Presentation Outline

• Background
• Key Initiatives
  – Renewable Energy Production
  – Wet Weather Flow Management
• Infrastructure Status
• Financial Status
• Future Challenges
Background

Wastewater Service Area

- 88 square miles (325 sq. miles in Water System)
- 650,000 people (1.3 million in Water System)
- Services provided to seven communities
  - Alameda
  - Albany
  - Berkeley
  - Emeryville
  - Oakland
  - Piedmont
  - Stege Sanitary District
• Main Wastewater Treatment Plant (MWWTP) in Oakland
• Three wet weather facilities
• 15 pumping stations
  – 8 miles of force mains
• EBMUD owns and operates large interceptor sewers
  – 29 miles of gravity interceptors
  – Stormwater “not included”
• Communities own their collection systems
  – ~1,600 miles of pipe
Wastewater Collection and Treatment Capacity

- No concerns regarding **dry weather capacity**
  - Average dry weather flow = 50 MGD
  - Permitted dry weather capacity = 120 MGD

- Key concerns regarding **wet weather capacity**
  - Treatment capacity = 320 MGD
  - EBMUD interceptors receive ~725 MGD during peak storms
  - Requires EBMUD to operate wet weather facilities that only provide partial treatment
  - EBMUD is under a regulatory order to eliminate discharges from WWFs
Key Initiatives
Renewable Energy Production

- **WASTE**
- **BIOGAS**
- **ELECTRICITY**

100-120 trucked waste deliveries each day

Generation Capacity = 11 MW
EBMUD’s MWWTP is the first net-energy producer in North America

Percent of Plant Power Demand Met by On-Site Generation

FY14
140% of plant power demand
Avoided cost of electricity purchase = $2.8 million
Value of energy sold to Port of Oakland = $1.0 million
EBMUD is working with the East Bay communities to develop and implement a long-term regional solution

- Reduce inflow/infiltration of stormwater into wastewater collection system via cracks in pipes, damaged joints, illegal connections

**Key Focus Areas**

- Address aging infrastructure via sewer rehabilitation and replacement
- Inspect and replace private sewer laterals, if needed, at point of home sale or in coordination with trunk sewer repairs by communities
Wet Weather Inflow/Infiltration Diagram
• Wastewater Capital Improvement Program
  – 5-year: $175 million
  – 10-year: $350 million

• Key Program Areas
  – Interceptor Rehab (26%)
  – Plant Infrastructure (22%)
  – I/I Control (12%)
  – Odor Control (10%)
  – Concrete Rehab (10%)
Wastewater System
Financial Status

• FY15 Budget = $144 million
  – Capital = $46.8 million
  – Operating = $63.4 million
  – Debt Service = $34.3 million

• Rate Increases
  – FY14: 9.0%; FY15: 8.5%

• Excellent bond rating with stable outlook
Future Challenges
Nutrient Loading to SF Bay

- The resiliency of SF Bay to nutrient (nitrogen, phosphorus) loading is declining
- Most Bay Area agencies are not currently required to remove nutrients
- Implementing potential capital improvements at treatment plants may cost billions of dollars
  - Outstanding questions regarding condition and potential impairment of SF Bay
- Bay area wastewater agencies are working with regulatory agencies to implement a science-based approach to determining what actions are required
Future Challenges (cont’d)

• Odor control
• Biosolids management
• Aging infrastructure
• Workforce transition