HS1.2 Linking Participation and knowledge sharing with Integrated Land Use Management

Convener: Kirkby, M.
Co-Convener(s): Schwilch, G.
Lecture Room 32
Chairperson: N.N.

13:30–13:45; EGU2008-A-12331; HS1.2-1MO3O-001
McDonagh, J.
Interdisciplinary approaches for land degradation assessment (solicited)

13:45–14:00; EGU2008-A-10162; HS1.2-1MO3O-002
Valente, S.; Coelho, C.; Ferreira, A.; Amaral, L.; Silva, F.
Traditional water management systems – Are they still important to local communities?

14:00–14:15; EGU2008-A-10606; HS1.2-1MO3O-003
Schwilch, G.; Bachmann, F.; Gabathuler, E.; Liniger, HP.
A methodology to appraise and select strategies to mitigate desertification based on stakeholder participation and global best practices

14:15–14:30; EGU2008-A-02963; HS1.2-1MO3O-004
Alexander, K. S.; Nancarrow, B. E.
A partnered approach to sustainable land management practices: Integrating local knowledge and social and biophysical scientific models

14:30–14:45; EGU2008-A-11109; HS1.2-1MO3O-005
Gebreyohannis, S.; Bishop, K.
Linking deforestation to the flow regime in the Upper Blue Nile Basin: community perception vs/and/or the observational record

14:45–15:00; EGU2008-A-08749; HS1.2-1MO3O-006
Lane, S.N.; Bradley, S.; Landstrom, C.; Odoni, N.; Ward, N.; Whatmore, S.
Environmental competency groups: the case of flood risk modelling

15:00 END OF SESSION

HS1.2 Linking Participation and knowledge sharing with Integrated Land Use Management – Posters

Convener: Kirkby, M.
Co-Convener(s): Schwilch, G.
Display Time: Monday, 08:00–19:30

Authors in Attendance: Monday, 17:30–19:00
Poster Area Hall A
Chairperson: N.N.

A0208; EGU2008-A-12335; HS1.2-1MO5P-0208
Critchley, W.; Bon, A.; Di Prima, S.
Hard sell, – or softly, softly? - Testing channels for information exchange amongst farmers and communities

A0209; EGU2008-A-04257; HS1.2-1MO5P-0209
Hope, R.; Borgoyary, M.; Agarwal, C.
Exploring incentives for socio-ecological transformation in India

A0210; EGU2008-A-04778; HS1.2-1MO5P-0210
Sanchez-Moreno, J.F.; Farshad, A.; Jetten, V.
Farmer or expert; whose reality counts? A case study of Lao PDR

A0211; EGU2008-A-06264; HS1.2-1MO5P-0211
Sargordi, F.; Sharifi, A.; Boerboom, L.; Van Keulen, H.
Setting the windows of opportunities for sustainable agriculture using multiple goal linear programming (MGLP) Case study: Borkhar district, Iran

A0212; EGU2008-A-07259; HS1.2-1MO5P-0212
Sauer, T.
Integrating new aspects of irrigation water-use into an interdisciplinary global land-use modelling framework

A0213; EGU2008-A-12411; HS1.2-1MO5P-0213
Lindeque, G.H.L.; Hoffman, M.T.
Mapping natural resource conservation and land degradation in South Africa

A0214; EGU2008-A-09181; HS1.2-1MO5P-0214
Irvine, B.J.; Kirkby, K.J.
Modelling the margins of best practice in land conservation

A0215; EGU2008-A-07514; HS1.2-1MO5P-0215
Feng, K.; Hubacek, K.; Siu, Y.; Termansen, M.; Kirkby, M.; Irvine, B.
Full biophysical and socio-economic carbon accounting for the UK

A0216; EGU2008-A-07357; HS1.2-1MO5P-0216
Stringer, L.C.; Screreciu, S.; Reed, M.S.
Linking climate change mitigation, biodiversity conservation and the rehabilitation of degraded land in southern Romania: Synergy through participation

A0217; EGU2008-A-09257; HS1.2-1MO5P-0217
Farshad, A.; Mantel, S.
Suitable or not suitable, how right are we when applying FAO framework?

HS7.4 Hydro-ecology of riparian zones: hyporheic controls at the groundwater - surface water interface

Convener: Krause, S.
Co-Convener(s): Fleckenstein, J., Hannah, D., Huggenberger, P.
Lecture Room 31
Chairperson: N.N.

8:30–8:45; EGU2008-A-01353; HS7.4-1MO1O-001
Tyler, S.; Saíto, L.
Interpretation of streambed heat transfer using fiber optic derived temperatures (solicited)

8:45–9:00; EGU2008-A-01706; HS7.4-1MO1O-002
Boano, F.; Revelli, R.; Ridolfi, L.
Quantifying the impact of the stream-aquifer interaction on the surface-subsurface exchange

9:00–9:15; EGU2008-A-11725; HS7.4-1MO1O-003
Brookfield, A.E.; Sudicky, E.A.; Park, Y.J.; Conant Jr., B.
Simulation of thermal stream loadings using a fully-integrated surface/subsurface modeling framework
10:00 COFFEE BREAK

Chairperson: N.N.

10:30–10:45; EGU2008-A-03514; HS7.4-1MO2O-001
Pinay, G.; Marmonier, P.
Why should we bother about hyporheic zone? (solicited)

10:45–11:00; EGU2008-A-03986; HS7.4-1MO2O-002
Durand, V.; Aller, M.-F.; Greswell, R.; Rivett, M. O.; Mackay, R.; Tellam, J. H.
Bank-side extraction well field tests to investigate water exchanges and physico-chemical conditions in the hyporheic zone

11:00–11:15; EGU2008-A-05905; HS7.4-1MO2O-003
HUMPHREY, J.; Yesavage, T.
Sources and removal of nitrate in a mountain watershed: Possible riparian zone denitrification, Turkey Creek Basin, Colorado, USA

11:15–11:30; EGU2008-A-01091; HS7.4-1MO2O-004
Rupp, D; Schmidt, J; WOODS, R; Mckerchar, A
Modelling spatio-temporal variability of streamflows in an intermittent alluvial plain river

11:30–11:45; EGU2008-A-03558; HS7.4-1MO2O-005
Kalbus, E.; Mutz, M.; Meinecke, S.
In-stream wood enhances hyporheic exchange flows

11:45–12:00; EGU2008-A-11690; HS7.4-1MO2O-006
Wood, P.J.; Boulton, A.J.; Stubbington, R.
Low flow controls on riverine and hyporheic macroinvertebrates

12:00 END OF SESSION

HS7.4 Hydro-ecology of riparian zones: hyporheic controls at the groundwater - surface water interface – Posters

Convener: Krause, S.
Co-Conveners: Fleckenstein, J., Hannah, D., Huggenberger, P.
Display Time: Monday, 08:00–19:30
Authors in Attendance: Monday, 17:30–19:00
Poster Area Hall A
Chairperson: N.N.

A0218; EGU2008-A-00618; HS7.4-1MO5P-0218
Grant, J.; Soulsby, C.; Malcolm, LA
Physico-chemical controls on hyporheic community structure

A0219; EGU2008-A-00673; HS7.4-1MO5P-0219
Demaria, A.; Boano, F.; Camporeale, C.; Revelli, R.; Ridolfi, L.
Hyporheic exchange induced by sinuosity of meandering rivers

A0220; EGU2008-A-03276; HS7.4-1MO5P-0220
Gerull, L.; Frossard, A.; Mutz, M.; Gessner, M.
Metabolic hot spots in a virgin landscape - research concept in an artificial watershed

A0221; EGU2008-A-07089; HS7.4-1MO5P-0221
Krause, S.; Heathwaite, L.; Binley, A.; Kaeser, D.
The impact of hyporheic connectivity on the nitrogen metabolism as the groundwater - surface water interface

A0222; EGU2008-A-05199; HS7.4-1MO5P-0222
Schmid, B.H.
Repeat experiments as a tool for the analysis of solute transport parameter variability

A0223; EGU2008-A-05300; HS7.4-1MO5P-0223
Ibrahim, T.; Wanwright, J.; Thornton, S.
Scales of ground and surface water interaction in the hyporheic zone of a heterogeneous environment

A0224; EGU2008-A-07255; HS7.4-1MO5P-0224
Riess, N.P.; Muia, W.A.; Thornton, S.F.; Osborn, A.M.; Smith, J.W.N.
Investigating nitrogen attenuation in the hyporheic zone of a lowland river: a multi-disciplinary approach

A0225; EGU2008-A-08401; HS7.4-1MO5P-0225
Ochoa-Salazar, O.; Baquete, B.; Henry, H.; Dandurand, D.; Sanchez-Perez, S; Loubel, L.
Functioning of an alluvial wetland zone deduced from a geochemical multicomponent analysis of their waters, using “mixing diagrams”

A0226; EGU2008-A-08590; HS7.4-1MO5P-0226
Curie, F.; Ducharme, A.; Sebilo, M.; Bendjoudi, H.
Denitrification in a riparian hyporheic zone controlled by river regulation

A0227; EGU2008-A-08965; HS7.4-1MO5P-0227
Kalbus, E.; Schmidt, C.; Molson, J.; Reinstorf, S.; Schirmer, M.
Thermal modeling approach to determine aquifer heterogeneity from spatial patterns of stream-aquifer interactions

A0228; EGU2008-A-10144; HS7.4-1MO5P-0228
Garofano-Gómez, V.; Martínez-Capel, F.; Francés, F.; Nebot-Domínguez, T.; Cavallé-Garrido, A.; Morillo-Sarrión, R.
Riparian species and their relationship with the flow regime in the Mijares River (Spain)

A0229; EGU2008-A-10179; HS7.4-1MO5P-0229
Volze, N.; Neumann, C.; Green, C.T.; Tyler, S.; Fleckenstein, J.H.
Quantifying the spatial and temporal variability of groundwater-lake exchange

A0230; EGU2008-A-10954; HS7.4-1MO5P-0230
Hannah, D.M.; Brown, L.E.; Milner, A.M.
Hyporheic temperature dynamics of an alpine stream

A0231; EGU2008-A-11833; HS7.4-1MO5P-0231
Eckhardt, K.
A comparison of baseflow indices, which were calculated with seven different baseflow separation methods

A0232; EGU2008-A-06852; HS7.4-1MO5P-0232
Vassiliou, E.; Founda, M.; Dimitrakopoulos, D.
The water quality of Alfios River and the effects on it estimating the quality of the river system by Phreeqc modeling

A0233; EGU2008-A-07405; HS7.4-1MO5P-0233
Humphrey, J.; Vassiliou, E.; Dimitrakopoulos, D.
The quality characteristics of the water resources in Ptolemais lignite district, Greece
HS7.7 Riverine systems: new methods, concepts and applications linking hydrology, hydraulics, geomorphology and ecology (co-listed in BG & GM)

Convener: Tetzlaff, D.
Co-Convener(s): Lane, S., Harvey, G., Molnar, P.
Lecture Room 31
Chairperson: Tetzlaff, D., Lane, S.

13:30–13:45; EGU2008-A-05071; HS7.7-1MO3O-001
Laudon, H
The case of hydrological and biogeochemical process-understanding for predicting stream biota across scales (solicited)

13:45–14:00; EGU2008-A-09767; HS7.7-1MO3O-002
Borchardt, D.; Völker, J.
Effective hydromorphological parameters for the diversity and structure of benthic invertebrate communities in rivers

14:00–14:15; EGU2008-A-07767; HS7.7-1MO3O-003
Moggridge, H.; Gurnell, A
The importance of hydrochory in structuring riparian vegetation: examples from two UK rivers

14:15–14:30; EGU2008-A-08945; HS7.7-1MO3O-004
Poppe, M.; Muhar, S.; Schmutz, S.; Melcher, A.; Trautwein, C.
How do land use structures influence the ecological status of the aquatic environment at three different spatial scales? An Austrian example.

14:30–14:45; EGU2008-A-09208; HS7.7-1MO3O-005
Tal, M.; Paola, C.
Interactions between braiding and vegetation leading to the formation of single-thread channels in a laboratory experiment and the importance of competing time scales in how such systems organize

14:45–15:00; EGU2008-A-08781; HS7.7-1MO3O-006
Savina, M.; Molnar, P.; Perona, P.; Burlando, P.
Using aerial photography to detect riparian vegetation change in an alpine braided river affected by streamflow regulation

15:00 COFFEE BREAK

Chairperson: HARVEY, G., MOLNAR, P.

15:30–15:45; EGU2008-A-01347; HS7.7-1MO4O-001
Richards, K S; Moss, T
How do we do inter-disciplinary eco-hydrological restoration science? Some experience from the EC-funded FLOBAR2 project

15:45–16:00; EGU2008-A-04726; HS7.7-1MO4O-002
Heritage, G L; Large, A R G; Milan, D J
Robust identification of hydraulic biotopes using terrestrial laser scan data of water surface properties

16:00–16:15; EGU2008-A-08678; HS7.7-1MO4O-003
Bradley, C; Gurnell, A.M.; Clay, A.; Emery, J.
Patterns of surface sub-surface water exchange in an upland catchment, and the importance of pool: riffle couplets.

16:15–16:30; EGU2008-A-10818; HS7.7-1MO4O-004
Siviglia, A.; Zolezzi, G.
Thermopeaking in Alpine streams: field observations and model predictions

16:30–16:45; EGU2008-A-09249; HS7.7-1MO4O-005
Trolldborg, L; Olsen, M
Tuning hydrological models for ecological modelling

16:45–17:00; EGU2008-A-08919; HS7.7-1MO4O-006
Lane, S.N.; Mould, D.C
Habitat quality or quantity? Application of two-dimensional hydraulic and fuzzy biological modeling to the redesign of reservoir releases

17:00 END OF SESSION

HS7.7 Riverine systems: new methods, concepts and applications linking hydrology, hydraulics, geomorphology and ecology (co-listed in BG & GM) – Posters

Convener: Tetzlaff, D.
Co-Convener(s): Lane, S., Harvey, G., Molnar, P.
Display Time: Monday, 08:00–19:30
Authors in Attendance: Monday, 17:30–19:00
Poster Area Hall A
Chairperson: Tetzlaff, D., Harvey, G., Molnar, P., Lane, S.

A0234; EGU2008-A-00166; HS7.7-1MO5P-0234
Mitrofanova, E.
Indicative significance of phytoplankton for estimation of large river state near cities and settlements (Ob and Tom Rivers as a case study, Russia)

A0235; EGU2008-A-02611; HS7.7-1MO5P-0235
Smolar-Zvanut, N.; Mikos, M.; Krivograd Klemecic, A.; Breznik, B.
The effect of water abstraction on aquatic ecosystem in the Koritnica River

A0236; EGU2008-A-04722; HS7.7-1MO5P-0236
Heritage, G L; Milan, D J; Large, A R G
Rapid mapping of floodplain morphology and habitat using terrestrial laser scan data

A0237; EGU2008-A-03141; HS7.7-1MO5P-0237
Truscott, A.M.; Soulsby, C.; Palmer, S.C.F; Newell, L.; Hulme, P.E.
Dispersal of the invasive plant Mimulus guttatus and the role of high flow events

A0238; EGU2008-A-08292; HS7.7-1MO5P-0238
Soulsby, C.; Addy, S.J.; Hartley, A.J.
Landscape Controls on Channel Morphology in the Cairngorm Mountains, Scotland: identifying habitats for riverine ecosystems

A0239; EGU2008-A-04043; HS7.7-1MO5P-0239
Malcolm, I.A.; Soulsby, C.; Youngson, A.F.; Tetzlaff, D.
Hyporheic hotspots - inferring groundwater-surface water exchange with continuous monitoring of dissolved oxygen

A0240; EGU2008-A-00290; HS7.7-1MO5P-0240
Inholt, C.; Soulsby, C.; Gibbins, C.; Malcolm, I.A.; Langan, S.
Within-catchment variation in stream invertebrate growth patterns: influence of riparian cover and stream temperatures on invertebrate growth

A0241; EGU2008-A-00719; HS7.7-1MO5P-0241
Krause, S.; Heathwaite, L.; Binley, A.; Kaeser, D.
Nutrient transformation in the hyporheic zone - A panacea for river restoration or a ticking time bomb

A0242; EGU2008-A-08866; HS7.7-1MO5P-0242
Curie, F.; Ducharme, A.; Bendjoudi, H.; Billen, G.; Viennot, P.
Ranking the factors controlling the spatio-temporal variability of nitrate retention in the Seine Basin
A0243; EGU2008-A-08667; HS7.7-1M05P-0243
TERUGGI, L. B.; Sala, S.; Vaccaro, C.; Caporali, E.; Casco, M.; Rapti-Caputo, D.; Kristensen, M.; Cefarelli, A.; Segura, M. A.
Monitoring fluvial ecosystem: the Río Quequén Grande, Argentina.

A0244; EGU2008-A-02695; HS7.7-1M05P-0244
Gob, F.; Albert, M.-B.; Belliard, J.; Navratil, O.
Understanding the impact of physical alteration of streams on their biocenoses

A0245; EGU2008-A-03237; HS7.7-1M05P-0245
Radecki-Pawlik, A.; Wyzga, B.; Amirowicz, A.; Zawiejska, J.
Variation in potential fish habitats and fish community in a mountain river subjected to variable human impact

A0246; EGU2008-A-08803; HS7.7-1M05P-0246
Lane, S.N.; Buckley, C.P.; Heathwaite, A.L.; Reaney, S.M.
What makes a fish happy?: The identification of land use hotspots using inverse modeling of fish data

A0247; EGU2008-A-05040; HS7.7-1M05P-0247
Jiang, Z.; Perona, P.; Molnar, P.; Bosco, M.; Corripio, J.; Burlando, P.
Development of a comprehensive experimental installation for monitoring the morphodynamic evolution of restored river corridors

A0248; EGU2008-A-05983; HS7.7-1M05P-0248
Zarris, D.
Comparative analysis of two different methods for determining the environmental flow for a river basin in Central Greece

A0249; EGU2008-A-08900; HS7.7-1M05P-0249
Poggi, D.; Krug, C.; Katul, GG
Effective resistance of submerged vegetation: a first order approach

A0250; EGU2008-A-09977; HS7.7-1M05P-0250
ARNAUD-FASSETTA, G.; FORT, M.
Hydrogeomorphological change (AD 1855-2005), control factors and fluvial risk on an upper alpine valley floor (Guil river, Southern French Alps)

A0251; EGU2008-A-11145; HS7.7-1M05P-0251
Anlnager, C.; Sukhodolov, A.; Schnaufer, I.; Uijtewaal, W.S.J.; Rauch, H.P.
Impact of submerged groynes on the flow field – results from a field experiment at the river Spree, Germany

A0252; EGU2008-A-10553; HS7.7-1M05P-0252
Neto Santos, C.
The macroinvertibrates community associated at seagrass Halodule wrightii (Ascherson, 1868) in Mussulo Lagoon, Angola.

A0253; EGU2008-A-12173; HS7.7-1M05P-0253
Copertino, V.A.; Scavone, G.; Miraua, D.; de Bari, C.; Giosa, L.; Ermini, R.; Oliveto, G.; Masì, V.; Pannone, M.
A multilayer informative system for river morphologies study

HS9.1 Subsurface flow, solute transport, and energy processes: concepts, modelling, and observations (co-listed in SSS)

Convener: Zechner, E.
Co-Convener(s): Durner, W.
Lecture Room 30
Chairperson: DURNER, W.

13:30–13:45; EGU2008-A-02172; HS9.1-1M03Q-001
Weihermiller, L.; Polmeier, A.; van Dusschoten, D.; Vereeken, H.
Imaging water and solute fluxes in porous media by Magnetic Resonance Imaging: Experimental and modelling results

13:45–14:00; EGU2008-A-02409; HS9.1-1M03Q-002
Kodesova, R.; Kapicka, A.; Lebeda, J.; Fialova, H.; Kopac, J.; Petrovsky, E.
Experimental and numerical study of fly-ash migration in sands of various particle size distributions

14:00–14:15; EGU2008-A-04906; HS9.1-1M03Q-003
Duwig, C.; Prado, B.; Raymundo, E.; Lopez, J.; Hidalgo, C.; Muller, K.; Etchevers, J.
Herbicide fate in an allophanic soils: comparison of several experimental and data analysis techniques

14:15–14:30; EGU2008-A-00543; HS9.1-1M03Q-004
Transport of MS2 phages in the presence of kaolinite in gravel aquifer media

14:30–14:45; EGU2008-A-09139; HS9.1-1M03Q-005
Hesse, F.; Radu, FA.; Thuillier, M.; Attinger, S.
On the upscaling of the reaction-advection-diffusion equation in porous media with Monod-like kinetics

14:45–15:00; EGU2008-A-08311; HS9.1-1M03Q-006
Marnach, S.; Ippisch, O.; Bastian, P.
Simulation of CO2 sequestration in geological formations using mimetic finite difference methods

15:00–15:15; EGU2008-A-05612; HS9.1-1M03Q-007
Spaaks, J.H.; Bouten, W.
Nonlinearity in subsurface stormflow generation: comparison of an explicitly nonlinear model to a Richards equation based approach.

15:15 COFFEE BREAK

Chairperson: ZECHNER, E.

Mohrlok, U.; Radny, D.; Scheytt, T.
Experimental investigations of the dynamics of the capillary fringe

15:45–16:00; EGU2008-A-11151; HS9.1-1M04O-002
Mancarella, D.; Simeone, V.
EPR modelling of groundwater level response to precipitation

16:00–16:15; EGU2008-A-07708; HS9.1-1M04O-003
Brovelli, A.; Malaguerra, F.; Barry, D.A.
Hydrodynamic changes of saturated porous media due to biomass growth

16:15–16:30; EGU2008-A-08353; HS9.1-1M04O-004
Blum, P.; Iturralde, C.; Maier, U.; Weede, M.; Grathwohl, P.
Methods for the estimation of the mixing zones and the length of steady state contaminant plumes
16:30–16:45; EGU2008-A-07956; HS9.1-1MO4O-005
Michel, L.; Meheust, Y.; Bouquain, J.; Caudal, J.-P.; de Bremond d’Ars, J.; de Dreuzy, J.-R.; Davy, P.
Solute exchange between a fracture and the surrounding porous matrix: an analog experiment

16:45–17:00; EGU2008-A-08219; HS9.1-1MO4O-006
Dex, J.; Blaschke, A.P.
Dynamic 3D numerical Simulations of Groundwater Exchange Processes at the Danube Riverbank

17:00–17:15; EGU2008-A-08034; HS9.1-1MO4O-007
Wuttke, M. W.; Han, J.; Halisch, M.; Kessels, W.
Application of numerical modelling to support underground coalfire fighting in the Wuda coal mining area

17:15 END OF SESSION

HS9.1 Subsurface flow, solute transport, and energy processes: concepts, modelling, and observations (co-listed in SSS) – Posters

Convener: Zechner, E.
Co-Conveners(s): Durner, W.
Display Time: Monday, 08:00–19:30
Authors in Attendance: Monday, 17:30–19:00
Chairperson: DURNER, W.

A0254; EGU2008-A-01887; HS9.1-1MO5P-0254
Shahedi, K.; Torfs, P.J.; Troch, P.A.; Uijlenhoet, R.
The role of bedrock geometry on hillslope hydrological response

A0255; EGU2008-A-10561; HS9.1-1MO5P-0255
Huber, J.; Voelkel, J.; Leopold, M.
Periglacial slope deposits and saprolites controlling water discharge – results from a three years measurement on a test site in the Bavarian Forest, Germany

A0256; EGU2008-A-09531; HS9.1-1MO5P-0256
Spilotro, G.; Canora, F.; Caporale, F.; Fidelibus, M.D.
Fine soils–water interactions: study methodologies and main results.

A0257; EGU2008-A-11704; HS9.1-1MO5P-0257
Parkas, Cs.; Flachner, Zs.; Bakacsi, Zs.; Hagyó, A.; Tóth, E.; Szabó, J.; Németh, T.; Pásztor, L.
evaluation of the soil water regime of the Hungarian Bodrogköz Region at profile and sub-regional scales

A0258; EGU2008-A-07160; HS9.1-1MO5P-0258
Fumagalli, L.; Guermandi, M.; Laruccia, N.
Modeling soilwater and nitrogen balances in the Emilia-Romagna plain

A0259; EGU2008-A-10725; HS9.1-1MO5P-0259
Barontini, S.; Bacchi, B.; Ranzi, R.
Ephemeral saturated layers in the vadose zone: some theoretical results for gradually variable soils

A0260; EGU2008-A-08922; HS9.1-1MO5P-0260
De Biase, C.; Baeder-Bederski, O.; Maier, U.; Oswald, S.; Thullner, M.
Microbial contaminant degradation in vertical soil filter systems: analysis by reactive transport simulations

A0261; EGU2008-A-08310; HS9.1-1MO5P-0261
Canone, D.; Ferraris, S.; Lunati, I.; Or, D.
Characteristics of acoustic emissions during fluid front displacement in porous media

A0262; EGU2008-A-02261; HS9.1-1MO5P-0262
Anders, R.; Chrysikopoulos, C.V.
Transport of MS2 and PRD1 through saturated and unsaturated columns packed with sand

A0263; EGU2008-A-03899; HS9.1-1MO5P-0263
Pyce, O; Quinton, J.; Heathwaite, L.
Development of Fluorescent Polystyrene Microspheres as Tracers for Soil Colloids

A0264; EGU2008-A-12014; HS9.1-1MO5P-0264
Kjaergaard, C.; Mogensen, J.; Høj, A.; Petersen, C.
Effect of variable flow-pathways on in situ mobilization of soil colloids in structured soils

A0265; EGU2008-A-05104; HS9.1-1MO5P-0265
Wissmeier, L.; Barry, D.A.
Reactive transport in unsaturated soil: Comprehensive modelling of the dynamic spatial and temporal mass balance of water and chemical components

A0266; EGU2008-A-06847; HS9.1-1MO5P-0266
Robinson, C.; Barry, D. A.; Kouznetsova, I.; Gerhard, J. I.
BUCHLORAC: Program for predicting the buffer requirement for enhanced anaerobic bioremediation of chlorinated solvents

A0267; EGU2008-A-08105; HS9.1-1MO5P-0267
Bastock, J.; Romero-Gonzalez, M.; Wilson, R.
Contaminant transport and fate in engineered charcoal remediation systems

A0268; EGU2008-A-07688; HS9.1-1MO5P-0268
Brovelli, A.; Barry, D.A.
Three-dimensional reactive transport modelling in the vadose zone

A0269; EGU2008-A-02474; HS9.1-1MO5P-0269
Radu, F. A.; Attinger, S.
Simulation of multicomponent reactive solute transport in saturated/unsaturated flow by mixed finite elements (cancelled)

A0270; EGU2008-A-06172; HS9.1-1MO5P-0270
Ratč, J.; Krivic, J.
Hydrogeological evaluation of future radioactive waste repository design using finite element numerical modeling

A0271; EGU2008-A-09072; HS9.1-1MO5P-0271
Dagès, C.; Voltz, M.; Ackeber, P.; Fabre, J. C.
Simplified modelling of surface water – groundwater interactions based on coupled one-dimensional Richards and Boussinesq equations.

A0272; EGU2008-A-01612; HS9.1-1MO5P-0272
Liang, C.; Chen, J.
Analytical power series solution to the one-dimensional advection-dispersion equation with asymptotic distance-dependent dispersivity

A0273; EGU2008-A-02200; HS9.1-1MO5P-0273
Chen, J.-S.; Chen, Y.-C.; Liang, C.-P.
Analysis of chemical transport in a vertical circulation flow field

A0274; EGU2008-A-00955; HS9.1-1MO5P-0274
Chen, C.-S.; Land, C.-K.
Influence of tested interval length on and new shape factors of the multilevel slug test in a vertically heterogeneous aquifer

A0275; EGU2008-A-10433; HS9.1-1MO5P-0275
Mazi, K.; Koussis, A.
Quantitative assessment of well vulnerability by an efficient 2-D backward transport model
A0276; EGU2008-A-09011; HS9.1-1MO5P-0276
Engwer, C.; Bastian, P.; Kutanikkad, S. P.
Using Discontinuous Galerkin Methods for Numerical Upscaling in Porous Media

A0277; EGU2008-A-03255; HS9.1-1MO5P-0277
Li, H.T
Using remote sensing data to automatically calibrate a groundwater model

A0278; EGU2008-A-03956; HS9.1-1MO5P-0278
Durand, V.; Léonardi, V.; de Marsily, G.
The estimation of recharge and the roles of the weathered layers and fractures in hard-rock aquifers assessed by a finite-difference model

A0279; EGU2008-A-03679; HS9.1-1MO5P-0279
Han, J.; Wutke, M.W.; Halisch, M.; Kessels, W.
Numerical Modelling of Underground Coalfire Fighting by using saltwater in the Wuda Coal Mining Area

A0280; EGU2008-A-08844; HS9.1-1MO5P-0280
Halisch, M.; Kessels, W.; Wutke, M.W.; Han, J.
Petrophysical experiments for coalfire fighting by using saltwater in the Wuda Coal Mining Area

HS9.2 Subsurface assessment and characterisation of flow, transport, and fate using physical, chemical, and isotopic tools (co-listed SSS) – Posters
Convener: Bloem, E.
Co-Convener(s): Elsner, M., Penning, H.
Display Time: Monday, 08:00–19:30
Authors in Attendance: Monday, 17:30–19:00
Poster Area Hall A
Chairperson: PENNING, H

A0281; EGU2008-A-07973; HS9.2-1MO5P-0281
Penning, H.; Elsner, M.
Ph-value dependency of carbon and nitrogen kinetic isotope fractionation associated with hydrolysis of the phenylurea herbicide iprotruron

A0282; EGU2008-A-03873; HS9.2-1MO5P-0282
Dulinski, M.; Kapusta, M.; Karpinska-Rzepa, A.; Rozanski, K.; Witzczak, S.
Evolution of carbon isotope composition of pore waters in the unsaturated zone: open or closed system conditions?

A0283; EGU2008-A-08766; HS9.2-1MO5P-0283
Schmidt, A.; Haderlein, S.
Oxidation of Fe(II) by CC14 at iron mineral surfaces influenced by pH and organic buffers: a compound specific isotope analysis study

A0284; EGU2008-A-07762; HS9.2-1MO5P-0284
Elsner, M.; Chartrand, M.M.G.; VanStone, N.; Lacrampe Couloume, G.; Sherwood Lollar, B.
Identifying Abiotic Chlorinated Ethene Degradation: Characteristic Isotope Patterns in Reaction Products with Nanoscale Zero-Valent Iron

A0285; EGU2008-A-06292; HS9.2-1MO5P-0285
Measuring groundwater - river interaction using 222Rn tracer in karstic mediterranean environment. A case study: the Bussento river and the Policastro gulf system

A0286; EGU2008-A-03245; HS9.2-1MO5P-0286
Stadler, S.; Frechen, M.
Groundwater dynamics in flooded salt mines

A0287; EGU2008-A-01693; HS9.2-1MO5P-0287
Cucchi, F.; Franceschini, G.; Treu, F.; Zini, L.
Groundwater evolution and recharge areas for the Friuli Venezia Giulia confined and unconfined aquifers, northeast Italy

A0288; EGU2008-A-06810; HS9.2-1MO5P-0288
Möller, P.; Siebert, C.; Geyer, S.
Identification of groundwater sources by trace elements and isotopes

A0289; EGU2008-A-08383; HS9.2-1MO5P-0289
Xiaosi, Su; Xueyu, Lin; Guangcai, Hou; Weihong, Dong
Environmental isotopic composition of natural water in Ordos cretaceous groundwater basin and its significance for hydrological cycle

A0290; EGU2008-A-02514; HS9.2-1MO5P-0290
Kull, W.; Cirpka, C.A.
Determination of the full permeability tensor

A0291; EGU2008-A-10923; HS9.2-1MO5P-0291
The scale-dependent of hydraulic conductivity through pumping test in alluvial aquifer with high permeability

A0292; EGU2008-A-07855; HS9.2-1MO5P-0292
Wienhöfer, J.; Germer, K.; Färber, A.; Zehe, E.
Subsurface flow observations at a steep forested hillslope using fiber-optic fluorometry

A0293; EGU2008-A-08258; HS9.2-1MO5P-0293
Variation characteristics of hydraulic gradient and major flow direction in the landfill soils

A0294; EGU2008-A-08300; HS9.2-1MO5P-0294
Kang, D.H.; Yang, S.I.; Kim, S.S.; Park, H.I.
The variation characteristics of groundwater level with distance from shoreline in the Jeju island, Korea

A0295; EGU2008-A-06268; HS9.2-1MO5P-0295
Rubleu, R.; Bour, B.; Le Borgne, LB
Characterization of flowpaths geometry in a complex crystalline aquifer from detailed core analysis and numerical inversion of cross-boreholes flowmeter tests.

A0296; EGU2008-A-01752; HS9.2-1MO5P-0296
Adejumno, O.O.; Balogun, F.A.; Ogundare, F.O
Relating soil texture at different depths with volumetric soil water content and bulk density for central south west Nigerian soil types.

HS9.4 Fissured and karstified aquifers – Posters
Convener: Graf, T.
Co-Convener(s): Birk, S., Gabrovsek, F., Maloszewski, P.
Display Time: Monday, 08:00–19:30
Authors in Attendance: Monday, 17:30–19:00
Poster Area Hall A
Chairperson: GRAF, T.

A0297; EGU2008-A-00013; HS9.4-1MO5P-0297
Bonacci, O.
Extremely different hydrological characteristics of two neighbouring sinking karst rivers Lika and Gačka (Dinaric karst, Croatia)

A0298; EGU2008-A-06076; HS9.4-1MO5P-0298
Denic-Jukic, V.; Jukic, D.
Contribution of correlation and spectral analyses to the hydrological study of two adjacent karst springs: example of the Jadro and Žrnovnica Springs
A0299; EGU2008-A-09446; HS9.4-1MO5P-0299
Spilotto, G.; Canfora, F.; Caporale, F.; Fidelibus, M.D. Analysis of the hydrochemical data and the stable isotopes (D–18O) to characterise the recharge of the Madonna del Pollino carbonate aquifer, Southern Italy.

A0300; EGU2008-A-07236; HS9.4-1MO5P-0300

A0301; EGU2008-A-07401; HS9.4-1MO5P-0301

A0302; EGU2008-A-07680; HS9.4-1MO5P-0302
Bosc, F.P.; Chalikakis, K.; Gurk, M.; Plagnes, V.; Guerin, R. Investigating the shallow subsurface in the vicinity of a karstic reactivated sinkhole in the depression of "Loussoi" (Peloponnesus, Greece) with remote radio transmitter EM methods.

A0303; EGU2008-A-07124; HS9.4-1MO5P-0303

A0304; EGU2008-A-02122; HS9.4-1MO5P-0304
James, S.C.; Chrysikopoulos, C.V. Monodisperse and polydisperse colloid transport in saturated fractures with various orientations: Gravity effects.

A0305; EGU2008-A-04061; HS9.4-1MO5P-0305
Masser, E.; Winkler, G.; Birk, S. Scale dependency of hydraulic properties in a fractured carbonate aquifer - an example from the Eastern Alps (Austria).

A0306; EGU2008-A-09333; HS9.4-1MO5P-0306

HS9.6 Shallow and deep geothermal energy – Posters

Convener: Blum, P.
Co-Convener(s): Kolditz, O., McDermott, C.
Display Time: Monday, 08:00–19:30

Authors in Attendance: Monday, 17:30–19:00
Poster Area Hall A
Chairperson: BLUM, P.

A0307; EGU2008-A-01831; HS9.6-1MO5P-0307
Pasquale, V.; Verdoya, M.; Chiozzi, P. Thermal anomalies associated with groundwater circulation in the southern part of the Po Plain.

A0308; EGU2008-A-04960; HS9.6-1MO5P-0308

A0309; EGU2008-A-12171; HS9.6-1MO5P-0309
Bär, K.; Buss, A.; Saas, I. 3D-model of the deep geothermal potential of the federal state Hesse / Germany.

A0310; EGU2008-A-06202; HS9.6-1MO5P-0310
Grunert, A.G.; Viejo, P. Geothermal Potential Analysis of the Upper Rhine Valley

A0311; EGU2008-A-05053; HS9.6-1MO5P-0311
Blumenthal, M.; Kühn, M.; Pape, H.; Rath, V.; Clauser, C. Numerical modelling of hydraulic and thermal processes in the deep heat reservoir of the EGS test site Soultz-sous-Forêts, France.

A0312; EGU2008-A-08540; HS9.6-1MO5P-0312
Koch, A.; Jorand, R.; Pechnig, R.; Clauser, C. Thermal properties of Tertiary sediments of the Lower Rhine Basin (Germany).

A0313; EGU2008-A-03045; HS9.6-1MO5P-0313
Thomas, R.; Schulz, R. Reflection seismic investigations for the Unterhaching geothermal power plant.

A0314; EGU2008-A-06532; HS9.6-1MO5P-0314
Rumpel, H.-M.; Beilcke, T.; Busch, H.; Musmann, P.; von Hartmann, H. Reduce the risk of finding a deep geothermal reservoir by means of 3D seismics.

A0315; EGU2008-A-08825; HS9.6-1MO5P-0315
Lem, S.; Wandrey, M.; Würdemann, H.; Seibt, A.; Wolfgramm, M. Microbial investigations in geothermal used groundwater systems.

A0316; EGU2008-A-04311; HS9.6-1MO5P-0316
Musuzaa, J.; Attinger, S.; Radu, F. A new stability criterion for density-driven flows in the framework of a two-scale expansion.

A0317; EGU2008-A-02169; HS9.6-1MO5P-0317
Mottaghy, D.; Dijkstraan, L. Implementing a new effective finite difference formulation for borehole heat exchangers into a heat transport code.

A0318; EGU2008-A-12119; HS9.6-1MO5P-0318
Bayer, P.; Molina, N.; Hecht, J.; Rasouli, P.; Zheng, C.; Blum, P. Geothermal modelling using MT3DHEAT

HS10.16 Prediction and management of water quality on the catchment scale

Convener: Rode, M.
Co-Convener(s): Fohrer, N., Bormann, H., Bogaia, H., Abbaspour, K.
Lecture Room 29
Chairperson: N.N.

8:30–8:45; EGU2008-A-02699; HS10.16-1MO1O-001
Worrall, F. The fluvial flux of carbon from the UK – controls and processes (solicited).

8:45–9:00; EGU2008-A-11609; HS10.16-1MO1O-002
Breuer, L.; Frede, H.-G. The role of organic nitrogen in the nitrogen cycle of developed landscapes.

9:00–9:15; EGU2008-A-12128; HS10.16-1MO1O-003
9:15–9:30; EGU2008-A-03024; HS10.16-1MO1O-004
Groenendijk, P.; Renaud, L.V.; Walvoort, D.J.J.; Bijlsma, R.M.
Uncertainty assessment of nutrient loads and nutrient losses at catchment scale by detailed mechanistic models

9:30–9:45; EGU2008-A-04581; HS10.16-1MO1O-005
Ulrich, A.; Volk, M.
Influence of the parameterisation of land management practices and the uncertainty of monitoring data on SWAT model calibration and evaluation

9:45–10:00; EGU2008-A-10329; HS10.16-1MO1O-006
Peña-Haro, S.; Pulido-Velazquez, M.; Sahuquillo, A.
A hydro-economic modelling framework for reducing groundwater nitrate concentration from agricultural sources

10:00 COFFEE BREAK

Chairperson: N.N.

10:30–10:45; EGU2008-A-12271; HS10.16-1MO2O-001
van Griensven, A.
Integrating river water quality processes in catchment modelling for ecological risk assessment (solicited)

10:45–11:00; EGU2008-A-06064; HS10.16-1MO2O-002
Rode, M.; Wagenschein, D.; Kebede, T.
Modelling in-stream nitrogen retention in the 4th order lowland river Weisse Elster, Germany

11:00–11:15; EGU2008-A-04125; HS10.16-1MO2O-003
Loos, S.; Middelhoek, H.; van Beek, L.P.H.; van der Perk, M.
Modelling seasonal nutrient fluxes in large river basins: Rhine case study

11:15–11:30; EGU2008-A-02221; HS10.16-1MO2O-004
Leu, C.; Schneider, M.K.; Stamm, C.
The Base Flow Index and the volume of fast flow as proxies for the susceptibility of catchments to diffuse herbicide losses to surface waters

11:30–11:45; EGU2008-A-06912; HS10.16-1MO2O-005
Frey, M. P.; David, T.; Schneider, M. K.; Dietzel, A.; Reichert, P.; Stamm, C.
Using hydrological modelling to account for uncertainty in the prediction of contributing areas for diffuse herbicide losses to surface waters

11:45–12:00; EGU2008-A-04148; HS10.16-1MO2O-006
Isermann, I.
Sustainable mitigation and land use options for human health and environmental quality in respect to the nutrition system and the nutrients C, N, P, S

12:00 END OF SESSION

HS10.16 Prediction and management of water quality on the catchment scale – Posters

Convener: Rode, M.
Co-Convener(s): Fohrer, N., Bornmann, H., Bogena, H., Abbaspour, K.
Display Time: Monday, 08:00–19:30
Authors in Attendance: Monday, 17:30–19:00
Poster Area Hall A

10:00–10:45 (10 posters)

Hahn, C.; Prasuhn, V.; Stamm, C.; Schulin, R.
Prediction of contributing areas for P losses from agricultural land – an outline

10:30–10:45; EGU2008-A-03487; HS10.16-1MO5P-0320
Hejduk, L.; Banasik, K.
Dissolved phosphorus and nitrates concentration in a lowland rural river

10:45–11:00; EGU2008-A-03508; HS10.16-1MO5P-0321
Hejduk, L.
Phosphorus fractionation in sediments of small agricultural rivers

11:00–11:15; EGU2008-A-07751; HS10.16-1MO5P-0322
Schmalz, B.; Bieger, K.; Grudzinski, A.; Fohrer, N.; Hafemann, G.
Water quality monitoring in a lowland river catchment - joint analysis of the stream, its tributaries and connected eutrophic lakes

11:15–11:30; EGU2008-A-10554; HS10.16-1MO5P-0323
Tramblay, YT; Saint-Hilaire, A; Ouarda, TBMJ
Frequency-Magnitude of extreme events of suspended sediment concentration and load: Regional estimation for 22 rivers in California

11:30–11:45; EGU2008-A-11023; HS10.16-1MO5P-0324
Gnecco, I.; Lanza, LG; Sansalone, JJ; La Barbera, P
The potential impact of storm water runoff on the quality of receiving water bodies

11:45–12:00; EGU2008-A-11868; HS10.16-1MO5P-0325
Bouraoui, F.; Grizzetti, B.; Aloe, A.
Water and nutrients input into the Mediterranean Sea

12:00–12:15; EGU2008-A-01661; HS10.16-1MO5P-0326
Moravcová, J.; Pavlííek, T.; Koupílová, M.; Kvítek, T.; Váchal, J.
Monitoring and valuation of selected indicators of water quality and nutrients loss by extreme rainfall-drain events in dependence on cultures representation in small catchment

12:15–12:30; EGU2008-A-00674; HS10.16-1MO5P-0327
Voístinova, E.
Estimation of water quality the river Tom and regional problems of water use (for example of the town Tomsk, West Siberia)

12:30–12:45; EGU2008-A-03070; HS10.16-1MO5P-0328
van der Heijden, S.; Haberlandt, U.
The Influence of spatial Interpolation Methods for Climate Variables on Runoff and Nitrate Fate

12:45–13:00; EGU2008-A-04642; HS10.16-1MO5P-0329
Rothwell, J.J.; Futter, M.; Íise, N.B.
Predicting nitrogen leaching in European forests using linear and non-linear statistical methods

13:00–13:15; EGU2008-A-07788; HS10.16-1MO5P-0330
Parisí, S.; Mongelli, G.; Paternoster, M.
Geochemical groundwaters quality of a volcanic area: Mount Vulture (southern Italy)

13:15–13:30; EGU2008-A-09378; HS10.16-1MO5P-0331
Lo Porto, A.; De Girolamo, A.M.; Zaccoco, S.; Usai, D.; Aiello, M.
Selection and assessment of alternative land use and management scenarios in a water-scarce area in the Mediterranean (Sardinia, Italy) to improve quality and quantity of available surface water resources

13:30–13:45; EGU2008-A-09285; HS10.16-1MO5P-0332
Spilotro, G.; Canora, F.; Caporale, F.; Fidelibus, M.D.
Determination of nitrate pollution due to agricultural activities in the Ionian coastal plain aquifer (Basilicata, Southern Italy)

13:45–14:00; EGU2008-A-07747; HS10.16-1MO5P-0333
Selection and assessment of alternative land use and management scenarios in a water scarce area in the Mediterranean (Sardinia, Italy) to improve quality and quantity of available surface water resources

14:00–14:15; EGU2008-A-07747; HS10.16-1MO5P-0334
Moravcová, J.; Pavlííek, T.; Koupílová, M.; Kvítek, T.; Váchal, J.
Monitoring and valuation of selected indicators of water quality and nutrients loss by extreme rainfall-drain events in dependence on cultures representation in small catchment
Simulating soil chemical responses to high atmospheric S, N and Ca deposition in a Masson pine forest ecosystem in south China using the nutrient cycling model, NuCM

Site classification with regard to risk for diffuse pollution

The FOOT-CRS tool: Pesticide risk assessment and management in the EU at the catchment scale

Impact of pesticides on the groundwater resources in intensive irrigated areas of Argentina and Chile

GIS-based estimation of pesticide input into surface water in Switzerland

Application of a hydrologic model (SWAT) for the simulation of the water and nutrient balance in a water stressed / data scarce catchment (Merguellil- Tunisia)

Tuesday

IS22 - HS2.1/NP1.05 Climate, Water and Health (co-organised by HS & NP)

Chairperson: Christakos, G.

Convener: Christakos, G.
Co-Convener(s): Carsteanu, A., Bardossy, A., Papalexiou, S., Koutsioyiannis, D.

8:30–9:00; EGU2008-A-00368; IS22 - HS2.1/NP1.05-1TU1O-001
El Adlouni, E.A.; Bayentin, L.B.; Ouarda, T.O.; Gosselin, P.G.
Assessment of Climate effects on morbidity in Quebec (Canada) over last 20 years (solicited)

9:00–9:15; EGU2008-A-00870; IS22 - HS2.1/NP1.05-1TU1O-002
Mekaru, S.; Ozonoff, A.
Temporal association of major waterborne disease outbreaks and heavy precipitation events

9:15–9:30; EGU2008-A-00098; IS22 - HS2.1/NP1.05-1TU1O-003
Yu, H.-I; Choi, K-M; Christakos, G.
Climate issues of influenza mortality risks

9:30–9:45; EGU2008-A-00815; IS22 - HS2.1/NP1.05-1TU1O-004
Khabarova, O.V.; Ragulskaya, M.V.; Babayev, E.S.
Human sensitivity to environmental parameters’ changes in dependence on geographic latitude (results of international experiment). (solicited)

9:45–10:00; EGU2008-A-04587; IS22 - HS2.1/NP1.05-1TU1O-005
Bertuzzo, E.; Azalee, S.; Maritan, A.; Gatto, M.; Rodriguez Iturbe, I.; Rinaldo, A.
Hydrologic control on the spreading of diseases: on the space-time evolution of a cholera epidemic

10:00 COFFEE BREAK

Chairperson: WU, J.

10:30–11:00; EGU2008-A-00218; IS22 - HS2.1/NP1.05-1TU2O-001
Sivakumar, B.
Climate change and the impacts on water resources: a case for nonlinear data downscaling approaches (solicited)

11:00–11:15; EGU2008-A-11108; IS22 - HS2.1/NP1.05-1TU2O-002
Akanda, A; Jutla, A; Islam, S
Understanding the seasonality of Cholera transmission in South Asia: role of Hydroclimatology

11:15–11:30; EGU2008-A-08007; IS22 - HS2.1/NP1.05-1TU2O-003
Kolovos, A.; Yu, H.-L.
Knowledge Synthesis-Based Tool Development for Spatiotemporal Analysis

11:30–11:45; EGU2008-A-00924; IS22 - HS2.1/NP1.05-1TU2O-004
Fasbender, D.; Peeters, L.; Bogaert, P.; Dassargues, A.
Bayesian data fusion applied to water table spatial mapping

11:45–12:00; EGU2008-A-12311; IS22 - HS2.1/NP1.05-1TU2O-005
A Decision Aid Tool for the management of coastal aquifers based on sea-intrusion control through recharge with treated wastewater and desalination of brackish groundwater

12:00 LUNCH BREAK

Chairperson: CHRISTAKOS, G.

13:30–14:00; EGU2008-A-00394; IS22 - HS2.1/NP1.05-1TU3O-001
Huang, F.; Wu, J.
Assessment of the relationship between land use, climate and surface water quality in Hangzhou, China (solicited)

14:00–14:15; EGU2008-A-00725; IS22 - HS2.1/NP1.05-1TU3O-002
Montosi, E.; Manzoni, S; Montanari, A; Porporato, A
Modeling hydro- climatic controls on seasonal malaria dynamics

14:15–14:30; EGU2008-A-02284; IS22 - HS2.1/NP1.05-1TU3O-003
Tonini, M.; Maignan, I.; Sharshenova, A.; Shilinovsov, V.; Ten, E.; Kanevski, M.
Health risk assessment of the population of Bishkek. Spatio-temporal analysis of cancer clusters

14:30–14:45; EGU2008-A-02504; IS22 - HS2.1/NP1.05-1TU3O-004
Hristopoulos, D.T.; Elgone, S.N.
Fast Spatial Interpolation using Spartan Random Fields with Environmental Health Applications
IS22 - HS2.1/NP1.05 Climate, Water and Health (co-organised by HS & NP) – Posters

Convener: Christakos, G.
Co-Conveners: Carrasteau, A., Bardossy, A., Papalexiou, S., Koutsoyiannis, D.
Display Time: Tuesday, 08:00–19:30

Authors in Attendance: Tuesday, 17:30–19:00
Poster Area Hall A
Chairperson: Papalexiou, S-M

A0214; EGU2008-A-10529; IS22 - HS2.1/NP1.05-1TU5P-0214
Serre, M.L.; Akita, Y.; Escamilla, V.; Emch, M.; Kolovos, A.
Spatial analysis of arsenic exposure and diarreal disease risk in Bangladesh related to population pressures on groundwater resources

A0215; EGU2008-A-01944; IS22 - HS2.1/NP1.05-1TU5P-0215
Borbora, M.J.; Hayden, M.; Mejia, R.; Stewart, A.
Climate variability in the North Andes, implications for human health

A0216; EGU2008-A-00254; IS22 - HS2.1/NP1.05-1TU5P-0216
Ma, C.
Spatial-temporal random fields with discrete ARMA temporal margins (solicited)

A0217; EGU2008-A-00076; IS22 - HS2.1/NP1.05-1TU5P-0217
Porcu, E.; Mateu, J.; Christakos, G.
New space-time models with non Euclidean metrics for studying integrated climate-water-health systems (solicited)

A0218; EGU2008-A-12006; IS22 - HS2.1/NP1.05-1TU5P-0218
Zarkadoulas, N.; Koutsoyiannis, D.; Mamassis, N.; Papalexiou, S. M.
Climate, water and health in ancient Greece

A0219; EGU2008-A-03168; IS22 - HS2.1/NP1.05-1TU5P-0219
Malkhazova, S.M.; Prasolova, A.I.
Creation of the medical-demographic atlas

A0220; EGU2008-A-12235; IS22 - HS2.1/NP1.05-1TU5P-0220
Modis, K.
How many samples are enough? A theoretical determination of optimal sampling density in environmental-health applications (solicited)

A0221; EGU2008-A-12241; IS22 - HS2.1/NP1.05-1TU5P-0221
Berdeja-Sotelo, I.A.; Christakos, G.; Carsteau, A.A.
Algorithmic pattern identification in pollution-precipitation dynamics from Mexico City

A0222; EGU2008-A-05346; IS22 - HS2.1/NP1.05-1TU5P-0222
Svireev, Z.; Vukadinov, J.; Krsric, S.; Stefan-Mikic, S.; Markovic, S.B.
Distribution of leptospirosis in freshwaters of Vojvodina region, Serbia

A0223; EGU2008-A-11899; IS22 - HS2.1/NP1.05-1TU5P-0223
Manariotis, I.D.; Yiannopoulos, A.Ch.; Chrysikopoulos, C.V.
Performance of a solar reactor for anaerobic wastewater treatment under different climatic conditions

A0224; EGU2008-A-11908; IS22 - HS2.1/NP1.05-1TU5P-0224
Rieckermann, J.; Christakos, G.
Sewage epidemiology – assessing community health factors by wastewater monitoring

A0225; EGU2008-A-00970; IS22 - HS2.1/NP1.05-1TU5P-0225
Duhan, S.
Solar activity declination in the near future and its consequences in hydro meteorological processes. (solicited)

A0226; EGU2008-A-01196; IS22 - HS2.1/NP1.05-1TU5P-0226
Kim, B.S.; Kim, B.K.; Kim, H.S.; Yoon, S.Y.; Sivakumar, B.
Impact assessment of climate change on occurrence of weather events in South Korea using extreme indices

A0227; EGU2008-A-01197; IS22 - HS2.1/NP1.05-1TU5P-0227
Kim, B.S.; Kim, B.K.; Kyung, M.S.; Kim, H.S.; Sivakumar, B.
Estimation of Change in Extreme Rainfall Across Korea under Climate Change using Bartlett-Lewis Rectangular Pulses Model (BLRPM) and Adjusting Method

A0228; EGU2008-A-01094; IS22 - HS2.1/NP1.05-1TU5P-0228
Sivakumar, B.; Kim, H.S.; Kim, B.S.; Kyoung, M.S.; Kim, B.K.
Incorporating climate change in water resources planning and management: scientific challenges and beyond

A0229; EGU2008-A-01014; IS22 - HS2.1/NP1.05-1TU5P-0229
Zhang, X. D.; Huang, G. H.
Inexact multicriteria decision analysis for climate change impacts on small drinking water systems

A0230; EGU2008-A-07347; IS22 - HS2.1/NP1.05-1TU5P-0230
Rapti-Caputo, D.; Vaccaro, C.
Influence of climatic and human activities on the salinization process in two coastal aquifer systems of Sicily (Italy)

A0231; EGU2008-A-00202; IS22 - HS2.1/NP1.05-1TU5P-0231
Nazarenko, O.
Climate change during second half of the XX century and its influence on the transformation of groundwater recharge in Rostov region

A0232; EGU2008-A-01051; IS22 - HS2.1/NP1.05-1TU5P-0232
Acar, R.; Penacak, S.
Detection of statistically significant trends in the short duration rainfalls (sdr) of Adana city

A0233; EGU2008-A-02974; IS22 - HS2.1/NP1.05-1TU5P-0233
Kim, B.S.; Kim, B.K.; Kim, H.S.
Evaluation of Spatial Rainfall Data Uncertainties in Distributed Rainfall-Runoff Model Using Meta-Gaussian approach

A0234; EGU2008-A-11875; IS22 - HS2.1/NP1.05-1TU5P-0234
Amini, M.; Mueller, K.; Abbaspour, K.c.; Johnson, A.C.
Statistical modelling of global geogenic fluoride contamination in groundwaters
A0235; EGU2008-A-00367; IS22 - HS2.1/NP1.05-1TU5P-0235
Bogaert, P.; Fasbender, D.
Multivariate prior distributions using the maximum entropy principle: implementation and benefits for spatial prediction

A0236; EGU2008-A-00694; IS22 - HS2.1/NP1.05-1TU5P-0236
Effective hydrogeological parameter estimation with a novel modified Tabu search algorithm

A0237; EGU2008-A-06922; IS22 - HS2.1/NP1.05-1TU5P-0237
Kanevski, M.; Pozdnoukhov, A.; Timonin, V.; Foresti, L.
Predictive Modeling of Geospatial Data with Machine Learning Algorithms

A0238; EGU2008-A-00628; IS22 - HS2.1/NP1.05-1TU5P-0238
Ranjineh Khojasteh, E.; Sauter, M.
Stochastic modeling of hydrogeological and geological features in a changing environment

A0239; EGU2008-A-00093; IS22 - HS2.1/NP1.05-1TU5P-0239
Modis, K.; Vatalis, K.; Papantonopoulos, G.; Sachanidis, Ch.
Uncertainty management of a hydrogeological data set in a lignite basin, using BME

A0240; EGU2008-A-00759; IS22 - HS2.1/NP1.05-1TU5P-0240
Lee, S.J.; Wentz, E.A.; Gober, P.
Extrapolation mapping of water demand: Case study using historical water use data in Phoenix, Arizona

A0241; EGU2008-A-03865; IS22 - HS2.1/NP1.05-1TU5P-0241
Zukovic, M.; Hristopulos, D.T.
A Non-Parametric Approach for the Conditional Simulation of Large Environmental Data Sets based on Statistical Physics Models and an Application to the Walker Lake Data

A0242; EGU2008-A-11499; IS22 - HS2.1/NP1.05-1TU5P-0242
Mena-Lorca, J.; Carsteau, A.A.; Ramos-Jiliberto, R.; Morales-Alvarez, W.
Statistical characterization of the dynamics of lake plankton populations

A0243; EGU2008-A-00281; IS22 - HS2.1/NP1.05-1TU5P-0243
Varouchakis, E.A.; Hristopulos, D.T.
Geostatistical study of groundwater level variability in the Messara valley of Crete

A0244; EGU2008-A-00355; IS22 - HS2.1/NP1.05-1TU5P-0244
Tartakovsky, D.M.
Environmental decision support systems

A0245; EGU2008-A-12126; IS22 - HS2.1/NP1.05-1TU5P-0245
Paleologos, E.K.; Schwabedissen, R.
Effect of Probability Models and Loss Functions on Decisions in Emission Control Problems

A0246; EGU2008-A-00208; IS22 - HS2.1/NP1.05-1TU5P-0246
Betancourt B., J.; Ortiz, E.; González, A.; Brito, H.; Varela, Y.
Interdisciplinary strategy against environmental affections from communities

HS5.1 Science for improved sediment and habitat management in aquatic ecosystems (co-listed in GM & SSS) – Posters

HS5.1 Science for improved sediment and habitat management in aquatic ecosystems (co-listed in GM & SSS) – Posters

15:00 END OF SESSION
A0250; EGU2008-A-03577; HS5.1-ITUSP-0250
Priadi, C.; Ayrault, S.; Robin, E.; Bonté, P.; Franke, C.; Morin, G.
Characterisation of trace metal carriers in the Seine River sediments

A0251; EGU2008-A-03650; HS5.1-ITUSP-0251
Eder, A.; Krueger, T.; Strauss, P.; Quinton, J.N.
Evaluation of a discharge-sediment hysteresis model to calculate catchment sediment load

A0252; EGU2008-A-03701; HS5.1-ITUSP-0252
Carraz, F.; Taylor, K.G.; Drew, I.B.; Owens, P.
Geochemistry and speciation of phosphorus in an urban river basin: implications for sustainable water management

A0253; EGU2008-A-03877; HS5.1-ITUSP-0253
Gintz, D.; Beylich, A.A.; Zippel, B.; Kaute, K.
Detection of stable and mobile channel units using biofilm analysis in cold environments

A0254; EGU2008-A-04470; HS5.1-ITUSP-0254
Owens, P.N.
Sediment management at the river basin scale: recommendations of the European Sediment Network

A0255; EGU2008-A-04636; HS5.1-ITUSP-0255
Rothwell, J.J.; Shotbolt, L.A.; Evans, M.G.; Allott, T.E.H.
Particulate lead export from contaminated peatlands

A0256; EGU2008-A-05566; HS5.1-ITUSP-0256
van der Perk, M.; Straatsma, M.; Middelkoop, H.; van den Brink, N.G.M.
Quantification of fine sediment retention in the Rhine delta using a two-dimensional floodplain sedimentation model

A0257; EGU2008-A-05649; HS5.1-ITUSP-0257
Grauso, S.; Fattoruso, G.; Crocetti, C.; Montanari, A.
Estimating the suspended sediment yield by means of geomorphic parameters and regression relationships

A0258; EGU2008-A-07070; HS5.1-ITUSP-0258
Mosaedi, A.; Alaghmand, S.; Mohammadi, A.
Estimation of Transported Sediment Load

A0259; EGU2008-A-07287; HS5.1-ITUSP-0259
Navratil, O.; Esteves, M.; Nemery, N.; Legout, C.; Poirel, A.; Gratiot, N.; Belleudy, P.
Multi-scale survey of Suspended Sediment Concentration in the Bleone river basin (Southern French Alps)

A0260; EGU2008-A-09752; HS5.1-ITUSP-0260
Blake, W.H.; Pillidge, S.; Gehrels, W.R.; Masselink, G.; Bugler, M.; Stocker, J.
Evaluating the downstream consequences of agriculture in a rural river-estuary system

A0261; EGU2008-A-10764; HS5.1-ITUSP-0261
Neto, S.
Water cycle, scales and vulnerability

A0262; EGU2008-A-10782; HS5.1-ITUSP-0262
Camkin, J.; Bristow, K.
Dealing with complexity and uncertainty: frameworks to support irrigation and water management decision-making in northern Australia

A0263; EGU2008-A-10793; HS5.1-ITUSP-0263
Camkin, J.; Bristow, K.
Where to now for irrigation in northern Australia: Reflections, findings, challenges and opportunities arising from the Northern Australia Irrigation Futures project

A0264; EGU2008-A-11110; HS5.1-ITUSP-0264
Petticrew, E.L.; Williams, N.D.
Techniques for tracing organic matter between terrestrial and aquatic environments

A0265; EGU2008-A-11473; HS5.1-ITUSP-0265
Blanpain, O.; Goncalves, G.; Masson, E.
Polluted sediment management: from logistic optimization to decision making

HS5.3 Sediment dynamics during extreme events

Convener: Rickenmann, D.
Co-Convener(s): Bathurst, J., Esteves, M.
Lecture Room: 33
Chairperson: ESTEVES, M.
15:30–15:45; EGU2008-A-04684; HS5.3-ITUSP-001
Krapesch, G.; Habersack, H.
Morphological processes and parameters of extreme floods

15:45–16:00; EGU2008-A-06867; HS5.3-ITUSP-002
Matyhs, N.; Esteves, M.; Klots, S.
Water and sediment yield during extreme events in mountainous marly catchments (Draix, Alpes-de-Haute-Provence, France)

16:00–16:15; EGU2008-A-04713; HS5.3-ITUSP-003
Milan, D J; Heritage, G L
Impacts of a severe flood event upon channel morphology in an upland stream

16:15–16:30; EGU2008-A-02605; HS5.3-ITUSP-004
Rickenmann, D.; Koschni, A.; Canuto, N.
Sediment transport and debris flows during the floods of August 2005 in Switzerland

16:30–16:45; EGU2008-A-12073; HS5.3-ITUSP-005
Gautier, J.N.; Rodrigues, S.; Jugé, P.; Peters, J.J.
Sediment transport processes during flood events in the Middle Loire: gauging and first results

16:45–17:00; EGU2008-A-04907; HS5.3-ITUSP-006
Tramblay, YT; Saint-hilaire, AST; Ouarda, TBMJO
Regional frequency analysis of extreme suspended sediment concentration: Comparison of methods in North America

17:00 END OF SESSION

HS5.3 Sediment dynamics during extreme events – Posters

Convener: Rickenmann, D.
Co-Convener(s): Bathurst, J., Esteves, M.
Display Time: Tuesday, 08:00–19:30
Authors in Attendance: Tuesday, 17:30–19:00
Poster Area Hall A
Chairperson: RICKENMANN, D.

A0266; EGU2008-A-01982; HS5.3-ITUSP-0266
Klenov, V.I.
Virtual Nature Systems for debris flows evaluation

A0267; EGU2008-A-08908; HS5.3-ITUSP-0267
Bacchi, V.; Naaim-Bouvet, F.; Mathys, N.; Pilotti, M.
High suspended sediment concentration during extreme events: laboratory experiments for the determination of the hydraulic behaviour of hyperconcentrated flows.

A0268; EGU2008-A-02772; HS5.3-ITUSP-0268
Liébault, F.; Waeckel, C.; Klots, S.
Sediment supply during flow events in a small experimental upland catchment

A0269; EGU2008-A-04015; HS5.3-ITUSP-0269
Turowski, JM; Badoux, A; Rickenmann, D; McArdell, BW
Initiation of bedload transport in the Erlenbach, Switzerland
A0270; EGU2008-A-07927; HS5.3-1TU5P-0270

a. Recking, a. R.

Relations between bed forms and bed load transport rate on steep slopes

A0271; EGU2008-A-03473; HS5.3-1TU5P-0271

Chiari, M.; Rickenmann, D.

LiDAR based estimation of morphologic changes during a flood event and comparison with bedload transport volumes determined by a simulation model

A0272; EGU2008-A-07264; HS5.3-1TU5P-0272

Hauer, C.; Habersack, H.

Morphodynamics of a 1000-year flood in the Kamp River, Austria and impacts on valley morphology

A0273; EGU2008-A-03622; HS5.3-1TU5P-0273

Salemi, E.; Preciso, E.; Billi, P.

The problem of estimating bed-load transport: a comparison between field measures and equations for two sand-bed Italian rivers

A0274; EGU2008-A-06489; HS5.3-1TU5P-0274

Frings, R.M.; Berbee, B.M.; Erkens, G.; Kleinmans, M.G.

Flow and sediment properties of the river Rhine during floods: a reconstruction of historical changes due to human impact

A0275; EGU2008-A-06416; HS5.3-1TU5P-0275

Frings, R.M.; Kleinmans, M.G.; Vollmer, S.

The pore structure of the river bed

A0276; EGU2008-A-08584; HS5.3-1TU5P-0276

Fernandes, J.; Rocha, J.

Analysis of the River Tagus bed variation during the last 20 years

A0277; EGU2008-A-11683; HS5.3-1TU5P-0277

Teodor, S.

Solid flood, major source for reservoir silting

HS7.2 Lakes and Inland Seas under Anthropogenic Pressure and Climate Change – Posters

Convenor: Zavialov, P.
Co-Conveners: Friedrich, J.

Lecture Room 32
Chairperson: N.N.
Display Time: Tuesday, 08:00–19:30
Authors in Attendance: Tuesday, 17:30–19:00
Poster Area Hall A
Chairperson: N.N.

A0278; EGU2008-A-08332; HS7.2-1TU5P-0278

Crétaux, J.-F.; Bergé-Nguyen, M.; Cazenave, A.

Combining of Radar altimetry, and MODIS imagery for the monitoring of surface water over central Asian lakes and reservoirs.

A0279; EGU2008-A-11808; HS7.2-1TU5P-0279

Lebedev, S.A.

Application of the satellite altimetry and radiometry for analysis of anthropogenic pollutants of the Caspian Sea

A0280; EGU2008-A-11814; HS7.2-1TU5P-0280

Lebedev, S.A.; Ostroumova, L.P.; Sirota, A.M.

Seasonal and Interannual Variability of the Caspian Sea Evaporation on Remote Sensing Data

A0281; EGU2008-A-06701; HS7.2-1TU5P-0281

Ishniyazov, D.; Pinkhasov, B.; Ni, A.; Preduinenko, T.; Petrov, M.

Halogenesis in Akpetky archipelago (eastern part of the Aral Sea)

A0282; EGU2008-A-12080; HS7.2-1TU5P-0282

Kurbaniyazov, A.K.; Zhakypova, A.Zh.

Artificial small lakes in Amudarya delta

A0283; EGU2008-A-07371; HS7.2-1TU5P-0283

Roget, E.; Muñiz, M.A.; Zavialov, P.

Mixing related to internal waves and gares in the western lobe of the Large Aral Sea

A0284; EGU2008-A-02601; HS7.2-1TU5P-0284

Zavialov, P.

The continuing tale of the dying Aral Sea: Recent developments

A0285; EGU2008-A-04310; HS7.2-1TU5P-0285

Sklyarov, V.E.

Aral sea: dust storms and upwellings

A0286; EGU2008-A-03540; HS7.2-1TU5P-0286

Neiman, V.G.; Byshve, V.I.; Romanov, Ju.A.

On essential distinction of the regional effects of the Indian monsoon and El Niño before and after seventies

A0287; EGU2008-A-09312; HS7.2-1TU5P-0287

Pelevin, V.; Karlsen, G.; Abramov, O.


A0288; EGU2008-A-00497; HS7.2-1TU5P-0288

Möller, O.; Vaz, A.; Castello, J.

The effect of river discharge on the interannual and longer term variability of shrimp production in Patos lagoon (30 S, Brazil)
A0289; EGU2008-A-07314; HS7.2-1TU5P-0289
Turunçölü, U. U.; Dalfes, H. N.
Modeling historical lake level fluctuations for Lake Van (Turkey).

A0290; EGU2008-A-04066; HS7.2-1TU5P-0290
Chalupova, D.; Jansky, B.
Anthropogenic impact on fluvial lakes in the Czech Elbe River section

A0291; EGU2008-A-06656; HS7.2-1TU5P-0291
Boehler, B.; Schultze, M.
Meromixis, anthropogenic impact and climate change

A0292; EGU2008-A-04161; HS7.2-1TU5P-0292
Kneis, D.; Bronstert, A.
Water quality modelling for shallow river-lake systems: Application for the Havel

A0293; EGU2008-A-00073; HS7.2-1TU5P-0293
Melentyev, K.; Melentyev, V.; Pettersson, L.
Climate change and modification of the inland water bodies ice regime in the moderate climatic zone

A0294; EGU2008-A-10971; HS7.2-1TU5P-0294
Variation characteristics of soil organic carbon and carbon dioxide in the constructed wetland at the Goheung bay

HS7.3 Wetland ecohydrology: interactions and feedbacks between water table, soil moisture, and vegetation (co-listed in BG) – Posters

Conveners: Tamea, S.
Co-Conveners: D’Odorico, P., Laio, F., Loheide, S.
Display Time: Tuesday, 08:00–19:30
Authors in Attendance: Tuesday, 17:30–19:00
Poster Area Hall A
Chairperson: LOHEIDE, S.

A0295; EGU2008-A-00756; HS7.3-1TU5P-0295
Gribovskzi, Z.; Kalicz, P.; Kucarsa, M.; Szilágyi, J.
Calculation of riparian evapotranspiration from diurnal rhythm of groundwater level and baseflow

A0296; EGU2008-A-01656; HS7.3-1TU5P-0296
Robroek, B.J.; Limpens, J.; Schouten, M.G.
Patch size and species identity affect the hydrology along the surface on Sphagnum dominated peatlands

A0297; EGU2008-A-02149; HS7.3-1TU5P-0297
Bufkova, I.; Stibal, F.; Mikulaskova, E.
Ecology of drained mires in the Sumava National Park (Czech Republic) and possibilities for restoration

A0298; EGU2008-A-02622; HS7.3-1TU5P-0298
Griessler Bule, B.; Smolar-Zvanut, N.; Sajan Slatk, A.; Vrhovsek, D.
Ecoremediation – a new concept of ecosystem technologies

A0299; EGU2008-A-02741; HS7.3-1TU5P-0299
Ralestrini, R.; Arese, C.; Delconte, C.; Trevisan, M.; Calliera, M.
Biogeochemical and hydrological control of nitrate transport in a freshwater wetland in the Ticino catchment (Italy).

A0300; EGU2008-A-05009; HS7.3-1TU5P-0300
Vervoort, R.W.; Vanderzee, S.E.
Modeling the effect of capillary rise from ground water on probabilistic soil moisture dynamics

A0301; EGU2008-A-05365; HS7.3-1TU5P-0301
Montalto, F.A.; Parlane, JY; Steenhuis, TS
An Analytical Model of Tidal Marsh Water Table Fluctuations

A0302; EGU2008-A-05761; HS7.3-1TU5P-0302
Marconi, V.; Antonellini, M.; Laghi, M.; Minchio, A.; Savelli, D.
A water table fluctuations model in sandy soil below a coastal pine forest

A0303; EGU2008-A-06559; HS7.3-1TU5P-0303
Balasooriya, W.K.; Denef, K.; Peters, J.; Verhoeest, N.E.C.; Boecxk, P.
Hydrological control on vegetation composition and soil microbial community structure in a temporary wetland (Ghent, Belgium)

A0304; EGU2008-A-07664; HS7.3-1TU5P-0304
Brovelli, A.; Baechler, S.; Rossi, L.; Barry, D. A.
Integrated simulation of horizontal flow constructed wetlands

A0305; EGU2008-A-08208; HS7.3-1TU5P-0305
Doubkova, M.; Bartisch, A.; Sabel, D.; Pathe, C.; Wagner, W.
Okavango Wetland Phenology studied with MODIS Operational Products and ENVISAT ASAR Wetness Product

A0306; EGU2008-A-11415; HS7.3-1TU5P-0306
Globevnik, L.; Božič, G.; Vilhar, U.
Linkage between river hydromorphological characteristics and ecological status of Populus nigra – development of a modeling framework for riverain ecosystem
A0307; EGU2008-A-11747; HS7.3-1TU5P-0307
Rodriguez-Iturbe, I.; Tamea, S.; D’Oдорico, P.; Laio, F.; Ridolfi, L.
Stochastic water table dynamics in groundwater-dependent ecosystems (solicited)

A0308; EGU2008-A-12091; HS7.3-1TU5P-0308
Kjaergaard, C.
Effects of wetland hydrology and biogeochemical processes on phosphorus dynamics in a restored wet meadow

A0309; EGU2008-A-12409; HS7.3-1TU5P-0309
Tosatto, O.; Comerlati, A.; Putti, M.; Marani, M.
Ecohydrological interactions in oxygen-limited vegetation ecosystems

HS9.2 Subsurface assessment and characterisation of flow, transport, and fate using physical, chemical, and isotopic tools (co-listed SSS)

Convener: Bloem, E.
Co-Convenor(s): Elsner, M., Penning, H.
Lecture Room 29
Chairperson: ELNSNER, M.
15:30–15:45; EGU2008-A-06471; HS9.2-1TU4O-001
Thullner, M.; Kampara, M; Richnow, H. H.; Harms, H; Wick, L. Y.
Impact of substrate bioavailability on stable isotope fractionation during biodegradation in environmental systems

15:45–16:00; EGU2008-A-01114; HS9.2-1TU4O-002
Sakaguchi-Söder, K.; Jager, J.; Matthäus, F.; Schüth, C.; Scholz-Muramatsu, H
Investigating abiotic and biotic degradation processes of chlorinated compounds using a new method for compound-specific stable chlorine isotope analysis

16:00–16:15; EGU2008-A-06979; HS9.2-1TU4O-003
Amaral, H.; Aeppli, C.; Berg, M.; Kipfer, R.
Application of CSIA and groundwater dating to assess the natural attenuation of chlorinated ethenes in the field: potentials and limitations

16:15–16:30; EGU2008-A-09184; HS9.2-1TU4O-004
Blessing, M.; Pooley, K. E.; Prommer, H.; Haderlein, S. B.; Schmidt, T. C.
Aerobic biodegradation of chlorinated ethenes in a fractured bedrock aquifer: quantitative assessment by compound-specific stable chlorine isotope analysis

16:30–16:45; EGU2008-A-06289; HS9.2-1TU4O-005
Siebert, C.; Möller, P.; Geyer, S.
Tracking flow-paths by REE+Y and stable isotopes: the Golan Heights

16:45–17:00; EGU2008-A-09873; HS9.2-1TU4O-006
Klose, S.; Reichert, B.; Stichler, W.
Assessment of regional groundwater flow patterns by geochemical tracers in the Middle Drâa Basin (South Morocco)

17:00–17:15; EGU2008-A-11213; HS9.2-1TU4O-007
Krälik, M.; Humer, F.; Grath, J.; Darsow, A.; Hofmann, T.; Suckow, A.; Groening, M.
Implementation of the EU-Water Framework Directive: “Groundwater Ages” and Pollution close to Vienna, Austria

17:15–17:30; EGU2008-A-09584; HS9.2-1TU4O-008
Grandel, S.; Dahmke, A.
A comparison of different combinations of geochemical, microbiological and modelling methods to assess natural attenuation processes for site remediation at six chlorinated solvent field sites

HS9.4 Fissured and karstified aquifers

Convener: Graf, T.
Co-Convenor(s): Birk, S., Gabrovsek, F., Maloszewski, P.
Lecture Room 32
Chairperson: GRAF, T.
8:30–8:45; EGU2008-A-09788; HS9.4-1TU1O-001
Winkler, G.; Reichl, P.
Hydraulic properties of fractured crystalline rocks with internal fault zones: examples from the Upper and Lower Austro-Alpine (Austria)

8:45–9:00; EGU2008-A-03843; HS9.4-1TU1O-002
Blessent, D.; Therrien, R.
Integration of 3D geological and numerical models to investigate fractured geological media

9:00–9:15; EGU2008-A-10298; HS9.4-1TU1O-003
Graf, T.; Simmons, C.T.
Quantification of variable-density groundwater flow and solute transport in fractured rock: a modification of the Tang et al. [1981] problem

9:15–9:30; EGU2008-A-05543; HS9.4-1TU1O-004
Attila Kovacs, A.K.; Pierre Perrochet, P.P.
A quantitative approach to spring hydrograph decomposition

9:30–9:45; EGU2008-A-06269; HS9.4-1TU1O-005
Birk, S.; Hergarten, S.
A fractal model of fissured and karstified aquifers applied to spring hydographs

9:45–10:00; EGU2008-A-05475; HS9.4-1TU1O-006
Geyer, T.; Birk, S.; Liedl, R.; Sauter, M.
Estimation of temporal distribution of recharge from spring hydrographs on the example of a karst spring

10:00 END OF SESSION

HS9.6 Shallow and deep geothermal energy

Convener: Blum, P.
Co-Convenor(s): Kolditz, O., McDermott, C.
Lecture Room 32
Chairperson: BLUM, P.
13:30–13:45; EGU2008-A-02001; HS9.6-1TU3O-001
Heat flow, Heat Production, and Mantle Heat Flow in Korea

13:45–14:00; EGU2008-A-03086; HS9.6-1TU3O-002
Munoz, G.; Ritter, O.; Krings, T.; Moeck, I.
Electrical conductivity models of the Gross Schönebeck geothermal reservoir obtained from magnetotellurics

14:00–14:15; EGU2008-A-05665; HS9.6-1TU3O-003
Structural geological field analysis in outcrop analogues as a tool to understand permeability development in geothermal reservoirs

14:15–14:30; EGU2008-A-10940; HS9.6-1TU3O-004
Ghergut, I.; Behrens, H.; Licha, T.; Sauter, M.; Fischer, S.
Tracer-assisted characterization of deep geothermal reservoirs: some German experiences

14:30–14:45; EGU2008-A-03546; HS9.6-1TU3O-005
Vetter, A.; Mangelsdorf, K.; Vieth, A.
Biogeochemical characterisation of geothermally used groundwater systems
HS9.7 Groundwater stochastic hydrology

Convener: Guadagnini, A.
Co-Convener(s): Sanchez-Vila, X.
Lecture Room 32
Chairperson: GUADAGNINI, A., SANCHEZ-VILA, X.

10:30–10:45; EGU2008-A-01290; HS9.7-1TU2O-001
Cirpka, O.A.; Schwede, R.L.
Statistical distributions of concentration in heterogeneous domains: why the mean and variance are not enough (solicited)

11:00–11:15; EGU2008-A-02150; HS9.7-1TU2O-003
Berkowitz, B.; Scher, H.
Continuous time random walk description of non-Fickian transport (solicited)

11:15–11:30; EGU2008-A-05603; HS9.7-1TU2O-004
Castagna, M.; Becker, M. W.; Bellin, A.
Characterization of the spatial variability of hydraulic parameters by inverse modeling (solicited)

11:30–11:45; EGU2008-A-10957; HS9.7-1TU2O-005
Gómez-Hernández, J.J.
Inverse conditional stochastic modeling (solicited)

11:45–12:00; EGU2008-A-06718; HS9.7-1TU2O-006
Copty, N.; Trinchero, P.; Sanchez-Vila, X.; Sarioglu, S.; Findiakis, A.
Impact of heterogeneity on the analysis of pumping test in leaky aquifers (solicited)

12:00–12:15; EGU2008-A-03119; HS9.7-1TU2O-007
Bodin, J.
Dealing with heterogeneity in limestone aquifers: insights from five years of field and modelling studies at the Hydrogeological Experimental Site (HES) of Pottiers, France. (solicited)

12:15–12:30; EGU2008-A-04646; HS9.7-1TU2O-008
Davy, P.; Bour, O.; Darcel, C.; de Dreuzy, J.R.; Le Goc, R.
Correlation lengths of fracture networks, and consequences for flow modeling (solicited)

12:30 END OF SESSION
HS10.1 The ungauged catchment problem - a benchmark assessment

Convener: Blöschl, G.
Co-Conveners: McDonnell, J.
Lecture Room 31
Chairperson: BÖLSCHL, G.

15:30–15:45; EGU2008-A-05066; HS10.1-1TU4O-001
Soulby, C.; Tetzlaff, D.
Towards predicting mean residence times in ungauged basins using conservative tracers and soil distributions

15:45–16:00; EGU2008-A-01751; HS10.1-1TU4O-002
van Dijk, A.; Guerschman, J.-P.; Liu, Yi
Satellite-derived evapotranspiration and soil moisture estimates can improve streamflow estimation for Australian catchments

16:00–16:15; EGU2008-A-09626; HS10.1-1TU4O-003
Mediero, L.; Jiménez, A.
Comparison of regional and catchment specific calibration of a distributed hydrological model

16:15–16:30; EGU2008-A-11824; HS10.1-1TU4O-004
Tøfte, L.S.; Engeland, K.; Kolberg, S.A.
Comparison of regional and catchment specific calibration of a distributed hydrological model

16:30–16:45; EGU2008-A-05765; HS10.1-1TU4O-005
Wagener, T.; Freer, J; Schafli, B; Clark, M.
The Role of Uncertainty in PUB Benchmark Assessment

16:45–17:00; EGU2008-A-07581; HS10.1-1TU4O-006
Wagener, T; Freer, J; Schafli, B; Clark, M.
Estimating mean annual runoff of New Zealand catchments

17:00–17:15; EGU2008-A-05958; HS10.1-1TU4O-007
Sivapalan, M.
A candidate model for PUB benchmark assessment based on cross-cutting themes

17:15 END OF SESSION

HS10.1 The ungauged catchment problem - a benchmark assessment – Posters

Convener: Blöschl, G.
Co-Conveners: McDonnell, J.
Display Time: Tuesday, 08:00–19:30

Authors in Attendance: Tuesday, 17:30–19:00
Poster Area Hall A
Chairperson: BÖLSCHL, G.

A0325; EGU2008-A-02371; HS10.1-1TU5P-0325
Using 18O and 2H isotopes to identify water dynamics and origin in a tropical montane cloud forest, Ecuador

A0326; EGU2008-A-03595; HS10.1-1TU5P-0326
Quantitative comparison of estimation methods for rainfall-runoff model parameters in ungauged basins

A0327; EGU2008-A-03769; HS10.1-1TU5P-0327
Winsemius, H.; Schaeffer, B.; Savenije, H.; Bastiaanssen, W.
Stepped calibration of a PUB model using evaporation and discharge spectral properties

A0328; EGU2008-A-03969; HS10.1-1TU5P-0328
Buytaert, W.; Beven, K.
A learning framework for regionalisation

A0329; EGU2008-A-04784; HS10.1-1TU5P-0329
Weiler, M.; Rosin, K.
Assessing Sensitivity to Forest Disturbance in Ungauged Basins

A0330; EGU2008-A-05642; HS10.1-1TU5P-0330
Zinevich, A.; Raytitsfeld, A.; Messer, H.; Alpert, P.
High-resolution frontal rainfall detection by a cellular communication network

A0331; EGU2008-A-06189; HS10.1-1TU5P-0331
Salvai, L.; Bevilacqua, I.; Canone, D.; Previati, M.; Haverkamp, R.
Evaluation of soil water storage with time in mountain areas taking into account the influence of vegetation

A0332; EGU2008-A-06288; HS10.1-1TU5P-0332
Moretti, G.; Montanari, A.
Inferring the flood frequency distribution for an ungauged basin using a spatially distributed rainfall-runoff model

A0333; EGU2008-A-07208; HS10.1-1TU5P-0333
Havlícek, V.; Hermanovsky, M.; Hanel, M.; Redinova, J.; Maca, P.
Possibilities of runoff forecast by black-box models in ungauged basins

A0334; EGU2008-A-07329; HS10.1-1TU5P-0334
Blöschl, G.
Towards a benchmark report on Predictions in Ungauged Basins (PUB)

A0335; EGU2008-A-07507; HS10.1-1TU5P-0335
Baumgartl, T.; Mulligan, D; Haymont, R
Infiltration rate as a mean for the prediction of runoff in high-intensity rainfall environments

A0336; EGU2008-A-09817; HS10.1-1TU5P-0336
Castellarin, A.
Physiographical space-based interpolation as a tool for predictions in ungauged basins

A0337; EGU2008-A-10505; HS10.1-1TU5P-0337
Carriero, D.; Fiorentino, M.
Analysis of soil moisture variability at different soil depths

A0338; EGU2008-A-11539; HS10.1-1TU5P-0338
Borja, P.; Itiúquez, V; Crespo, P; Cisneros, P; Cisneros, F; Feyen, J
Hydraulic characterization of Andean Andosols and Histosols

A0339; EGU2008-A-11547; HS10.1-1TU5P-0339
Itiúquez, V; Borja, P; Crespo, P; Cisneros, P; Cisneros, F; Feyen, J
Experimental assessment of the hillslope hydrology in an Ecuadorian páramo ecosystem: preliminary results

A0340; EGU2008-A-11946; HS10.1-1TU5P-0340
A review on synthetic unit hydrograph methods

A0341; EGU2008-A-12219; HS10.1-1TU5P-0341
Gan, T Y; Burges, S
Assessment of soil-based and calibrated parameters of the Sacramento model and parameter transferability to ungauged river basins

17
HS10.2 Objective and process-based catchment classification as a tool for prediction in ungauged basins

Convener: Claps, P.
Co-Convener(s): Aryal, S., Woods, R., Castellarin, A., Troch, P.
Lecture Room 31
Chairperson: WOODS, R.

13:30–13:45; EGU2008-A-08153; HS10.2-1TU3O-001
Blöschl, G.; Merz, R.
Thoughts on a process-based catchment classification (solicited)

13:45–14:00; EGU2008-A-05355; HS10.2-1TU3O-002
Harman, C.; Sivapalan, M.
Classification and the role of topography, recharge and boundary conditions on the effects of heterogeneity on subsurface flow in hillslopes

14:00–14:15; EGU2008-A-05719; HS10.2-1TU3O-003
Rosin, K.; Ilchmann, N.; Asadian, Y.; Weiler, M.
Catchment Classification Based on Runoff-Generation Processes for Different Climate Regimes

14:15–14:30; EGU2008-A-07318; HS10.2-1TU3O-004
Ganora, D.; Claps, P.; Laio, F.
Use of basin descriptors and distance measures in non-parametric flow duration curves estimation in ungauged catchments

14:30–14:45; EGU2008-A-05787; HS10.2-1TU3O-005
Wagener, T.; Sivapalan, M; Troch, P; Woods, R.
The Search for a Catchment Classification System for Hydrology

14:45–15:00; EGU2008-A-05447; HS10.2-1TU3O-006
Hauhs, M.
A coalgebraic Approach of Runoff Classification

15:00 END OF SESSION

HS10.2 Objective and process-based catchment classification as a tool for prediction in ungauged basins – Posters

Convener: Claps, P.
Co-Convener(s): Aryal, S., Woods, R., Castellarin, A., Troch, P.
Display Time: Tuesday, 08:00–19:30
Authors in Attendance: Tuesday, 17:30–19:00
Poster Area Hall A
Chairperson: CASTELLARIN, A.

A0342; EGU2008-A-00475; HS10.2-1TU5P-0342
Castiglioni, S.; Montanari, A.
Evaluation of the role of dispersion mechanisms at different basin scales

A0343; EGU2008-A-07061; HS10.2-1TU5P-0343
Di Lazzaro, M.
Autocorrelation of river flows as a tool for classifying the river flow regime and optimising hydrological models (solicited)

A0344; EGU2008-A-10230; HS10.2-1TU5P-0344
Zehe, E.; Sivapalan, M.
Threshold nonlinearities in hydrological and environmental systems: implications for observability and predictability

A0345; EGU2008-A-09907; HS10.2-1TU5P-0345
Margreth, M.; Naef, F.; Kienzler, P.
Why do steep catchments often react delayed to heavy rainfall?

A0346; EGU2008-A-12050; HS10.2-1TU5P-0346
Pradhan, N.R.; Ogden, F.; Tachikawa, Y.; Takara, K.
Development of saturation dynamics factor and geomorphic scaling methods for catchment classification

A0347; EGU2008-A-12048; HS10.2-1TU5P-0347
Claps, P.; the CUBIST team
Development of an Information System of the Italian basins for the CUBIST project

A0348; EGU2008-A-09349; HS10.2-1TU5P-0348
Gigante, V.; Iacobellis, V.
Regional analysis of flow duration curves for mediterranean ungauged basins

A0349; EGU2008-A-09034; HS10.2-1TU5P-0349
Fiorentino, M.; Manfreda, S.; Onorati, B.
Runoff Generation Mechanisms in an Experimental Basin

A0350; EGU2008-A-05892; HS10.2-1TU5P-0350
Blöschl, G.; Merz, R.
Evaluation of a simple similarity index method for estimating global runoff

A0351; EGU2008-A-09488; HS10.2-1TU5P-0351
Rigon, R.
Which hydrological information is written in the morphology of the catchments?

A0352; EGU2008-A-03801; HS10.2-1TU5P-0352
Samaniego, L.; Kumar, R.
Streamflow prediction in ungauged catchments using a copula-based similarity measure

A0353; EGU2008-A-06881; HS10.2-1TU5P-0353
He, Y.; Bárdossy, A.
Using a transformation matrix based algorithm to achieve a novel catchment classification scheme

A0354; EGU2008-A-12015; HS10.2-1TU5P-0354
Toth, E.; Castellarin, A.
Catchment classification coupling Canonical Correlation Analysis and Self Organising Maps

HS10.3 Catchment structure and connectivity - observations, analysis and modelling (co-listed in BG, GM & SSS)

Convener: Bogaart, P.
Co-Convener(s): Sköien, J., Tetzlaff, D., Kirkby, M.
Lecture Room 31
Chairperson: KIRKBY,M; TETZLAFF, D.

8:30–8:45; EGU2008-A-08886; HS10.3-1TU3O-001
Lane, S.N.; Odoni, N.
Dynamic channel networks and non-linear runoff response

8:45–9:00; EGU2008-A-04746; HS10.3-1TU3O-002
Anderson, A.; Weiler, M.
Tracer based investigation of a hillslope subsurface flow network

9:00–9:15; EGU2008-A-11084; HS10.3-1TU3O-003
Kienzler, P.; Naef, F.
Experimental study of subsurface stormflow formation

9:15–9:30; EGU2008-A-04396; HS10.3-1TU3O-004
Weiler, M.; McDonnell, J.J.
Emergence of Preferential Flow Networks at the Hillslope Scale

9:30–9:45; EGU2008-A-11449; HS10.3-1TU3O-005
Bogaart, P.; McDonnell, J.J.
Mechanistic modelling of macropore evolution
9:45–10:00; EGU2008-A-04618; HS10.3-1TU1O-006
Hellebrand, H.; Seeger, M.; Müller, C.; Hoffmann, L.; Plister, L.
Regionalization of dominant runoff generation processes by means of a statistical and a simple GIS-based approach

10:00 COFFEE BREAK

Chairperson: BOGAART, P.; SKOIEN, J.

10:30–10:45; EGU2008-A-11067; HS10.3-1TU2O-001
Grabs, T.; Bishop, K.; Blomberg, M.; Laudon, H.; Seibert, J.
Linking topographic indices to riparian peat soils and streamwater chemistry in the Krycklan boreal catchment, Northern Sweden

10:45–11:00; EGU2008-A-04178; HS10.3-1TU2O-002
Cerdan, O.; Govers, G.; van Oost, K.; Le Bissonnais, Y.
Spatial heterogeneity and overland flow: do we always gain from distributed modelling?

11:00–11:15; EGU2008-A-05691; HS10.3-1TU2O-003
Gascuel-odoux, C.; Weiler, M.; Molenat, J.
Effect of different spatial distributions of the physical properties on water table depth and stream discharge

11:15–11:30; EGU2008-A-08654; HS10.3-1TU2O-004
Di Domenico, A.; Laguardia, G.; Fiorentino, M.
On the relation between critical point and catchment organization

11:30–11:45; EGU2008-A-08985; HS10.3-1TU2O-005
Tetzlaff, D.; Seibert, J.; McGuire, K.J.; Laudon, H.; Dunn, S.M.; Burns, D.; McGlynn, B.; Soulsby, C.
Comparing the influence of catchment architecture on catchment residence times in different geomorphic provinces

11:45–12:00; EGU2008-A-10571; HS10.3-1TU2O-006
Tarboton, D. G.; Baker, M. E.; Schreuders, K. A. T.
Terrain analysis and the modeling of catchment architecture

12:00 END OF SESSION

HS10.3 Catchment structure and connectivity - observations, analysis and modelling (co-listed in BG, GM & SSS) – Posters
Convener: Bogaart, P.
Co-Conveners: Skoen, J., Tetzlaff, D., Kirky, M.
Display Time: Tuesday, 08:00–19:30
Authors in Attendance: Tuesday, 17:30–19:00
Poster Area Hall A
Chairperson: BOGAART, P.; KIRKBY, M.; SKOIEN, J.; TETZLAFF, D.

A0355; EGU2008-A-08558; HS10.3-1TU5P-0355
Gerke, H.H.; Maurer, T.; Klauke, A.; Dominik, R.; Dimitrov, M.; Biemelt, D.; Badorreck, A.
Modelling the initial 3D sediment structure of an artificially constructed hydrological catchment

A0356; EGU2008-A-08017; HS10.3-1TU5P-0356
Baggaley, N.; Mayr, T.; Bellamy, P.
Combining soils and terrain data for modelling soil moisture

A0357; EGU2008-A-08224; HS10.3-1TU5P-0357
MOUSSA, R.
Shortcomings of Horton-Strahler ratios and definition of new equivalent ratios for the derivation of the Geomorphological Instantaneous Unit Hydrograph

A0358; EGU2008-A-11733; HS10.3-1TU5P-0358
Helliew, R.; Baggage, N.; Lilly, A.
Hydrological and hydrochemical responses of the Allt Mharcaidh: inferences from experimental plots

A0359; EGU2008-A-08606; HS10.3-1TU5P-0359
Laranjeira, M. P.; Pereira, A. R.
Effect of fragment area and isolation on plant species distribution patterns in trampled foredunes (northwest coast of Portugal)

A0360; EGU2008-A-02466; HS10.3-1TU5P-0360
Antoine, M.; Bielders, C.; Jauvaux, M.
Comparative study of connectivity indicators in surface hydrology

A0361; EGU2008-A-03198; HS10.3-1TU5P-0361
Meerkerk, A.; van Wesemael, B.; Bellin, N.
Overland flow in semi-arid catchments: the impact of terrace failure on hydrological connectivity

A0362; EGU2008-A-03581; HS10.3-1TU5P-0362
Berger, C.; Schulze, M.; Rieke-Zapp, D.; Schlunegger, F.
Rill network development and soil erosion: a laboratory study of rainfall intensity and slope angle

A0363; EGU2008-A-05954; HS10.3-1TU5P-0363
Sediment transport by surface erosion in a mountain catchment draining Japanese cypress forest – understanding connectivity of sediment from hillslope to channel

A0364; EGU2008-A-03936; HS10.3-1TU5P-0364
Santiago, A.; Benito, R.M.
An extended formalism for growing heterogeneous complex networks with preferential attachment

A0365; EGU2008-A-09887; HS10.3-1TU5P-0365
Benito, R. M.; Santiago, A.
Preferential attachment in heterogeneous complex networks

A0366; EGU2008-A-04674; HS10.3-1TU5P-0366
Seeger, M.; Muller, C.; Hellebrand, H.
Certainties and uncertainties when mapping dominant runoff processes

A0367; EGU2008-A-05814; HS10.3-1TU5P-0367
Lin, L.
Hydrological processes of different land use systems and water budget in a small catchment of the low hilly region

A0368; EGU2008-A-11983; HS10.3-1TU5P-0368
Birkel, C.; Salas Gonzalez, D.
A runoff generation process tool developed for a tropical headwater catchment with scarce data

A0369; EGU2008-A-00662; HS10.3-1TU5P-0369
Nezlobin, D.; Sinai, G.; Rubin, H.; Lavee, H.; Pariente, S.; Sachs, E.
Critical dependence of surface runoff on generating and intercepting covers relative areas

A0370; EGU2008-A-06440; HS10.3-1TU5P-0370
Kiesel, J.; Hörmann, G.; Fohrer, N.
Sinks in the DEM - useful for hydrologic modeling?

A0371; EGU2008-A-02841; HS10.3-1TU5P-0371
Liu, M.; Bardossy, A.
Topographic Effects on Spatial Distribution of Soil Moisture

A0372; EGU2008-A-07110; HS10.3-1TU5P-0372
Grabs, T.; Seibert, J.; Jencso, K.; McGlynn, B.
Distributed assessment of contributing area and riparian buffering along stream networks: a new approach to separate contributions from different sides
HS10.18 Linking catchment hydrological and biogeochemical processes across spatial scales – Posters

Convener: Laudon, H.
Co-Convener(s): Lyon, S.
Display Time: Tuesday, 08:00–19:30

Authors in Attendance: Tuesday, 17:30–19:00
Poster Area Hall A
Chairperson: N.N.

A0383; EGU2008-A-04860; HS10.18-1TU5P-0383
Spatial variation and modelling of Organic Matter in Swedish Watercourses

A0384; EGU2008-A-05487; HS10.18-1TU5P-0384
Clark, J.M.; Evans, C.D.; Bottrell, S.; Monteith, D.T.; Ratcliffe, M.; Chapman, P.J.
Can increased DOC in streams and lakes be explained by changes in acid sulphate and seassalt deposition in catchment soils?

A0385; EGU2008-A-05846; HS10.18-1TU5P-0385
Lohse, K.; Sanderman, J.; Amundson, R
Influence of hydrological flow paths on carbon and nitrogen transformations and loss pathways in a small Mediterranean catchment

A0386; EGU2008-A-06955; HS10.18-1TU5P-0386
Oulehle, F.; McDowell, WH; Aitkenhead-Peterson, JA; Krám, P.; Hruška, J.; Navrátil, T; Buzek, F.; Fottová, D
Long-term trends in stream nitrate concentrations and losses across watersheds undergoing recovery from acidification in the Czech Republic

A0387; EGU2008-A-08551; HS10.18-1TU5P-0387
Wallin, M; Oquist, M; Buffam, I; Laudon, H; Bishop, K
Carbon dioxide evasion from Boreal Headwaters

A0388; EGU2008-A-08597; HS10.18-1TU5P-0388
Chahinian, N.; Tournoud, MG; Perrin, JL; Picot, B
Rebuuilding point data to model the nutrient dynamics of an intermittent river.

A0389; EGU2008-A-10888; HS10.18-1TU5P-0389
Hruška, J.; Fottová, D; Krám, P
Recovery from acidification as predicted by the MAGIC model for 14 forest catchments in the Czech Republic

A0373; EGU2008-A-07900; HS10.3-1TU5P-0373
Sköien, J.O.; Gottschalk, L.; Leblois, E.
Interpolation with irregular support – a simplification

A0374; EGU2008-A-08449; HS10.3-1TU5P-0374
Herbst, M.; Diekkrüger, B.; Vanderborgh, J.
The effect of the spatial variation of soil hydraulic properties on runoff generation at the small catchment scale

A0375; EGU2008-A-05563; HS10.3-1TU5P-0375
Grundmann, J.; Schmitz, G.H.
Impact of catchment size and rainfall intensity on uncertainty in distributed rainfall-runoff modelling

A0376; EGU2008-A-01194; HS10.3-1TU5P-0376
Sheridan, G.; Lane, P.
Effect of spatial correlation and variance of saturated conductivity on overland flow connection between hillslope and stream (cancelled)

A0377; EGU2008-A-05627; HS10.3-1TU5P-0377
Loos, M.; Elsenbeer, H.
Spatial and temporal patterns of overland flow generation during a dry-to-wet season transition

HS10.18 Linking catchment hydrological and biogeochemical processes across spatial scales

Convener: Laudon, H.
Co-Convener(s): Lyon, S.
Lecture Room 33
Chairperson: N.N.

8:30–8:45; EGU2008-A-00708; HS10.18-1TU1O-001
Krause, S.; Heathwaite, L.; Binley, A.; Kaeser, D.
Scirutising the scale dependent efficiency and uncertainty of predicting nutrient attenuation in the riparian and hyporheic corridor

8:45–9:00; EGU2008-A-04188; HS10.18-1TU1O-002
Tetzlaff, D.; Soulsby, C.
Sources of baseflow in larger catchments – using tracers to develop a holistic understanding of runoff generation across multiple scales

9:00–9:15; EGU2008-A-07108; HS10.18-1TU1O-003
Evans, C.
Upscaling biogeochemical processes from plot to catchment to country (or, why small catchments might not be such bad places to work after all) (solicited)

9:15–9:30; EGU2008-A-09502; HS10.18-1TU1O-004
Brooks, P.; Kostzrewski, J; Troch, P; Lyon, S; Litvak, M; Liu, F; Vivoni, E; McDowell, N; McConnell, J; Small, E
A predictive framework for coupling Hydrology, Biogeochemistry, and Ecology (solicited)

9:30–9:45; EGU2008-A-11173; HS10.18-1TU1O-005
Bishop, K.; Buffam, I.; Fölster, J.; Laudon, H.; Seibert, J.; Temnerud, J.
Pushing back the frontiers of Aqua Incognita: A strategy for assessing headwaters
Wednesday

HS1.1 Science impact in hydrology: interaction between research and applied engineering (invited speakers only)

Convener: Montanari, A.
Co-Convener(s): Porporato, A.
Lecture Room 29
Chairperson: MONTANARI, A.

13:30–13:35 Introduction by A. Montanari

13:35–14:05; EGU2008-A-06079; HS1.1-1WE3O-002
Rinaldo, A.; Muneepeerakul, R.; Bertuzzo, E.; Rodriguez-Iturbe, I.
River networks as ecological corridors for biodiversity, populations and water-borne disease (solicited)

14:05–14:35; EGU2008-A-12414; HS1.1-1WE3O-003
Kirchner, J.W.
Simple models for complex hydrologic behavior: a challenge for basic research and engineering (solicited)

14:35–15:05; EGU2008-A-12418; HS1.1-1WE3O-004
Rutschmann, P.
Benefits from Hydrodynamic Simulations for Hydrology (solicited)

15:05 COFFEE BREAK

Chairperson: PORPORATO, A.

15:30–16:00; EGU2008-A-10943; HS1.1-1WE4O-001
Kinzelbach, W.
Hydrological science and engineering: the yin and yang of water resources management (solicited)

16:00–16:30; EGU2008-A-08175; HS1.1-1WE4O-002
Blöschl, G.
Synergies of fundamental and applied research: a personal perspective (solicited)

16:30–17:00; EGU2008-A-12136; HS1.1-1WE4O-003
Parker, G.; Belmont, P.; Gran, K.; Jennings, C.; Lauer, J.; Perg. L.; Viparelli, E.; Wilcock, P.
Effect on rivers of massive changes in hydrologic regime due to human intervention (solicited)

17:00 END OF SESSION
8:45–9:15; EGU2008-A-11804; IS23 - HS2.3/NH2.7/CL53-1WE1O-002
Koutsoyiannis, D.; Cohn, T. A.
The Hurst phenomenon and climate (solicited)

9:15–9:30; EGU2008-A-07377; IS23 - HS2.3/NH2.7/CL53-1WE1O-003
Barbosa, S. M.; Silva, M. E.
Testing for deterministic trends in climate time series

9:30–10:00; EGU2008-A-06942; IS23 - HS2.3/NH2.7/CL53-1WE1O-004
Benestad, R.E.; Nordli, Ø.; Nesje, A.; Roald, L.A.; Lie, Ø.; Hansen-Bauer, I.
Climatic and Hydrological perspectives on long-term changes: a northern European view (solicited)

10:00 COFFEE BREAK

Chairperson: MUDELSEE, M.

10:30–10:45; EGU2008-A-07171; IS23 - HS2.3/NH2.7/CL53-1WE2O-001
Petrow, T.; Merz, B.
Flood trends in Germany in the period 1951-2002

10:45–11:00; EGU2008-A-01317; IS23 - HS2.3/NH2.7/CL53-1WE2O-002
Mackey, R
Solar variability and climate dynamics: A framework for analysis

11:00–11:15; EGU2008-A-08326; IS23 - HS2.3/NH2.7/CL53-1WE2O-003
Simonov, Y.; Khristoforov, A.
Estimation of possible climate induced arctic rivers water run off change

11:15–11:30; EGU2008-A-04801; IS23 - HS2.3/NH2.7/CL53-1WE2O-004
Trends in low flows and droughts in small undisturbed rivers across Europe

11:30–12:00; EGU2008-A-00932; IS23 - HS2.3/NH2.7/CL53-1WE2O-005
Moulines, E.
Statistical perspectives on long-term changes (solicited)

12:00 END OF SESSION

IS23 - HS2.3/NH2.7/CL53 Climatic and hydrological perspectives on long-term changes (co-organised by HS, NH & CL) – Posters

Convenor: Mudelsee, M.
Co-Conveners: Georgakakos, K., Lins, H.
Display Time: Wednesday, 08:00–19:30

Authors in Attendance: Wednesday, 17:30–19:00
Poster Area Hall A
Chairperson: MUDELSEE, M.

A0173; EGU2008-A-04480; IS23 - HS2.3/NH2.7/CL53-1WE5P-0173
Cong, C.; Yang, Y.; Lei, L.
Did evaporation paradox disappear after 1980s? A case study for China

A0174; EGU2008-A-04644; IS23 - HS2.3/NH2.7/CL53-1WE5P-0174
Yang, D.; Yang, H.
Predicting regional hydrological response to climate change using a water-energy coupled balance model based on the Budyko and Bouchet hypotheses

A0175; EGU2008-A-05832; IS23 - HS2.3/NH2.7/CL53-1WE5P-0175
Han, S.; Hu, H.; Tian, F.
Evaluation of the different climate and hydrological changes in the headstream areas and oases of Tarim River Basin with the complementary relationship

A0176; EGU2008-A-06015; IS23 - HS2.3/NH2.7/CL53-1WE5P-0176
Chen, S.T.; Du, R.H.; Yu, P.S.
Trends and variability of historical and projected droughts in Taiwan

A0177; EGU2008-A-01371; IS23 - HS2.3/NH2.7/CL53-1WE5P-0177
Rutten, M.M.; van de Giesen, N.C.; Mata, L.J.
Persistence in precipitation time series from AR4 general circulation models for historical and future time slices.

A0178; EGU2008-A-02370; IS23 - HS2.3/NH2.7/CL53-1WE5P-0178
Ward, P.J.; Renssen, H.; Aerts, J.C.J.H.
Strong increase in the flood frequency of the River Meuse in response to Holocene and future climate and land use change: a new perspective for long-term modelling

A0179; EGU2008-A-03632; IS23 - HS2.3/NH2.7/CL53-1WE5P-0179
Dankers, R.; Feyen, L.
Estimating extreme river discharge at European scale under present and future climate conditions

A0180; EGU2008-A-05617; IS23 - HS2.3/NH2.7/CL53-1WE5P-0180
Bokoye, A.I.; Dibike, Y.; Lefairev, L.; Casati, B.
Statistical downscaling techniques and the spatial coherence of daily rainfall variations: A case study over Chaudiere watershed in Quebec

A0181; EGU2008-A-06409; IS23 - HS2.3/NH2.7/CL53-1WE5P-0181
Pistocchi, A.; Weissteiner, C.; Bourraoui, F.; Terres, J.M.
An analysis of constraints to agriculture due to aridity in continental Europe: current conditions and future scenarios

A0182; EGU2008-A-05687; IS23 - HS2.3/NH2.7/CL53-1WE5P-0182
Hirabayashi, Y.; Kanue, S.; Emori, S.; Oki, T.; Kimoto, M.
Estimating trends of annual maximum daily discharge in the twentieth-century

A0183; EGU2008-A-09074; IS23 - HS2.3/NH2.7/CL53-1WE5P-0183
Koutsoyiannis, D.; Mamassis, N.; Christofides, A.; Efstratiadis, A.; Papalexiou, S. M.
Assessment of the reliability of climate predictions based on comparisons with historical time series

A0184; EGU2008-A-09870; IS23 - HS2.3/NH2.7/CL53-1WE5P-0184
MOULINES, E.; FAY, G.; ROUEFF, F.; TAQU, M.
Estimators of Long-Memory: a review of recent advances (solicited)

A0185; EGU2008-A-05095; IS23 - HS2.3/NH2.7/CL53-1WE5P-0185
Scheid, A.; Rust, H. W.; Bronstert, A.; Kurths, J.
Impact of climate change on hydrological extremes

A0186; EGU2008-A-05126; IS23 - HS2.3/NH2.7/CL53-1WE5P-0186
Khalil, M.N.; Ouarda, T.; Gachon, P.; Sushama, L.
Identification of temporal trends in Canadian low flow indices in the presence of short- and long-term persistence

A0187; EGU2008-A-11082; IS23 - HS2.3/NH2.7/CL53-1WE5P-0187
Mancarella, D.; Simeone, V.
Climatic changes in Taranto area

22
HS6.1 Hydroinformatics: computational intelligence and technological developments in water science applications

Convenor: Solomatine, D.
Co-Conveners(s): See, L., Toth, E., Abrahart, R.
Lecture Room 32
Chairperson: SOLOMATINE, D.P.
13:30–13:45; EGU2008-A-08434; HS6.1-1WE5P-0194
Abrahart, R.J.; Dawson, C.W.
M5P modelling of non-linear processes and hydrometeorological thresholds

13:45–14:00; EGU2008-A-05984; HS6.1-1WE5P-002
Coulibały, P.
Data-driven approach to Great Lakes water levels forecasting

14:00–14:15; EGU2008-A-11941; HS6.1-1WE5P-003
Brandimarte, L.; Toth, E.
Estimation of scour depth around bridge piers with artificial neural networks: the impact of training data

14:15–14:30; EGU2008-A-07055; HS6.1-1WE5P-004
Dawson, C.; Abrahart, R.
Categorisation of hidden unit activity in a neurohydrological model

14:30–14:45; EGU2008-A-01512; HS6.1-1WE5P-005
El-Baroudy, I.; Elshorbagy, A.; Carey, S.K.; Giustolisi, O.; Savic, D.
Predictive data-driven models of the evapotranspiration process

14:45–15:00; EGU2008-A-00593; HS6.1-1WE5P-006
Chaipimonpinlin, T.; See, I.; Kneale, P.
Neural network Prediction of Flooding in Chiang Mai, Thailand: Comparison of Input Determination Techniques

15:00–15:15; EGU2008-A-05647; HS6.1-1WE4O-001
Gronz, O.; Casper, M.; Gemmar, P.
Automatic Analysis of hydrologic Time Series using Time Series Knowledge Mining to identify System States

15:45–16:00; EGU2008-A-11783; HS6.1-1WE4O-002
Solomatine, D.; Corzo, G.; de Wit, M.; Werner, M.; Uhlenbrook, S.; Price, R.
Integrating and combining semi-distributed conceptual and data-driven models in flow forecasting: application to the Meuse river basin

16:00–16:15; EGU2008-A-08739; HS6.1-1WE4O-003
Vrugt, J.A.; Robinson, B.A.; Hyman, J.M.
Self-Adaptive MultiMethod Search For Global Optimization of Hydrologic Model Parameters

16:15–16:30; EGU2008-A-01778; HS6.1-1WE4O-004
Wu, J.V.; van de Giesen, N.C.
Minimum relative entropy update of ensemble probabilities to reflect forecast information

16:30–16:45; EGU2008-A-05204; HS6.1-1WE4O-005
Pakosch, S.; Disse, M.; Bárdossy, A.
Flood forecasting in meso-scale catchments using a fuzzy rule-based expert system

16:45–17:00; EGU2008-A-11121; HS6.1-1WE4O-006
Karsensberg, D.; de Jong, K.; Schmitz, O.
A software environment for stochastic spatio-temporal modelling

17:00 END OF SESSION
10:45–11:00; EGU2008-A-10041; HS7.1-1WE2O-002
G. Mayor, A.; Bautista, S.; E. Small, E.; Dixon, M.; Bellot, J.
Flowlength, a new spatial metric for measuring the connectivity of runoff-source areas in drylands considering vegetation pattern and topography

11:00–11:15; EGU2008-A-05638; HS7.1-1WE2O-003
Barnard, H.R.; Brooks, J.R.; McDonnell, J.J.
Resolving the tree-water-stream water paradox in a humid, upland catchment

11:15–11:30; EGU2008-A-09234; HS7.1-1WE2O-004
Bertoldi, G.; Kustas, W. P.; Albertson, J. D.
On the opposing roles of air temperature and wind speed variability in flux estimation over partially vegetated landscapes

11:30–11:45; EGU2008-A-06448; HS7.1-1WE2O-005
Tietjen, B.; Zehe, E.; Jeltsch, F.
Modelling coupled Dynamics of Water and Vegetation in Drylands under Climate Change

11:45–12:00; EGU2008-A-10493; HS7.1-1WE2O-006
Brolsma, R.; van Beek, R.; Bierkens, M.
Climate change effects on groundwater dependent temperate forest ecosystems

12:00 END OF SESSION

HS7.1 Climate-soil and vegetation interactions in ecological-hydrological processes – Posters
Convener: Manfreda, S.
Co-Conveners(s): Montaldo, N., Sivapalan, M., Iacobellis, V.
Display Time: Wednesday, 08:00–19:30
Authors in Attendance: Wednesday, 17:30–19:00
Poster Area Hall A
Chairperson: MONTALDO, N.

A0220; EGU2008-A-01534; HS7.1-1WE5P-0220
SHARMA, U. C.; SHARMA, V.
Socio-economic aspects of climate-soil-vegetation interactions in hydrological processes in the northeastern region of India (solicited)

A0221; EGU2008-A-06214; HS7.1-1WE5P-0221
Viola, F.; Pumo, D.; Noto, L.V.; Cannarozzo, M.; Porporato, A.
Olive yield as a function of soil moisture dynamics (solicited)

A0222; EGU2008-A-06849; HS7.1-1WE5P-0222
Botter, G.; Daly, E.; Porporato, A.; Rodriguez-Iturbe, I.; Rinaldo, A.
A simplified analytical model of the probabilistic dynamics of soil nitrate (solicited)

A0223; EGU2008-A-09247; HS7.1-1WE5P-0223
Iacobellis, V.; Fiorentino, M.; Giota, A.; Manfreda, S.
Effects of runoff thresholds on flood frequency distributions (solicited)

A0224; EGU2008-A-00298; HS7.1-1WE5P-0224
Borgogno, F.; D’Odorico, P.; Laiu, F.; Ridolfi, L.
Level crossing properties of eco-hydrological systems driven by dichotomic Markov noise (solicited)

A0225; EGU2008-A-08791; HS7.1-1WE5P-0225
De Michele, C.; Vezzoli, R.; Pavlopoulos, H.; Scholes, R. J.
Coupled stochastic dynamics of soil water and vegetation in water-limited ecosystems: a minimal model (solicited)

A0226; EGU2008-A-11805; HS7.1-1WE5P-0226
Ciobanas, A. I.; Rousseau, A. N.
A thermodynamic analysis of the evapotranspiration phenomenon

A0227; EGU2008-A-02342; HS7.1-1WE5P-0227
Nooruddin, S. L.; Vogwill, R.; Smettem, K.; Ghadouani, A.
Water Balance Analysis of an Australian Alley Farming Trial, Toolibin Lake

A0228; EGU2008-A-02775; HS7.1-1WE5P-0228
Houcine, A.; Bargaoui, Z.; Habib, H.
Reducing the uncertainty of the BBH water balance model using the Budyko framework

A0229; EGU2008-A-07353; HS7.1-1WE5P-0229
Llorrens, P.; Poyatos, R.; Latron, J.; Delgado, J.; Gallart, F.
Analysis of three severe droughts (1995-2006) and their effect on Pinus sylvestris transpiration and physiological response in a montane Mediterranean research catchment (Vallellobre, Spain)

A0230; EGU2008-A-07566; HS7.1-1WE5P-0230
Mueller, E. N.; Francke, T.; Batalla, R. J.
The effects of vegetation dynamics and land-use change on runoff, suspended sediment and bedload flux generation in a mountainous Mediterranean catchment: A modelling study

A0231; EGU2008-A-02900; HS7.1-1WE5P-0231
Bachu, I.; Elshorbagy, A.; Carey, S.; Barr, A.
Evaluation of comparative hydrological sustainability of reconstructed and natural watersheds

A0232; EGU2008-A-03146; HS7.1-1WE5P-0232
Sraj, M.; Lah, A.; Brilly, M.
Measurement and analysis of intercepted precipitation of coniferous and deciduous trees

A0233; EGU2008-A-03465; HS7.1-1WE5P-0233
Variability of surface runoff and infiltration rate under a tree canopy: indoor rainfall experiment using a stand of Japanese cypress (solicited)

A0234; EGU2008-A-04467; HS7.1-1WE5P-0234
Shan, Wei; Guo, Ying
Water content changing in shallow soil cut-slope of highway in seasonal frozen regions

A0235; EGU2008-A-05159; HS7.1-1WE5P-0235
Manna, P.; Basile, A.; Bonfante, A.; De Mascellis, R.; Langella, G.; Terribile, F.
Stochastic analysis of field-scale hydraulic behaviour sensitivity to measured and estimated hydraulic properties (solicited)

A0236; EGU2008-A-05637; HS7.1-1WE5P-0236
Kaleris, V.; Tzoumaka, K.; Disse, M.; Bardossy, A.
Considering the heat flow in the unsaturated zone for estimations of soil water budgets

A0237; EGU2008-A-06550; HS7.1-1WE5P-0237
Kollet, S.; Schüttemeier, D.; Maxwell, R.M.; Moene, A.
The influence of heat convection in the subsurface energy transport equation on the ground heat flux and the energy balance at the land surface

A0238; EGU2008-A-09588; HS7.1-1WE5P-0238
Jackisch, C.; Hildebrandt, A.; Samaniego, L.
Hydrologic and Crop Models in the Mesoscale: Review and Integration Proposal (solicited)

A0239; EGU2008-A-10886; HS7.1-1WE5P-0239
Weckström, J.; Välijärvi, M.; Seppä, H.; Alkio, J.; Juutinen, S.; Tuitiela, E.-S.
Long-term changes in aquatic environment, wetland dynamics and vegetation in Lake Kipojärvi area, Finnish Lapland
A0240; EGU2008-A-10761; HS7.1-1WESP-0240
Onorati, B.; Celano, G.; Carriero, D.; Manfreda, S.; Margiotta, M.R.; Rivelli, A.R.; Telesca, V.; Fiorentino, M.
Integrated Measurements of Soil Moisture over an Experimental Transect

A0241; EGU2008-A-01454; HS7.1-1WESP-0241
Smettem, K.; Waring, R.; Callow, N.; Mu, Q.
Interannual variation in satellite-derived estimates of leaf-area index reflect measured changes in annual catchment water balances across southwestern Australia, 2000-2006 (solicited)

A0242; EGU2008-A-11767; HS7.1-1WESP-0242
Solans Vila, J.P.; Barbosa, P.
Vegetation re-growth detection in the lythrodontas region (centre Cyprus) after a forest fire using Landsat tm and ETM+ data

A0243; EGU2008-A-11972; HS7.1-1WESP-0243
Simonelli, T.; Lanfredi, M.; Liberti, M.; Coppola, R.; Macchiato, M.
Identification of homogeneous phenological patterns for the characterization of vegetation recovery times on climatic scales (solicited)

HS8.1 Monitoring and Modelling for Transfer Processes in the Soil-Plant-Atmosphere Continuum (co-listed in SSS)

Convener: Romano, N.
Co-Conveners(s): Van der Ploeg, M., Angulo-Jaramillo, R.
Display Time: Wednesday, 08:00–19:30

A0244; EGU2008-A-03833; HS8.1-1WESP-0244
Mirzaei, M.R.; Ruy, S.; Khaleldian, M.R.
Is soil homogeneous and uniform at a small scale ?

A0245; EGU2008-A-05516; HS8.1-1WESP-0245
Lassabatere, L.; Angulo-Jaramillo, R.; Haverkamp, R.
Numerical modelling of Beerkan infiltration tests and related estimation of unsaturated soil hydraulic properties

A0246; EGU2008-A-10983; HS8.1-1WESP-0246
Nicholson, A.
An automated system for tension infiltrometer measurements: design, test and data analysis

A0247; EGU2008-A-03399; HS8.1-1WESP-0247
Emerstorfer, N.; Klik, A.; Kammerer, G.
Determination of soil hydraulic properties in a stony soil from field monitoring and lab experiments

15:30–15:45; EGU2008-A-09891; HS8.1-1WEO-001
Gärdenäs, A.; Eckersten, H.; Reinert, A.; Gustafsson, D.; Ekström, P-A.; Greger, M.; Jansson, P-E.; Avila, R.
Modelling long-term Accumulation of Radionuclides in the Soil-Plant-System originating from continuous Groundwater Contamination – a Sensitivity Analysis

15:45–16:00; EGU2008-A-09618; HS8.1-1WEO-002
Garcia, L.; Bedos, C.; Générmont, S.; Cellier, P.
Accounting for surface hydric and thermal conditions in a volatilisation model.

16:00–16:15; EGU2008-A-06480; HS8.1-1WEO-003
Hernández-Santana, V.; Martínez-Fernández, J.; Martínez-Vilalta, J.; Cano, A.
Assessing deep water uptake in a Mediterranean oak forest under soil water deficit

16:15–16:30; EGU2008-A-06819; HS8.1-1WEO-004
Kasieel, R.; Vanderborght, J.; Vereecken, H.
Explaining Soil Moisture Variability as a Function of Mean Moisture Content: Numerical Simulations in Three-Dimensional Heterogeneous Porous Media

16:30–16:45; EGU2008-A-08460; HS8.1-1WEO-005
Ermolaeva, O.; Zeiliger, A.
Inversion technique to derive soil moisture profile from overlapping measurements with TDR FM3 tube sensor-probe

16:45–17:00; EGU2008-A-11425; HS8.1-1WEO-006
Oswald, S.E.; Esser, H.; Carminati, A.; Vetterlein, D.; Vogel, H.-J.; Vontobel, P.
Imaging of water infiltration in soil-plant-atmosphere systems by neutron radiography

17:00–17:15; EGU2008-A-11403; HS8.1-1WEO-007
Spongrova, K.; Kechavarzi, C.; Dresser, M.; Matula, S.; Godwin, R.J.
Design factors of an automated tension infiltrometer affecting accuracy of the measurement

17:15 END OF SESSION
A0248; EGU2008-A-04284; HS8.1-1WE5P-0248
Canone, D.; Previati, M.; Salvi, L.; Calderón Vega, M. F.; Ferraris, S.; Haverkamp, R.
Coaxial probe for water content measurements in forest floor litter by time domain reflectometry technique

A0249; EGU2008-A-01080; HS8.1-1WE5P-0249
Boussadfa, Olfa; Ben Mariem, Fethi; Boussadfa, Wafa; Brahim, M.; Ben El Hadj, Salem
soil properties and nutritional stature in Tunisian olive tree orchards

A0250; EGU2008-A-12169; HS8.1-1WE5P-0250
den Broek, A.M.W.; Meeussen, J.C.L.; van der Zee, S.E.A.T.M.
Multicomponent geochemical transport modeling in the unsaturated zone using ORCHESTRA

A0251; EGU2008-A-05533; HS8.1-1WE5P-0251
Goutaland, D; Angulo-Jaramillo, R; Winiarzki, T; Dubé, J.S.; Delolme, C; Perrodin, Y; Pollacco, JAP
HYDRUS-3D flow model to investigate urban vadose zone hydrology

A0252; EGU2008-A-06259; HS8.1-1WE5P-0252
Hoefer, A.; Casper, M.
Different approaches to map soil water balance: comparison of two soil-plant-atmosphere-continuum models, STICS and DAISY

A0253; EGU2008-A-07120; HS8.1-1WE5P-0253
Medina, H.; Chirico, G.B.; Romano, N.
A new assimilation scheme of near-surface soil moisture to identify effective soil hydraulic parameters

A0254; EGU2008-A-09515; HS8.1-1WE5P-0254
Torres, E. A.; Calera, A; Rubio, E.; Gonzalez, J.
Hydrological satellite assisted model for regional scale assessment. Case study in south of spain

A0255; EGU2008-A-04100; HS8.1-1WE5P-0255
Gasoin, S.; Ducharme, A.; Ribstein, P.; Perroy, E.; Wagnon, P.
Establishing the relationship between bare soil albedo and surface soil moisture on the moraine of the Zongo glacier (Bolivia) from in-situ measurements

A0256; EGU2008-A-01081; HS8.1-1WE5P-0256
Chhab, Hechm; Ben Mariem, Fethi; Brahim, M.; Ben El Hadj, Salem
Sap flow and hydraulic conductance of Olive trees

A0257; EGU2008-A-07068; HS8.1-1WE5P-0257
MUBARAK, I; Angulo-Jaramillo, R; Mailhir, J.C.; Boivin, P.; Ruelle, P.; Khalildian, M.R.; Kradia, L.
Identification of a temporal variability of soil hydraulic properties under drip irrigation using Beerkan infiltration method

A0258; EGU2008-A-10913; HS8.1-1WE5P-0258
Bonfante, A; Basile, A.; Manna, P.; Orefice, N.; Terrile, F.
The procedure of calibration of SWAP model in the complexity of vertical soil variability in six Italian cases study

A0259; EGU2008-A-03823; HS8.1-1WE5P-0259
Mirzaei, M.R.; Ruy, S.; Darboux, F.; Gaudu, J.C.; Re- naux, B.
Assessing the influence of the variability of soil surface characteristics on infiltration and runoff: an experimental approach in the lab

A0260; EGU2008-A-07067; HS8.1-1WE5P-0260
Bevilacqua, I.; Ferraris, S.; Calderón Vega, M. F.; Ferraris, S.; Haverkamp, R.
Measured soil water content data and water balance predictions for ESAs method improvement
11:00–11:30; EGU2008-A-11076; HS8.3-1WE2O-003
Muerth, M.; Mauser, W.
Effects of a coupled soil water and heat transfer model on simulated winter runoff in mesoscale catchments (solicited)

11:30–11:45; EGU2008-A-08316; HS8.3-1WE2O-004
Mattern, S.; Vanclouster, M.
Factors affecting groundwater pollution by nitrate in a sandy aquifer

11:45–12:00; EGU2008-A-11127; HS8.3-1WE2O-005
Maggio, F.; Mancarella, D.; Simeone, V.
Analysis of the response to rainfall of Apulian aquifer in relation to their geological characters

12:00 END OF SESSION

HS8.3 Unsaturated zone flow and transport processes: from science to soil and water management – Posters

Conveners: Vanclouster, M.
Co-Conveners(s): Ferraris, S., Coppola, A.
Display Time: Wednesday, 08:00–19:30
Poster Area Hall A
Chairpersons: N.N.

A0271; EGU2008-A-01591; HS8.3-1WE5P-0271
Rezanezhad, F.; Roth, K.
Unstable Fingering Flow Visualisation and Quantification Using Light Transmission Method

A0272; EGU2008-A-03967; HS8.3-1WE5P-0275
Beltman, WHJ; Boesten, JJTI; van der Zee, SEA TM
Leaching of pesticides and implications for pesticide screening

A0273; EGU2008-A-04080; HS8.3-1WE5P-0273
Zumr, D.; Číslérová, M.; Gvoždík, L.; Vogel, T.
Comparing pore water dynamics in earth dam using two different model approaches

A0274; EGU2008-A-04252; HS8.3-1WE5P-0274
Previati, M.; Bevilacqua, I.; Sal vai, L.; Calderón, F.; Haverkamp, R.
Hydrodynamics of slope water management in Tunisia: field survey and prediction model.

A0275; EGU2008-A-04303; HS8.3-1WE5P-0275
Salvai, L.; Canone, D.; Previati, M.; Bevilacqua, I.; Haverkamp, R.
Comparison between the efficiency of different irrigation methods applied in the Piedmont area of Italy

A0276; EGU2008-A-08556; HS8.3-1WE5P-0276
Khlosi, M.; Cornelis, W.M.; Gabriels, D.
Describing the soil-water retention curve between saturation and oven-dryness

A0277; EGU2008-A-10037; HS8.3-1WE5P-0277
Mpuila, T.S.; Cornelis, W.M.; Van Ranst, E.
Pedotransfer functions to predict the water retention curves and oven-dryness

A0278; EGU2008-A-10136; HS8.3-1WE5P-0278
Shokri, N.; Lehmann, P.; Vontobel, P.; Or, D
Effects of wettability on evaporation behavior from porous media

A0279; EGU2008-A-09856; HS8.3-1WE5P-0279
Baroni, G.; Facchi, A.; Gandolfi, C.; Ortuani, B.
Analysis of the performances of methods for the evaluation of soil hydraulic parameters and of their application in two hydrological models

10:00 END OF SESSION

HS8.4 Reconciling Theory, Simulation, and Observations in Subsurface Flow and Transport Modeling – Posters

Conveners: Vrugt, J.
Co-Conveners(s): Vereecken, H., Huisman, S., Ferre, T.
Display Time: Wednesday, 08:00–19:30
Poster Area Hall A
Chairpersons: N.N.

9:00–9:15; EGU2008-A-02501; HS8.4-1WE1O-003
Le Goc, R.; de Dreuzy, J.-R.; Davy, P.
Identification of main flow structures for highly channelled flow in fractured media by solving the inverse problem

9:15–9:30; EGU2008-A-05628; HS8.4-1WE1O-004
Graeff, T.; Bronstert, A.; Bauer, A.; Morgner, M.; Zehe, E.
Spatio-temporal development of water content assessed with STDR-technique and hydrological simulation

9:30–9:45; EGU2008-A-11930; HS8.4-1WE1O-005
Flynn, D.P.; O’Kane, J.P.; Pokrovskii, A.V.
The prediction and identification problems for hysteretic multiphase flow through porous media

9:45–10:00; EGU2008-A-10104; HS8.4-1WE1O-006
Walvoort, D.J.; Heijkers, W.J.M.
Quantification of the accuracy of groundwater characteristics predicted by a linked ‘soil – groundwater – surface water’ model

10:00 END OF SESSION

HS8.4 Reconciling Theory, Simulation, and Observations in Subsurface Flow and Transport Modeling – Posters

Conveners: Vrugt, J.
Co-Conveners(s): Vereecken, H., Huisman, S., Ferre, T.
Display Time: Wednesday, 08:00–19:30
Poster Area Hall A
Chairperson: N.N.

A0280; EGU2008-A-03037; HS8.4-1WE5P-0280
Schneider, K.; Mic, M.; Roth, K.
Dynamics of the Capillary Fringe with a Fluctuating Water Table

A0281; EGU2008-A-07656; HS8.4-1WE5P-0281
Mohrke, O.; Fehr, A.; Klitzsch, N.; Clauser, C.

A0282; EGU2008-A-06000; HS8.4-1WE5P-0282
Delmas, P.; Duwig, C.; MÄ ller, K.; Iler, K.; Prado, B.; Baez, A.
Infiltration of a Fluorescent Dye in Allophanic Soils using Image Analysis: Calibration Procedure

A0283; EGU2008-A-06248; HS8.4-1WE5P-0283
Peters, A.; Durner, W.
A simple Model for describing hydraulic Conductivity in unsaturated porous Media accounting for film and capillary Flow
**HS9.3 Hydrogeophysics in subsurface hydrology**

**Convener:** Vereecken, H.
**Co-Convener(s):** Ferre, T., Yaramanci, U.
**Lecture Room 29**
**Chairperson:** N.N.

- **08:30–08:45:** EGU2008-A-04465; HS8.4-1WE5P-0284
  **Dohnal, M.;** Dusek, J.; Vogel, T.
  On estimation of topsoil near-saturated hydraulic conductivity by mini-disk infiltrometer

- **08:45–09:00:** EGU2008-A-08280; HS8.4-1WE5P-0289
  **Dafflon, B.;** Irving, J.; Kemna, A.; Zimmermann, E.; Glaas, W.; Cassiani, G.; Vereecken, H.
  Inversion Approaches to Cross-Hole Borehole Radar

- **09:00–09:15:** EGU2008-A-08365; HS8.4-1WE5P-0285
  **Divoky, M.;** Kraml, S.; Dohnal, M.; Cislerova, M.
  Evaluation of solute transport experiment done under ponded infiltration conditions

- **09:15–09:30:** EGU2008-A-08758; HS8.4-1WE5P-0286
  **Dusek, J.;** Dohnal, M.,; Vogel, T.
  Evaluation of ponded infiltration experiments in structured soils by numerical modeling

**Poster Area Hall A**
**Display Time:** Wednesday, 08:00–19:30
**Authors in Attendance:** Wednesday, 17:30–19:00
**Chairperson:** N.N.

- **10:30–10:45:** EGU2008-A-05896; HS9.3-1WE20-001
  **Ferre, T.P.A.;** Himnell, A.C.; Huisman, S.A.; Vrugt, J.A.
  Sequential, Joint, and Coupled Inversion: from the State of the Practice toward Improved Hydrogeophysical Assessment (solicited)

- **10:45–11:00:** EGU2008-A-01632; HS9.3-1WE20-002
  **Meles, G.A.;** Ernst, J.R.; van der Kruk, J.; Green, A.G.; Maurer, H.R.; Holliger, K.
  Recent developments in full-waveform inversion of georadar data (solicited)

- **11:00–11:15:** EGU2008-A-03250; HS9.3-1WE20-003
  **Sato, M.;** Takahashi, K.; Zhou, H.
  Inversion Approaches in Cross-Hole Borehole Radar

**MMR**
**11:45–12:00:** EGU2008-A-01396; HS9.3-1WE20-006
**Mangué, M.;** Perroud, H.; Rouset, D.
Inversion of a small number of parameters in cross-well GPR tomography: comparison to GPR velocity obtained from surface acquisition

**12:00 END OF SESSION**
A0295; EGU2008-A-03227; HS9.3-1WES5P-0295
Sato, M.; Takayama, T.
Development and Evaluation of Directional Borehole Radar with Passive Receiver Units

A0296; EGU2008-A-04220; HS9.3-1WES5P-0296
Dyck, M. F.; Kachanoski, R. G.
Measurement of local soil water flux in layered soils using vertical TDR probes

A0297; EGU2008-A-04461; HS9.3-1WES5P-0297
Hydrogeophysical investigations of spatial flow patterns in unsaturated sandy alluvial sediments

A0298; EGU2008-A-05137; HS9.3-1WES5P-0298
Koch, K.; Suski, B.; Kenna, A; Holliger, K.
Use of the spectral induced polarization method to characterize hydrological parameters: Results from laboratory measurements for a range of sandy materials under saturated conditions

A0299; EGU2008-A-05903; HS9.3-1WES5P-0299
Rice, A.; Ferre, T.P.A; Desiltes, D.; Zreda, M.
Predicting the Likely Value of Cosmic-Ray Neutron Measurements to Estimate Soil Hydraulic Property and ET E

A0300; EGU2008-A-07369; HS9.3-1WES5P-0300
Chalikakis, K.; Nielsen, M.R.; Legchenko, A.
Efficiency of magnetic resonance soundings (MRS) for groundwater mapping and modelling in sedimentary aquifers in Denmark

A0301; EGU2008-A-07396; HS9.3-1WES5P-0301
Soliman, M.; Mousa, S.; Ragab, E
Contribution of TEM, DC and GPR to resolve the Environmental problem (Seawater intrusion ) in northern coast of Egypt

A0302; EGU2008-A-07427; HS9.3-1WES5P-0302
Hwang, S.; Shin, J.; Oh, H.; Lee, B.J.; Chi, S.; Park, K.G.
Integrating geophysical well logs, long-term monitoring, and hydrogeochemical data to characterize saltwater intrusion of fractured rock on Yeonggwang-gun, Korea

A0303; EGU2008-A-07597; HS9.3-1WES5P-0303
Rapti-Caputo, D.; Bratus, A.; Yabar Nieto, D.; Sanataro, G.
Hydrogeophysical investigations of alluvial deep aquifer system: results from a test area in northern Italy

A0304; EGU2008-A-07629; HS9.3-1WES5P-0304
Cousin, L.; Séger, M.; Giot, G.; Mahu, F.; Boizard, H.; Richard, G.
Characterisation of the structural heterogeneity of the soil tilled layer in the field by 3D electrical resistivity measurements

A0305; EGU2008-A-07651; HS9.3-1WES5P-0305
Boucher, M.; Favreau, G.; Vuillamoz, J.M.; Legchenko, A.
Relationship between the MRS water content and the specific yield measured by pumping tests in south-west Niger

A0306; EGU2008-A-07674; HS9.3-1WES5P-0306
Van Gils, N. C.; Looms, M. C.; Nielsen, L.; Villholth, K. G.
Hydrogeophysical investigations to assess the carrying capacity of the fresh groundwater resources in the Kalpitiya Peninsula, Sri Lanka

A0307; EGU2008-A-08110; HS9.3-1WES5P-0307
Rumpel, H.-M.; Binot, F.; Gabriel, G.; Siemon, B.; Steuer, A.; Wiederhold, H.
Contribution of geophysical data to 3D aquifer modelling: A case study of the Quaternary buried valley Cuxhavenrinne

A0308; EGU2008-A-08255; HS9.3-1WES5P-0308
Oh, H.; Hwang, S.; Shin, J.
Interpretation of geophysical well logs in coastal aquifer, Yeonggwang-gun, Korea

A0309; EGU2008-A-08933; HS9.3-1WES5P-0309
Hannich, D.; Hoetzl, H.; Ali, W.
New geophysical insights concerning the interfaces between fresh, brackish and saline water in the Ein-Fashkha area at the north-western Dead Sea shore

A0310; EGU2008-A-09082; HS9.3-1WES5P-0310
Clément, R.; Descoëttes, M.; Günther, T.
Influence of shallow infiltration on time-lapse ERT

A0311; EGU2008-A-09492; HS9.3-1WES5P-0311
Rizzo, E.; Straface, S.; Chidichimo, F.; Votta, M.; Lapenna, V.
First hydrogeophysical controlled experiments in the large lab-scale Hydrogeosite Laboratory (IMAA-CN)

A0312; EGU2008-A-09499; HS9.3-1WES5P-0312
Jadoon, K.Z.; Slob, E.C.; Vereecken, H.; Lambot, S.
Shallow geoelectrical and seismic refraction survey for the determination of the thicknesses of the gravel channels in the Cañón de La Huasteca, Santa Catarina Nuevo León, México

A0314; EGU2008-A-10083; HS9.3-1WES5P-0314
Aiuppa, A.; Cosentino, P.; D’Alessandro, A.; Di Maio, R.; Luzio, D.; Martorana, R.; Messina, N.
Geophysical study of the hydrothermal reservoir in the Panza area (Ischia, Italy)

A0315; EGU2008-A-11191; HS9.3-1WES5P-0315
Hauck, C.; Rings, J.
Application of hydrogeophysical methods to monitor and quantify the subsurface ice and water content in frozen regions

A0316; EGU2008-A-12208; HS9.3-1WES5P-0316
Mekhemer, H.M.
Geochemical evaluation and hydrochemical zonation for the Nubia aquifer in the Ganah area, El-Kharga Oasis, Egypt

HS9.5 Urban impacts on soils and groundwater – Requirement of groundwater management

Convener: Mohrlok, U.
Co-Convener(s): Karatzas, G., Schiedek, T.
Lecture Room 33
Chairperson: U. MOHRLOK

13:30–13:45; EGU2008-A-05371; HS9.5-1WES3O-001
Jeppesen, J.; Christensen, S.; Ladekarl, U.
Simulation of the historical development of the water cycle in the Copenhagen area, Denmark

13:45–14:00; EGU2008-A-03561; HS9.5-1WES3O-002
Musolf, A.; Leschik, S.; Strauch, G.; Reinstorf, F.; Schirmer, M.
Emerging contaminants in the aquatic environment at the watershed scale

14:00–14:15; EGU2008-A-00455; HS9.5-1WES3O-003
Du, X.Q.
Study on impact of artificial recharge on groundwater quality
HS9.5 Impacts on soils and groundwater – Requirement of groundwater management – Posters

Convenor: Mohrok, U.
Co-Conveners: Karatzas, G., Schiedek, T.
Display Time: Wednesday, 08:00–19:30
Authors in Attendance: Wednesday, 17:30–19:00
Chairperson: N.N.

A0317; EGU2008-A-09260; HS9.5-1WE5P-0317
Bonomi, B.; Canepa, C.; Del Rosso, D.
Groundwater variation volumes according to piezometric level trend.

A0318; EGU2008-A-06318; HS9.5-1WE5P-0318
Le Delliou, A.-L.; Rodriguez, F.; Andrieu, H.
Modeling of sewer network impacts on urban groundwater

A0319; EGU2008-A-03325; HS9.5-1WE5P-0319
Leschik, S.; Musolf, A.; Reinstorf, F.; Strauch, G.; Schirmer, M.
Assessment of the effects of leaky sewers on groundwater quality

A0320; EGU2008-A-10860; HS9.5-1WE5P-0320
Discussion of the estimation of the water fluxes, sediments and heavy metals in a retention-infiltration basin

A0321; EGU2008-A-10848; HS9.5-1WE5P-0321
EL TABACH, E.; schertzer, D.; tchiguirinskaia, I.
New methodology to design a combined trough canal drain-trench system to manage stormwater runoff in urban area for a sustainable development

A0322; EGU2008-A-11829; HS9.5-1WE5P-0322
Environmental geophysics in urban areas

A0323; EGU2008-A-12070; HS9.5-1WE5P-0323
Schiidedek, T.; Beier, M.; Ebhardt, G.
Monitoring urban impact on groundwater quality – Statistical analyses in Darmstadt, Germany

A0324; EGU2008-A-10897; HS9.5-1WE5P-0324
Mohrok, U.; Bethge, E.
Balancing spatial and temporal variability of infiltration processes as basis for urban soil and groundwater management

A0325; EGU2008-A-09748; HS9.5-1WE5P-0325
Reinstorf, F.; Leschik, S.; Musolf, A.; Strauch, G.; Osenbrück, K.; Schirmer, M.
Mass fluxes and integrated modelling of urban micropollutants

15:00 END OF SESSION

HS10.13 Hydrological measurements: experimental catchments of different scales for interdisciplinary research – Posters

Convenor: Pfister, L.
Co-Conveners: Brilly, M.
Display Time: Wednesday, 08:00–19:30
Authors in Attendance: Wednesday, 17:30–19:00
Chairperson: N.N.

A0326; EGU2008-A-01830; HS10.13-1WE5P-0326
Gerrits, A.; Pfister, L.; Savenije, H.H.G.
Uncertainties in canopy and forest floor interception

A0327; EGU2008-A-02979; HS10.13-1WE5P-0327
Vidmar, A.; Brilly, M.
Water level measurement by self-sufficient equipment

A0328; EGU2008-A-05414; HS10.13-1WE5P-0328
Johnst, M.; Casper, M.
Different approaches to investigate flood generating mechanisms in the low mountain range basin Frankelbach

A0329; EGU2008-A-06535; HS10.13-1WE5P-0329
Stream water composition changes in the Vosges Mountains (NE France): long-term study and liming experiment.

A0330; EGU2008-A-06991; HS10.13-1WE5P-0330
Gallari, F.; Latron, J.; Llorens, P.; Butturini, A.
A comparison of different methods to assess baseflow contribution to streamflow in a small mountain Mediterranean basin (Vallecebre, Eastern Pyrenees).

A0331; EGU2008-A-08162; HS10.13-1WE5P-0331
Investigation of runoff generation processes at the headwater scale: a multidisciplinary comparative approach

A0332; EGU2008-A-09258; HS10.13-1WE5P-0332
Molénat, J.; Gascuel-Odoux, C.; Aquilina, L.; Martin, C.; Ayraud, V.; Ruiz, L.; Labasque, T.; Fauchex, M.; Davy, P.; Mérot, P.
Comparison of three approaches to estimate residence and transit times in headwater catchments (Environmental Research Observatory AgrHyS, France).

A0333; EGU2008-A-09290; HS10.13-1WE5P-0333
Seeling, M.; Meyer, B.; Bierl, R.
An experimental catchment setup to investigate opportunities to strengthen multifunctionality of small urban rivers – an interdisciplinary approach

A0334; EGU2008-A-10550; HS10.13-1WE5P-0334
Carriero, D.; Onorati, B.; Fiorentino, M.
Study of the hydrological behaviour of an experimental basin

A0335; EGU2008-A-11627; HS10.13-1WE5P-0335
Kulhavy, Z.; Tlapakova, L.; Dolezal, F.
Integrated monitoring, real-time modelling and forecasting of hydrological processes in small agricultural and forest catchments
HS11.1 Remote sensing retrieval techniques and data assimilation

Convener: Verhoeest, N.
Co-Convener(s): Tedesco, M., Wood, E.
Lecture Room 33
Chairperson: N.N.

15:30–15:45; EGU2008-A-00651; HS11.1-1WE4O-001
Galleguillos, M.; Jacob, F.; Prevot, L.; Lagacherie, P.
Estimating grapevine hydric status within heterogeneous Mediterranean vineyards from high spatial resolution optical remote sensing.

15:45–16:00; EGU2008-A-10959; HS11.1-1WE4O-002
Braun, M.; Mauser, W.
Segmentation of moderate resolution reflectances using high resolution land cover information and a priori knowledge on reflectance properties.

16:00–16:15; EGU2008-A-07698; HS11.1-1WE4O-003
Marzahn, P.; Ludwig, R.
Derivation of soil surface roughness dynamics from multi-temporal and multi-parametric airborne PolSAR data (solicited).

16:15–16:30; EGU2008-A-09401; HS11.1-1WE4O-004
van der Tol, C.; Timmermans, J.; van der Tol, S.; Su, Z.; Timmermans, W.
A Bayesian approach to improve remote sensing of sensible and latent heat fluxes.

Thursday

IS24 - HS2.4/NP3.10 Precipitation: from measurement to modelling and application in catchment hydrology (co-organised by HS & NP, co-listed in AS)

Convener: Cârsteanu, A.
Co-Convener(s): Anagnostou, E., Uijlenhoet, R., Onof, C., Srikanthan, S., Burlando, P., Pegram, G., Berne, A., Troch, P., Krajewski, W., Levizzani, V.
Lecture Room 29
Chairperson: ANAGNOSTOU, E.

8:30–8:45; EGU2008-A-02522; IS24 - HS2.4/NP3.10-1TH2O-001
Alpert, P.; Rayitsfeld, A.
Rainfall analysis using cellular networking measurements.

8:45–9:00; EGU2008-A-03030; IS24 - HS2.4/NP3.10-1TH2O-002
Laviola, S.; Levizzani, V.
Rain rate retrieval using the 183-WSL algorithm.

9:00–9:15; EGU2008-A-07717; IS24 - HS2.4/NP3.10-1TH2O-003
Schüttemeyer, D.; Grasselt, R.; Simmer, C.; Warrach-Sagi, K.; Meetschen, D.
Towards a radar-based operational flood forecast system for river catchments in Germany.

9:15–9:30; EGU2008-A-09702; IS24 - HS2.4/NP3.10-1TH2O-004
Heistermann, M.; Kneis, D.; Bronstert, A.
Evaluation of radar-based rainfall estimation by cross validation and runoff simulation.

9:30–9:45; EGU2008-A-02237; IS24 - HS2.4/NP3.10-1TH2O-005
Zauli, F.; Biron, D.; Melfi, D.
The precipitation products chain for the EUMETSAT Hydrological Satellite Application Facility.

9:45–10:00; EGU2008-A-10466; IS24 - HS2.4/NP3.10-1TH2O-006
Nikolopoulos, E.I.; Anagnostou, E.N.; Gebremichael, M.; Borga, M.
The Use of Remotely Sensed Rainfall to Predict Floods in Mountainous Basins

10:00 COFFEE BREAK

Chairperson: KOUTSOYIANNIS, D.

10:30–10:45; EGU2008-A-08767; IS24 - HS2.4/NP3.10-1TH2O-001
Lovejoy, S.; Schertzer, D.; Allaire, V.
Using cascade models to understand TRMM space-time satellite precipitation reflectivities from 20000 to 4km, from days to years.

10:45–11:00; EGU2008-A-00011; IS24 - HS2.4/NP3.10-1TH2O-002
Little, M. A.; McSharry, P. E.; Taylor, J. W.
Parsimonious Modeling of UK Daily Rainfall for Density Forecasting.

11:00–11:15; EGU2008-A-06771; IS24 - HS2.4/NP3.10-1TH2O-003
Kigobe, M.; McIntyre, N.; Wheater, H. S.
Use of Generalised Linear Models (GLMs) to analyse the Spatial and Temporal Precipitation patterns in Kyoga basin within the Upper Nile.

11:15–11:30; EGU2008-A-03613; IS24 - HS2.4/NP3.10-1TH2O-004
Haberlandt, U.; Ehber von Eschenbach, A.-D.; Buchwald, I.
A hybrid hourly rainfall Model for derived Flood Frequency Analysis.

11:30–11:45; EGU2008-A-04010; IS24 - HS2.4/NP3.10-1TH2O-005
Bardossy, A.; Pegram, G.
A copula based multisite model for daily precipitation simulation.

11:45–12:00; EGU2008-A-10084; IS24 - HS2.4/NP3.10-1TH2O-006
Onof, C.; Cowpertwait, P.; Isham, V.
Progress in single-site Poisson-cluster modelling of rainfall

12:00 LUNCH BREAK
Chairperson: UIJLENHOET, R.

Fiener, P.
Farm-scale spatio-temporal variability of rainfall characteristics – do we use the right inputs to develop and test erosion models?

13:45–14:00; EGU2008-A-04734; IS24 - HS2.4/NP3.10-ITTH5O-002
Combining radar and rain gauges to capture the space-time variability of monsoon rainfall during an extreme flood event

14:00–14:15; EGU2008-A-05836; IS24 - HS2.4/NP3.10-ITTH5O-003
Hugenschmidt, C.; Ingwersen, J.; Sukvanachaikul, Y.; Uhlensbrook, S.; Streck, T.
Analyzing rainfall-runoff characteristics in an upland river: How to predict transport of agrochemicals in stream water

14:15–14:30; EGU2008-A-00721; IS24 - HS2.4/NP3.10-ITTH5O-004
Spatial and temporal precipitation variability in Honduras - data-quality assessment, spatial interpolation and dataset creation

14:30–14:45; EGU2008-A-02438; IS24 - HS2.4/NP3.10-ITTH5O-005
Nicotina, L. and Alessi Celegon, E.; Rinaldo, A.; Marani, M.
The impact of rainfall spatial variability on the hydrologic response

14:45–15:00; EGU2008-A-00348; IS24 - HS2.4/NP3.10-ITTH5O-006
Pechlivanidis, I.; McIntyre, N.; Wheeler, H.; Moore, R.
Intercomparison of lumped versus distributed hydrological model on the Upper Lee catchment

15:00 END OF SESSION

IS24 - HS2.4/NP3.10 Precipitation: from measurement to modelling and application in catchment hydrology (co-organised by HS & NP, co-listed in AS) – Posters

Convener: Carsteaun, A.
Co-Conveners(s): Anagnostou, E., Uijlenhoet, R., Onof, C., Srikanthan, S.; Krajewski, W., Levizzani, V.
Display Time: Thursday, 08:00–19:30

Authors in Attendance: Thursday, 17:30–19:00
Poster Area Hall A
Chairperson: Carsteaun, A.

A0221; EGU2008-A-00506; IS24 - HS2.4/NP3.10-ITTH5P-0221
New scheme result of adjustment the radar rainfall estimation in Cuba

A0222; EGU2008-A-01926; IS24 - HS2.4/NP3.10-ITTH5P-0222
Chebbi, A.; Da Cunha, M.; Kebaili Bargaoui, Z.
Optimal pluviograph network design using geostatistics and Simulated Annealing

A0223; EGU2008-A-03354; IS24 - HS2.4/NP3.10-ITTH5P-0223
Njukom, F.; Achu, W.; Magha, N.; Kamdem, R.
The use of rights based advocacy and community based volunteers’ approaches in managing and resolving water conflicts in Cameroon; ‘the case of the North West Province’

A0224; EGU2008-A-06020; IS24 - HS2.4/NP3.10-ITTH5P-0224
Hazenberg, P.; Uijlenhoet, R.; Leijnse, H.; Delobbe, L.
Analyzing the spatial and temporal properties of precipitation above the Ourthe catchment and its influence on the flood response

A0225; EGU2008-A-08004; IS24 - HS2.4/NP3.10-ITTH5P-0225
Schulz, M.S.; Dr. Berger, F.B.
Determination of rainfall intensities and patterns from the MSG satellite

A0226; EGU2008-A-08522; IS24 - HS2.4/NP3.10-ITTH5P-0226
Vermeer, P.A.; Huber, M.; Möllmann, A.
Case study about the reliability analysis of dike stability

A0227; EGU2008-A-09943; IS24 - HS2.4/NP3.10-ITTH5P-0227
Brommundt, J.; Bárdossy, A.
Application of correlation calculated from radar data in a time series generator for precipitation on the ground

A0228; EGU2008-A-10514; IS24 - HS2.4/NP3.10-ITTH5P-0228
Diederich, M.; Simmer, C.
A locally adapted multi-sensor precipitation estimate derived from satellite and ground observations for Benin

A0229; EGU2008-A-00859; IS24 - HS2.4/NP3.10-ITTH5P-0229
Bussi, G.; Grossi, G.
A stochastic approach to link predicted precipitation fields at different spatial scales

A0230; EGU2008-A-01648; IS24 - HS2.4/NP3.10-ITTH5P-0230
Grieser, J.; Jawson, S.
The RMS Hurricane-Rain Model

A0231; EGU2008-A-05498; IS24 - HS2.4/NP3.10-ITTH5P-0231
Barbulescu, A.
Modeling the evolution of precipitations in Dobrogea

A0232; EGU2008-A-01915; IS24 - HS2.4/NP3.10-ITTH5P-0232
Vandenberghs, S.; Verhoeff, N.; De Baets, B.
Copula-based frequency analysis of 105-year 10-minute precipitation data observed at Uccle, Belgium

A0233; EGU2008-A-11338; IS24 - HS2.4/NP3.10-ITTH5P-0233
Vermeer, P.A.; De Baets, B.
Determination of rainfall intensities and patterns from the MSG satellite

A0234; EGU2008-A-11531; IS24 - HS2.4/NP3.10-ITTH5P-0234
Guerra-Cobian, V.H.; Ba, K.M.; Diaz-Delgado, C.; Ba, K.M.; Diaz-Delgado, C.; Guerra-Cobian, V.H.
Modeling the evolution of precipitations in Dobrogea

A0235; EGU2008-A-00702; IS24 - HS2.4/NP3.10-ITTH5P-0235
Papalexio, S.M.; Koutsoyiannis, D.
Ombrian curves in a maximum entropy framework
Modelling of hourly Point Rainfall using an Alternating Renewal Model with 2-Copulas for derived Flood Frequency Analysis

Disaggregation of continuous Rainfall Time Series for Applications in Urban Hydrology – a Case Study

Modelling of daily rainfall for flood risk assessment using a mixed distribution

Long tails of marginal distribution and autocorrelation function of rainfall produced by the maximum entropy principle

Application of a stochastic rainfall model for disaggregation

Effect of different Approaches for Estimating Semi-variograms on the spatial Interpolation Performance of Precipitation

Monthly variations in rainfall and time to ponding in Mediterranean soils: implications on effective runoff generation

A non-stationary Neyman-Scott model for rainfall (cancelled)

Rainfall events: importance of the criteria used for their identification in pluviograph records.

Long-term change of rainfall-runoff response

Hydrological response with respect to soil characteristics in a context of Mediterranean extreme events

Temporal dynamics of runoff and erosion risk in a cultivated catchment of the loess belt: temporal patterns of rainfall and evolution of soil surface state

Dynamic identification of moisture sources in the Orinoco Basin in Equatorial South America

Rainfall input spatial characterisation for hydrologic simulation

HS3.1 Predictive probability, uncertainty and data assimilation in hydrological forecasting

Uncertainty quantification by a probabilistic hydrological forecast

Combination of spatially distributed flood forecasting models by dominant processes and event types

How to Improve the Hydrologic Predictability: From Bayesian Model Averaging to Sequential Bayesian Model Combination

Novel method to estimate predictive uncertainty of flow forecasting

How to Improve the Hydrologic Predictability: From Bayesian Model Averaging to Sequential Bayesian Model Combination

The Ensemble Kalman Filter for improving operational flood forecasting with a 1D-hydraulic model: a case study for the River Rhine

The Ensemble Kalman Filter for real-time groundwater Flow Modeling of the upper Limmat aquifer in Zurich (Switzerland)
11:15–11:30; EGU2008-A-05726; HS3.1-1TH2O-004
Bessière, H.; Dartus, D.
A variational data assimilation technique for flash flood forecasting

11:30–11:45; EGU2008-A-10119; HS3.1-1TH2O-005
Cole, S.J.; Moore, R.J.
Initialisation and data assimilation of a distributed flood forecasting model

11:45–12:00; EGU2008-A-10852; HS3.1-1TH2O-006
Schaake, J.
A post-processor for hydrologic ensemble forecasts

12:00 END OF SESSION

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HS3.1 Predictive probability, uncertainty and data assimilation in hydrological forecasting – Posters

Convener: Moore, R.
Co-Conveners: Todini, E., Loukas, A., Madsen, H., Thielen-del Pozo, J.
Display Time: Thursday, 08:00–19:30

Authors in Attendance: Thursday, 17:30–19:00
Poster Area Hall A
Chairperson: LOUKAS, A.

A0250; EGU2008-A-11546; HS3.1-1TH5P-0250
Ebtehaj, M.; Moradkhani, H.
An alternative scheme in generating the forcing data ensemble for improved ensemble streamflow prediction

A0251; EGU2008-A-10385; HS3.1-1TH5P-0251
Ebert, C.; Bárdossy, A.; Bliefernicht, J.
A heteroscedastic error model and its operational application for flood forecasting

A0252; EGU2008-A-04131; HS3.1-1TH5P-0252
Ceppi, A.; Ravazanni, G.; Mancini, M.
Hydro-meteorological chain for flood forecasting in the alpine region: a multi-model comparison

A0253; EGU2008-A-08468; HS3.1-1TH5P-0253
Zhang, X.; Hörmann, G.; Fohrer, N.
Parameter calibration and uncertainty estimation of a simple rainfall-runoff model in two case studies

A0254; EGU2008-A-07817; HS3.1-1TH5P-0254
Zhang, X.; Hörmann, G.; Fohrer, N.
Structural uncertainty assessment in a discharge simulation model ensemble

A0255; EGU2008-A-04369; HS3.1-1TH5P-0255
Faybishenko, B.; Neuman, S.P.
Quantifying epistemic and parameter uncertainties in predictions of evaporation and net infiltration, using maximum likelihood Bayesian model averaging

A0256; EGU2008-A-08613; HS3.1-1TH5P-0256
Vandenberghhe, V.; Huygens, M.; Vanneuville, W.
Influence of measurement uncertainties on results of hydrological models

A0257; EGU2008-A-03053; HS3.1-1TH5P-0257
Pande, S.; McKee, M.; Bastidas, L.; Kembowski, M.; Walker, W.
Robust hydrologic prediction based on complexity

A0258; EGU2008-A-05578; HS3.1-1TH5P-0258
Reichert, P
Dynamic Emulators as Tools for Improving Calibration and Uncertainty Analysis in Hydrology

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HS3.3 Medium and long-term hydrological forecasting for water management and water allocation

Convener: Thoth, E.
Co-Conveners: Aronica, G., Butts, M., Loukas, A.
Lecture Room 32
Chairperson: TÓTH, E.

13:30–13:45; EGU2008-A-00239; HS3.3-1TH3O-001
Gelati, E.; Madsen, H.; Rosbjerg, D.
Hidden Markov models for non-stationary runoff modelling conditioned on El Niño information

13:45–14:00; EGU2008-A-07863; HS3.3-1TH3O-002
Di Mauro, G.; Bonaccorso, B.; Cancelliere, A.; Rossi, G.
Potential of North Atlantic Oscillation Index to forecast drought in Sicily

14:00–14:15; EGU2008-A-08458; HS3.3-1TH3O-003
Vasiliades, L.; Loukas, A.
Meteorological drought forecasting models

14:15–14:30; EGU2008-A-02103; HS3.3-1TH3O-004
Danhelka, J.
Implementing medium to long range hydrological forecasting in the Czech Republic

14:30–14:45; EGU2008-A-06885; HS3.3-1TH3O-005
Panagoulia, D.
Soil moisture forecasting via two different hydrological models
HS3.3 Medium and long-term hydrological forecasting for water management and water allocation – Posters
Convener: Toth, E.
Co-Convener(s): Aronica, G., Butts, M., Loukas, A.
Display Time: Thursday, 08:00–19:30
Authors in Attendance: Thursday, 17:30–19:00
Poster Area Hall A
Chairperson: N.N.

A0267; EGU2008-A-08069; HS3.3-1TH5P-0267
Niemyer, S.; Laguardia, G.; Kurnik, B.; Rossi, S.
On the predictability of droughts over Europe by means of the Standardized Precipitation Index and the ECMWF monthly forecasts

A0268; EGU2008-A-02265; HS3.3-1TH5P-0268
Switanek, M.; Troch, P.A.; Castro, C.
Quantifying the hydrologic effect of climate variability in the lower Colorado

A0269; EGU2008-A-09501; HS3.3-1TH5P-0269
Hattermann, F.F.; Conradt, T.; Kaltofen, M.; Koch, H.; Kysanova, V.; Wechsung, F.
Quantification of climate change impacts on water resources in Central Europe: changes in flow regimes and uncertainty

A0270; EGU2008-A-11772; HS3.3-1TH5P-0270
Lavers, D.A.; Hannah, D.M.; Prudhomme, C.; Troccoli, A.
Seasonal river flow forecasting using multi-model ensemble climate data

A0271; EGU2008-A-03060; HS3.3-1TH5P-0271
Puzzoni, M.; Salvadé, G.
An hydrological model to optimize hydropower production

A0272; EGU2008-A-07304; HS3.3-1TH5P-0272
Aronica, G.T.; Arena, C.; Franza, F.
Predicting daily streamflow using a parsimonious rainfall-runoff model with rainfall forecasts finalised to water resources allocation in a Sicilian catchment

A0273; EGU2008-A-05501; HS3.3-1TH5P-0273
Komorníková, M.; Szolgay, J.; Svetlíková, D.; Szökeová, D.
Combined deterministic – stochastic forecasting of monthly river flows

A0277; EGU2008-A-00182; HS3.3-1TH5P-0277
Panagoulia, D.
Snow melt forecasting from incomplete meteorological data

A0276; EGU2008-A-11897; HS3.3-1TH5P-0276
Win Zin, Win
Runoff simulation using simple conceptual HBV model in chindwin river basin

A0274; EGU2008-A-09729; HS3.3-1TH5P-0274
February 20, 2008
Fatici, S.; Caporali, E.
A comparison between a physical based and conceptual snowpack model to improve hydrological simulations

A0275; EGU2008-A-06943; HS3.3-1TH5P-0275
Panagoulia, D.
Snow melt forecasting from incomplete meteorological data

A0276; EGU2008-A-11897; HS3.3-1TH5P-0276
Win Zin, Win
Runoff simulation using simple conceptual HBV model in chindwin river basin

A0277; EGU2008-A-00182; HS3.3-1TH5P-0277
Kebede Gurmessa, T.
A principal components regression approach to model the spatio-temporal bed evolution of reservoirs

HS3.4 Hydrological Forecasting Open Session. Local, regional and national hydrological forecasting systems. Real-world case studies

Convener: Balint, G.
Co-Convener(s): Blöschl, G., Reggiani, P., Szolgay, J.
Chairperson: BÁLINT, G.
Display Time: Thursday, 08:00–19:30
Authors in Attendance: Thursday, 17:30–19:00
Poster Area Hall A

A0278; EGU2008-A-05951; HS3.4-1TH5P-0278
Hlavcová, K.; Szolgay, J.; Kohnova, S.; Kubes, R.
Assessing performance of flood forecasting system based on medium range numerical weather forecasts and rainfall-runoff modelling in Slovakia

A0279; EGU2008-A-12107; HS3.4-1TH5P-0279
Leskova, D.; Babiaikova, G.; Roncak, P.; Wendlova, V.; Benko, M.
Flood warning and forecasting system of the Slovak Republic

A0280; EGU2008-A-12350; HS3.4-1TH5P-0280
Gauzer, B.; Cisk, A.; Bartha, P.; Konecsny, K.; Lucza, Z.; Balint, G.
Development of the upper Tisza flood forecasting system

A0281; EGU2008-A-12233; HS3.4-1TH5P-0281
Komma, J.; Blöschl, G.; Reszler, Ch.
Design of the Kamp flood forecasting model
A0282; EGU2008-A-07286; HS3.4-1TH5P-0282
Blum, JD; Hamburg, SP; Yanai, RD; Arthur, MA
Comparative testing of rainfall-runoff models in different climate and landscape conditions of Austria and Russia

A0283; EGU2008-A-04602; HS3.4-1TH5P-0283
Gartsman, B.I.; Tegai, N.D.; Blöschl, G.; Parajka, J.
Use of foliar Ca/Sr discrimination and 87Sr/86Sr ratios to determine soil Ca sources to sugar maple and American beech foliage in a northern hardwood forest

A0284; EGU2008-A-02318; HS3.4-1TH5P-0284
McMillan, H. K.; Clark, M. P.; Ibbitt, R. P.
Planned multi-model ensemble hydrologic forecasts in support of NOAA NWSRFS

A0285; EGU2008-A-04185; HS3.4-1TH5P-0285
Villela, M.; Valencia, J.L.; Vicente, M.L.
Dynamic regression to determine length and intensity of the effect of flow increase in salts concentration in Ebro river (Spain)

A0286; EGU2008-A-05833; HS3.4-1TH5P-0286
Chen, N.C.; Lee, K.T.; Gartsman, B.I.; Bugaets, A.N.
Applications of kinematic-wave based geomorphologic UH model for rainfall floods prediction in Taiwan and Russia

A0287; EGU2008-A-07038; HS3.4-1TH5P-0287
Versace, P.; Biondi, D.
The real-time warning system for hydrogeological risk mitigation of the Calabria region

A0288; EGU2008-A-07697; HS3.4-1TH5P-0288
Application of chosen black box models for flood forecasting purposes in the small basins

A0289; EGU2008-A-11356; HS3.4-1TH5P-0289
Lihua, Tang; Xianbi, Lv; Sicong, Zhang; Chuang, Chen; Yuefen, Zhao; Junmei, Liu
An urban flood model based on two-layer water flow and its application

A0290; EGU2008-A-04892; HS3.4-1TH5P-0290
Li, Mou; Tian, Y.; Guo, D.; Zeng, J.; Zhao, J.; Fan, Y.; Liu, Y.
Evaluation of rainfall-runoff models for flood forecasting purposes in the small basins

A0291; EGU2008-A-11596; HS3.4-1TH5P-0291
Wang, Y.-C.; Chen, S.-T.; Li, M.-X.; Yu, P.-S.
Updating real-time flood forecasts of a grid-based distributed rainfall-runoff model

A0292; EGU2008-A-12352; HS3.4-1TH5P-0292
Stanev, K.
Upper Mesta river basin runoff modeling (solicited)

13:45–14:00; EGU2008-A-07592; HS8.5-1TH3O-002
Rothfuss, Y.; Bariac, T.; Braud, I.; Durand, J.L.; Biron, P.; Richard, P.; Canale, L.
Linking root extraction depths and plant contribution to evapotranspiration using isotopes of water in controlled conditions

14:00–14:15; EGU2008-A-05460; HS8.5-1TH3O-003
van der Ploeg, MJ; Gooren, HPA; Bakker, G; de Rooij, GH
Investigating root water uptake in dry soil by monitoring the soil water potential with polymer tensiometers

14:15–14:30; EGU2008-A-10107; HS8.5-1TH3O-004
Carminati, A.; Oswald, S.; Esser, H.; Vetterlein, D.; Vogel, H.-J.; Vontobel, P.
Root uptake and water redistribution in soils: a neutron radiography and interpretation

14:30–14:45; EGU2008-A-09980; HS8.5-1TH3O-005
Calderwood, T.; Young, M.; Zhu, J.; McDonald, E.
Grading of Soil Hydraulic Properties from Canopy to Interspace on a Mojave Desert Soil Chronosequence

14:45–15:00; EGU2008-A-06195; HS8.5-1TH3O-006
Montaldo, N.; Vacca, M.; Cortis, C.; Albertson, J. D.
The role of Vegetation Dynamics on the Soil Water Balance of a Water-limited Mediterranean Ecosystem on Sardinia

15:00 END OF SESSION

HS8.5 Investigating and understanding soil-plant interactions from micro to plot scale (co-listed in SSS) – Posters

Convener: Van der Ploeg, M.
Co-Conveners(s): Javaux, M., Ursino, N., Vanderborght, J.
Display Time: Thursday, 08:00–19.30

Authors in Attendance: Thursday, 17:30–19:00
Poster Area Hall A
Chairperson: VAN DER PLOEG, M.

A0293; EGU2008-A-01166; HS8.5-1TH5P-0293
Márton, L.
Crop Mn2+ Demand at Juvenile Phenophase of Growth

A0294; EGU2008-A-01195; HS8.5-1TH5P-0294
Márton, L.
Phytoremediation: Fertilization impact on heavy metal translocation from soil to triticale shoot (x Triticosecale W.)

A0295; EGU2008-A-01199; HS8.5-1TH5P-0295
Márton, L.
PHYTOREMEDIATION: NPCKaMg NUTRITION IMPACT ON Al, Ba, Pb, Sr, Ni, and Cd TRANSLOCATION FROM SOIL TO TRITICALE SEED (x Triticosecale W.)

A0296; EGU2008-A-02394; HS8.5-1TH5P-0296
Xu, X.; Stange, C.L.; Richter, A.; Wanek, W.; Kuzyakov, Y.
Light affects competition for inorganic and organic nitrogen between maize and rhizosphere microorganisms

A0297; EGU2008-A-07152; HS8.5-1TH5P-0297
Nitrogen movement in plant-soil-groundwater system in agricultural production

A0298; EGU2008-A-01624; HS8.5-1TH5P-0298
Mirás-Avalos, J.M.; Dunfield, K.E.; Antunes, P.M.; Koch, A.; Khosla, K.; Sande-Fouz, P.
Effects of soil disturbance on arbuscular mycorrhizal fungal communities of soil and plant roots
Influence of root length density on vertical water uptake

A0299; EGU2008-A-01677; HS8.5-1TH5P-0299
Enhancing the reactive transport of arsenic in the rhizosphere

A0301; EGU2008-A-05854; HS8.5-1TH5P-0301
A conceptual model to quantify plant root induced changes in soil hydraulic conductivity and water retention

A0302; EGU2008-A-09858; HS8.5-1TH5P-0302
Implications of Under-Canopy and Interspace Soil Hydraulic Property Distributions in Large Scale Desert Ecosystems

A0303; EGU2008-A-10317; HS8.5-1TH5P-0303
Soil moisture during midlatitude continental summers: an experimental and modeling analysis

A0304; EGU2008-A-04180; HS8.5-1TH5P-0304
Electrical resistivity tomography imaging: a way for assessing water uptake heterogeneity at the field scale

A0305; EGU2008-A-08398; HS8.5-1TH5P-0305
Dynamic of nickel in the rhizosphere of Berkheya coddii using magnetic resonance imaging

A0306; EGU2008-A-08843; HS8.5-1TH5P-0306
Magnetic Resonance Imaging Methods for Monitoring Root Water Uptake and Architecture

A0307; EGU2008-A-09125; HS8.5-1TH5P-0307
Advances in Determining Soil Matric Potential Using an Engineered Porous Ceramic and Dielectric Permittivity

A0308; EGU2008-A-11689; HS8.5-1TH5P-0308
Spatial variability of soil root zone properties using electrical imaging techniques in a peach orchard system

A0309; EGU2008-A-04214; HS8.5-1TH5P-0309
Effects of different root morphological characteristics on root extraction functions and soil water dynamics for three crops

A0310; EGU2008-A-06829; HS8.5-1TH5P-0310
How to represent root water uptake below the soil voxel scale?

A0311; EGU2008-A-07806; HS8.5-1TH5P-0311
Application of the rhizosphere model RhizoMath for modelling the reactive transport of arsenic in the rhizosphere

A0312; EGU2008-A-10644; HS8.5-1TH5P-0312
Influence of root length density on vertical water uptake profiles.
11:45–12:00; EGU2008-A-09259; HS8.6-1TH5P-006
Hinderer, J.; de Linage, C.; Boy, J.-P.; Masson, F.; Gegout, P.; Seguis, L.; Favreau, G.; Genthon, P.
How to combine hydrology and geodesy to investigate water storage changes: the GHYRAF (Gravity and Hydrology in Africa) experiment?

12:00 END OF SESSION

HS8.6 Large Lysimeter Studies and Water Budget Prediction of Ungauged Land Surface Elements (co-listed in SSS) – Posters

Convener: Durner, W.
Co-Conveners: Puetz, T., Fank, J.
Display Time: Thursday, 08:00–19:30

Authors in Attendance: Thursday, 17:30–19:00
Poster Area Hall A
Chairperson: FANK, J.

A0313; EGU2008-A-08480; HS8.6-1TH5P-0313
Puetz, T.; Schillings, J.; Sievering, R.; Vereecken, H.
Impact on a soil monolith during lysimeter filling

A0314; EGU2008-A-09892; HS8.6-1TH5P-0314
Semenov, V.; Zeiliger, A.
Observation and analysis of microscale heterogeneity of infiltration and water flow in Chernozem and black-chestnut soils

A0315; EGU2008-A-12010; HS8.6-1TH5P-0315
Durner, W.; Fank, J.
Testing fringe effects for bromide transport in high precision weighable field lysimeters

A0316; EGU2008-A-12304; HS8.6-1TH5P-0316
Klier, Ch.; Grundmann, S.; Gayler, S.; Priesack, E.
Environmental fate of the herbicide glyphosate: Monitoring and modelling using large-scale weighing lysimeters

A0317; EGU2008-A-05991; HS8.6-1TH5P-0317
Lenartz, B.; Bohne, K.; Lenartz, F.
On the equifinality of Van Genuchten parameter sets as obtained from a sand lysimeter under finger flow conditions

A0318; EGU2008-A-05810; HS8.6-1TH5P-0318
Almond, P.; Buchan, G.; Carrick, S.; Smith, N.
In-situ characterisation of soil hydraulic attributes for the individual layers of a multilayered soil column

A0319; EGU2008-A-09014; HS8.6-1TH5P-0319
Durner, W.; Jansen, U.; Iden, S.C.
Effective hydraulic behaviour of lysimeters with layered soils

A0320; EGU2008-A-12049; HS8.6-1TH5P-0320
Transferability of hydraulic properties from lab measurements to a lysimeter

A0321; EGU2008-A-07419; HS8.6-1TH5P-0321
Hinz, C.J.; Struthers, I.; Sivapalan, M.
Water balance and growth relations of a pine stand in a large lysimeter in Eastern Germany

A0322; EGU2008-A-08433; HS8.6-1TH5P-0322
Nolz, R.; Cepuder, P.
Evapotranspiration and percolation of a lysimeter

A0323; EGU2008-A-08426; HS8.6-1TH5P-0323
Braiečiūtė-Železnik, B.; Zupanc, V.; Pintar, M.
Soil Water Balance for Lysimeter station Kleée

A0324; EGU2008-A-12046; HS8.6-1TH5P-0324
Fank, J.
Comparison of calculated ET0 to measured lysimeter grass ET

A0325; EGU2008-A-09726; HS8.6-1TH5P-0325
Hirschi, M.; Seneviratne, S. I.
Terrestrial water storage from basin-scale water-balance diagnostics and GRACE: an updated comparison

A0326; EGU2008-A-02714; HS8.6-1TH5P-0326
Baloutos, G.; Boureltsikas, A.; Baltas, E.
Investigation of interception, throughfall and stemflow of maquis vegetation in eastern Mediterranean region

A0327; EGU2008-A-04902; HS8.6-1TH5P-0327
Yuan, Y.; Cheng, Q.
Design and Implementation a Distributed Computation Framework (OpenHydro) for Streamflow Prediction in Ungauged Basin

A0328; EGU2008-A-03193; HS8.6-1TH5P-0328
Reudink, RHC; Luxemburg, WMJ; Gerrits, AMJ; Klees, R; Savenije, HHG; Simnathamy, S
From in-situ gravitation to water storage

A0329; EGU2008-A-07254; HS8.6-1TH5P-0329
Superconducting gravimeter as a hydrological tool at Metšahovi, Finland

A0330; EGU2008-A-12243; HS8.6-1TH5P-0330
Bardsley, E.
Geological weighing lysimeters for accurate undisturbed monitoring of ground surface water budgets in real time

A0331; EGU2008-A-00110; HS8.6-1TH5P-0331
Liu, S.; Mao, L.; Mo, X.; Zhao, W.; Lin, Z.
Quantification of water budget components of land surface elements at provincial and basin scale

HS8.7 Production, transport, and emission of trace gases from the vadose zone to the atmosphere (co-listed in BG)

Convener: Weihermueller, L.
Co-Conveners: Reichstein, M.
Lecture Room 33
Chairperson: N.N.

15:30–15:45; EGU2008-A-01387; HS8.7-1TH4O-001
Michel, R.; Mcmahon, P.
Use of carbon-14 and CFCs to study gas movement and reactions in the unsaturated zone

15:45–16:00; EGU2008-A-02033; HS8.7-1TH4O-002
Lazik, D.; Geistlinger, H.; Hagenau, J.; Buchwald, K.
Membrane based measurement technology for in-situ monitoring of trace gases in soil

16:00–16:15; EGU2008-A-07852; HS8.7-1TH4O-003
Borken, W.; Muhr, J.
Change in autotrophic and heterotrophic soil CO2 efflux following rainfall exclusion in a spruce forest

16:15–16:30; EGU2008-A-03282; HS8.7-1TH4O-004
A model of errors in field-based temperature sensitivity of heterotrophic soil respiration as introduced by temperature measurement depth
16:30–16:45; EGU2008-A-05372; HS8.7-1TH4O-005
Geistlinger, H.
Gas Transport and Mass Transfer within the Vadose Zone: Tracer Experiments, 1-D Analytical and 2-D Numerical Modeling

16:45–17:00; EGU2008-A-06588; HS8.7-1TH4O-006
Bahn, M.; Schmitt, M.; Brüggemann, N.; Gort, M.; Siegwolf, R.
Linking grassland soil respiratory fluxes and assimilate supply: evidence and open questions

17:00 END OF SESSION

HS8.7 Production, transport, and emission of trace gases from the vadose zone to the atmosphere (co-listed in BG) – Posters
Convener: Weihermueller, L.
Display Time: Thursday, 08:00–19:30
Authors in Attendance: Thursday, 17:30–19:00
Poster Area Hall A
Chairperson: N.N.

A0332; EGU2008-A-01987; HS8.7-1TH5P-0332
Xu, X; Wanek, W; Richter, A; Kuzyakov, Y
A new approach to separate root and microbial contributions to soil respiration by non-structural root carbon

A0333; EGU2008-A-03380; HS8.7-1TH5P-0333
Schack-Kirchner, H.; Hildebrand, E.E.
Subsoil nitrous oxide production reveals high spatial heterogeneity

A0334; EGU2008-A-03562; HS8.7-1TH5P-0334
Temperature response of wheat decomposition is more complex than the common approaches of most multi-pool models

A0335; EGU2008-A-04182; HS8.7-1TH5P-0335
Lamers, M.; Ingwersen, J.; Streck, T.
Open-N: An open source code for modeling nitrous oxide emission from upland and water-logged soils of a spruce forest ecosystem

A0336; EGU2008-A-07028; HS8.7-1TH5P-0336
Evaluation and inversion of a coupled CO2 transport and carbon turnover model

A0337; EGU2008-A-08305; HS8.7-1TH5P-0337
Glatzel, S.; Jordan, A
Can we actually regionalize soil respiration data?

A0338; EGU2008-A-08466; HS8.7-1TH5P-0338
Scharnagl, B.; Herbst, M.; Huisman, J.A.; Vereecken, H.
Uncertainty in the ROTHC model for carbon turnover in soil resulting from model initialization

A0339; EGU2008-A-08782; HS8.7-1TH5P-0339
Kiepe, I; Michalzik, B; Jordan, A; Glatzel, S
Litter fall as control of soil respiration observed by litter exclusion study and laboratory incubation

A0340; EGU2008-A-11942; HS8.7-1TH5P-0340
Lazik, D.; Geistlinger, H.; Hagenau, J.; Buchwald, K.
Optimization of soil-CO2 monitoring networks – concept, set-up and first results

17:00 END OF SESSION

HS10.9 Artificially drained catchments – from monitoring studies towards management approaches
Convener: Lennartz, B.
Co-Convener(s): Tiemeyer, B., Holzmann, H., Dolezal, F.
Display Time: Thursday, 08:00–19:30
Authors in Attendance: Thursday, 17:30–19:00
Poster Area Hall A
Chairperson: N.N.

15:30–15:45; EGU2008-A-06095; HS10.9-1TH4O-001
van der Velde, Y; Rozemeijer, J; de Rooij, G.H.
Water quality dynamics at field and catchment scale

15:45–16:00; EGU2008-A-09660; HS10.9-1TH4O-002
Billy, C.; Sebilo, M.; Birgand, F.; Billen, G.; Tornebize, J.; Kao, C.
Nitrate retention in a sub-surface artificially drained watershed

16:00–16:15; EGU2008-A-04590; HS10.9-1TH4O-003
Zajicek, A.; Kvitek, T.; Kaplicka, M.
Drainage water temperature as an identifier of tile drainage runoff components

16:15–16:30; EGU2008-A-05530; HS10.9-1TH4O-004
Hacin, J.; Brenèié, M.; Bridej, M.
Tracing experiment in the histosol of the Ljubljana marsh, Slovenia

16:30–16:45; EGU2008-A-05818; HS10.9-1TH4O-005
Smith, D.; Pappas, E.; Huang, C.
Influence of Dredging on Contaminant Fate and Transport

16:45–17:00; EGU2008-A-04129; HS10.9-1TH4O-006
Rieger, W.; Disse, M.
Quantifying the influence of artificial drainage on runoff generation in an agricultural catchment by using WaSiM-ETH 7.9.11

17:00 END OF SESSION

HS10.9 Artificially drained catchments – from monitoring studies towards management approaches – Posters
Convener: Lennartz, B.
Co-Convener(s): Tiemeyer, B., Holzmann, H., Dolezal, F.
Display Time: Thursday, 08:00–19:30
Authors in Attendance: Thursday, 17:30–19:00
Poster Area Hall A
Chairperson: N.N.

A0341; EGU2008-A-12120; HS8.7-1TH5P-0341
Ingwersen, J.; Lamers, M.; Streck, T.
Modelling multicomponent soil-gas exchange as a tool for process identification near water saturation
A0345; EGU2008-A-06155; HS10.9-1TH5P-0345
Henine, H.; Nedelec, N.; Kao, K.; Augard, A.; Birgand, B.; Chaumont, C.
Experimental studies of the effects of pipe pressurization on outflow in artificially drained catchments.

A0346; EGU2008-A-09901; HS10.9-1TH5P-0346
Doležal, E.; Zajíček, A.; Kvítek, T.; Kaplická, M.
Separation of tile drainage runoff components using a temperature mixing model.

A0347; EGU2008-A-09480; HS10.9-1TH5P-0347
Kulhavý, Z.; Doležal, F.; Ėmelík, M.; Tlapáková, L.
Longitudinal small stream flow profiles affected by tile-drainage inflow.

A0348; EGU2008-A-03832; HS10.9-1TH5P-0348
Dufková, R.; Kvítek, T.
Evaluation of actual evapotranspiration influenced by different soil types and crops on tile-drained fields.

A0349; EGU2008-A-06715; HS10.9-1TH5P-0349
Fucik, P.; Bystrický, V.; Kvítek, T.; Lexa, M.; Zajíček, A.
Estimating the water quality of agricultural drainage systems in connection with land use.

A0350; EGU2008-A-07585; HS10.9-1TH5P-0350
Nitrate tracing in tile drainage using 15N and 18O data.

A0351; EGU2008-A-07722; HS10.9-1TH5P-0351
Žlánek, P.; Bystošický, V.; Ondr, P.; Zajíček, A.; Kaplická, M.; Fučik, P.; Kvítek, T.
Nitrogen loss in small tile-drained catchments in the Czech Republic.

A0352; EGU2008-A-08798; HS10.9-1TH5P-0352
Tiemeyer, B.; Kahle, P.; Lennartz, B.
Hydrochemical properties of artificially drained catchments: Results from a six-year study.

A0353; EGU2008-A-08403; HS10.9-1TH5P-0353
Kahle, P.; Tiemeyer, B.; Lennartz, B.
Phosphorus losses from artificially drained lowland catchments in North-Eastern Germany.

A0354; EGU2008-A-03691; HS10.9-1TH5P-0354
Deasy, C.; Brazier, R.E.; Heathwaite, A.L.
Field drains as dominant pathways of sediment and nutrient transfer in small lowland agricultural catchments.

A0355; EGU2008-A-00795; HS10.9-1TH5P-0355
Passeport, E.; Lange, J.; Tournebize, J.; Chaumont, C.; Birgand, F.; Vincent, B.
Agricultural drained watershed effluents: a tracer experiment for hydraulic characterization of an artificial wetland as pesticide mitigation system.

A0356; EGU2008-A-09512; HS10.9-1TH5P-0356
Co-construction of pesticide mitigation solutions in a subsurface drained watershed to limit groundwater pollution.

HS10.1 Remote sensing retrieval techniques and data assimilation – Posters
Convener: Verhoest, N.
Co-Conveners(s): Tedesco, M., Wood, E.
Display Time: Thursday, 08:00–19:30

Authors in Attendance: Thursday, 17:30–19:00
Poster Area Hall A.
Chairperson: N.N.

A0357; EGU2008-A-07594; HS11.1-1TH5P-0357
Campos, L.; Castelli, F.
Integration of solar radiation maps from MSG-SEVIRI imagery and ground observations with a statistical copula model.

A0358; EGU2008-A-04556; HS11.1-1TH5P-0358
PINTY, B.; Lavergne, T.; Kaminski, T.; Gobron, N.; Taberner, M.
Retrieving land surface parameters from MODIS and MISR albedo products.

A0359; EGU2008-A-03525; HS11.1-1TH5P-0359
Conradt, T.
Evaporation patterns in the Elbe River basin – Validating the eco-hydrological model SWIM by remotely sensed surface temperatures.

A0360; EGU2008-A-08278; HS11.1-1TH5P-0360
Spiliotopoulos, M.; Loukas, A.; Vasilides, L.
Actual evapotranspiration estimation from satellite-based surface energy balance model in Thessaly, Greece.

A0361; EGU2008-A-02339; HS11.1-1TH5P-0361
Yi, Y.; Yang, D.; Huang, J.; Chen, D.
Evaluation of MODIS surface reflectance products for LAI retrieval.

A0362; EGU2008-A-11863; HS11.1-1TH5P-0362
Zhao, C.; Xia, J.; Li, Z.
An annual land surface evapotranspiration retrieval model based on geostationary satellite data.

A0363; EGU2008-A-11841; HS11.1-1TH5P-0363
Tang, T.; Li, L.
A fully remotely sensed parameterization of land surface evapotranspiration and evaporative fraction.

A0364; EGU2008-A-00059; HS11.1-1TH5P-0364
Pauwels, V.R.N.; Balenzano, A.; Satalino, G.; Skriver, H.; Verhoest, N.E.C.; Mattia, F.
Retrieval of soil hydraulic parameters from Synthetic Aperture Radar data: an integrated multidisciplinary approach.

A0365; EGU2008-A-10826; HS11.1-1TH5P-0365
Multi-scale multi-sensor data assimilation for terrestrial water budget estimation: experiment over Red-Arkansas river basin.

A0366; EGU2008-A-03101; HS11.1-1TH5P-0366
Lahoz, W.A.; Prate, F.; Orsolini, Y.
Land data assimilation: a tool for improving land surface models and observations.

A0367; EGU2008-A-10377; HS11.1-1TH5P-0367
Jutla, A.
Estimation of Instantaneous Shortwave Radiation for all Sky Conditions Using MODIS.

A0368; EGU2008-A-06396; HS11.1-1TH5P-0368
Muzylev, E.L.; Uspensky, A.B.; Startseva, Z.P.; Volkova, E.V.; Kukharsky, A.V.
Using remote sensing data on land surface characteristics in the water and heat balance components modeling for river basin.
**A0369:** EGU2008-A-06897; HS11.1-1TH5P-0369  
Höfler, B.; Pfeifer, N.; Ressl, C.; Rutzinger, M.; Vetter, M.  
Water surface mapping using airborne laser scanning elevation and signal amplitude data

**A0370:** EGU2008-A-07418; HS11.1-1TH5P-0370  
Toulios, L.; Dunkel, Z.; Stancalie, Gh.; Struzik, P.; Danson, M.; Mika, J.  
Satellite climate and biophysical data for warning purposes for European agriculture

**A0371:** EGU2008-A-00981; HS11.1-1TH5P-0371  
Singh, C.K.; Shashtri, S.; Singh, S.K.; Mukherjee, S.  
Quantitative Modeling of Groundwater in Shiwaliks of Rupnagar district of Punjab using Remote Sensing and Geographic Information System

**A0372:** EGU2008-A-10470; HS11.1-1TH5P-0372  
Rota Nodari, F.; De Michele, C.; Cislaghi, M.  
The Land Surface Temperature from MODIS imagery to estimate the Urban Heat Island (UHI) over the metropolitan area of Milan

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**HS11.2 Remote sensing applications in hydrology and water management**

Convener: Ludwig, R.  
Co-Convener(s): Su, Z., Benveniste, J.  
Display Time: Thursday, 08:00–19:30

### 8:30–8:45

**Ma, Y.; Ma, W.; Zhong, L.; Tan, Y.; Ze, H.; Su, Z.; Menenti, M.; Ishikawa, H.; Koike, T.**  
The progress on the study of land surface heat fluxes over heterogeneous landscape of the Tibetan Plateau

### 8:45–9:00

**Liu, L.; Menenti, M.**  
Early drought detection by time series analysis on land surface temperature and fraction of Absorbed Photosynthetically Active Radiation

### 9:00–9:15

**Abroleda, A.; Ghi lain, N.; Gellens-Meulenberghs, F.**  
LSA-SAF evapotranspiration over Europe and Africa: Current results and comparisons at different scales

### 9:15–9:30

**Bianchi, R.**  
The European Space Agency’s EO Campaigns Activities (solicited)

### 9:30–9:45

**Crétaux, J-F.; Leblanc, M.; Tweed, S.; Calmant, S.; Bergé-Nguyen, M.; Cazenave, A.**  
Floodplain mapping from remote sensing techniques: radar altimetry and medium resolution Modis sensors

### 9:45–10:00

**Berry, P.; Benveniste, J.**  
Remote measurement and monitoring of inland water heights globally using multi-mission satellite radar altimetry

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### 10:00 COFFEE BREAK

Chairperson: N.N.

### 10:30–10:45

**Leblanc, M.; Ramillien, G.; Tregoning, P.; Tweed, S.**  
Drought detection in the Murray-Darling basin from space gravity and hydrologic observations

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### 10:45–11:00

**Güntner, A.; Papa, F.; Frappart, F.**  
Variations of inundation areas and surface water storage in large river basins: A comparison of different global data sources

### 11:00–11:15

**Voigt, S.; Schneiderhan, T.; Zwenzner, H.; Gähler, M.; Twele, A.**  
Improving operational Flood Assessment - Where Satellites make the Difference (solicited)

### 11:15–11:30

**Nie meyer, S.; Laguardia, G.; Kurnik, B.; Rossi, S.**  
Multisource detection of drought events at the European scale

### 11:30–11:45

**Conrad, C.; Dech, S.; Lamers, J.P.A; Martius, C.; Ruecker, G.**  
A remote sensing based monitoring concept for irrigation systems in Central Asia

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### 12:00 END OF SESSION
A0379; EGU2008-A-09352; HS11.2-1TH5P-0379
Van der Tol, C.; Verhoef, W.; Verhoef, A.; Houlcroft, C.J.; Timmermans, J.; Su, Z.; Timmermans, W.; Exploring the potential of an integrated radiative transfer and surface energy balance model

A0380; EGU2008-A-09615; HS11.2-1TH5P-0380

A0381; EGU2008-A-10382; HS11.2-1TH5P-0381
Mira, M.; Schmugge, T.; Caselles, V.; Valor, E.; Comparison of ASTER and MODIS emissivity observation with ground measurements

A0382; EGU2008-A-07013; HS11.2-1TH5P-0382
Corbari, C.; Turconi, L.; Ravazanni, G.; Horeschi, D.; Mancini, M.; Land surface temperature from remote sensing for the validation of a distributed hydrologic model at basin scale

A0383; EGU2008-A-08504; HS11.2-1TH5P-0383
Jacobs, C.; Roerink, G.J.; Bos, M.G.; Hammani, A.; Crop Water Stress Detection from Remote Sensing using the SSEB-2 Algorithm: A Case Study in Morocco

A0384; EGU2008-A-01106; HS11.2-1TH5P-0384
Montzka, C.; Canty, M.; Kunkel, R.; Vereecken, H.; Wendland, L.; Assimilation of multispectral remotely sensed data in nitrate modelling

A0385; EGU2008-A-12195; HS11.2-1TH5P-0385
Copertino, V.A.; Telesca, V.; Scavone, G.; Pastore, V.; An integrated management system of field and satellite data for the hydrological cycle components

A0386; EGU2008-A-07274; HS11.2-1TH5P-0386
Santos da Silva, J.; Roux, E.; Calmant, S.; Rotunno Filho, O.C.; Cretaux, J.F.; Seyler, F.; Multi satellite radar altimetry for the study of hydrological cycle within the rio Negro floodplains (Amazon basin)

A0387; EGU2008-A-01413; HS11.2-1TH5P-0387

A0388; EGU2008-A-03721; HS11.2-1TH5P-0388
Liebe, J.; van die Giesen, N.; Walter, T.; Steenhuis, T.; Use of radar observations of small reservoirs for calibration of a simple hydrological model in the West African savanna

A0389; EGU2008-A-07726; HS11.2-1TH5P-0389

A0390; EGU2008-A-10453; HS11.2-1TH5P-0390
Calmant, S.; Creutx, J-F; Mean Lake Surface by Satellite Altimetry

A0391; EGU2008-A-11559; HS11.2-1TH5P-0391
Jia, L.; Xi, G.; Liu, S.; Estimation of seasonal to annual water demand by wetland vegetation with MODIS data in the Yellow River Delta area

A0392; EGU2008-A-11244; HS11.2-1TH5P-0392
Berry, P.; Smith, R.; Benveniste, J.; Representation of global inland water heights within the forthcoming ACE2 GDEM

A0393; EGU2008-A-06577; HS11.2-1TH5P-0393
Mandiburger, G.; Airborne Laser Scanning as geometric basis for Hydraulic Models

A0394; EGU2008-A-05122; HS11.2-1TH5P-0394
Chiang, J.L.; Yang, H.C.; Liu, J.J.; Cheng, K.S.; Flood boundary delineation using various raster data - a case study in northern Taiwan

A0395; EGU2008-A-04321; HS11.2-1TH5P-0395
Gennero, M.C.; Llovel, W.; Daillet-Rochette, S.; Creutx, J.F.; Cazenave, A.; Near real time water level on rivers from ENVISAT altimetry

A0396; EGU2008-A-09787; HS11.2-1TH5P-0396
Fiedler, K.; Hunger, M.; Döll, P.; Estimation of global terrestrial water storage change using the WaterGAP Global Hydrological Model

A0397; EGU2008-A-11535; HS11.2-1TH5P-0397
Su, Z.; The EAGLE2006 Team; EAGLE 2006 – Multi-purpose, multi-angle and multi-sensor in-situ and airborne campaigns over grassland and forest

A0398; EGU2008-A-04164; HS11.2-1TH5P-0398
Timmermans, J.; Van der Tol, C.; Verhoef, W.; Vekerdy, Z.; van Laake, P.E.; Su, Z.; Intercomparison of SAIL and DART over a Pine forest using Laserscan derived structural parameters

HS11.5 Soil moisture estimation using field instrumentation, remote sensing and modelling

Convener: Loew, A.
Co-Convener(s): Schmugge, T., de Rosnay, P.
Lecture Room 31
Chairperson: N.N.

13:30–13:45; EGU2008-A-05114; HS11.5-1TH3O-001
van Oevelen, P.; Viterbo, P.; Jackson, T.; Activities of the International Soil Moisture Working Group

13:45–14:00; EGU2008-A-04989; HS11.5-1TH3O-002

14:00–14:15; EGU2008-A-03509; HS11.5-1TH3O-003
De Jeu, R.; De Reus, N.; Van De Velde, J.; Holmes, T.; Owe, M.; A Web Mapping Service for 30 years of Satellite Derived Soil Moisture

14:15–14:30; EGU2008-A-06301; HS11.5-1TH3O-004
Yang, K.; Koike, T.; Khatouso, I.; Validation of a dual-pass microwave land data assimilation system at CEOP Mongolian moisture network

14:30–14:45; EGU2008-A-01163; HS11.5-1TH3O-005
Co-Convener(s): Schmugge, T., de Rosnay, P.
Convener: Loew, A.

14:15–14:30; EGU2008-A-06577; HS11.2-1TH5P-0393
Mandiburger, G.; Airborne Laser Scanning as geometric basis for Hydraulic Models

15:00 COFFEE BREAK
A combination of land surface modeling and remote sensing: synergy between LSA-SAF and H-SAF for soil moisture retrieval.

Hasenauer, S.; Wagner, W.

15:45–16:00; EGU2008-A-03063; HS11.5-1TH4O-002

Mattia, F.; Satalino, G.; Pauwels, V.R.N.; Loew, A.; Timmermans, W.

Soil moisture retrieval from L-band SAR data and hydrologic modeling (solicited)

16:00–16:15; EGU2008-A-01325; HS11.5-1TH4O-003


Land surface hydrology in the cloud land surface interaction campaign (CLASIC) (solicited)

16:15–16:30; EGU2008-A-04329; HS11.5-1TH4O-004

Crow, W.T.; Ryu, D.

A new data assimilation approach for improving streamflow forecasting using remotely-sensed soil moisture retrievals

16:30–16:45; EGU2008-A-09328; HS11.5-1TH4O-005

Drusch, M.; de Rosnay, P.; Scipal, K.; Balsamo, G.; Andersson, E.

Analysing land surface parameters for NWP applications: Developments at ECMWF (solicited)

16:45–17:00; EGU2008-A-04077; HS11.5-1TH4O-006


A combination of land surface modelling and remote sensing: synergy between LSA-SAF and H-SAF for soil moisture retrieval.

17:00 END OF SESSION

HS11.5 Soil moisture estimation using field instrumentation, remote sensing and modelling – Posters

Convener: Loew, A.

Co-Convener(s): Schmugge, T.; de Rosnay, P.

Display Time: Thursday, 08:00–19:30

Authors in Attendance: Thursday, 17:30–19:00

Poster Area Hall A

Chairperson: N.N.

A0399; EGU2008-A-09209; HS11.5-1TH5P-0399

Cabot, F.; Richaume, P.; Mialon, A.; Kerr, Y.

SMOS system performances based on end-to-end simulations

A0400; EGU2008-A-07678; HS11.5-1TH5P-0400

Tittebrand, A.; Stammer, D.; Siebert, S.

The German smos project office

A0401; EGU2008-A-09027; HS11.5-1TH5P-0401

Lacava, T.; Pergola, N.; Tramutoli, V.

Monitoring soil wetness variations by a multi-temporal passive microwave technique

A0402; EGU2008-A-01754; HS11.5-1TH5P-0402

van Dijk, A.; de Jeu, R.

Interpreting soil moisture from passive microwave remote sensing - an analysis of published field data

A0403; EGU2008-A-01996; HS11.5-1TH5P-0403


L-Band brightness temperature simulated from coupled SVAT model and radiative transfer model over the Valencia Anchor Station

A0404; EGU2008-A-02803; HS11.5-1TH5P-0404

Paloscia, S.; Pampaloni, P.; Santi, E.; Pettinato, D.; Della Vecchia, A.; Ferrazzoli, P.; Guerrero, L.

The influence of soil moisture on microwave emission under forest canopies

A0405; EGU2008-A-11011; HS11.5-1TH5P-0405

Gruhier, C.; de Rosnay, P.; Wigneron, J.-P.

Surface soil moisture retrieval based on brightness temperature from AMSR-E over a semi-arid region.

A0406; EGU2008-A-11961; HS11.5-1TH5P-0406

Escorihuela, M.J.; Kerr, Y.H.; Chanzy, A.; de Rosnay, P.; Wigneron, J.P.

On the effective penetration depth of L-band radiometry and the validation of SMOS data: a case study

A0407; EGU2008-A-02779; HS11.5-1TH5P-0407

Wagner, W.; Pathe, C.; Sabel, D.; Dubkov, M.; Bartsch, A.

The ESA Tiger Innovator project SHARE – Soil moisture for hydrometeorological applications in the SADC region

A0408; EGU2008-A-09710; HS11.5-1TH5P-0408

Scipal, K.; Drusch, M.

Soil Moisture from MetOp scatterometer data: First assimilation results from a numerical weather prediction experiment

A0409; EGU2008-A-11016; HS11.5-1TH5P-0409

Seeling, S.; Mueller, Ch.; Seeeger, M.; Nink, S.

Assimilation of SAR data for mapping of dominant runoff formation processes on agricultural land

A0410; EGU2008-A-00337; HS11.5-1TH5P-0410

Zhao, D.; Kuenzer, C.; Fu, C.; Wagner, W.

The analysis on ERS scatterometer derived soil water index data in China.

A0411; EGU2008-A-02407; HS11.5-1TH5P-0411

Schneider, K.; Huisman, J.A.; Breuer, L.; Frede, H.-G.

Soil moisture monitoring in remote catchments: temporal stability and its use in active microwave remote sensing validation

A0412; EGU2008-A-04884; HS11.5-1TH5P-0412


Integrating field monitoring, spaceborne SAR and hydrologic models to support water resources management and agricultural practice in Mediterranean areas

A0413; EGU2008-A-10394; HS11.5-1TH5P-0413

Bilodeau, B.; Bélair, S.; Grunmann, P.; Carrera, M.

New Developments in the Canadian Land Data Assimilation System

A0414; EGU2008-A-00601; HS11.5-1TH5P-0414

Liu, S.; Mo, X.; Zhang, S.; Zhao, W.; Mao, L.; Wagner, W.

The effect of climate change and climate variability to the Wuding Catchment soil moisture acquired from ecohydrological simulation model, in situ observations and remotely sensing

A0415; EGU2008-A-04471; HS11.5-1TH5P-0415

Shan, Wei; Guo, Ying

Water content changing in shallow soil cut-slope of highway in seasonal frozen regions
Friday

IS21 - HS1.3/NH2.8/NP3.11 Hydrological Extremes (co-organised by HS, NH & NP; co-listed in GM)

Conveners: Laaha, G.
Co-Conveners: Tallaksen, L., Castellarin, A., Szolgay, J.

Lecture Room 32
Chairperson: CASTELLARIN, A.

Sivapalan, M.; Samuel, J. M.
Effects of multi-scale rainfall variability on flood frequency: a comparative multi-site analysis of dominant process controls (solicited)

13:45–14:00; EGU2008-A-03846; IS21 - HS1.3/NH2.8/NP3.11-1FR3O-002
Viglione, A.; Blöschl, G.
Process controls on the mapping of rainfall to flood return periods

14:00–14:15; EGU2008-A-06431; IS21 - HS1.3/NH2.8/NP3.11-1FR3O-003
Guse, B.; Thieken, A. H.; Castellarin, A.; Merz, B.
Probabilistic regional envelope curves in Saxony/Germany using two methods to form homogeneous regions

14:15–14:30; EGU2008-A-03947; IS21 - HS1.3/NH2.8/NP3.11-1FR3O-004
Uhlemann, S.; Thieken, A. H.; Merz, B.
A national set of coherent large scale flood events in Germany

14:30–14:45; EGU2008-A-00253; IS21 - HS1.3/NH2.8/NP3.11-1FR3O-005
Renard, B.; Lang, M.
Nonstationary frequency analysis of hydrological extremes

14:45–15:00; EGU2008-A-00048; IS21 - HS1.3/NH2.8/NP3.11-1FR3O-006
Kjeldsen, T. B.; Jones, D. A.
Model error correlation in a regression model of the median annual maximum flood

15:00 COFFEE BREAK

Chairperson: TALLAKSEN, L.M.

15:30–15:45; EGU2008-A-05721; IS21 - HS1.3/NH2.8/NP3.11-1FR4O-001
Araud, Q.; Kergoat, L.; Frappart, F.; Grippa, M.; Boone, A.; De Rosnay, P.; Lemoine, J.-M.; ALMIP Working Group, the
Comparison between soil moisture estimations by GRACE satellite mission and by land surface models over West Africa

15:45–16:00; EGU2008-A-02481; IS21 - HS1.3/NH2.8/NP3.11-1FR4O-002
Saquet, E.; Chopard, S.
Using soil gauging data to interpolate low flow characteristics

16:00–16:15; EGU2008-A-08250; IS21 - HS1.3/NH2.8/NP3.11-1FR4O-003
Bell, V. A.; Moore, R. J.; Cole, S. J.; Kay, A. L.; Davies, H. N.; Jones, R. G.; Reynard, N. S.
Estimation of extreme river flows over the UK using rainfall and potential evaporation estimates from both a Regional Climate Model and observations

16:15–16:30; EGU2008-A-04837; IS21 - HS1.3/NH2.8/NP3.11-1FR4O-004
Stahl, K.; Moore, R. D.; Allan, D. M.; Whitfield, P.
Hydroclimatic controls on late-summer low flow in British Columbia, Canada

16:30–16:45; EGU2008-A-07912; IS21 - HS1.3/NH2.8/NP3.11-1FR4O-005
Nicenbauer, S.; Laguardia, G.; Kurth, M.; Rossi, S.
Online pre-operational drought monitoring at the European scale

16:45–17:00; EGU2008-A-10211; IS21 - HS1.3/NH2.8/NP3.11-1FR4O-006
Hiscock, K.; Sparkes, R.; Hodgson, A.; Martin, J. L.; Taniguchi, M.
Evaluation of future climate change impacts in Europe on potential groundwater recharge

17:00 END OF SESSION

IS21 - HS1.3/NH2.8/NP3.11 Hydrological Extremes (co-organised by HS, NH & NP; co-listed in GM) – Posters

Conveners: Laaha, G.
Co-Conveners: Tallaksen, L., Castellarin, A., Szolgay, J.

Display Time: Friday, 08:00 – 19:30

Authors in Attendance: Friday, 10:30 – 12:00

Poster Area Hall A
Chairperson: N.N.
An operational predictive low flow model for the Austrian province Burgenland

An assessment of the impact of climate change on the water balance of a mesoscale catchment in northeastern Germany – a case study

A statistical study of drought characteristics of the Pearl River Basin, China (cancelled)

Low streamflow frequency analysis and its application in environmental planning

Hydrological analysis of remote climate scenarios developed for the Rhine river basin

Effects of changes in land cover on streamflow generation in the Rhine basin

Investigation of seasonal low- and high-flow characteristics in a mesoscale basin using a process-based distributed hydrologic model

A revised procedure for pooled flood frequency analysis in the UK

A simple model to assess flood risk in mountainous basins

Possible flood retention in an alpine landscape: A case study from the Upper Iller, Germany

Hydrological signatures of flood magnification in German rivers

A long-term perspective on flood response to climatic variability and human impact: Evidence from Spanish paleo flood records

Temporal multifractal signature of river discharge

Interval Analysis and the Search for local Maxima of the Log Likelihood for the Pearson III distribution

Probabilistic depth-duration envelope curves for Austria and Italy

Regionalization of lowland excess water hazard

Probabilistic depth-duration envelope curves for Austria and Italy

Provable Maximum Flow Calculation

Regionalization of lowland excess water hazard

Frequency analysis of daily rainfall in France

On Probability Distribution of Extreme Precipitation Events
HS4.1 Integrated water resources assessment and technology transfer, with special focus on developing countries

Convenors: Uhlenbrook, S.
Co-Convener(s): van der Zaag, P., Rosbjerg, D., van de Giesen, N., Bathurst, J., Ekstrand, S., Amezaga, J., Mostert, E.
Lecture Room 29
Chairperson: N.N.

8:30–8:45; EGU2008-A-00320; HS4.1-1FR1O-001
Annon, F. O.; van de Giesen, N.; van de Zaag, P.; Liebe, J. R.; Odal, S. N.; Damali, R. J.
Monitoring of small reservoirs monthly storage using Envisat ASAR, SPOT and ALOS imagery in the Upper East Region of Ghana

8:45–9:00; EGU2008-A-01037; HS4.1-1FR1O-002
Forests and floods in Latin America: science, management, policy and the EPIC FORCE project

9:00–9:15; EGU2008-A-01604; HS4.1-1FR1O-003
An integrated model for the assessment of global water resources

9:15–9:30; EGU2008-A-06008; HS4.1-1FR1O-004
Weiß, M.; Schaldach, R.
Current and future green and blue water fluxes in Africa under climate and land use change

9:30–9:45; EGU2008-A-01897; HS4.1-1FR1O-005
Steward, D.R.; Bernard, EA; Kulcsar, LJ; Peterson, JM; Welch, SM
Science and engineering to support societal water-use planning using computational tools and GIScience data

9:45–10:00; EGU2008-A-03130; HS4.1-1FR1O-006
Wriedt, G.; Aloe, A.; Bouraoui, F.
Estimating irrigation requirements in Europe

10:00 COFFEE BREAK

Chairperson: N.N.

10:30–10:45; EGU2008-A-02511; HS4.1-1FR2O-001
Savenije, H
The sustainable village (solicited)
Small reservoirs, big impacts? Exploring alternate models for water resources and supply: case study of northwest China

Countries. A case study: The Marmara Sea Basin

How to take action for integrated water management

Water scarcity and adaptation strategy in Lunriver basin, India

The impact of climate change on crop production in West Africa: an assessment for the Oueme River Basin in Benin

Hydrology-Based Integrated Modeling of a Peripheral Semi-Arid Human-Eco-System

Water and land limitations on China's food production

Sustainability issues of coastal planning in developing countries. A case study: The Marmara Sea Basin

Small reservoirs, big impacts? Exploring alternate models of river basin development

Analysis of hydrological variability in observed rainfall-runoff patterns in Peninsular Malaysia

Up To Date Hydrological Modeling in Arid and Semi-Arid Catchment, the Case of Faria Catchment, West Bank, Palestine

Changing rainfall and discharge patterns in the northern Limpopo Basin, Zimbabwe

Examining The Turkish Criminal Code amendment for its utilization in shores in terms of “Liability Law”

Coastal zone management and international financial institution activity

Field based measurement approaches to better understand soil moisture dynamics in rainfed smallholder systems in Sub-Saharan Africa

Modelling ENSO effects on the water balance and freshwater transport for the Pacific coast of Peru and Northern Chile

Voluntary adoption of management practices to reduce the hydrological impacts of forest operation in Chilean plantation: a trade off among hydrological based evidence, forest certifiers and forest companies

Framework design for an integrated watershed model for climate change impact assessment

Lecture Room 29 Chairperson: VAN DER ZAAG, P.

Technology transfer in the TWINBAS and TWINLATIN projects – experiences

Co-Convener(s): McCulloch, C., O’Connell, P., Salamé, L., Crescimanno, G., Schumann, A. Lecture Room 29 Chairperson: VAN DER ZAAG, P.
14:15–14:30; EGU2008-A-07574; HS4.2-1FR3O-004
Nashipili, N.J.; dos Santos, R.; Noor, Z.Y.; Schwartz, K.; Douven, W.; Jaspers, F.
Performance of river basin organizations: a comparative study of river basin organizations in Namibia, Indonesia and Brazil

14:30–14:45; EGU2008-A-07382; HS4.2-1FR3O-005
Gupta, J.; van der Zaag, P.
The politics of water research

14:45–15:00; EGU2008-A-05422; HS4.2-1FR3O-006
The Numerical Modelling-Policy Interface (NMPI) Network: a global platform to improve the uptake of numerical models in water resources management and policy

15:00–15:30; EGU2008-A-07759; HS4.2-1FR4O-001
Smidt, E.; Kluytmans, P.; Olsthoorn, Th.
The underground of a land and water conflict

15:30–15:45; EGU2008-A-09337; HS4.2-1FR4O-002
M.K. Saleh, S.
The role of science and technical expertise in the development of ‘alternative water sources’ with the Nile Basin’s developmental discourse: a positive-sum endeavour

15:45–16:00; EGU2008-A-09642; HS4.2-1FR4O-003
Rifai, F.; Kibaroglu, A.; Ali, M.
New Framework of Cooperation in the Euphrates Tigris Region Through Epistemic Community Activities:Euphrates Tigris Initiative for Cooperation

16:00–16:15; EGU2008-A-01579; HS4.2-1FR4O-004
Fougeirol, D.; Lyons, E.M.
Capacity building : HydroCONCERT’-Euphrates, a role play for scientists or non-scientists

16:30–16:45; EGU2008-A-08408; HS4.2-1FR4O-005
Broersen, P.W.; Sokolov, V.; Shuyska, A.
Transforming Water Conflicts in Central Asia

16:45–17:00; EGU2008-A-06174; HS4.2-1FR4O-006
Lang, M.A.
Water Conflicts and Water Management on Mediterranean Islands

17:00–17:15; EGU2008-A-10589; HS4.2-1FR2P-0299
Zeil, P.; Kienberger, S.; Lang, S.; Klug, H.
Water and environmental conflicts – can spatial information support confidence-building?

17:00–17:15; EGU2008-A-10589; HS4.2-1FR2P-0300
Wegerich, K.
Passing over the conflict. The Chu Talas basin agreement as an example case for Central Asia?

17:15–17:30; EGU2008-A-08076; HS4.2-1FR2P-0301
De Schutter, J.L.G.; Dukhovny, V. A.
Aral Sea Basin Management Model

17:30–17:45; EGU2008-A-00376; HS4.2-1FR2P-0302
Mukerjee, A.
India: A tale of rehabilitation of people displaced due to dam construction

17:45–17:55; EGU2008-A-00938; HS4.2-1FR2P-0303
Bogdanovic, S.B.
Role of Law in Water Disputes Prevention and Fostering Co-operation

17:55–18:05; EGU2008-A-01257; HS4.2-1FR2P-0304
Habereder, C.; Blaschke, A.P.; Hein, T.; THE Optima Lobau Team
Optimised Management Perspective for an urban Floodplain exposed to Conflicts of Interests between contradictory ecological and socio-economic Demands

18:05–18:15; EGU2008-A-05026; HS4.2-1FR2P-0305
Abadi, A.; Kirakosyan, T.
Water management practices in the Palestinian territories and Israel, cooperation in dispute time to tackle the insecurities of water shortage.

18:15–18:25; EGU2008-A-05175; HS4.2-1FR2P-0306
Markovic, S.B.; Krstic, S.; Svircev, Z.; Gaal, F.F.; Stojanovic, D.
Proposal for postulation and implementation of the freshwater monitoring system based on WFD principles in the Vojvodina region, Serbia

18:25–18:35; EGU2008-A-05208; HS4.2-1FR2P-0307
Lee, S.; Kim, S.
Testing Governance: New River Basin Management in South Korea

18:35–18:45; EGU2008-A-05026; HS4.2-1FR2P-0308
Menani, M.R.
Numerical indexing of the risk of conflict around the transboundary water resources

18:45–18:55; EGU2008-A-03667; HS4.2-1FR2P-0309
Lee, S.; Kim, S.
Does the cooperation of Israelis, Jordanians and Palestinians in EXACT contribute to preventing conflicts in the region?

18:55–19:05; EGU2008-A-05175; HS4.2-1FR2P-0310
Simonyan, A.; Tokmajyan, H.
Water law in Armenia: its impacts on water basin management

19:05–19:15; EGU2008-A-05208; HS4.2-1FR2P-0311
Markovic, S.B.; Krstic, S.; Svircev, Z.; Gaal, F.F.; Stojanovic, D.
Proposal for postulation and implementation of the freshwater monitoring system based on WFD principles in the Vojvodina region, Serbia
A0315; EGU2008-A-05493; HS4.2-1FR2P-0315
Movsisyan, A.; Simonyan, A.
Water management challenges: conflict or cooperation

A0316; EGU2008-A-05948; HS4.2-1FR2P-0316
Bonacci, O.; Lucic, I.
Karstology – how can it help in sustainable development?

A0317; EGU2008-A-09345; HS4.2-1FR2P-0317
Zessner, M.; Ruzicka, K.; Wegricht, U.; Matsche, N.; Kroiss, H.
Foam: a conflicting transboundary issue

A0318; EGU2008-A-10031; HS4.2-1FR2P-0318
Di Baldassarre, G.; Brandimarte, L.; Brath, A.; Castel larin, A.; Jean Jeune, K.; Perez, R.
Trans-boundary river basin management: an experience in Haiti and Dominican Republic

A0319; EGU2008-A-11247; HS4.2-1FR2P-0319
Manful, D.; Wang, Y.; Biney, C.; Alfa, B.; He, Y.
Fostering resilience through evidence-based water policies: the role of river basin authorities

A0320; EGU2008-A-11515; HS4.2-1FR2P-0320
Globevnik, L.; Vidmar, A.; Brilly, M.
SARIB project: Data base and Tools for the Sava River Basin

A0321; EGU2008-A-11600; HS4.2-1FR2P-0321
Trelles, A.
Technological Framework for Integrated Water Resources Management

A0322; EGU2008-A-11687; HS4.2-1FR2P-0322
Gorova, R.; Deneva, D.
Transboundary groundwater between Bulgaria and Romania - hydrogeological conditions, qualitative and chemical status

IS25 - HS10.4/NH2.6 Floodplain mapping and flood prevention techniques (co-organised by HS & NH)
Convener: Di Baldassarre, G.
Co-Conveners(s): Disse, M.
Lecture Room 33
Chairperson: N.N.
8:30–9:00; EGU2008-A-07263; IS25 - HS10.4/NH2.6-1FR1O-001
Merz, B.; Thieken, A.
Flood risk analysis and uncertainty considerations (solicited)

9:00–9:15; EGU2008-A-08341; IS25 - HS10.4/NH2.6-1FR1O-002
Komma, J.; Bloeschl, G.
Potential of non-structural flood mitigation measures

9:15–9:30; EGU2008-A-00372; IS25 - HS10.4/NH2.6-1FR1O-003
Osti, R.; Gautam, M.
Flood hazard mapping and its role on flood disaster management cycle

9:30–9:45; EGU2008-A-00100; IS25 - HS10.4/NH2.6-1FR1O-004
Bertermann, D.; Rossner, R.; Schlumprecht, H.
Optimization of the drain-Regulation in hinterlands of low Mountain ranges under the aspect of natural flood retention

9:45–10:00; EGU2008-A-08575; IS25 - HS10.4/NH2.6-1FR1O-005
Weichel, T.; Schulz, K.
Floodplain mapping – different models to achieve a common purpose

10:00–10:15; EGU2008-A-08867; IS25 - HS10.4/NH2.6-1FR1O-006
Lane, S.N.; Yu, D.
Numerical porosity as an alternative to roughness parameterization for urban inundation modeling (solicited)

10:15 COFFEE BREAK
Chairperson: N.N.

10:30–10:45; EGU2008-A-05604; IS25 - HS10.4/NH2.6-1FR2Q-001
Disse, M.; Yörük, A.
Uncertainties in flood modelling

10:45–11:00; EGU2008-A-08662; IS25 - HS10.4/NH2.6-1FR2Q-002
Langhammer, J.
Use of hydromorphological mapping for location of flood risk reduction measures. Case study: Blanice river basin, Czech Republic

11:00–11:15; EGU2008-A-08472; IS25 - HS10.4/NH2.6-1FR2Q-003
Bonì, G.; Castelli, F.; Ferraris, L.; Pierdicca, N.; Serpico, B.; Siccardi, F.; Versace, C.
High resolution COSMO/SkyMed SAR data analysis for flood damage detection: the pilot project Opera for flood damage detection

11:15–11:30; EGU2008-A-10985; IS25 - HS10.4/NH2.6-1FR2Q-004
Schäppi, B.; Perona, P.; Schneider, P.; Burlando, P.
Integrating river bathymetry data with Digital Terrain Models for improved river flow simulations

11:30–11:45; EGU2008-A-05035; IS25 - HS10.4/NH2.6-1FR2Q-005
Hartwich, F.; Jedlicka, J.
Development of automated floodplain delineation tools in the GIS using progressive change of input parameters

11:45–12:00; EGU2008-A-08481; IS25 - HS10.4/NH2.6-1FR2Q-006
Segoni, S.; Morelli, S.; Kukavicic, M.; Catani, F.
GPS-based high resolution mapping techniques in the Arno river for a correct flood risk management

12:00–12:15; EGU2008-A-12167; IS25 - HS10.4/NH2.6-1FR2Q-007
Kreibich, H.; Poser, K.; Haubrock, S.
Web-based data acquisition of flood affected people

12:15 END OF SESSION
IS25 - HS10.4/NH2.6 Floodplain mapping and flood prevention techniques (co-organised by HS & NH) – Posters
Convener: Di Baldassarre, G.
Co-Convener(s): Disse, M.
Display Time: Friday, 08:00–19:30
Authors in Attendance: Friday, 13:30–15:00
Poster Area Hall A
Chairperson: N.N.
A0325; EGU2008-A-00271; IS25 - HS10.4/NH2.6-1FR3P-0325
Brandimarte, L.; Briaud, J-L.; D’Odorico, P.
Bridge scour risk: how to take into account hydrologic uncertainty?
A0326; EGU2008-A-00275; IS25 - HS10.4/NH2.6-1FR3P-0326
Castiglioni, S.
Calibration and validation of a 1D model using airborne SAR imagery
A0327; EGU2008-A-01366; IS25 - HS10.4/NH2.6-1FR3P-0327
Ozdemir, H.
Comparison of drainage morphometry and hydraulic modelling results in the view of flooding on the Havran River (Western Turkey)
A0328; EGU2008-A-02538; IS25 - HS10.4/NH2.6-1FR3P-0328
Mainerici, A.M.
The influence of the hydrotechnic structures in the mitigation of floods.
A0329; EGU2008-A-03614; IS25 - HS10.4/NH2.6-1FR3P-0329
Camfredel, M.; Cozzani, V.; Di Baldassarre, G.
Flood risk assessment for industrial plants. A case study
A0330; EGU2008-A-07137; IS25 - HS10.4/NH2.6-1FR3P-0330
Mosaeedi, A.; Mohammadi, A.; Alaghmand, S.
Assessment of Resources of Error in River Sediment Load Estimation
A0331; EGU2008-A-07199; IS25 - HS10.4/NH2.6-1FR3P-0331
Alaghmand, S.; Mohammadi, A.
Hydraulic Computer Models for Preparation of River Flood Hazard Map
A0332; EGU2008-A-07289; IS25 - HS10.4/NH2.6-1FR3P-0332
Unfer, F.; Rieber, D.
FloodScan – improvement and simplification of hydraulic 2d-modelling
A0333; EGU2008-A-07845; IS25 - HS10.4/NH2.6-1FR3P-0333
BALIN, I.; Nichersu, I.; Memier, M.; Marin, E.; Galisson, L.; Constantini, D.; Librallesso, N.; Mierla, M.; Covasianiu, A.
Balin, D.
The high resolution numerical terrain model (DTM) for the whole Romanian Danube plain: a tool for major flood risk assessment (mapping and prevention)
A0334; EGU2008-A-10101; IS25 - HS10.4/NH2.6-1FR3P-0334
Di Baldassarre, G.; Brath, A.
Flood inundation models for reconstructing historical events and for assessing the effects of levee heightening
A0335; EGU2008-A-11663; IS25 - HS10.4/NH2.6-1FR3P-0335
Ferraresi, M.; Cocchi, M.; Telo’, R.
Flood protection analysis in artificially drained basins: lithology, land use and hydrology
A0336; EGU2008-A-11668; IS25 - HS10.4/NH2.6-1FR3P-0336
Ferraresi, M.; Cocchi, M.; Telo’, R.
Flood protection analysis in artificially drained basins: hydrodynamics and ecology
A0337; EGU2008-A-11744; IS25 - HS10.4/NH2.6-1FR3P-0337
Strobil, R.O.; Forte, F.
Comparative Study of Various Techniques for the Estimation of Flood Risk Extent
A0338; EGU2008-A-11786; IS25 - HS10.4/NH2.6-1FR3P-0338
Hajizadeh, A.; Raoofiian, M.
A new idea to alert of Tsunami using of satellites altimetry and MSL
A0339; EGU2008-A-11949; IS25 - HS10.4/NH2.6-1FR3P-0339
Camorani, G.
Numerical analysis for evaluating the effects of land-subsidence on the hydraulic behaviour of an urban drainage network
A0340; EGU2008-A-12260; IS25 - HS10.4/NH2.6-1FR3P-0340
Camorani, G.; Filippi, F.
High resolution DTM for flood inundation models

HS10.5 Monitoring and modeling snow for hydrological purposes (co-listed in CR)
Convener: Parajka J.
Co-Convener(s): Lehning, M.
Lecture Room 31
Chairperson: N.N.
10:30–10:45; EGU2008-A-03836; HS10.5-1FR2O-001
Egli, L.; Jonas, T.; Magnusson, J.; Meister, R.
Different automatic Methods for estimating Snow Water Equivalent
10:45–11:00; EGU2008-A-06121; HS10.5-1FR2O-002
Kulessa, B.; Chandler, D.
Mapping and monitoring the spatiotemporal Evolution of Water Flow Patterns in Snow using the electrical Self Potential (SP) Method: a Feasibility Study
11:00–11:15; EGU2008-A-07429; HS10.5-1FR2O-003
Popova, V.V.; Simonov, Yu.A.; Shmakin, A.B.
Snow accumulation in four large-scale river basins of Northern Eurasia: relations to the recent climate changes and impact on runoff variations
11:15–11:30; EGU2008-A-10578; HS10.5-1FR2O-004
Sadic, R.; Mott, R.; Lehning, M.; Corripio, J.G.; Burlando, P.
Modeling Winter Snow Distribution with ALPINE3D and Parameterization of Snow Erosion and Deposition for Use in Other Applications
11:30–11:45; EGU2008-A-11730; HS10.5-1FR2O-005
Kolberg, S.; Gottschalk, L.
Bayesian distributed calibration of snow cover parameters
11:45–12:00; EGU2008-A-11160; HS10.5-1FR2O-006
Ranzi, R.; Attinasi, G.; Crecap, A.; Entekhabi, D.; Paloscia, S.; Pettinato, S.
Hydrological modelling and SAR monitoring of the snow-pack for the avalanche risk prevention
12:00 END OF SESSION
HS10.5 Monitoring and modeling snow for hydrological purposes (co-listed in CR) – Posters

Convener: Parajka, J.
Co-Conveners(s): Lehning, M.
Display Time: Friday, 08:00–19:30

Authors in Attendance: Friday, 13:30–15:00
Poster Area Hall A
Chairperson: N.N.

A0341; EGU2008-A-00891; HS10.5-1FR3P-0341
Zhang, Y.C; Li, B.L; Zhou, C.H
A simple model to map the snow cover under clouds using optical remote sensing data

A0342; EGU2008-A-02088; HS10.5-1FR3P-0342
Parajka, J.; Blöschl, G.
Reduction of cloud coverage by combining Terra and Aqua MODIS snow cover images

A0343; EGU2008-A-02094; HS10.5-1FR3P-0343
Granell, C.; Diaz, L.; Pepe, M.; Parajka, J.; Gould, M.; Rampini, A.; Blüschl, G.
Exposing snow melt models as geoprocessing services

A0344; EGU2008-A-03376; HS10.5-1FR3P-0344
Dadson, S; Parajka, J
Validation of a land-surface climate model using snow cover observationsValidation of a land-surface climate model using snow cover observations

A0345; EGU2008-A-04277; HS10.5-1FR3P-0345
Previati, M.; Godio, A.; Ferraris, S.; Morra di Cella, U.; Diotri, F.; Cremonese, E.
Temporal and spatial variability of snow pack at high elevation. (cancelled)

A0346; EGU2008-A-07058; HS10.5-1FR3P-0346
Previati, M.; Godio, A.; Ferraris, S.; Morra di Cella, U.; Diotri, F.; Cremonese, E.
Temporal and spatial variability of snow pack at high elevation.

A0347; EGU2008-A-04443; HS10.5-1FR3P-0347
Khalsa, S.J.; Aizen, V.
Variability in Central Asia seasonal snow cover during the MODIS period of record

A0348; EGU2008-A-05555; HS10.5-1FR3P-0348
Barthold, FK; Mazurkiewicz, A; Wu, J; Breuer, L; Vache, KB; Frede, HG
Application of SnowModel in a large, semiarid Watershed in Inner Mongolia

A0349; EGU2008-A-07506; HS10.5-1FR3P-0349
Hejduk, A.; Banasik, K.
Snowmelt Floods after Rain-on-snow Events in small, lowland Catchment

A0350; EGU2008-A-09157; HS10.5-1FR3P-0350
Eckart, J.; Reusser, D.E.; Zehe, E.; Bernhofer, C.
Spatial variability of temperature for improved snowmelt forecasting

A0351; EGU2008-A-09171; HS10.5-1FR3P-0351
Macchiavello, G.; Gabellani, S.; Rudari, R.; Boni, G.
Calibration of a snow model with MODIS data for flood simulation

A0352; EGU2008-A-09812; HS10.5-1FR3P-0352
Holzmann, H.; Koboltschig, G.; Schöner, W.
Monitoring and modeling of snow accumulation and melt for an Austrian Alpine basin

A0353; EGU2008-A-11359; HS10.5-1FR3P-0353
Kellerer-Pirklbauer, A.; Avian, M.; Lieb, G.K.; Pilz, A.
Automatic Digital Photography for Monitoring Snow Cover Distribution, Redistribution and Duration in alpine Areas (Hinteres Langtal Cirque, Austria)

A0354; EGU2008-A-12328; HS10.5-1FR3P-0354
Gan, T.Y.; Balaji, R.; Barry, R.
Changes to North American Snowpacks from 1979-2004 based on the Snow Water

HS10.7 Hydrological change: detecting change of hydrological behaviour (co-listed in NP)

Convener: Lischeid, G.
Co-Conveners(s): Lange, H.
Lecture Room 32
Chairperson: N.N.

8:30–8:45; EGU2008-A-06693; HS10.7-1FR1O-001
Beven, K J; Romanowicz, R; Young, P C; Rose, S
An event classification approach to the identification of hydrological change

9:00–9:15; EGU2008-A-11508; HS10.7-1FR1O-002
Kuells, C.J.; Wenninger, J.; Klaus, J.; Huxol, S.; Moritz, K.; Zabori, J.
Significant trends, underlying processes and indicators - the validation of hydrological change

9:15–9:30; EGU2008-A-05099; HS10.7-1FR1O-004
Chen, Y.D.; Zhang, Q; Yang, T
Analysis of hydrologic alternations in the rapidly changing environment in the Pearl River Delta, South China

9:30–9:45; EGU2008-A-07809; HS10.7-1FR1O-006
Rossi, A.; Massei, N.; Laingnel, B.; Sebag, D.; Copard, Y.; Van Metre, P.C.
The response of the Mississippi River to climate fluctuations and reservoir construction as indicated by wavelet analysis of water and sediment fluxes, 1950-1975

9:45–10:00; EGU2008-A-02690; HS10.7-1FR1O-008
Gudmundsson, L.; Lischeid, G.; Lange, H.
In phase or not in phase? Exploring the spatial structure of long term components of multivariate hydrological time series

10:00 END OF SESSION

HS10.7 Hydrological change: detecting change of hydrological behaviour (co-listed in NP) – Posters

Convener: Lischeid, G.
Co-Conveners(s): Lange, H.
Display Time: Friday, 08:00–19:30

Authors in Attendance: Friday, 13:30–15:00
Poster Area Hall A
Chairperson: N.N.

A0355; EGU2008-A-06446; HS10.7-1FR3P-0355
Heyden, H.; Barthel, B.
Analysis of the effects to Groundwater heads in the Upper Danube Catchment due to change in climate and landuse
River water balance accounting to assess uncertainty in 2030 water resources projections for the Murray-Darling Basin, Australia

Projected Impacts of Climate Change on Irrigated Agriculture in the San Joaquin Valley, California

Impact of Climate Change on the Availability of Surface Water for Irrigation in England and Wales

Climate change of precipitation derived from an ensemble simulation over Europe with the regional climate model CLM

Assessing the Characteristics of the Regional Climate that are essential for studies of hydrological changes over Pakistan

In situ measurements of solutes in aquatic systems (solicited)

Spatial TDR a new approach for observing 4d- soil moisture dynamics at the field scale: promise, progress, problems (solicited)

New insights from high-resolution phosphorus monitoring (solicited)

Acoustic Doppler Velocity meters for low-cost multi-site gauging of streamflow

Derivation of land use / land cover and surface temperature in a high spatial resolution with a remote controlled UAV

Quality surveillance of hydrological data by an online monitoring system

Use of a side looking Doppler velocity meter for measuring discharge on the Parana river for inflow to Itaipu hydroelectric reservoir

Locating seepage in water courses in polders in the Netherlands by distributed temperature sensing

Application of high resolution spectral fluorescence and ELISA to assess the removal of cyanobacteria and cyanobacterial toxins from water systems
HS10.14 Catchment modelling and process understanding
Convener: Moussa, R.
Co-Conveners(s): Gallart, F., Lawler, D., Andrieu, H.
Lecture Room 31
Chairperson: N.N.
McGrath, G.S.; Hinz, C.; Sivapalan, M.
Threshold flow events: Interrelationships between the variability of their triggering, their magnitude and soil moisture (solicited)
13:45–14:00; EGU2008-A-08070; HS10.14-1FR3O-002
Broda, S.; Larocque, M.; Paniconi, C.
Coupling of hillslope-storage Boussinesq and analytic element groundwater models for layered aquifer systems
14:00–14:15; EGU2008-A-09415; HS10.14-1FR3O-003
Šanda, M.; Nemcová, R.; Cislérová, M.
Combined Approach in the Watershed Response Examination Employing Stable Isotopes
14:15–14:30; EGU2008-A-09854; HS10.14-1FR3O-004
Blume, T.; Bronstert, A.; Zehe, E.
Improving process understanding in a data-scarce catchment by modelling at different spatial scales and different levels of complexity
14:30–14:45; EGU2008-A-05890; HS10.14-1FR3O-005
Hancock, G. R.; Martinez, C.; Wells, P.; Kalma, J.; Boland, L.
An assessment of digital elevation models (DEMs) and their ability to capture geomorphic and hydrologic properties at the catchment scale
14:45–15:00; EGU2008-A-03642; HS10.14-1FR3O-006
Merz, R.; Blöschl, G.
Process controls on the statistical flood moments
15:00 COFFEE BREAK
Chairperson: N.N.
Seeger, M.; Butzen, V.; Wirtz, S.; Casper, M.
Spatial distribution and temporal variability of runoff processes in Mediterranean Mountain environments—coupling experimental and modeling approaches
15:45–16:00; EGU2008-A-02469; HS10.14-1FR4O-002
Dalen, E.N.; Kirbky, M.J.; Bracken, L.; Chapman, P.J.; Irvine, B.
Factors influencing runoff generation, and estimates of runoff in a semi-arid area, SE Spain
16:00–16:15; EGU2008-A-11274; HS10.14-1FR4O-003
Streamflow origins in a Soudanian crystalline bedrock catchment. Quantification of the different terms and variability. Implications for future modelling and new field investigations.
16:15–16:30; EGU2008-A-08452; HS10.14-1FR4O-004
Fenicia, F.; Avdeeva, Y.; Savenie, H.H.G; de Wit, M.J.M
Modelling the long-term change in the hydrological regime of the Meuse and Mosel catchments. Effect of active forestry?
16:30–16:45; EGU2008-A-04003; HS10.14-1FR4O-005
Gascoin, S.; Ducharme, A.; Ribstein, P.; Carli, M.; Habets, F.
Adaptation of a catchment-based land surface model to the hydrogeological setting of the Somme River basin (France)
16:45–17:00; EGU2008-A-09228; HS10.14-1FR4O-006
Odoni, N. A.; Lane, S. N.
Data-theoretic approaches to modelling catchment management impacts on flood magnitude
17:00 END OF SESSION
HS10.14 Catchment modelling and process understanding – Posters

Convener: Moussa, R.
Co-Conveners: Gallart, F.; Lawler, D.; Andrieu, H.
Display Time: Friday, 08:00–19:30

Authors in Attendance: Friday, 10:30–12:00
Poster Area Hall A
Chairperson: N.N.

A0400; EGU2008-A-07260; HS10.14-1FR2P-0400
Muzylko, A.; Llorens, P.; Domingo, F.
Variability of interception canopy parameters with the event weather conditions and its effect on rainfall interception modellimg.

A0401; EGU2008-A-11440; HS10.14-1FR2P-0401
Bogaert, P.; Hurkmans, R.; Teuling, A.; Troch, P.; Uijlenhoet, R.
Low-dimensional modelling of large-scale hillslope hydrology

A0402; EGU2008-A-02730; HS10.14-1FR2P-0402
Chiffard, P.; Didsun, J.; Zepp, H.
Analysis of subsurface runoff processes and their role for the catchment response in low mountain ranges (Sauerland, Germany)

A0403; EGU2008-A-09510; HS10.14-1FR2P-0403
Pavelková, H.; Šanda, M.; Vogel, T.
Hillslope soil profile water regime by dual domain modeling with the use of stable oxygen isotopes

A0404; EGU2008-A-10196; HS10.14-1FR2P-0404
Investigating the areal variability of infiltration in heterogeneous material: the case of the black marl of south Alps

A0405; EGU2008-A-09750; HS10.14-1FR2P-0405
Blume, T.; Zehe, E.; Bronstert, A.
Field observations of persistent preferential flow paths in volcanic ash soils as a result of hydrophobicity

A0406; EGU2008-A-05387; HS10.14-1FR2P-0406
Hanel, M.; Maca, P.
Runoff prediction with partial mutual information as tool for identification and construction of input variables for artificial neural networks

A0407; EGU2008-A-09834; HS10.14-1FR2P-0407
Meißl, G.; Geitner, C.; Stötter, J.; Schöberl, F.
Comparison of rule-based approaches to identify dominant runoff processes in alpine catchments

A0408; EGU2008-A-03179; HS10.14-1FR2P-0408
Hrachowitz, M.; Soulsby, C.; Tetzlaff, D.; Dawson, J.; Dunn, S.
Identifying runoff processes from long term tracer data: do multiple tracers help?

A0409; EGU2008-A-02241; HS10.14-1FR2P-0409
Goth, M.; Gimena, F.N.; Lopéz, J.J.
An analysis of three instantaneous unit hydrographs based on the Beta density function

A0410; EGU2008-A-04532; HS10.14-1FR2P-0410
Bulygina, N.; Rode, M.
Top-Down Watershed Behavior Description

A0411; EGU2008-A-09556; HS10.14-1FR2P-0411
Branger, F.; Braud, I.; Viallet, P.; Debiomne, S.
An “object-based” modelling approach to assess the influence of landscape management practices on a small agricultural catchment

A0412; EGU2008-A-08228; HS10.14-1FR2P-0412
Reusser, D. E.; Zehe, E.
Increased process understanding from modelling through a combination of error and sensitivity analysis.

A0413; EGU2008-A-01513; HS10.14-1FR2P-0413
Keshta, N.; Elshorbagy, A.; El-Baroudy, I.
Developing a generic system dynamics watershed (GSDW) model to assess the hydrologic performance of reconstructed and natural watersheds

A0414; EGU2008-A-12218; HS10.14-1FR2P-0414
Ouessar, M.; Bruggeman, A.; Abdelli, F.; Mohtarr, R.; Gabriels, D.
Use of SWAT for assessing the effect of Land Use Changes in southern Tunisia

A0415; EGU2008-A-11851; HS10.14-1FR2P-0415
Pancescu, M.; Birsan, M.-V.; Matreata, M.
Flash-flood modelling of small Romanian catchments with the Vflo distributed model

A0416; EGU2008-A-09087; HS10.14-1FR2P-0416
Balin, D.; Goetzinger, J.; Lee, H.; Sbaitha, H.; Rode, M.; Bardossy, A.
Impact of rainfall spatial uncertainty on distributed runoff modeling: the Weisse Elster case study, Germany

A0417; EGU2008-A-07010; HS10.14-1FR2P-0417
Natkhin, M.; Steidl, J.; Dietrich, O.
Quantifying the influence of climate and forest management on the lake water balance in a lowland catchment in Germany

A0418; EGU2008-A-07803; HS10.14-1FR2P-0418
Kumar, R.; Samaniego, L.; Attinger, S.
Implementation of a process-based distributed mesoscale hydrologic model

A0419; EGU2008-A-06359; HS10.14-1FR2P-0419
Samaniego, L.; Kumar, R.; Attinger, S.
Soil moisture parameter regionalization for a mesoscale hydrologic model

A0420; EGU2008-A-05481; HS10.14-1FR2P-0420
Johnst, M.; Casper, M.; Grigoryan, G.; Herbst, M.
Suitability of rainfall runoff models for the assessment of extreme floods in meso-scale basins

A0421; EGU2008-A-11621; HS10.14-1FR2P-0421
Kulhavý, Z.; Tlapáková, L.; Doležal, F.
Integrated monitoring, real-time modelling and forecasting of hydrological processes in small agricultural and forest catchments

A0422; EGU2008-A-11361; HS10.14-1FR2P-0422
Kulhavý, Z.; Tlapáková, L.; Doležal, F.
Integrated monitoring, real-time modelling and forecasting of hydrological processes in small agricultural and forest catchments

A0423; EGU2008-A-08369; HS10.14-1FR2P-0423
MOUSSA, R.
Significance of the Nash-Sutcliffe efficiency measure for linear rise and exponential recession in event based flood modelling

A0424; EGU2008-A-11048; HS10.14-1FR2P-0424
Szabó, J.A.
An approach for distributed parameter optimization of LISFLOOD hydrological model using efficient hybrid optimization procedure

A0425; EGU2008-A-08848; HS10.14-1FR2P-0425
Lautenbach, SL; Seppelt, RS
Comparing semi-distributed and distributed conceptual rainfall-run-off models – trade-off between uncertainty and model efficiency
**A0426**: EGU2008-A-05227; HS10.14-1FR2P-0426
Casper, M.; Sauer, T.; Schobel, S.
How to reach behavioural physically based models by reducing parameter uncertainty

**A0427**: EGU2008-A-02600; HS10.14-1FR2P-0427
Singh, S. K.; Bardossy, A.
Influence of time-varying parameterization on hydrological models

**A0428**: EGU2008-A-04105; HS10.14-1FR2P-0428
Shbaita, H; Balin, D; Rode, M
Uncertainty analysis as a comparison tool between different scales of aggregation

**A0429**: EGU2008-A-05750; HS10.14-1FR2P-0429
Kavetski, D; Schaefli, B; Renard, B; Thyer, M; Fenicia, F
Improving conceptual rainfall-runoff models using Bayesian total error analysis

**A0430**: EGU2008-A-02311; HS10.14-1FR2P-0430
Renard, B.; Thyer, M.; Kuczera, G.; Kavetski, D.; Franks, S.
Bayesian total error analysis for hydrologic models: perspectives for regionalisation