Testimony of Susan Hedman

Before the House Committee on Oversight and Government Reform

March 15, 2016

Good morning, Mr. Chairman, Ranking Member Cummings and distinguished Members of the Committee. I'm Susan Hedman, the former EPA Region 5 Administrator. Thank you for this opportunity to testify about my role in EPA's response to the Flint water crisis—and the reasons that I decided to resign.

I first learned that Flint was not implementing corrosion control treatment on June 30, 2015¹ -- approximately fourteen months after the City started using Flint River water that was not treated with orthophosphate.² The very next day I offered technical assistance to Flint's Mayor -- assistance from EPA experts on lead and drinking water distribution systems.³ The following week, we issued our first statement encouraging Flint residents to contact their water utility for lead testing and providing information about limiting exposure to lead in tap water.⁴

On July 21st, three weeks after I first learned about this problem, the Michigan Department of Environmental Quality (MDEQ) agreed with EPA's recommendation to require Flint to implement corrosion control as soon as possible -- a recommendation that my staff had been making since late April, when they first found out that corrosion control was not being implemented.

That should have solved the problem – but it did not. During the weeks and months that followed, MDEQ was slow to deliver on the agreement we reached on July 21st and the City of Flint was hampered by a lack of institutional capacity and resources.

¹ During this briefing, the EPA Region 5 Water Division Director told me that her staff started asking MDEQ to require Flint to implement corrosion control in late April, when MDEQ first told EPA staff that Flint was not implementing control. (In February, MDEQ told EPA that Flint had an "Optimized Corrosion Control Program.") The Water Division Director also told me that she had scheduled a call with the head of the MDEQ drinking water program and was confident that MDEQ would agree to require Flint to implement corrosion control during that call. She also said that water testing completed in December indicated that Flint was only slightly above the lead levels found in systems that EPA deems fully optimized for corrosion control – and that new test results would be available before the upcoming EPA-MDEQ call.

² I had previously been briefed on and closely followed several other drinking water issues in Flint, including when MDEQ issued a Notice of Violation for Total Trihalomethane exceedances (December 2014) and when Rep. Kildee requested information on loan forgiveness for the City of Flint's Drinking Water State Revolving Fund loans (April 2015).

³ The Flint Mayor was familiar with this form of technical assistance. In February 2015, I helped the Mayor find an EPA drinking water expert to work with the City to address Total Trihalomethane violations.

⁴ The EPA statement was picked up by Flint-area media and links to EPA information about lead in drinking water appeared on local media websites. I also sent the statement to the Mayor right after we released it.

EPA responded in the only we could: by working within the cooperative federalism framework of the Safe Drinking Water Act. That framework assigns legal primacy to states to implement drinking water regulations and gives EPA the job of setting standards and providing technical assistance. So, in keeping with that framework, we provided technical support to the State and the City -- to implement corrosion control and to provide the assistance that Flint residents needed to limit their exposure to lead.

Most of the time, this cooperative federalism model works well – even in a crisis. In fact, it worked exactly the way it's supposed to work when the Toledo water crisis occurred in 2014.⁵ But, as we all know, it did not work in Flint.

Consequently, EPA was forced to evaluate the enforcement tools available under the Safe Drinking Water Act, which are more limited than the enforcement provisions in other federal environmental statutes. And, while I used the threat of enforcement action to motivate the State and City to move forward, we found that the enforcement options available to us were of limited utility last fall, due to the unique circumstances of this case.⁶

In the end, with the help of the EPA Task Force, corrosion control was finally implemented – and testing now indicates that the protective coating that prevents lead from leaching into tap water is being restored.

That's the good news.

The bad news is that this problem should never have happened in the first place, and I need to remind you: EPA had nothing at all to do with that.

Finally, I'd like to say a few words about my resignation:

I resigned, in part, because of the false allegations about me that were published⁷ in early January – which EPA was unable to correct on the record before they began to damage the Agency's ability to perform critical work in Flint. By the third week of January, I was widely portrayed in the media as someone who "... sat on the sidelines during the crisis ... and ... downplayed concerns raised by an E.P.A. scientist about lead in the water."⁸

http://www.democracynow.org/2016/1/8/amid state fed cover up the http://www.huffingtonpost.com/entry/flint-lead-water-epa us 569522a8e4b086bc1cd5373c http://www.detroitnews.com/story/news/politics/2016/01/12/epa-stayed-silent-flints-tainted-water/78719620 http://flintwaterstudy.org/2016/01/miguel-del-toral-emerges-from-epas-house-arrest-flintwaterstudy-supports-requested-federal-relief-for-flint/

⁵ In August 2014, the Toledo reported high levels of the toxin microcystin in drinking water. Ohio EPA immediately told US EPA about the problem and the Mayor immediately issued a Do Not Drink Order. Ohio EPA asked US EPA for technical assistance – and Ohio EPA immediately implemented the sampling protocols that we recommended. And, Governor Kasich told EPA that he would call out the National Guard to distribute bottled water – and that happened right away, as well.

⁶ See Appendix One.

⁷ Examples of articles containing the false allegations:

⁸ http://www.nytimes.com/2016/01/24/opinion/sunday/fix-flints-water-system-now.html

That's completely untrue. My testimony today and the material in Appendices Two and Three⁹ make clear that I did not sit on the sidelines and I did not downplay any concerns raised by EPA scientists or apologize for any memos they wrote – in fact, I repeatedly asked for a final memo about lead in a form that EPA could publicly release. And, when MDEQ attacked a Region 5 scientist¹⁰ by calling him a "rogue employee," I immediately called the MDEQ Director to complain -- and in a subsequent call with the MDEQ Director and the Governor's staff, I made it clear that the scientist is a valued member of the Region 5 Water Division team -- and I made it even clearer when I subsequently appointed the scientist to EPA's Flint Task Force.

There wasn't time for these explanations in January -- in the wake of all the emergency declarations. Flint residents had lost trust in governmental institutions – and the false allegations about me gave the people of Flint less reason to trust EPA.

On the day I resigned, I sent a note to Administrator McCarthy saying: "In light of the allegations that have been made about me... and the time it will take to set the record straight, I think this is the best course of action to ensure the effectiveness of EPA's response to the Flint water crisis and to make sure that Flint residents get the help that they deserve."

That was one reason for my resignation, but there was another: quite simply, this tragedy happened on my watch.

I did not make the catastrophic decision to provide drinking water without corrosion control treatment;

I did not vote to cut funding for water infrastructure or for EPA;

And I did not design the imperfect statutory framework that we rely on to keep our drinking water safe.

But I was the Regional Administrator when this crisis occurred.

Having spent my entire adult life as an advocate for environmental and public health issues – and much of that time representing citizen groups – I knew that only one thing mattered to Flint residents: the water wasn't safe to drink.

What happened in Flint, should not have happened anywhere in United States – and I was horrified that it happened in my region, the Great Lakes Region. I thought – and still think – that resigning was the honorable thing to do.

Although I have left government service — I have not stopped worrying about the people of Flint. I am very encouraged to see that the corrosion control treatment that was implemented in December is re-coating the pipes and that the water may soon be safe to drink. I am even more encouraged to read that there is growing Congressional support for funding to replace lead service lines in Flint and to fund water infrastructure

⁹ Appendix Two highlights some of the actions that I took as part of EPA's response to the Flint water crisis. Appendix Three provides background on an e-mail exchange with the Flint Mayor that was the focus of the false allegations that were made against me in early January 2016.

 $^{^{10}\,\}underline{\text{http://www.npr.org/2015/09/29/444497051/high-lead-levels-in-michigan-kids-after-city-switches-water-source}$

throughout the country. I'd like to close by asking all of you to support that legislation -- and, more generally, to support the long overdue investments that are needed in this nation's water infrastructure.

Thank you for this opportunity to testify. I welcome any questions.

APPENDIX ONE

Safe Drinking Water Act Enforcement Options

Given EPA Region 5's longstanding reputation¹¹ for aggressive enforcement of environmental laws, it is perhaps not surprising that during the summer and fall of 2015 the Region 5 Flint team actively evaluated and reevaluated the enforcement options available under the Safe Drinking Water Act. Unfortunately, we found that the utility of the enforcement tools available to us was quite limited because of the unique circumstances of this case.

The Safe Drinking Water Act contains two major enforcement provisions:

Section 1414 of the Safe Drinking Water Act authorizes EPA to take enforcement action when a water system violates applicable regulations and the primacy agency (in this case MDEQ) fails to take action within 30 days. This section is a useful enforcement tool where a water system violates a Maximum Contaminant Level established by EPA regulations. For instance, EPA could have used this authority when the Flint water system violated the Maximum Contaminant Levels for Total Trihalomethanes in 2014, if MDEQ had failed to take enforcement Action. However, in cases involving lead, there is no Maximum Contaminant Level to apply. Instead, the 1991 Lead and Copper Rule is a treatment technique rule that:

... includes a lead "action level" of 15 parts per billion. If more than 10% of tap water samples exceed the action level, the PWS has not violated the rule, but other requirements – corrosion control, public education, additional water monitoring and lead service line replacement – can be triggered.¹³

In Flint's case, EPA's ability to take action under Section 1414 of the Safe Drinking Water Act was limited by a lack of evidence demonstrating that the lead "action level" had been exceeded. However, EPA was nonetheless able to work with MDEQ and the City of Flint to implement corrosion control, to carry out public education campaigns and to improve and expand water monitoring – the same outcome that would have been achieved if we had been able to proceed under Section 1414.

Section 1431 of the Safe Drinking Water Act authorizes EPA to take action when state and local authorities fail to act when a contaminant presents "imminent and substantial endangerment to the health of persons" served by a public water system. We considered this option and there were times when I told the State and City that I was prepared to move to an enforcement posture if they didn't move more quickly. However, I decided to hold

¹¹ EPA Region 5 has become known as "The Enforcement Region" because of the region's track record of initiating and successfully concluding more environmental enforcement cases than any of the other nine EPA regions. In fact, during several recent years Region 5 enforcement actions produced more than half of the total pollution reductions and injunctive relief achieved by the entire agency. Much of this enforcement work was targeted in communities that are over-burdened with risks to public health – communities that are disproportionately minority and low-income.

¹² MDEQ issued a Notice of Violation on December 16, 2014.

¹³ "Lead in Flint, Michigan's Drinking Water: Federal Regulatory Role," <u>CRS Insight Report</u> by Mary Tiemann, February 16, 2016 (IN10446).

off because I was advised that the Michigan Attorney General¹⁴ would likely argue that EPA was jurisdictionally barred from using Section 1431 because of the growing list of actions that the State and City were taking to protect public health, including:

MDEQ's letter requiring Flint to implement corrosion control on August 17th;

Mayor Walling's announcement that Flint would implement corrosion control on September 3rd;

The City/County Health Advisory recommending that Flint residents use filters and flush pipes before drawing water for drinking or cooking on September 25th;

The State/City Action Plan that included distribution of filters and bottled water to Flint residents and water testing in schools that was announced on October 2nd;

The State/City decision to use treated water from the Great Lakes Water Authority instead of Flint River water starting on October 16th; and

MDEQ's permit authorizing Flint to implement corrosion control that was issued on October 30th.

To be clear, I was less concerned about losing a legal argument than about the length of time it might take to resolve it – and the impact that an extended legal proceeding might have on forward progress to address the water crisis. During October and November – when MDEQ and the City were working effectively with the EPA Flint Task Force to implement corrosion control – a contentious challenge to an EPA order could have further delayed or even halted that critical work. If that had happened, we would not be seeing the reductions in lead levels that are currently occurring in Flint.

Those concerns were on my mind as I reviewed a citizen group petition asking EPA to take emergency action, pursuant to Section 1431.¹⁵ On December 10, 2015, the day after Flint started corrosion control treatment, I sent a letter to the petitioners summarizing the steps that EPA, the State of Michigan and the City of Flint had taken to address elevated lead levels – and I further deferred action on the petition until such time as the Agency determines that corrosion control is fully optimized for the Flint system. ¹⁶ That letter was intended to send a message to the petitioners and to the City and State that EPA was prepared to take action under Section 1431 if corrosion control was not fully optimized.

¹⁴ Because MDEQ does not have in-house counsel, we recognized that issuing an order would result in involvement by the Michigan Attorney General, who had recently issued a statement, emphasized his commitment "to stopping overregulation and excessive mandates from the EPA." www.mlive.com/lansing-news/index.ssf/2015/09/gov_rick_snyder_administration.html

¹⁵ Petition for Emergency Action under the Safe Drinking Water Act, submitted to the Environmental Protection Agency by Coalition for Clean Water *et al.* on October 1, 2015.

¹⁶ Shortly after signing the letter, I asked the EPA Regional Counsel to reach out to the petitioners' attorney to ask whether there were any additional steps to protect public health that the petitioners would like to recommend. The Regional Counsel reported that he made that offer in a conference call with the petitioners' attorney on December 17, 2015, and again in an e-mail in January 2016, but received no recommendations in response.

On January 21, 2016, EPA issued a Section 1431 Order, citing both the City and the State. As predicted, Michigan challenged EPA's legal authority to issue the order – but MDEQ pledged cooperation with EPA in the climate of intergovernmental collaboration created by federal, state and local emergency declarations to assist Flint.

APPENDIX TWO

My Role In The EPA Response To The Flint Water Crisis

Many people at the Environmental Protection Agency have played and continue to play critical roles in the response to the Flint water crisis. For purposes of this testimony, I have assembled this partial list of my activities to show when I first became involved in the response and the types of actions that I undertook:

I first learned that Flint was not implementing corrosion control treatment on June 30, 2015¹⁷ – approximately fourteen months after the City started using Flint River water that was not treated with orthophosphate.¹⁸ The very next day I offered technical assistance to Flint's Mayor – assistance from EPA experts on lead and drinking water distribution systems.¹⁹ The following day, I sent the Mayor resumes for the two EPA experts so that he could contact them right away.

On July 10, 2015, I directed the EPA Region 5 Office of Public Affairs to issue our first statement encouraging Flint residents to contact their water utility to request lead testing and providing a link to information on the EPA website about limiting exposure to lead in tap water.²⁰

On July 21, 2015, EPA convinced MDEQ to require the City of Flint to implement corrosion control. This was a significant milestone – but the problem was not solved. When I asked for a status report, I was astonished to learn that MDEQ had not yet issued the promised letter directing Flint to implement corrosion control. I asked my staff to immediately follow up with MDEQ to get the letter issued -- and to ask both MDEQ and the City of Flint to increase the availability of public information about water testing and limiting exposure to lead in tap water.

¹⁷ During this briefing, the EPA Region 5 Water Division Director told me that her staff started asking MDEQ to require Flint to implement corrosion control in late April, when MDEQ first told EPA staff that Flint was not implementing control. (In February, MDEQ told EPA that Flint had an "Optimized Corrosion Control Program.") The Water Division Director also told me that she had scheduled a call with the head of the MDEQ drinking water program and was optimistic that MDEQ would agree to require Flint to implement corrosion control during that call. She also said that water testing completed in December indicated that Flint was only slightly above the lead levels found in systems that EPA deems fully optimized for corrosion control – and that new test results would be available before the upcoming EPA-MDEQ call.

¹⁸ I had previously been briefed on and closely followed several other drinking water issues in Flint, including when MDEQ issued a Notice of Violation for Total Trihalomethane exceedances (December 2014) and when Rep. Kildee requested information on loan forgiveness for the City of Flint's Drinking Water State Revolving Fund loans (April 2015).

¹⁹ The Flint Mayor was familiar with this form of technical assistance. In February 2015, I helped the Mayor find an EPA drinking water expert to work with the City to address Total Trihalomethane violations.

²⁰ The EPA statement was covered by Flint-area media and links to the EPA information about lead in drinking water appeared on local media websites. I also sent a copy of the statement to the Mayor right after we released it.

Finally, on August 17, 2015, MDEQ issued a letter directing the City of Flint to implement corrosion control. Although MDEQ's letter failed to convey the urgency that EPA had recommended, on September 3, 2015, the Flint Mayor stepped forward to announce that the City would implement corrosion control as soon as possible – and that he would add two EPA experts on lead and water distribution issues to the Flint Technical Advisory Committee.²¹

On September 15, 2015, I held separate calls with the Flint Mayor and the MDEQ Director to emphasize the need for expedited implementation of corrosion control and for expanded public information efforts to help Flint residents take steps to limit lead exposure until corrosion control was effective. Ten days later, the City (and County) issued a Health Advisory recommending that residents install filters to remove lead from tap water and to flush their systems before drawing water for drinking or cooking.

On September 27, 2015, I again called the MDEQ Director to stress the need for expedited implementation of corrosion control, to offer technical assistance and to call for more involvement by the Michigan Department of Health and Human Services (to implement a public information campaign and to obtain funding for bottled water and pre-mixed formula for low income residents.) During the next several days, EPA worked closely with MDEQ to develop a "Flint Action Plan" – which the MDEQ Director predicted would result in implementation of corrosion control in October. The Action Plan was announced on October 2nd and, during the following week, thousands of free water filters were distributed in Flint and testing of drinking water in schools began.

On October 16, 2015, I announced the creation of an EPA Flint Task Force to provide intensive technical assistance to MDEQ and the City of Flint to implement corrosion control treatment.²² When Task Force recommendations were not accepted, I intervened with the City and MDEQ – and on October 30, 2015, MDEQ issued a permit authorizing the City to implement corrosion control treatment in accordance with a plan designed to restore the protective coating needed to prevent leaching of lead into tap water.²³

After the EPA Flint Task Force was up and running, I oversaw less of EPA's day-to-day work in Flint – but there are several additional items worth mentioning:

On November 10, 2015, I announced that EPA would conduct an audit of the MDEQ Drinking Water Program to identify actions needed to strengthen the Michigan drinking water program.

²¹ A few days earlier, MDEQ declined a similar offer of technical assistance from EPA -- but did tell Region 5 staff that a public information campaign was being implemented in Flint by the Michigan Department of Health and Human Services.

²² On October 16, 2015, Flint began using treated Lake Huron water from the Great Lakes Water Authority, instead of Flint River Water. The water supplied by the Great Lakes Water Authority required supplementary corrosion control treatment to restore the protective coating to damaged pipes in Flint.

²³ During November the Task Force continued to work with the City and MDEQ to get the necessary equipment installed to begin corrosion control treatment (which occurred on December 9th) and to oversee water sampling to determine the effectiveness of the treatment (which is still ongoing). A complete list of Task Force activities is available at www.epa.gov/flint/flint-safe-drinking-water-task-force

On December 1, 2015, I called the MDEQ Director to offer EPA Community Involvement Coordinators to work with MDEQ to expand public information campaigns to ensure that Flint residents used filters correctly and were taking other steps to minimize exposure to lead in tap water.²⁴

On December 22, 2015, I travelled to Flint to meet with the Mayor to discuss the City and County Emergency Declaration – that had been issued the previous week. I asked what EPA could do to help and specifically offered EPA Community Involvement Coordinators to work with the City to help reach residents who do not have access to the web, who face literacy challenges or who do not speak English.

During 2015, I also provided several briefings on the Flint water crisis to Members of Congress, in person and on the phone. Starting in mid-November, I also directed my staff to hold weekly phone briefings for congressional staff.

²⁴ During that call I also provided the MDEQ Director with contact information for the Legionella program at the Centers for Disease Control and requested that he reach out to the MDHHS Director to ask the State Epidemiologist to work with the Centers for Disease Control and the Genesee County Health Department on the Legionella issue.

APPENDIX THREE

My E-Mail Exchange With The Flint Mayor (6/30 - 7/2/16)

In early January 2016, several false allegations were published²⁵ suggesting that I downplayed concerns raised by an E.P.A. scientist about lead in Flint tap water.²⁶ These allegations focused on the following e-mail exchange that I had with the Flint Mayor during the summer of 2015:

On June 30, 2015 – the same day that I was first briefed on the Flint corrosion control issue – I received an e-mail from the Flint Mayor asking about an internal EPA memo that had been obtained by a reporter.

On July 1, 2015, I sent a reply to the Mayor:

I started by apologizing to the Mayor for taking all day to get back to him. The reason that it took me all day is that I was out of the office for a medical procedure.

Because I was out of the office and was not familiar with the contents of the document that the Mayor was asking about, I asked the Region 5 Water Division Director and Deputy Director to draft my response – which included the following language: "The preliminary draft report should not have been released outside the agency. When the report has been revised and fully vetted by EPA management, the findings and recommendations will be shared with the City and MDEQ will be responsible for following up with the City."²⁷

There were at least three reasons that the document should not have been released outside the agency:

- 1. The document contained personally identifiable information (PII) and health information. In the standard agency vetting process, the Office of Regional Counsel would redact that information to prepare a document for public release.
- 2. The document contained enforcement-sensitive information. In the standard agency vetting process, the proposed compliance review described in the draft would be redacted.
- 3. The document was an interim draft that did not include all of the information available to EPA on the topics covered in the memo. EPA also needed to confirm data reported in the memo by performing a standard quality assurance/quality control check.

http://www.democracynow.org/2016/1/8/amid state fed cover up the http://www.huffingtonpost.com/entry/flint-lead-water-epa_us_569522a8e4b086bc1cd5373c http://www.detroitnews.com/story/news/politics/2016/01/12/epa-stayed-silent-flints-tainted-water/78719620 http://flintwaterstudy.org/2016/01/miguel-del-toral-emerges-from-epas-house-arrest-flintwaterstudy-supports-requested-federal-relief-for-flint/

²⁵ Examples of articles containing the false allegations:

²⁶ http://www.nytimes.com/2016/01/24/opinion/sunday/fix-flints-water-system-now.html

²⁷ I did not play any role in "vetting" or "revising" the draft or final version of that memo.

Since I could not provide the draft report in its current form to the Mayor that evening, I instead offered the Mayor access to two EPA experts on lead and drinking water distribution systems. Those experts – who work at EPA's lab in Cincinnati – were available to talk with the Mayor about the importance of implementing corrosion control and the public health risks posed by lead in drinking water.

I closed the e-mail by apologizing again for taking all day to reply and "for the manner in which this matter was handled." Here I was saying that I was sorry that the Mayor heard about an issue from a reporter, instead of directly from me. EPA Regional Administrators are taught that there should be no surprises for elected officials. Ironically, in this case, I was as surprised as the Mayor – since I started hearing about the lead issue at about the same time he did.

On July 2, 2015, the Mayor e-mailed me again to ask EPA to talk with the reporter who had obtained a copy of the interim memo. I replied by saying that I was not inclined for EPA staff to have further communication with the reporter because we needed to focus on finalizing the report. At the time, I had hoped that a final version of the memo would be able to be released before the reporter filed his story. In the meantime, I did not want anyone on my staff to get in trouble by commenting on a document that contained information that we are prohibited from disclosing.²⁸

In my July 2nd reply to the Mayor I also provided contact information and resumes for the EPA experts on lead and water distribution systems so that he could reach out to them for information.

My July 2nd reply to the Mayor also noted that the interim report obtained by the reporter "was a preliminary draft and that it would be premature to draw any conclusions based on that draft." There are two important points to make about this statement:

- I do not have the necessary expertise to judge whether it was premature to draw any conclusions based on the interim report. Here I was conveying the judgment provided to me by EPA Region 5 Water Division senior managers, individuals who do have the necessary expertise to make that judgment and had reviewed the memo in detail.
- 2. The final version of the report concluded that the extremely high lead levels highlighted in the interim report were likely due to physical disturbance of a service line to one residence (which had since been replaced), rather than lack of corrosion control. The draft interim report did not include any information about physical disturbance and, consequently, many news articles that were written about the draft report prematurely jumped to a conclusion: that Flint drinking water contained "hazardous waste levels" of lead because of the lack of corrosion control treatment. When the first of these articles was published²⁹ the scientist who authored the draft interim report expressed concern to the EPA Region 5 public affairs office that the article could "unduly alarm the public."

²⁸At that time, I was particularly concerned about the release of PII/health and enforcement-sensitive information because I had recently completed the annual training that all EPA employees are required to take to learn about protecting confidential information and the substantial penalties that apply for failing to do so.

²⁹ http://www.aclumich.org/article/corrosive-impact-tale-leaded-water-and-one-flint-family%E2%80%99s-toxic-nightmare

Committee on Oversight and Government Reform Witness Disclosure Requirement – "Truth in Testimony" Required by House Rule XI, Clause 2(g)(5)

Name: SUSAN HEDMAN
1. Please list any federal grants or contracts (including subgrants or subcontracts) you have received since October 1, 2012. Include the source and amount of each grant or contract. None
 Please list any entity you are testifying on behalf of and briefly describe your relationship with these entities.
3. Please list any federal grants or contracts (including subgrants or subcontracts) received since October 1, 2012, by the entity(ies)
you listed above. Include the source and amount of each grant or contract.
None
I certify that the above information is true and correct.

Signature:

Date:

3-14-16

Susan Hedman Chicago, Illinois

Education			
1989	Ph.D.	Gaylord Nelson Institute for Environmental Studies University of Wisconsin – Madison, Wisconsin Interdisciplinary degree in physical and social sciences and engineering Concentration: Land Resources	
1987	J.D.	University of Wisconsin Law School Madison, Wisconsin	
1979	M.A.	LaFollette Institute of Public Affairs University of Wisconsin – Madison, Wisconsin Interdisciplinary degree in public policy and administration Concentration: Energy Policy	
1978	B.A.	Ripon College Ripon, Wisconsin Major: Politics and Government	
<u>Employment</u>			
5/2010 – 2/2016	 U.S. Environmental Protection Agency Chicago, Illinois Region 5 Administrator/Great Lakes National Program Manager Director of EPA operations in Illinois, Indiana, Michigan, Minnesota, Ohio and Wisconsin and related work with 35 federally-recognized tribal governments; EPA Great Lakes National Program Manager: Chair - Great Lakes Restoration Initiative Regional Working Group Co-Chair - Bi-National Great Lakes Executive Committee Commissioner - Ohio River Valley Water Sanitation Commission (2014 – 2016) Chair - Chicago Federal Executive Board (2013 - 2014) 		
4/2005 – 5/2010	Office of the Illinois Attorney General Chicago, Illinois Environmental Counsel / Senior Assistant Attorney General Lead counsel for litigation and legislation relating to environmental protection, energy efficiency, renewable energy, carbon capture technology and associated consumer issues		
2/2004 – 3/2005	State of Illinois Department of Commerce and Economic Opportunity Bureau of Energy and Recycling Chicago, Illinois Senior Policy Advisor: Policy counsel responsible for analyzing and formulating policy on energy and recycling issues;		
4/2000 – 2/2004	United Nations Security Council United Nations Compensation Commission Geneva, Switzerland First Legal Officer/Senior Team Leader: Manager of UN legal professionals and		

independent scientific and financial experts retained to analyze claims for environmental

damage from the oil fires in Kuwait, releases of oil into the Persian Gulf and

demining/unexploded ordinance recovery arising from the Gulf War

3/1993 - 4/2000	Environmental Law and Policy Center Chicago, Illinois Staff Attorney: Lead counsel in Clean Air Act enforcement actions, electric power generation and transmission planning cases and environmental permitting proceedings before state and federal courts, the Federal Energy Regulatory Commission and state utility commissions (Illinois, Indiana, Iowa, Michigan, Minnesota, Ohio and Wisconsin)
1/1992 - 12/1992	Howard & Howard Bloomfield Hills, Michigan Attorney: Associate in environmental practice group
5/1991 – 12/1991	National Wildlife Federation Great Lakes Center Ann Arbor, Michigan University of Michigan Law School
	Staff Attorney/Clinical Assistant Professor: Worked on Clean Air Act and Clean Water Act citizen suits for National Wildlife Federation-sponsored law clinic
8/1988 - 5/1991	University of Maryland School of Public Affairs College Park, Maryland School of Law Baltimore, Maryland
	Assistant Professor: Taught environmental policy and law courses Supervised environmental law clinic cases
	Research Director, Center for Global Change: Managed research on methodologies to quantify and value environmental costs of electric power generation
8/1984 - 6/1988	Northland College Ashland, Wisconsin Assistant/Associate Professor: Taught environmental policy courses
12/1983 - 7/1984	Radioactive Waste Review Board Ashland, Wisconsin Public Information Officer: Prepared and implemented public information program for state agency responsible for high level radioactive waste disposal issues
6/1982 - 8/1983	University of Wisconsin Resource Sociology Group Madison, Wisconsin Research Assistant: Analyzed data for time-of-day electric rate experiment
8/1981 - 5/1982	Foley & Lardner Madison, Wisconsin Law Clerk: Researched electric and gas utility matters for litigation team
1/1980 - 7/1981	Wisconsin State Senate Madison, Wisconsin Legislative Aide: Analyzed and drafted legislation on electric and gas utility matters for Senate Committee on Energy and Utilities
5/1978 – 9/1978 6/1974 – 8/1974	Office of Congressman David Obey Washington, D.C. Legislative Aide/Intern: Assigned to work on appropriations and budget issues

Professional Licenses

State Bar of Wisconsin State Bar of Michigan State Bar of Illinois