Monday, 08 April 2019

#BG6.1/HS10
POSTER
Hysteretic analysis of nitrate dynamics in the nested Selke catchment (Germany)
Xiaolin Zhang, Xiaoqiang Yang, Seifeddine Jomaa, and Michael Rode
08:30-10:15 Hall A Board A.430

#HS3.1
ORAL
Smart Routing Network Decomposition for the Massive Parallelization of Global Hydrological Models
Maren Kaluza, Luis Samaniego, Stephan Thober, Robert Schwepple, Rohini Kumar, and Oldrich Rakovec
09:00–09:15 Room C

#EOS3.1
POSTER
Agile project management for software development in Earth sciences
L Cristini, N Wieters, and D Barbi
10:45–12:30 Hall X4 Board X4.318

#HS2.3.2
POSTER
Impact of river geomorphology on in-stream nitrate retention in the Bode catchment, central Germany by Xiangqian Zhou, Seifeddine Jomaa, Xiaoqiang Yang, and Michael Rode
10:45-12:30 Hall A Board A.72

#HS2.3.2
POSTER
Spatiotemporal evaluation of a semi-distributed hydrological water quality model in a nested catchment in Central Germany
Salman Ghaffar, Seifeddine Jomaa, and Michael Rode
10:45-12:30 Hall A Board A.66

#CL4.12/AS4.12/CR1.14/OS1.29
POSTER
Advanced prediction in the Arctic and beyond: Half way into the APPLICATE project
P Ortega and L Cristini and the APPLICATE Consortium
14:00–15:45 Hall X5 Board X5.60

#CR3.04/AS4.6/CL2.15/HS2.1.3
Improvement of snow optical properties with respect to grain size in ICON
Anika Rohde, Sven Werchner and Bernhard Vogel
14:10–14:12 PICO spot 4

#BG6.1/HS10.12
ORAL
Event-scale concentration-discharge relationships across catchments
Andreas Musolff, Qing Zhan, Rémi Dupas, Camille Minaudo, Jan H. Fleckenstein, and
Karsten Rinke  
14:15–14:30  Room 2.31

#BG6.1/HS10.12  
ORAL  
Turbidity dynamics in lowland pristine and agricultural streams, Bode catchment, Germany  
Nergui Sunjidmaa, Daniel Graeber, and Michael Rode  
14:45–15:00  Room 2.31

#HS2.3.2  
ORAL  
Spatiotemporally distributed sensitivity analysis for catchment water quality models  
Xiaoqiang Yang, Seiffedine Jomaa and Michael Rode  
15:00–15:15  Room 2.95

#CR4.1/GM9.6  
ORAL  
Soil temperature and thaw depth differences associated with tundra vegetation types at Trail Valley Creek, NWT, Canada  
Inge Grünberg, William L. Cable, Sofia Antonova, Stephan Lange, and Julia Boike  
15:15–15:30  Room N2

#HS2.4.1  
ORAL  
Coevolution of heatwaves and soil moisture droughts: Past, present, and future  
Luis Samaniego, Stephan Thober, Rohini Kumar, Andreas Marx, Ming Pan, Niko Wanders, Eric F. Wood, and Oldrich Rakovec  
15:30–15:45  Room B

**Tuesday, 09 April 2019**

#HS2.4.5  
POSTER  
Extending the CoastDat datasets with high resolution river discharge  
Stefan Hagemann and Beate Geyer  
10:45–12:30  Hall A

#CR5.3/CL4.06  
POSTER  
A surface mass balance scheme including the diurnal cycle of solar radiation for ice sheet simulations on long time scales  
Uta Krebs-Kanzow, Shan Xu, Paul Gierz, and Gerrit Lohmann  
10:45–12:30  Hall X4

#NP3.2  
ORAL  
The stochastic climate model shows that underestimated Holocene trends and variability represent two sides of the same coin  
Gerrit Lohmann  
15:00–15:15  Room E2

**Wednesday, 10 April 2019**

#EOS10.1/AS5.25/BG1.59/GI1.8/OS4.34/SM5.8  
ORAL
MOSES: A novel observing system for highly dynamic events
U Weber and C Schuetze and the MOSES Team
12:15–12:30  Room L8

#CL4.09/OS1.28/SSP2.20
POSTER
Separating the impact of sea ice and sea surface temperature changes on Arctic climate and its linkages to mid-latitudes
Ralf Jaiser, Mirseid Akperov, Alexander Timazhev, Dörthe Handorf, and Igor Mokhov
14:00–15:45  Hall X5

#ITS4.6/CL3.09/ERE1.7/NH1.39
ORAL
Multimodel assessment of renewable groundwater resources across Europe at 1.5, 2, and 3 degrees global warming
Rohini Kumar, Stephan Thober, Niko Wanders, Ming Pan, Oldrich Rakovec, Eric Wood, Luis Samaniego, and Sabine Attinger
Wed, 10 Apr, 14:45–15:00  Room L7

#AS1.27
POSTER
Response of convective boundary layer and shallow cumulus to soil moisture heterogeneity: A large-eddy simulation study
Cunbo Han, Slavko Brdar, and Stefan Kollet
16:15–18:00  Hall X5

Thursday, 11 April 2019

#AS3.17
POSTER
Effects of transport emissions on reactive nitrogen and ozone during EMeRGe Europe
Mariano Mertens, Astrid Kerkweg, Patrick Jöckel, Helmut Ziereis, Volker Grewe, Hans Schlager, Maria D. Andrés Hernández, and John P. Burrows
08:30–10:15  Hall X5

#PICOs CL0.00
Temperatures from Energy Balance Models: the effective heat capacity matters
Gerrit Lohmann
08:38–08:40  PICO spot 5a

#HS7.1/AS4.24
ORAL
Performance analysis of more than one year of countrywide rainfall derived from commercial microwave link data in Germany
M Graf, C Chwala, and H Kunstmann
09:30–09:45  Room 2.31

#HS2.5.1
POSTER
Large scale groundwater model of the Danube Basin, an demonstrator model for the construction of global groundwater models
Estanislao Pujades, Oldrich Rakovec, Rohini Kumar, Luis Samaniego, and Sabine Attinger
10:45–12:30  Hall A

#AS3.20
POSTER
A Novel Concept for Automated Quality Control of Atmospheric Time Series
N Kaffashzadeh, S Schröder, and M G Schultz
10:45-12:30, Hall X5 - board number X5.389

#AS4.36/BG1.62/CL5.08/NP1.3/OS4.23
ORAL
Advancing Earth System Modelling to address pressing challenges
L Cristini, T Jung, and ESM Project Steering Group
12:15–12:30 Room 0.60

#AS1.5/CL5.05/ESSI1.2/NP1.4/OS4.20
POSTER
esm-interfaces: Towards a Modular ESM Coupling Approach
N Wieters and D Barbi
14:00–15:45 Hall X5 Board X5.209

#NH1.7/AS4.4/HS4.2.3
POSTER
Hydrological benchmarking improves local-scale streamflow estimates in a large-scale hydrological model
Alessandro Todaro, Bibi S. Naz, Stefan Kollet, Alberto Bellin, and Bruno Majone
14:00–15:45 Hall X3

#HS2.5.1
ORAL
Atmospheric feedbacks induced by human water use and their impact on local to remote water resource availability
Jessica Keune, Diego G. Miralles, Mauro Sulis, Stefan Kollet, Stephan Henne, Dominik Schumacher, Anita Drumond, Stefan Siebert, and Yoshihide Wada
Thu, 11 Apr, 14:00–14:15 Room B

#AS1.6/CL5.07/ESSI1.5/OS4.25
POSTER
Estimating global ocean heat content from tidal magnetic signals in space
Christopher Irrgang, Jan Saynisch, and Maik Thomas
14:00–15:45 Hall X5

#SM3.1/NH4.11
POSTER
Assimilating Stress and Strain in an Energy-Based PSHA Workflow
Malte J. Ziebarth, Oliver Heidbach, Fabrice Cotton, John G. Anderson, Graeme Weatherill, and Sebastian von Specht
Thu, 11 Apr, 14:00–14:15 Hall X3

#HS2.5.1
ORAL
Technology fusion for large scale terrestrial monitoring
Stefan Kollet
Thu, 11 Apr, 15:30–15:45 Room B

#HS2.5.1
ORAL
Seamless reconstruction of global scale hydrologic simulations: challenges and opportunities
Oldrich Rakovec, Rohini Kumar, Maren Kaluza, Robert Schwppe, Stephan Thober, Sabine Attinger, and Luis Samaniego
#AS1.4/CL5.06/NP5.5/OS4.19
ORAL
Oceanic impacts on the atmospheric and terrestrial moisture budgets in RCMs
Klaus Goergen and Stefan Kollet
17:45–18:00 Room 0.11

Friday, 12 April 2019

#ESSI3.2
POSTER
ESM-TOOLS: A common infrastructure for modular coupled Earth system modelling
D Barbi, N Wieters, L Cristini, P Gierz, S Khosravi, J Kjellson, S Wahl, and V Klemann
08:30–10:15 Hall X1 Board X1.72

#ESSI3.1
POSTER
MOSES Data Management Platform – Concept and status of implementation
D Kerschke, H Fuchs, A Schäfer, P Fischer, G Breitbach, R Kunkel, C Faber, F Neidl, M Kohler, T Schnicke, and J Bumberger and the MOSES Data Management Team
08:30–10:15 Hall X1 Board X1.53

#AS1.24
POSTER
Assessing dynamical stratospheric processes in Northern Hemisphere winter simulated with ICON-NWP
Raphael Köhler, Ralf Jaiser, Dörthe Handorf, Markus Rex, and Klaus Dethloff
08:30–10:15 Hall X5

#HS1.2.7/EOS8.1/GM2.16
PICO
V-FOR-WaTer – the virtual research environment to access and process environmental data
M Strobl, S Hassler, E Azmi, M Mälicke, J Meyer, and E Zehe
11:13–11:15 PICO spot 5b

#OS4.2/AS1.23/G3.8/HS11.51
POSTER
Analysis of ocean tide induced magnetic fields — Climate trends and the remarkable role of shelf regions
Johannes Peterelt, Jan Saynisch-Wagner, Christopher Irrgang, and Maik Thomas
08:30–10:15 Hall X4

#OS4.2/AS1.23/G3.8/HS11.51
POSTER
Ocean Tide Model Uncertainties For Electromagnetic Inversion Studies
Jan Saynisch, Christopher Irrgang, and Maik Thomas
08:30–10:15 Hall X4

#HS2.2.4
POSTER
Application of the Multiscale Parameter Regionalization (MPR) to the land-surface model HTESSEL
Stephan Thober, Robert Schwegge, Sabine Attinger, and Luis Samaniego
08:30–10:15  Hall A

#AS1.24
POSTER
A Comparison between Interactive-ozone and Non-interactive-ozone in ICON-ART
Shaoyin Wang, Jennifer Schröter, and Peter Braesicke
08:30–10:15  Hall X5

#AS3.21
POSTER
Spectral Sizing and Sensitivity Studies of a Proposed Passive Space-Borne CO2 Monitoring Mission at High Spatial Resolution
Jonas Wilzewski, Johan Strandgren, Bernhard Mayer, André Butz, Patrick Jöckel, Klaus Gierens, Mariano Mertens, Carsten Paproth, and Anke Roiger
08:30–10:15  Hall X5

#AS3.26
ORAL
Mountain-wave induced Polar Stratospheric Clouds in ICON-ART: Impact on Polar Ozone
Michael Weimer, Jennifer Schröter, Oliver Kirner, Roland Ruhnke, and Peter Braesicke
11:00–11:15  Room 0.60

#AS3.26
ORAL
Ozone hole induced southern hemispheric climate change signals in ICON-ART climate simulations
Marleen Braun, Jennifer Schröter, Roland Ruhnke, and Peter Braesicke
11:15–11:30  Room 0.60

#HS1.2.9/AS4.26/BG1.28/NP5.6/OS4.24/SSS11.9
ORAL
Assimilation of satellite sea surface temperature and profile observations into a coupled ocean-atmosphere model
Qi Tang, Dmitry Sidorenko, and Lars Nerger
12:00–12:15  Room 2.15

#HS1.2.9/AS4.26/BG1.28/NP5.6/OS4.24/SSS11.9
POSTER
Soil moisture data assimilation in high-resolution integrated models at the hillslope scale
Harrie-Jan Hendricks Franssen, Sebastian Gebler, Wolfgang Kurtz, Valentijn Pauwels, Stefan Kollet, and Harry Vereecken
14:00–15:45  Hall A

#HS1.2.9/AS4.26/BG1.28/NP5.6/OS4.24/SSS11.9
POSTER
Building an Efficient Ensemble Data Assimilation System for Coupled Models with the Parallel Data Assimilation Framework
Lars Nerger, Qi Tang, Longjiang Mu, and Dmitry Sidorenko
14:00–15:45  Hall A

#HS1.2.9/AS4.26/BG1.28/NP5.6/OS4.24/SSS11.9
POSTER
Evaluation of ensemble simulations of a coupled atmosphere-land-surface-subsurface model for cross-compartmental data assimilation
Bernd Schalge, Harrie-Jan Hendricks Franssen, Stefan Kollet, Tobias Finn, Barbara Haese, Emilio Sánchez, and Clemens Simmer
14:00–15:45  Hall A

#HS1.2.9/AS4.26/BG1.28/NP5.6/OS4.24/SSS11.9
POSTER
Understanding large scale transport: ICON-ART N2O satellite data assimilation with an independent POLSTRACC validation
Jennifer Schröter, Peter Hoor, Jens Krause, Lars Nerger, Roland Ruhnke, Björn-Martin Sinnhuber, and Peter Braesicke
14:00–15:45  Hall A

# HS2.2.4
ORAL
Development of a stand-alone Multiscale Parameter Regionalization (MPR) tool for the estimation of effective model parameters for any distributed model
Robert Schweppe, Stephan Thober, Sabine Attinger, and Luis Samaniego
16:45–17:00  Room C