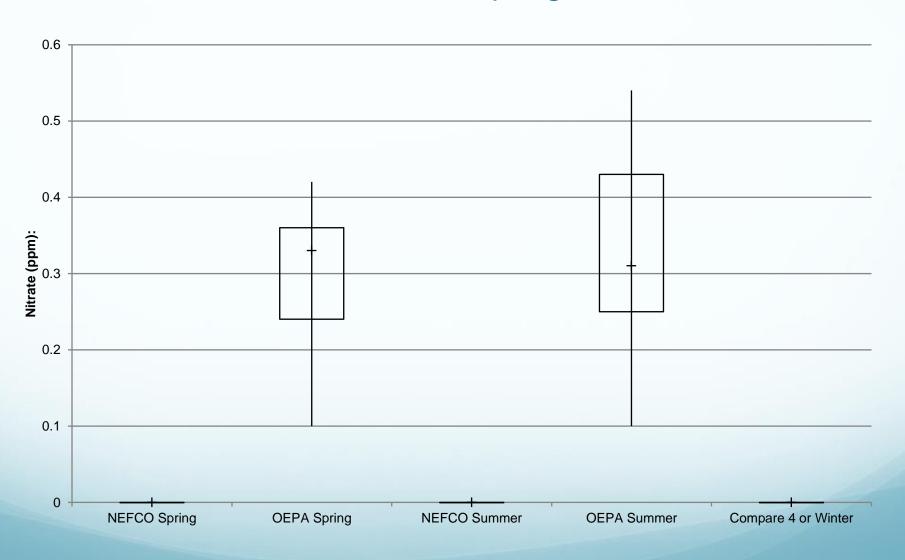
# OEPA and NEFCO Comparisons (1996 vs. 2013/2013): Conductivity & Spring and Summer



# OEPA and NEFCO Comparisons (1996 vs. 2013/2013): pH & Spring and Summer



## OEPA and NEFCO Comparisons (1996 vs. 2013/2013): Nitrate & Spring and Summer



## Room for Improvement and Growth

- Goal 1: Improve monitoring, training, and data collection methods
- Goal 2: Split-test monitoring with OEPA <sup>©</sup>
- Goal 3: Examine usefulness of current parameters and research to determine if there are better parameters to monitor
- Goal 4: Increase number of monitors...

Looking at you!

#### Little Cuyahoga River Balanced Growth Plan Restoration Site Visit

Tuesday, July 9, 2013 1:30 p.m.

#### **Attendance Sheet**

#### <u>Name</u>

1. Phil Hillman

2. Amanda Keith

3. Bob Bobel

4. Jack O'Toole

5. Michelle DiFiore

6. Heather Parker

7. Andrea Irland

8. Jason Von Houten

9. Dan Joseph

10. Maia Peck

11. Eric Akin

12. Phyllis Jividen

13. Joel Bingham

14. Sarah Ryzner

#### Representing

Ohio Division of Wildlife

Sierra Club

National Parks Service/WRLC

Sierra Club City of Akron City of Akron

National Parks Service/RTCA

**ODNR** Division of Wildlife

City of Akron NEFCO

NEFCO AMATS

EnviroScience Inc.

WRLC