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The Coherence Analysis for Detecting the Subsidence at Permanent Frozen Area in Qinhai-Tibetan Plateau
Z. Li, C. Xie & X. Li

The Experience of the Cartographic Institute of Catalonia (ICC) on Continuous DInSAR Monitoring of Large Areas
O. Mora, R. Arbiol & V. Palà

3C1 – (A)ATSR: Performance, New Algorithms and Products

Chairs: I. Barton & C. Donlon

Global Validation of the (A)ATSR Meteo Product Sea-Surface Temperature at the Met Office
K. Fennig, T.A. Blackmore, A.G. O'Carroll & R.W. Saunders

Validation of AATSR SSTs with SISTeR in the Skagerrak
T.J. Nightingale

The Accuracy of SST Retrievals from AATSR: Synthesis and Integration of Comparisons to Buoys and Radiometers

C. Corlett and the AATSR SST Team

Three-Way Error Analysis between AATSR, AMSR-E and In Situ Sea Surface Temperature Observations

A. O'Carroll, J. Eyre & R. Saunders

Saharan Dust Corrections for the Envisat AATSR SST Product

X. Kong, E. Noyes, G. Corlett et al.

3C2 – (A)ATSR: Performance, New Algorithms and Products, cont.

Chairs: J.L. Casanova & J. Moreno

(A)ATSR Multimission Archive – Online Access to 15 Years of High Quality Data in a Common Format

M. Pritchard & N. Houghton

Validation of the AATSR Land Surface Temperature Product over Inland Waters and Vegetated Surfaces

C. Coll, S.J. Hook & J.M. Galve

AATSR Derived Land Surface Temperature over a Heterogeneous Region

J.A. Sobrino, G. Sòria, J.C. Jiménez-Muñoz et al.

Future Development of the Operational AATSR LST Product

E. Noyes, G. Corlett, J. Remedios et al.

Fire Disturbance: The Twelve Years Time Series of the ATSR World Fire Atlas

O. Arino, S. Plummer & S. Casadio

3C3 – Atmospheric Properties from Optical/Infrared

Chairs: C. Mutlow & R. Santer

Retrieval of Particulate Matter Concentration (PM10) from MERIS Observation and Validation over Germany

W. von Hoyningen-Huene, G. Rohen, T. Dinter et al.

AATSR Derived Aerosol Properties over Land

G. de Leeuw, R. Schoemaker, L. Curier et al.

3C4 – Atmospheric Properties from Optical/Infrared, cont.

Chairs: J.L. Casanova & C. Mutlow

Cloud Screening and Multitemporal Unmixing of MERIS FR Data

L. Gómez-Chova, R. Zurita-Milla, G. Camps-Valls et al.

The Aerosol Optical Thickness Mapping from AATSR and MODIS Data over Land

Y. Xue, J. Guang, J. Guo & L. Bai

DUE GlobAEROSOL: Validation of Global Aerosol Data from ATSR-2, AATSR and SEVIRI

G. Thomas, C. Poulsen, R. Siddans et al.

3D1 – Agriculture and Vegetation

Chairs: N. Gobron & F. Holecz

Estimation of Rice Growth Parameter and Crop Phenology with Conjunctive Use of RADARSAT and Envisat

I. Choudhury, M Chakraborty & J.S. Parihar

Fusion of Optical and SAR Satellite Data to Improve Land Cover Mapping in Agricultural Areas

T. Riedel, C. Thiel & C. Schmullius

Mapping Annual Crops with MERIS on Large Areas in Europe in the Frame of GMES Projects, for Serving Environmental Directives and Agricultural Policy

V. Lefèvre, P. Cayrol, H. Poilvé & P. Duthil

Using JRC-FAPAR Products to Characterize Growing Seasons

M.M. Verstraete, N. Gobron, O. Aussedat et al.

3D2 – Agriculture and Vegetation, cont.

Chairs: P. Curran & S. Quegan

Relevance of Global Remote-Sensing FAPAR Products to Carbon Flux Estimates

N. Gobron, W. Knorr, O. Aussedat et al.

A Method for the Detection of Solar-Induced Vegetation Fluorescence from MERIS FR Data

L. Guanter, L. Alonso, L. Gómez-Chova et al.

Ecosystem Production Modelling in the Iberian Peninsula Comparative Analysis Between MODIS and MERIS Datasets

J. Seixas, N. Carvalhais, C. Nunes & A. Benali

Using MERIS for Mountain Vegetation Mapping and Monitoring in Sweden

H. Reese, Heather, M. Nilsson & H. Olsson

3D3 – Land-Use, Land-Use Change and Forestry

Chairs: J.P. Rudant & B. Pinty

Modelling Methane Emissions from Siberian High Arctic Environments - A Case Study for the Lena River Delta Region

S. Kirschke & K. Guenther.

Comparison of the Asar Alternative Polarisation Mode to Full Polarimetric Acquisition for Land Use Estimation over Tropical Regions

C. Lardeux, P.-L. Frison, C. Tison et al.

Random Forests for Classifying Multi-temporal SAR Data

B. Waske, V. Heinzl, M. Braun & G. Menz

3D4 – Land-Use, Land-Use Change and Forestry, cont.

Chairs: C. Schmullius & J. Hajnsek

Leaf Area Index Estimation of Boreal and Sub-Arctic Forest Using Envisat/ASAR Data of Various Swaths

T. Manninen, P. Stenberg, M. Rautiainen & P. Voipio

Comparison of Forest Biomass Estimates in Siberia Using Spaceborne SAR, Inventory-Based Information and the LPJ Dynamic Global Vegetation Model

M. Santoro, C. Beer, A. Shvidenko et al.

Boreal Forest Stem Volume Estimation from Multitemporal C-Band InSAR Observations

J. Askne & M. Santoro

Analysis of ASAR APP Time Series over Siberia for Optimising Forest Cover Mapping - A GSE Forest Monitoring Study

C. Thiel, C. Thiel, T. Riedel & C. Schmullius

Detection of Forest Changes over French Guiana Using ERS-1 and Asar Imagery

Y. Rauste, T. Häme, H. Ahola et al.

3E2 – Geoid, Ocean Circulation and Coastal Zones

Chairs: D. Griffin & P. Knudsen

An Application of the Radon Transform to Study Planetary Waves in the Indian Ocean

S. de la Rosa, P. Cipollini & H.M. Snaith

Meso-Scale Oceanography of the Australian Region from Altimeters, Radiometers and Drifting Buoys

D. Griffin

3E3 – Geoid, Ocean Circulation and Coastal Zones, cont.

Chairs: P. Cipollini & P. Challenor

On Wet Tropospheric Correction for Altimetry in Coastal Regions

C. Desportes, E. Obligis & L. Eymard

Hurricane Intensity Forecasting at NOAA Using Envisat Altimetry

J. Lillibridge, N. Shay, M. DeMaria et al.

Retrieving Extreme Low Pressure with Altimetry

L. Carrere, F. Mertz, J. Dorandeu et al.

Envisat - Taking the Measure of North Atlantic Storms

G.D. Quartly, C.A. Poulsen & T.H. Guymer

3E4 – Wind and Wave/Sea State Modelling

Chairs: P. Queffelec & P. Janssen

A Comparison of Two Altimeter Wave Period Algorithms Using Data from a N.E. Pacific Buoy

D.J.T. Carter

Ku-Band Radar Altimeter Surface Wind Speed Algorithm

S. Abdalla

Investigation of Large Scale and Regional Features of Wave Heights from Altimeter Measurements

P. Queffelec & D. Croizé-Fillon

3F1 – Radar Performances, New Products and Algorithms

Chairs: A. Monti-Guarnieri & D. Small

Review of ASAR Instrument Performance and Product Quality Evolution after 5 Years of Operation

B. Rosich, P.J. Meadows, A. Monti-Guarnieri et al.

ERS-2 SAR Performance and Product Evolution

P.J. Meadows, B. Rosich, A. Pilgrim & M. Tranfaglia

Global Automatic Orthorectification of ASAR Products in ESRIN G-POD

R. Cossu, F. Brito, O. Collin et al.

Optimizing Azimuth Antenna Steering: Beyond TOPSAR

D. D'Aria, D. Giudici, A. Monti Guarnieri & F. Rocca

3F2 – Radar Performances, New Products and Algorithms, cont.

Chairs: D. Massonnet & F. Rocca

ALOS PALSAR Verification Processor

P. Pasquali, A. Monti Guarnieri, D. D'Aria et al.

Global Re-Deployment of the Envisat ASAR Transponders for Around Orbit Calibration

C. Goetz, H. Jackson, B. Rosich et al.

Automatic Image-to-Image Registration of Near Real-Time SAR Images

B. Wessel, M. Huber & A. Roth

Geometric and Radiometric Correction of ESA SAR Products

D. Small, A. Schubert, B. Rosich & E. Meier

3F3 – ASAR Wide Swath: Algorithms & Results

Chairs: A. Monti-Guarnieri & M. Zink

ASAR WSS Product Verification Using Derived Image Mosaics

A. Schubert, D. Small, B. Rosich & E. Meier

Using Anisotropic Diffusion for Coherence Estimation

F. Aspert, A. Cantone, J.-P. Thiran & P. Pasquali

Monitoring Surface Deformation in Active Margin Settings with the Scansar Technique Using Wide Swath Envisat Data.

J. Anderssohn & H. Kaufmann

3F4 – EOMD

Chair: S. Coulson

Monitoring Sustainable Development in the Oil Sands Region of Alberta, Canada, Using Spot-5 and Envisat Asar and Meris Imagery

A. Dean, A. Mangin, S. Hughes, O. Tsui, A. Syed, D. Dow, W. Gibbons, T. Boivin,

EO-HYDRO: An Earth Observation Service for Hydropower Plant Management

L. Tampellini, G. Ober, F.D. Vescovi et al.

Monitoring Mining Induced Ground-Movements Using SAR Interferometric Techniques
U. Wegmüller, T. Strozzi, N. Benecke et al.

Near-Surface Characterization from Remote Sensing Data
A. Laake & M. Insley

3G1 – Research with the Ozone Monitoring Instrument

Chairs: P.F. Levelt & E. Hilsenrath

Validation Results from the Joint ESA KNMI NIVR Calibration and Validation
Announcement of Opportunity for the Ozone Monitoring Instrument
M. Kroon, E.J. Brinksma, D. Balis et al.

Measurements of HCHO, CHOCHO and BrO from the Ozone Monitoring Instrument on EOS Aura
T.P. Kurosu, K. Chance & R. Volkamer

Very Fast Delivery Products of OMI
S. Hassinen, J. Tamminen, A. Tanskanen et al.

3G2 – Research with the Ozone Monitoring Instrument, cont.

Chairs: E. Hilsenrath & P.F. Levelt

SO₂ Data from the Ozone Monitoring Instrument
N.A. Krotkov, K. Yang, A. Krueger et al.

Measuring Aerosol Absorption from OMI Near UV Observations
O. Torres, P. Bhartia & C. Ahn

OMI Observations of the JULY 2006 Smog Episodes in Europe
J.P. Veefkind, P.F. Levelt, H.J. Eskes ET AL.

3G3 – Detection and Monitoring of Oil Spills and Oil Slicks

Chairs: B. Holt & J. Johannessen

Operationalisation of a Multi-User Concept for Satellite Based Oil Spill and Ship Detection Services
L. Steinbakk, J.P. Pedersen & T. Bauna

Complex Monitoring of Oil Pollution in the Baltic, Black and Caspian Seas
A.G. Kostianoy, O. Yu. Lavrova, M.I. Mityagina et al.

Benefits of Operational Oceanography for Oil Spill Management
V. Toumazou, J.-Y. Le Bras, F. Jacq et al.

The Use of Satellite Imagery to Monitor Oil Pollution in Lebanon
O. Muellenhoff, K. Topouzelis, D. Tarchi et al.

A GIS Approach to Mapping of Oil Spills in the Marine Environment
A. Yu Ivanov & V.V. Zatyagalova

3G4 – Detection and Monitoring of Oil Spills and Oil Slicks, cont.

Chairs: M.X He & B. Holt

Remote Sensing of Slick as Indicators for Marine Processes in the Coastal Zone
M. Gade, S. Ermakov, O. Lavrova et al.

SAR Monitoring of Oil Spills and Natural Slicks in the Black Sea
V.V. Malinovsky, S. Sandven & A.E. Korinenko

Classifying Oil Spills and Look-Alikes in Envisat ASAR Images
C. Brekke, A. Solberg & G. Storvik

Dual-Polarized SAR Data for Oil Spill Detection
F. Nunziata, A. Gambardella & M. Migliaccio

A Generalised Algorithm for Oil Spill Detection on ERS and Envisat SAR Imagery
F. Nirchio, C. Marzo, P. Trivero et al.

Poster Papers

3P1 – A(A)TSR: Performance, New Algorithms and Products

(A)RC Radiative Transfer and SST Retrieval
O. Embury & C. Merchant

(A)ATSR Re-Analysis for Climate - Cloud Clearing Methodology
C. Old & C. Merchant

A 12-Year Record of Global Aerosol Properties from ATSR-2 and AATSR
W. Grey, P. North, S. Los et al.

An Accuracy Assessment of AATSR LST Data Using Empirical and Theoretical Methods
E. Noyes, G. Corlett, J. Remedios ET AL.

VoMIR: Over 300 Volcanoes Monitored in Near Real-Time by AATSR
O. Colin, M. Rubio, P. Landart & E. Mathot

3P2 – Agriculture and Vegetation

Relationship Between the MERIS Vegetation Indices and Crop Yield for the State of South Dakota, USA
J. Dash & P.J. Curran

Monitoring Agricultural Activities Using ASAR Envisat Data
Tavakkoli Sabour, Seyed Mohammad; Lohmann, Peter; Soergel, Uwe

Supervised Wishart Classifier for Rice Mapping Using Multi-Temporal Envisat ASAR APS Data
E. Chen, Z. Y. Li, ZB. X. Tan et al.

3P3 – ASAR Wide Swath: Algorithms and Results

ASAR Wide Swath Mode Interferometry: Optimisation of the Scan Pattern Synchronisation
B. Rosich, A. Monti Guarnieri, D. D'Aria et al.

3P4 – Atmosphere: Algorithms Developments and Methods

Data Processing and Quality Control Activities in Support to the GOMOS Mission
F. Niro, D. Del Cavallo, G. Barrot & T. Fehr

The FRESCO+ Cloud Algorithm for GOME and SCIAMACHY: Improvement and Validation
P. Wang, P. Stammes & R. van der A

Assimilation of MIPAS Limb Radiances at ECMWF Using 1D and 2D Radiative Transfer Models
N. Bormann, S.B. Healy, M. Hamrud & J.N. Thépaut

Improved Spectroscopic Data for Nitric Acid and First Observation of Atmospheric H¹⁵NO₃ in MIPAS Spectra: Retrieval Study for the H¹⁵NO₃ / H¹⁴NO₃ Isotopic Ratio.
G. Brizzi, M. Carlotti, B.M. Dinelli et al.

Results of a New Straylight Correction for SCIAMACHY
S. Slijkhuis, R. Snel, B. Aberle et al.

Overview of MIPAS Operational Products
P. Raspollini, G. Aubertin, S. Bartha et al.

Data Processing and Quality Control Activities in Support to the SCIAMACHY Mission
A. Dehn, F. Niro, A. von Bargaen & T. Fehr

Combined Ozone Retrieval Using the Michelson Interferometer for Passive Atmospheric Sounding (MIPAS) and the Tropospheric Emission Spectrometer (TES)
C. Waymark, A. Dudhia, J. Barnett et al.

New Ozone Profile Climatology: Static and Dynamic Approach
J. Kaptur & A. Kaifel

Future Data Analysis Techniques for Atmospheric Remote Sensing Measurements:
First Steps towards Grid Computing
L. Hoffmann, M. Kaufmann, C. Lehmann et al.

Neural Network Algorithms for the Retrieval of Ozone Concentration Profiles from Envisat-SCIAMACHY Measurements
P. Sellitto, A. Burini, F. Del Frate & S. Casadio

Design of Neural Networks Algorithms for the Retrieval of Tropospheric Ozone from Satellite Data
F. Del Frate, P. Sellitto & D. Solimini

Assessment of GOMOS Retrieval Algorithms and Quality of Level 2 Products
M. Guirlet, G. Barrot, O. Fanton d'Andon et al.

New IG2 Seasonal Climatologies for MIPAS
J.J. Remedios, R.J. Leigh, H. Sembhi & A.M. Waterfall

Current Retrieval and Inter-Comparisons Results of SCIAMACHY Nighttime NO_x
L.K. Amekudzi, K. Bramstedt, A. Bracher et al.

Joint Retrieval of CO Vibrational Temperature from MIPAS-Envisat
J. Walker & A. Dudhia

Improved SCIAMACHY WFDOAS Total Ozone Retrieval: Steps Towards Homogenising Long-Term Total Ozone Datasets from GOME, SCIAMACHY, and GOME2
M. Weber, L. N. Lamsal & J.P. Burrows

Operational SCIAMACHY Level 1B-2 Off-Line Processor: Total Vertical Columns for O₃ and NO₂ and Cloud Products
A. von Bargaen, T. Schröder, K. Kretschel et al.

DRACULA – Advanced Retrieval Tool for Atmospheric Remote Sensing
A. Doicu, F. Schreier, S. Hilgers et al.

Near-Real-Time Estimation of Spectral Surface Albedo – Algorithm Development for GOME-1/ERS-2 and GOME-2/METOP –
B. Pflug, D. Loyola, P. Valks & W. Zimmer

3P5 – Atmospheric Properties from Optical/Infrared

Remote Sensing of Cloud-Aerosol Radiative Effects from Satellite Data: A Case Study over the South of Portugal
D. Santos, M.J. Costa, D. Bortoli & A.M. Silva

MODIS Aerosol Optical Properties over North Italy for Estimating Surface-Level PM_{2.5}
W. Di Nicolantonio, A. Cacciari, E. Bolzacchin et al.

Aerosol Retrievals over Land and Sea Surfaces Using Combined Satellite Measurements from MSG-SEVIRI and Envisat-AATSR
Y.S. Bennouna & G. de Leeuw

GOSAT Calibration Plan
K. Shiomi, S. Kawakami, T. Kina et al.

Contrail Cirrus Coverage and Radiative Forcing from Satellite Data
H. Mannstein, W. Krebs, S. Pinnock & F. Jelinek

A Dual-View Optimal Estimation Scheme for Aerosol Retrieval Using AATSR Data
A.M. Sayer, R.G. Grainger, C.T. Mutlow & G.E. Thomas

3P6 – Geoid, Ocean Circulation and Coastal Zones

Estimation of the Ocean Tide Effect on the Altimetric Measurements
A. Rami, M. Khelif, S. Kahlouche & T. Dennoukri

An Assessment of Satellite Altimetry in Proximity of the Mediterranean Coastline
L. Fenoglio-Marc, S. Vignudelli, A. Humbert et al.

Residual Tide Analysis in Shallow Water – Contributions of Envisat and ERS Altimetry
R. Savcenko & W. Bosch

X-Track, a New Processing Tool for Altimetry in Coastal Oceans
L. Roblou, F. Lyard, M. Le Henaff & C. Maraldi

Making Radar Altimetry More Usable and Web-Interoperable in the Coastal Ocean
S. Vignudelli, P. Cipollini, H.M. Snaith et al.

3P7 – InSAR Applications: Landslides

Alpine Landslide Survey and Monitoring with Interferometric SAR Techniques in the Frame of the EC Framework 6 GMES Project ASSIST
A. Wiesmann, U. Wegmuller, T. Strozzi et al.

Typical ERS InSAR Signature of Slope Movements in a Periglacial Mountain Environment (Swiss Alps)
R. Delaloye, C. Lambiel, R. Lugon et al.

A Comparative Analysis of the DInSAR Results Achieved by the SBAS and SPINUA Techniques: The Maratea Valley Case Study, Italy
J. Wasowski, D. Casarano, C. Lamanna et al.

3P8 – InSAR Applications: Subsidence

Application of InSAR to the Study of Ground Deformation in the Mexicali Valley, B.C., Mexico
O. Sarychikhina, R. Mellors & E. Glowacka

3P9 – Land-use, Land-use Change and Forestry

Ecosystem Monitoring Development in the European Russian Tundra Based on SAR/ERS Data
V.V. Elsakov & V.M. Shanov

Separability Analysis of Land Cover Classes at Regional Scale: A Comparative Study of MERIS and MODIS Data
H. Carrão, P. Sarmiento, A. Araújo & M. Caetano

Joint Use of Envisat ASAR and Radarsat-1 Data in Land-Cover Classification Using Multitemporal SAR Data
N.-W. Park, K.H. Chi, Y.S. Kim et al.

Monitoring of Forest Damage Caused by Gipsy Moth in Hungary Using Envisat MERIS Data (2005-2006)
G. Nádor, I. László, Zs. Suba & G. Csornai

The Irkutsk Regional Information System for Environmental Protection (IRIS)
K. Frotscher, C. Thiel & C. Schmuilius

SEVESEO: EO-Based Services in Support to Industrial and Technological Risk Management
K. Meuleman, F. Lefebvre, E. Gontier et al.

Forest Ecosystem Dynamics Using SPOT and MODIS Satellite Images
S. Stagakis, N. Markos, E. Levizou & A. Kyparissis

Spatial Unmixing of MERIS Data for Monitoring Vegetation Dynamics
R. Zurita-Milla, G. Kaiser, J.P.G.W. Clevers et al.

Spatial Aggregation of Low Resolution Satellite Data for the Monitoring of Vegetation Response to Climatic Stresses: Analysis of the Spatial Heterogeneity of Aggregated Entities Spatial Aggregation Level is the Most Appropriate for Global Vegetation Monitoring?
S. Horion, H. Eerens, B. Tychon & Y. Cornet

3P10 – Radar Performances, New Products and Algorithms

Assessment of the ASAR Sensor Radiometric Quality in Comparison to ERS-2 and RADARSAT-1 SAR Data
N. Baghdadi, M. Zribi & A. Delorme

The ERS-2 Scatterometer: Instrument and Data Performances Assessment Since the Beginning of the Mission
R. Crapolichio, G. De Chiara, A. Paciucci & P. Lecomte

Analysis of Man-Made Target Detection in SAR Imagery
C. Wang & X. Zhong

Synthetic Aperture Radar Image Formation Process: Application to a Region of North Algeria
H. Akliouat, Y. Smara & L. Bouchemakh

Signal Error Analysis of Active Calibration via Transponder
W. Wang

SIB-ESS-C – A Spatial Data Infrastructure to Facilitate Earth System Science in Siberia
R. Gerlach, C. Schmullius & S. Hese

Data Processing Quality Control (DPQC) Data Flow and Quality Control System
M. Sunda & M. Santuari

Optimising Envisat ASAR Interferometry Opportunities by Orbit Maintenance
B. Duesmann, D. Kuijper & I. Barat

3P11 - Research with the Ozone Monitoring Instrument

Aerosol Retrieval from OMI: Applications to the Amazon Basin
R.L. Curier, J.P. Veefkind, B. Veilhmann et al.

Global Comparisons of Total O₃ Columns from SCIAMACHY Weighting Function DOAS (WFDOAS) and OL3.0 to OMI-TOMS and GOME WFD
A. Bracher, M. Weber, K. Bramstedt & J.P. Burrows

Validation of OMI TOMS-V8 Total Ozone Columns Using a Data Assimilation System
S. Migliorini, R. Brugge, A. O'Neill et al.

3P12 – Upper Atmosphere

Retrieval of Mesospheric Sodium Densities from SCIAMACHY Daytime Limb Spectra
S. Casadio, C. Retscher, R. Lang et al.

Mesospheric Retrievals from MIPAS
L.F. Millián-Valle & A. Dudhia

3P13 – Wind and Wave/Sea State Modelling

Validation of a Regional Wave Model with Envisat and Buoy Observations
J.-G. Li & M. Holt

Retrieving the Ocean Global Wave-Skewness from Envisat RA-2 Averaged Waveforms
J. Gómez-Enri, P. Villares, C. Gommenginger et al.

3P14 – Detection and Monitoring of Oil Spill and Oil Slicks

Application of Envisat SAR Imagery for the Mapping and Estimation of Natural Oil Seeps in the South Caspian Sea
V.V. Zatyagalova, A. Yu. Ivanov & B.N. Golubov

Exploiting Sun glint Signatures from MERIS and MODIS Imagery in Combination to SAR Data to Detect Oil Slicks
M. Adamo, G. De Carolis, V. De Pasquale & G. Pasquariello

A New Object-Oriented Methodology to Detect Oil Spills Using Envisat Images
K. Topouzelis, V. Karathanassi, P. Pavlakis & D. Rokos

Detection and Discrimination of Sea Surface Films in the Coastal Zone of Northeastern Black Sea Using SAR Data

M. Mityagina, O. Lavrova & T. Bocharova

3P15 – EOMD

DInSAR Ground Movement Monitoring in the Rural Environment of an Open Pit Mining Area

M. Schäfer, D. Walter & W. Busch



Contribute Papers

4A1 – Troposphere and Air Quality

Chairs: P. Bernath & W. Lahoz

A Combined GOME and SCIAMACHY Global Water Vapour Data Set

S. Noël, S. Mieruch, H. Bovensmann & J.P. Burrows

Biogeoscience Review of SCIAMACHY Results

C. Müller & the SCIAMACHY team

Evidence for Long-Range Transport of Carbon Monoxide in the Southern Hemisphere from SCIAMACHY Observations

A. Gloudemans, J. de Laat, M. Krol et al.

Satellite Cartography of Atmospheric Methane from SCIAMACHY Onboard Envisat

C. Frankenberg, I. Aben, P. Bergamaschi et al.

Three Years of SCIAMACHY Carbon Dioxide and Methane Column-Averaged Dry Air Mole Fraction Measurements

O. Schneising, M. Buchwitz, H. Bovensmann & J.P. Burrows

4A2 – Troposphere and Air Quality, cont.

Chairs: W. Lahoz & P. Bernath

Identification of Tropospheric Trace Gas Sources: Synergistic Use of HCHO and other Satellite Observations

T. Marbach, S. Beirle, C. Frankenberg et al.

Measuring Peroxyacetyl Nitrate from the MIPAS-E Instrument

D.P. Moore & J.J. Remedios

Southern Hemispheric Biomass Burning as seen by MIPAS: C₂H₆ and Ozone

T. von Clarmann, N. Glatthor, G.P. Stiller et al.

Global HDO Measurements with MIPAS

J. Steinwagner, T. Röckmann, M. Milz et al.

4A3 – Aerosols and Clouds

Chairs: P. Stammes & H. Elbern

Global SCIAMACHY Cloud Products

A.A. Kokhanovsky, M. Vountas, W. Lotz et al.

Tropospheric and Stratospheric Measurements of Key Atmospheric Compounds from the Ground and Space

N. Jones, D. Griffith, G. Guergova et al.

Aerosol Properties from OMI Using the Multi-wavelength Algorithm

B. Veihelmann, J.P. Veefkind, R. Braak et al.

4A4 – Aerosols and Clouds, cont.

Chairs: H. Elbern & P. Stammes

Impact of Clouds on Tropospheric Tracegas Retrievals

S. Beirle, T. Deutschmann, M. Grzegorski et al.

Investigating the Effect of Upper Tropospheric Cirrus Clouds on Tropical MIPAS Level 2 Water Vapour and Ozone Retrievals

H. Sembhi, J. Remedios & P. Raspollini

4B1 – InSAR Applications: Tectonics

Chairs: D. Massonnet & T. Wright

Generation of Three-Dimensional Deformation Map at Low Resolution Using a Combination of Spectral Diversity via Least Square Approach

E. Erten, A. Reigber & O. Hellwich

4B3 – InSAR Applications: Tectonics, cont.

Chairs: T. Wright & Y. Fialko

Improved Source Imaging of the Kleifarvatn Earthquake, Iceland, through a Combined Use of Ascending and Descending InSAR Data

H. Sudhaus & S. Jonsson

Postseismic Deformation in South Iceland Studied Using Multiple Acquisition Radar Interferometry

S. Jónsson, J. Hoffmann & T. Arnadóttir

4B4 – InSAR Applications: Volcanoes

Chairs: G. Wadge & M. Furuya

A Two-Scale Ground Deformation Analysis by Exploiting Envisat Radar Data via the SBAS DInSAR Technique: The Campi Flegrei Case Study

P. Berardino, F. Casu, G. Fornaro et al.

Deformation Due to Magma Movement and Ice Unloading at Katla Volcano, Iceland, Detected by Persistent Scatterer InSAR

A. Hooper & R. Pedersen

Application of Interferometric Point Target Analysis to Izu-Oshima Volcano, Japan

M. Furuya

InSAR Monitoring of the Nyiragongo – Nyamuragira Volcanoes (DR of Congo). Study of the Nyiragongo January 2002- and Nyamulagira November 2006 Eruptions

N. D'oreye, F. Kervyn, C. Wauthier et al.

4C1 – Inland Water Quality

Chairs: R. Santer & J. Pullianen

Parameterisation of an Automated Processing Chain for Meris Data of Swiss Lakes, at the Example of Lake Constance

D. Odermatt, T. Heege, J. Nieke et al.

MERIS Products over Large European Lakes - Comparison with Measured Data about Aerosol and Water Quality

A. Reinart, H. Ohvriil, K. Alikas et al.

Adjacency Effects and Bio-Optical Model Regionalisation: MERIS Data to Assess Lake Water Quality in the Subalpine Ecoregion

G. Candiani, C. Giardino & V.E. Brando

4C2 – Coastal Zones

Chairs: R. Doerffer & J. Gower

Properties of Coastal Waters Around the US: Preliminary Results Using MERIS Data

Z.P. Lee, C. Hu, D. Gray et al.

Sediment and Chlorophyll Concentrations from Major Chinese Rivers Using MERIS Imagery

P.J. Mulhearn & I.S.F. Jones

Novelty Detection in North Sea Water Reflectance Spectra

H. Schiller, W. Schoenfeld, H. Krasemann & K. Schiller

4C3 – Ocean Colour

Chairs: S. Lavender & C. Brockmann

Improving the Estimation of North Sea Primary Production: MERIS CHL and K_D in VGPM

M.A. Eleveld, H.J. van der Woerd & H. Beck

A Novel Technique to Estimate Primary Production Directly from Earth Observation Data: An Inherent Optical Property Approach

K. Barker, T. Smyth, S. Lavender & J. Aiken

4C4 – Ocean Colour, cont.

Chairs: J. Fischer & R. Doerffer

A Global Survey of Intense Surface Plankton Blooms and Floating Vegetation Using MERIS MCI

J. Gower, S. King & P. Goncalves

Satellite Monitoring of Harmful Cyanobacterial Blooms in the Baltic Sea during the Period 1997-2006 – The System, Results and Future Development

M. Hansson & B. Håkansson

Marcoast Adriatic Service Meris Products Validation

M. Viel, G. Ceriola, Paolo Manunta et al.

Phytoplankton Distribution and Light Absorption from Space Data Using Differential Optical Absorption Spectroscopy

A. Bracher, M. Vountas, T. Dinter et al.

4D1 – Hydrology and Soil Moisture

Chairs: M. Borgeaud & W. Wagner

Provision of Snow Information from Satellite Data for Central Europe within the GMES Activity Polarview

H. Bach, F. Appel & W. Mauser

Soil Moisture Determination in Southern Ireland Using an ASAR Time Series

B.W. Barrett, E. Dwyer, P. Whelan & D. Bartlett

4D2 – Hydrology and Soil Moisture, cont.

Chairs: W. Mauser & M. Borgeaud

New Inversion Method for Snow Density and Snow Liquid Water Content Retrieval Using C-Band Data from Envisat/ASAR Alternating Polarization in Alpine Environment

M. Niang, J.P. Dedieu, Y. Durand et al.

Experimental 1km Soil Moisture Products from Envisat ASAR for Southern Africa

W. Wagner, C. Pathe, D. Sabel et al.

4D3 – Wetlands and Water Dynamics

Chairs: A. Bartsch & W. Mauser

Recent Results about ASAR Observation of Wetland Marshes

F.M. Grings, H. Karszenbaum, P. Ferrazzoli et al.

Study of Ecosystem Dynamics in Sahelian Floodplains Using Envisat ASAR C-Band Data

T. Westra, S. Crabbe & R. De Wulf

Wetland Mapping in the West Siberian Lowlands with Envisat ASAR Global Mode

A. Bartsch, C. Pathe & W. Wagner

Multi-Temporal Analysis in the Niger Inland Delta Using ERS 1/2 and ASAR Data

J. Schmidt

Integrated Water Resources Management for Zambia: Satellite-Derived Geo-Information to Support Policy- and Decision-Making Processes

M. Gregor I.A. Nyambe, J. Kampata et al.

4D4 – Floods

Chairs: H. Yesou & H. Bach

Use of Envisat ASAR and ERS SAR Data for Flood Rapid Mapping

T. Schneiderhan, M. Huber, H. Zwenzner et al.

Synergy of High SAR and Optical Data for Flood Monitoring; the 2005-2006 Central European Floods Gained Experience

H. Yesou, B. Allenbach, R. Andreoli et al.

ASAR Products Handling and Analysis for an Enhanced Flood Monitoring Service in ESRIN G-POD

R. Cossu, P. Bally, F. Brito et al.

4E1 – Dragon

Chairs: Y.L. Desnos & Q. Zeng

The Dragon Programme — Status and Achievements

Y.-L. Desnos, Z. Li, Z. Gao & A. Zmuda

Near Real Time Flood Monitoring in R.P. China during the 2005 and 2006 Flood and Typhoons Seasons Based on Envisat ASAR Medium and High Resolution Images

H. Yesou, J. Li, R. Malosti et al.

4E2 – Dragon, cont.

Chairs: Y.L. Desnos & Q. Zeng

Creation of Large Area Forest Biomass Maps for NE China Using ERS-1/2 Tandem Coherence

O. Cartus, M. Santoro, C. Schmullius et al.

Assessment and Update of Forest Classification Using Multi-Parameter Satellite SAR Data for NE China

X. Tian, Z. Li, E. Chen et al.

Multi-Track PS Analysis in Shanghai

D. Perissin, C. Prati, F. Rocca et al.

Synergy of Low and Medium Resolution Envisat ASAR and Optical Data for Lake Watershed Monitoring: Case Study of Poyang Lake (Jiangxi, P.R. China)

R. Andreoli, H. Yesou, J. Li & Y.-L. Desnos

4E3 – Dragon, cont.

Chairs: Y.L. Desnos & Q. Zeng

Land Cover Classification Based on SAR Data in Southeast China

F. Ling, X. Wang & X. Shi

MERIS Performance in the East China Seas: Evaluation of Atmospheric Correction and Optical Inversion Algorithms

S. He, W. Li, L. Hu, Y. Wang, T. Zhang, J. Fischer, Z. Lee, C. Hu

4E4 – Mapping and Cartography

Chairs: J. Mallorqui & D. Derauw

L-Band SAR Data Assimilation for Improved Surface Modelling

A. Loew, I. Hajnsek, D. Hoekman et al.

Time-Varying Segmentation for Mapping of Land Cover Changes

F. Aspert, M. Bach Cuadra, A. Cantone et al.

4F1 – Glacier and Ice Sheet Mass Balance

Chairs: M. Drinkwater & F. Remy

Modelling Mass Balance of Glaciers Using Satellite Data

H. Rott, T. Nagler, P. Malcher & G. Bippus

Semi-Controlled Interferometric Mosaic of the Largest European Glacier
A. Sharov & D.B. Nikolskiy

The Correlation of Glacier Mass Balance and SAR Backscatter on Svartisen, Norway
I. Brown, M. Jackson, M. Braun & R. Engeset

Space and Time Topographic Signatures of Ice Sheet
F. Rémy & B. Legrésy

4F2 – Ice Sheet Mass Balance

Chairs: F. Remy & N. Young

Effects of Snow Properties on the Dual Frequency Radar Altimeter Signal of Envisat over the Antarctic Ice-Sheet
P. Lacroix, B. Legresy, M. Dechambre et al.

4F3 – Ice Sheet and Glacier Processes

Chairs: H. Rott & C.K. Shum

Melt Extent and Pattern in Greenland and Antarctic Peninsular from Envisat ASAR Global Monitoring Mode
A. Luckman

Ice Dam Fluctuations at the Marginal Lake Grænalón (Iceland) before and during a GLOF
K. Scharrer, CH. Mayer, S. Martinis et al.

Surface Velocity of Swiss Alpine Glaciers from ERS SAR Interferometry
T. Strozzi, U. Wegmüller, C. Werner & A. Wiesmann

Using Radar and Optical Data to Study the Glacier Changes on the 'Roof of the World' (ESA Project No 2401)
J.-P. Deroin, J. Wen, M. Dai et al.

4F4 – Sea Ice Mass Balance

Chairs: W. Dierking & M. Drinkwater

Svallex 2005 and Icesar 2007 — Two Flight Campaigns over Sea and Land Ice in the Svalbard Region: Sea Ice Studies
W. Dierking, J. Hartmann & C. Luepkes

Ice Drift in the Fram Strait from Envisat ASAR Data
S. Sandven, K. Kloster & K.F. Dagestad

4S2 – GMES

Chair: V. Liebig

GMES Space Component – Sentinel-1, -2 and -3
P.G. Edwards, G. Levrini, F. Spoto et al.

4S3 – GMES, cont.

Chair M. Doherty

The Global Monitoring for Food Security Project: Using Envisat MERIS and ASAR for Monitoring Agriculture in Africa
L. Bydekerke, F. Holecz, C. Haub et al.

Risk-Eos, Flood and Forest Fire Risk Information Service
Y. Desmazieres & M. Paganini

Marine and Coastal Environmental Information Services: The MarCoast Project after 18 Months
J. Bruniquel

4S4 – GMES, cont.

Chair M. Doherty

GSE Land - Geoinformation Services for Urban Development, Spatial Planning, Water Quality and Irrigation for Europe
S. Kuntz

GMES Service Element Forest Monitoring Activities
T. Häusler & S. Gomez

RESPOND: Geo-Information Services for Humanitarian and Development Aid
N. Veck & J. Lambert

Poster Papers

4P1 & 4P2 – Aerosols, Clouds and UV

Global Distribution of Atmospheric Photon Path Lengths Derived from GOME and SCIAMACHY
T. Wagner, S. Beirle, M. Grzegorski et al.

Fast Forward Modelling of Observations for Cloudy Atmospheric States
S. Mackie, C. Merchant & P. Francis

Cloud Parameter Retrieval from MIPAS Data
J. Hurley, A. Dudhia & D. Grainger

Satellite Retrieval of Aerosol Properties over Bright Reflecting Desert Regions
T. Dinter, W. von Hoyningen-Huene, A. Kokhanovsky et al.

Measuring Total Particle Extinction from the MIPAS-E Instrument
D.P. Moore & J.J. Remedios

4P4 – Cryosphere

ESA's CryoSat-2 Multi-Mode Level 0 to Level 1B Science Processors – Algorithm Design and Pre-Launch Verification with ASIRAS
R. Cullen, D.J. Wingham, P. Viau et al.

Snow Depth and Surface Conditions of Austfonna Ice Cap (Svalbard) Using Field Observations and Satellite Altimetry
A. Kouraev, B. Legresy, F. Remy & A. Taurisano

Statistical Modeling and Classification of ASAR Alternating Polarization Sea Ice Data
A. Doulgeris, R. Hall, T. Eltoft & S. Trondstad

4P6 – Dragon

Large Scale Land Cover Map Generation Based on Low and Medium Resolution Envisat ASAR Data, Application to Poyang Lake Area (Jiangxi, P.R. China)

R. Andreoli, S. Huang, J. Li et al.

Change Detection Analysis Dedicated to Flood Monitoring Using Envisat Wide Swath Mode Data

R. Andreoli & H. Yesou

Flood Extent Prediction from Lake Heights and Water Level Estimation from Flood Extents Using River Gauges, Elevation Models and Envisat

R. Andreoli, J. Li, & H. Yesou

4P7 – Education and Training

ESA Support to Earth Observation Principal Investigators: Preparing for the Next Generation

Y.-L. Desnos, P. Regner, R. Malosti et al.

African Capacity Building in Satellite Altimetry with the UNESCO-Bilko Programme

V. Byfield, F. Shillington, D. Kirugara et al.

TIGER Capacity Building — Supporting Water Research in Africa.

L. Ghaye, F. Palazzo, D. Fernandez & Z.(B.) Su

4P8 – Floods

Disaster Monitoring with the Integrated Utilization of Envisat and other Satellite Data Sets in the 2004-2006 Period in Hungary

G. Csornai, Zs. Suba, G. Nádor et al.

4P9 – Hydrology and Soil Moisture

Surface Soil Moisture Retrieval from Envisat/ASAR AP Observations Combining two Backscattering Models

J. Álvarez-Mozos, M. González-Audicana & J. Casali

Using Envisat ScanSAR Data for Characterising Scaling Properties of Scatterometer Derived Soil Moisture Information over Southern Africa

D. Sabel, C. Pathe, W. Wagner et al.

Field and Basin Scale Analyses of ASAR Imagery for Soil Moisture Estimation in the Campidano Plain, Sardinia

I. Gherboudj, R. Fillion, C. Paniconi et al.

Monitoring of Spring Snowmelt with Envisat ASAR WS in the Eastern Alps by Combination of Ascending and Descending Orbits

A. Bartsch, J. Jansa, M. Schöner & W. Wagner

5 Years of Envisat Asar Soil Moisture Observations in Southern Germany

A. Loew, H. Bach & W. Mauser

4P10 – Inland Water Quality

Mapping Chlorophyll-A in Lake Kivu with Remote Sensing Methods

M. Kneubühler, T. Frank, T.W. Kellenberger et al.

Study of the Water Quality of Alqueva Artificial Lake in the South of Portugal Using MERIS Data
M. Potes, M.J. Costa & J.C.B. da Silva

4P11 – InSAR Applications: Tectonics

Recent Crustal Movements Along the Carmel Fault System, Israel
R.N. Nof, G. Baer, Y. Eyal & F. Novali

Deformation in the Granada Basin (Southern Betic Cordillera) Studied by PS-InSAR: Preliminary Results
A.M. Ruiz, J.J. Sousa, R.F. Hanssen et al.

Extending the Temporal Coverage of Icelandic Crustal Deformation Measurements through Envisat InSAR Images
R. Pedersen, F. Sigmundsson, A.J. Hooper & K.L. Feigl

4P12 – InSAR Applications: Volcanoes

ASAR Not Like-ERS Swaths for Studying the Mt. Etna Ground Deformations
G. Puglisi, F. Guglielmino, A. Bonforte & M. Palano

NRT Monitoring of the 2004 Subglacial Grímsvötn Eruption (Iceland) with Envisat-ASAR Data
U. Münzer, A. Gudmundsson & S. Martinis

ASAR Images a Diverse Set of Deformation Patterns at Kilauea Volcano, Hawai'i
M.P. Poland

Pre-Operative Test-Case of Eurorisk-Preview Project During the 2006 Mt. Etna Eruption
F. Guglielmino, C. Spinetti, A. Bonforte et al.

Monitoring Active Volcanoes by Using of Envisat and ERS Data: First Results of the Eurorisk-Preview Project
C. Spinetti, P. Berardino, M.F. Buongiorno et al.

4P13 – Mapping and Cartography

ASAR Images Geometric Capabilities for Coastal Mapping; Framework of ESA DUE Coastchart Project - Examples of Coastal Zones of Nigeria and Gabon
H. Trebossen, M. Paganini, J.P. Rudant & B. Rosich

Quantification of Geology Features: From ASAR to 3D Modelling
E. Pajot, J.P. Rudant, D. Dhont & J.P. Xavier

Synergistic Usage of ASAR WS and MERIS Data for Large Scale Water and Vegetation Monitoring in Africa - A Science Product of the Aquifer Project
C. Thiel, J. Reiche, R. Leiterer & C. Schmallius

The Use of SAR Interferometric Coherence Images to Study Sandy Desertification in Southeast Niger: Preliminary Results
C. Bodart & A. Ozer

Coastal Zone Mapping Using Multitemporal ERS SAR and Envisat ASAR Data
S. Wade, K. Ba, H. Trebossen et al.

DEM Generation and Analysis on Rugged Terrain Using Envisat/ASAR Multi-Angle InSAR Data
X. Li, H. Guo & Z. Li

4P14 – Ocean Circulation and Sea Features

Spatial-Temporal Distribution and Characteristics of Internal Waves in the Okhotsk and Japan Seas Studied by ERS-1/2 SAR and Envisat ASAR
L. Mitnik & V.A. Dubina

Single-Look SAR Images and Detection of Sea Dark Areas
A. Gambardella, F. Nunziata, A. Sorrentino et al.

Characterization of Internal Waves in the Strait of Gibraltar, Using SAR Images and In-Situ Measurements
J. Gómez-Enri, A. Vazquez-, M Bruno et al.

Mesoscale Sea Surface Currents Derived from Multi-Sensor Satellite Imagery
M. Gade, G. Fiedler & L. Dreschler-Fischer

Case Study: Use of SAR Data for the Operational Control of Fishing Ships Positioning
O. Lavrova, S. Shcherbak, M. Mityagina & V. Pyrkov

Assessment of SAR Ocean Features Using Optical and Marine Survey Data
M. Thankappan, N. Rollet, C.J.H. Smith et al.

4P15 – Ocean Colour

The Carbon Cycle from North to South along the Galathea 3 Route
M.B. Christiansen, L.L. Soerensen, J. Nissen & C.B. Hasager

Validation of MERIS-Reflectance from Ferries
J. Høkedal & K. Sørensen

Synergistic Use of Ferrybox and Envisat Data with the Aid of a Hydrodynamic Transport Model
H. Krasemann & W. Petersen

Comparison of Ocean Color Data Products from Meris, Modis, and Seawifs: Preliminary Results for the East China Seas
C. Hu, Y. Wang, Q. Yang et al.

Regional Products for the Baltic Sea in the Frame of MARCOAST GSE
H. Krawczyk, A. Neumann, T. Walzel & B. Gerasch

4P16 – Sea Surface Temperature

Deriving a Sea Surface Temperature Record Suitable for Climate Change Research from the Along-Track Scanning Radiometers
C. Merchant

ESA's Medspiration Service
I. Robinson, J.-F. Piolle, P. LeBorgne et al.

4P18 – Troposphere and Air Quality

Space-Borne Tropospheric NO₂ above the Alpine Region: Evidences of Systematic Retrieval Errors and the Effect of Inaccurate Pixel Surface Pressure

D. Schaub, D. Brunner, F. Boersma et al.

Reconstructing Fine-Scale Air Pollution Structures from Coarsely Resolved Satellite Observations

D. Brunner, D. Schaub & B. Buchmann

Retrieval of Formaldehyde from High-Resolution MIPAS-Envisat Spectra

T. Steck, N. Glatthor, T. von Clarmann et al.

Global Peroxyacetyl Nitrate (PAN) Retrieval in the Upper Troposphere from Limb Emission Spectra of the Michelson Interferometer for Passive Atmospheric Sounding (MIPAS)

N. Glatthor, T. von Clarmann, H. Fischer et al.

An Air Quality Study for Greece with the Mm5/CAMx Modeling System

E. Katragkou, I. Kioutsioukis, A. Poupkou et al.

Global Observation of Formaldehyde in the Troposphere by Satellites: GOME and SCIAMACHY Results

I. De Smedt, M. Van Roozendael, T. Stavrou et al.

Three Years of SCIAMACHY Carbon Monoxide Measurements

I. Khlystova, M. Buchwitz, H. Bovensmann & J.P. Burrows

4P20 – Wetlands and Water Dynamics

Remote Sensing and Urban Malaria: Radar Contribution for the Determination of Potential Anopheles Breeding Site in Antananarivo (Madagascar)

F. Rakotomanana, L. Jolivet, R.V. Randremanana & J.P. Rudant

Contributed Papers

5A1 – Atmospheric Applications

Chairs: B. Buchmann

The PROMOTE Ozone Profile Service - Long-Term 3D Ozone Reanalysis of ERS-2 and Envisat Data Sets

T. Ebertseder, F. Baier, Q. Errera et al.

Using Satellite Aerosol Products for Monitoring National and Regional Air Quality in Austria

R. Höller, P. Garnesson, C. Nagl, & T. Holzer-Popp

First Years Results from Croydon Airtex

I.J. Kilbane-Dawe, S. Potter, L. Johnson et al.

Monitoring of Volcanic Activity from Satellite as Part of GSE PROMOTE

J. Van Geffen, M. Van Roozendael, W. Di Nicolantonio et al.

5A2 – Atmospheric Applications, cont.

Chairs: B. Buchmann

GlobAEROSOL an ESA Due Product

Ó. Pérez Navarro, C. Gómez Cid, R. Siddans et al.

Globmodel

W. Lahoz, A. O'Neill, J. Styles & Z. Stott

Improving ASSET Ozone Analyses with Multi-Sensor Assimilation

S. Massart, D.R. Jackson, A. Segers & V.-H. Peuch

Monitoring and Assimilation of Envisat NRT Retrievals at ECMWF

R. Dragani

5B1 – ESA Toolboxes

Chairs: P. Regner & M. Engdahl

PolSARpro v2.0: The Versatile Educational Toolbox for Polarimetric and Interferometric SAR Data Processing

E. Pottier, L. Ferro-Famil, S. Allain et al.

Basic Radar Altimetry Toolbox and Radar Altimetry Tutorial: A New Set of Tools for All Altimetry Users

V. Rosmorduc, J. Benveniste, N. Picot et al.

BEAT - The Basic Envisat Atmospheric Toolbox

S.V. Niemeijer

Beam 4 – An Efficient Development Platform for Optical EO Data

N. Fomferra, C. Brockmann, M. Peters et al

5C1 – Sea Surface Temperature

Chairs: I. Robinson & I. Barton

AATSR - Completing the the First 15 Years Global SST for Climate

D.T. Llewellyn-Jones, G.K. Corlett & C.T. Mutlow

Use of Envisat AATSR Data within the GODAE High Resolution SST Pilot Project (GHRSSST-PP)

C. Donlon

Use of Envisat AATSR within a High Resolution Near Real Time Global Sea Surface Temperature Analysis System

J. Stark & C. Donlon

Satellite-Derived Sea Surface Temperatures – A Case Study of Error Variability

I.J. Barton

5C2 – Education and Training

Chairs: M. Fea & F. Sarti

Observing the Ocean from Envisat: A UNESCO-Bilko Teaching Module on Marine Applications of Envisat Data

V. Byfield, C. Donlon, J.C. Da Silva et al.

Using Real-Time Satellite Data in the Classroom: The Argonautica and Calisph'Air Educational Projects

D. de Staerke, A. Richardson & D. Robinson

Envisat for School: The Satellite Eye for the Galathea 3 Expedition

J. Lichtenegger, P.B. Sørensen, C.B. Hasager et al.

Eduspace - A Multi-Lingual Earth Observation Website for Teaching and Learning

L. Ghaye, M. Fea, J. Lichtenegger et al.

5D1 – Sentinel-1, the Future European Radar Observatory

Chairs: E. Attema & M. Davidson

Modeling Interferogram Stacks for Sentinel -1

F. Rocca

5D2 – Third Party Missions

Chair: B. Hoersch

The Atmospheric Chemistry Experiment (ACE): Status and Results

P.F. Bernath

The TanDEM-X Mission

M. Zink, G. Krieger, H. Fiedler et al.

COSMO-SkyMed Program: Utilization and Description of an Advanced Space EO Dual-Use Asset

A. Coletta, G. Angino, F. Battazza et al.

5E1 – Mapping and Cartography, cont.

Chairs: D. Derauw & F. Holecz

Earth Observation for Environmental and Health Impact Assessment - A Methodology with Synergies for European Policies

A.N. Skouloudis, D.G. Rickerby & P. Paert

Remote Sensing and GIS Contribution to Natural Hazard Risk Site Detection - Demonstrated by Examples from N-Venezuela, Central Italy and SW-Germany / NW-Switzerland

B. Theilen-Willige

Validation of the PS Height EstimateS by Means of Photogrammetry

D. Perissin

5E2 – Mapping and Cartography, cont.

Chairs: F. Holecz & D. Derauw

SAR Superresolution Change Detection for Security Applications

R. Romero, J. Sanz-Marcos, D. Carrasco et al.

Automatic Detection of Archeological Sites Using a Hybrid Process of Remote Sensing, GIS Techniques and a Shape Detection Algorithm

I. Bridgwood, M. Schultz Rasmussen, M.K. Sørensen et al.

Browsing the Scales - The CARTO-CHANGE Project

U. Gangkofner, J. Weichselbaum, C. Hoffmann et al.

5F1 – Operational Sea Ice Monitoring and Modelling

Chairs: W. Dierking & O. Grabak

C-Band Multiple Polarization SAR for Ice Monitoring - What can it Do for the Canadian Ice Service

M. Arkett, D. Flett & R. De Abreu

Iceberg Observations in the Barents Sea by Radar and Optical Satellite Images

S. Sandven, M. Babiker & K. Kloster

5F2 – CryoSat-2

Chairs: R. Francis & P. Gilles

Cryosat: From Disaster to Rebirth

R. Francis & P. Gilles

The Challenge to Rebuild CryoSat

W. Bruzek, U. Mallow, L. Rey & L. Rys

Arctic Experiments to Support CryoSat

R. Cullen, M.W.J. Davidson, C.R. Francis & D.J. Wingham

5G1 – Ocean Circulation and Sea Features

Chairs: J. Johannessen & M.X. He

Using Envisat ASAR for the Study of Winter Mesoscale Cyclones in the Asia Marginal Seas

M.L. Mitnik, L. M. Mitnik & I.A. Gurvich

Satellite-Based Research on Oceanic Planetary Waves: Recent Advances and Open Questions

P. Cipollini

5G2 – Ocean Circulation and Sea Features, cont.

Chairs: D. Stammer & V. Kerbaol

Automatic Extraction of Linear Features in SAR Images by Means of the Wavelet Transform

M. Tello, C. Lopez-Martinez & J.J. Mallorqui

Ship Detection Trials with Envisat ASAR in the English Channel: Coupling Tests with VMS and VTMS

J.-Y. Le Bras, J.-P. Dumont, R. Berland & V. Kerbaol

Ship Detection Using RADARSAT-1 Synthetic Aperture Radar: Validation with VTS
C.-S. Yang

Processing of ASAR/AP Mode Data for Ship Detection
X Li, J. Chong, Jinsong; Zhu, Minhui

Committees:

- **Scientific Committee**
- **Organising Committee**
- **Programme Committee**
- **Technical Committee**

Exhibitors

List of Participants

Photo Album

Committees

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F. Achard, *JRC, Global Environmental Monitoring Unit Institute for Environment and Sustainability Joint Research Centre of the European Commission, Italy*

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