CEOS SEC-304 Report

Entity: SIT Chair Team
Prepared By: SIT Chair Team

Updates on issues raised during the last CEOS SEC teleconference

None.

Issues requiring discussion/decision during current CEOS SEC teleconference

None

Other highlights, activities, actions, projects, collaborations

Carbon & Biomass

- SIT Chair team attended the WMO GHG event in Geneva and have solicited an update on the initiative from WMO at SIT-38.
- Awaiting replacement for Jo Post at UNFCCC SEC in the RSO role.
- ESA EOHB team is reaching out to relevant CEOS groups for the 2023 edition please support with your contributions
- Biomass product harmonisation team is revectoring away from a single harmonised product (no demand, too difficult) to product harmonisation tools.
- AFOLU Roadmap team met last week and will report to SIT-38. Good progress.

CEOS-ARD

- OGC ARD Standards Working Group kick-off next week (Feb 21) at ESRIN. CEOS will be giving a presentation and we have provided a package of CEOS-ARD materials for info.
- LSI-VC-13 will be held the week before SIT-38, also at ESRIN.
- CEOS-ARD has been identified as a headline topic by the New Space Task Team.
- The ARD Oversight Group is planning a SIT-38 side meeting to work through the latest version of the PFS template.

CEOS New Space

- The 2nd teleconference of the New Space Task team was held on 10 Feb.
- There is an open invitation for Agencies to request short slots on the SIT-38 agenda to share relevant New Space experience.

SIT-38 Preparations

- Information on the SIT-38 meeting will be posted here: https://ceos.org/meetings/sit-38/
- Documents for decision should be submitted by 7 March.
- A presentation template has been posted on the website. Presentations should be submitted by 21 March.
- CEOS Agency delegations are asked to register via the meeting website. https://ceos.org/meetings/sit-38/
- There is an open invitation for Agencies to request short slots on the SIT-38 agenda to share relevant New Space experience.

Upcoming meetings or events

- SIT-38 will be held at ESA ESRIN (Frascati, Italy) in the week of 27th March 2023. Tue 28th March will be assigned to side meetings and Wed 29th and Thu 30th March will be the main days for SIT-38. A draft of the agenda was shared with SEC on Feb 14. More information regarding logistics, etc. will be sent shortly.
- The SIT Technical Workshop will be held 17-19 October 2023 at ESA ESRIN (Frascati, Italy).

CEOS SEC-304 Report

Entity: CEO

Prepared By: Marie-Claire Greening

Actions:

None

CEOS-GEO Coordination Meeting

This meeting took place in hybrid form on Monday 6th February 2023. CEOS was represented in-person at the GEOSEC offices in Geneva by the SIT Chair (Ivan Petiteville), the SEO (David Borges), the Ecosystem Extent Task Team (Marie-Josee Bourassa) and the CEO (Marie-Claire Greening). The CEOS Chair (Pakorn Apaphant) attended remotely for the first half of the meeting, as did other experts who dialled in for specific topical sessions. Topics covered included:

- Overarching topics
 - o 2023 CEOS Chair theme
 - Plans for the 2023 GEO Ministerial
 - Role of CEOS in the post-2025 GEO Strategy
 - Capacity Development and Data Democracy
- Support to Global Challenges:
 - Climate and Carbon
 - Sustainable Development Goals
 - Disaster Risk Reduction and Response
 - Biodiversity (with a focus on Ecosystem Extent)

A summary from the meeting will be prepared shortly for distribution to the CEOS community for information.

GEO Programme Board

The 25th GEO Programme Board (PB) was held at the GEOSEC offices in Geneva from 7th to 8th February. Topics of interest to CEOS included an update on the 2023-2025 GEO Work Programme and the proposal for post-2025 Work Programme incubators, updates from each of the topical GEO working groups, and an update on the post-2025 strategy for GEO. Planning for the 2023 GEO Symposium was also discussed.

CEOS Work Plan 2023 – 2025

The aim for this year's annual Work Plan update, which will ultimately become the 2023-25 CEOS Work Plan, is that it be endorsed virtually just before SIT-38 at the end of March. The following is the schedule for review, update and endorsement:

- *Friday 17th February 2023:* Full new draft of Work Plan to be sent out for final review by CEOS membership and CEOS entities.
- Friday 3rd March 2023: Deadline for receipt of all final comments to the full Work Plan draft.
- Monday 6th March 2023: Final version of Work Plan to be sent out to CEOS Principals seeking their virtual endorsement ahead of SIT Plenary.
- Monday 20th March 2023: Virtual endorsement of 2023-2025 CEOS Work Plan
- Monday 27th March 2023: SIT Plenary week

Statement to COPUOS STSC

The 60th session of the Committee on the Peaceful Uses of Outer Space (COPUOS) Scientific and Technical Subcommittee (STSC) took place in Vienna, Austria, from 6 – 17 February 2023. CEOS provided a statement to the STSC, which was delivered by the CEOS chair as a pre-recorded reading, as well as a written version for the meeting participants and for upload to the meeting webpages. The statement had an SDG focus and was delivered during session 5 ("Space technology for sustainable socioeconomic development") on Wednesday 8th February.

CEOS presentation slide deck

A general CEOS presentation slide deck was produced and distributed to the SEC for review on 25th January. Very little feedback has been received thus far, but that which has been received report that this is a sound basis to work with. The proposal is for this slide deck to be enhanced by further useful content, and this can come from any CEOS member. The CEO will therefore now reach out to the CEOS community for additional content that can be included in this slide deck and make this resource available to all CEOS members.

Upcoming meetings or events

- SilvaCarbon 2023 CEOS Workshop, Thailand (22 February 2 March)
- GSICS Annual Meeting, College Park, USA (27 February 3 March)
- WGClimate-18, Tokyo, Japan (28 February 2 March)
- WGCapD-12, Vienna, Austria (1 3 March)
- GEO Executive Committee meeting #60, Geneva, Switzerland (22 23 March)
- SIT-38 and side meetings, Frascati, Italy (28 30 March)

An updated calendar of CEOS meetings / events, and some key external events that the community may find of relevance, is detailed in the following page. If any key meetings or events are missing from this calendar, or if any dates have changed since publication, please contact Marie-Claire.

CEOS and relevant key external Meetings and Events 2023

F - I				
Februar	02-Feb-23	02-Feb-23	CEOS / CGMS GHG Task Team meeting	Geneva, Switzerland
	06-Feb-23	06-Feb-23	CEOS - GEO Coordination Meeting	Geneva, Switzerland & Virtual
	06-Feb-23	17-Feb-23	-	Vienna, Austria
	07-Feb-23	08-Feb-23	GEO Programme Board Meeting #25	Geneva, Switzerland
	21-Feb-23	21-Feb-23	OGC ARD Standards Working Group Meeting	Frascati, Italy
+				- ' '
+	22-Feb-23	02-Mar-23	SilvaCarbon 2023 CEOS Workshop	Thailand
	27-Feb-23	03-Mar-23	GSICS Annual Meeting	College Park, USA
March	28-Feb-23	02-Mar-23	WGClimate-18	Tokyo, Japan
Viai Cii	01-Mar-23	03-Mar-23	WGCapD-12	Vienna, Austria & Virtual
	22-Mar-23	23-Mar-23	GEO Executive Committee Meeting #60	Geneva, Switzerland
	23-Mar-23	24-Mar-23	LSI-VC-13	ESRIN, Italy
\top	27-Mar-23	30-Mar-23	NAP Expo 2023	Santiago, Republic of Chile
	28-Mar-23		SIT-38 & Side Meetings	ESRIN, Italy
April				
\Box	03-Apr-23	05-Apr-23	9th International Conference on Remote Sensing and Geoinformation of Environment	Ayia Napa, Cyprus
	16-Apr-23	21-Apr-23	COSPAR 2023	Singapore
	17-Apr-23	20-Apr-23	38th Space Symposium	Colorado Springs, USA
	18-Apr-23	20-Apr-23	Joint meeting: WGISS-55 / WGDisasters-19	Cordoba, Argentina & Virtual
	23-Apr-23	28-Apr-23	EGU General Assembly	Vienna, Austria & Virtual
	24-Apr-23	28-Apr-23	ISRSE-39	Antalya, Turkey
Vlay				
	01-May-23	05-May-23	CEOS ARD Workshop	??
	09-May-23	11-May-23	GFOI Plenary	Rome, Italy
	16-May-23	19-May-23	JURSE 2023	Heraklion, Crete
	23-May-23	25-May-23	IAF Global Space Conference on Climate Change and Space	Oslo, Norway
	31-May-23	09-Jun-23	UN COPUOS 66th Session	Vienna, Austria
une				T
_	05-Jun-23		WGCV-52	Frascati, Italy
_	13-Jun-23	14-Jun-23	GEO Symposium 2023	Geneva, Switzerland
	15-Jun-23	16-Jun-23	GEO Programme Board Meeting #26	Geneva, Switzerland
	15-Jun-23	16-Jun-23	GEO Open Data and Open Knowledge Workshop	Geneva, Switzerland
	26-Jun-23	28-Jun-23	CGMS-51 Plenary	TBD, Japan
luly	16-Jul-23	21 1 22	IGARSS 2023	Pasadena, USA
August	10-501-23	21-301-23	IGAN332023	rasauena, osa
Septem	ber			
	04-Sep-23	08-Sep-23	Open Earth Monitor Global Workshop	Bolzano, Italy
	05-Sep-23	07-Sep-23	WGDisasters-20	Yellowstone, USA
	05-Sep-23	06-Sep-23	GEO Programme Board Meeting #27	Virtual
October				
	02-Oct-23	06-Oct-23	74th International Astronautical Congress (IAC)	Baku, Azerbaijan
	17-Oct-23	19-Oct-23	SIT 2023 Technical Workshop & Side Meetings	Frascati, Italy
	24-Oct-23	26-Oct-23	WGISS-56	Paris, France & Virtual
Novemb		10 Nov. 22	CEO Wook (Ministerial Summit CEO 10 and EuCom)	Cone Tourn South Africa
	06-Nov-23		GEO Week (Ministerial Summit, GEO-19 and ExCom)	Cape Town, South Africa
	13-Nov-23	15-Nov-23	37th CEOS Plenary and Associated Side Meetings	Chiang Rai, Thailand
	30-Nov-23	12-Dec-23	UNFCCC COP-28	Dubai, United Arab Emirates

Legend:

CEOS leadership participation required			
For information; CEOS leadership participation optional			

(Februray 2023)

Entity: WGDisasters

Prepared By: H de BOISSEZON (CNES) - L FRULLA (CONAE) - A EDDY (AG)

Updates on issues raised during the <u>last</u> CEOS SEC teleconference (Dot points)

None

Issues requiring discussion/decision during <u>current</u> CEOS SEC teleconference (<u>Dot points</u>)

None

Other highlights, activities, actions, projects, collaborations (<u>Dot points</u>, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- Intense activity after the Turkish/Syrian earthquake: sharing of information coming from WGDisasters members (seismic community); possible activation of RO by PDNA tripartite agreement partners (possible PDNAs); connection with GSNL scientists (possible "Event Supersite" for Southern Anatolian Fault);
- WGDisasters/UNOOSA joint activities: RO may be mentioned in the Annual Report of UNOOSA (being discussed at UNOOSA suggestion), and strong support of UNOOSA for Decision Makers RO awareness activity.
- NSTT: WGDisasters will contribute to the chapter 10 "Observation gaps, commercial opportunities to fill CEOS priority requirements for climate, SDGs and disasters"

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- WGDisasters 19 and WGGIS 55 take place jointly from April 18 to 21 in Argentina at CONAE's Main Receiving Station, Cordoba, at the invitation of CONAE.
- WGDisasters 20 to be held from September 5 to 7 (field trip 8-9) in Yellowstone,
 USA, at the invitation of USGS (Yellowstone Volcano Observatory).

CEOS SEC-304 Report

16 February 2023

Entity: Joint CEOS-CGMS Working Group on Climate (WGClimate)

Prepared By: Jeffrey L. Privette (NOAA), Wenying Su (NASA)

Updates on issues raised during the last CEOS SEC teleconference

None

Issues requiring discussion during <u>current</u> CEOS SEC teleconference

- Will identify full-time WGClimate representatives to various CEOS groups at WGClimate-18
 - o ARD, NewSpace, AFOLU
 - Unsure if needed: CEOS Oceans Coordinating Group

Other highlights, activities, actions, projects, collaborations

(<u>Dot points</u>, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- GHG Task Team meeting held Feb. 2nd in Geneva following WMO GHG Symposium. Wenying Su participated in both meetings on behalf of WGClimate leadership
- Finalized agenda for WGClimate-18
- Submitted CEOS 2023-2025 Work Plan & Deliverables updates
- Initiated regular internal meetings on restructuring/simplifying ECV inventory

Upcoming meetings or events

(Dot points, e.g. meetings, conferences of relevance, visits)

- WGClimate-18 to be held 28 February 2 March (Tokyo), hosted by JAXA
 - ~30 participants; Hybrid format (participation ~50% virtual)
 - Working to further grow in-region participation (East Asia)
 - o Topics: GHG, Water, NewSpace, ARD, Normals, GCOS, SCO
- CEOS SIT-38: 28-30 March. WGClimate participating virtually
- CGMS-51 working groups: 24-28 April. WGClimate participating virtually
- WGCV-51: June 5-9
 - Noted Day 4 has session including Climate -- reaching out for details

Attachments

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

None

(two pages max.)

Entity: WGISS

Prepared By: Makoto Natsuisaka (JAXA) and Tom Sohre (USGS)

Updates on issues raised during the <u>last</u> CEOS SEC teleconference (Dot points)

- WGISS EXEC was held on Feb 7th, 2023.
 - The WGISS part (3.6) of CEOS Work Plan and deliverables were reviewed. The final version was submitted on Feb. 10.
 - Session coordination for the WGISS-55 meeting in April 2023 was discussed.
- Participated in the New Space Task Team (1/23, 2/10). WGISS will lead
 "Measures to optimise the availability and usability of public EO programme
 data CEOS Group Responsible" with support of CEOS-ARD Oversight Group, SEO,
 LSI-VC and contribute to "EO QA measures shared data quality metrics
 approach?" cooperating with WGCV.
- Participated in the Ocean Coordination Group (2/1).
- Participated in the WGCapD meeting (2/2) and introduced WGISS activities to identify topics as joint collaborations. Service Discovery might be one of them.
- Organized the Interoperability Framework (2/15) and gave the draft paper for the activity, which includes vision, components, membership, process. The biweekly meeting will be held, and the draft toad map will be input to SIT-38.

Issues requiring discussion/decision during <u>current</u> CEOS SEC teleconference (<u>Dot points</u>)

None

Other highlights, activities, actions, projects, collaborations

(<u>Dot points</u>, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- None

Upcoming meetings or events

(<u>Dot points</u>, e.g. meetings, conferences of relevance, visits)

- WGISS-55 April 18-20, Cordova Argentine
- WGISS-56 October 24-26, Paris France

Attachments

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

- None

(two pages max.)

Entity: WGCapD

Prepared By: Jorge Del Rio Vera (United Nations Office for Outer Space Affairs)

Updates on issues raised during the <u>last</u> CEOS SEC teleconference (Dot points)

Not applicable

Issues requiring discussion/decision during <u>current</u> CEOS SEC teleconference (<u>Dot points</u>)

- WGCapD ViceChair role

Other highlights, activities, actions, projects, collaborations

(<u>Dot points</u>, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

Upcoming meetings or events

WGCapD annual meeting

- Meeting to take place in Vienna, from 1-3 March. The meeting will take place in hybrid format. Registration form is available here
 - Meeting will take advantage of the physical presence in Vienna to invite UN organizations. Currently there are 56 attendees registered out of which 12 UN entities.

Presentations

Presentation from WGISS, ESA, and the United Nations Office on Drugs and Crime on their work on capacity-building during the February monthly teleconference (attached).

Attachments

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

(two pages max.)

Entity: WGCV

Prepared By: Philippe Goryl (ESA), Cody Anderson (USGS)

Updates on issues raised during the <u>last</u> CEOS SEC teleconference (Dot points)

- WGCV is setting up a group/task on SITSAT (SITSAT coordination team). It is now envisaged to create a joint task team CEOS/WGCV – GSCIS. It will be proposed at GSICS plenary: since last CEOS SEC, ToR for the SITSAT group was created and it is being reviewed by WGCV. WGCV activity, including SITSAT coordination team initiative will be presented at GSICS annual meeting at the end of February.

Issues requiring discussion/decision during <u>current</u> CEOS SEC teleconference (<u>Dot points</u>)

- N/A

Other highlights, activities, actions, projects, collaborations (<u>Dot points</u>, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- Discussion on Fiducial Reference Measurement (FRM) assessment process took place in February; a draft approach will done based on the review of existing FRM projects. The approach will be review by end of March with the target to present it in a publication in the special Issue "Copernicus Sentinels Missions Calibration, Validation, FRM and Innovation Approaches in Satellite-Data Quality Assessment".
- Contribution to CEOS New Space Task Team; Draft input was given to the white paper.
- Following and responding to CEOS 2022 chair priority, the activities related to the establishment of a network of fiducial reference measurement (FRM) sites for thermal infra-red calibration and validation TIRCALNET is progressing under the auspice of CEOS WGCV IVOS and LPV. CNES started to work on the uncertainties budget over La Crau (France) site, using similar instrument than JPL in Lake Tahoe. In parallel, ESA will start a study aiming at identifying other sites and setting up the network.
- WGCV Kuze Akihiko presented WGCV contribution to the CEOS GHG task team meeting in February, in particular the long term analysis of GOSAT, GOSAT-2, OCO-2, OCO-3, TROPOMI using common calibration dataset and radiative transfer model and the RRV Cal/Val campaign results for which one the data were released

- and are available through the WGCV Cal/Val portal pointing to the JAXA Cal/Val database. This is also a contribution to the WGCV / AC VC coordination effort.
- Input from WGCV was provided to the CEOS Work Plan.

Upcoming meetings or events

(<u>Dot points</u>, e.g. meetings, conferences of relevance, visits)

- CEOS SIT 28-30 March where the Cal/Val Maturity Matrix will be presented in coordination with the WGISS maturity Matrix as a tool for reporting and communicating with Newspace.
- WMO/GSICS at the end of February. WGCV chair will present topics of common interest between GSICS and WGCV. In particular the SITSAT initiative, the FRM assessment process and the Workshop on pre-flight characterisation and calibration.
- CEOS WGCV virtual progress meeting is organised for 7th March.
- CEOS WGCV TMSG and DEMIX Workshop plenary meeting will be organised in July 2023 together with the geomorphometry 23 workshop: https://geomorphometry.org/geomorphometry-2023/

(e.g. pictures, figures, graphs, links – for use in overall CEOS reporting and as website resources etc.)

Entity: SEO

Prepared By: Dave Borges (NASA)

Updates on issues raised during the <u>last</u> CEOS SEC teleconference (Dot points)

Issues requiring discussion/decision during <u>current</u> CEOS SEC teleconference (<u>Dot points</u>)

Other highlights, activities, actions, projects, collaborations (<u>Dot points</u>, e.g. outputs, new products, papers, technical reports, media, pipeline and new projects, interactions, project status changes, new opportunities)

- Dave Borges attended the CEOS-GEO Annual Coordination Meeting on 6
 February, presenting CEOS SDG Coordination Group 2022 accomplishments and 2023 planned activities and deliverables. GEO Secretariat concurred with all activities presented. SDG Coordination Group updates and deliverables have been submitted to the CEO for inclusion in the Work Plan update process.
- At CEOS-GEO Meeting, GEO Secretariat presented a Follow-up Report on the GEOSS Expert Advisory Group (EAG). A visual representation of the proposed GEO infrastructure based on EAG Report options was shared. Pending ExCom approval, GEO Secretariat will issue a call to renew the GEOSS Infrastructure Development Task Team (GIDTT). CEOS was requested to join the Task Team. SEO will monitor developments and consider joining GIDTT.
- At CEOS-GEO Meeting, GEO Secretariat presented a zero draft of their new global campaign: "8 billion Hugs for the Planet". This initiative, if it proceeds, is a significant resource mobilization strategy potentially leveraging celebrities and global brand partnerships. SEO took an action to schedule a follow-up meeting to initiate increased coordination between the GEO Secretariat Communications Team and the CEOS Communications Team.
- GEO Open Data Open Knowledge Workshop has been scheduled for 15-16 June in Geneva. SEO has accepted a GEO Secretariat request to lead one of the sessions: Open Space-based Data.

Upcoming meetings or events (<u>Dot points</u>, e.g. meetings, conferences of relevance, visits)

 Open Geospatial Consortium (OGC) Member Meeting and ARD Standards WG Kick-off Meeting, 20-24 February 2023, Frascati Italy