



Newsletter of the Unesco Land Subsidence International Initiative

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New Chief IHP

After the retirement of Alice, Aureli, Patrice Moix is the new Chief of the Section "Groundwater Sustainability and Water Cooperation", Division of Water Sciences, Intergovernmental Hydrological Programme Secretariat, UNESCO.

Alice has supported the Unesco LASSII group during a long period and has always been a source for inspiration.

Modelling

Encarna Esteban, Ariel Dinar, Elena Calvo, Jose Albiac, Javier Calatrava, Gerardo Herrera, Pietro Teatini, Roberto Tomás, Pablo Ezquerro, Yang Li,

Modeling the optimal management of land subsidence due to aquifers overexploitation,

Journal of Environmental Management, Volume 349, 2024, 119333, ISSN 0301-4797,

<https://doi.org/10.1016/j.jenvman.2023.119333>.

(<https://www.sciencedirect.com/science/article/pii/S0301479723021217>)

Suphi Sen et al.,

Sinking Land: Optimal Control of Subsidence

https://www.cesifo.org/DocDL/cesifo1_wp10683.pdf

Melika Tasan et al.,

Leveraging GNSS tropospheric products for machine learning-based land subsidence prediction

https://www.researchgate.net/publication/375437692_Leveraging_GNSS_tropospheric_products_for_machine_learning-based_land_subsidence_prediction

New Literature

India, Mehsana

R.S. Chatterjee, Shravaneet Singha, Ashish Aggarwal, Vimanyu Sharma, Pranshu Pranjal, Anuradha Anushika, P.K. Jain, A. Nagar, D.S. Mitra, D. Kumar, N.R. Patel, P. Chauhan Funding,

Reconnaissance to characterisation of land subsidence due to groundwater overdraft and oil extraction in and around Mehsana City, Gujarat, India by long-term hybrid differential interferometric SAR technique,

Journal of Hydrology, 2023, 130441, ISSN 0022-1694,

<https://doi.org/10.1016/j.jhydrol.2023.130441>.

(<https://www.sciencedirect.com/science/article/pii/S0022169423013835>)

Indonesia, Jakarta

Febi Dwirahmadi et al.,

Linking Disaster Risk Reduction and Climate Change Adaptation through Collaborative Governance: Experience from Urban Flooding in Jakarta

<https://www.mdpi.com/2076-3263/13/11/353>

Iran, Tehran

Aydin Moradi et al.,

Assessments of land subsidence in Tehran metropolitan, Iran, using Sentinel-1A InSAR

https://www.researchgate.net/publication/375668713_Assessments_of_land_subsidence_in_Tehran_metropolitan_Iran_using_Sentinel-1A_InSAR

Italy, Rome

Giandomenico Mastrandri, Claudia Masciulli, Roberta Marini, Carlo Esposito, Gabriele Scarascia Mugnozza & Paolo Mazzanti (2023) A novel model for multi-risk ranking of buildings at city level based on open data: the test site of Rome, Italy, Geomatics, Natural Hazards and Risk, 14:1, DOI: 10.1080/19475705.2023.2275541

<https://www.tandfonline.com/doi/full/10.1080/19475705.2023.2275541>

Kenya, Menengai, Nakuru

Joline Achieng et al.,

Investigating Ground Deformation and Possible Causative Factors in Menengai, Nakuru

<https://www.scirp.org/journal/paperinformation.aspx?paperid=129260>

the Netherlands

Philip Conroy, Simon A.N. van Diepen, Ramon F. Hanssen,

SPAMS: A new empirical model for soft soil surface displacement based on meteorological input data, Geoderma, Volume 440, 2023, 116699, ISSN 0016-7061,

[https://doi.org/10.1016/j.geoderma.2023.116699.](https://doi.org/10.1016/j.geoderma.2023.116699)

(<https://www.sciencedirect.com/science/article/pii/S0016706123003762>)

Pakistan, Lahore

Meer Muhammad Sajjad et al.,

Assessing the Impacts of Groundwater Depletion and Aquifer Degradation on Land Subsidence in Lahore, Pakistan: A PS-InSAR Approach for Sustainable Urban Development

<https://www.mdpi.com/2072-4292/15/22/5418>

PR China, Shanghai

Xiaying Wang et al.,

Integrating SAR and Geographic Information Data Revealing Land Subsidence and Geological Risks of Shanghai City

https://www.researchgate.net/publication/375435541_Integrating_SAR_and_Geographic_Information_Data_Revealing_Land_Subsidence_and_Geological_Risks_of_Shanghai_City

Monitoring

The Power of Gravity Sensors in Modern Applications

<https://ts2.space/en/the-power-of-gravity-sensors-in-modern-applications/>

YOUTUBE

Gulf of Guinea

Marie-Noëlle WOILLEZ

Coastal areas of the Gulf of Guinea faced with relative sea-level rise

https://www.youtube.com/watch?v=EZI6G4U_Qo0&ab_channel=AFD-Agencefran%C3%A7aise%20d%C3%A9veloppement