

# March 31 & April 1, 2008 Louisiana State University, Baton Rouge

This 2-day Symposium, organized by the Consortium of Germany's Ruhr Universities (ConRuhr), the Center for Microscale Ecosystems (CME), Germany, and Louisiana State University (LSU), USA, gathers leading thinkers from both sides of the Atlantic to exchange research & develop new initiatives. All are invited to attend.

Location: Lod Cook Conference Center, Louisiana State University, 3848 West Lakeshore Dr., Baton Rouge

# Monday March 31 Opening of the Symposium

12:30 pm Water: Friend or Foe?

Rolf Kinne, Director, ConRuhr USA

Brooks Keel, Vice Chancellor for Research, Louisiana State University

Hans-Curt Flemming, CME. University of Duisburg-Essen

## Session One Water Treatment: Future Solutions

Chair: Michael Spiteller, Technical University of Dortmund

12:50 pm Soil aquifer treatment

David Quanrud, University of Arizona

Biological hydrogen production as a new source of energy

for waste water treatment plants

Thorsten Mietzel, University of Duisburg-Essen

1:40 pm Waste water treatment - status and future in America

Eberhard Morgenroth, University of Illinois at Urbana-Champaign

2:05 pm Conclusion and Coffee

(Discussion, exchange of opinion, exhibition)









Session Two	Indicators of Water Quality: Emerging Aspects Chair: Tzahi Cath, Colorado School of Mines
2:35 pm	Chemical indicators of water quality Torsten Schmidt, <i>University of Duisburg-Essen</i>
3:00 pm	Structural elucidation of biologically active substances in fresh and waster water Michael Spiteller, <i>Technical University of Dortmund</i>
3:25 pm	Emerging contaminants in the environment Dana Kolpin, <i>U.S. Geological Survey</i>
3:50 pm	Environmental impacts of chemicals in urban floods: Katrina's lessons for other coastal cities John Pardue, <i>Louisiana Water Resources Research Institute</i>
4:15 pm	Conclusion and Coffee (Discussion, exchange of opinion, exhibition)
	Poster Session & Finger Food Reception
4:45 pm	Posters presenting new research (all are invited to attend) Abel conference Room, Lod Cook conference Center
Keynote Speeches	To Drown or to Dry Up – Global Change & Local Challenge Chair: Hans-Curt Flemming, University of Duisburg-Essen
5:30 pm	Europe's challenge: Learning how to enjoy the river Toine Smits, <i>Radboud University of Nijmegen, NL</i>
6:00 pm	America's challenge: Two centuries of river management Craig Colten, <i>Louisiana State University Baton Rouge</i>





8:00 pm



6:30 pm Discussion, exchange of opinion, exhibition

Participant's Dinner (By invitation only) Anderson Room, Lod Cook Conference Center



# Tuesday April 01 Opening of Day 2

<b>Session Three</b>	Biofilms: Nature at Work Chair: Eberhard Morgenroth, University of Illinois at Urbana-Champaign
8:30 am	Water and biofilms Hans-Curt Flemming, <i>University of Duisburg-Essen</i>
8:55 am	Challenges of membrane treatment processes: Bio fouling and other issues Harry Ridgway, <i>AquaMem, New Mexico</i>
9:20 am	EPS: An Elusive Refuge for Bacteria in Water Systems Alan Decho, <i>University of South California</i>
9:45 am	Conclusion and Coffee (Discussion, exchange of opinion, exhibition)
Session Four	Ecosystem Health: Parasites, Contaminants, Treatment Chair: Torsten Schmidt, University of Duisburg-Essen
10:15 am	Parasites as bioindicators in aquatic ecosystems Bernd Sures, <i>University of Duisburg-Essen</i>
10:40 am	Effects of a hurricane on fish parasites Robin Overstreet, <i>University of Southern Mississippi</i>
11:05 am	Challenges of using unconventional water sources in the arid west Tzahi Cath, <i>Advanced Water Technology Center (AQWATC)</i>
11:30 am	Discussion, Overall Symposium Conclusion Bernd Sures, <i>University of Duisburg-Essen</i>
	Interactive Water System Tour: New Orleans
12:00 pm	Bus Ride to New Orleans, box lunch provided in bus
1:30 – 5:00 pm	<ul> <li>Water Treatment &amp; Levee Tour:</li> <li>Bonnet Carre Spillway</li> <li>New Orleans Sewage and Water Board, Water Treatment Facility</li> <li>Pump Station 6</li> <li>Briefing by Mr. Mujica, Chief, Physical support branch</li> <li>17th Street Canal Breach site</li> <li>Tour of the Levees on Lakeshore Drive</li> <li>Paris Road Bridge</li> <li>9th Ward Floodwall</li> </ul>
	Tour will be led by Michael Maples, <i>US Army Corp of Engineers</i> and Prof. Craig Colten, <i>Louisiana State University</i>
6:00 pm	Participant's Dinner in New Orleans (by invitation only)
8:00 pm	Return bus ride to Baton Rouge
0.00 Pill	









# **List of Participants**

### **US Scientists**

#### Dr. Tzahi Cath

Colorado School of Mines 154 Coolbough Hall, 1500 Illinois Street Golden, Colorado USA 80401-1887 Email: tcath@mines.edu

## Dr. Craig Colten

Louisiana State University Dept. of Geography and Anthropology Baton Rouge, LA 70803 E-mail: ccolten@lsu.edu

#### Dr. Alan Decho

University of South Carolina Dept. Environmental Health Sciences Columbia, SC 29208 Email: awdecho@gwm.sc.edu

### Dr. Dana W. Kolpin

U.S. Geological Survey **Emerging Contaminants Project** Iowa City, Iowa 52244 Email: dwkolpin@usgs.gov

### Mr. Michael Maples

**US Army Corp of Engineers** New Orleans, LA

Michael.A.Maples@usace.army.mil

### Dr. Eberhard Morgenroth

University of Illinois at Urbana-Champaign Dept. of Civil and Environmental Engineering Urbana, IL 61801 Email: emorgenr@uiuc.edu

#### Dr. Robin M. Overstreet

University of Southern Mississippi Ocean Springs, MS 39564 Email: robin.overstreet@usm.edu

#### Dr. John Pardue

Louisiana Water Resources Research Institute Louisiana State University Baton Rouge, Louisiana 70803 Email: jpardue@lsu.edu

# Dr. David Quanrud

University of Arizona Tucson, Arizona 85719 Email: quanrud@email.arizona.edu

# Dr. Harry Ridgway

AquaMem Scientific Consultants Rodeo, New Mexico 88056 Email: ridgway@vtc.net

# **European Scientists**

### Dr. Hans-Curt Flemming

University of Duisburg-Essen Faculty of Chemistry - Biofilm Centre 47057 Duisburg, Germany Email: HansCurtFlemming@compuserve.com

### Dr. Thorsten Mietzel

University of Duisburg-Essen Faculty for Engineering Sciences 45141 Essen, Germany Email: thorsten.mietzel@uni-due.de

#### Dr. Torsten Schmidt

University Duisburg-Essen Department of Chemistry 47048 Duisburg, Germany

Email: torsten.schmidt@uni-due.de

#### Dr. Toine Smits

Radboud University Nijmegen Centre for Sustainable Management of Resources 6500 HC Nijmegen, The Netherlands Email: smits@science.ru.nl

### Dr. Michael Spiteller

Technical University of Dortmund Institute of Environmental Research (INFU) 44221 Dortmund, Germany Email: spiteller@infu.uni-dortmund.de

### Dr. Bernd Sures

University of Duisburg-Essen Faculty of Biology and Geography 45141 Essen, Germany Email: bernd.sures@uni-due.de

#### Dr. Michael Eisinger

Managing Director, Center for Microscale Ecosystems 45141 Essen, Germany Email: Michael. Eisinger@uni-due.de

# **Organizers**

### Dr. Sonja Jaehnig

University of Duisburg-Essen Email: sonja.jaehnig@uni-due.de

#### Dr. Rolf Kinne

Director, ConRuhr USA New York, NY 11211 Email: kinne@con-ruhr.org

# Dr. LeeAnn Renninger (co-organizer)

Deputy Director. ConRuhr New York, NY 11211

Email: renninger@con-ruhr.org







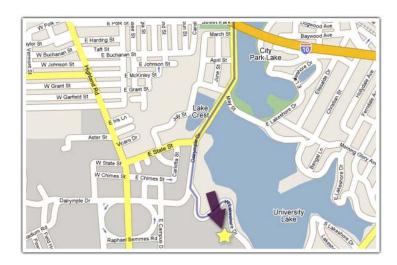




### Symposium + Hotel Location/ Directions:

Louisiana State University, Baton Rouge Cook Hotel & Conference Center 3848 West Lakeshore Dr. Baton Rouge, LA, 70708

Phone: 221 388 1004 www.thecookhotel.com



# Organizer contact info:

LeeAnn Renninger, Cell: 1-917-319-4354

# This symposium was organized by:

## ConRuhr: "Germany's Academic Triangle"

Germany's Academic Triangle is composed of 3 large universities located within 20 minutes of one another, along the Ruhr river in central Germany. These three universities (Universities of Bochum, Dortmund, and Duisburg-Essen) have formed a cooperative alliance that is world-wide unique. Students within the triangle can take courses and participate in research across all three universities, as well as join collaborative research centers stretching across disciplines and campuses, making this a hub for European academic activity. The Consortium of the Ruhr-Area Universities (ConRuhr) office is one branch of this alliance. Located in the German Consulate, New York City, ConRuhr's aim is to extend this unique network to talented academics, institutions, and business leaders in the USA. www.conruhr.org

### University of Duisburg Essen, CME

The Centre for Microscale Ecosystems (CME) is a campus-wide interdisciplinary research center located at the University of Duisburg-Essen, Germany. The CME's team includes over 60 researchers from 18 research groups, across 7 faculties. Working together with public and private organizations such as the IWW (Rheinisch-Westfälisches Institut für Wasserforschung), the RWW (Rheinisch-Westfälische Wasserwerksgesellschaft GmbH), as well as regional water boards, the center builds a multi-faceted Network of Water Science in central Germany. This network has been rapidly expanding internationally, including cooperative projects in the Netherlands, China, Japan, Russia, and the USA. http://www.uniduisburg-essen.de/home/fb/zmu/startseite/en\_index.shtml











### This symposium was sponsored by:

The Volkswagen Foundation

The Volkswagen Foundation has been funding research projects in all disciplines since 1962. Its mission is to establish forward-looking fields of knowledge. www.volkswagenstiftung.de

The German Academic Exchange Service

The German Academic Exchange Service (DAAD) is the German national agency for the support of international academic cooperation. It offers programs and funding for students, faculty, researchers and others in higher education, providing financial support to over 50,000 individuals per year, www.daad.org

The Louisiana Water Resources Research Institute

The Louisiana Water Resources Research Institute is federally mandated to perform a statewide function of promoting research, education and services in water resources. The Institute is a multidisciplinary center for addressing water issues in the state, drawing on faculty from multiple departments and Universities. In this regard, the Institute serves as a resource for state officials who want unbiased, scientifically defensible information on how to address the State's water problems. www.lwrri.lsu.edu

Siemens Medical Solutions

Cutting costs. Optimizing workflow. Advancing the quality of care. Siemens is making it possible right now. Across every clinical setting, Siemens is helping healthcare become more efficient, more effective, and more profitable. www.medical.siemens.com

# We would also like to thank our local hosts & sponsors:

Louisiana State University, Office of Research and Economic Development

LSU has developed a program in the Office of Research and Economic Development entitled The LSU Coastal Sustainability Agenda to facilitate the integration of knowledge crucial to the creation of informed policies, to promote environmental and economic sustainability in coastal landscapes around the world. By stimulating the collaboration of faculty from relevant disciplines with the private sector and government, the LSU Coastal Sustainability Agenda will serve as a model for the intelligent stewardship of natural, built, social, and cultural resources in coastal zone communities to guide sustainable economic development and environmental decision-making in Louisiana and around the world. www.research.lsu.edu

Louisiana State University, Department of Geography and Anthropology

Since its inception in the late 1920s, the LSU Department of Geography and Anthropology has been one of the world's premier centers for teaching and research in select subfields of geography and anthropology. Located at the gateway between the Mississippi Valley and Latin America, the department offers a wide array of field and regional expertise in each of these regions, plus other regional specialties. Geography at LSU explores the ecological and locational relations of nature and culture through field, archival, and quantitative research, while anthropology studies people and their cultures both past and present. It is the only joint department in the United States to offer graduate programs in geography and anthropology. www.ga.lsu.edu







