ISRSE39 2023 Antalya

International Center for Remote Sensing of Environment · isprs · GEO · ISTANBUL TECHNICAL UNIVERSITY · cnes CENTRE NATIONAL D'ETUDES SPATIALES · CSIRO · esa · NASA · NOAA · TUA Turkish Space Agency

39th International Symposium on Remote Sensing of Environment

"From Human Needs to SDGs"

24–28 April 2023

Rixos Hotels – Sungate
Antalya, Turkiye

www.isrse39.com

24 April 2023, Monday

Time	HALL A	HALL B	HALL C	Registration	Exhibition Opening
09:00 - 10:30	**Opening Ceremony** *Chair: Altan, Orhan* *ISPRS*				
10:30 - 11:00	Coffee break				
11:00 - 12:30	**Space Agencies Forum** *Chair: Schreier, Gunter* *DLR*				
12:30 - 14:00	Lunch				
14:00 - 15:30	**Current and Future EO Missions 1** Space Agencies Outlook 1 *Chair: Schaadt, Peter* *DLR*	**Agriculture 1** *Chair: Polidori, Laurent* *ISPRS*	**Data and Information Systems 1** *Chair: Jie, Jiang* *ISPRS*		
15:30 - 16:00	Coffee break				
16:00 - 17:30	**Current and Future EO Missions 2** Space Agencies Outlook 2 *Chair: Schaadt, Peter* *DLR*	**Agriculture 2** *Chair: Haarpaintner, Jörg* *NORCE Climate & Environment - Norwegian Research Centre*	**Sustainable Cities 1** *Chair: Balık Şanlı, Füsun* *Yıldız Technical University*		
17:30 - 19:00			**Disasters, Resilience and Geohazards 1** *Turkish Young Scientists* *Chair: Kocaman, Sultan* *Hacettepe University*		

25 April 2023, Tuesday

Time	HALL A	HALL B	HALL C	
09:00 - 10:30	**Plenary Session 1** *Chair: Halounova, Lena* *ISPRS*			Exhibition
10:30 - 11:00	Coffee break			
11:00 - 12:30	**Discussion Forum** "SDGs, Midway to 2030" *Chair: Paganni, Marc / ESA* *Friedl, Lawrence / NASA*	**Water Resources** *Chair: Brovelli, Maria* *Politecnico di Milano*	**Disasters, Resilience and Geohazards 2** ISPRS Advances in Active Microwave Remote Sensing *Chair: Balık Şanlı, Füsun* *Yıldız Technical University*	
12:30 - 14:00	Lunch			
14:00 - 15:30	**Forest, Biodiversity and Ecosystems 1** *Chair: Heipke, Christian* *ISPRS*	**Climate, Weather and Atmosphere 1** *Chair: Ryan, Barbara* *WGIC*	**Discussion Forum** "EO for International Development Assistance" *Chair: Aubrecht, Christoph* *ESA*	
15:30 - 16:30	Poster presentation and Coffee break			
16:30 - 18:00	**Forest, Biodiversity and Ecosystems 2** *Chair: Haarpaintner, Jörg* *NORCE Climate & Environment - Norwegian Research Centre*	**Current and Future EO Missions 1** *Chair: Volz, Stephen* *NOAA*	**Data and Information Systems 2** *Chair: Li, Xinwu* *International Research Center of Big Data for Sustainable Development Goals (CBAS)*	

26 April 2023, Wednesday

Time	HALL A	HALL B	HALL C	
09:00 - 10:30	**Plenary Session 2** *Chair: Latham, John* *ICRSE, FAO*			Exhibition
10:30 - 11:00		Coffee break		
11:00 - 12:30	**Forest, Biodiversity and Ecosystems 3** *Chair: Jonckheere, Inge* *FAO*	**Agriculture 3 Cropland, Grassland and Biodiversity** *Chair: Klein, Doris* *DLR*	**Data and Information Systems 3** Monitoring and Managing Polar Regions *Chair: Volz, Stephen* *NOAA*	
12:30 - 14:00		Lunch		
14:00 - 15:30	**Forest, Biodiversity and Ecosystems 4** *Chair: Kocaman, Sultan* *Hacettepe University*	**Agriculture 4** *Chair: Gessner, Ursula* *DLR, DFD*	**Disasters Resilience and Geohazards 3 Earthquake in Turkey** *Chair: Kutny, Mary Ann* *NOAA*	
15:30 - 16:30	Poster presentation and Coffee break			
16:30 - 18:00	**Discussion Forum: Forest Data for SDGs: Stakeholder Perspectives** *Chair: Strunck, Alexander* *GIZ*	**Climate, Weather and Atmosphere 2** *Chair: Ryan, Barbara* *WGIC*	**Disasters Resilience and Geohazards 4** *Chair: Kutny, Mary Ann* *NOAA*	

27 April 2023, Thursday

Time	HALL A	HALL B	HALL C	
09:00 - 10:30	**Forest, Biodiversity and Ecosystems 5 From Earth Observation of GHG's to Carbon Markets, Key Pathways for Mitigating Climate Change** *Chair: Latham, John* *ICRSE, FAO*	**Agriculture 5** *Chair: Haarpaintner, Jörg* *NORCE Climate & Environment - Norwegian Research Centre*	**Public Health** *Chair: Hill, Christopher* *University of Southhampton*	**Exhibition**
10:30 - 11:00		Coffee break		
11:00 - 12:30	**Forest, Biodiversity and Ecosystems 6** *Chair: Latham, John* *ICRSE, FAO*	**Current and Future EO Missions 2** *Chair: Osmanoğlu, Batuhan* *NASA–GSFC*	**Remote Sensing of Snow Cover in Mountainous Environments** *Chair: Rößler, Sebastian* *DLR*	
12:30 - 14:00		Lunch		
14:00 - 15:30	**Forest, Biodiversity and Ecosystems 7 - Forest Fire** *Chair: Klein, Doris* *DLR*	**Marine and Coastal Environment Resources** *Chair: Sunar, Filiz* *Istanbul Technical University*	**Sustainable Cities 2** *Chair: Pirotti, Francesco* *University of Padova*	
15:30 - 16:00		Coffee break		
16:00 - 17:00	**Discussion Forum: Challenges in Earth Observation to Tackle the SDGs** *Chair: Altan, Orhan* *ISPRS*			
	Closing Ceremony			

24 April 2023, Monday

09:00 - 10:30 **OPENING CEREMONY** — Hall A
Chair: Altan, Orhan / ISPRS

Altan, Orhan
ISPRS

Latham, John
ICRSE, FAO

Halounova, Lena
ISPRS

Kutny, Mary Ann
NOAA

Atasoy, Lokman
Antalya Municipality

Bayraktar, Hüseyin
Ministry of Environment, Urbanization and Climate Change

Keynote Speech
Towards Sustainable Development: Challenges and Opportunities
Annoni, Allesandro
ISDE

10:30 - 11:00 Coffee break

11:00 - 12:30 **SPACE AGENCIES FORUM** — Hall A
Chair: Schreier, Gunter / DLR

Sangha, Harshbir
UKSA

Campbell, Gordon
ESA

Li, Xinwu
CBAS

Karabeyoğlu, Arif
Koc University

Schaadt, Peter
DLR

St Germain, Karen - Friedl, Lawrence
NASA

Volz, Stephen
NOAA

12:30 - 14:00 Lunch

24 April 2023, Monday

14:00 - 15:30 **CURRENT AND FUTURE EO MISSIONS 1**
Space Agencies Outlook 1
Chair: Schaadt, Peter
DLR

Hall A

ISRSE39 - OP001 ESAs EO PROGRAMME
Campbell, Gordon
ESA

ISRSE39 - OP002 NASA EO PROGRAMME
Lawrence, Friedl
NASA

ISRSE39 - OP003 UKSA EO PROGRAMME
Sangha, Harshbir
UKSA

ISRSE39 - OP004 ASI EO PROGRAMME
Dini, Luigi
ASI

ISRSE39 - OP005 THE GERMAN EO PROGRAMME
Schaadt, Peter
DLR

24 April 2023, Monday

14:00 - 15:30 **AGRICULTURE 1**
Chair: Polidori, Laurent
ISPRS
Hall B

ISRSE39 - OP006 REMOTE SENSING BASED ASSESSMENT OF VEGETATION PRODUCTIVITY AND VEGETATION STRUCTURE IN WEST AFRICA
Gessner, Ursula
German Aerospace Center (DLR, DFD)

ISRSE39 - OP007 DETERMINING THE SEASONAL DYNAMICS OF CROPPING AND FALLOW PATTERNS WITHIN THE BROAD-ACRE REGION OF AUSTRALIA
Zhao, Yan
The University of Queensland

ISRSE39 - OP008 IMPACTS OF SUPPORT POLICIES ON AGRICULTURAL LAND USE AND PRODUCTION IN THE CROSS-BORDER AREA BETWEEN TURKEY AND BULGARIA
Ozdogan, Mutlu
University of Wisconsin-Madison

ISRSE39 - OP009 ASSESSMENT OF CROPLAND TRANSITION TO SOLAR FARMS AND OTHER LAND USE/COVER USING RS, GIS AND ANN-CA
Principe, Jeark Armingol
University of the Philippines Diliman

SRSE39 - OP010 LAND USE/LAND COVER CLASSIFICATION IN A HETEROGENEOUS AGRICULTURAL LANDSCAPE USING PLANETSCOPE DATA
Bueno, Inacio Thomaz
University of Campinas

ISRSE39 - OP106 ANNUAL LAND COVER AND CROP TYPE MAPPING AT HIGH THEMATIC AND SPATIAL RESOLUTION FOR GREECE
Karakizi, Christina
Manchester Metropolitan University

24 April 2023, Monday

14:00 - 15:30 **DATA AND INFORMATION SYSTEMS 1** — Hall C
Chair: Jie, Jiang
ISPRS

ISRSE39 - OP012 PIXELS, FEDERATE! FROM PASSIVE FILE STORES TO ACTIVE DATACUBES
Mishev, Dmitar
Jacobs University

ISRSE39 - OP013 THE PICTURE PILE PLATFORM FOR RAPID IMAGE CLASSIFICATION: DEMONSTRATING THE POTENTIAL FOR CITIZEN SCIENCE AND SDG MONITORING
See, Linda
International Institute for Applied Systems Analysis (IIASA)

ISRSE39 - OP014 USING A SOLAP TOOL AND SPATIAL DATAWAREHOUSING, IN A SPATIAL DATAMINING PROCESS FOR MANAGING THE PUBLIC LIGHTING IN CITY OF ORAN, ALGERIA
Saidi, Ahmed
ASAL CTS

ISRSE39 - OP015 RESEARCH ON NODE NETWORK TRANSMISSION CAPACITY PREDICTION MODEL FOR LARGE SCALE REMOTE SENSING DATA COLLECTION
Bai, Lu
Ulster University

ISRSE39 - OP016 THE DSAT TOOL: AN APPLICATION FOR INTERACTIVE VISUALIZATION OF DATA AND PRODUCTS FROM THE METEOROLOGICAL SATELLITES AND SENSOR'S DIVISION (INPE / BRAZIL)
Mattos Gava, Maria Livia Lins
INPE

ISRSE39 - OP017 THE CONTRIBUTION OF LAND COVER STANDARDS IN ACCELERATING UNITED NATIONS SUSTAINABLE DEVELOPMENT GOALS: PRACTICES, CHALLENGES AND OPPORTUNITIES
Mushtaq, Fatima
Food and Agriculture Organization of the United Nations

15:30 - 16:00 Coffee break

24 April 2023, Monday

16:00 - 17:30 **CURRENT AND FUTURE EO MISSIONS 2**
Space Agencies Outlook 2
Chair: Schaadt, Peter
DLR

Hall A

ISRSE39 - OP018 THE COPERNICUS PROGRAMME
Machefer, Mélissande
EC JRC

ISRSE39 - OP019 NOAA EO PROGRAMME
Volz, Stephen
NOAA

ISRSE39 - OP020 INTERNATIONAL RESEARCH CENTER OF BIG DATA FOR SUSTAINABLE DEVELOPMEMT GOAL
Li, Xinwu
CBAS

ISRSE39 - OP021 NATIONAL LABORATORY FOR EARTH OBSERVATION (LANOT), MEXICO
Jiménez, Víctor
LANOT

24 April 2023, Monday

16:00 - 17:30 **AGRICULTURE 2**
Chair: Haarpaintner, Jörg
NORCE Climate & Environment - Norwegian Research Centre
Hall B

ISRSE39 - OP179 MONITORING LAND DEGRADATION AND RESTORATION WITH SATELLITE EARTH OBSERVATIONS TO SUPPORT THE SUSTAINABLE DEVELOPMENT GOALS: MODULE 15.3.1 ON THE SEPAL CLOUD COMPUTING PLATFORM AS AN EXAMPLE
Ghosh, Amit
Food and Agriculture Organization of the United Nations

ISRSE39 - OP022 LAND USE CHANGE ANALYSIS IN THE TSELINOGRAD DISTRICT OF KAZAKHSTAN, USING REMOTE SENSING, GIS AND MARKOV STOCHASTIC MODELLING
Alipbeki, Onggarbek
S.Seifullin Kazakh Agro Technical University

ISRSE39 - OP023 REVEALING THE IMPACT OF XYLELLA FASTIDIOSA ON OLIVE GROVES THROUGH THE ANALYSIS OF MULTIFRACTAL AND INFORMATIONAL PROPERTIES OF MODIS SATELLITE EVAPOTRANSPIRATION SATELLITE DATA
Telesca, Luciano
Institute of Methodologies for Environmental Analysis, National Research Council

ISRSE39 - OP024 EARTH OBSERVATION AND MACHINE LEARNING FOR ESTIMATING THE IRRIGATION POTENTIAL OF MUNICIPALITIES IN VOJVODINA, SERBIA
Radulović, Mirjana
University of Novi Sad - BioSense Institute

ISRSE39 - OP025 SPACE-TIME PREDICTION OF MAIZE YIELDS IN SOUTHERN AFRICA
Muthoni, Francis Kamau
International Institute of Tropical Agriculture - IITA

ISRSE39 - OP026 GLCM FEATURES FOR LEARNING FLOODED VEGETATION FROM SENTINEL-1 AND SENTINEL-2 DATA
Tavus, Beste
Hacettepe University

ISRSE39 - OP107 EVALUATING THE POTENTIAL OF 8 PLANETSCOPE DATASET FOR CROP CLASSIFICATION USING RANDOM FOREST AND GRADIENT TREE BOOSTING BY GOOGLE EARTH ENGINE
Ghosh, Sanjay Kumar
Indian Institute of Technology

24 April 2023, Monday

16:00 - 17:30 **SUSTAINABLE CITIES 1**
Chair: Balık Şanlı, Füsun
Yıldız Technical University
Hall C

ISRSE39 - OP027 ESA'S GDA URBAN SUSTAINABILITY ACTIVITY: MULTI-PURPOSE BUILDING FOOTPRINT DATA FOR URBAN PLANNING
Herda, Gregor
GAF AG

ISRSE39 - OP028 SPATIOTEMPORALLY IMPROVING THE RURAL ACCESS INDEX - A REMOTE SENSING BASED APPROACH
Halbgewachs, Magdalena Felicitas
German Aerospace Center (DLR)

ISRSE39 - OP029 MONITORING THE ENVIRONMENT IN SMART CITIES: THE IMPORTANCE OF GEOSPATIAL LOCATION REFERENCING
Suleymanoglu, Baris
Yildiz Technical University

ISRSE39 - OP030 MONITORING AND TRACKING PEDESTRIANS AND VEHICLES FROM UAV IMAGERY
Masiero, Andrea
University of Florence

ISRSE39 - OP031 GROUND TRUTHING: STUDYING PERI-URBANIZATION AND LAND-BASED LIVELIHOODS IN MANKWENG AND ITS ENVIRONS (LIMPOPO, SOUTH AFRICA)
Patric, Deepthi Jeslet
Karlsruhe University of Applied Sciences

24 April 2023, Monday

17:30 - 19:00 **DISASTERS, RESILIENCE AND GEOHAZARDS 1**
Turkish Young Scientists
Chair: Kocaman, Sultan
Hacettepe University
Hall C

ISRSE39 - OP032 SEGMENTATION OF LANDSAT-8 IMAGES FOR BURNED AREA DETECTION WITH DEEP LEARNING
Alkan, Damlanur
Konya Technical University

ISRSE39 - OP033 MULTI-HAZARD SUSCEPTIBILITY ASSESSMENT WITH HYBRID MACHINE LEARNING METHODS FOR TUT REGION (ADIYAMAN, TURKIYE)
Karakaş, Gizem
Hacattepe University

ISRSE39 - OP034 FREQUENCY RATIO ASSESSMENT FOR LANDSLIDES TRIGGERED BY 6 FEBRUARY 2023 KAHRAMANMARAS TURKIYE EARTHQUAKES BETWEEN GOLBASI AND ERKENEK
Çetinkaya, Sinem
Hacettepe University

ISRSE39 - OP035 ROCK MASS DISCONTINUITY DETERMINATION WITH TRANSFER LEARNING
Can, Recep
Hacettepe University

25 April 2023, Tuesday

09:00 - 10:30 **PLENARY SESSION 1** — Hall A
Chair: Halounova, Lena
ISPRS

SUSTAINABLE EARTH OBSERVATION FOR A SUSTAINABLE EARTH
Osmanoğlu, Batuhan
NASA–GSFC

PRESENT AND FUTURE OF WEATHER RADAR OBSERVATIONS AND MONITORING FOR ENVIRONMENTAL MANAGEMENT
Chandra, Madhu
TU Chemnitz, URSI

TÜRKİYE'S PAST AND FUTURE IN SPACE
Karabeyoğlu, Arif
Koc University

10:30 - 11:00 Coffee break

11:00 - 12:30 **DISCUSSION FORUM: "SDGs, Midway to 2030"** — Hall A
Chair: Paganni, Marc
ESA
Friedl, Lawrence
NASA

Ryan, Barbara
WGIC

Wilson, Cara
NOAA

Jonckeere, Inge
FAO

TESTIMONIALS BY UNSD, FAO, UNEP, UN HABITAT, UNCCD, CBD, RAMSAR, GEO SECRETARIAT, EARSC, NOAA, COLOMBIA/DANE, COSTA RICA/MINAE

25 April 2023, Tuesday

11:00 - 12:30 **WATER RESOURCES**
Chair: Brovelli, Maria
Politecnico di Milano
Hall B

ISRSE39 - OP037 WATER RESSOURCES MONITORING FROM SPACE: BRINGING SATELLITE EARTH OBSERVATION DATA TO DECISION MAKERS IN TRANSBOUNDARY BASINS
Sand, Aurelie
Centre National d'Etudes Spatiales

ISRSE39 - OP038 ON THE APPLICABILITY OF SENTINEL-2 FOR WATER QUALITY MONITORING IN BELGIUM
Landuyt, Lisa
VITO

ISRSE39 - OP039 AN OBJECT-BASED IMAGE ANALYSIS METHOD FOR PREDICTING ECOLOGICAL VARIABLES FOR MONITORING MACROZOOBENTHOS IN THE DUTCH WADDEN SEA
Madhuanand, Logambal
University of Utrecht

ISRSE39 - OP040 MapEO WATER - DRONE PROCESSING SERVICE TO OBSERVE INLAND AND COASTAL WATERS
Reusen, Ils
VITO

ISRSE39 - OP041 GEDI DATA WITHIN GOOGLE EARTH ENGINE: PRELIMINARY ANALYSIS OF A RESOURCE FOR INLAND SURFACE WATER MONITORING
Hamoudzadeh, Alireza
Sapienza University of Rome

ISRSE39 - OP042 ANALYSIS OF THE REMOTELY SENSED WATER QUALITY PARAMETERS OF THE INSUBRIC LAKES: METHODS AND RESULTS OF THE INTERREG SIMILE PROJECT
Brovelli, Maria Antonia
Politecnico di Milano

25 April 2023, Tuesday

11:00 - 12:30 **DISASTERS, RESILIENCE AND GEOHAZARDS 2**
ISPRS Advances in Active Microwave Remote Sensing
Chair: Balık Şanlı, Füsun
Yıldız Technical University
Hall C

ISRSE39 - OP043 MULTICRITERIA EVALUATION OF THE POTENTIAL OF P-BAND AIRBORNE RADAR FOR 3D CHARACTERISATION OF HYDROGRAPHY IN TROPICAL FORESTS
Polidori, Laurent
UFPA

ISRSE39 - OP045 LANDSLIDE DEFORMATION IN THE HIMALAYAS OBSERVED BY SENTINEL-1 PERSISTENT SCATTERER InSAR
Haghighi, Mahmud Haghshenas
Leibniz University Hannover

ISRSE39 - OP046 PREDICTION OF LONG-TERM SENTINEL-1 INSAR TIME SERIES ANALYSIS
Abdikan, Saygin
Hacettepe University

ISRSE39 - OP047 INSAR-BASED INVESTIGATION OF SURFACE DISPLACEMENT OVER THE AREA OF THE COLLAPSED BUILDINGS IN ISTANBUL
Demir, Nusret
Akdeniz University

ISRSE39 - OP048 GEOHAZARDS MONITORING AND MAPPING FOR THE TENGIZ OIL FIELD USING TIME-SERIES INTERFEROMETRIC ANALYSIS
Bayramov, Emil
Nazarbayev University

ISRSE39 - OP036 MONITORING THE SLOWLY DEVELOPING LANDSLIDE WITH THE INSAR TECHNIQUE IN SAMSUN PROVINCE, NORTHERN TURKEY
Coşkun, Suat
Yıldız Technical University

12:30 - 14:00 Lunch

25 April 2023, Tuesday

14:00 - 15:30 **FOREST, BIODIVERSITY AND ECOSYSTEMS 1**
Chair: Heipke, Christian
ISPRS
Hall A

ISRSE39 - OP049 SYNOPTIC SENSING THE IMPACTS OF SEASONAL DROUGHT STRESS AND TYPHOON DEFOLIATION ON A MOUNTAIN CLOUD FOREST
Wang, Hsueh-Ching
University of Taipei

ISRSE39 - OP050 DEFORESTATION MONITORING FOR TROPICAL FORESTS USING DEEP LEARNING IN THE CONTEXT OF SUPPLY CHAIN DUE DILIGENCE
Brand, Anna K.
Remote Sensing Solutions GmbH

ISRSE39 - OP051 THE FOREST OBSERVATION SYSTEM – GLOBAL HARMONISED IN-SITU DATA REPOSITORY FOR FOREST BIOMASS MAPS VALIDATION
Shchepashchenko, Dmitry
International Institute for Applied Systems Analysis

ISRSE39 - OP052 EVALUATION OF SENTINEL-2 VEGETATION INDICES TO DIFFERENTIATE FOREST RECOVERY PHASES IN CZECHIA
Kobliuk, Natalia
Charles University

ISRSE39 - OP053 THE APPLICATION OF REMOTE SENSING FOR THE SUSTAINABLE DEVELOPMENT OF FORESTS
Naicker, Kirsty
Woolpert Africa

ISRSE39 - OP054 ESTIMATION OF SECONDARY FOREST ABOVEGROUND BIOMASS IN BRAZIL USING GEOGRAPHICALLY WEIGHTED REGRESSION MODEL AND MULTI-SOURCE REMOTE SENSING DATA
Chen, Na
Wageningen University & Research

25 April 2023, Tuesday

14:00 - 15:30 **CLIMATE, WEATHER AND ATMOSPHERE 1**
Chair: Ryan, Barbara
WGIC
Hall B

ISRSE39 - OP055 TECHNIQUES FOR COMPARING MULTI-TEMPORAL ARCHIVES OF REMOTE-SENSING DATASETS FOR GLACIER EVOLUTION MONITORING WITH POOR GROUND CONTROL
Scaioni, Marco
Politecnico di Milano

ISRSE39 - OP056 MONITORING THE EVOLUTION OF GLOBAL SEASONAL SNOW COVER - INSIGHTS FROM REMOTE SENSING TIME SERIES ANALYSIS
Rößler, Sebastian
German Aerospace Center (DLR)

ISRSE39 - OP057 IMPACT OF LEARNING SET AND SAMPLING FOR SNOW AVALANCHE SUSCEPTIBILITY MAPPING WITH RANDOM FOREST
Kocaman, Sultan
Hacettepe University

ISRSE39 - OP058 MACHINE LEARNING BASED BIAS CORRECTION FOR MODIS AEROSOL OPTICAL DEPTH IN BEIJING
Bai, Lu
Ulster University

ISRSE39 - OP059 MATHEMATICAL AND PHYSICAL APPROACHES TO INFER ABSOLUTE ZENITH WET DELAYS FROM DOUBLE DIFFERENTIAL INTERFEROMETRIC OBSERVATIONS USING ERA5 ATMOSPHERIC REANALYSIS
Kamm, Bettina
Karlsruhe Institute of Technology

ISRSE39 - OP060 VULNERABILITY OF ECONOMIC SECTORS TO GEOMAGNETIC STORMS AND MITIGATION STRATEGIES
Demirköz, Bilge
Middle East Technical University

25 April 2023, Tuesday

14:00 - 15:30 **DISCUSSION FORUM: EO FOR INTERNATIONAL DEVELOPMENT ASSISTANCE** — Hall C

Chair: Aubrecht, Christoph
ESA

Mwangi, Kenneth
Climate, Agriculture and Environment Monitoring Expert at IGAD, Kenya

Khomarudin, Rokhis
Director of Remote Sensing Application Center LAPAN, Indonesia

Bathiery, Ousmane
CSE Centre de Suivi Ecologique, Senegal

15:30 - 16:30 Coffee break & Poster Presentation Session 1

16:30 - 18:00 **FOREST, BIODIVERSITY AND ECOSYSTEMS 2** — Hall A

Chair: Haarpaintner, Jörg
NORCE Climate & Environment - Norwegian Research Centre

ISRSE39 - OP061 FOREST AREA ESTIMATION IN EUROPE BASED ON THE COMBINATION OF IN SITU REFERENCE DATA AND THE COPERNICUS HIGH RESOLUTION LAYER ON TREE COVER DENSITY
Sannier, Christophe
IGN FI

ISRSE39 - OP062 ASSESSING RECENT FOREST STRUCTURE DYNAMICS IN GERMANY (2017-2022) BASED ON GEDI, SENTINEL-1 AND SENTINEL-2
Kacic, Patrick
University of Wuerzburg

ISRSE39 - OP063 FostCARe – A SYSTEM FOR THE DETECTION OF FOREST DAMAGE FROM SENTINEL-2 IMAGES BASED ON DEEP LEARNING
Heipke, Christian
Leibniz University Hannover

ISRSE39 - OP064 A DEBIASING VARIATIONAL AUTOENCODER FOR DEFORESTATION MAPPING
Ortega Adarme, Mabel Ximena
Leibniz University Hannover

ISRSE39 - OP065 SPATIALMAXENT: ACCOUNTING FOR SPATIAL AUTOCORRELATION DURING MODEL PARAMETERIZATION LEADS TO LESS COMPLEX MAXENT MODELS AND A BETTER PREDICTIVE PERFORMANCE ON SPATIALLY INDEPENDENT TEST DATA
Bald, Lisa
Philipps University of Marburg

ISRSE39 - OP066 POTENTIAL OF SENTINEL-2 IMAGERY IN ESTIMATING WOODY VEGETATION DIVERSITY IN A SEMI-ARID ECOSYSTEM FOR HABITAT QUALITY
Nyathi, Nesisa Analisa
University of Basel

25 April 2023, Tuesday

16:30 - 18:00 **CURRENT AND FUTURE EO MISSIONS 1**
Chair: Volz, Stephen
NOAA

Hall B

ISRSE39 - OP067 PLANET EO PROGRAM
Pandey, Pooja
Planet

ISRSE39 - OP068 SEEING THE WORLD FROM SPACE FOR A BETTER LIFE ON EARTH
İlarslan, Mustafa
Airbus DS

ISRSE39 - OP069 THE EARTHDAILY CONSTELLATION – A GLOBAL-SCALE CHANGE DETECTION SYSTEM
Parkinson, William
EarthDaily Analytics

ISRSE39 - OP070 THE JOINT POLAR SATELLITE SYSTEM (JPSS) – CONTINUING MORE THAN A DECADE OF GLOBAL EARTH OBSERVATIONS FOR MONITORING WEATHER, CLIMATE AND DYNAMIC TERRESTRIAL PROCESSES IN SUPPORT OF SUSTAINABLE DEVELOPMENT GOALS
Kalluri, Satya
NOAA/NESDIS/JPSS

ISRSE39 - OP071 TURKISH AEROSPACE SPACE SYSTEMS MICRO SATELLITE PROJECT
Karademir, Ahmet
Turkish Aerospace

25 April 2023, Tuesday

16:30 - 18:00 **DATA AND INFORMATION SYSTEMS 2** — Hall C

Chair: Li, Xinwu

International Research Center of Big Data for Sustainable Development Goals (CBAS)

ISRSE39 - OP072 UNDERSTANDING AND BUILDING OF REMOTE SENSING FOUNDATION MODEL
Zhengchao, Chen
Aerospace Information Research Institute, Chinese Academy of Sciences

ISRSE39 - OP073 HYDROWEB.NEXT, A THEMATIC HUB FOR HYDROLOGY PRODUCTS CENTRALIZING FREE ACCESS TO INNOVATIVE HYDROLOGY DATA INCLUDING SWOT
Lionel, Zawadzki
CNES

ISRSE39 - OP074 EARTH DATA STORE – A GEOSPATIAL ECOSYSTEM FOR IMPROVED DATA ACCESS, QUALITY AND ANALYTICS
Rampersad, Christopher
EarthDaily Analytics

ISRSE39 - OP075 STELLAR: A LARGE SATELLITE STEREO DATASET FOR DIGITAL SURFACE MODEL GENERATION
Patil, Sonali
German Aerospace Center (DLR)

ISRSE39 - OP076 LARGE VECTOR SPATIAL DATA STORAGE AND QUERY PROCESSING USING CLICKHOUSE
Bai, Lu
Ulster University

ISRSE39 - OP077 ROAD INFRASTRUCTURE MAPPING BY USING IPHONE 14 PRO: AN ACCURACY ASSESSMENT
Tamimi, Rami
The Ohio State University

26 April 2023, Wednesday

09:00 - 10:30 **PLENARY SESSION 2** — Hall A
Chair: Latham, John
ICRSE, FAO

SDG17 -PARTNERSHIPS FOR SUSTAINABLE DEVELOPMENT: ENGAGING THE PRIVATE SECTOR IN INSTITUTIONAL FRAMEWORKS
Martin, Stuart
SAC

FOREST MONITORING IN THE GLOBAL CLIMATE CHANGE CONTEXT: ADDED VALUE OF REMOTE SENSING FOR MITIGATION AND ADAPTATION
Jonckheere, Inge
FAO

ATMOSPHERE AND CLIMATE SERVICES FOR THE 21ST CENTURY: THE VALUE OF OBSERVATIONS
Poli, Paul
Copernicus Climate Change Service (C3S), ECMWF

10:30 - 11:00 Coffee break

11:00 - 12:30 **FOREST, BIODIVERSITY AND ECOSYSTEMS 3** — Hall A
Chair: Jonckheere, Inge
FAO

ISRSE39 - OP078 MAINSTREAMING EARTH OBSERVATION INTO TROPICAL FOREST MANAGEMENT PROGRAMMES: ESAs EO4SD FM
Gomez, Sharon
GAF AG

ISRSE39 - OP079 ESTIMATING TREES HEIGHT USING LOW-COST UAV
Vacca, Giuseppina
University of Cagliari

ISRSE39 - OP080 AN OPEN BENCHMARK DATA SET FOR THE ESTIMATION OF FOREST PARAMETERS FROM SENTINEL-1 AND -2 TIME SERIES WITH MACHINE LEARNING METHODS
Hauser, Sarah
Hochschule München University of Applied Sciences

ISRSE39 - OP081 Tree species classification using point cloud based Deep learning model
Kang, Jintaek
National Institute of Forest Science

ISRSE39 - OP082 A POTENTIAL-ENHANCED GLOBAL SOLAR-INDUCED CHLOROPHYLL FLUORESCENCE PRODUCT (ESIF) FOR MONITORING PHOTOSYNTHESIS BY COMBINING WITH NEAR-INFRARED REFLECTANCE OF VEGETATION
Liu, Xinjie
Key Laboratory of Digital Earth Science, Aerospace Information Research Institute

26 April 2023, Wednesday

11:00 - 12:30 **AGRICULTURE 3**
Cropland, Grassland and Biodiversity
Chair: Klein, Doris
DLR
Hall B

ISRSE39 - OP084 ASSESSMENT OF INTERCROPPING USING EARTH OBSERVATION
Mahlayeye, Mbali
University of Twente UT-ITC

ISRSE39 - OP085 SATELLITE-BASED DETECTION OF GRASSLAND MANAGEMENT TO SUPPORT LARGE-SCALE BIODIVERSITY ASSESSMENT
Reinermann, Sophie
University of Wuerzburg

ISRSE39 - OP086 ASSESSING CROP DIVERSITY ACROSS SCALES IN THE EUROPEAN UNION USING EARTH OBSERVATION
Machefer, Melissande
Joint Research Center European Commission

ISRSE39 - OP087 REMOTE MONITORING AND VERIFICATION OF FIELD LEVEL TILLAGE PRACTICES
Synes, Nicholas
Hummingbird Technologies

ISRSE39 - OP088 SATELLITE-BASED DETECTION OF LAND MANAGEMENT AND LANDSCAPE STRUCTURES IN AGROECOSYSTEMS
Gessner, Ursula
German Aerospace Center (DLR, DFD)

ISRSE39 - OP089 FORECASTING AND EXPLAINING FOOD INSECURITY WITH A MACHINE LEARNING MODEL
Machefer, Melissande
Joint Research Center European Commission

26 April 2023, Wednesday

11:00 - 12:30 **DATA AND INFORMATION SYSTEMS 3**
Monitoring and Managing Polar Regions
Chair: Volz, Stephen
NOAA
Hall C

ISRSE39 - OP090 POLAR COPERNICUS: CURRENT STATUS AND FUTURE PLANS
Berdahl, Maria
European Commission

ISRSE39 - OP091 CURRENT AND FUTURE SPACE INFRASTRUCTURE TO SUPPORT THE COPERNICUS POLAR SERVICES
Campbell, Gordon
ESA

ISRSE39 - OP092 NOAA'S POLAR ACTIVITIES: WATCHING THE POLES WITH SATELLITES TO GLIDERS
Wilson, Cara
NOAA

ISRSE39 - OP093 POLAR SERVICES: ATMOSPHERIC MONITORING AND CLIMATE CHANGE COMPONENTS
Poli, Paul
ECMWF

ISRSE39 - OP094 SYNERGISTIC HIGH-RESOLUTION REMOTE SENSING OF ARCTIC SEA ICE
Qiu, Yujia
Key Laboratory of Digital Earth Science, Aerospace Information Research Institute, Chinese Academy of Sciences, International Research Center of Big Data for Sustainable Development Goals, University of Chinese Academy of Sciences

ISRSE39 - OP095 DERIVING INTERNAL WAVE PHASE SPEED IN THE ARCTIC OCEAN FROM SEQUENTIAL SPACEBORNE SAR OBSERVATIONS
Kozlov, Igor E.
Marine Hydrophysical Institute of RAS

12:30 - 14:00 Lunch

26 April 2023, Wednesday

14:00 - 15:30 **FOREST, BIODIVERSITY AND ECOSYSTEMS 4**
Chair: Kocaman, Sultan
Hacettepe University
Hall A

ISRSE39 - OP096 SPATIO-TEMPORAL ANALYSIS OF LAND SURFACE TEMPERATURE AND ITS FACTORS OVER THE HIGH MOUNTAIN ASIA
Rani, Seema
Banaras Hindu University

ISRSE39 - OP097 ENVIRONMENTAL SUSTAINABILITY ASSESSMENT OF A HIMALAYAN CATCHMENT WITH LAND COVER INDICES AND LAND SURFACE TEMPERATURE RELATIONSHIP USING PRINCIPAL COMPONENT ANALYSIS – A GEOSPATIAL APPROACH
Sathyaseelan, M.
Indian Institute of Technology Roorkee

ISRSE39 - OP098 DROUGTH MONITORING FROM 2001-2019 IN NORTHEST THIALAND USING MODIS NDVI IMAGE TIME SERIES AND Savitzky-Golay APPROACH
Som-ard, Jaturong
Mahasarakham University

ISRSE39 - OP099 MONITORING DROUGHT IMPACTS IN CENTRAL EUROPEAN AGRO-ECOSYSTEMS: COMPARISON OF MODIS AND SENTINEL-2 TIME SERIES
Dubovyk, Olena
University of Bergen

ISRSE39 - OP100 A FEATURE-BASED DEEP LEARNING APPROACH FOR THE EXTRACTION OF GROUND POINTS FROM 3D POINT CLOUDS
Doğan, Yusuf
Hacettepe University

ISRSE39 - OP101 AUTOMATIC EXTRACTION OF SURFACE DYNAMICS USING GOOGLE EARTH ENGINE FOR UNDERSTANDING DROUGHT PHEN
Polat, Ahmet Batuhan
Çanakkale 18 Mart University

26 April 2023, Wednesday

14:00 - 15:30 **AGRICULTURE 4**
Chair: Gessner, Ursula
DLR, DFD
Hall B

ISRSE39 - OP102 DISTINGUISHING CROP TYPES AND LAND COVERS IN KENYA USING SEASONAL AND PERCENTILE SIGNATURES OF SENTINEL-1 CSAR BACKSCATTER.
Haarpaintner, Jörg
NORCE Climate & Environment - Norwegian Research Centre

ISRSE39 - OP103 SELF-SUPERVISED LEARNING FOR CROP CLASSIFICATION USING PLANET FUSION
Senaras, Caglar
Planet Labs

ISRSE39 - OP104 IRRIGATED AGRICULTURE MAPPING IN A SEMI-ARID REGION IN BRAZIL BASED ON THE USE OF SENTINEL-2 DATA AND RANDOM FOREST ALGORITHM
Bendini, Hugo
INPE

ISRSE39 - OP105 WINTER CROP MONITORING WITH TEMPORALLY-AWARE MACHINE LEARNING AND DEEP LEARNING METHODS
Heremans, Stien
Research Institute for Nature and Forest (INBO)

ISRSE39 - OP011 IN AND END OF SEASON SOYBEAN YIELD PREDICTION WITH HISTOGRAM BASED DEEP LEARNING
Erik, Esra
Hacettepe University

26 April 2023, Wednesday

14:00 - 15:30 **DISASTERS, RESILIENCE AND GEOHAZARDS 3**
Earthquake in Turkey
Chair: Kutny, Mary Ann
NOAA
Hall C

ISRSE39 - OP108 6 FEBRUARY 2023 KAHRAMANMARAŞ-TÜRKIYE EARTHQUAKES : A GENERAL OVERVIEW
Gökçeoğlu, Candan
Hacettepe University

ISRSE39 - OP109 FEBRUARY 2023 EQS CAUSED DAMAGE ASSESSMENT OF CULTURAL HERITAGE OF TÜRKIYE WITH USE OF INSAR METHODOLOGIES
Demir, Nusret
Akdeniz University

ISRSE39 - OP110 OPERATIONAL EARTHQUAKE RESPONSE WITH SATELLITE GEODESY
Barnhart, William
USGS

ISRSE39 - OP044 ENEFIT ASSESSMENT OF COMMERCIAL SYNTHETIC APERTURE RADAR OBSERVATIONS FOR SURFACE DEFORMATION AND CHANGE MISSION STUDY
Osmanoğlu, Batuhan
NASA–GSFC

ISRSE39 - OP111 DLR'S MAPPING ACTIVITIES AND INFORMATION PROVISION FOR THE EARTHQUAKE OF THE 6TH FEBRUARY 2023
Klein, Doris
German Aerospace Center (DLR)

15:30 - 16:30 Coffee break & Poster Presentation Session 2

26 April 2023, Wednesday

16:30 - 18:00 **DISCUSSION FORUM: "FOREST DATA FOR SDGs: STAKEHOLDER PERSPECTIVES"** Hall A

Chair: Strunck, Alexander
Planer Land Governance, GIZ - Sectoral Department

Jonckheere, Inge
Thematic Lead, FAO - Forestry Devision

Carter, Sarah
Research Associate, World Resources Institute - Global Forest Watch

Hesch, Gunnar
Advisor Geospatial Technology, GIZ - Sectoral Department

Schielein, Johannes
Head of Data Analystics, KfW

Tadjo,Serge Patrick
Director, Bouba Ndjidda National Park Cameroon

26 April 2023, Wednesday

16:30 - 18:00 **CLIMATE, WEATHER AND ATMOSPHERE 2** — Hall B
Chair: Ryan, Barbara
WGIC

ISRSE39 - OP112 GHG MONITORING FROM SPACE – A SYSTEMATIC MAPPING OF PUBLIC, PRIVATE AND HYBRID MISSIONS
Ryan, Barbara
World Geospatial Industry Council (WGIC)

ISRSE39 - OP113 CONTRIBUTIONS FROM THE COMMERCIAL SECTOR FOR CLIMATE ACTION
Pooja Pandey
Planet

ISRSE39 - OP114 THE CASE FOR A NEW MODEL OF WATER VALUATION TO ACCOUNT FOR FUTURE CHANGES IN WATER AVAILABILITY
Stuart Martin
Satellite Applications Catapult

ISRSE39 - OP115 SPATIAL SUITABILITY MAPPING OF HUMAN ACTIVITIES OVER ANTARCTIC ICE SHELVES
Xinwu, Li
International Research Center of Big Data for Sustainable Development Goals

ISRSE39 - OP116 INVESTIGATION OF GREEN SPACE COOLING POTENTIAL ON LAND SURFACE TEMPERATURE IN ANTALYA CITY OF TURKEY
Eyileten, Buket
Akdeniz University

ISRSE39 - OP117 DETECTION OF PHYTOGEOGRAPHIC INDICATORS WITH REMOTE SENSING AND GEOARCHAEOLOGY FOR DEVELOPMENT OF A LONG-TERM CLIMATE MONITORING STATION IN ISRAEL
Manspeizer, Neil
Ben Gurion University

ISRSE39 - OP118 IMPROVING THE ACCURACY OF SATELLITE-BASED NEARSURFACE AIR TEMPERATURE AND PRECIPITATION PRODUCTS
Karaman, Çağrı
Middle East Technical University

26 April 2023, Wednesday

16:30 - 18:00 **DISASTERS, RESILIENCE AND GEOHAZARDS 4** — Hall C

Chair: Kutny, Mary Ann
NOAA

ISRSE39 - OP119 FROM NATIONAL TO CONTINENTAL-SCALE HAZARD MAPPING – EXPERIENCE USING MASSIVE InSAR DATASETS
Dehls, John F.
Geological Survey of Norway (NGU)

ISRSE39 - OP120 INSAR APPLICATIONS IN HYDROGEOLOGY: FROM ANCIENT HYDRAULIC STRUCTURES TO MODERN-DAY ENGINEERING
Aslan, Gokhan
Geological Survey of Norway (NGU)

ISRSE39 - OP121 DEEP LEARNING FOR THE DETECTION OF ANOMALOUS INSAR DEFORMATION BEHAVIOUR OF A TAILINGS DAM
Bayaraa, Maral
University of Oxford / Satellite Applications Catapult

ISRSE39 - OP122 LONG-TERM MONITORING OF LINEAR OIL AND GAS ASSETS FOR UNDERSTANDING OF GEOHAZARD RISKS THROUGH THE QUANTITATIVE REMOTE MICROWAVE SURVEILLANCE
Bayramov, Emil
Nazarbayev University

ISRSE39 - OP123 MAPPING AREAS IMPACTED BY VOLCANIC FLOWS DURING AN ERUPTION USING SAR AND OPTICAL IMAGERY
Macorps, Elodie
NASA–GSFC

ISRSE39 - OP124 EUSI - EUROPEAN PREFERRED GATEWAY FOR VHR IMAGERY AND NATURAL DISASTER/EMERGENCY MANAGEMENT MISSIONS
Karjalainen, Ossi
EUSI - European Space Imaging

27 April 2023, Thursday

09:00 - 10:30 **FOREST, BIODIVERSITY AND ECOSYSTEMS 5**
From Earth Observation of GHG's to Carbon Markets, Key Pathways for Mitigating Climate Change
Chair: Latham, John
ICRSE, FAO

Hall A

ISRSE39 - OP125 CARBON CYCLE AND APPLICATIONS: NASA'S PERSPECTIVES AND CONTRIBUTIONS
Friedl, Lawrence
NASA

ISRSE39 - OP126 CONTRIBUTIONS FROM CURRENT AND FUTURE ESA MISSIONS TO CARBON CHARACTERIZATION
Campbell, Gordon
ESA

ISRSE39 - OP127 MULTI-SENSOR APPROACHES TO MONITOR TERRESTRIAL CARBON AND ITS SPATIAL AND TEMPORAL VARIATION
Tansey, Kevin
University of Leicester

ISRSE39 - OP128 SCALING HIGH-INTEGRITY INVESTMENT IN NATURE: THE EMERGING ROLE OF EO-BASED MRV IN NATURE-BASED SOLUTIONS
Balton, Oliver
Earthly

27 April 2023, Thursday

09:00 - 10:30 **AGRICULTURE 5**
Chair: Haarpaintner, Jörg
NORCE Climate & Environment - Norwegian Research Centre
Hall B

ISRSE39 - OP129 DEEP LEARNING BASED CROP CLASSIFICATION WITH HIGH SPATIAL AND SPECTRAL RESOLUTION IMAGES
Bai, Yongqing
Aerospace Information Research Institute, Chinese Academy of Sciences

ISRSE39 - OP130 SUITABILITY ANALYSIS OF RICE CROPPING IN BURKINA FASO: ASSESSING THE GAP BETWEEN CURRENT AND POTENTIAL RICE CROPPING AREA
Meier, Jonas
German Aerospace Center (DLR)

ISRSE39 - OP131 SOYBEAN CROP YIELD PREDICTION BY INTEGRATION OF REMOTE SENSING AND WEATHER OBSERVATIONS
Mohite, Jayantrao
Tata Consultancy Services

ISRSE39 - OP132 DIFFERENTIATION OF VEGETATION TYPES USING BACKSCATTER COEFFICIENT TIME SERIES FOR C- AND L-BAND SYNTHETIC APERTURE RADAR DATA
Paluba, Daniel
EO4 Landscape Research Team, Charles University

ISRSE39 - OP133 CANOPY NITROGEN ESTIMATION ON COTTON PLANT USING SATELLITE IMAGERY
Chew, Boon Jin
ST Engineering Geo-Insights Pte Ltd

ISRSE39 - OP134 APPRAISAL OF CLIMATE CHANGE DISASTER AND FOOD SECURITY IN KHYBER PAKHTUNKHAW PAKISTAN USING GEOSPATIAL TECHNOLOGIES
Mahmood, Syed Amer
University of the Punjab

ISRSE39 - OP135 ASSESSMENT OF LAND SUITABILITY AND CAPABILITY BY INTEGRATING REMOTE SENSING AND GIS FOR AGRICULTURE IN POTWAR REGION PAKISTAN
Batool, Saira
University of the Punjab

27 April 2023, Thursday

09:00 - 10:30 **PUBLIC HEALTH**
Chair: Hill, Christopher
University of Southhampton
Hall C

ISRSE39 - OP136 MONITORING HEALTH RISK FACTORS FROM SATELLITE AND IOT DEVICES: ADVANTAGES AND LIMITATIONS
Pirotti, Francesco
University of Padova

ISRSE39 - OP137 FINE-GRAINED ESTIMATION OF CITY NIGHTTIME LIGHT CHANGES DURING COVID-19 SURGES WITH SDGSAT-1 GIU IMAGERY
Zheng Zhang
Aerospace Information Research Institute, Chinese Academy of Sciences

ISRSE39 - OP138 POWERING HEALTHCARE FACILITIES IN UNDERSERVED AREAS - HOW EARTH OBSERVATION AND GEOSPATIAL INTELLIGENCE LEVERAGE IMPACTFUL INVESTMENTS
Malin, Sophie Fischer
TFE Energy GmbH

ISRSE39 - OP139 A PROPOSED FRAMEWORK FOR SURVEILLANCE OF DENGUE DISEASE AND PREDICTION
Sharma, Vipasha
Indian Institute of Technology Roorkee

ISRSE39 - OP140 SPATIAL AND TEMPORAL ANALYSIS OF POLLUTANT GASES IN WESTERN BLACK SEA OF TÜRKİYE
Arıkan, Duygu
Konya Technical University

ISRSE39 - OP141 A COMPREHENSIVE ANALYSIS OF THE SPATIO-TEMPORAL VARIATION OF SATELLITE-BASED AEROSOL OPTICAL DEPTH IN MARMARA REGION OF TURKEY DURING 2000-2021
Osgouei, P. Ettehadi
Istanbul Technical University

ISRSE39 - OP142 USING SPATIAL DATAMINING IN COVID-19 PANDEMIC ANALYSIS. IMPLEMENTATION OF A SOLAP SOLUTION WITH A SLICE TOOL
Hadjer, Arbi
Centre des Techniques Spatiale

10:30 - 11:00 Coffee break

27 April 2023, Thursday

11:00 - 12:30 **FOREST, BIODIVERSITY AND ECOSYSTEMS 6** — Hall A
Chair: Latham, John
ICRSE, FAO

ISRSE39 - OP143 PROJECTING THE URBANIZATION EFFECT ON SOIL ORGANIC CARBON STOCKS IN POLAR AND STEPPE AREAS OF EUROPEAN RUSSIA BY REMOTE SENSING
Dvornikov, Yury
Peoples' Friendship University of Russia, Agrarian-Technological Institute

ISRSE39 - OP144 PREDICTION OF SOIL ORGANIC CARBON AT DIFFERENT SPATIAL RESOLUTIONS USING SENTINEL-2 REMOTE SENSING DATA ON A NATIONAL SCALE: A COMPARISON BETWEEN HYBRID APPROACHES AND INDIVIDUAL MODELS
Ji, Xiande
University of Groningen

ISRSE39 - OP145 EXPERIMENTAL ECOSYSTEM NATURAL CAPITAL ACCOUNTS IN THE REPUBLIC OF GUINEA
Morand, Jean-Abdoulaye
IGN FI

ISRSE39 - OP146 DETECTION OF ENVIRONMENTAL CHANGES IN THE SURROUNDINGS OF REFUGEE CAMPS IN TANZANIA AND BANGLADESH
Aleksandrowicz, Sebastian
Space Research Centre Of the Polish Academy of Sciences

ISRSE39 - OP147 UNVEILING THE IMPACT OF TRADITIONAL LAND PRACTICES ON NATURAL VEGETATION USING LARGE-SCALE EXCLOSURES: NATIONAL BORDERS AND MILITARY BASES
Meroz, Ariel
The Hebrew University of Jerusalem

ISRSE39 - OP148 TREE SPECIES CLASSIFICATION USING AERIAL IMAGERY AND DEEP LEARNING
Bayrak, Onur Can
Yıldız Technical University

27 April 2023, Thursday

11:00 - 12:30 **CURRENT AND FUTURE EO MISSIONS 2**
Chair: Osmanoğlu, Batuhan
NASA–GSFC

Hall B

ISRSE39 - OP149 NEW GENERATION OF AIRBORNE REMOTE SENSING EQUIPPED BY THE INTEGRATED MULTIPLE SENSORS IN CHINA: PRESENT AND FUTURE
Pan, Jie
Aerospace Information Research Institute, Chinese Academy of Sciences

ISRSE39 - OP150 GAOFEN 16 METER ANALYSIS READY DATA TO SUSTAINABLE DEVELOPMENT GOALS–PRELIMINARY RESULTS
Huo, Lianzhi
Aerospace Information Research Institute, Chinese Academy of Sciences

ISRSE39 - OP151 A PORTABLE GNSS-DENIED LOCALIZATION AND MAPPING LIDAR SYSTEM FOR EMERGENCY RESPONSES - DESIGN TO OPERATION INSIGHTS
Shaker, Ahmed
Toronto Metropolitan University

ISRSE39 - OP152 THE VALUABLE HYPERSPECTRAL STANDARD DATASETS ACQUIRED OVER CHINA BY A POWERFUL AIRBORNE HYPERSPECTRAL IMAGER IN THE PAST TWO YEARS
Zhang, Hao Zhang
Aerospace Information Research Institute, Chinese Academy of Sciences

ISRSE39 - OP153 DESIGN OF A SPACE-BORNE HYPERSPECTRAL IMAGER FOR MICRO-SATELLITES
Öztürk, Zeynep Nilüfer
Tübitak Space Technologies Research Institute

ISRSE39 - OP154 POINT-WISE CLASSIFICATION OF HIGH-DENSITY UAV-LIDAR DATA USING GRADIENT BOOSTING MACHINES
Sevgen, E
Hacettepe University

27 April 2023, Thursday

11:00 - 12:30 **REMOTE SENSING OF SNOW COVER IN MOUNTAINOUS ENVIRONMENTS**
Chairs: Rößler, Sebastian
DLR / Callegari, Mattia, EURAC
Hall C

ISRSE39 - OP155 IMPACT OF CLIMATE CHANGE ON THE SNOW COVER OF THE EUROPEAN ALPS BASED ON LONG-TERM LANDSAT TIME SERIES
Rößler, Sebastian
German Aerospace Center (DLR)

ISRSE39 - OP156 SNOWMELT, RUNOFF AND HYDROCLIMATE EXTREMES IN NORTHERN SWEDEN
Brown, Ian
Stockholm University

ISRSE39 - OP157 CHALLENGES AND SOLUTIONS IN MAPPING SNOW PARAMETERS OVER MOUNTAINOUS AREAS
Akyurek, Zuhal
Middle East Technical University

ISRSE39 - OP158 MULTI-SOURCE SNOW COVER AS PROXY FOR GLACIER MASS BALANCE ESTIMATION
Callegari, Mattia
EURAC

ISRSE39 - OP159 THERMAL INERTIA AS A NEW TOOL FOR INFERRING SNOWPACK EVOLUTION AND SNOW DENSITY
Colombo, Roberto
University of Milano

ISRSE39 - OP160 A LOW-COST STEREOSCOPIC SYSTEM FOR CONTINUOUS MONITORING OF AN ALPINE GLACIER
Galbiati, Marta
Politecnico di Milano - Bicocca

12:30 - 14:00 Lunch

27 April 2023, Thursday

14:00 - 15:30 **FOREST, BIODIVERSITY AND ECOSYSTEMS 7 - FOREST FIRE** — Hall A

Chair: Klein, Doris
DLR

ISRSE39 - OP161 MAPPING THE HUGE AUSTRALIAN WILDFIRES IN 2019 USING SENTINEL-2 AND MACHINE LEARNING APPROACHES
Tansey, Kevin
University of Leicester

ISRSE39 - OP162 ESTIMATION OF LIVE FUEL MOISTURE CONTENT USING SEVIRI-MSG DATA FOR PORTUGAL
Gouveia, Célia M.
University of Lisbon

ISRSE39 - OP163 OBSERVATIONS OF WILDFIRE BEHAVIOR BASED ON REPETITIVE AIRBORNE THERMAL INFRARED SENSING
Stow, Douglas
San Diego State University

ISRSE39 - OP164 FOREST FIRE SUSCEPTIBILITY ASSESSMENT WITH MACHINE LEARNING METHODS IN NORTH-EAST TÜRKİYE
Kocaman, Sultan
Hacettepe University

ISRSE39 - OP165 GEOHOTSPOT: BMKG PRODUCT FOR FOREST AND LAND FIRES DETECTION USING HIMAWARI-8/9 SATELLITE
Sepriando, Alpon
Indonesian Agency for Meteorological, Climatological and Geophysics (BMKG)

ISRSE39 - OP166 CYCLE-GAN BASED FEATURE TRANSLATION FOR OPTICAL-SAR DATA IN BURN AREA MAPPING
Çolak, Emre
Istanbul Technical University

27 April 2023, Thursday

14:00 - 15:30 **MARINE AND COASTAL ENVIRONMENT**
Chair: Sunar, Filiz
Istanbul Technical University

Hall B

ISRSE39 - OP167 NEARSHORE BATHYMETRY EVALUATION WITH SENTINEL-2 IMAGES USING DEEP LEARNING FOR PUDUCHERRY, INDIA
Kumar J, Ram
National Institute of Ocean Technology, Chennai, India

ISRSE39 - OP168 THE SPATIAL DISTRIBUTION OF OPTICAL ACTIVE COMPONENTS IN THE GULF OF IZMIT USING BIVARIATE AND MULTIVARIATE REGRESSION ANALYSIS
Sunar, Filiz
Istanbul Technical University

ISRSE39 - OP169 TOWARDS WATER SURFACE MONITORING USING SENTINEL-1 AND SENTINEL-2
Landuyt, Lisa
VITO

ISRSE39 - OP170 WATER RESERVOIRS MONITORING THROUGH GOOGLE EARTH ENGINE: APPLICATION TO SENTINEL AND LANDSAT IMAGERY
Bocchino, Filippo
Sapienza University of Rome

ISRSE39 - OP171 ADAPTATION OF DEEPLAB V3+ FOR DAMAGE DETECTION ON PORT INFRASTRUCTURE IMAGERY
Scherff, Marvin
Leibniz University Hannover

ISRSE39 - OP172 ANALYZING THE RETRIEVAL ACCURACY OF OPTICAL WATER COMPONENTS FROM SATELLITE DATA UNDER VARYING IMAGE RESOLUTIONS
Yağmur, Nur
Istanbul Technical University

27 April 2023, Thursday

14:00 - 15:30 **SUSTAINABLE CITIES 2**
Chair: Pirotti, Francesco
University of Padova
Hall C

ISRSE39 - OP173 MODELLING AND VISUALIZING URBAN GROWTH TRAJECTORY IN ABU DHABI USING TIME SERIES SATELLITE IMAGERY
Issa, Salem
United Arab Emirates University

ISRSE39 - OP174 GEOSPATIAL SURROGATE MODELLING FOR OPTIMIZED GREEN COVER PLANNING TO MITIGATE URBAN HEATING AS A DEVELOPMENT GUIDELINE - A CASE STUDY IN MUMBAI, INDIA
Vidhya, R.
Anna University

ISRSE39 - OP175 CHARACTERIZING THE SLUM ENVIRONMENT FROM SPACE FOR ACHIEVING SDGs
Shekhar, Sulochana
Central University of Tamil Nadu

ISRSE39 - OP176 CONTRIBUTION OF URBAN CEMETERIES TO ECOSYSTEM SERVICES: EVIDENCE FROM TOURISTIC ANTALYA CITY OF TURKEY
Eyileten, Buket
Akdeniz University

ISRSE39 - OP177 SPATIO-TEMPORAL ANALYSIS OF THE EFFECTS OF URBAN GROWTH ON URBAN HEAT ISLAND: CASE OF KONYA, TÜRKIYE
Akdeniz, H.B.
Konya Technical University

ISRSE39 - OP178 OPTIMIZED ECOLOGICAL NETWORK APPROACH OF HIGHLY URBANIZED CITIES: THE CASE OF ADANA CITY
Kurt, Gülnihal
Çukurova Technical University

27 April 2023, Thursday

15:30 - 17:00 **DISCUSSION FORUM: CHALLENGES IN EARTH OBSERVATION TO TACKLE THE SDGS** — Hall A

Chair: Altan, Orhan
ISPRS

Halouva, Lena
ISPRS

Polidori, Laurent
ISPRS

Anonni, Alessandro
ISDE

Chandra, Madhu
TU Chemnitz, URSI

Schreier, Gunter
DLR

Closing Ceremony

POSTER PRESENTATIONS

25 April 2023, Tuesday

PP001 VIABILITY OF SNOW PACK AND MICROWAVE SCATTERING MODEL COUPLING FOR SAR-BASED SNOW PROPERTIES
Hovemyr, Mikael
Stockholm University

PP002 OPTIMISATION OF REGIONAL-SCALE WOODY VEGETATION MAPPING IN SAVANNAHS
Symeonakis, Elias
Manchester Metropolitan University

PP003 DROUGHT REMOTE SENSING AND APPLICATION IN MAINLAND SOUTHEAST ASIA
V. Ha, Tuyen
University of Wuerzburg

PP004 UTILIZING SPARSE LABELS AND SEMI-SUPERVISED LEARNING FOR WEED DETECTION
Thomas, Leon-Friedrich
University of Helsinki

PP005 MAPPING CONFLICT CHANGE IN UKRAINE USING PLANET DATA AND MACHINE LEARNING APPROACHES
Tansey, Kevin
University of Leicester

PP006 MAPPING CONFLICT CHANGE IN UKRAINE USING PLANET DATA AND MACHINE LEARNING APPROACHES
Hu, Zhiyong
University of West Florida

PP007 ASSESSING THE ACCURACY OF BUILDING FOOTPRINT AND 3 DIMENSION SETTLEMENT LAYER DATASETS IN LAGOS MEGACITY
Adewole, Wole Ademola
University of Southampton

PP008 TIME SERIES CHLOROPHYLL ESTIMATION ANALYSIS USING LANDSAT DATA FROM 1990 TO 2000 IN THE MONTEBELLO, MÉXICO LAKE SYSTEM
Bonifaz, Roberto
Instituto de Geofísica, Universidad Nacional Autónoma de Méxifo

PP009 IMMEDIATE REMOTE SENDING: TO PERCEIVE AND RECOGNIZE DISASTER ON ORBIT IMMEDIATELY
Tang, Ping
Aerospace Information Research Institute

POSTER PRESENTATIONS

25 April 2023, Tuesday

PP010 A COMPARATIVE ANALYSIS OF HEIGHT MEASUREMENT IN FOREST THROUGH LIDAR DATA
Park, Jeongmook
National Institute of Forest Science in Republic of Korea

PP011 DETECTING OIL SPILLS
Dalati, Moutaz
Azurite

PP012 RESEARCH ON NATURAL RESOURCES SPATIO-TEMPORAL BIG DATA ANALYSIS PLATFORM FOR HIGH PERFORMANCE COMPUTING
Gao, Yin
National Geomatics Center of China

PP013 CHALLENGES OF ARTIFICIAL INTELLIGENCE APPLICATION IN DISASTER RISK MANAGEMENT
Velev, Dimiter
University of National and World Economy

PP014 REMOTE SENSING FOR FLOOD INUNDATION MAPPING USING VARIOUS METHODS WITH SENTINEL-1 AND SENTINEL-2
Stoyanova, Elia Dimova
University of Architecture

PP015 AN APPROACH TO ANALYSIS OF THE IMPACT OF NATURAL DISASTERS ON THE ECONOMIC EFFICIENCY AND PROFITABILITY OF BUSINESS
Zlateva, Plamena
University of National and World Economy

POSTER PRESENTATIONS

26 April 2023, Wednesday

PP016 RESERVOIR CLEARING STUDY USING GEO-SPATIAL TECHNIQUES (A CASE STUDY OF KAROT HYDROPOWER PROJECT)
Mahmood, Syed Amer
University of the Punjab, Lahore Pakistan

PP017 LAND COVER DYNAMIC CHANGE MODES ANALYSIS BASED ON EMPIRICAL MODE DECOMPOSITION
Tang, Liang
Hainan Tropical Ocean University

PP018 CHARACTERIZING MOVEMENT PATTERNS OF NOMADIC PASTORALISTS AND THEIR EXPOSURE TO RIFT VALLEY FEVER IN KENYA
Mosomtai, Gladys
ESA, Directorate of EO Programmes

PP019 THE IMPORTANCE OF EARTH OBSERVATION FOR MONITORING CULTURAL HERITAGE SITES AFFECTED BY FIRE EVENTS: THE CASE STUDY OF ARAKAPAS, CYPRUS USING SENTINEL 2 DATA
Schreier, Gunter
German Aero Space Center (DLR)

PP020 THE ERATOSTHENES CENTRE OF EXCELLENCE
Schreier, Gunter
German Aero Space Center (DLR)

PP021 UNDERSTANDING THE BUILT-UP EVOLUTION AND COMPLEXITY OF FAST GROWING BUILT-UP AGGLOMERATION USING CENTROID SHIFT MODEL AND FRACTAL DIMENSION
K, Ashritha
Indian Institute of Technology Bombay

PP022 CEREAL CROP IDENTIFICATION USING SENTINEL2 TIME SERIES
Mansour, Djamal
Algerian Space Agency

PP023 SIMPLE AEROSOL RETRIEVALS WITH SPECTRORADIOMETER BEAM DIRECT GROUND MEASUREMENTS
Russo, Paola
University of the Republic of Uruguay

PP024 GEOHOTSPOT: BMKG PRODUCT FOR FOREST AND LAND FIRES DETECTION USING HIMAWARI-8/9 SATELLITE
Sepriando, Alpon
Meteorology, Climatology, and Geophysical Agency (BMKG)

POSTER PRESENTATIONS

26 April 2023, Wednesday

PP025 ASSESSING THE IMPACT OF BEET WEBWORM MOTHS ON SUNFLOWER FIELDS USING MULTITEMPORAL SENTINEL-2 SATELLITE IMAGERY AND VEGETATION INDICES
Kara, Sedanur
Istanbul Technical University

PP026 ANALYSIS OF URBAN LAND USE CHANGE USING REMOTE SENSING AND DIFFERENT CHANGE DETECTION TECHNIQUES: THE CASE OF ANKARA PROVINCE
Gürbüz, Merve
Çukurova University

PP027 DETECTION OF DISCOMFORT INDEX WITH REMOTE SENSING TECHNOLOGY: THE CASE OF ANTALYA PROVINCE
Şahingöz, Merve
Çukurova University

PP028 DETERMINATION OF LANDSCAPE TYPOLOGY WITH REMOTE SENSING TECHNIQUES AND CORRELATION WITH DIFFERENT BIOCLIMATIC CONDITIONS: THE CASE OF BUYUK MENDERES BASIN
Külahlıoğlu, Müge
Çukurova University

PP029 MODELING LAND DEGRADATION USING REMOTE SENSING DATA: THE CASE OF SEYHAN BASIN
Akın, Tuğba
Çukurova University

PP030 BISTATIC SCATTERING CHARACTERISTICS OF A WIND PARK TURBINE DERIVED FROM AN UAV-MOUNTED RECEIVER RECORDING C-BAND WEATHER RADAR SIGNALS
Çolak, Emre
Chemnitz University of Technology

PP031 SITE SELECTION FOR ASTRONOMY IN ANTARCTICA USING SATELLITE DATA
Kurt, Zuhal
Çukurova University

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