

Breakouts	Moderator	Plenary Session	Title
DAY2			
1	Stier	1 (day1)	<i>AeroCom experiment status</i>
2	Kinne	4 (day2)	<i>Modeling & methods I</i>
3	Watson-Parris	5 (day2)	<i>Modeling & methods II</i>
DAY3			
4	Tsigaridis	6 (day2)	<i>Suborbital observations & biomass burning & COVID remainder of discussion</i>
5	Quaas	7 (day3)	<i>Aerosol and clouds, indirect effect</i>
6	Sayer	8 (day4)	<i>Aerosol trends</i>
DAY4			
7	Popp	9 (day4)	<i>Aerosol type from satellite</i>
8	Kahn/Sogacheva	11+13 (day5)	<i>Aerosol Representation Beyond AOD</i>
9	Povey	12 (day5)	<i>New retrievals</i>

non-plenary presentations will be given some time (ca 5 slides) in the breakouts
however, **all listed presentations will be up to discussions each breakout session**

DAY2

session 1	presentation	Stier	<i>AeroCom experiment status</i>
	1 slide + breakout discussion	Andrews, Betsy	Aerocom Phase III evaluation with optical property observations
	1 slide + breakout discussion	Smith, Steven	Emissions-MIP: A Multi-Model Sensitivity Evaluation
	plenary	Chin, Mian	Progress and results of the AeroCom UTLS experiment
	plenary	Gliss, Jonas	Aerocom Phase III model diversity and comparison with AP1
	plenary	Kim, Dongchul	Assessment of dust source attribution to the global land and ocean regions
	plenary	Kim, Paul	AeroCom Trajectory Experiment (GCMTraj): Lagrangian analysis of aerosol life cycle processes in GCMs
	plenary	Mortier, Augustin	Evaluation of climate model aerosol trends with ground-based observations over the last two decades – an AeroCom and CMIP6 analysis
	plenary	Myhre, Gunnar	Update on AeroCom Historical experiment
	plenary	Pan, Xiaohua	Update on AeroCom Biomass Burning Emission Injection Height experiment (BBEIH)
	plenary	Su, Wenying	Understanding the top-of-atmosphere fluxes difference between AeroCom Phase III models and the CERES product: clear-sky perspective
	plenary	Watson-Parris, Dunca	Multi-model Perturbed Parameter Experiment update
	plenary	Yu, Hongbin	Trans-Atlantic Dust Deposition (TADD): Evaluating GEOS simulation with satellite remote sensing products
	plenary	Burgos, Maria	First global evaluation of the representation of water uptake within ten Earth system models
session 2	presentation	Kinne	<i>Modeling & methods I</i>
	1 slide + breakout discussion	An, Qi	The Development of an Atmospheric Aerosol/Chemistry- Climate Model, BCC_AGCM_CUACE2.0, and Simulated Effective Radiative Forcing of Nitrate Aerosols
	1 slide + breakout discussion	Checa-Garcia, Ramiro	Modelling of Mineral Dust in CRESCENDO-ESM
	1 slide + breakout discussion	Cheng, Chiu	Development of size-resolving aerosol microphysics scheme for use in a global non-hydrostatic model
	1 slide + breakout discussion	McQueen, Jeff	Overview of NOAA's global aerosol modeling progress
	1 slide + breakout discussion	Pagowski, Mariusz	Development of the National Global Data Assimilation Ensemble-based System for Forecasting of Aerosols at NOAA
	plenary	Balkanski, Yves	Aerosol absorption: how dust absorption causes Sahel precipitation
	plenary	Bruehl, Christoph	Model simulations of the Pinatubo volcanic eruption: direct and indirect effects on stratospheric chemistry and dynamics
	plenary	Herbert, Ross	Understanding the Asian summer monsoon response to a future dipole in aerosol emissions across India and China using an intermediate-complexity GCM
	plenary	Neubauer, David	Soot aging by ozone/sulfuric acid enhances future warming and reduces shortwave aerosol cooling by changing cloud formation
	plenary	Ryder, Claire	Aircraft observations of Coarse Dust: Radiative Significance and Model Evaluation
plenary	Zhang, Kai	Intercomparison of aerosol microphysics parameterizations in the MAM aerosol box model	

session 3	presentation	Watson-Parris	Modeling & methods II
	1 slide + breakout discussion	Bian, Huisheng	Investigation of impact of Amazon fire on forest productivity using an Earth System Model
	1 slide + breakout discussion	Chubarova, Natalia	Urban aerosol and its radiative effects in Moscow Megacity according to the ground-based and satellite (MODIS/MAIAC) measurements, and COSMO-ART modelling
	1 slide + breakout discussion	Lord, Tobias	Investigation of the relative importance of meteorological and aerosol-related parameters in determining cloud microphysical properties using Machine Learning methods
	1 slide + breakout discussion	Zhong, Qirui	Understanding the uncertainties in the modeling of biomass burning aerosols
	plenary	Nabat, Pierre	Evaluation of aerosol absorption in CMIP6 simulations
	plenary	Samset, Bjorn	Aerosol absorption in CMIP6 and its implications for projected precipitation changes under the Shared Socioeconomic Pathways
	plenary	Riipinen, Ilona	EU FORCES project
	plenary	Tsigaridis, Kostas	US aerosol coding initiative
	plenary	Winker, Dave	An update on the NASA Aerosol-Cloud-Convection-Precipitation DO Study
	plenary	Yu, Fangqun	Use of machine learning to improve global models on aerosol-cloud interactions without compromising their computing efficiency

DAY3

session 4	presentation	Tsigaridis	Suborbital observations & biomass burning & COVID remainder of discussion
	1 slide + breakout discussion	Ferrare, Richard	Biomass Burning Aerosol Distributions over the Southeastern Atlantic Ocean measured by CALIOP and the NASA LaRC airborne High Spectral Resolution Lidar-2
	1 slide + breakout discussion	Eck, Thomas	Analysis of AERONET Extended Wavelength Retrievals of Aerosol Absorption Parameters Including 380 nm and 500 nm for Detection of Brown Carbon in Biomass Burning and Iron Oxides in Desert Dust
	1 slide + breakout discussion	Hahn, Valerian	Increased shortwave reflectance at the top of atmosphere by continental polluted low-level clouds in tropical West Africa during the DACCIWA campaign
	1 slide + breakout discussion	Puthukkudy, Anin	Aerosol properties from Airborne Hyper Angular Rainbow Polarimeter (AirHARP) observations during ACEPOL 2017
	1 slide + breakout discussion	Johnson, Ben	Self-raising aerosol
	plenary	Bellouin, Nicolas	Impact of Chinese Covid-19 lockdown on aerosol and radiative fluxes over East Asia Marginal Seas
	plenary	Kondragunta, Shobha	China and Taiwan: A Tale of Two COVID-19 Lockdown Measures and Air Quality Impacts
	plenary	Liu, Xiaohong	Impacts of COVID-19 on Aerosol Direct and Indirect Radiative Forcing
	plenary	Quaas, Johannes	Assessing aviation-induced cirrus from satellite during COVID-19
	plenary	Skeie, Ragnhild	Changes in aerosol atmospheric composition and radiative forcing due to COVID-19 in OsloCTM3
	plenary	Tsyro, Svetlana	Impacts of COVID-19 lockdown on European air quality
	plenary	Mortier, Augustin	COVID-19: Impact on AOD and European Air Quality

session 5	presentation	Quaas	Aerosol and clouds, indirect effect
	1 slide + breakout discussion	Chubarova, Natalia	Possible mechanism of the increase in solar irradiance cloud transmittance and decrease in cloud cover over Europe due to negative trends in sulphate aerosols: a study with the INMCM5 climate model
	1 slide + breakout discussion	Fadnavis, Suvarna	Elevated aerosol layer over South Asia worsens the Indian droughts
	1 slide + breakout discussion	Hotta, Haruka	Evaluation of Cloud-Aerosol Interactions Using the Cloud System Resolving Model NICAM-SPRINTARS and Satellite Observations.
	1 slide + breakout discussion	Righi, Mattia	Coupling aerosols to (cirrus) clouds in a global aerosol-climate model
	plenary	Gryspeerd, Edward	Identifying observational constraints on aerosol-cloud interactions
	plenary	Hasekamp, Otto	Retrieval of Cloud Condensation Nuclei to Quantify the Radiative Forcing due to Aerosol Cloud Interactions
	plenary	Luffarelli, Marta	Aerosol retrieval in presence of clouds
	plenary	Toll, Velle	Observational constraint on cloud water response to aerosols based on polluted cloud tracks
	plenary	Zuidema, Paquita	Modeling the smoky troposphere of the southeast Atlantic: a comparison to ORACLES airborne observations from September of 2016

session 6	presentation	Sayer	Aerosol trends
	1 slide + breakout discussion	Douglas, Alyson	Understanding changes in warm cloudiness since pre-industrial times using machine learning of satellite observations
	1 slide + breakout discussion	Wandji, William	How close to sunshine-duration based AOD retrievals is the ECHAM aerosol load over Europe?
	1 slide + breakout discussion	Xie, Bing	The contributions of short-lived climate pollutants to global climate change since the pre-industrial era
	1 slide + breakout discussion	Yang, Yang	Impacts of domestic emissions and regional transport on aerosol concentration, radiative forcing and climate during 1980–2018
1 slide + breakout discussion	Tsikerdekis, Athanasios	Aerosol emission estimation using future satellite observation capabilities under the framework of Observing System Simulation Experiments (OSSEs)	
plenary	Garrigues, Sebastien	AOD monitoring within the CAMS data assimilation	
plenary	Kramer, Ryan	Observed aerosol forcing trends over the A-Train satellite era	
plenary	Myhre, Gunnar	Update on AeroCom Historical experiment	
plenary	Schutgens, Nick	An AEROCOM/AEROSAT study: evaluation of global models with satellite AAOD and SSA	
plenary	Su, Wenyng	comparison trends derived from HIST experiment and satellite obs	
plenary	Yang, Yang	modeled 1980-2018 trends over E.Asia	

DAY4

session 7	presentation	Popp	Aerosol type from satellite
	1 slide + breakout discussion	Kauppi, Anu	Studying aerosol type selection and retrieved AOD estimates when applied to TROPOMI measurements
	1 slide + breakout discussion	Song, Quianqian	Comparison Study of Global Dust Climatology derived from CALIOP and MODIS Aerosol retrievals
	1 slide + breakout discussion	Zhang, Ying	Improved inversion of aerosol components in the atmospheric column from remote sensing data
	1 slide + breakout discussion	Tackett, Jason	CALIOP Aerosol Typing Performance of Smoke from the 2019-2020 Australian Bushfire Event
	1 slide + breakout discussion	Jafariserajehlou, Soheila	PMAP: synergistic global Aerosol product from Metop satellites
	1 slide + breakout discussion	Lipponen, Antti	Model Enforced Post-Process Correction of Satellite Aerosol Retrievals
plenary	Yu, Hongbin	Gigantic African Dust Intrusion into the Caribbean Basin and southern U.S. in June 2020	
plenary	Tsigaridis, Kostas	Clear-sky AOD in modeling	
plenary	Mielonen, Tero	Comparing aerosol types in climate models and satellite retrievals	

session 8	presentation	Kahn	Aerosol Representation Beyond AOD
	1 slide + breakout discussion	Espinosa, Reed	Exploring the capabilities of synergistic passive and active remote sensing with a new aerosol retrieval testbed
	1 slide + breakout discussion	Tsikerdekis, Athanasios	Assimilating aerosol optical properties related to size and absorption from POLDER/PARASOL with an ensemble data assimilation system
	1 slide + breakout discussion	van Dierenhoven, Bas	Aerosol properties inferred from the Research Scanning Polarimeter (RSP) during the Cloud, Aerosol and Monsoon Processes Philippines Experiment (CAMP2Ex)
	1 slide + breakout discussion	Colarco, Peter	The Multi-Model International Cooperative for Aerosol Prediction (ICAP) Perspective on the Massive June 2020 Saharan Dust Event
	1 slide + breakout discussion	Robbins, Daniel	Identifying cloud and aerosols during extreme bushfires using deep learning.
	1 slide + breakout discussion	Luffarelli, Marta	Towards a consistent retrieval of cloud/aerosol single scattering properties and surface reflectance
plenary	di Bagio	Update on lab experiments, how to define new experiments	
plenary	Sayer, Andrew	How consistent are satellite retrievals of smoke from the 2019-2020 Australian fires?	
plenary	Sogacheva, Larisa	Comparisons of multi-spectral satellite AOD	

session 9	presentation	Povey	New retrievals
	1 slide + breakout discussion	Povey, Adam	Making the old new again: Overhauling ORAC
	1 slide + breakout discussion	Chimot, Julien	The Copernicus Sentinel-3 Near Real Time (NRT) Aerosol Optical Depth (AOD) Baseline Collection 1 – First release description, quality status and scheduled evolutions by EUMETSAT
	1 slide + breakout discussion	Litvinov, Pavel	Surface and aerosol retrieval from S5P using GRASP: baseline requirements and expected performance
	1 slide + breakout discussion	Marbach, Thierry	EUMETSAT Aerosol Missions and Products: focus on 3MI, the Multi-View Polarimeter Flying on Metop-SGA
	1 slide + breakout discussion	Piontek, Dennis	Recent Advances in Satellite Retrieval of Volcanic Ash Properties
	1 slide + breakout discussion	Thompson, Sabrina	Analysis of Scattering Angle Sampling by Multi-Angle Imaging Polarimeters for Different Orbit Geometries
	1 slide + breakout discussion	Zheng, Jianyu	A New Retrieval Algorithm of the Thermal Infrared Optical Depth of Dust Aerosols based on the Combined CALIOP and IIR Observations
	plenary	Dubovik, Oleg	Validation of GRASP algorithm product from POLDER/PARASOL data and assessment of multi-angular polarimetry potential for aerosol monitoring
	plenary	Fougnie, Bertrand	How consider the geometry of acquisition on the aerosol retrieval performance
	plenary	Knobelspiesse, Kirk	Analysis of simultaneous aerosol and ocean glint retrieval using multiangle observations
	plenary	Levy, Rob (TBC)	GEO-LEO synergy of different groups
	plenary	Seidel, Felix	“Beyond AOD”, a team science initiative to quantify vertically resolved aerosol absorption to enable climate science breakthroughs