Agriculture Workgroup (AgWG)

November 16th, 2017 9:00 AM – 12:00 PM AgWG Conference Call Meeting Summary

Meeting materials: http://www.chesapeakebay.net/groups/group/agriculture_workgroup

Actions and Decisions:

<u>Decision</u>: The AgWG approved the recommended nominations for the Nursery Capture and Reuse EPEG. <u>Decision</u>: The AgWG agreed to hold a face-to-face meeting in February, and to continue holding their monthly meetings on the 3rd Thursday of every month.

Welcome, introductions, roll-call, review meeting minutes

Workgroup Chairs

Meeting minutes from the October 19th Conference Call were approved.

BMP Expert Panel Update

T. Sexton, R. Bryant

Chairs and coordinators of on-going AgWG BMP Expert Panels provided updates on their work: Tim Sexton, VA DCR, will provide an update on the Cropland Irrigation Panel and Ray Bryant, ARS, will provide an update on the Agricultural Ditch Management Panel.

Cropland Irrigation Panel:

The panel has agreed to meet again in January, and begin drafting their report.

Ditch Management Panel:

- Jim Cropper: Subsurface drains are generally used for lowering water tables, and I'm wondering if there are any modifications to tile drains for future installations that might reduce P flow into them?
 - Ray Bryant: I have a field trial where we put gypsum within the backfill over some new tile
 drains. One of the reasons that I put subsurface drains in with blind inlets is that currently, a
 blind inlet is a gravel bed, but there's no reason why we couldn't try putting some P-sorbing
 material in that gravel bed that could help trap.
- Matt Johnston asked about how this group was or was not incorporating stormwater practices. Ray
 Bryant noted that some of the ideas coming out of stormwater management could perhaps be
 considered for application to agricultural drainages as well.

EPEG Update Loretta Collins

Loretta Collins, UMD, updated the Workgroup on the progress of the Livestock and Poultry Mortality Management Expert Panel Establishment Group (EPEG), established on the October 19th Conference Call.

Discussion:

 Matt Johnston: In order to accomplish option 1 here, we'd have to consider everything under option 2. So the idea from those conversations would be that option 2 could be put into a Phase 7 model, and Option 1 could be incorporated in a milestone period.

- Paul Bredwell: You could probably take burial/landfill off of the list for this, at least from the poultry perspective.
 - Loretta Collins: Certainly for poultry, but we are also talking about other species, such as cattle, which are more often subject to the burial. Then we have to ask if the juice be worth the squeeze? But we need some data to figure that out.
- Tim Sexton: You could probably add rendering to this.
 - Paul Bredwell: By and large, freezer numbers are probably going to equate with rendering for poultry.
 - Matt Johnston: We pick up rendering numbers through NPDES permits, but these are all open questions for how we quantify that.
 - Tim Sexton indicated that the rendering plants in VA that he knows about do not have NPDES permits, so they would not show up in the point sources in the model.

Nursery Capture and Reuse EPEG Panel

Loretta Collins

Nominations for the Nursery Capture and Reuse Expert Panel Establishment Group (EPEG) were requested following the September AgWG Face-to-Face meeting.

Discussion:

• Frank Coale motioned to approve the membership; seconded by Chris Brosch.

<u>Decision</u>: The AgWG approved the recommended nominations for the Nursery Capture and Reuse EPEG.

Report on Swine and Turkey Population Data

M. Estienne, T. Sexton

Mark Estienne, VT, and Tim Sexton, Virginia DRC, presented two VT-developed data analysis reports evaluating annual populations of commercial swine and turkey production in Virginia. The VT analysis also includes a comparison of this data source with USDA-NASS published livestock data.

Swine Report:

- Ted Tesler: It looks like there are more animals than the ag census would have predicted is that an issue as we go into the Phase 6 modeling?
 - Matt Johnston: We need to see what the Bay Program estimates of these numbers are, but as of a couple months ago, our estimates were very close to the values being collected when we looked at it on a year-to-year basis.
- Matt Johnston: I was just thinking how useful this will be when we have the 2017 ag census, because it'll help us determine how best to adjust those swine numbers.

Turkey Report:

- Paul Bredwell: Given the fact that you found discrepancies between this effort and NASS numbers, are we prepared to move forward with making some recommendation that this is how we'll collect data in the future and what data will be provided to the modelers?
 - Tim Sexton: As long as the two integrators are willing to provide us population information on a regular basis, then every 2 years we could provide that to the modelers to have extremely reliable data.
 - Matt Johnston: This is really useful data to have every 2 years. Because we're moving forward with the Phase 6 model locked down 2018-2019, then the next milestone period is only a few months away, at which point we can use this data.

- Ted Tesler: Is there a data source that you think may be missing or something? To explain the discrepancy?
 - Matt Johnston: USDA-NASS data does cover inside and outside the watershed, so maybe that's part of the missing piece.
- Dave Montali: Do you feel confident that the sources you used are exclusively those that are in WV, or are there any other sources in WV that might have additional data?
 - o Tim Sexton: There are the only 2 turkey operations in WV that I know of and they are in the watershed.
- Matt Johnston: It would be useful to put these numbers side by side with what's in the Phase 6
 model.

Phase 6 Update

G. Shenk. J. Sweeney, and M. Johnston

Gary Shenk, USGS, Jeff Sweeney, EPA, and Matt Johnston, UMD, responded to questions and comments received from Workgroup members and other interested parties regarding the Phase 6.0 model post-calibration.

Discussion:

Regarding Nitrogen:

- Alisha Mulkey: So if we increase our compliance rate for core NM, I'm having a negative effect on my outcome?
 - Matt Johnston: If you were at 70% compliance, every acre above and beyond what you
 were at in 2013 will result in a 12% reduction in N. If you were at 80% compliance, it's
 still an 11% reduction, it's just a diminishing return.
- Ken Staver: Are the reductions applied on all crops?
 - Matt Johnston: It's a reduction per acre of NM across all crop, hay, and pasture, as referenced to the 2013 Progress lbs N/Acre of ag land.
- Ken Staver: So pasture numbers will increase because there's manure being steered towards those acres. But soybean acres are in here too, so I'm wondering how they play into this.
- Frank Coale: As you move from 70% 90% compliance, you're still improving the EOS load, but your marginal benefit is relatively smaller as you move up the scale.
 - Chris Brosch: I can't reconcile why only MD would have this situation.
 - Matt Johnston: It's a county-by-county story, and I can share the scenarios with everyone on CAST. Then you can really dig into the data.
 - Jason Keppler: This might require more than just us diving into this data; it might be worthwhile to have a conversation with you on this.
- Dave Montali: In our state, there is a lot of NM happening on pasture, so is there a reason why you didn't include pasture in your methodology?
 - Matt Johnston: Yes, because the expert panel said there was no impact for Core NM on pasture.

Regarding Phosphorus:

- Matt Johnston: These results for P really emphasize how important manure transport is [in reference to DE numbers contrasted with other jurisdictions].
 - Chris Brosch expressed concern regarding the per-acre NM outcomes regarding changes in P loads, as compared to 2013 progress.
- Marel King: So these efficiency numbers are per acre under NM? Not per acre of the total acres, just per acre under the practice?
 - o Correct.

2018 Schedule Chair

Ed Kee, Chair, lead a discussion to devise a preliminary blueprint for the 2018 Agriculture Workgroup schedule and goals. This is an opportunity for the Workgroup membership to provide input on meeting frequency and topics to be addressed for the coming year.

- Kelly Shenk suggested focusing AgWG meetings on implementation on the ground, and showcasing success stories.
- Marel King offered to present on the recently released "Boots on the Ground" report.
- Jason Keppler made a comment that he would like to see increased participation from at-large members and interested parties.

<u>Decision:</u> The AgWG agreed to hold a face-to-face meeting in February, and to continue holding their monthly meetings on the 3rd Thursday of every month.

Next meeting: Thursday, January 18th, 2018: Conference Call

Participants:

Ed Kee	Retired AgWG Chair
Lindsay Thompson	DE-MD Agribusiness Assoc.
Loretta Collins	UMD
Mark Dubin	UMD
Lindsey Gordon	CRC
Chris Brosch	DDA
Clint Gill	DDA
Jason Keppler	MDA
Alisha Mulkey	MDA
Greg Albrecht	NYSDEC
Ted Tesler	PA DEP
Matt Monroe	WV DA
Dave Montali	WV DEP/Tetra Tech
Tim Sexton	VA DCR
Bobby Long	VA DCR
Marel King	CBC
Kelly Shenk	EPA
Frank Coale	UMD
Ken Staver	UMD
Matt Johnston	UMD
Jeremy Hanson	VT
Jeff Sweeney	EPA
Gary Shenk	USGS
Ray Bryant	USDA ARS

Emily Dekar	USC
Kim Snell-Zarcone	Choose Clean Water Coalition
Jim Cropper	Northeast Pasture Consortium
Paul Bredwell	US Poultry and Egg
Ruth Izraeli	EPA