

Approved Minutes of the Technical Advisory Committee Meeting
June 21, 2011

Attendees: Roger Thompson Gail Center
 Kim Greenwood Steve Revell
 Denise Johnson-Terk Justin Willis
 Bruce Douglas Scott Stewart
 Bill Zabiloski Ernest Christianson
 John Beauchamp Rodney Pingree

Scheduled meetings:

July 19, 2011 1-4 PM Lincoln Room, Osgood Building

Agenda:

The agenda was reviewed and a topic added related to the information John has been gathering related to the possible accumulation of radioactivity in water treatment system media.

Minutes:

The draft minutes of the May 24, 2011 meeting were reviewed. A reference to the Rules related to groundwater and public trust issues was corrected to read “Groundwater Protection Rule and Strategies.”

S.77:

Ernie gave an update on the veto of S.77 (a bill requiring water quality testing when a new water source is constructed). Ernie said that it was a surprise that the bill was vetoed as the people he had talked to were supportive of the bill. Kim said that most Realtors supported the bill.

Gail noted that a study of arsenic concentrations of drilled wells in the Taconic Mountains (a major range of peaks that extend from southwestern Vermont northward to Brandon) was done by Jon Kim, a geologist with the Vermont Geological Survey, in cooperation with study at Middlebury College. 25% of the wells tested were found to have concentrations of more than 10 PPB which is the current Federal Drinking Water Standard. Gail said that Jon does a very good presentation of this study to interested groups. This study may have been one reason why the legislature passed S.77 because the legislation would have resulted in a statewide data base that could have been reviewed to determine if there are certain geologic settings where more detailed water quality testing would be important.

Water Supply Rule Update:

Ernie said that he sent Scott a draft design flow table having added his updates for marinas and deli/catering operations. He also proposed changes for schools with high schools at 12 GPD/Person, middle schools at 9 GPD/Person, and elementary schools at 8 GPD/Person all of which were based on not having gyms, showers, or food service. He also proposed adding a category for skating rinks with design flows for participants and for spectators. He also suggested changes for veterinary clinics. Ernie will send a copy of the draft to the TAC.

Steve asked about design flows for gas stations. Ernie said he proposed 50 GPD/per pump with two hoses per pump. Ernie also said that the proposal clarifies that for institutional housing and hospitals, the per bed space design flow includes employees and support services. Ernie also updated design flows for stores and supermarkets with and without meat, fish, and bakery departments. Roger suggested that some flow meter information might be collected for large stores as they are mostly on municipal water systems. Ernie said that the Commissioner and Dick Valentinetti suggested a partnership with UVM which could result in interns collecting desired information.

Ernie said he would circulate to TAC draft documents on well casing storage calculations and isolation distances in addition to the one on design flows.

Wetland Issues:

Ernie has sent a draft MOU to Alan Quackenbush that outlines the process of designing replacement wastewater systems when a wetland or wetland buffer might be affected by the replacement system. Alan has not responded yet to Ernie's follow-up e-mail. Ernie will check on this.

UIC Rule Update:

Ernie is working on a list of uses that might qualify for a conditional use exemption. Ernie will be talking with Scott about standing column geothermal wells with large flows. Ernie will send a draft list of possible conditional exemptions to the TAC. There are concerns about how to cover floor drains in residential garages. Ernie will also be talking with people at the Department of Agriculture, at the Water Supply Division, and at the Waste Management Division. Kim said that various interest groups would want to have input as there would be some types of wells that they are particularly concerned about and would want to have a chance to comment on prior to approval. Ernie asked the group if they had suggestions about wells that might be considered for a conditional exemption. He also asked if all conditionally exempt wells should be registered with the Agency. The consensus was that not all wells should be registered and the decision would be category by category.

Radionuclides:

Gail gave an update on changes at the Health Department. She is now working for Dr. Irwin who is a radiation expert. Dr. Irwin is willing to work on the issues related to concentration of radiation in water treatment system media which may be an issue for both public water systems and individual residential systems. Gail asked if the licensed operators of public systems can be contacted. Steve said he works for two public water systems.

John said that he had contacted Mr. Lowry, a consultant in Maine who designs water treatment systems with an e-mailed list of questions. The answers were that gamma radiation is minimal and is not removed by backwashing carbon and BIRM filters when treating for radon and radium. It was also noted that high levels of manganese might tend to collect radium in the treatment system.

Next Meeting:

Work on soil identification/perc testing questions and radionuclides.

Items prioritized for discussion with high, low, and medium ranking

1. Soil identification vs. perc test **medium**
2. Curtain drain with presumption of effectiveness **high**
3. Revisions to desktop hydro chart **medium**
4. Minimum amount of sand under a mound **high**
5. Grandfathered design flow and conversion of use policy **high**
6. Updating of design flow chart **high**
7. Water Supply Rule update **high**
8. Seasonal High Water Table determination for performance based systems **high**

Executive Committee

Steve Revell, Ernest Christianson, Bruce Douglas, Roger Thompson
Alternates – Chris Thompson, Spencer Harris, Claude Chevalier, Craig Heindel

Subcommittees

Hydrogeology - Craig Heindel, Dave Cotton and Steve Revell.

S.77 Issues – Anne Whiteley, Ernie Christianson, Roger Thompson, John Beauchamp,
Gail Center, Chris Thompson

UIC Rules and Geothermal Wells - Craig Heindel, Steve Revell, Roger Thompson, Ernie Christianson, Scott Stewart, Rodney Pingree, Kim Greenwood

SHWT Monitoring - Craig Heindel, Steve Revell, Roger Thompson, Ernie Christianson, Bill Zabiloski, Dan Wilcox

UIC Rules and Disposal of Wastewater from Water Treatment Systems –
John Beauchamp, Gary Adams, Roger Thompson, Ernie Christianson,
Gail Center, Jeff Fehrs