

Hello everyone. Senators, media, public...please accept a sincere thank you for being here today. I must admit that, as a teacher, I'd much rather be preparing for my students and our upcoming school year, as our first day for teachers is tomorrow, but when hearings are scheduled at your school the day before the school year starts, and you have something to offer, you adapt to the needs of the situation and do what is needed.

Which, unfortunately is one of the many reasons we are here today – a systematic failure at many levels to adapt to the needs of the situation and do what is needed. This SHOULD be about corporate pollution, but from my perspective, it's not. Today for me it is about the horribly sluggish state response to this crisis. It's about the consistent downplaying of risks and meticulous control of language released by State officials, in particular the Department of Health. It's about the loud and borderline farcical boasting from our Governor about the aggressive response to this crisis.

I thought hard about what to say today. I had been following this from a distance for a long time, with obvious growing alarm. Since I first found out about this issue, I had read every news article I could to stay informed, and began digesting studies as often as I could. Everything I found was far more alarming than any official was letting on. My frustration was growing, as was a growing level pessimism to the effectiveness of government officials involved in this situation. As a teacher, a husband, and a father of 4, I watched from many different angles and saw the debilitating effects of this crisis and the state's response first hand on my family, on our students, and on our community.

My frustration finally materialized into action when I saw a video from the Cuomo administration starring Mark Ruffalo, talking about the great environmental things that the Cuomo administration has done. As a Hoosick Falls resident, this was so ridiculous. From our perspective, I could only equate it to a student coming home with a failing exam grade, and bragging to his parents about how amazing his test grade was. I created a video response that the school here put up on their site, and it has since had thousands of views. And just like that, my new role as an environmental health advocate was born, and I have no plans on stopping soon. I was honored to speak with Senator Gillibrand this year, and have spoken with people from other PFOA contaminated communities in New Hampshire, Vermont, Delaware, New Jersey, and most recently Pennsylvania, where the news of their contamination finally exploded about 2 months ago.

My wife and I have shared our story with countless reporters and news agencies, including some exceedingly hard and personal details. I am so grateful for the support of my wife and her willingness to tell her story, as a mother of 4 who has nursed all of her children, and I am also deeply grateful to the work that the media has done on this story. I encourage you to read every article by Brendan Lyons from the Times Union, Scott Waldman from PoliticoNY, and the exceptional piece at Huffington Post entitled "Welcome to Beautiful Parkersburg, WV," among others. Additionally, I want to thank Michael Hickey for his guidance and information, and Rob Bilott who has done so much, and whose testimony matches a lot of what I want to say today.

And as hard as our story is, I know it pales in comparison to many other people I have spoken with in this community, many of whom you will hear from today. They have shared deep and exceptionally hard and painful stories with the public, and continue to do so. They are some more of the heroes of this story, and I hope that they deeply feel that and understand that.

As a proud resident of Hoosick Falls and as someone who loves this community, I felt it necessary that my focus today in these hearings focuses on the first 18 months of the response to this crisis.

Using the FOIL process, I obtained a great deal of emails and documents that range from August of 2014 through the end of October 2015. While going through all 1100+ pages multiple times, I was shocked at what I found: the patterns of slow progress, of controlling language and talking down risks. I also thought that, with the many attempts of revisionist history and controlling the data and dialogue, it would be much more powerful to simply give you quotes and direct information and let you decide for yourself.

I am also using this approach for my family....specifically my daughter. She was born in late May of 2014, which put her at just under 3 months old when the news of contamination of PFOA in our water supply made it to the Department of Health, according to the records I have found. 17 months later...PFOA is declared a hazardous chemical by the state. That response time is absolutely reprehensible, and because of that delay, my daughter was tested at over 100 ppb, which was more than double my own personal number. In addition, I want you to keep in mind some words from our Governor. Besides the constant mentioning of the “aggressive” response, I want you to remember this quote from February 28th of 2016 – “We have been very active in Hoosick Falls from Day 1.”

So now I’m going to go through the details of the response. I hope that this adequately paints the picture of how our community feels...how frustrated, angry, scared, and betrayed we feel. However, I am a teacher, and I know that the style of lecture is just one of the ways to communicate some points, so I have some visuals I am going to use. This is a picture of my now 2 year old daughter, Emma. As we go through this information, month by month, I am going to keep track of her age throughout.

In addition, with your permission, I’d like to invite Emily Marpe back up here to provide me with some visuals of the events for everyone to use.

August 2014 – 3 months old – DOH emails discuss PFOA in the water supply, including misspelling PFOA as PFAO and mentioning that DuPont has or had a small plant nearby. Perhaps a sign of things to come...

(AUGUST PAGE SAYS: DOH NOTIFIED)

5 months old - October 20/22 2014 – Well results are passed up the chain. County officials ask DOH for assistance “in providing any public health concerns related to these results.” Response, “There are no regulatory requirements for reporting since the testing was done voluntarily. I feel reporting via the AWQR is all that is needed even that goes above and beyond any ‘required’ reporting.”

(OCTOBER P1 – County reaches out to DOH)

Links to a Feb 2014 EPA Health Effects Document on PFOA – a 268 page document - is included. Document is online for anyone to see, but is labeled “draft – do not cite or quote.” Email quote from DOH: “If the public meeting occurs before we get wording about health effects, and the question comes up, then the appropriate response is that the USEPA has not officially published any health effects yet.”

Concluding paragraph from the health effects section of the document: : *“Analysis of exposure category and cancer type showed an **association between the very high PFOA exposure category and several cancers**, but ORs for lower exposure categories generally did not support a positive dose-response relationship. Kidney cancer was positively associated with very high and high exposure categories....while ORs for medium and low exposure categories were close to the null compared to the unexposed. **The largest OR was for testicular cancer with the very high exposure category...but the estimate was imprecise due to small numbers. ORs for the other cancer categories were all <1.0. Ovarian cancer, non-Hodgkin’s lymphoma, and prostate cancer were positively associated with the very high exposure category, but showed weaker or negative associations for the other exposure categories.**”*

October 30th 2014 – Links from Michael Hickey make they way up through the chain. Links include info on carbon filters, additional EPA treatment approaches, studies, outline of another town in Pennsylvania that had to handle this, C8 links.

(OCTOBER p2 – Links provided by Michael Hickey)

October 31st 2014 – Plea again from the county to the state for information from toxics bureau people.

-6 months old- November 22 – Quote from Mayor Borge: “It is puzzling and unfortunate, the emotional aspect is growing within the community and it is not positive. Any direction from you will be greatly appreciated.”

November 25th – another request from county to DOH on information from the toxics bureau people. Also again mentions that the “general public is starting to get very concerned and are starting to call into question the safety of the water and rumors are spreading.” Also, an email from Mayor Borge to the county “The purpose of your attending would be to reassure the Board and public that our municipal water continues to comply with all standards and regulations required by your office, NYS, and EPA...the stream of misinformation ‘on the street’ takes on a life of its own and soon genuine concern takes on the face of fear.”

(NOVEMBER – More requests for guidance from DOH. Addressing the “stream of misinformation.”)

-7 months- Dec 8/9- communications between Mayor and resident, includes mentioning NJ. Also information from Paulsboro NJ – mentioning the highest concentration was 150 in finished water, and also a DEP/DOH drinking water consumption advisory for infants/children up to 1. This advisory was declared in January of 2014.

Around this time, the state is revising a draft of an official memo from the county to the mayor. One of the changed language sections includes mentioning that RCDOH has “engaged the NYSDOH requesting assistance on the matter and are hopeful the NYSDOH will respond quickly to the request.”

(DECEMBER p1 – DISCUSSING NJ – MORE PLEAS FOR GUIDANCE)

Dec 19 – another plea from Borge for info on the state. From a DOH employee, who is asking for lab results from PFOA samples – “I will forward this info to the Bureau of Toxic Substance Assessment to see if they will be able to prepare language specific to the Hoosick Falls case.” I am personally not sure why they didn’t have them yet, but that was what as in the e-mail.

Dec 26th – email from borge to State communicating anxiousness to receive direction regarding PFOA from state. Dec 29th, “We are working on the notification language and should be able to finish it in a few days.

-8 months- Jan 2 – from DOH to Borge “Thank you for your e-mail regarding the Village of Hoosick Falls PFOA contamination of the drinking water. Please know that the NYS Department of Health is working on several angles to this matter and we will contact you soon with information to assist with dealing with this matter.” Jan 7 – another request from Borge to DOH.

Jan 9th – Mandatory Health Effects Language (MHEL) and Risk Characterization for PFOA prepared by Bureau of Toxic Substance Assessment (BTTSA) released on Friday, June 9th. 4 total paragraphs. “The presence of PFOA at the levels detected in the supply wells and in finished water does not constitute an immediate health hazard....the estimated exposure to PFOA in the water at the highest level detected...is at least 50,000 times lower than PFOA exposures that are known to cause health effects in animals....information on health effects of PFOA in humans is limited...collectively the studies are not strong enough to draw a definitive conclusion about whether PFOA causes cancer in humans.” Letter sent out 1/13/2015

(JANUARY p1 – MHEL is finally released)

January 23rd email from a DOH employee in regards to the previous day’s water meeting: “The biggest issue for the Village is the current level of alarmism about the drinking water. Social media has been filled with negative comments about this water. It is too early to tell if the Risk Characterization and Health Effects Language that we provided thru the County last week is helping to ease alarmism”“Village wants to begin with a small scale pilot study with GAC and filter to waste. There seems to be some information that GAC works in removing PFOA.” It is interesting to note that Michael Hickey sent links many months ago on GAC filters. It is also interesting to note that St. Gobain officials are being CC’d in many e-mails from this point on.

January 29th – DOH begins working on language for an analogy to explain PPT.

-9 months- February 3rd - the language is sent out with the following statement: “Here are some, but I have not used them because the risk to health is based on the exposure and the potency of the contaminant, but not a simple quantity. Thus something having a high degree of toxicity at 1ppt could be dangerous, although 1ppt of PFOA is likely not dangerous.”

FEBRUARY – PPT language, Other state with PFOA

February 23-25th – Email exchange between Borge and (a citizen) Richard smith, points out the Feb 2014 EPA bulletin, that “provisional health advisories, if exceeded, suggest the need for discontinuing use of water for drinking or cooking because health effects in the short term (weeks or months) may result.”

Also points out other states who have dealt with this issue – NJ (40), Minnesota (30), and North Carolina (1). He also called out the 50,000 times lower information from the Risk Assessment.

-10 months- March 2015 – Borge prepares a memo for elected officials that is edited by DOH. In this dialogue, it is mentioned that other locations – New Windsor, Fort Drum, and Town of Hempstead. Interesting to note that contaminated wells in Fort Drum weren't shut down for another year – March 10 2016 it is announced that the Defense Department will be checking 664 sites. End of month – 2 wells are shut down.

Another e-mail from DOH “The village seems to be very proactively pursuing a treatment of PFOA voluntarily due to local pressure from a small group of advocates.”

(MARCH – Other NY Locations discussed)

-11 months- April 1 – a new letter is created and sent out to the village. Discusses two approaches to attempt filtering out PFOA that failed.

April – DOH begins to work to establish additional testing locations locally – houses, businesses, etc. This includes 3 personal wells of DOH employees who have volunteered their wells – in Brunswick and Grafton. ...This must be the wide area of testing that was referred to earlier.

(APRIL – Village Letter – More testing)

-1 year old - May - Borge reports that they are halfway through pilot study and that GAC is effective in blocking PFOA. Also, Borge sends an email to many elected officials with this quote: “The Village is in full compliance with all laws and regulations put forth by the county, state, and federal governments, yet we know that measureable amounts of PFOA (from 130-540 ppt) are present. The EPA requires amounts between 200ppt-400ppt to be reported, but only for select situations....after over a decade of testing and data gathering, PFOA has not been clinically proven to be toxic or a carcinogen to ‘humans’ (although it is suspected), so the USDOH and USDEC do not require it to be tested for, or levels in drinking water reported.”

(MAY – letter to elected officials)

-13 months- June 4th – test are taken based on list created in April.

(JUNE – Further tests are administered)

-14 months-July 24, 2015 – Well results come back. 4 locations in Hoosick Falls test over 600ppt.

(JULY – Well tests come back.)

-15 months-

Aug 1 Letter released – GAC Pilot study is completed. Mentions that other locations have been tested, but doesn't mention the results. Probably because the village hadn't been told yet. Also includes "Discussions have also taken place with the regional representative from the Governor's Office. "

August 20 2015 – DOH discusses sending official letters of well results to owners from June tests

August 21 – Email from DOH to Mayor/County in regards to a EWG – Environmental Working Group – report on how toxic PFOA is. "EWG is an advocacy group and somewhat political. We take anything they say with a grain of salt."

August 25th – Village finally receives results of tests, says formal letters will be going out to individual well owners. (but they don't go out yet)

(AUG – Village letter, discussion w/Governor's office)

-16 months-

Sept 04, 2015 – FAQ on PFC's e-mailed to lots and lots of DOH people. Talks details, exposure, toxicity, health effects in animals and humans, biomonitoring information, remediation information, and regulatory activities. First statement on toxicity: "PFC's are thought to be associated with adverse health effects, but more data are needed to fully evaluate their toxicity." A paragraph later: "Overall, the scientific evidence linking PFC exposures with specific adverse health effects in people is mixed and inconclusive. In studies of exposed populations, associations were found with PFOS and PFOA and bladder and testicular cancer, changes in concentrations of thyroid and sex hormones, changes in the concentration of liver enzymes, and changes in serum cholesterol and lipid concentrations. However, the strength of these associations is fairly weak in many of these studies, such that no conclusive statements may yet be made regarding adverse health effects from PFOA and PFOS exposure to humans." In the section on potential health effects of PFCs from human studies, "adverse health effects potentially associated with different PFCs include reproductive male cancers, bladder cancer, changes in concentrations of thyroid and sex hormones, changes in the concentration of liver enzymes, and changes in serum cholesterol and lipid concentrations. The strength of many of the associations is fairly weak, however, and results of different studies are often contradictory."

(SEPTEMBER 1 – FAQ on PFC's, DRAFT OF RESULT LETTERS)

September 18th – draft letters for well results from July 24 results being passed around for final approval of use, ironically dated Aug 20. Initial language includes "The USEPA does have a provisional health advisory level of 400 ng/L for short term health outcomes". Adjusted language reads "The USEPA does have a TEMPORARY provisional health advisory level (GUIDANCE VALUE) of 400 ng/L for EVALUATING THE RISK OF NON-CANCER EFFECTS FROM PFOA IN DRINKING WATER. THE GUIDANCE VALUE WAS BASED ON ANIMAL STUDIES. HOWEVER, A DRAFT RE-EVALUATION OF PFOA TOXICITY IN ANIMALS AND HUMANS BY THE USEPA IS LIKELY TO RESULT IN A LOWER GUIDANCE VALUE."

and "New York State does have a MCL drinking water for unspecified organic contaminants, which applies to PFOA. Under sub-part-5-1 of the State Sanitary Code the MCL for PFOA is 50,000 ng/L." changed to "New York State does have an ENFORCABLE drinking water standard (MCL of 50,000 ng/L)

for ANY CHEMICAL (INCLUDING PFOA) CLASSIFIED AS AN unspecified organic contaminants UNDER SUB-PART 5-1 OF THE STATE SANITARY CODE. IT ONLY applies to CHEMICALS SUCH AS PFOA THAT DO NOT HAVE A STANDARD BASED ON ITS TOXICITY. THUS the water PROVIDED by your public system is in compliance with THE CURRENT NEW YORK STATE DRINKING WATER standards FOR PFOA.”

-17 months-

October 1st DOH employee says they have met with well owners who had their wells come up positive for PFOA. I didn't find out when the letters were officially sent out about the initial June 4th test (of which results were available July 24th), but it definitely went out between Sept 18th and October 1st

October 18th – In a meeting with town and village leaders, DOH, and St. Gobain, St. Gobain releases the results of its testing and St. Gobain has agreed in principal to fund the GAC Filtration system

(OCTOBER - ST. GOBAIN AGREES IN PRINCIPAL TO GAC FILTRATION)

-18 months-

November 2015 – from a Scott Waldman article, he mentions that “State health department officials told federal regulators they have been involved in monitoring the PFOA situation for a year and said they didn't want to go public with a major alert.” Quote from Nathan Graber “We agree we don't want to alarm people.” From Judith Enck: “We need the state health department to focus on the water supply issues fast...state health department seems to be relying on negotiations between the mayor and the company...there is a clear need for regulatory oversight by either the state or EPA or both.”

NOVEMBER – Disagreements between EPA and State

-19 months-

December 15 2015 – Statement released warning residents not to drink or cook with village water. Village mayor follows suit. BTW - Earlier it was mentioned that this change in policy for only Hoosick Falls was – “very confusing” and I think there was surprise that and even outrage communicated earlier that it was the first time a do-not-drink declaration was done regionally by EPA? I say to that thought....Imagine if it hadn't been. There is nothing confusing about EPA's advisories – they are clear. There is only confusion if your goal is to drag your feet and only do the bare minimum – work towards the highest level, not the lowest. Blaming EPA for “confusion of advisories” is the equivalent of a teenage son spilling apple juice on the floor, letting it sit there for a while, and then yelling at his parents for not cleaning it up sooner because it's not the son's job. In my opinion, it is a preposterous and desperate argument.

From 2016, the rest is pretty fresh in our minds:

In January, after mounting pressure, the state declares St. Gobain a superfund site and ordered classification of PFOA as hazardous. Emma is 20 months old.

JANUARY – St. Gobain a superfund site

In February, after mounting pressure and a student led press conference directly addressing our Governor, the state declares it will spend \$10 million from its Superfund to buy filtration systems for Town of Hoosick & Make an effort towards an alternative water source.” Blood testing is now in motion. My daughter is 21 months old)

FEBRUARY – Student Press Conference/Commitment to filtration systems

Thank you Emily for your help with the timeline.

In March, Cuomo makes his first visit to Hoosick Falls....unannounced...on a Sunday...in the morning...on the day after St. Patrick’s Day. At the very end of the month, residents are told that the water is now safe to drink. I know, however, that this process has filtered out both the PFOA and any remaining trust in the State’s DOH, so most people continue drinking bottled water. My daughter is 22 months old.

Skipping ahead to June, a couple of weeks after my daughter’s birthday, we receive results of our blood tests via individual letters addressed to every individual, including my 9,6, 4, and 2 year olds. The area results are watered down because they didn’t offer a difference between village residents vs all residents tested, so the results are lower than they should be.

Two months later in August, another set of results is released – however it is just the same results released in June with actual breakdowns for village residents and gender/age.

And now we find ourselves here. In a place where we have been asked to trust DOH countless times, with disseminating information, communicating with agencies, and...my personal favorite, trusting them to educate us over the phone, with handouts, while also educating our doctors and nurses. After all that I have laid out today, I ask you....how could we?

And I have one final question. Earlier, I mentioned the quote from the Governor that “we have been very active in Hoosick Falls since Day 1.” I ask you to please look at the timeline across the stage floor, and tell me...where does Day 1 start? Jan 2016? August 2015 when an email dictates that the Governor’s office knows? Perhaps it should start further off stage near the steps, when the EPA released its information in February of 2012. Or maybe we should go all the way back to 2009 when the

EPA released its provisional Health Advisories for PFOA and PFOS? That would put the timeline off the stage, and down the hall near the boys locker room. Perhaps it should be in the late 2001 when Rob Bilott sent a letter to EPA asking them to begin investigating PFOA as a contaminant? That would put us either in or past the football field. Or maybe in 1993 when 3m released a study that found workers with ongoing exposure were three times more likely than the average man to die of prostate cancer?

I hope this timeline helps you put the facts into place. I hope it adequately paints a picture of how inefficient the response has been, and how the speed at which things were taken on and completed was anything but “aggressive,” and how we as a community are struggling to trust anything from DOH.

I will leave you with one story that I haven’t told anyone, not even my wife. Just about every night, I get the pleasure and honor of carrying my 2 year old daughter in my arms upstairs to her bed. Often times, she is awake but really tired, and other times she is fast asleep. It is one of the best parts of my day. And every night, I say our normal nightly prayer, and conclude it with these words. “Dear Lord, please help Emma sleep, get rest, grow strong, and cleanse her of PFOA.” Every single night. It is beautiful and bittersweet at the same time.

Would I have to do this if the state had just sounded the alarm early and even slightly erred on the side of caution, rather than basing the need to act on the highest possible level? Could the state not have acted above and beyond the “legal” ways?

Why is it that the Department of Health did not take this seriously? Do you see the Department of Transportation saying “Potholes...you know...it just isn’t a guarantee to cause problems to vehicles....plus most people will simply avoid it so the risk isn’t too high....and legally the road still functions and is a driveable road....so we’re not going to worry about any potholes anywhere because legally we aren’t required to.”

Well, ironically, that has happened. My friends’ father told me when I was back in high school that they had a terrible pothole in their road, and he called and called to get it taken care of. But nothing happened for weeks. So he called back, pretending to be someone else, and said something to the effect of “oh, I just want you to know that my son was riding his bicycle and fell in the pothole. Fortunately, he’s ok, but man, if he was seriously injured, it would have been a really big deal, and could have led to lawsuits!” ...it was taken care of days later.

This situation here is so similar...except it did involve harm. A lot of harm. It involves sicknesses, loss of fathers, mothers, brothers, and sisters. Loss of pets. Perhaps even loss of children never born. And it took a community to learn how to “make that phonecall” – using data, lawyers, studies, social media, speeches, press conferences...anything we could until the message – not the “noise on the streets” but the truth – got out. And it has raised a generation of children here who don’t trust the government because it largely failed them, and a generation of adults who have realized how to advocate and how necessary it is to do so. And I think I speak on behalf of those adults when I say, we will not stop until the truth is out there and are taken care of as we should be.

I thank you very much for your time here today.