Southwest Florida Water Resources Conference

A History of Evolving Issues and Priorities

Southwest Florida Water Resources Conference March 15-16, 1991

Speakers and Topics

Camp Dresser & McKee Inc. "A Statewide Perspective on Surface Water Utilities"

South Florida Water Management District "Capital Improvements in the Big Cypress Basin"

Collier County "Surface Water Master Plan & Financing Strategy for Collier County"

City of Naples

"Surface Water Management Plan for Naples Bay"

South Florida Water Management District "SWFWMD Compliance Program & New Agricultural Water Use Rule"

Eric Livingston Florida Department of Environmental Regulation "Statewide Perspective on Surface Water Including New NPDES and FDER Regulations"

"Six Mile Cypress Slough Environmental Restoration Project"

Roland Ottolini Lee County "Surface Water Management Master Plan for Lee County"

Roger Clark Lee County

9th Annual Southwest Florida Water Resources Conference November 18-20, 1999 PROGRAM AGENDA

Thursday, November 18th, 1999 11:30-12:45 *Registration* 12:45 – 1:00 Introduction and Opening Remarks 1:00 -1:45 Contributions of Durward Boggess 1:45 -3:15 Geology of Southwest Florida

The Surficial Geology of Lee County and the Caloosahatchee Basin Scott, T: Missimer, T. Late Paleogene and Neogene Chronostratigraphy of Lee County, Florida Missimer, T. Hydrogeology of Lee County Wedderburn, L; Herr, J. 3:30 -5:00 Groundwater Quality Hydrogeologic Implications of Uranium Rich Phosphate Weinberg, M; Cowart, J Distribution of a Carbonate Ramp and Bounding Siliciclastics Cunningham, T; Reese,

R; Sato, T; Guertin, L.

Friday, November 19th, 1999 7:30 - 8:30 Registration 8:30 -8:45 Introductions & Welcoming Remarks 8:45 -10:30 Geology & Surface Water Quality The Lee County Abandoned Well Program Surface Water Management in Lee County

1:00 -2:00 Water Resources Issues

Grant, Jr., A; Tilton, A. 10:45 -12:00 Surface & Ground Water Interactions Water Level Elevation Maps of Primary Aquifers in Lower Southwest Florida Bengtsson, T. and Radin, H Caloosahatchee Basin Integrated Surface Water Ground Water Model J; Moulton, D; Owosina, A. 12:00 –1:00 Luncheon with Speaker TBA

Hydrogeology of the Lower Floridan Aguifer "Boulder Zone Maliva, R.; Walker, C.; Callahan, E. Seagrass Meadow Hourly Dissolved-Oxygen Recordings Mitchell-Tapping, H; Lee, T.; Williams, C.; Winter, T. 2:00 -3:00 Technical Alternatives 3:00 -5:00 Effective Solutions (Panel Discussion)

Dinner Banquet at Holiday Inn SunSpree Entertainment

5:00 -6:00 Social hour at Royal Palm Yacht Club

Saturday, November 20th. 1999 10:30-1:30 Field Trip - Babcock Wilderness Experience, Buggy Ride and Lunch

12th Annual Southwest Florida Water Resources Conference November 15, 2002, Royal Palm Yacht Club, Fort Myers

Alternative Water Resources: Technologies, Realities & Policies

AGENDA

8:30 - 9:00 a.m.

9:00-9:20 a.m.

Session 1 – Reverse Osmosis: Making More from Less – Operational Issues 9:20 – 9:40 a.m. 20 Years of R.O. Experience: The Island Water Association

10:00 – 10:20 a.m. Collier County R.O. Experience: Two Facilities 10:20 - 10:40 a.m. **Break**

9:40 – 10:00 a.m. City of Fort Myers R.O. Plant

Session II – ASR & Reuse: Store It, Use It or Lose It – Application Issues 10:40 – 11:00 a.m. Treated Water ASR: The Manatee Road Facility, Collier County 11:00 – 11:20 a.m. Surface Water ASR: Florida Water, Collier County 11:20 – 11:40 a.m. Reuse in Collier County: Public/Private Partnerships 11:40 – 12:00 noon Reuse in the Private Sector: Bonita Bay, Lee County

Lunch – Keynote Speaker Introduction by Trudi K. Williams Keynote Speaker: Henry Dean, Executive Director of SFWMD

Session III – Conservation Alternatives: Growing More with Less Agricultural Water Conservation Plan, 6 L's, Collier County Water Conservation for Golf Courses

Integrated Water Resources Management: 2:10-2:30 p.m.The City of Cape Coral Example 2:30 - 2:50 p.m. Afternoon Break

Trifle or Trifecta.

Panel Discussion - Alternative Water Supplies: Technologies, Realities and Policies,

Director IV, Hendry County Extension Service David Graham V.P. for Planning & Development, Bonita Bay Group Chair of Ecological Studies, Florida Gulf Coast University Exec. Director, Southwest Florida Regional Planning Council Abdul Ahmadi, PE, Ph.D. Director Water Facilities Program, FDEP South District

Social Networking Session – Royal Palm Yacht Club Patio 7:30 - 10:30 p.m. Dinner and Dance Cruise along the Caloosahatchee aboard the Capt. J.P. AWRA Section Board Meeting will be held from 10:00 to noon at the RPYC

15th Annual

Southwest Florida Water Resources Conference November 18th, 2005

Water Quality in the Caloosahatchee Basin You and Your Water

Agenda

Florida Gulf Coast University - Whitaker Hall

11:45 – 1:00 Luncheon Speaker - Trudi Williams

1:15 – 1:45 Operational Aspects of the Big O and C-43 - Bob Howard, SFWMD

2:00 - 3:30 Panel Discussion on User Perspectives - Win Everham, moderator

Hugh English, former SFWMD Governing Board Member Roland Ottolini, Lee County Division of Natural Resources Jennifer Heckler, Conservancy of Southwest Florida Captain Pete Quasius, Coastal Conservation Assoc, President

3:30 - 3:45 Break

3:45 - 5:00 Panel Discussion on Potential Solutions - Carla Palmer, moderator

Beverly Grady, Roetzel & Andres Law Firm Rick Danzler, former State Senator Mitch Hutchcraft, The Bonita Bay Group **Chip Merriam, South Florida Water Management District**

19th Annual Southwest Florida Water Resources Conference "Sustainability through an Economic Downturn" November 20, 2009 Royal Palm Yacht Club, Fort Myers FL Agenda

Registration 8:00 – 9:00

8:50 L. Donald Duke, Conference Chair; Associate Professor of Environmental Science and Policy, Florida

Session A 9:00 – 10:15 Water legislation, regulations, and agency activities Trudi Williams, Florida State Representative, 75th District Scott McClelland, Vice President, Camp Dresser & McKee Inc.

Session B 10:30 – 12:35 Water supply and water quality: trends and activities in Southwest Florida

Dennis Vasey, Supervisor, Seat 3, Collier Soil and Water Conservation District Howard Wegis, Administration Staff Engineer, Lee County Utilities Karen Bickford, TMDL Coordinator, Lee County Natural Resources

Jennifer Hecker, Natural Resource Policy Manager, Conservancy of Southwest Florida

Thomas Missimer, Vice President, Schlumberger Water Services Water Resources Planning in South Florida during a Difficult Economy: No Time for Unreasonable Projects

Paul Mattausch, Director, Collier County's Water Department

Keynote Speaker: Dr. Jerry Jackson, Professor of Ecology, Florida Gulf Coast University Lag Time, Connectivity, and Environmental Opportunities in a Lagging Economy

1:45 – 3:30 Ecosystem restoration and management in southwest Florida Michael Duever, Senior Environmental Scientist, South Florida Water Management District June Mirecki, Technical Lead for ASR Projects in Jacksonville District, US Army Corps of Engineers

20th Annual Southwest Florida Water Resources Conference:

Royal Palm Yacht Club, Fort Myers Florida

The Next Generation of Water Challenges

November 19, 2010

Tom Teets, Policy and Coordination Department Director, South Florida Water Management District Ed Hanlon, University of Florida/Southwest Florida Watershed Council

Transforming Agricultural Water Management in Support of Ecosystem Restoration

Session D 3:45 – 4:45 Panel discussion Sustainability in an Economic Downturn

Andrew McElwaine, President, Conservancy of Southwest Florida Thomas Missimer, Vice President, Schlumberger Water Services Dennis Gilkey, President, Gilkey Group

Attitude adjustment 4:45 - 6:00 PM no-host bar

7th Annual **AWRA/Southwest Florida Water Resources Conference** Royal Palm Yacht Club, Ft. Myers November 21, 1997

Registration (11:00-11:45)

Lunch (11:45-12:45) Welcome Master of Ceremonies Bill Hammond

Judge Nelson Bailey (Palm Beach County Court) Speaker Session A (1:00-3:00) Moderator

Rae Ann Scholle (CRCA Riverwatch) River History **Constraints and Major Project Goals** Re-study Project Water Supply Plans Jim Gross

(U.S. Army Corps of Engineers) (SFWMD Planning Department) **Technical Aspects of the Resource** (SFWMD Ecosystem Restoration Dept.) Estuary Research Bob Chamberlain (SFWMD Ecosystem Restoration Dept.) Peter Doering Watershed Research Eric Flaig (SFWMD, UF-IFAS) (UF-IFAS SWFREC) John Capece

Regional Modeling Richard Tomasello (Tomasello Consulting Engineers) Break (3:00-3:30) Session B (3:30-5:30) Moderator Christopher Pearce (Fl. Assoc. of Environ. Professionals)

Resource Use Interests Rob Loflin Tourism & Recreation Roger Clark Agricultural Industries Dallas Townsend Municipal Water Use Thomas Missimer Wrap-up

(UF-IFAS Hendry Co. Ext. Office) SFWMD Planning Dan Haunert Win Everham Hugh English Dan Clark

(Missimer International, Inc.) (SFWMD Planning Department)

8th Annual

Southwest Florida Water Resources Conference

Royal Palm Yacht Club, Fort Myers

November 13, 1998

Estuaries of Southwest Florida A Study of Health, Value and Management

Harley Young, Florida Department of Environmental Protection

Heather Stafford, Estero Bay Aquatic and State Buffer Preserves

Beverley Roberts, Florida Department of Environmental Protection

Tiffany Lutterman – Charlotte Harbor National Estuary Program

Bill Hammond – South Florida Water Management District

Win Everham – Estero Bay Agency on Bay Management

Bruce Boler – Ecosystem Management Area, Fl Dept of Environmental Protection

Keith Kibbey, Lee County Environmental laboratory

(SFWMD Planning Department) (Florida Gulf Coast University) (A. Duda & Sons, Inc.) (City of Sanibel Natural Resources) (Lee Co. Regional Water Supply Auth.) (SFWMD. Ft. Myers Service Center) (Florida House of Representatives)

Estuary Samy Faried Chip Merriam Management Rep. Joe Spratt Governance

Happy Hour (5:30 until...) at the Yacht Club River Cruise/Dinner (7:30-10:30) The Capt. J.P. River Boat begins boarding at 7:00 PM and departs at 7:30 PM. You must have your ticket to board the boat.

Session A (8:20-9:20) Estuaries and Health

Heavy metal contamination in Estero Bay

Land acquisition around Estero Bay

Session C (10:50-12:30) Managing Estuaries

Management issues related to harmful algal blooms

Ken Cummins, Tarpon Bay Laboratory

Speakers: Bill Hammond (SFWMD)

Ecosystem management (panel discussion)

1:00-5:00 (Boat tour)

Greg Tolley (FGCU)

Valued ecosystem component approach to managing estuaries

Session B (9:20-10:20) Estuaries and the Economy

Elaine McLaughlin, Lee County Tourist Bureau

Agriculture

Registration (7:45)

BREAK

Waster water discharge

(AWRA, Gulf Citrus Growers Assoc.)

(SFWMD Governing Board)

(SFWMD Governing Board)

(City of Sanibel Natural Resources)

(Lee County Parks & Recreation Dept.)

Southwest Florida Water Resources Conference

LAND AND WATER USE FOR THE NEW MILLENNIUM **AGENDA**

> Conference speakers will address questions of critical linkages between land use patterns and regional water resources: What challenges are urban sprawl imposing on water supply planning? And what about agriculture...will future water quality regulations prove more limiting than irrigation water availability? Will publicly-financed acquisitions of rural lands continue to increase or will mitigation banks evolve to become more significant preservation tool? Are current water quality standards being met and how difficult will be our transition to more stringent standards? And finally, are our educational institutions preparing our citizenry to meet these formidable challenges?

> > Samy Faried

Lee County Regional Water Supply Authority

10th ANNUAL

Friday, December 1st, 2000

Friday, December 1st, 2000 12:00-1:00 Registration

1:00-1:20 Opening Remarks 1:20-1:40 Planning for Water

Southwest Florida Regional Planning Council 1:40-2:00 Land Acquisition Heather Stafford Florida Department of Environmental Protection 2:20-2:40 Mitigation Banks Dick Anderson Mariner Properties Development, Inc.

2:40-3:00 Break 3:00-3:20 Agricultural Use

3:20-3:40 Surface Water John Cassani 3:40-4:00 **FGCU Programs** 4:00-4:20 Water Supply Update Dean Powell

4:20-5:20 **Social Hour**

John Capece Southern DataStream, Inc. Lee County Water Hyacinth Control Joseph Kakareka. Edwin Everham, Jerome Jackson Florida Gulf Coast University

South Florida Water Management District Yacht Club Lounge

11th Annual Southwest Florida Water Resources Conference

coping with hurricanes, floods, and droughts November 16, 2001 8:30 - 9:00 Registration 9:00 - 9:15 Welcome – Joe Kakareka

Session I - Historical Context Climate Variability during the 20th Century - Paul Trimble Sea Level Rise and its Impact on Coastal Environmental Evolution in Southwest Florida – Mike Savarese, Lenore P. Tedesco, & Stephanie Obl Forecasting long-term weather trends – Jim Clarke 10:15 - 10:45

Water resources in a variable world -

10:45 - 11:00

Session II - Ecology Shaping Ecosystems through Irregular Events, an introduction to Disturbance Ecology – Win Everham Making Music in Florida's Estuaries, or, Knowing 11:20 - 11:40 Noise When We Hear It - Ernest D. Estevez

11:45 - 1:00 Dr. William Merwin. President, Florida Gulf Coast University Session II - Ecology (continued)

Wetland Fishes as Indicators of Hydrology - Dave Ceilley Waterbirds and water fluctuations - Jerry A. Jackson & Bette J.S. Jackson Disturbances and aquatic nuisance species – John Cassani Session III - Management Implications

Overview of panel discussion – "How to manage water to meet human and ecosystem needs in an unpredictable environment"

2:15 - 3:15 Panelists: Wayne Daltry - moderator South Florida Water Management District South West Florida Watershed Council Institute of Food and Agricultural Sciences Florida Gulf Coast University

Cocktails - Whitaker Building courtyard 5:30 - 8:30Lake Trafford barbecue

MAWRA

American Water

The 13th Annual **Southwest Florida Water Resources Conference** Friday, November 21, 2003 8:00 am - 4:30 pm Florida Gulf Coast University Fort Myers, FL

"The Rising Tide: Emerging Coastal Issues"

8:30 – 9:00 a.m. Registration / Breakfast 9:00 – 9:30 a.m. Welcome

9:30 – 11:30 a.m. Morning Sessions (with break) Sea Level History of the Florida Platform: Natural Cycles vs. Anthropogenic Affects – Tom Missimer, CDM Historical Sea Level Rise – Hal Wanless, University of Miami Impact of Sea level Rise on Pre-Columbian Cultures in South Florida – Corbett Torrence, Florida Gulf Coast

Suwannee River Project – Jim Ladner, Florida Geological

11:30 - 12:30 p.m. Lunch - Networking 1:00 – 3:00 p.m. Afternoon Sessions (with break) Recent Sea Level Changes in the Gulf of Mexico and

Future Trends – Joe Donoghue, Florida State University Sea Level Rise and Water Resources in South Florida Andy Tilton and Archie Grant, Johnson Engineering Implications of Seal Level Rise on Past and Future Ecology of Reef Systems in South Florida – Mike Savarese. Florida Gulf Coast University Impact of Sea Level Rise on Terrestrial Ecosystems in South Florida - Mike Deuver, South Florida Water Management District

Land Use Impacts and Solutions to Sea Rise in SW

Florida – Dan Trescott, Southwest Florida Regional Planning 3:00 – 4:30 p.m. Panel Discussion: The Rising Tide: Where Will We Be? - Win Everham, FGCU with Panelists

4:30 – 6:00 p.m. Sunset Social Session – FGCU Patio

Conference updates and forms will be posted on www.caloosahatchee.org

14th Southwest Florida Water Resources Conference Scratching the Surface – SW Florida Surface Water Issues Friday, September 17, 2004

Holiday Inn Riverwalk Hotel Fort Myers, Florida

Board of Directors' Meeting Board of Directors' Lunch 11:00 a.m. 12:00 p.m. Conference Registration

SESSION I

2:45 p.m.

3:15 p.m.

Introduction and Opening Remarks 1:15 p.m. Surface Water Quality Issues Case Study in Application of the Harper Methodology (AKA Regulatory Nightmares) Implementing a Stormwater Utility in an Adverse Region

Public – Private Stormwater Quality Improvement Systems

SESSION II Panel Discussion

The Son of CERP & Regional Reservoirs – The C-43

5:00 p.m. Networking and Happy Hour 6:00 p.m.

7:30 p.m. Dinner Speaker Night out in Historic Downtown Fort Myers

Social Session & Dinner

Southwest Florida Water Resources Conference November 17, 2006 Coastal Eutrophication and Harmful Algal Blooms

Registration Session I – Coastal Eutrophication

Joe King, FDEP "A Temporal Overview of Estuarine Eutrophication and Why We Should be Concerned" "Dissolved Oxygen Dynamics in Charlotte Harbor and Peace River in Response to the 2005 Hurricane Season"

16th Annual

Randall Alberte, FGCU, and Eric Milbrandt, Sanibel Captiva Conservation Foundation "Water Quality in the Caloosahatchee River and Estuary" 10:30-10:45 a.m. Break

8:30 a.m.

9-10:30 a.m.

10:45 a.m.-Noon Session II – Harmful Algal Blooms Ken Hudnell, US EPA "Cyanobacterial Harmful Algal Blooms: State of the Science, Research Needs, and the Development of a National Research Plan"

"Case Studies of Coastal Eutrophication in Florida: Harmful Macroalgal Blooms" Welcome: President William Merwin, Ph.D., FGCU Featured Speaker: Michael Grundwald, The Washington Post "The Swamp: The Everglades, Florida, and the Politics of Paradise"

Peter Barile, Marine Research & Consulting, Inc.

1:15-2:30 p.m. Session III – Red Tide Larry Brand, UM Rosenstiel School of Marine & Atmospheric Science "Is Florida's Red Ride Increasing?" Kellie Dixon, Mote Marine Laboratories

"The Complexity of Nature and Red Tide" 2:30-2:45 a.m. Session IV - Politics of Nutrient Loading and HABs 2:45-4 p.m.

Panel Discussion – Moderator Bill Hammond, FGCU Randal Alberte, Florida Gulf Coast University Peter Barile, Marine Research & Consulting, Inc. Jennifer Hecker, Conservancy of Southwest Florida Ken Hudnell, US EPA Roland Ottolini, Lee County Natural Resources

Social Hour - Student Union 214

17th Annual Southwest Florida Water Resources Conference

November 16, 2007 Florida Gulf Coast University

"Drought Impacts: The Good, The Bad & The Ugly"

9:00 Registration

9:30 Welcome – FGCU Interim President Dick Pegnetter

9:45 – 11:30 Session I – Resources Challenges: **Environmental Affects of Prolonged Drought Conditions on** groundwater supplies, aquatic and terrestrial ecology and

Speaker: Vernon Peeples of WGCU's "Vernon's Views".

12:45 – 2:30 Session II – Resources Solutions:

Technology & Planning 2:30 - 2:45 Break

11:45 – 12:45 Lunch

2:45 – 4:30 Session III – Panel Discussion:

Can We Get There From Here? Policies and Implications

Conference updates and forms will be posted on www.caloosahatchee.org/awra

4:45 – Meet and Greet on FGCU Campus

5:30 – AWRA Members Dinner – TBD (Cost not included in Registration)

Technical Program 8:30 AM Welcoming remarks Charles Dauray, member, Governing Board, South Florida Water Management District 8:40 – 10:10 AM Governance and water resources Session chair: Don Duke Beverly Grady, Esq., Roetzel and Andress: Legal Protection for Environmental Systems John Marshall, Arthur R. Marshall Foundation: Ecosystem Services of a Restored River of Grass John Fumero, Rose, Sundstrom & Bentley, LLP: Florida Water Law and Emerging Mega-Trends John Cassani, Watershed Council: Problems and Prospects for Achieving Minimum Flows 10:10 – 10:40 AM Networking Break and Visit Exhibitors 10:45 – 11:55 AM Flow management Session chair: Alicia Dixon Greg Tolley, FGCU: The Use of Zooplankton as Bioindicators for the Management of Freshwater Inflow Rae Ann Wessel, Sanibel-Captiva Conservation Foundation: Will Adaptive Management Provide Flow Jennifer Hecker, Conservancy of Southwest Florida: The Saving the Caloosahatchee Campaign 12:00 – 1:00 Luncheon keynote speaker Henry Dean, former Executive Director, SFWMD "How'd We Get Here Anyway?" 1:05 – 2:10 PM Water quality and resource protection Session chair: Gillian Carney Darren Rumbold, FGCU Dept of Marine and Ecological Science: Overview of the Independent Oilrelated Research Funded through the Florida Institute of Oceanography Peter Ortner, University of Miami: The MARES Process and Enabling Integrated Ecosystem Model Development on the Southwest Florida

2:10 - 2:25 PM Networking Break 2:25 – 3:55 PM Water quality, continued: Focus on Numeric Nutrient Criteria (NNCs) Andrew Bartlett, Florida Department of Environmental Protection: Numeric Nutrient Criteria Rulemaking and Schedule

Judy Ott, Charlotte Harbor National Estuary Program: From Seagrasses to Numeric Nutrient Criteria: Charlotte Harbor National Estuary Program Water Quality Targets Tony Janicki, Janicki Environmental Inc.: Technical Approach for NNCs for Southwest Florida: Charlotte Harbor; Tampa Bay; Sarasota Bay Roland Ottolini, Lee County Natural Resources: A Local Agency's Views: Challenges in Meeting In-

Kristoph-Dietrich Kinzli, FGCU School of Engineering: Using an Acoustic Doppler Current Profiler to

3:55 – 4:10 PM Networking Break and Poster Judging 4:10 – 5:20 PM Panel discussion Session chair: Ron Edenfield Henry Dean, Hugh English, Rick Barber

Stream Numeric Criteria through the BMAP and NNC Processes

Determine Surface and Groundwater Interactions

"Wise Sages: Looking Back, Looking Forward (No, Really, How Did We Get Here???)" 5:30 – 7:00 PM Attitude adjustment: no-host bar at Royal Palm Yacht Club 6:00 – 7:30: "Looking Forward: Next Steps" session

Conference re-cap and discussion about problems facing water resources in coming years.

22nd Annual Southwest Florida Water Resources Conference Royal Palm Yacht Club, Ft. Myers January 25, 2013 AGENDA

8:30 - 8:35 a.m. OPENING REMARKS Ron Edenfield, Conference Chair The Water-Energy Nexus: Federal Approach to Manage Energy and Water Tradeoffs Frank Rusco, U.S. General Accounting Office, Washington, D.C.

9:10 - 10:15 a.m. ENERGY & LIFE CYCLE ASSESSMENT FOR WATER MANAGEMENT SYSTEMS Session Chair: Ed Hanlon, University of Florida The Emerging Discipline of Emergy Analysis for Water Management - Mark Brown, University Emergy Analysis of Sugarcane Water Management - Nana Amponsah, Intelligentsia International Life Cycle Assessment for Florida Biofuels Systems - Jose Izursa, Intelligentsia International

10:15 - 11:20 a.m. VISIT THE RESEARCH POSTERS Sponsored by: Session Chair: Kristoph-Dietrich Kinzli, Florida Gulf Coast University 11:20 - 12:25 p.m. WATER AND ENERGY DEMANDS Session Chair: John Capece, Intelligentsia International Energy and Water in Context: A Business Perspective - Seth Sheldon, Energy Points

Urban Water Infrastructure & Energy Challenges - James Goodrich, U.S. Environmental

Protection Agency LUNCH (STUDENT-PROFESSIONAL LUNCH PAIRING) Session Chair: Andy Tilton, Johnson Engineering

WATER USE IN ENERGY SYSTEMS Session Chair: Karen Bickford, Lee County Natural Resources Energy's Water Demand Trends – Nicole Carter, Congressional Research Service Water Use in the Lee County Algenol Bioethanol Project - Ronald Chance, Algenol

ATTITUDE ADJUSTMENT NETWORKING Cash bar and complimentary hor d'ourves.

WATER USE AND MANAGEMENT IN FRACKING Session Chair: Sabrina Lartz Passarella & Associates Pro's and Con's of Fracking - Christopher Brown, University of North Florida Recycling of Hyrdrofracking Water - David Yoxtheimer, Pennsylvania State University Water Management Challenges of Hydraulic Fracturing - Radisav Vidic, University of Pittsburgh 3:40 – 4:05 p.m. NETWORKING BREAK Moderator: Ron Edenfield, R.M. Edenfield Company, LLC Frank Rusco, U.S. General Accounting Office James Goodrich, U.S. Environmental Protection Agency Nicole Carter, Congressional Research Service Christopher Brown, University of North Florida Radisav Vidic, University of Pittsburgh