

SAES-422 Multistate Research Activity Accomplishments Report

Project No. and Title: NRSP-3, The National Atmospheric Deposition Program – A Long-Term Monitoring Program in Support of Research on the Effects of Atmospheric Chemical Deposition

Period Covered: 5-2013 through 4-2014

Date of Report: June 13, 2014

Meeting Dates: Fall, October 8-11, 2013; Spring, April 14-17, 2014.

Participants

A listing of the attendees is provided, and also available at the meeting summary location at the NADP website (<http://nadp.isws.illinois.edu/nadp2013/>) (attachment).

Meeting Minutes

The NADP is comprised of a technical committee (all participants), an executive committee, several scientific committees, and a series of subcommittees focusing on specific areas of the ongoing project, including operations, quality assurance, ecological response and outreach, and data management. All approved meeting minutes from our 2014 Spring Meeting (and all other meetings) are available on our website (<http://nadp.isws.illinois.edu/committees/minutes.aspx>). Some subcommittee minutes from the Spring Meeting will be delayed for approval, but they will be posted when approved at the same address.

The attachment is the minutes of the Fall 2013 Joint Subcommittee Meeting (a meeting of all participants, with topics of interest to all) (attachment).

Spring 2014 Subcommittee minutes will be available here (<http://nadp.isws.illinois.edu/committees/minutes.aspx>) as they become finalized and available.

Accomplishments

The NRSP-3 provides a framework for cooperation among State Agricultural Experiment Stations (SAES), the U.S. Department of Agriculture-National Institute of Food and Agriculture, and other cooperating governmental and non-governmental

51,200 hourly and two-hourly averages. QA samples are run at the individual sites and not part of the NADP sample counts.

NADP Database. Our second most important accomplishment/outcome is making data available to all for the support of continued research. Scientists, policymakers, educators, students, and others are encouraged to access data at no charge from the NADP website (<http://nadp.isws.illinois.edu>). This website offers online retrieval of individual data points, seasonal and annual averages, trend plots, concentration and deposition maps, reports, manuals, and other data and information about the program. As of today, 2012 calendar year data are complete and online, and the 2013 data is online with final QA to be completed in the next several weeks for development of the final 2013 annual maps and database. Website usage statistics provide evidence that our data are being used. During this reporting period, website usage remained strong. We have recorded 37,582 registered users who accessed our website information and there were 27,806 data downloads from the site (about our typical number). The website received over 1.27 million “hits.” Maps (single or multiple) were downloaded 22,582 different times. We continually divide users into types, and this year was again very typical; about 40% were from federal and state, 36% from universities, 16% from K-to-12 schools, and 8% from other individuals or organizations. The NADP website has registered users from more than 150 countries across the globe. These statistics demonstrate that NADP continues to be relevant to both the scientific and educational communities and continues to attract new users.

Map Summary. The 2012 annual map series and Map Summary Report was developed during June 2013 and available in September 2013. These maps are used widely and constitute one of the major products of the network. Individual maps are filed by network, year, and constituent, and can be downloaded in several formats (<http://nadp.isws.illinois.edu/data/annualmaps.aspx>). Individual maps are compiled into annual Map Summary reports, and the 2012 Map Summary is also available for download (<http://nadp.isws.illinois.edu/lib/dataReports.aspx>). We printed 2,000 copies of the 2012 Annual Summary, and about 80% of these have been distributed thus far. The 2013 data is about to be completed at this writing, and the map development will begin very soon. The 2013 Map Summary report will be available about September 1.

Scientific Meeting (Fall 2013). At the end of each federal year, a combined business and scientific meeting is held to showcase some of the latest deposition research that occurred during the year. During FY13, the meeting focused on “Western U.S. Monitoring and Analysis: Progress and Current Issues” with a goal of focusing more on the observations most important in the Western U.S. (Park City, UT Oct 8-11, 2013). This meeting was a bit unusual due to the federal shutdown and the lack of federal

30. Dodson, J., 2013. Final report: Nutrient TMDL for Jackson Blue Spring and Merritt's Mill Pond (WBIDs 180Z and 180A). Nutrients January 2013.
31. Eckley, C. S., Parsons, M. T., Mintz, R., Lapalme, M., Mazur, M., Tordon, R., ... & St Louis, V., 2013. Impact of closing Canada's largest point-source of mercury emissions on local atmospheric mercury concentrations. *Environmental Science & Technology* 47(18): 10339–10348.
32. Epstein, D. M., Neilson, B. T., Goodman, K. J., Stevens, D. K., & Wurtsbaugh, W. A., 2013. A modeling approach for assessing the effect of multiple alpine lakes in sequence on nutrient transport. *Aquatic Sciences* 75:199–212. doi:10.1007/s00027-012-0267-2.
33. Evans, D. M., Schoenholtz, S. H., Wigington Jr., P. J., Griffith, S. M., & Floyd, W. C., 2013. Spatial and temporal patterns of dissolved nitrogen and phosphorus in surface waters of a multi-land use basin. *Environmental Monitoring and Assessment* 1–15.
34. Faustini, J., Thom, T. A., Hunt, K. J., Nilius, R., & Burns, R. E., 2013, November. Water resource inventory and assessment: Cape Romain National Wildlife Refuge, Charleston County, South Carolina. U.S. Fish and Wildlife Service, Southeast Region. Atlanta, Georgia. 84 p.
35. Florida Department of Environmental Protection, 2013. Final Report: Mercury TMDL for the State of Florida, Watershed Evaluation and TMDL Section, October 24, 2013.
36. Franzen, C., 2013. Determination of Atmospheric Mercury and its Deposition in Remote Areas of the Northern and Southern Hemisphere. Dissertation, Ruprecht-Karls-Universität, Heidelberg, Germany.
37. Freedman, Z., Eisenlord, S. D., Zak, D. R., Xue, K., He, Z., & Zhou, J., 2013. Towards a molecular understanding of N cycling in northern hardwood forests under future rates of N deposition. *Soil Biology and Biochemistry* 66: 130–138.
38. Gay, D. A., Schmeltz, D., Prestbo, E., Olson, M., Sharac, T., & Tordon, R., 2013. The Atmospheric Mercury Network: Examination of a long-term atmospheric mercury record across North America. *Atmospheric Chemistry & Physics* 13: 11339–11349. doi:10.5194/acp-13-11339-2013.
39. Geddes, J. A., & Murphy, J. G., 2013. Observations of reactive nitrogen oxide fluxes by eddy covariance above two mid-latitude North American mixed hardwood forests. *Atmospheric Chemistry and Physics Discussions* 13(10): 27891–27936.
40. Goss, N. R., Mladenov, N., Seibold, C. M., Chowanski, K., Seitz, L., Wellemeyer, T. B., & Williams, M. W., 2013. Quantifying particulate matter deposition in Niwot Ridge, Colorado: Collection of dry deposition using marble inserts and particle imaging using the FlowCAM. *Atmospheric Environment* 80: 549–558.
41. Gu, B. & Howard, N., 2013. Annual Permit Compliance Monitoring Report for Mercury in Downstream Receiving Waters of the Everglades Protection Area. Appendix 3-2, Attachment F in 2012 South Florida Environmental Report Vol III. South Florida Water Management District, West Palm Beach, FL.
http://my.sfwmd.gov/portal/page/portal/pg_grp_sfwmd_sfer/portlet_prevreport/2013_sfer/v3/appendices/v3_app3-2.pdf .

106. Yelenik, S., Perakis, S., & Hibbs, D., 2013. Regional constraints to biological nitrogen fixation in post-fire forest communities. *Ecology* 94(3): 739–750.
107. Zhang, Y., & Wu, S. Y., 2013. Fine scale modeling of agricultural air quality over the southeastern United States using two air quality models. Part II. Sensitivity studies and policy implications. *Aerosol and Air Quality Research* 13(5): 1475–1491.
108. Zhang, Y., 2013. Biogeochemical Cycling of Mercury in the Atmosphere-ocean-land System: Global and Regional Modeling. Master's Thesis, University of Washington.
109. Zhang, Y., Olsen, K. M., & Wang, K., 2013. Fine scale modeling of agricultural air quality over the southeastern United States using two air quality models. Part I. Application and Evaluation. *Aerosol and Air Quality Research* 13(4): 1231–1252.
110. Zhao, S., Liu, S., Sohl, T., Young, C., & Werner, J., 2013. Land use and carbon dynamics in the southeastern United States from 1992 to 2050. *Environmental Research Letters*, 8(4), 044022.
111. Zhou, J., Feng, X., Liu, H., Zhang, H., Fu, X., Bao, Z., ... & Zhang, Y., 2013. Examination of total mercury inputs by precipitation and litterfall in a remote upland forest of Southwestern China. *Atmospheric Environment* 81: 364–372.
112. Zhu, J., Wang, T., Talbot, R., Mao, H., Yang, X., Fu, C., ... & Xie, M., 2013. Characteristics of atmospheric mercury deposition and size-fractionated particulate mercury in urban Nanjing, China. *Atmospheric Chemistry and Physics Discussions* 13(11): 28309–28341.

Appendices

National Atmospheric Deposition Program 2013

Annual Meeting and Scientific Symposium

(underlined names were unable to attend due to federal budget restrictions)

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Joint Subcommittee Meeting

Park City, Utah

October 8, 2013

- Welcome – Mark Olson
 - broadcast and recording of Joint/NOS through anymeeting.com
 - Richard Tanabe will be taking minutes due to NOS Vice-chair and Secretary unavailable to attend due to Shutdown
- ***Motion to approve minutes from Spring Meeting – Madison, WI moved by Chris Lehmann, seconded by Pam Padgett. Minutes approved.***
- Introductions around the room.
- State of the NADP (David Gay)
 - Joint/NOS/Symposium/N Flux Workshop will be on-line

Financial Highlights - Income and Expenses

FY14 6.2% increase over FY13

- majority of dollars are spent @ labs
- CAL 45%, HAL 24% accounts for ~70%
- Personnel 25%
- Line items 5%
 - o Acid Rain 2015 13% - Combined with Fall Meeting, expected 600-900 attendees for conference

Network & Site News

NTN

- o PA – Integrated the PA State Network 15-18 sites in the state
- o NY – Integrated NY State Network
- o Canada – BC22, SK20, SK21
- o Argentina – still running, some shipping issues

- o Since Oct 2012
- o 1 lost, 11 added, 265 sites total

- o New map for NTN/AIRMoN – Bromide is the map on the Annual Report Cover

AIRMoN

- o VT99 closed on May 31, 2013
- o Down to 6 sites and holding

AMoN

Since Oct 2012

- o 1 lost (Kansas), 6 added, there will be 64 sites

- Substantial QA database

MDN

Since Oct 2012

- 4 lost, 2 added, 109 sites and some coming
- 16 methyl, 54 co-located, 7 urban, 4 daily
- Great Lakes Atmospheric Mercury Network
 - 9 new MDN sites (2 with continuous funding)
 - Fill in the gap for Michigan, Ohio, Indiana

AMNet

Since April 2012

- 3 lost, 7 added, 22 currently

Mercury Litterfall Initiative

- successful year 2012
- 14 sites
- 2013 sampling occurring now
 - 13 sites
 - Puerto Rico coming – will be year round sampling

Current Electronic Rain Gauge Network

- 260 out of 312
- 10-12 have e-gauges but not operating
- 85% of network is digital

Webinar Training

- started 2013
- alternating between the CAL and HAL
- 30-35 people
- a few technical issues early on, resolving issues with new equipment
- saving money
- how effective is yet to be seen
- training more, may not be as good/effective compared to in-person training

Recent Travel

- April in Montreal : Tri-national Workshop on Assessment of Monitoring Results from Mexico's PRONAME Program
- May in Chicago: Precipitation Chemistry Science Advisory Group
- May in Phoenix: National Tribal Forum
- Rochester : Acid Rain 2015 scouting trip

- CAL Status Report (Chris Lehmann)

Detailed report available at <http://go.illinois.edu/NADPCALREPORT>

New CAL Staff

- Tracey Dombek has left
- Annette Wells (FIA)
- Dr. Sybil Anderson (Special Projects)
- Katie Blaydes (ICP)
- Gustava Hoskins (Technician)
- Will add one more for shipping/receiving
- NADP Graduate Intern: Marcelo Vieira Silva

Other Staff changes

- Nina Gartman – CAL QA & Method Analyst
- Lee Green – CAL Lab Supervisor
- Brian Kerschner – Assistant Data Manager

Update analytical methods

- sulfite by IC
- Nitrite by Colorimetry
- Using passive samplers for ambient NO₂ and SO₂
- Total Nitrogen

New reports and data products
handling of low volume samples
See NOS for discussion

Site Operations and Site Support

- NTN – 11 new, 1 closed, 55 sites with significant issues
- AIRMoN – 1 closed, 1 with significant issue
- AMoN – 6 new, 1 closed, 1 with significant issues

CAL site support – Jeff Pribble

- Webinars on-line <http://go.illinois.edu/NADPTraining>

Lab Operations

- 2004 266 sites
- 2013 back to 265 sites
- CAL still has the capacity to absorb growth ~ 40-50 sites
- CAL detection limits
 - o Excellent performance
 - o By network and by instrument
 - o Bromide still a concern – don't see it getting any lower

AMoN Sampler Issues

- updated cleaning procedures – consulted with manufacturer

- reduced the number of travel blanks
 - o 1 in 4 sets

NTN/AIRMoN Archive Sample Distribution

- AIRMoN 3040 (1 research group)
- NTN 6020 (8 research groups)
- 2007 NTN currently being distributed
- 2009 AIRMoN currently being distributed

Data Deliverables - Average data lag

- NTN 67 days
- AIRMoN 49 days
- AMoN 79 days

Data Receipt Reports

- field forms scanned upon receipt and emailed back to NTN sites
- AIRMoN/AMoN – developing by end of year

Other Activities

- Total Nitrogen Deposition Study
- Total/Elemental Carbon Deposition Study
- Metro East St Louis Study completed
- Passive sampling of SO₂/NO₂
- Pursue as an expansion of AMoN Network
- Intern Ammonia Flux Study

Posters

- Sample Dilution Study
- AMoN 5 year Trends
- Training Webinars

- HAL Report (Bob Brunette)

- review of Mercury Regulations

MDN Site Startup/Shutdowns in 2013

- LADCO support of ~ 20 MDN sites (~8-10 new)
- Approximately half can get up and running quickly with existing sites/operators
- High altitude locations – higher precipitation and higher Hg wet deposition
- Makah MDN (WA03)
 - o On life support from the HAL
 - o Important site due to offshore flow
 - o North American input, mostly non-US source influenced
- proposal to monitor high altitude sites
- high Hg deposition region not monitored

- corresponds to high inland lake and fish monitoring data (high fish Hg)

MDN Network Operations

Equipment Modernization

- ACM 56 (-5)
- NCON 52 (+5)
- Belfort 11 (-1)
- E-gage 97 (+1)

Site Liaison Activity

- 307 technical support calls
- 186 e-mails

Equipment Failures

N-CON

- 12 Thies sensors, 1 motor, 3 relays, 1 power cord/ 1 event recorder cable

ACM

- 14 motor boxes, 4 sensors, 4 heater, 1 thermostat

Ott Pluvio

- 1 gauge sent to Hach

ETI

- none

New staff - Dave Wunderlich – QA Manager since Oct 2012

HAL 2012 Lab Review

- specific recognition 11
- Findings 9

HAL database conversion

- Access to SQL conversion
- Submitted Nov 2012, original and new and compared
- Submitted to Program Office QA – 1st/2nd round
- HAL to submit response to 2nd round of comments

Data Deliverable Schedule

- submitted annual 2012 QA Report
- need to respond on comments

Commission new instrument

- automated Total Mercury Instrument
- comparison looks good, not final values
- close to green light to move forward

HAL proposal for NOS for collocated MDN/NTN site precip depth data

- when the gauge fails and no backup data, currently use bottle catch/bucket catch, may produce 2 different values
- there is a concern if challenged in court

HAL Sample Evaporation Study

- follow up from PO report Spring/Fall 2012 – PO data showed ACM evaporation with fan on
- HAL ran an 8 month study using 2 MDN ACM
- Not seeing losses so far

Trace Metal Initiatives

- 12 point plan – further discussion 2014
- 7 new Trace Metal Sites in 2013

Total Mercury Deposition at MDN sites

- estimate Dry Deposition of RGM (reactive gaseous mercury)Hg monitor
- passive system to supplement wet deposition
- HAL selected to support Natural Rivers and Streams Assessment 2013-14
- Measuring fish tissues

- QA Report (Mark Rhodes)

2012 QA Reports

- Field Survey – in progress
- HAL – comments from external reviewers received
- CAL – in progress
- AMNet – in progress

2013 QA Reports

- start working on reports

External Reviews

2013 Program Office – Aug 2013

- Gary Lear – USEPA (Team Leader)
- Kristi Morris – NPS
- Amy Ludke – USGS
- No report at this meeting as all reviewers are federal employees

2014 CAL

- Greg Wetherbee – USGS (Team Leader)
- Eric Hebert – EEMS
- Richard Tanabe – Environment Canada
- Chemistry person - ?

Site Survey – June 2013 (# completed)

- AIRMoN – 0, MDN – 18, NTN – 38, Collocated – 9
- AMNet – 2, AMoN – 5

Training Webinars

- CAL/HAL on alternate months
- AMNet pending USGS Field Audit Program recorded and posted in August

Updates in NOS

- SOP approval
- Revision to Site Selection and Installation Manual
- NTN Bag Sampling
- Sensor Study
- AMoN Travel Blanks
- Belfort Rain Gauge
- Methyl Mercury
- MDN Evaporation

SOP usage citation and disclaimer – other agencies/networks are using but not crediting NADP

Breakout to sub committees and meet back after lunch for continuation of Joint Sub-committee Meeting.

Call to Order – Mark Olson @ 13:39

- Sub-Committee Reports
 - See each sub-committee's minutes for details and highlights from the individual meetings
- Webinar Training (Jason Karlstrom)
 - NADP Site operations On-Line Training Sessions
 - using anymeeting.com
 - Since the Spring meeting there have been 8 sessions
 - MDN 18-22 attendees
 - NTN 21-34 attendees

Technical issues

- YouTube is often blocked on attendees computers
- YouTube videos are not viewable in recordings
- Live demos not best due to lack of multiple viewing angles
- Significant audio issues – USGS webinar in August and MDN sample change webinar
- Upcoming webinars 2013-10-30 AMON and 2013-11-13 NTN FORF
- After the audio is resolved, need to redo the sample change
- Other topics monthly data review, MDN overview
- Sample video was played

Discussion

- Are other technologies available [Cari Furness]
- Possible to have operators watch every few years, customize a DVD eventually [Jason Karlstrom]
- host on NADP server [Chris Lehmann]
- consider production options [Cindy Huber]
- may be training the same people every time [Jason Karlstrom]
- are operators/supervisors notified [Mark Rhodes]
- for MDN note goes in coolers, e-mails also go out for both NTN and MDN [Jason Karlstrom]

- Mercury Litterfall Report (David Gay)

- second year – 13 sites, in 2012 there were 14 sites
- data in on time
- data is not released on web
- some numbers are quite large
- moving along quite nicely
- advertised this year and got some more sites

- AMNet Report (Mark Olson)

2013 Progress Report

- 18 to 22 sites up 20%
- OH02 back on line
- OH52, Toledo, Lake Erie
- Soon to add AK03, first GEM only site
- Presque Isle, Maine on-line in November 2013

Site Visits

- 13 in 2013
- 4 for the first time
- 9 repeat
- next up is NS01, MD08
- NYSDEC site visits – shuffling of equipment at sites
- NYSERDA supports 3 NY sites

AMNet Data Availability

Data Posting Lag Times

- Reduce lag between collection and submission
- Work toward real time data submission
- Collocate 2537X and speciation at WI07 (Aug 2013)

What's next?

- expected data transfer
- site visits
- expansion to Asia

- NY State relocation of 3 sites
- Continue collocation in WI

Questions

- Is Tekran providing new instrument for approval [Mark Rhodes]
- 2537X – NADP is in possession at WI07, rest of Speciation system from Florida DEC [Mark Olson]

- Shutdown Samples (Chris Lehmann)

- there were 47 NTN site changes on September 30
- 194 hours? Once sample exceeds, what to do with the data? Invalidate?
- Pam Padgett – NPS asked for furlough exemption for CA94
- Will have to look at on a case by case basis

- AMoN Status Report (Chris Lehmann)

- 64 AMoN sites
- 3 new Canadian sites

Average Concentrations 2012

- time weighted mean
- quarterly relative concentration

Independent Audit Program

- 8 sites participated in independent audit program

Passive Sampler Precision

- 2007-2010 triplicates on all deployments
- 2011-present triplicates on 5%
- Precision data quality 20%

Travel Blanks

- remains an interesting problem
- the lab continues to test, including staff lunches

QA – DQO – Spring Meeting

- Sigma-Aldrich coupler – drilled & tapped for 5/16" – #18 bolt
- Why Radiello PDS (passive diffusion sampler)?
 - o Comparison with Alpha, Ogawa
 - o Collocated at Bondville
 - o Not sure if Alpha is still available
 - o Ogawa – not sure if still a US distributor

Current AMoN Research

- MARGA comparison

Planned Activities

- collocate IL11 Pranalytica NH3
 - NH3 Chamber Exposure Study
 - AWMA – 5 year trend test
 - Significant trends ($p < 0.1$) at 8 sites, no trend at 6 sites
- Nitrogen Flux Workshop Update (Chris Rogers for John Walker)
 - update on the block agenda on web
 - Wednesday Symposium Start time at 9:15 am
 - “1st Deposition Dash” will start at 7:00am, meet in the lobby for a walk/run
 - 3 miles or 1 hour
 - Spring 2014 Meeting – Ft Lauderdale, FL
April 14-17, 2014
Sheraton Ft. Lauderdale Beach Hotel
Reservation Deadline: March 14, 2014
 - Fall 2014 Meeting – Indianapolis, IN
Date: TBD (maybe in September)
 - NADP Secretary Nominations – Andy Johnson for Kathleen Weathers
-recommended nominee: Emily Elliott from University of Pittsburgh
 - Other Business
Chris Rogers
 - what to do with MeHg database
 - very close – have something for spring
 - move forward

MOTION: Pending HAL and Program Office resolving questions arising from Mark Rhodes’ study, that the recalculated Program Office Methyl Mercury data be made available on the website as soon as practical.

Moved by Chris Rogers, seconded by David Gay

Discussion:

- HAL reports already available [Mark Olson]
 - o If the published values are different, is it a problem
 - o Reports are stamped preliminary
- If significant differences at site, what is the correct value, look to see why there is a difference and if significant, which is correct? [Bob Larson]

