

NLRS Policy Working Group Meeting

February 1, 2023

10:00 AM - NOON

1. Desk mics are located around the room and are ON.
2. If you connect your laptop to the IDOA internet, mute your computer speakers to avoid alert notifications during the meeting.
3. When you speak, use your desk mic. Hold button until light turns green.
4. Mute phones.
5. Restrooms are in hallway near welcome table.

IDOA internet

Network: guestnet

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ILLINOIS
NUTRIENT LOSS
REDUCTION STRATEGY

NLRS Partnership Workshop

Tuesday, November 1, 2022



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Roles:

Moderator: *Joan Cox, Illinois Extension*

Technology Assistance: *Layne Knoche, Illinois Extension*

Meeting minutes: *Rachel Curry, Illinois Extension*

Facility set up and Welcome Table: *Heather Wilkins, Illinois Dept. of Agriculture*



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Attendance

In person attendance: If you haven't already done so, sign in at the welcome table during the break.



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Agenda

10:00
(10 min.)

Welcome & Opening Comments

Michael Woods, Illinois Department of Agriculture

Trevor Sample, Illinois Environmental Protection Agency

Q & A

10:10
(10 min.)

Hypoxia Task Force Update

Trevor Sample, Illinois Environmental Protection Agency

Q & A

10:20
(10 min.)

NLRS Biennial Report Update

Joan Cox, University of Illinois Extension

Q & A

10:30
(20 min.)

IFB Nutrient Stewardship Grant Program Overview and 2023 Forecast

Raelynn Parmely, Illinois Farm Bureau

Q & A

10:50

10-minute BREAK

Continued...



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Agenda

11:00
(20 min.)

Partner Updates
Q & A

11:20
(40 min.)

Open Discussion

Note: The Nov. 1, 2022 NLRs Workshop/PWG meeting evaluation comments included suggestions to **discuss success stories** and to brainstorm innovations to **policy recommendations** and **on-the ground actions that may increase scale/pace of progress.**

NOON

Adjourn



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Opening Comments

Trevor Sample, Illinois EPA



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NLRS Steering Committee Overview



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NLRS Steering Committee

- Illinois Environmental Protection Agency
 - Sanjay Sofat- Chief, Bureau of Water
 - Chris Davis- Manager, Watershed Management Section
 - Trevor Sample- Agency Coordinator, Nutrient Loss Reduction Strategy
- Illinois Department of Agriculture
 - Dr. Michael Woods- Division Manager of Natural Resources
 - Brian Rennecker- Chief, Bureau of Land and Water Resources
- University of Illinois Extension
 - Joan Cox- Extension Outreach Associate, NLRS Outreach Associate - Program/Data Manager
 - Layne Knoche- NLRS Outreach Associate - Stormwater & Green Infrastructure
 - Rachel Curry- NLRS Watershed Outreach Associate
 - Dr. Travis Burke- Assistant Dean, Agriculture/Agri-business
 - Dr. Shibu Kar- Assistant Dean, Natural Resources, Environment, and Energy



Steering Committee Responsibilities

- Set meetings for Policy Working Group and all subgroups and committees
 - Develop agenda, secure locations, coordinate speakers and presentations, member and guest invitations, facilitate meetings, document minutes
- Collect and manage metrics data and partner contributions
 - Water measures and science assessment data
 - Partners' Resources & Outreach data
 - Ag, Point Source, and Stormwater spreadsheets
 - Land & Facilities data
 - Ag and stormwater state and federal cost-share data and narratives
 - Point source data and narratives
 - All sectors non-government organizations data and narratives
 - Scenarios progress tracking



Steering Committee Responsibilities

- Facilitate and coordinate Annual NLRs Conference/Workshop
- Develop Biennial Report & Executive Summary
- Coordinate Science Team conservation practice evaluation process
- Illinois EPA takes lead on Point Source and Urban Stormwater Sectors
- Illinois Department of Agriculture takes lead on Ag Sector



Agency Programs and Funding

- **Illinois EPA**

- U of I Extension NLRs meeting facilitation and reporting
- U of I Extension Watershed Outreach Associates
- U of I Science Team
- United State Geological Survey Continuous Monitoring Network
- Science Assessment updates (watershed and water quality studies)
- 319 Nonpoint Source Grant Program
- Green Infrastructure Grant Opportunity Program
- 604(b) Grant Program
- Total Maximum Daily Load studies
- NPDES point source permitting and compliance
- Urban Stormwater MS4 permits



Agency Programs and Funding

- **Illinois Department of Agriculture**

- Partners for Conservation cost-share program
- Fall Covers for Spring Savings Cover Crop Premium Discount Program
- Ag Climate Smart Initiative
- Conservation Planners



Nutrient Loss Reduction Strategy Websites

- Illinois EPA website:
- <http://go.illinois.edu/NLRS>

- Illinois Extension websites:
- go.illinois.edu/NLRSPodcast
- go.illinois.edu/NLRS_blog



Hypoxia Task Force Update

December 14, 2022 Washington D.C.

Nutrient Loss Reduction Strategy
Policy Working Group Meeting
February 1, 2023

Trevor Sample
Illinois EPA



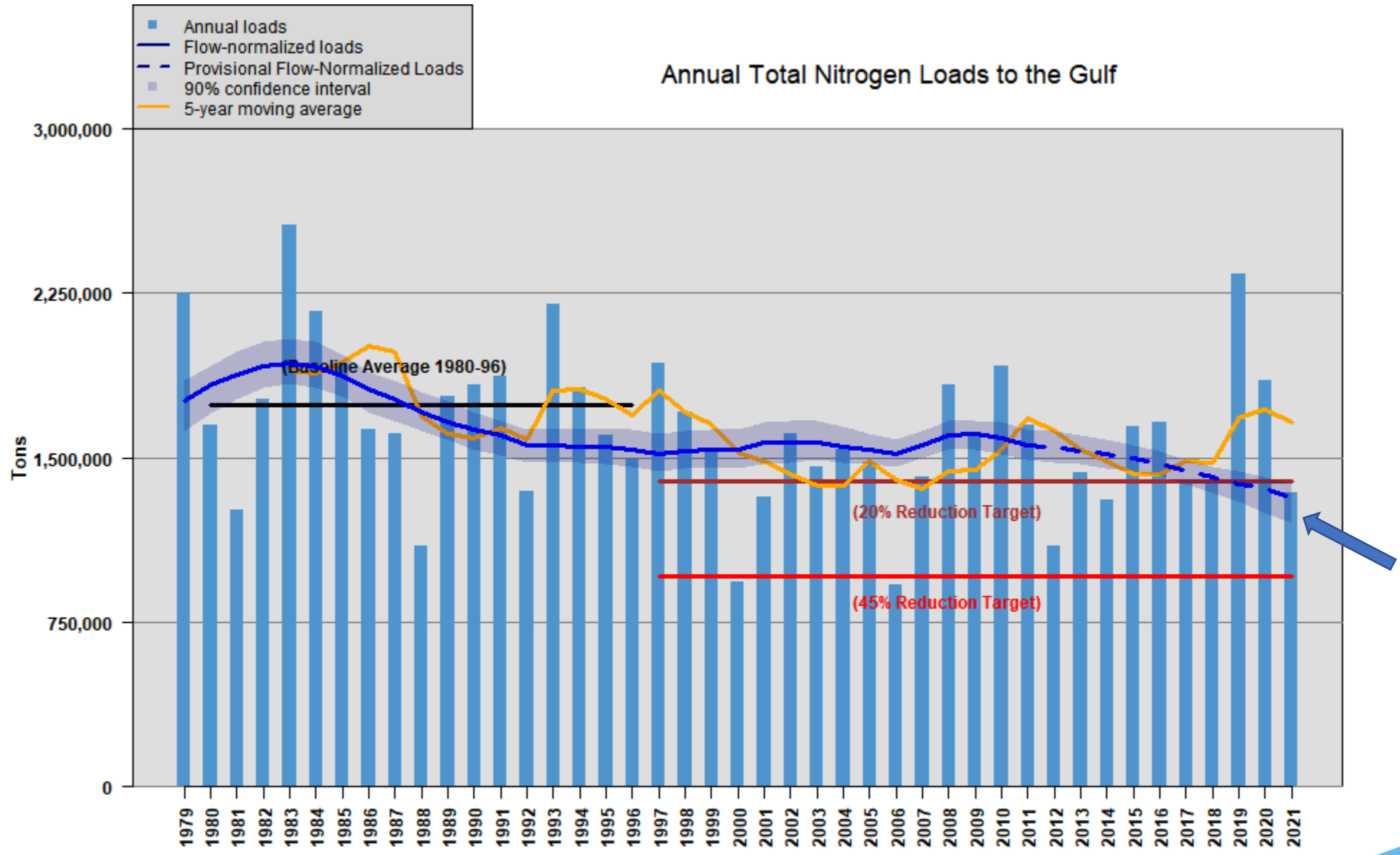
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In-Person Hypoxia Task Force Session

- Radhika Fox, USEPA and Mike Naig, Iowa Dept of Agriculture gave opening remarks
- Discussion on Climate Impacts on Nutrient Loading
- Sub-basin committees and Land Grant University Support through Bipartisan Infrastructure Law
- Workgroup Updates
 - Communications, WQ Trends, Research, Point Source
- Tracking Metrics/Progress and Public Reporting
 - Gulf Size
 - **USGS Water Quality Trends**
 - 2023 Hypoxia Task Force Report to Congress



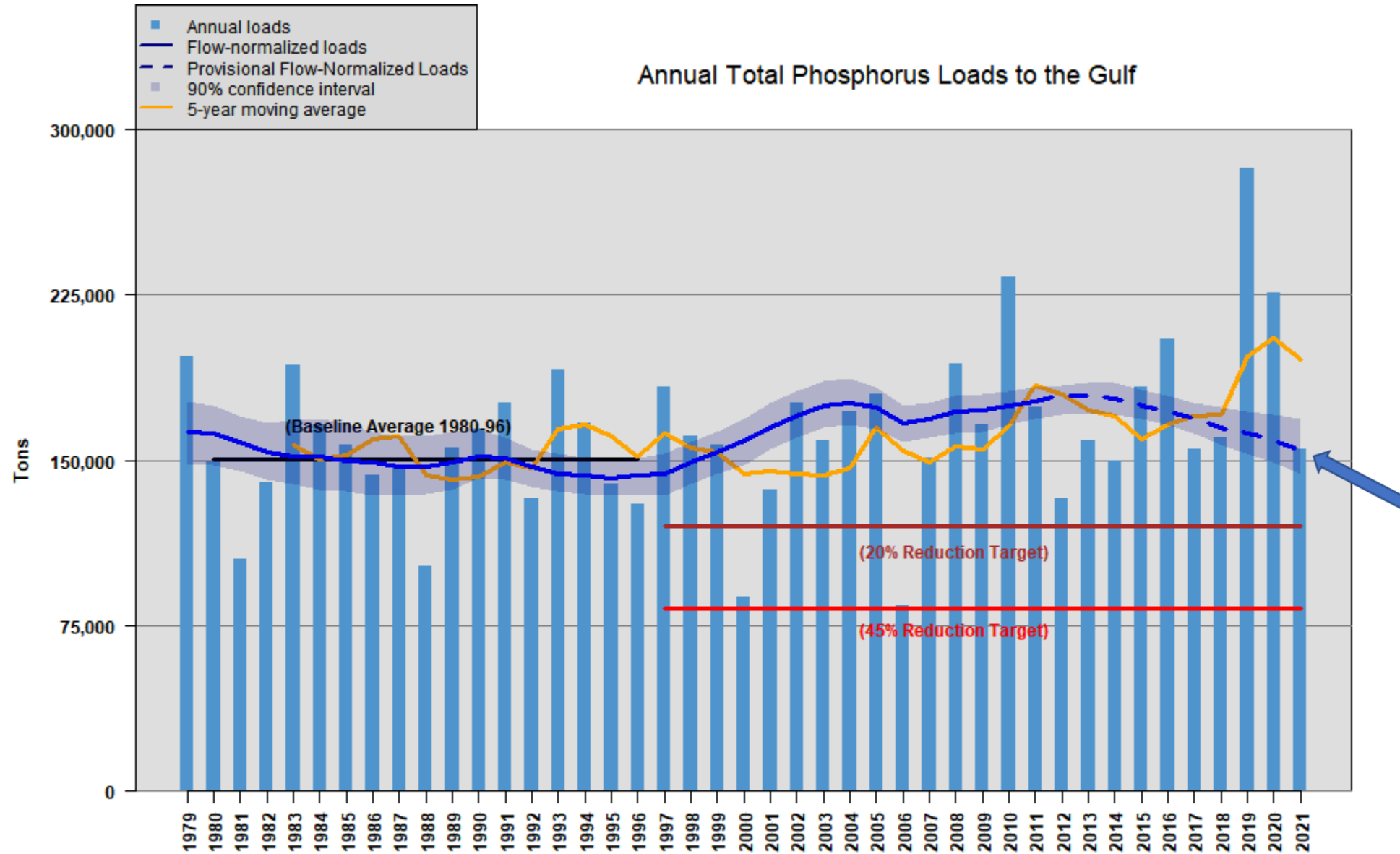
Annual Total Nitrogen Loads to the Gulf



Trend start period	Trend end year	Trend, in percent change	Lower 90% confidence interval	Upper 90% confidence interval	Trend attributed to changes in streamflow	Trend attributed to other changes in the watershed
1980-1996	2021	-23%	-32%	-19%	3%	-26%



Annual Total Phosphorus Loads to the Gulf



Trend start period	Trend end year	Trend, in percent change	Lower 90% confidence interval	Upper 90% confidence interval	Trend attributed to changes in streamflow	Trend attributed to other changes in the watershed
1980-1996	2021	3%	-7%	15%	2%	1%

In-Person and Virtual Public Meeting

- Federal Hypoxia Task Force Support
 - Bipartisan Infrastructure Law and Inflation Reduction Act Funding
 - America the Beautiful Initiative 30/2030
- State Gulf Hypoxia Program Overview
 - Each state shared an overview of their workplan
 - 1st year funding \$965,000
 - 2-4 years \$748,333
 - 5th year \$965,000
 - Most state projects had similar themes
 - Implementation, WQ monitoring, Strategy updates and reporting
- Public Comment Session



Illinois Year 1 Projects

- Priority Watershed Outreach and Watershed Planning
 - University of Illinois Watershed Outreach Associates working in priority watersheds
- Continuous Nutrient Monitoring Network
 - USGS water quality data collection and analysis; nutrient load calculations
- Fall Covers for Spring Savings Program
 - IDoA cover crop insurance premium discount program. Will provide up to an additional 40,000 acres of enrollment to the current 100,000 acres.
- Nitrate Groundwater Monitoring
 - IDoA laboratory nitrate analyzer to resume nitrate concentration analysis in groundwater monitoring network
- 2023 Biennial Report
 - University of Illinois Extension staff will develop the NLRs 2023 Biennial Report



Illinois Year 2 Projects

- Continuous Nutrient Monitoring Network
- Fall Covers for Spring Savings Program
- 4R Fertilizer Retailer Survey
 - Adopt survey methodology currently used in Iowa to collect fertilizer application data and best practices from fertilizer retailers throughout the state
- Implementation of Watershed-Based Plans, Total Maximum Daily Loads in NLRs Priority watersheds
 - Provide grants to implement WBPs or TMDLs with an emphasis on source water protection benefiting disadvantaged communities.



Hypoxia Task Force Newsletter

- HTF Quarterly Newsletter
- The *Mississippi River/Gulf of Mexico Hypoxia Task Force Newsletter* is a quarterly publication produced by EPA's Office of Water in partnership with the Hypoxia Task Force. The newsletter provides a snapshot of recent state activities, federal agency activities, publications, and resources.
- If you have items you would like to be included, send to Trevor Sample or Michael Woods.
 - End of Year reports, annual meetings, etc.



HTF Point Source Report

- Point Source Report will be released later in 2023
- Highlights point source nutrient loads by HTF states, quantifies point source facilities with nutrient monitoring requirements and permit limits based on 2020 data.



Hypoxia Task Force Report to Congress

- HTF Report to Congress will be released early 2023
- This is the Task Force's fourth report to Congress
- Provides overview of HTF goals and accomplishments
- Includes summaries of states' contributions and activities



Thank You!

Illinois Hypoxia Task Force Representatives

Trevor Sample trevor.sample@illinois.gov

Michael Woods michael.woods@illinois.gov



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Biennial Report Status

Joan Cox, University of Illinois Extension



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2021 CH 8: Adaptive Management & Measuring Progress

	MORE RESEARCH ON...
✓	Nitrate-nitrogen and total phosphorus variability in sub-basins
✓	Watersheds with increased loads to determine causal factors other than increased streamflow
✓	The role of sediment and streambank erosion in phosphorus loading (legacy phosphorus)
✓	Influence of legacy nitrate loading from groundwater in the Rock River watershed
✓	Improved methods/sources for tracking implementation progress measured against scenarios
✓	Impact of climate change and its influence on water yields and nutrient loads.



2021 CH 8: Adaptive Management & Measuring Progress

	MORE RESEARCH ON...
✓	Nitrate-nitrogen and total phosphorus variability in sub-basins
✓	Watersheds that have exhibited increases in loads to determine causal factors other than increased streamflow
✓	The role of sediment and streambank erosion in phosphorus loading (legacy phosphorus)
✓	Influence of legacy nitrate loading from groundwater in the Rock River watershed
✓	Improved methods/sources for tracking implementation progress measured against scenarios
✓	Impact of climate change and its influence on water yields and nutrient loads.

Chapter 3: Science Assessment Update

Nitrate-Nitrogen and Total Phosphorus River Loads

U.S. Geological Survey Continuous Loadings Network *by Dr. Tim Hodson*

Nitrate - Nitrogen Loads in the Illinois Portion of the Rock River Basin *by Gregory F. Mclsaac*

Summary of Spatial and Temporal Variation in Phosphorus Loads in the Illinois River *by Gregory F. Mclsaac*

Quantifying statewide phosphorus from streambank erosion to inform effective nutrient loss reduction strategy *by Dr. Andrew Margenot*

U.S. Geological Survey Illinois River Basin Integrated Water Science *by Jim Dunker*

Science Team Proposed Practice Decisions



2021 CH 8: Adaptive Management & Measuring Progress

	MORE RESEARCH ON...
✓	Nitrate-nitrogen and total phosphorus variability in sub-basins
✓	Watersheds that have exhibited increases in loads to determine causal factors other than increased streamflow
✓	The role of sediment and streambank erosion in phosphorus loading (legacy phosphorus)
✓	Influence of legacy nitrate loading from groundwater in the Rock River watershed
✓	Methods/sources for tracking implementation progress measured against scenarios
✓	Impact of climate change and its influence on water yields and nutrient loads.



CH 3: Science Assessment

Science Team – Evaluation of Conservation Practices
added Water and Sediment Control Basins

CH 4: Agriculture

CropGrower – statewide buffer analysis
Illinois Fertilizer and Chemical Association – 4R Metrics Survey

CH 6: Stormwater

Green Infrastructure Inventory

Partner Updates Appendix

NGO research, programs, projects and funding



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Chapter 4: Agricultural Sector

Implementation Report

Resource Measures

Staff Resources

Funding Resources

Outreach Measures

Outreach Activities

Land and Facilities Measures

US Department of Agriculture

Farm Service Agency

Conservation Reserve Program (CRP)

Cover Crops

Natural Resources Conservation Service

Environmental Quality Incentive Program (EQIP)

Conservation Stewardship Program (CSP)

Agriculture Conservation Easement Program (includes WREP)

Mississippi River Basin Healthy Watersheds Initiative

National Water Quality Initiative

Regional Conservation Partnership Program

Upper Macoupin Creek Watershed Partnership

Illinois Headwaters Conservation Partnership

Otter Lake Source Water Protection

MRB-Big Bend Enhancing Water-Soil-Habitat Quality Project

Driftless Area Habitat for the Wild & Rare Phase 2

Working Lands, Water, and Wildlife Partnership



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Chapter 4: Agricultural Sector (cont.)

US Department of Agriculture (con't)

National Agricultural Statistics Service

Illinois NLRS Survey

Nitrogen Management

Nitrification Inhibitors

Fertilizer Application Strategies

Phosphorus Management

Cover Crops

Tiled Acres

General Knowledge

Illinois Fertilizer & Chemical Association

4R Metrics Survey

CropGrower

Identification of Agricultural In-field Buffers using Satellite Imagery

Illinois Department of Natural Resources (*program list tentative*)

Conservation Reserve Enhancement Program (CREP)

Illinois Department of Agriculture (*program list tentative*)

Partners for Conservation Program

Illinois Soil Conservation Transect Survey

Streambank Stabilization and Restoration Program

Fall Covers for Spring Savings

Illinois Environmental Protection Agency (*program list tentative*)

Section 319 Non-Point Source Program

University of Illinois (*program list tentative*)

Woodchip Bioreactors

Illinois Extension Watershed Outreach Associates



Chapter 4: Agricultural Sector (cont.)

Current Programs and Projects Supporting Nutrient Loss Reduction Goals

Non-Governmental Organization Programs and Projects (*program list tentative*)

Program Project names and 2-3 sentence summaries which include a list of partners (if applicable). Up to 3 pages for each partner in the Partner Updates Appendix.



Chapter 4: Agricultural Sector (cont.)

Metric Collection

Future Strategic Actions

Agricultural Water Quality Partnership Forum

Conservation Capacity Building Initiative

IDOA's RCPP

Climate-Smart Partnership

Kankakee-Iroquois Bi-state RCPP



Chapter 5: Point Source Sector

Implementation Report
Resource Measures Staff Resources Funding Resources
Outreach Measures Outreach Activities Topics
Land and Facilities Measures (<i>program list tentative</i>) Progress Across Illinois Statewide Total Phosphorus Reductions for 2019-2020 Total Phosphorus Reductions from Individual Dischargers Nutrient Reduction Special Conditions Nutrient Assessment Reduction Plans Statewide Total Nitrogen Reductions for 2019-2020 Method for Calculating Point Source Nutrient Loads NPDES Permits Issued with Nutrient Criteria Watershed Approach <i>Watershed group names and 2-3 sentence summaries which include a list of partners (if applicable). Up to 3 pages for each partner in the Partner Updates Appendix</i>



Chapter 5: Point Source Sector (con't)

Current Programs and Projects Supporting Nutrient Loss Reduction Goals

(program list tentative)

Agriculture and Point Source Sector Partnership: Testing Best Management Practices

Total Maximum Daily Loads

Concentrated Animal Feeding Operations

State Livestock Management Facilities Act

State Revolving Fund

Future Strategic Actions *(program list tentative)*

Unsewered Communities Grant Program



Chapter 6: Stormwater Sector

Implementation Report

Resource Measures

Staff Resources

Funding Resources

Outreach Measures

Outreach Activities

Topics

Land and Facilities Measures (*program list tentative*)

Illinois Environmental Protection Agency Section 319 Grant Program

GIGO

Green Infrastructure Inventory

MS4 Report Analysis

Data Considerations

Findings

Metric Establishment and Collection



Chapter 6: Stormwater Sector (con't)

Current Programs and Projects Supporting Nutrient Loss Reduction Goals

Program Project names and 2-3 sentence summaries which include a list of partners (if applicable). Up to 3 pages for each partner in the Partner Updates Appendix.

Future Strategic Actions

Urban Stormwater Working Group



Chapter 7: Working Group Accomplishments

Policy Working Group
Communication Subgroup
Agriculture Water Quality Partnership Forum
Agriculture Water Quality Partnership Forum Technical Subgroup
Urban Stormwater Working Group
Nutrient Monitoring Council
Performance Benchmark Committee



Chapter 8: Adaptive Management & Measuring Progress

Water Quality Goals

Reporting challenges

Agricultural Implementation Progress

Point Source Implementation Progress

Watershed-Based Plans

Looking Ahead (*list tentative*)

Future Strategy Considerations

Potential Future Resource Needs

Partners for Conservation

Soil and Water Conservation Districts

Wastewater Treatment Facility Upgrades

Stormwater Practice Adoption

Water Quality Monitoring

U.S. Geological Survey

Illinois EPA

Illinois NLRs Meetings and Reporting



Draft Review

Policy Working Group:

Thank you for submitting the requested information for the Biennial Report. Below are links to the chapter drafts.

INSTRUCTIONS: We ask that you review the areas that are applicable to your sector -- especially the sections that you contributed.

You'll find two versions: word doc and pdf. You may use either one. For the word doc, please track your changes so we can see them. Otherwise, we may not be able to capture your suggestions. A lower tech alternative is to print out the pdf, make handwritten comments, and scan it. You'll have 2 weeks for review. RETURN IT BY _____.

Chapters 1 and 2 (Executive Summary and Introduction) will be written post-feedback

Chapter 3: Science Assessment Update - [Here](#).

Chapter 4: Agricultural Sector - [Here](#).

Chapter 5: Point Source Sector - [Here](#).

Chapter 6: Stormwater Sector - [Here](#).

Chapter 7: Working Group Accomplishments - [Here](#).

Chapter 8: Adaptive Management - [Here](#).



Timeline

Draft Reviews	Due Date
CH 3, 4, 5, 7, 8 first draft due to PWG	8-Jun
Comments due back to Extension	21-Jun
Final edits before design	6-Jul
CH 6 first draft due to USWG	13-Jul
Comments due back to Extension	19-Jul
Final edits before design	21-Jul
CH 1 and 2 first drafts to Steering	24-Jul
Final edits before design	7-Aug
Design	
Text and photos (and alt-text) to graphic designer	6-Jul – Aug 7
Design work	25-Sept
Final Stretch	
Notify directors of incoming draft report	2-Oct
Notify print shop of incoming printing job	12-Oct
Copy editing and final changes	19-Oct
Hand to Directors	19-Oct
Directors hand in review	27-Oct
Online version with Appendices completed	20-Nov
Due to printer	1-Dec
Print version copies available	6-Dec



Questions?



Joan Cox, Illinois Extension
jesarey@Illinois.edu



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IFB Nutrient Stewardship Grant Program Overview and 2023 Forecast

Raelynn Parmely, Illinois Farm Bureau



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IFB Nutrient Stewardship Grant Program Overview and 2023 Forecast

Raelynn Parmely, Illinois Farm Bureau (IFB)
Feb. 1, 2023





IFB Nutrient Stewardship Efforts:

Four Priority Areas



1. Education and outreach to farmers, landowners, general public

- Direct/in-person
- Other information-sharing efforts

2. Supporting research of best management practices to reduce nutrient loss from agricultural fields

- Financial commitments and letters of support
- Other types of support

3. Supporting farmer implementation efforts across the state

- Projects with implementation as primary goal
- Also, Edge of Field Practices Partnership

4. Demonstrating progress toward long-term goals of the Illinois NLRS

- Numerous reporting efforts at different levels of organization, to various audiences



Nutrient Stewardship Grant Program:

Background & History

- For nearly 10 years, IFB Board of Directors have set “environmental action” as a priority
- Nutrient Stewardship Grant Program established in 2015, with projects beginning in 2016
 - Approved by the Board → one way for IFB to support nutrient stewardship activities
 - Developed with Board and member feedback
- Supporting local projects → a top goal
 - County Farm Bureau (CFB)/farmer member-driven projects
 - Reflect local information needs and priorities
 - Benefits to farmer members
- Significance of partnerships in supporting projects
 - IFB partners on all projects
 - Community partners, industry partners, others

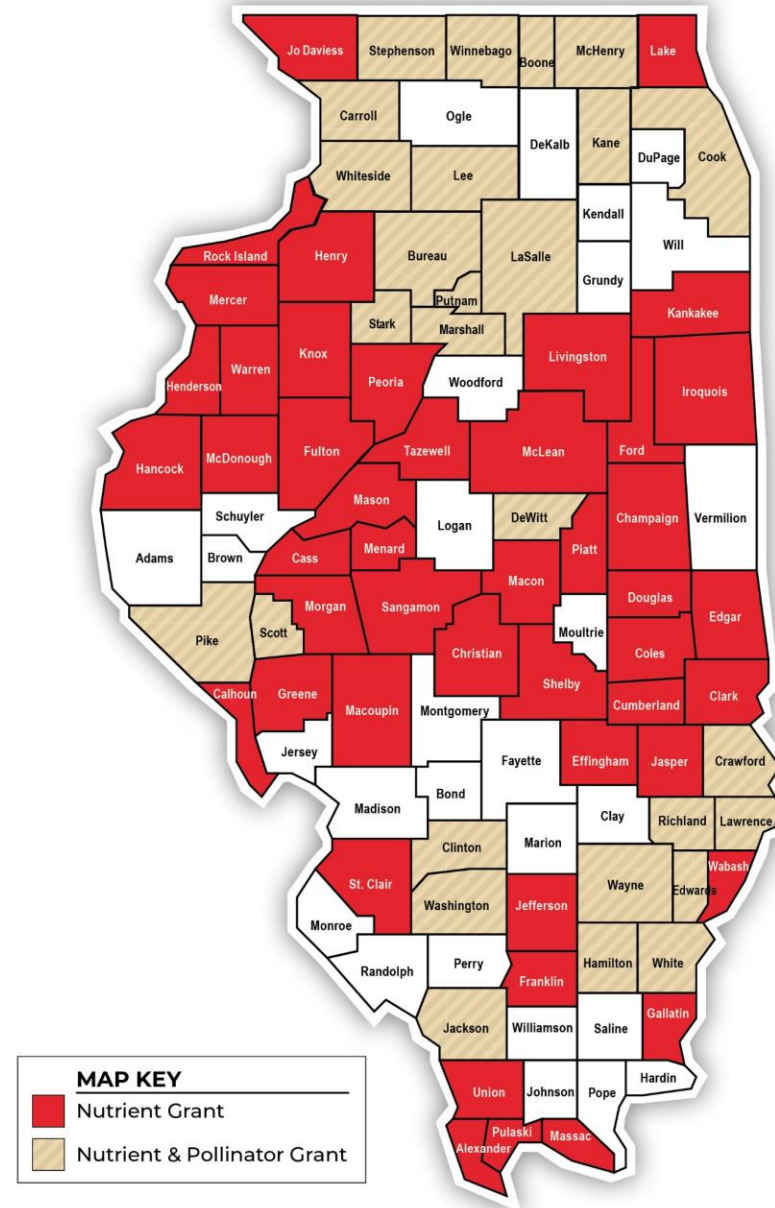


Nutrient Stewardship Grant Program:

Impact & Program Metrics

- \$2.8 million committed to all nutrient stewardship efforts since 2015; \$1,000,000 committed to the program
 - Plus in-kind and financial match from CFBs
- 138 projects across 74 counties
 - Per year, now near 50+ project partners
- Projects ranging from field days and other meetings, practice installs and demos, resource development and distribution, research and monitoring programs, and more.

ENVIRONMENTAL STEWARDSHIP GRANT RECIPIENTS: 2015-PRESENT





Nutrient Stewardship Grant Program:

Other Highlights

- 2020 program year:
 - Pivoted Nutrient Stewardship Field Days to 100% virtual
 - Field day landing page on www.ilfb.org/FieldDays
 - Full-length field day recordings + preview video for news-sharing
 - Content for CFBs – newsletter, social media plans, etc.
 - Collaboration/information-sharing with ag professionals – e.g., Certified Crop Advisors, etc.
 - Presentation opportunities for researchers, students, etc.
 - Tripled engagement of field day content
 - Demonstrative of organization’s commitment to program successes
- Lasting impact and reach:
 - Many multi-year projects, but always seeing new ideas from CFBs and members
 - Continued attendance, engagement at events
 - Source of inspiration for IFB documentary





Nutrient Stewardship Grant Program

2023 Project Overview



- Eighth program year; \$1,000,000 committed to date
- \$150,000 committed to 23 CFBs working together on 17 projects
 - *View full list of projects on [FarmWeekNow.com](https://www.farmweeknow.com)*
- Awarded projects overview:
 - 10 field days + additional meetings
 - Local monitoring, research projects
 - Implementation and demonstration projects
 - Resource development



Nutrient Stewardship Grant Program

What's Next?

- Project planning underway
- Opportunities to attend
 - www.ilfb.org/FieldDays
- Coverage from field days, other events
 - RFD Radio updates, RFD Today
 - FarmWeek and FarmWeekNow.com
- Reporting progress
- Looking to 2024

Thank you!

Raelynn Parmely

rparmely@ifb.org

309-557-3250

www.ifb.org/Environment

Watch Our Documentary, [*Sustaining Our Future: A Farm Family Story*](#)



Break

Please remember to sign in at the
Welcome Table.



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Partner Updates



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Open Discussion

Note: The Nov. 1, 2022 NLRs Workshop/PWG meeting evaluation comments included suggestions to discuss success stories and to brainstorm innovations to policy recommendations and on-the-ground actions that may increase scale/pace of progress.

Policy Working Group Charge

- Explore funding opportunities
- Identify needed legislative initiatives
- Network with the appropriate people and groups
- Identify adaptive management adjustments and update the strategy



Thank you for attending!

NLRS Policy Working Group Meeting

Wednesday, February 1, 2023



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