

## The Private Well Conference: A National Workshop on Private Well Issues



Steve Wilson, Jennifer Wilson & Katie Buckley  
Illinois State Water Survey  
at the University of Illinois

The Private Well Class is Sponsored, Funded, & Supported By  
The Rural Community Assistance Partnership & USEPA

## RCAP's Private Well Program

- A national outreach and well owner education program.
- Being implemented through the Rural Community Assistance Partnership (RCAP) and it's 6 regional affiliates to support private well owners.
- RCAP Partners include [www.PrivateWellClass.org](http://www.PrivateWellClass.org) at the University of Illinois, NEHA, NGWA, and the WSC and 5 state well education programs (coop extension).



## RCAP's Private Well Program

- Includes both Online and Boots on the Ground Efforts.
  - U of IL Private Well Class – online lessons, webinars, videos, podcasts, newsletter, phone and email support.
  - RCAP – face to face workshops for well owners, sanitarians, and other stakeholders; one-on-one well vulnerability assessments (over 1,000 so far).
  - NEHA – online class for sanitarians, support for PWC.
  - NGWA – WellOwner.org, newsletter, webinars, videos, financial information, and more.
  - Webinars to support the lessons and take questions.
  - WSC – hotline, factsheets, well owner manual
  - Extension – workshops, sampling in 5 states

**RCAP Rural Community Assistance Partnership**  
Practical solutions for improving rural communities

**Western RCAP**  
Rural Community Assistance Corporation  
(916) 447-2854  
[www.rcac.org](http://www.rcac.org)

**Midwest RCAP**  
Midwest Assistance Program  
(852) 756-4334  
[www.map-inc.org](http://www.map-inc.org)

**Southern RCAP**  
Communities Unlimited  
(479) 443-2700  
[www.communitiesu.org](http://www.communitiesu.org)

**Northeast RCAP**  
RCAP Solutions  
(800) 488-1969  
[www.rcapsolutions.org](http://www.rcapsolutions.org)

**Great Lakes RCAP**  
WSOS Community Action Commission  
(800) 775-9767  
[www.glrcap.org](http://www.glrcap.org)

**Southeast RCAP**  
Southeast Rural Community Assistance Project  
(866) 928-3731  
[www.southeastrcap.org](http://www.southeastrcap.org)

**RCAP National Office**  
1701 K St. NW, Suite 700  
Washington, DC 20006  
(800) 321-7227  
[www.rcap.org](http://www.rcap.org) | [info@rcap.org](mailto:info@rcap.org)

## CDC Survey

- Evaluate well owner education and outreach programs from around the country. (Why don't well owners test?)
- Surveyed 93 programs to gather information on implementation, methods, results and logistics.
- Qualitative look at challenges, experiences, lessons learned and suggested best practices.

## Challenges

- Lack of funding for private well programs.
- Differences in Construction Codes/ Rules:
  - What is a private well.
  - Permitting and well log submittal.
  - New Jersey vs Pennsylvania.
  - Especially in enforcing what rules they have.
- Not a lot of training available for County/Local Health Departments on private well issues.
- Has led to mostly local approaches to support well owners in many parts of the country.

## A Lot Is Going On

- We learned about programs that are active at the state and local level, some unique with great ideas.
- Also learned about the challenges everyone is facing, and realized sharing solutions and ideas would be a powerful way to support each other.
- Cliff Treysen said once to me (and it stuck), "There are so many private wells, and well owners are so hard to reach, that there is plenty of room for all of our efforts. (which is why we all submitted one proposal to EPA together, rather than competing for funding.)"
- We realized we needed a workshop to bring everyone together to share challenges, ideas, successes, and develop partnerships.

## We Also Had A Great Model



### 14th Annual EPA Drinking Water Workshop

Small Systems Challenges and Solutions

August 22-24, 2017 · Hilton Netherland Plaza · Cincinnati, Ohio

Sponsored by the U.S. Environmental Protection Agency (EPA)  
in partnership with the Association of State Drinking Water Administrators (ASDWA)

#### Agenda

Tuesday, August 22, 2017	
7:45 am	Registration (Entrance to Pavilion Ballroom)
8:30 am – 10:00 am	Pavilion Ballroom <b>SESSION 1: WELCOME AND KEYNOTES</b> Moderator: Thomas Speeth, EPA's Office of Research and Development (EPA-ORD)
8:30 am	<b>Agenda Review and Logistics</b> Thomas Speeth, Michelle Latham, Darren Lytle, and Thomas Sorg (Workshop Organizers), EPA-ORD <b>Year in Review and a Look Ahead</b> Cynthia Sonich-Mullin, Director of EPA-ORD, National Risk Management Research Laboratory
9:15 am	<b>Agency Priorities and Introduction of Keynote Speaker</b> Richard Yamada, Deputy Assistant Administrator for EPA-ORD
9:30 am	<b>Keynote Address</b> Craig Butler, Ohio EPA Director and The Environmental Council of States (ECOS) Committee Chair for Water and Region 5 Representative
10:00 am	Break

## Why EPA Workshop Has Been So Successful

- They pick the topics and invite the speakers they want
- They pay for each state to send 1-2 people who are working with small systems.
- Mostly a single track, with some breakouts, panels, and time to learn from experts.
- Have expanded breaks and activities to encourage interaction.
- Market and target professionals who are all involved with small systems.
- Let anyone come for free and provide conference materials.

## The Private Well Conference

2017 NATIONAL STAKEHOLDER MEETING

MAY 23-25, 2017  
Champaign, IL

Many public health and groundwater experts who work with private well owners do so on a local or regional scale, providing assistance and education directly to consumers.

### The Private Well Conference

Tuesday, May 23, 2017

7:45 am	Registration (Hyatt Place – Basement Foyer)
8:15 am	Welcome and Introduction Steve Wilson, Illinois State Water Survey
<b>Session 1 – Private Well Challenges &amp; Opportunities</b>	
8:30 am	Social Dimensions of Private Well Testing: Why Don't People Test their Well Water? Barbara Liukkonen, University of Minnesota Water Resources Center (retired)
9:00 am	Private Well Owner Risk Perceptions and Protective Behaviors after Receiving an Elevated Arsenic Test Result Deanna Scher and Frieda von Quaken, Minnesota Department of Health

- Free to attend
- Paid speaker travel for many
- Provided slides to attendees
- Recorded presentations
- 2.5 days
- Drillers panel
- Lightning talks
- Encouraged interaction
  - Long breaks
  - Time for questions
  - Interests in Binder

**Harvey, David**  
Department of Sanitation Facilities Construction  
Indian Health Service  
Deputy Director  
5600 Fishers Ln.  
RM 10N13  
Rockville, MD 20857  
(301) 443-0159  
david.harvey@ihs.gov

*CAPT David Harvey is the Deputy Director of the Division of Sanitation Facility Construction (DSFC) within the Indian Health Service. The DSFC plans, designs and constructs private well installations along with other sanitation facilities that serve nearly 400,000 American Indian and Alaska Native homes in 38 states. In addition the IHS provides technical assistance to help tribal homeowners and utilities operate and maintain the sanitation facilities provided.*

**Henrich, David**  
Bergerson Caswell, Inc.  
Vice President  
5115 Industrial Street  
Maple Plain, MN 55359  
(763) 479-3121  
david@bergersoncaswell.com

*We are a full service water well contractor in MN, serving municipal, residential and industrial water wells. I am also the president-elect of the National Groundwater Association.*

**Hollenbeck, Katie**  
Illinois Water Resources Center  
Water Resources Outreach Specialist  
1101 West Peabody Dr.  
NSRC 038, MC-635  
Urbana, IL 61801  
(217) 244-6239  
kholles@illinois.edu

*I work for the Private Well Class to help reach well owners on a national scale. We develop content and educate private well homeowners on how to care for their private well by facilitating webinars, hosting a 10 week online course, producing blogs, videos, and a podcast and have a variety of other multimedia vehicles.*

**lhms, Ann**  
Criterion Water Labs, LLC  
Lab Manager  
329 East Firmin  
Kokomo, IN 46902  
(765) 438-4995  
water@criterionwaterlabs.com

*We host an annual open house for the lab and a radio program. The County Health Department refers customers to us with questions and testing needs. We link homeowners with inspectors and well drillers. We work with mortgage and refinancing customers to meet their requirement for well testing.*

**Davis, Ginger**  
Hamilton County Soil and Water Conservation  
District  
Conservation Administrator  
1717 Pleasant St.  
Suite 100  
Noblesville, IN 46060  
(317) 773-2181  
Ginger.Davis@hamiltoncounty.in.gov

*We provide resources and conservation plans for well owners, provide cost share for abandonment of wells, provide testing services and reports based on results.*

**Davis, Tanya**  
Indian Health Service  
District Engineer  
122 East Seneca St.  
Manlius, NY 13104  
(315) 380-1768  
tanya.davis@ihs.gov

*I oversee field engineers and technicians who work directly with homeowners.*

**Dennis, Kara**  
Minnesota Department of Health  
Hydrologist

**Dietzenbach, Debbie**  
Fayette County Environmental Health  
Administrative Assistant  
114 North Vine St.  
P.O. Box 269  
West Union, IA 52175  
(563) 422-3767  
ddietz@co.fayette.ia.us

*We are also a local health department. We permit and regulate private water well placement. We work with licensed well drillers and homeowners to educate on private water wells. We collect water samples and test for bacteria, nitrate and arsenic. We also work with homeowners and licensed contractors to abandon old wells and renovate wells.*

**DiPippo, Peter**  
Rhode Island Department of Health  
Private Well Program Manager  
3 Capitol Hill  
Providence, RI 02908  
(401) 222-7781  
peter.dipippo@health.ri.gov

*I work with private well owners assisting them in testing, treatment, and regulatory compliance for new and existing wells before, during, and after real estate transactions.*

## What We Wanted To Happen

- Expand the national dialogue we were creating with the RCAP private well program.
- Provide an opportunity for practitioners, those working with well owners directly, to share their experience, and develop relationships with like-minded professionals.
- Decided that if we brought 20-30 experienced professionals in to speak, even if no one came, we would have a great workshop, so we paid their travel expenses.
- Wanted it to be free to attend to attract those w/o a travel budget. (had a number from IL and IN who drove in.)
- Start new collaborations, opportunities to learn from each other, leave wanting more and excited to get to it.

## Role As Facilitator

- We know there is a lot of great work going on around the country. We wanted to bring those folks with a passion of supporting private well owners together.
- Help develop non-traditional partnerships (we are convinced drilling/GW professionals and sanitarians need each other to create highly successful efforts.)
- Introduce private well practitioners to RCAP and their efforts around the country.
- Elevate common goals we have related to educating private well owners. (raise the bar on expectations nationally)

## Audience and Focus

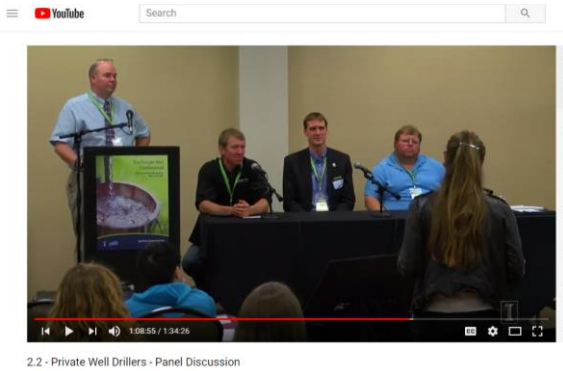
- Sanitarians, groundwater professionals, extension, drillers, regulators, labs, educators (all were there)
- Set up conference to step through what we have learned from the Private Well Class Program.
  - Challenges and Opportunities – about wells and well owners, the same/similar issues in many areas.
  - Perspectives – meaning view of well owner, vs regulator, vs educator, vs driller, why each is important for the other to understand.
  - Innovations – what are some of the cool ideas and things some have learned and others need to know
  - Partnerships – a full day on how we can go farther together and the role each of us can play.

The screenshot shows a YouTube video player. The video title is "1.4 - Kelsey Pieper - What Practitioners Need to Know about Lead in Well Water". The video has 47 views. The slide content includes a diagram titled "WHERE IS THE LEAD COMING FROM?" showing "Premise plumbing components" with arrows indicating flow from a "Supply to house" into a house, and from a well into a house. The video player interface includes a search bar, play/pause button, and a "SUBSCRIBE" button.

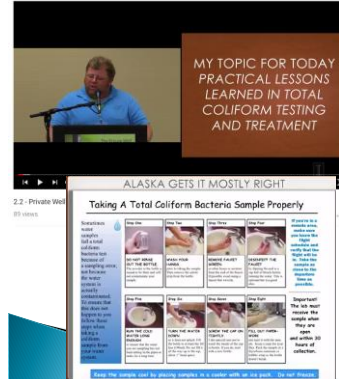
## Challenge – Lead, Arsenic

- Many older homes with lead premise plumbing
  - Complicated, education is difficult
  - Treatment can affect corrosivity
  - Galvanized drop pipe and premise plumbing
  - Corrosivity of natural groundwater
- Arsenic is well known and understood problem, yet
  - Many well owners don't seem that concerned
  - Sometimes have no choice.

## Perspectives – Drillers Panel



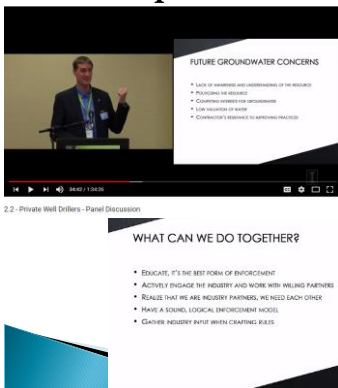
## Perspectives – Drillers Panel



Mark Layten – Kickapoo Drilling - Coliform Testing

- Why there are so many bad tests today
- The fact that drillers are doing so much more than drilling (sampling, treatment, etc.)
- Explained procedure

## Perspectives – Drillers Panel



- David Henrich – Bergerson-Caswell & NGWA
- Discussed his public service, NGWA, relationship with state.
  - Drillers are affected by so many rules.
  - Future GW issues.
  - How to elevate the industry, knowledge, and well owner engagement by working together.

## Perspectives - Drillers Panel



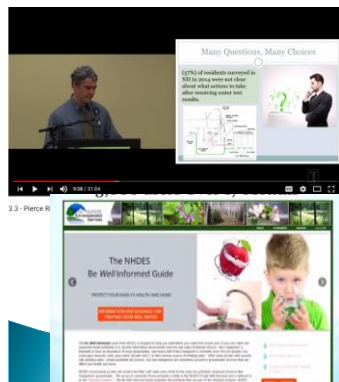
Corwin Gingerich – Gingerich Well Drilling

- Talked about relationships, and why good drillers are good colleagues with public health and regulators.
- Family business, believes in community.
- Volunteers, and willing to share resources.

## Drillers Panel

- Point was to provide the industry an opportunity to engage participants who are regulators and public health practitioners.
- Not only to share their perspective, but to help them understand how valuable drillers can be in their program.
- And a chance for the audience to ask questions.
  - Discussed what is guaranteed (products & workmanship), learned that quality of the driller certainly matters
  - Shock chlorination
    - Level of chlorine
    - What procedure to use
  - Regulations that don't make sense or too difficult
    - Sometimes hurt the “good guys”, others ignore
    - Those that don't follow the rules give all a bad name
  - Educating well owners, drillers role

## Innovation – Be Well Informed Tool



Pierce Rigrod – NH DES

- Provides well owner with evaluation of water sample.
- Recommends treatment based on results.
- Provides guidance
- Offered code, since conference 6 states have asked for it and are developing similar sites.

## Innovation Partnerships – Lane Co.



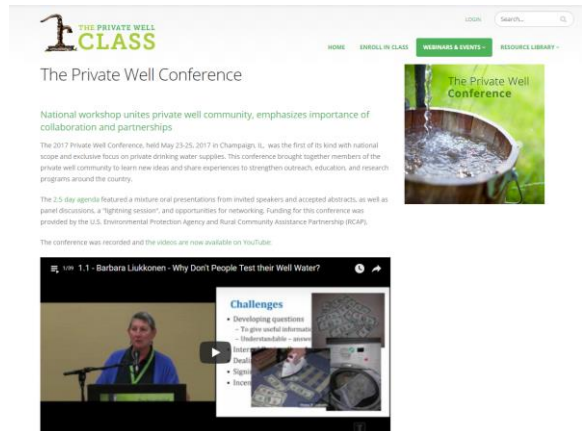
- Sarah Puls –  
Lane County Oregon
- Wrote grant to get testing equipment.
  - Provided to 2 high schools in county.
  - Do testing, send out kits, send out letters.
  - Learning experience for science students.

## Successes

- Evaluations were phenomenal
  - Best conference I have EVER been to.
  - Every presentation was relevant to what I do.
  - I learned so much, and made excellent contacts.
  - Can't wait for the next one.
- Lots of relationships and partnerships started.
  - VT met FL and TX folks at conference
  - 1100 samples in TX
  - 600 samples in FL
  - We were called to facilitate with state agency
- Most attendees said that they had no idea so much was going on around the country.

## Biggest Takeaway - Partnerships

- So many wells, well issues, and uninformed well owners.
- We all have to be engaged in providing solutions to raise public awareness of private well issues. It will:
  - Elevate your business
  - Earn you respect locally
  - Help educate regulators and educators
  - Provide advertising for your business.
- What you can do
  - Contact local extension or health department and offer to present at public meetings for well owners.
  - Be a resource to answer well owner questions.
  - Pass out materials (see me for info)



## Questions



Thanks for attending!

