## **GEO Health Community of Practice (CoP)**

**Community Telecon** May 30, 2023

## In Attendance: 36 participants

John Haynes (NASA HO), Juli Trtanj (NOAA), Helena Chapman (NASA HO/BAH), Stephanie Schollaert Uz (NASA Goddard), Matthew Tisdale (NASA Atmospheric Science Data Center), Brian Tisdale (NASA Earthdata GIS), Carl Malings (NASA Goddard & Morgan State Univ.), Katy Matthews (NOAA Satellite and Information Service), Justyna Nicinska (NOAA), Elizabeth Pleuss (USAID), Gonza Namulanda (CDC), Ajay Gupta (HSR.health), Rebecca Gutema (HSR.health), Ram Peruvemba (HSR.health), Sushel Unninayar (NASA Goddard & KBR/Morgan State U.), Karly Harrod (Oak Ridge National Laboratory), Temilavo Adeyeye (New York State Department of Health), Gaige Kerr (George Washington Univ.), Susana Adamo (Earth Institute, Columbia University), Cascade Tuholske (Montana State Univ.), Fazlay Faruque (University of Mississippi Medical Center), Luis Fernando Chaves (Indiana University Bloomington), Mark Seielstad (Univ. of California in San Francisco), Olayinka Osuolale (Elizade Univ., Nigeria), Martyn Clark (GEO Secretariat), Paschalis Tziastas (European Commission), Didier Davignon (Environment and Climate Change, Canada), Melissa MacDonald (Environment and Climate Change, Canada), Mahesh Jampani (International Water Management Institute, Sri Lanka), Adrian Guzman (Mexican Space Agency), Carlos Barboza (Ministry of Public Health, Uruguay), Mercy Borbor (Escuela Superior Politécnica del Litoral, Ecuador), Reyna Durón (UNITEC, Honduras), Gissel Padilla (UNITEC, Honduras), Jose Portillo, E. Doran.

## Summary Notes:

\*Prepared by Helena Chapman (NASA HQ/BAH)

John Haynes (NASA) and Juli Trtanj (NOAA) opened the telecon by welcoming all participants.

**Juli Trtanj (NOAA)** stated that this community telecon will serve as a coordination call, in order to discuss the GEO Heat Incubator, Deep Dive for EuroGEO on June 9, <u>AmeriGEO Week</u> in Costa Rica from August 7-11, and <u>GEO Week and Ministerial Summit</u> in South Africa from November 6-10.

**Martyn Clark (GEO Secretariat)**, who serves as the Urban Resilience Coordinator at the GEO Secretariat, stated that the four engagement priorities within GEO are climate change, disaster reduction, urban resilience, and sustainable development goals. As part of the Heat Incubator, he said that they aim to co-develop a global service that provides data and insight to better understand health risks from heat and global urban settlements. He appreciated the collaboration with EO4Health and WHO/WMO, as they scope out the best design and develop the concept note. He shared the three components – a) seasonal forecasting of temperatures and heat risk; b) urban heat mapping and analysis for action; and 3) youth challenge (e.g. sensor development, map-athon, photo essay). As part of the GEO Symposium in June, he commented that he and **Joy Shumake-Guillemot (WMO)** would be co-leading a session on heat-health, to discuss the meteorological factors and forecasting capabilities with the Heat Incubator. He said that **Bob Chen (CIESIN/Columbia Univ.; NASA SEDAC; GEO Human Planet Initiative)** will talk about how Earth observations can help us better understand heat exposure, and other panelists will describe scientific and policy applications. **Helena Chapman (NASA/BAH)** said that **Andreas Skouloudis (iSteep.org)** will be presenting a highlight on the <u>NASA-ORNL-RPI Student Engagement</u> collaboration.

**Juli Trtanj** (NOAA) commented that the CoP can offer technical expertise and connections as well as specific products from the Heat Small Work Group. She said that these products are being produced for research (not operational) applications, but that they are valuable for informing risk assessment across cities to the granular scale. She commented that various federal and intergovernmental agencies (e.g. NOAA, NASA, IAI) have funded research on heat mapping capacity. **Helena Chapman** (NASA/BAH) shared three NOAA web features – Lessons from heat mapping in two tropical cities from May 2023; NOAA, communities to map heat inequities in 14 states, 1 international city from April 2023; and NOAA and communities to map heat inequities in 14 U.S. cities and counties from April 2022 – and the available recording from the <u>NIHHIS National Meeting 2023</u> in April 2023.

**Carlos Barboza (Ministry of Health, Uruguay)** said that the phenomenon of urban heat waves and heat islands is closely followed by the energy sector, since it impacts energy demand (e.g. heat-cold waves, health demand, energy expenditure). He believed that the energy sector is a strategic partner, and that meteorological systems should be adapted to study interurban heat and cold waves.

**Juli Trtanj (NOAA)** asked how the CoP can help leverage expertise for the Heat Incubator and what they plan to launch at the GEO Week and Ministerial Summit in November. She wondered if they could consider an urban mapping activity, with a live campaign and youth challenge, for the GEO Week and Ministerial Summit in Cape Town. **Martyn Clark (GEO Secretariat)** said that they hope to present the project in its current form at the GEO Symposium in June and then launch the project plan with key partners at the GEO Week and Ministerial Summit in November. **Katy Matthews** (**NOAA Satellite and Information Service**) and **Justyna Nicinska** (**NOAA**) said that they would be with the US delegation at ExCom and would be happy to gain input from this group to support US remarks at the ExCom. They shared <u>more information</u> on GEO members and participating organizations.

Martyn Clark (GEO Secretariat) said that they have noted Esri's interest for a hackathon or mapathon. Juli Trtanj (NOAA) highlighted that Esri has been front and center for CoP, including a cholera story map in 2009, and that they should consider elevating the visibility of this partnership. She suggested the addition of a heat-health demonstration, challenge or urban heat city pilot, which they can package and then assess the goal (e.g. improve forecasts so actionable at city-level). Helena Chapman (NASA/BAH) shared the Esri talk at <u>CoP Annual Meeting 2021</u> and the <u>Peru Mapathon</u> example. Ajay Gupta (HSR.health) asked if there is a specific city to select as a host or partner for a health challenge – or just focus on heat-health mapping and risk assessment. Juli Trtanj (NOAA) said that one partnership idea could be the Rockefeller Foundation, who has funded heat resilience officers. Susana Adamo (Earth Institute, Columbia University) wondered if Rio de Janeiro could be a possibility, noting that the Columbia Global Center Rio just launched the <u>Climate Hub-Rio</u>.

Helena Chapman (NASA/BAH) shared details about the One Health session (scientific talks with discussion), side event (flash talks with case discussion), and training side event (dengue early warning system in Costa Rica) at AmeriGEO Week 2023. She also commented that they plan to connect with at least two universities in San José, where two AmeriGEO members can conduct informative talks on using Earth observations for health and disaster applications. Juli Trtanj (NOAA) commented that the audience for the side event will focus on the medical and public health community, and the training side event will focus on the vector control community. Ajay Gupta (HSR.health) suggested that the side event facilitators request that the clinical community present case histories of patients with and without the condition (e.g. asthma for air quality, heat-related illness for extreme heat), to consider a holistic view of the health effect of these environmental exposures.

John Haynes (NASA) opened the telecon for updates by CoP members.

**Ajay Gupta (HSR.health)** said that the summary report from the Space in Geospatial session, which was held at the 125<sup>th</sup> OGC Member Meeting in February 2023, will be published soon. John Haynes (NASA) said that the <u>Air & Waste Management Association annual meeting</u> will be held in Orlando, Florida, from June 5-8. Helena Chapman (NASA/BAH) said that the <u>AGU Chapman Conference on Climate and Health for Africa</u> will be held in Washington, DC, from June 12-15. Reyna Durón (UNITEC, Honduras) encouraged CoP members to publish their articles in their bilingual academic journal, <u>Innovare</u>.

**Juli Trtanj** (NOAA) said that the <u>Clim-HEALTH Africa</u> has been recently relaunched and will hold a meeting in late July 2023. She also said that the WMO is revising guidance documents based on the UN Early Warnings For All Initiative, and that they plan to convene a working group on heat early warning systems that can facilitate coordination across organizations (e.g. donors, public and private sector, non-governmental organizations).

John Haynes (NASA HQ) and Juli Trtanj (NOAA) thanked CoP members for their continued contributions to the field and engagement in the group discussion. They agreed that this community teleconference has provided an opportunity to share information, connect researchers, and leverage resources that can amplify current activities using Earth observations for public health applications.

John Haynes (NASA HQ) and Juli Trtanj (NOAA) closed the teleconference and mentioned that the next community teleconference will be scheduled for Friday, June 9, 2023 at 8:30AM EDT (GMT-4).

Adjourned: 9:55AM EDT (GMT-4)