## Cross-sectoral ISIMIP and PROCLIAS online Workshop 11-15 January 2021

(as of 11 January 2021)

PROCLIAS Session

ISIMIP3b socioeconomic input data

Sectoral session

Keynote

General session

time UTC+1 Monday 11 January 9:00-9:15 Sector meeting:	Tuesday 12	January	Wodnesday 1		T' '			
Sector meeting:		·· ·· <b>/</b>	Wednesday 13 January		Thursday 14 January		Friday 15 January	
9:30-9:45 9:45-10:00 Forest 9:45-10:00 (9:00-10:00 am) Sector meetii		Sector meeting: Water regional (1)	SOC data: <b>Water manag</b> desalination, inter-basi (9:00-10:00	n water transfers	ISIMIP3a climate data: trends and counterfactuals  (9:00-10:30 am)		Sector meeting: <b>Lakes</b> (9:00 - 11:00 am)	
10:00-10:15 Water globa 10:15-10:30 (9:30-10:30 am	(9:00-10:30 am)	(Trend detection and attribution:	15 min bro	eak				
10:30-10:45 Sector meeting: Sector meeting: Sector meeting:	SOC data: Land use models - Generation of	new case studies) (9:30-11:00 am)	PROCLIAS Kick-C	Off meeting	Sector meeting: Water regional (2) (Next Special issue: studies,			
11:00-11:15 (ISIMIP3 protocol) Biomes / Permafrosi	ISIMIP3b Land use pattern	Social break-out	(10:15-11:45	5 am)			PROCLIAS WG3: PROCLIAS: WG4:	
11:30-11:45 11:45-12:00 (10:00-12:00 am) (10:30-12:00 ar	(10:15-11:45 am)  15 min break	groups (11:00-12:00)	15 min bro	eak	· ·	participants and timelines)		PROCLIAS: WG4: "Communication
12:00-12:15 12:15-12:30 Sector meeting: <b>Energy</b>	Latest ISIMIP	results	SOC data: Water mar	nagement - Dam	(10:45-12:15 am)  15 min break		climate impacts"	and dissemination of climate impacts"
12:30-12:45 12:45-13:00 13:00-13:15 13:15-13:30 (12:00-1:30 pm)	(12:00-1:30		locations, dam (12:00-1:30	•	SOC data: Water management - non agricultural water withdrawals & uses (12:30-1:30 pm)		(11:15-12:45 pm)	(11:15-12:45 pm)
13:30-14:00 Lunch break			Lunch br	eak	Lunch b	reak	Closing	remarks
14:00-14:15 14:15-14:30  Opening Keynote by Johan Rockstr	n Lunch br	eak	Eulich of	Car	PROCLIAS WG1: "Common datasets		PROCLIAS: results	of WG meetings and steps
14:30-14:45 14:45-15:00 15:00-15:15 15:15-15:30  Welcome by Katja Frieler (2:00-3:00 pm)  Sector meeting: Agriculture	Presentation of ongoin dedicated break (2:30-3:30	out groups		Sector meeting: Health (2:00-4:00 pm)	and protocols for climate impact modelling"	attribution and uncertainty assessments"	PROCLIAS: MC mee	eting (MC members
15:30-15:45 15:45-16:00 (3:00-3:45 pm)			SOC data: <b>Agriculture</b> - growing seasons (3:15-4:00 pm)	(2.00 4.00 μπ)	(2:00-3:30 pm)	(2:00-3:30 pm)	(2:45	-3:30)
16:00-16:15			(* * * * * * * * * * * * * * * * * * *					
16:15-16:30 16:30-16:45 16:45-17:00 Climate forcing data: Ways to incre their temporal and spatial resolution								
17:00-17:15 (4:15-5:15 pm) 17:15-17:30 17:30-17:45	Keynote: Noah E "Attributing impacts of	•			Keynote: Tamr "Using economics			
17:45-18:00 18:00-18:15	change (5:00-6:30	<b>e"</b>			measure the costs of (5:00-6:3)	J		
18:15-18:30 18:30-20:00 Cross-sectoral meeting:	///////////////////////////////////////	///////////////////////////////////////	•		,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	. ,	•	
Biomes/Fire/Permafrost (6:00-8:00 pm)	21:30-23							g: Biodiversity
	Sector meeting: Fish Ecosyste						-	parate meeting on ry 2-4 pm)

## Detailed Program

**Monday 11.1.** (note that on Monday we will have two slots with parallel sessions)

Time (UTC+1)	Session	Chair		
9:00-10:00	Sector meeting Forest  - discussing the idea of country scale multi-model simulations general idea (C. Reyer) - examples by D. Loustau, discussing the table of available models and their constraints/data needs etc discussing next steps (e.g. integration of this activity as Task Group into COST Action PRC - short break-out group with co-authors on forest evaluation paper ⇒ see extra link(Mats Ma			
9:30-10:30	Sector meeting Water global:  - status of simulations in the global water sector (ISIMIP2/3) - possible adaptation scenarios from the global water sector (results of survey) - sectoral thoughts on a ISIMIP3 special issue - any other discussion - "JULES latest developments in ISIMIP3" (Aristeidis Koutroulis)	Hannes Müller-Schmied, Simon Gosling		
10:00-12:00  Sector meeting Energy (1)  Presentation of track A, track B simulations and getting people involved (c. 30 minutes). Participant presentations (c. 30 minutes). Discussion of new ideas, including the demand side (c. 30 minutes).		Victhalia Zapata		
10:30-12:00  Sector meeting Biomes & Permafrost  - status update biomes sector (C. Reyer, all modellers) - valid variable ranges for biomes models (C. Reyer) - paper presentations: - First analysis of ISIMIP3b simulation from VISIT and presentation of ISIMIP2b paper idea (A. Ito) - Disentangling the impacts of anthropogenic aerosols on terrestrial carbon cycle during 1850-2014 (Y Zhang) - Future greenhouse gas balance of northern peatlands: evidence from a multi-model assessment (C Qiu) - Additional paper plans tbc - discussion of peatland sector (A. Gädeke, A Galego-Sala, C. Reyer) - status update permafrost sector (A. Gädeke) and related permafrost activities (E. Burke, J. Kirchner)		g 1850-2014 (Y Zhang) assessment (C Qiu)		
	to be continued			

12:00-13:30	Sector meeting Energy (2)	James Glynn	
	<ul> <li>Introduction of the new Track focussing on the impacts of weather fluctuations and extremes on the Energy Sector</li> <li>Series of input talks by groups that would be interested in participating in the sector</li> <li>Discussion of protocol requirement with regard to input data (to be provided by ISIMIP) and output data</li> <li>Scenario design</li> </ul>		
13:30-14:00	Lunch Break		
14:00-15:00	Opening session	Katja Frieler	
	<ul> <li>Introductory Keynote: "tba" (Johan Rockström)</li> <li>Welcome, ISIMIP news and awards ceremony (Katja Frieler, Christopher Reyer)</li> </ul>		
15:00-15:45	Sector meeting Agriculture	Jonas Jägermeyer	
	<ul> <li>GGCMI Plum coupling (Sam Rabin)</li> <li>Extreme event impacts on global crop productivity (Jonas Jägermeyr)</li> <li>Potential poleward shift of major breadbaskets under climate change (Jim Franke)</li> <li>Evaluation of empirical and process-based crop models (Haynes Stephens)</li> <li>Discussion and way forward</li> </ul>		
15:45-16:15	Break		
16:15-17:15	Climate forcing data: Ways to increase their temporal and spatial resolution	Stefan Lange	
	<ul> <li>16:15 - Dirk Karger: "Challenges and prospects on the road to 1km ISIMIP3b daily climate data"</li> <li>16:45 - Sixto Herrera García: "From daily to sub-daily climate projections: Increasing the temporal resolution by means of statistical downscaling"</li> </ul>		
17:15-18:00	Break		
18:00-20:00	Cross-sectoral meeting Biomes/Fire/Permafrost	Anne Gädeke, Christopher Reyer	
	<ul> <li>Short Keynotes on current exciting research questions and future prospects for biome-pern</li> <li>Philippe Ciais</li> <li>James Randerson</li> <li>Sander Veraverbek</li> <li>Moritz Langer</li> <li>Eleanor Burke</li> <li>discussion of paper ideas within ISIMIP3 either in plenary or as break-out groups</li> </ul>	nafrost-fire modelling by:	

<u>Tuesday 12.1.</u> (note that on Tuesday we will have two slots with parallel sessions)

Time (UTC+1)	Session	Chair	
9:00-10:30	Socioeconomic input data for ISIMIP3b group III simulations  Health  - data sets for labor productivity and heat-related mortality: i) prevalence of residential air condi iii) hospital bed rates  - sectoral breakdown	Shouro Dasgupta tioning, ii) % green spaces in specific cities,	
9:30-11:00	Sector meeting Water regional (1)  - status update and - ongoing studies on Detection & Attribution	Fred Hattermann, Valentina Krysanova	
10:15-11:45	Socioeconomic input data for ISIMIP3b group III simulations  Land use models - Status update of the preparation of ISIMIP LU pattern - technical break out session of selected participants to continue working on the data	Hermann Lotze-Campen, Christopher Reyer	
11:00-12:00	Social break-out groups  Please join the general session following the link to the right. Break-out groups will be created spontaneously upon request. Please make sure to have the latest Zoom version installed to be able to switch break-out groups easily.		
12:00-13:30	Latest ISIMIP Results  10 min presentations:  - "FishMIP: Towards model improvement and cross-sectoral linkages" (Julia Blanchard)  - "Terrestrial biodiversity threatened by increasing global aridity velocity under high level warming" (Hao Shi)  - "Effects of hydrological model evaluation on climate change impacts" (Valentina Krysanova)  - "Streamflow-based evaluation of climate model sub-selection methods" (Jens Kiesel)  - "Sensitivity of global river flood simulations to the choice of climate forcing and hydrological model" (Benedikt Mester)  - "Aetiology-specific projections of temperature-attributable mortality due to enteric infections" (Paul Lester Chua)  - "Climate change reduces winter overland travel across the Pan-Arctic even under low-end global warming scenarios" (Anne Gaedeke)  - "Climate change signal in global agriculture emerges earlier in new generation of climate and crop models" (Jonas Jägermeyer)		
13:30-14:30	Lunch break, to be continued		

14:30-15:30	Congoing paper ideas and dedicated break-out groups     "Assessing country level crop production risk based on ISIMIP3b crop yield simulations" (Sam "Inter-model agreements and differences in reproducing global terrestrial hydrologic fluxes and Felfelani, Yadu Pokhrel et al.)  The presented studies will be discussed in respective break-out groups. Please make sure to have easily moved to the break-out group you would like to join. Additional break-out groups can also be	d storages in ISIMIP simulations" (Farshid the latest version of Zoom installed to be		
15:30-16:15	Break			
16:15-17:00	Social break-out groups	Martin Park		
	Please join the general session following the link to the right. Break-out groups will be created spontaneously upon request.  Please make sure to have the latest Zoom version installed to be able to switch break-out groups easily.			
17:00-18:30	<u>Keynote</u>	Christian Otto		
	"Attributing impacts of historical climate change: Recent progress in quantifying economic impacts using historical observations and climate model ensembles" (Noah Diffenbaugh, Stanford Woods Institute for the Environment)			
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21:30-23:00	Sector meeting Fisheries and Marine Ecosystems  - Update on CMIP6/ISI-MIP 3b analysis - Overview and update on latest round of FishMIP simulation modelling results and papers - Key model gaps and next steps - Historical Fishing effort driver dataset - Future drivers - update and progress: Phase 2 protocol and socio-economic forcing data for IS - Cross-sectoral linkages - update and opportunities - FishMIP structure and coordination update Any other items	Julia Blanchard, Derek Tittensor  SIMIP3b group III simulations		

## Wednesday 13.1. (note that on Wednesday we will have one slot with parallel sessions)

Time (UTC+1)	Session	Chair	
9:00-10:00	Socioeconomic input data for ISIMIP3b group III simulations	Naota Hanasaki, Jacob Schewe	
	Water management - sea water desalination, - inter-basin water transfers		
10:00-10:15	Break		
10:15-11:45	PROCLIAS Kick-Off meeting	Christopher Reyer, Veronika Huber	
	<ul> <li>Introduction to COST ACTION PROCLIAS (C. Reyer)</li> <li>Introduction to PROCLIAS WG1: Common datasets and protocols for climate impact modelling (W. Thiery)</li> <li>Introduction to PROCLIAS WG2: Impact attribution and uncertainty assessments (V. Huber)</li> <li>Introduction to PROCLIAS WG3: Cross-sectoral climate impacts (S. Gosling)</li> <li>Introduction to PROCLIAS WG4: Communication and dissemination of climate impacts (I. Menke)</li> </ul>		
11:45-12:00	Break		
12:00-13:30	Socioeconomic input data for ISIMIP3b group III simulations	Björn Sörgel (Jacob Schewe, Rocio Rivas)	
	Water management - future dam locations - dam operations		
13:30-14:00	Lunch Break, to be continued		
14:00-16:00	Sector meeting Health	Veronika Huber, Joacim Rocklöv	
	<ul> <li>Welcome and introduction (Veronika Huber, UPO, Sevilla)</li> <li>14:05: The Lancet Planetary Health Special Issue: 10 min presentations of submitted papers: <ul> <li>"Aetiology-specific projections of temperature-attributable mortality due to enteric infections" (Paul Lester Chua, Nagasaki University) (tbc)</li> <li>"Mapping future scenarios of risk of Vibrio infections in a warming planet" (Joaquin Trinanes, NOAA) (tbc)</li> <li>"Impacts of climate change on combined labour productivity and supply" (Shouro Dasgupta, CMCC) (tbc)</li> <li>"Regional projections of temperature-attributable mortality in Europe" (Joan Ballester, ISGlobal) (tbc)</li> <li>"Global, regional and national burden of mortality associated with non-optimal ambient temperatures from 2000 to 2019" (Qi Zhao, Shandong University) (tbc)</li> <li>"Projecting the risk of mosquito-borne diseases in a warmer and more urbanized world" (Felipe Colon Gonzalez, LSHTM) (tbc)</li> </ul> </li> <li>15:05: Recent results/work in progress from the ISIMIP Health Sector: <ul> <li>"Comparison of statistical and dynamical modelling approaches to predict the expansion of malaria vector <i>An. Sacharovi</i> in Greece under climate change" (Adrian Tompkins, ICTP)</li> <li>"Estimating health-related social costs of carbon – work in progress" (Francis Dennig, Yale-NUSCollege)</li> </ul> </li> <li>15:15: Discussion on Special Issue follow-up and future plans: <ul> <li>ISIMIP data management (Iliusi Vega del Valle, PIK), ISIMIP protocols, ISIpedia platform</li> <li>PROCLIAS COST Action, ISIMIP3b focusing on adaptation, others</li> </ul> </li> </ul>		
15:00-15:30	Break, to be continued		

15:15-16:00	Socioeconomic input data for ISIMIP3b group III simulations	Jonas Jägermeyer
	Agriculture - growing seasons	

<u>Thursday 14.1.</u> (note that on Thursday we will have one slot with parallel sessions)

Time (UTC+1)	Session	Chair		
9:00-10:30	ISIMIP3a climate data: trends and counterfactuals	Jan Volkholz		
	09:00-09:30 - Hyungjun Kim - "Long-term variability of surface meteorology in GSWP3 forcing data" 09:30-10:00 - Graham P. Weedon - "Trends from 1979 to 2018 in the WFDE5 and WFDEI datasets" 10:00-10:30 - Stefan Lange - "ATTRICI v1.1 - counterfactual climate for impact attribution"			
10:30-10:45	Break			
10:45-12:15	Sector meeting Water regional (2)	Fred Hattermann		
	- Next Special issue: studies, participants and timelines			
12:15-12:30	Break			
12:30-13:30	Socioeconomic input data for ISIMIP3b group III simulations	Jacob Schewe		
	Water management - non agricultural water withdrawals and uses			
13:30-14:00	Lunch Break			
14:00-15:30	PROCLIAS WG1	Wim Thiery		
	"Common datasets and protocols for climate impact modelling"			
14:00-15:30	PROCLIAS WG2	Veronika Huber		
	"Impact attribution and uncertainty assessments"			
15:30-16:30	Break			
17:00-18:30	<u>Keynote</u>	Björn Sörgel		
	"tba" (Tamma Carleton, Bren School of Environmental Science & Management, UC Santa Barbara)			

**Friday, 15.1.** (note that on Friday we will have one slot with parallel sessions)

Time (UTC+1)	Session	Chair	
9:00-11:00	Sector meeting Lakes	Wim Thiery	
	- Status of ISIMIP2b simulations - Status of ISIMIP2b analyses and papers - Timeline of ISIMIP3a-b simulations - Call for data: many physical sites + a few biogeochemistry supersites? What are the data requirements? - Varia		
11:00-11:15	Break		
11:15-12:45	PROCLIAS WG3	Simon Gosling	
	"Cross-sectoral climate impacts"		
11:15-12:45	PROCLIAS WG4	Inga Menke	
	"Communication and dissemination of climate impacts"		
12:45-13:30	Break		
13:30-14:00	Closing remarks	Katja Frieler	
14:00-14:45	PROCLIAS: Results of WG meetings and next steps	Christopher Reyer	
14:45-15:30	PROCLIAS: MC meeting (PROCLIAS MC members only)	Christopher Reyer	
20 January 14:00-16:00	Sector meeting Biodiversity tbc.	Thomas Hickler, Christopher Reyer	