

Asia-Pacific Mercury Monitoring Network Workshop

26-29 July 2016

Pathumwan Princess Hotel
444 MBK Center, Phayathai Road,
Wangmai, Pathumwan, Bangkok, Thailand 10330
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July 26, 2016 (Tuesday)	
08:00-09:00	Registration
09:00-09:30	Opening Ceremony Special Remarks <i>Dr. David Gay, Coordinator, NADP, USA</i> Special Remarks <i>Mr. David Schmeltz, USEPA Office of Atmospheric Programs, USA</i> Special Remarks <i>Mr. Eric Frater, First Secretary Economic Division, US. Embassy</i> Special Remarks <i>Mr. Kelly W. Hsieh, Taiwan Representative</i> Special Remarks <i>Mr. Tzi-Chin Chang, Deputy Minister, EPAT, Taiwan</i> Welcome Remarks <i>Ms. Suwanna Tiansuwan, Acting Director General, Department of Environmental Quality Promotion, Thailand</i> Opening Address <i>Mr. Sakol Thinagul, Inspector General, Ministry of Natural Resources and Environment, Thailand</i>
09:30-09:45	Donation Ceremony of wet deposition sampler for mercury by Deputy Minister Mr. Tzi-Chin Chang, EPAT, Taiwan
09:45-10:00	Group Photo
10:00-10:15	Coffee Break
10:15-12:00	Session Hg-1: Overview of the Mercury Problem , chaired by Hathairatana Garivait, ERTC, Thailand

10:30-10:45	Mercury in East and Southeast Asia <i>Guey-Rong Sheu, National Central University, Taiwan</i>
10:45-11:00	<i>Health and Environmental Impacts of Mercury in Thailand</i> <i>MD. Adul Bandhugul, Nopharatana Rachathani Hospital, Thailand.</i>
11:00-11:15	Update on the Minamata Convention (Monitoring and Effectiveness Evaluation) <i>Sandy Steffen, Environment and Climate Change Canada</i>
11:15-11:45	Atmospheric and Wet Deposition of Mercury in Thailand <i>Patcharawadee Suwanathada, Pollution Control Department, Thailand</i> <i>Hathairatana Garivait, Environmental Research and Training Center, Thailand</i>
11:45-12:00	Discussion
12:00-13:30	Lunch
13:30-15:30	Session Hg-2: Overview of the Asia Pacific Mercury Monitoring Network, chaired by David Gay, NADP, USA
13:30-13:45	Regional Cooperation to Track Atmospheric Mercury: The Asia-Pacific Mercury Monitoring Network <i>David Schmeltz, EPA, USA</i>
13:45-14:00	Update on the APMMN and progress on wet deposition sample analysis <i>Guey-Rong Sheu, National Central University, Taiwan</i>
14:00-14:15	Taiwan's support to the Asia-Pacific Mercury Monitoring Network <i>Hung-Teh Tsai and Hung-po Hsu, EPA, Taiwan</i>
14:15-15:30	Discussion
15:30-15:45	Coffee break
15:45-16:30	Day 1 Wrap up and plans for Day 2 <i>David Schmeltz, EPA, USA</i>
17:00	Bus leaves Pathumwan Princess Hotel for Banquet at Baiyoke Sky Hotel
18:30-22:00	Welcome Banquet <i>Hosted by Thailand Department of Environmental Quality Promotion</i>

July 27, 2016 (Wednesday)

09:00-13:00	Session Hg-3: APMMN Partner and Stakeholder Updates (continued), chaired by Guey-Rong Sheu, NCU, Taiwan and David Schmeltz, EPA, USA
09:00-09:15	Indonesia <i>Aditia Nugraha, Ministry of Environment and Forestry</i>
09:15-09:30	Vietnam <i>Nguyen Thi Nguyet Anh, Vietnam Environment Administration, Center for Environmental Monitoring</i>
09:30-09:45	Sri Lanka <i>Senarath Mahinda Werahera, Ministry of Mahaweli Development and Environment</i>
09:45-10:00	Mongolia <i>Enkhmaa Sarangerel, National Agency for Meteorology and Environment Monitoring Tumenbayer Bataar, Sans Frontiere Progres</i>
10:00-10:15	Bangladesh <i>Md. Mustafizur Rahman Akhand, Department of Environment</i>
10:15-10:30	Philippines <i>Tess Peralta, Department of Environment and Natural Resources</i>
10:30-10:45	Cambodia <i>Sophal Laska. Ministry of Environment</i>
10:45-11:00	Coffee break
11:00-11:15	Korea (National) <i>Rhokho Kim, National Institute for Environmental Research</i>
11:15-11:30	Korea (Academic) <i>Seunghye Han, Gwangju Institute of Science and Technology</i>
11:30-11:45	Canada <i>Sandy Steffan, Environment and Climate Change Canada</i>
11:45-12:00	Mercury research and monitoring in Australia <i>Peter F. Nelson, Macquarie University</i>
12:00-13:00	Q&A/Discussion
13:00-14:30	Lunch

14:30-15:30	Session Hg-4: APMMN Mercury Wet Deposition Roundtable Discussion <i>Da-Wei Lin, APMMN Site Liaison, National Central University, Taiwan</i> <i>Guey-Rong Sheu, National Central University, Taiwan</i> <ul style="list-style-type: none"> • Any changes in the SOP needed? Are there shipping issues? • Demonstration and Practice of Sampler • Glassware; cleaning of glassware issue • Laboratory issues/problems • Precharge of samples • Quality assurance (equipment field study)
15:30-17:00	Session Hg-5: Future Network Directions Discussion, Chaired by David Gay, and Mark Olson NADP, USA <ul style="list-style-type: none"> • Rain gage information – what is needed? how do we get it? • Website (review) • MOA – What are the basic requirements to participate (shipping, available hi-grade acids, etc.)? • Ideas for measuring atmospheric mercury concentrations in a network mode <i>Kohji Marumoto, NIMD, Japan</i>
17:00	Bus leaves Pathumwan Princess Hotel for Banquet at Evergreen Laurel Hotel
18:30-22:00	Welcome Banquet <i>Hosted by Taiwan EPA</i>

July 28, 2016 (Thursday)

08:00	Bus leave Pathumwan Princess Hotel to ERTC
09:00-09:30	Registration ERTC VDO presentation Welcome to ERTC by Mr. Solos Khankhrua, Director of Environmental Research and Training Center
09:30-09:45	Grouping
09:45-10:30	Concurrent and Rotating Sessions for the demonstration of mercury monitoring in air and rain water (Three demonstration groups) <ul style="list-style-type: none"> Group 1: Sampling of gaseous mercury and wet deposition at ERTC's monitoring Station (Dr. Daisy Morknoy and the team, ERTC) Group 2: Sampling method for mercury measurement in particulate matter, gaseous mercury and human hair (Dr. Kohji Marumoto and colleague, NIMD, Japan) Group 3: Continuous atmospheric mercury monitoring (Ms. Nittaya Chaisaard and the team, PCD Air Quality Mobile Laboratory)
10:30-10:45	Coffee break
10:45-12:30	Concurrent and Rotating Sessions for the demonstration of mercury monitoring in air and rain water (Continued)
12:30-14:00	Lunch
14:00-15:30	Concurrent and Rotating Sessions for the demonstration of mercury monitoring in air and rain water (Continued) <ul style="list-style-type: none"> Group 1: Analytical method for the measurement of mercury in air and rain Water (Dr. Hathairatana Garivait and the team, ERTC) Group 2: Analytical method for mercury measurement in particulate matter, gaseous mercury, wet deposition and human hair (Dr. Kohji Marumoto and colleague, NIMD, Japan) Group 3: Differences between Gaseous Elemental Mercury (GEM) measurement and Speciation Mercury measurement (Mr. Mark Olson, NADP, USA)
15:30-15:45	Coffee break
15:45-17:15	Concurrent and Rotating Sessions for the demonstration of mercury monitoring in air and rain water (Continued)
17:15	Bus leaves ERTC for Pathumwan Princess Hotel

July 29, 2016 (Friday)

08:00	Bus leaves Pathumwan Princess Hotel to ERTC
09:00-10:45	<p>Concurrent and Rotating Sessions for Demonstration of Advanced Mercury Measurement Techniques (brush up)</p> <p>Group 1: Analytical method for the measurement of mercury in air and rain Water (Dr. Hathairatana Garivait and the team, ERTC)</p> <p>Group 2: Analytical method for mercury measurement in particulate matter, gaseous mercury, wet deposition and human hair (Dr. Kohji Marumoto and colleague, NIMD, Japan)</p> <p>Group 3: Differences between Gaseous Elemental Mercury (GEM) measurement and Speciation Mercury measurement (Mr. Mark Olson, NADP, USA)</p>
10:45-11:00	Coffee break
11:00-12:30	Concurrent and Rotating Sessions for Demonstration of Advanced Mercury Measurement Techniques (Continued)
12:30-14:00	Lunch
14:00-15:30	<p>Wrap up the 5th APMMN meeting and Discussion</p> <p>Closing by Mr. Solos Khankhrue, Director of Environmental Research and Training Center</p>
15:30	Bus leave ERTC for Pathumwan Princess Hotel