## Meeting 4 Agenda

### November 3, 2022 11:00AM-6:00PM ET

#### Purpose

- Continue problem characterization discussions on opportunistic pathogens and disinfectant residuals.
- Continue problem characterization discussions on disinfectant byproducts.
- Begin problem characterization discussions on risk-balancing and interdependencies.

#### **Advance Meeting Materials**

- Two-page reference document
- Reference articles

#### **Day-of Materials**

Presentation

Agenda			
11:00 (15 min)	Segment 1: Agenda Review and Meeting Procedures.		
	<ul> <li>Meeting Opening (Elizabeth Corr, U.S.EPA OGWDW, DFO and Rob Greenwood, Ross Strategic)</li> <li>Welcome (Crystal Rodgers-Jenkins, U.S.EPA OGWDW)</li> <li>Opening Remarks (Working Group Co-Chairs Andy Kricun and Lisa Daniels)</li> <li>Facilitator Agenda Review (Rob Greenwood, Ross Strategic)</li> </ul>		
11:15 (75 min)	Segment 2: Follow up on problem characterization discussions on opportunistic pathogens and disinfectant residuals; Follow up on problem characterization discussion on disinfectants/disinfection byproducts.		
	Presentations		
	<ul> <li>Responses to Working Group questions on opportunistic pathogens, disinfectant residuals, and DBPs from Meetings 2 and 3. (<i>Ken Rotert, U.S. EPA OGWDW</i>)</li> <li>Legionnaires' Disease in the United States. (<i>Chris Edens, CDC Epidemiologist</i>)</li> </ul>		

**Technical Panel** (*Technical Analysts: Shawn McElmurry, Wayne State University Department of Civil and Environmental Engineering; Chris Owen, Hazen and Sawyer; Vanessa Speight, University of Sheffield Department of Civil and Structural Engineering)* 

**Facilitated Discussion** (*Rob Greenwood*, *Ross Strategic*)

12:30	BREAK	(15 MIN)	
12.00	DILAN		

# 12:45 (45 min) Segment 3: Existing Regulatory and Policy Context for Risk Balancing/Interdependencies.

#### Presentation

 The Interdependencies of balancing risks while managing microbial pathogens and DBPs (*Rich Weisman, U.S. EPA OGWDW*)

#### Facilitated Discussion (Rob Greenwood, Ross Strategic)

- Clarifying questions
- Based on your understanding, are there further features or aspects of the rules that you
  would like to highlight for WG consideration?
- Are there other aspects of the interdependencies of balancing risks while managing microbial pathogens and DBPs that you would like to learn more about to inform Working Group discussions, and why?

#### 1:30 LUNCH BREAK (60 MIN)

#### 2:30 (115 min) Segment 4: Problem Characterization on Risk Balancing/Interdependencies

#### Presentations

- Impact of increasing disinfectant residuals on DBP levels in the distribution system. (Technical Analyst: Scott Summers, The University of Colorado-Boulder, retired)
- Formation of Emerging DBPs (Technical Analyst: Stuart Krasner, Metropolitan Water District of Southern California, retired)

Facilitated Discussion (Rob Greenwood, Ross Strategic)

Clarifying questions

#### Presentations

- Sanitary Survey: A Review (Gary Burlingame, Philadelphia Water Department, retired)
- DBPR Compliance Challenges, DBPs and Disinfectant Residuals It's Complicated (Alan Roberson, ASDWA)
- Overview of Drinking Water Storage Issues (Technical Analyst: Vanessa Speight, University of Sheffield Department of Civil and Structural Engineering)

Facilitated Discussion (Rob Greenwood, Ross Strategic)

• Clarifying questions

#### 4:40 (60 MIN) Segment 4, cont.:

**Technical Panel** (*Technical Analysts: Chad Seidel, President, Corona Environmental Consulting LLC; Scott Summers, Professor of Environmental Engineering, University of Colorado – Boulder, retired*);(Kerry Howe, Howe Water Science, LLC)

Facilitated Discussion (Rob Greenwood, Ross Strategic)

- Do you have additions or refinements to characterization of risk balancing/interdependency problems?
- What additional information will be helpful to further understand risk balancing/interdependency?
- Within the drinking water value chain, what do you believe are the most prominent root causes of risk balancing/interdependency problems?
- Given the information you have in front of you today, how do you perceive the magnitude of the public health concern and why?

#### 5:40 (20 MIN) Segment 5: Meeting 5 Agenda & Next Steps

#### Presentation: Proposed Meeting 5 Topics & Next Steps (Rob Greenwood, Ross Strategic)

- CDC on water system characteristics and outbreaks
- NASEM Study on Legionella
- D/DBP Problem Characterization, cont.
- Environmental Justice Issues
- MDBP Rule Related Implementation and Compliance Challenges

#### Facilitated Discussion (Rob Greenwood, Ross Strategic)

- Do you have additions or refinements to the proposed topics?
- What background materials, presentations, or other resources will be helpful to you to prepare for the Meeting 5 discussions?
- Mindful of time and resource limitations prior to the next meetings, what supplemental technical analyses would you like on the topics to help inform discussions?

Closing Remarks (Co-Chairs Lisa Daniels and Andy Kricun)

Meeting Closure (Elizabeth Corr, U.S.EPA, DFO)