

The Listening Dashboard

Driving Water Resilience with Data Analytics

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Stakeholder Engagement Studies

Primary benefits of stakeholder involvement:

- (a) establishing credibility,
- (b) anticipating controversy,
- (c) ensuring transparency and accountability,
- (d) improving relevance, and
- (e) enhancing quality.



Source: U.S. Health & Human Services, Agency for Healthcare Research and Quality (AHRQ), "[Defining the Benefits of Stakeholder Engagement in Systemic Reviews](#)," March 2014



Stakeholder Engagement Trends

Trend 1: Connectivity and Hyper Transparency

Trend 2: Individual Empowerment

Trend 3: Work Automation

Trend 4: Climate Change and Water Resources

Trend 5: Program Delivery Oversight



Source: Business for Social Responsibility (BSR) Whitepaper, “[The Future of Stakeholder Engagement](#),” April 2014



“Old Fashioned” Listening

- Interviews, focus groups, surveys
- Provide deeper insights into benefits and obstacles
- Provide ideas
- Provide stories
- Fosters buy-in and collaboration



Paperwork Reduction Act (PRA)

Surveys of 10 or more people require prior Office of Management and Budget (OMB) approval:

- Applies to federal agencies
- Requires an OMB application and Federal Register notice
- Generally takes 6+ months to gain approval



PRA Compliant Listening

1. A focus group with under 10 participants
2. Interviews with groups <10
3. Feedback gathered at conferences or events
4. Involving stakeholders in product development (Agile)
5. Stakeholder Advisory Groups
6. Automated monitoring tools, data analytics



Automated “Listening”

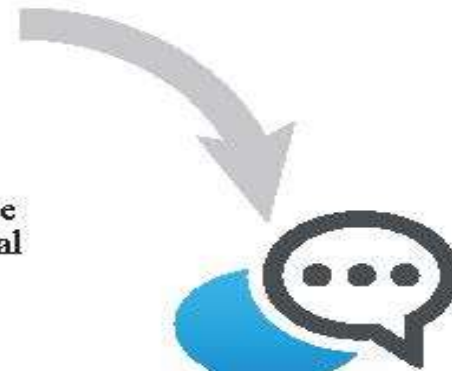
- Google Analytics, Web Trends or other web monitoring
- Social media monitoring
- Media/social media monitoring tools
- Usage stats from online databases
- eMail marketing data





1. PLAN

From mission, set goals. Define target stakeholders and potential partners. Develop messages, strategy and work plan.



2. CREATE

Set-up performance monitoring tool. Cultivate partners. Conduct listening sessions. Create materials. Develop lists and distribution channels.



3. IMPLEMENT

Distribute eNews, submit abstracts, present at conferences, conduct webinar, support/leverage partner outreach efforts.



4. MEASURE

Compare results from baseline (*web stats, emails subscribes/click-throughs, media/social media*) to track trends and measure outreach performance.



EPA Water Security Example

- Interviews with four groups:

1. Drinking/Waste Water National Associations
2. Large Utilities
3. Medium Utilities
4. Small Utilities

- Seeking insights into:

1. How best to communicate
2. Status of water/waste water disaster preparedness
3. Best practices and challenges/obstacles
4. Use of EPA information/tools and “wish-list” for future



Insights from Traditional Listening

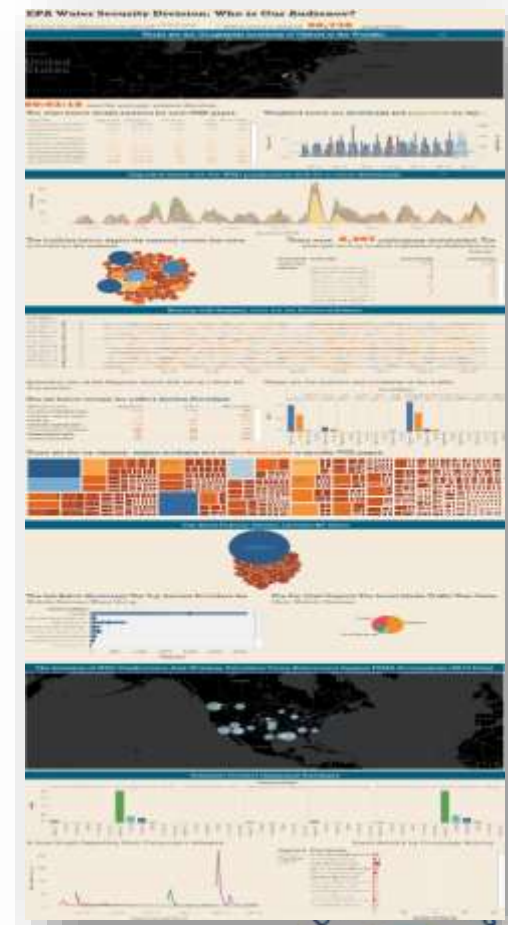
- **Large:** Well-prepared
- **Medium:** High-medium are well-prepared. Low-medium face capacity/resource constraints
- **Small:** Difficult to reach. Significant capacity/resource constraints.
- **eMail** is the preferred method to receive EPA communication.
- **Tool feedback:** Security concerns



EPA's "Listening Dashboard"

Datasets include:

- Google Analytics
- Constant Contact
- Conference Data
- Webinar Data
- FEMA Declarations
- Meltwater (media monitoring)



Insights from the Data Analytics

- High percentage of mobile users
- Gaps in outreach to high risk areas
- Timely and targeted emails get better results
- Outreach efforts are working



Test messages and prove value to leadership



Action Strategy

- Recruit Large/Medium utilities for best practices, as peer-to-peer “Ambassadors”
- **Focus on Small utilities:** go to them, cultivate partners
- Use email—but make it tailored and timely
- No USBs, limit tools w/data upload requirements
- CEUs for Webinars



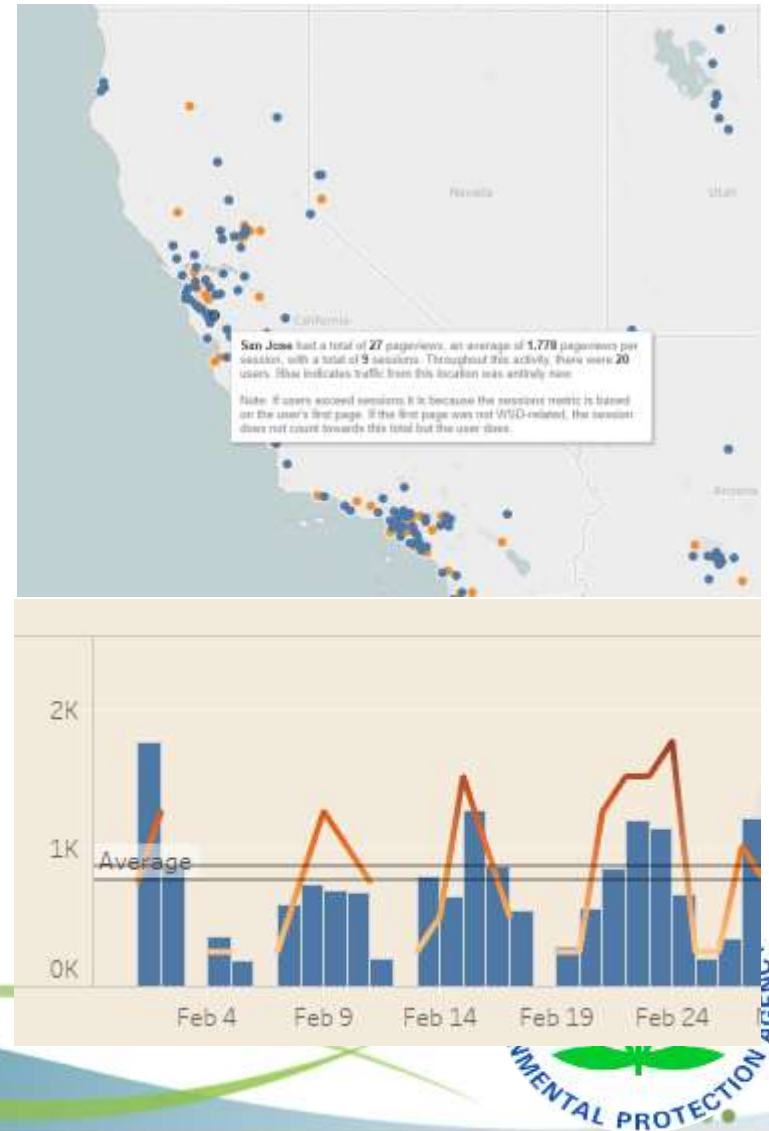
Northern CA Floods

Actions:

- Sent email with link to EPA resources to only affected utilities

Results:

- Increase in new visitors from affected area
- Uptick in downloads for both the Flood Resilience Guide and the Flyer



Flood Resilience Guide

FLOOD RESILIENCE

A Basic Guide for Water and Wastewater Utilities

Select a menu option below.

First time users should start with the Overview.

Overview



Approach



Mitigation Options



Pilot Project



Flood Resilience Guide

FLOOD RESILIENCE: A Basic Guide for Water and Wastewater Utilities. 

Approach to Flood Resilience



STEP 1
Understand the Threat of Flooding

STEP 2
Identify Vulnerable Assets & Determine Consequences

STEP 3
Identify & Evaluate Mitigation Measures

STEP 4
Develop Plan to Implement Mitigation Measures

STEP 1: UNDERSTAND THE THREAT OF FLOODING

Flooding depends on various factors including rainfall, topography, river-flow, drainage and tidal-surge. The threat of flooding is based on the likelihood that such a flooding event will occur. Learn how the Berwick Water Department (BWD) evaluated their threat of flooding from the video. Also, the Federal Emergency Management Agency (FEMA) is a resource to help you. FEMA produces maps of a "100-year flood" (a flood event that has a one percent chance of occurring in a given year) and a more catastrophic "500-year flood" (a flood event that has a two tenths of a percent chance of occurring in a given year). Click on the Step 1 worksheet icon below so that you can document the flooding threat and obtain FEMA Flood Maps.



Click on the image to view the video.

STEP 1 Worksheet 

[Click here to document the threat of flooding to your utility.](#)



Key Take-aways

1. Overall mission/goal(s) drives stakeholder engagement.
2. You cannot control but you can influence the conversation.
3. Your outreach budget should be $\geq 50\%$ listening
4. For best results, use both old fashion listening *and* data analytics
5. Extend your limited budget with win-win partnerships
6. Use “listening” tools and data analytics to stay abreast of 24x7 issues and monitor/measure outreach performance.



Questions?

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