

# Evaluation of Factors Influencing Methylmercury Accumulation in South Florida Marshes

Wednesday, April 19      Session 23  
Moderators: Paul Julian and Forrest Dierberg

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- 1:20 - 1:30 Overview and Introductions
- 1:30 - 1:45 Binhe Gu
- 1:45 - 2:00 Paul Julian
- 2:00 - 2:15 Curtis Pollman
- 2:15 - 2:30 Tom DeBusk
- 2:30 - 2:45 Andy Ogram
- 2:45 - 3:00 Q&A - Discussion

# Mercury Impacts in the Everglades

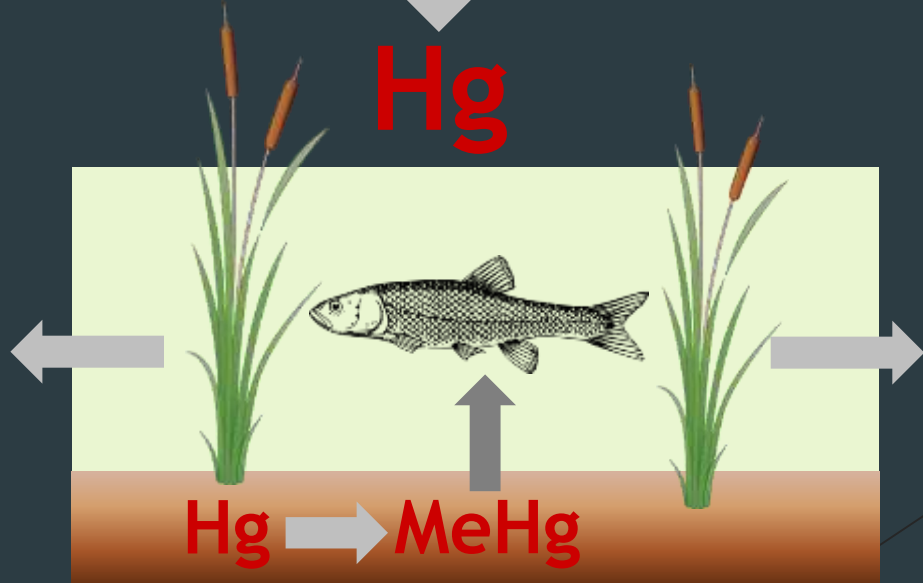
High atmospheric deposition of Hg



Hg

Human  
Impacts

Wildlife  
Impacts



1:30 - 1:45 Binhe Gu

## *High Biotic Mercury in South Florida Wetlands: Fish Trophic Position and Wading Bird Redistribution*

### Current Position

Dr. Ben Gu received his Ph.D in Oceanography from University of Alaska-Fairbanks in 1993. He has been working in aquatic biogeochemistry and ecology in Florida since his graduation, and is currently a lead scientist with the SFWMD on mercury monitoring.

### Education

Ph.D. in Oceanography from the University of Alaska-Fairbanks  
M.Sc. in Fisheries Science from Guangdong Ocean University  
B.Sc. in Fisheries Science from Guangdong Ocean University

### Experience

Post-doctorate at University of Florida  
Environmental Analyst at St. Johns River Water Management District





1:45 - 2:00 Paul Julian

## Limiting Factors in Mercury Methylation Hotspot Development: The Tangled Web

### Current Position

Everglades Technical Lead at Florida Department of Environmental Protection

### Education

- Ph.D. student in the Soil and Water Science Dept. at the U. of Florida
- M.Sc. In Environmental Science from Florida Gulf Coast University
- B.Sc. In Biochemistry from Benedictine College

### Experience

- Adjunct Professor at Florida Gulf Coast University
- Biological Scientist II at Florida Fish & Wildlife Research Institute
- Lab Manager at University of Florida/IFAS
- Staff Chemist II at Mote Marine Lab
- Technical Director/Chemist at Harbor Branch Environmental Lab

2:00 - 2:15 Curtis Pollman

*Biogeochemical Variables Driving Temporal Dynamics and Spatial Variability in Mercury Bioaccumulation in Gambusia in the Everglades - A Model Analysis Using R-EMAP*



Current Position

CEO of *Aqua Lux Lucis, Inc.* and Chief Environmental Scientist at *Nclear, Inc.*

Education

- Ph.D. in Environmental Engineering Sciences from the University of Florida
- M.Sc. in Environmental Engineering Sciences from the University of Florida
- BA in Biological Sciences (with honors) from the University of Delaware

Experience

- Adjunct Research Professor at the University of Florida
- CEO and Chief Scientist at *Frontier Geosciences, Inc.*
- Principal Scientist at *Tetra Tech, Inc.*
- Visiting Associate Research Professor at *University of S. Florida*
- Vice President and Principal Scientist at *KBN Engineering and Applied Sciences, Inc.*
- Department Head and Staff Scientist at *Environmental Science and Engineering, Inc.*

2:15 - 2:30 Tom DeBusk

*Investigation of Factors that Contribute to Variations in Mosquitofish (Gambusia holbrooki) Mercury Concentrations in Water Conservation Area 2A*

Current Position

President and Principal Scientist of DB Environmental, Inc. and  
Azurea, Inc.

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Education

- M.Sc. in Environmental Science from Florida Tech
- B. Sc. In Botany from University of Florida

Experience

- Research Program Manager, Walt Disney Co.
- Research Associate, Woods Hole Oceanographic Institution
- Research Assistant, University of Florida
- Research Assistant, Harbor Branch Oceanographic Institution



2:30 - 2:45 Andy Ogram

## *Phylogenetic Distribution of Mercury Methylators in the Water Conservation Areas*



### Current Position

Professor in the Soil and Water Science Dept. at the University of Florida

### Education

- Ph.D. in Microbiology from the University of Tennessee
- M. Sc. In Soil Science from the University of Florida
- B.Sc. In Zoology from the University of Florida

### Experience

- Assistant and Associate Professor at the University of Florida
- Assistant Professor at Washington State University
- National Research Council Post-Doctoral Associate at the U.S. EPA