Microbiology Expert Committee (MEC)
Meeting Summary

October 8, 2013

1. Roll Call and Minutes:

Robin Cook, Chair, called the meeting to order at 1:30pm EST. Attendance is recorded in Attachment A – there were 8 members present. Associate Members present: Carl Kircher.

The August 7, 2013 minutes were reviewed. Elizabeth made a motion to accept the minutes. Deb seconded the motion and it was unanimously approved.

Associate members need to let Robin and Ilona know they own a copy of ISO 17025 so they can be included in distributions of the draft working standard updates.

2. Charter

Robin sent the charter with terms listed for everyone:

Robin Cook, Chair	Laboratory	End of Term	Jan 2016
Donna Ruokonen	Laboratory	End of Term	Jan 2016
Patsy Root	Other	End of Term	Jan 2016
Elizabeth Turner	Laboratory	End of Term	Jan 2015
Po Chang	AB	End of Term	Jan 2014
Karla Ziegelmann-Fjeld	Other	End of Term	Jan 2014
Mary Robinson	AB	End of Term	Jan 2014
Colin Fricker	Laboratory	End of Term	Jan 2015
Dwayne Burkholder	AB	End of Term	Jan 2016
Deb Waller	AB	End of Term	Jan 2016

Everyone with fine with the terms listed, so the charter will be updated with this information.

Gary Yakub was contacted for additional information so he can be considered for future membership on the committee.

3. Updates

Ilona commented that the committee needs to think about when they want to do their first feedback webinar with stakeholders. This meeting will help the committee get input on concerns regarding the standard. Committee members would also like to solicit feedback in other ways. *(Addition: SOP 2-100, Section 5.1: Any TNI member or any member of the public may provide written input to a committee. Committees will consider all written comments and suggestions and will notify the correspondents of the disposition of their comments. At the initiation of a project to develop or revise a standard, notification of such activity will be announced on the TNI website, to allow for participation by all directly and materially affected persons. The Expert Committees also actively seek input from those stakeholder groups who may subsequently adopt, use, or be accredited to the standard. Notification will be made by e-mail to the respective Chairs or stakeholder representatives on the intent to prepare or revise the module or volume with a request for their stated interest in further participation within 30 days of said e-mail notification.*

The committee should be working with the 2012 version of the standard received from Paul Junio. The committee's goal should be to have the standard updated in 2015. There is a lot that needs to be done to meet the deadline – stakeholder meeting, working draft standard, vote, responding, interim standard, reviews, etc …

4. Standard Review

Robin would like to begin work on the standard by looking at areas of interest and working through them first. The new language will be inserted into the draft standard and then the committee will start working through the standard line by line.

<u>Chlorine</u>

Robin forwarded the e-mail Elizabeth turned in with changes to Section 1.7.5 of the standard (e-mail – 10/8/13). These are changes to the 2009 standard, but will be easy to convert to 2012.

2009-Section 1.7.5 b): Change: Laboratories that receive samples from ~~potable~~ chlorinated water sources (including source water) that have a demonstrated history of acceptable preservation for each source may eliminate the chlorine residual check if: …

It should be all sources and she introduced how it could be eliminated instead of being reduced to once per month. Robin pulled up the 20012 language and the committee worked on the actual language changes on that document.

Deb confirmed that everyone was in agreement that even if chlorine residual does not need to be reported, the labs still check each sample bottle – especially with drinking water. There was agreement.

Robin asked if people want to go back to what was in the 2003 standard. It states that additional chlorine residual check are not required if the following conditions are met. In the 2002 standard, it was required for all.

Deb is concerned about eliminating the check. Chlorine residual has to be checked with drinking water.

Elizabeth feels there are other checks in place and the check should be eliminated under the circumstances listed in the standard – did the containers come from the lab doing the analysis, was there sufficient sodium thiosulfate in each container before sampling, one sample from each batch prepared or lot purchased of the containers is checked and chlorine residual is checked in the field and documented with the sample submission. Since these checks are done, why are the additional monthly checks now done? The comment was a concern to eliminate cheating, but others felt the lab is not the ethics police. If all the items listed in 1.7.5 b) are met, the lab should not have to do the additional check. This is a lot of additional work for no additional benefit.

Originally the intent was that the sample being analyzed is the one that is being checked for chlorine residual, but now others take a split sample for the check. There are additional costs doing it this way. Checking the actual sample introduces potential contamination.

Robin had an incidence where she had an operator spiking the sample with chlorine. Even given this, she is OK with removing the requirement.

It is important that the check to ensure the bottles came from the lab doing the analysis is critical. It would not work for the client to supply unknown bottles.

Most everyone likes the 2003 language, but with the addition of the bottles coming from the lab performing the analysis. This way you don't need to address demonstrated history and what that means.

Robin pointed out that there is some language in the 2003 about chlorinated water system. Needs to be changed to chlorinated sources.

Robin noted that she did not have a problem with someone using their own bottles if they could demonstrate to her that the chlorine checks required were done or they bring a couple of vials from the lot the samples are from and they are still sealed.

Carl noted that Florida may still require the checks as an additional requirement. It was pointed out that the TNI standard does state that the lab has to follow more stringent

requirements if the lab is required to follow other program requirements that are more stringent. The lab has to follow the permits.

Carl pointed out that he often does not see the chlorine residual check in the field documented. This should not be a problem because then the lab cannot eliminate the check as described in 1.7.5 b) if it is not checked and recorded.

Deb noted that a lab can contact EPA and see if there is any guidance that would apply for labs across regions. Michella Karapondo may be a resource.

Carl asked if Ozone and Bromine preservative would be any different than chlorine. It would need to be looked at to see if this really an option to be used. Robin commented that you might see Ozone or UV disinfection, but you can't test for UV or Ozone in the lab. There is no residual. The only one that should be further researched is bromine. This is definitely possible for wastewater. There is such a thing as residual bromine. Research is showing this to be an issue for swimming pools, cooling towers and food preparation programs. See 40 CFR 180.59 for the food program. This could be picked up with the DPD test. Deb reminded everyone that the standard only discusses chorine.

Patsy was asked if the bottles her company provides with a certificate is relevant to bromine too. She would need to check. She does not think customers are asked for it. Deb reminded everyone that not all states accept the certificates.

Deb will do some homework on bromine and then the committee can decide whether anything needs to be done. This is really only an issue for wastewater. It is not supposed to be used as per the Drinking Water Certification requirements.

There may also be an issue with people who use perchloric acid and hydrogen peroxide. Where do you draw the line? Dwayne reminded everyone that the standard is discussing the use of sodium thiosulfate. Is the preservation effective? Does it neutralize bromine? Carl thinks it does because it is the same oxidizing agent. This was confirmed in the literature, so this should not be an issue. Deb will provide anything she finds before the next meeting if she finds anything of concern.

After the discussion above, final wording was agreed to for section 1.7.5 b):

> b) Microbiological samples from known chlorinated sources (such as wastewater effluent), unknown sources where chlorine usage is suspected (such a new client or a new source) and all potable water sources supplies (including source water) shall be checked for absence of chlorine residual in the laboratory unless all of the following conditions are met:
>
> i) the laboratory can show that the received sample containers are from their laboratory, or have been appropriately tested and documented;

ii) sufficient sodium thiosulfate was in each container before sample collection to neutralize at minimum 5 mg/l of chlorine for drinking water and 15 mg/l of chlorine for wastewater samples;

iii) one container from each batch of laboratory prepared containers or lot of purchased ready-to-use containers is checked to ensure efficacy of the sodium thiosulfate to 5 mg/l chlorine or 15 mg/l chlorine as appropriate and the check is documented; and

iv) chlorine residual is checked in the field and actual concentration is documented with sample submission.

In Use

Deb is working on some language regarding " in use". Deb sent a copy of a presentation that takes care of this issue to Robin. The only time you need to be checking incubators or water baths is when you have samples being tested.

Autoclaves and Sterilizing Ovens

Robin did some research on the requirements differences between autoclaves and sterilizing ovens. She looked at standard methods and the EPA certification manual. They are treated differently. Deb and Carl thought the standard requires a monthly check with appropriate bio indicators whether it is an autoclave or an oven. The oven is really used only for cleaning glassware and pipets. Elizabeth would like to use temperature sensitive tape for the oven items too. Po asked if anyone has tried to use the tape in the oven? Does it work? Deb looked online and there is a tape available.

5. Action Items

A summary of action items can be found in Attachment B. The action items were reviewed and updated.

6. New Business

Continue to review the standard and look for opportunities for improvement. Items that are in yellow were changed in the standard before the committee received it. Robin will be using a different color for the committee's changes.

7. Next Meeting and Close

The next meeting will be scheduled by e-mail, but should be the second Tuesday of the month at 1:30pm EST.

A summary of action items and backburner/reminder items can be found in Attachment B and C.

A motion to dismiss the meeting was made by Elizabeth and unanimously approved. The meeting ended at 3:05pm EST.

Attachment A
Participants
Microbiology Expert Committee (MEC)

Members	Affiliation	Balance	Contact Information	
Robin Cook (Chair) **Present**	City of Daytona Beach EML	Lab	(386)671-8885	cookr@codb.us
Patsy Root (Vice-chair) **Present**	IDEXX Laboratories, Inc	Other	(207)556-8947	patsy-root@idexx.com
Karla Ziegelmann-Fjeld **Absent**	Microbiologics, Inc	Other		kfjeld@microbiologics.com
Donna Ruokonen **Present**	Microbac Laboratories, Inc	Lab	(219)769-8378 Ext 110	druokonen@microbac.com
Colin Fricker **Absent**	Analytical Services, Inc	Lab		colinfricker@aol.com
Deb Waller **Present**	NJ DEP	AB	(609)984-7732	debra.waller@dep.state.nj.us
Dwayne Burkholder **Present**	Pennsylvania DEP	AB	(717)346-8213	dburkholde@pa.gov
Mary Robinson **Present**	Indiana State DOH	AB	(317)921-5523	mrobinson@isdh.in.gov
Elizabeth Turner **Present**	North Texas Municipal Water District	Lab	(972)442-5405 Ext 535	eturner@ntmwd.com
Po Chang **Present**	Texas Commission on Environmental Quality	AB	(512)239-4876	Po.chang@tceq.texas.gov
Ilona Taunton (Program Administrator) **Present**	The NELAC Institute	n/a	(828)712-9242	Ilona.taunton@nelac-institute.org

Attachment B

Action Items – MEC

	Action Item	Who	Expected Completion	Actual Completion
1	Review Method Codes and send comments to Robin for Dan Hickman.	Deb	TBD	
4	Review Handbook and Method Codes before next meeting.	ALL	5/7/13	Handbook Complete.
10	Update language regarding chlorine checks in V1M2: Section 1.7.5 b).	Elizabeth	Next Meeting	Complete
11	The issue of how to recertify media will be looked at by Colin.	Colin	January Meeting	He will be working on it during the holidays and getting input.
12	Research possible effects of using bromine and whether it needs to somehow be included in the standard. Does not look like it.	Deb	November Meeting	
13				
14				

Attachment C

Backburner / Reminders – MEC

	Item	Meeting Reference	Comments
1	Update charter in October 2013	n/a	