

## DAFTAR PUSTAKA

- Addison, P., & Oommen, T. (2018). Utilizing satellite radar remote sensing for burn severity estimation. *International Journal of Applied Earth Observation and Geoinformation*, 73, 292–299. <https://doi.org/10.1016/j.jag.2018.07.002>
- Adriano, B., Yokoya, N., Miura, H., Matsuoka, M., & Koshimura, S. (2020). A Semiautomatic Pixel-Object Method for Detecting Landslides Using Multitemporal ALOS-2 Intensity Images. *Remote Sensing*, 12(3), 561. <https://doi.org/10.3390/rs12030561>
- Agapiou, A. (2020). Estimating Proportion of Vegetation Cover at the Vicinity of Archaeological Sites Using Sentinel-1 and -2 Data, Supplemented by Crowdsourced OpenStreetMap Geodata. *Applied Sciences*, 10(14), 4764. <https://doi.org/10.3390/app10144764>
- Aitkenhead, M. J., Lumsdon, P., & Miller, D. R. (2007). Remote sensing-based neural network mapping of tsunami damage in Aceh, Indonesia. *Disasters*, 31(3), 217–226. <https://doi.org/10.1111/j.1467-7717.2007.01005.x>
- Alexander, D. E. (2008). A brief survey of GIS in mass-movement studies, with reflections on theory and methods. *Geomorphology*, 94(3–4), 261–267. <https://doi.org/10.1016/j.geomorph.2006.09.022>
- Allison, R., Johnston, J., Craig, G., & Jennings, S. (2016). Airborne Optical and Thermal Remote Sensing for Wildfire Detection and Monitoring. *Sensors*, 16(8), 1310. <https://doi.org/10.3390/s16081310>
- Alonso-Canas, I., & Chuvieco, E. (2015). Global burned area mapping from ENVISAT-MERIS and MODIS active fire data. *Remote Sensing of Environment*, 163, 140–152. <https://doi.org/10.1016/j.rse.2015.03.011>
- Alonso-González, E., & Fernández-García, V. (2021). MOSEV: a global burn severity database from MODIS (2000–2020). *Earth System Science Data*,

13(5), 1925–1938. <https://doi.org/10.5194/essd-13-1925-2021>

Amatya, P., Kirschbaum, D., & Stanley, T. (2019). Use of Very High-Resolution Optical Data for Landslide Mapping and Susceptibility Analysis along the Karnali Highway, Nepal. *Remote Sensing*, 11(19), 2284. <https://doi.org/10.3390/rs11192284>

Arjasakusuma, S., Kusuma, S. S., Mahendra, W. K., & Astriviany, N. (2021). Mapping paddy field extent and temporal pattern variation in a complex terrain area using sentinel 1-time series data: Case study of magelang district, indonesia. *International Journal of Geoinformatics*, 17(2), 79–88. <https://doi.org/10.52939/ijg.v17i2.1763>

Arjasakusuma, S., Kusuma, S. S., Rafif, R., Saringatin, S., & Wicaksono, P. (2021). Time-series Cross-orbit Sentinel-1 Synthetic-Aperture Radar (SAR) Data for Mapping Paddy Extent: Case Study of Magelang District, Central Java. *IOP Conference Series: Earth and Environmental Science*, 686(1), 012053. <https://doi.org/10.1088/1755-1315/686/1/012053>

Azikin, B., Pachri, H., Alimuddin, I., & Eden, J. (2023). Landslide Susceptibility Assessment Using The Integration Of Frequency Ratio And Weight Of Evidence Model In North Luwu, South Sulawesi, Indonesia. *International Jurnal Islamic Education, Research and Multicturalism (IJIERM)*, Vol 5 No 2. <https://doi.org/https://doi.org/10.47006/ijierm.v5i2.222>

Balz, T., Hammer, H., & Auer, S. (2015). Potentials and limitations of SAR image simulators – A comparative study of three simulation approaches. *ISPRS Journal of Photogrammetry and Remote Sensing*, 101, 102–109. <https://doi.org/10.1016/j.isprsjprs.2014.12.008>

Bar, S., Parida, B. R., & Pandey, A. C. (2020). Landsat-8 and Sentinel-2 based Forest fire burn area mapping using machine learning algorithms on GEE cloud platform over Uttarakhand, Western Himalaya. *Remote Sensing*

*Applications: Society and Environment*, 18, 100324.  
<https://doi.org/10.1016/j.rsase.2020.100324>

Bastarrika, A., Chuvieco, E., & Martín, M. P. (2011). Mapping burned areas from Landsat TM/ETM+ data with a two-phase algorithm: Balancing omission and commission errors. *Remote Sensing of Environment*, 115(4), 1003–1012.  
<https://doi.org/10.1016/j.rse.2010.12.005>

Belenguer-Plomer, M. A., Tanase, M. A., Chuvieco, E., & Bovolo, F. (2021). CNN-based burned area mapping using radar and optical data. *Remote Sensing of Environment*, 260, 112468. <https://doi.org/10.1016/j.rse.2021.112468>

Belenguer-Plomer, M. A., Tanase, M. A., Fernandez-Carrillo, A., & Chuvieco, E. (2019). Burned area detection and mapping using Sentinel-1 backscatter coefficient and thermal anomalies. *Remote Sensing of Environment*, 233, 111345. <https://doi.org/10.1016/j.rse.2019.111345>

Benz, S. A., & Blum, P. (2019). Global detection of rainfall-triggered landslide clusters. *Natural Hazards and Earth System Sciences*, 19(7), 1433–1444.  
<https://doi.org/10.5194/nhess-19-1433-2019>

Bernhard, E.-M., Twele, A., & Gähler, M. (2011). Brandflächendetektion auf Basis von X-Band Radarsatellitendaten im europäischen Mittelmeerraum. *Photogrammetrie - Fernerkundung - Geoinformation*, 2011(4), 261–270.  
<https://doi.org/10.1127/1432-8364/2011/0087>

Bessette-Kirton, E. K., Cerovski-Darriau, C., Schulz, W. H., Coe, J. A., Kean, J. W., Godt, J. W., Thomas, M. A., & Stephen Hughes, K. (2019). Landslides triggered by Hurricane Maria: Assessment of an extreme event in Puerto Rico. *GSA Today*, 29(6), 4–10. <https://doi.org/10.1130/GSATG383A.1>

Booyesen, R., Gloaguen, R., Lorenz, S., Zimmermann, R., & Nex, P. A. M. (2020). Geological Remote Sensing. In *Encyclopedia of Geology: Volume 1-6, Second Edition* (Vol. 6, pp. 301–314). Elsevier. <https://doi.org/10.1016/B978-0-12->

409548-9.12127-X

- Boschetti, L., Roy, D. P., Justice, C. O., & Humber, M. L. (2015). MODIS-Landsat fusion for large area 30m burned area mapping. *Remote Sensing of Environment*, 161, 27–42. <https://doi.org/10.1016/j.rse.2015.01.022>
- Bourgeau-Chavez, L. L., Harrell, P. A., Kasischke, E. S., & French, N. H. F. (1997). The detection and mapping of alaskan wildfires using a spaceborne imaging radar system. *International Journal of Remote Sensing*, 18(2), 355–373. <https://doi.org/10.1080/014311697219114>
- Bourgeau-Chavez, L. L., Kasischke, E. S., Brunzell, S., Mudd, J. P., & Tukman, M. (2002). Mapping fire scars in global boreal forests using imaging radar data. *International Journal of Remote Sensing*, 23(20), 4211–4234. <https://doi.org/10.1080/01431160110109589>
- Brown, A. R., Petropoulos, G. P., & Ferentinos, K. P. (2018). Appraisal of the Sentinel-1 & 2 use in a large-scale wildfire assessment: A case study from Portugal's fires of 2017. *Applied Geography*, 100, 78–89. <https://doi.org/10.1016/j.apgeog.2018.10.004>
- Burrows, K., Walters, R. J., Milledge, D., & Densmore, A. L. (2020). A systematic exploration of satellite radar coherence methods for rapid landslide detection. *Natural Hazards and Earth System Sciences*, 20(11), 3197–3214. <https://doi.org/10.5194/nhess-20-3197-2020>
- Cannon, S. H., Gartner, J. E., Rupert, M. G., Michael, J. A., Rea, A. H., & Parrett, C. (2010). Predicting the probability and volume of postwildfire debris flows in the intermountain western United States. *Geological Society of America Bulletin*, 122(1–2), 127–144. <https://doi.org/10.1130/B26459.1>
- Cannon, Susan H., & DeGraff, J. (2009). The Increasing Wildfire and Post-Fire Debris-Flow Threat in Western USA, and Implications for Consequences of Climate Change. In *Landslides – Disaster Risk Reduction* (pp. 177–190).

Springer Berlin Heidelberg. [https://doi.org/10.1007/978-3-540-69970-5\\_9](https://doi.org/10.1007/978-3-540-69970-5_9)

CFA. (2021). Landscaping for bushfire: Garden design and plant selection. *Country Fire Authority*. <https://www.cfa.vic.gov.au/plan-prepare/how-to-prepare-your-property/landscaping>

Chae, B.-G., Park, H.-J., Catani, F., Simoni, A., & Berti, M. (2017). Landslide prediction, monitoring and early warning: a concise review of state-of-the-art. *Geosciences Journal*, 21(6), 1033–1070. <https://doi.org/10.1007/s12303-017-0034-4>

Chen, W., Zhang, S., Li, R., & Shahabi, H. (2018). Performance evaluation of the GIS-based data mining techniques of best-first decision tree, random forest, and naïve Bayes tree for landslide susceptibility modeling. *Science of The Total Environment*, 644, 1006–1018. <https://doi.org/10.1016/j.scitotenv.2018.06.389>

Cochrane, M. A. (2003). Fire science for rainforests. In *Nature* (Vol. 421, Issue 6926, pp. 913–919). <https://doi.org/10.1038/nature01437>

Cochrane, M. A., Alencar, A., Schulze, M. D., Souza, C. M., Nepstad, D. C., Lefebvre, P., & Davidson, E. A. (1999). Positive feedbacks in the fire dynamic of closed canopy tropical forests. *Science*, 284(5421), 1832–1835. <https://doi.org/10.1126/science.284.5421.1832>

Coen, J. L., Stavros, E. N., & Fites-Kaufman, J. A. (2018). Deconstructing the King megafire. *Ecological Applications*, 28(6), 1565–1580. <https://doi.org/10.1002/eap.1752>

Colesanti, C., & Wasowski, J. (2006). Investigating landslides with space-borne Synthetic Aperture Radar (SAR) interferometry. *Engineering Geology*, 88(3–4), 173–199. <https://doi.org/10.1016/j.enggeo.2006.09.013>

Collins, L., Bennett, A., Leonard, S., & Penman, T. (2019). Wildfire refugia in

forests: Severe fire weather and drought mute the influence of topography and fuel age. *Glob Change Biol*; 25: 3829– 3843.  
<https://doi.org/https://doi.org/10.1111/gcb.14735>

Colson, D., Petropoulos, G. P., & Ferentinos, K. P. (2018). Exploring the Potential of Sentinels-1 & 2 of the Copernicus Mission in Support of Rapid and Cost-effective Wildfire Assessment. *International Journal of Applied Earth Observation and Geoinformation*, 73, 262–276.  
<https://doi.org/10.1016/j.jag.2018.06.011>

Congalton, R. G. (2015). Remote Sensing and Image Interpretation. 7th Edition. *Photogrammetric Engineering & Remote Sensing*, 81(8), 615–616.  
<https://doi.org/10.14358/pers.81.8.615>

Copernicus. (2021). *Copernicus open access hub*. European Space Agency (2021).  
<https://sentinels.copernicus.eu/web/sentinel/missions/sentinel-1>

Culler, E. S., Livneh, B., Rajagopalan, B., & Tiampo, K. F. (2023). A data-driven evaluation of post-fire landslide susceptibility. *Natural Hazards and Earth System Sciences*, 23(4), 1631–1652. <https://doi.org/10.5194/nhess-23-1631-2023>

De Luca, G., Silva, J. M. N., & Modica, G. (2021). A workflow based on Sentinel-1 SAR data and open-source algorithms for unsupervised burned area detection in Mediterranean ecosystems. *GIScience & Remote Sensing*, 58(4), 516–541. <https://doi.org/10.1080/15481603.2021.1907896>

DeVries, B., Huang, C., Armston, J., Huang, W., Jones, J. W., & Lang, M. W. (2020). Rapid and robust monitoring of flood events using Sentinel-1 and Landsat data on the Google Earth Engine. *Remote Sensing of Environment*, 240, 111664. <https://doi.org/10.1016/j.rse.2020.111664>

Dewi, R., Bijker, W., Stein, A., & Marfai, M. (2016). Fuzzy Classification for Shoreline Change Monitoring in a Part of the Northern Coastal Area of Java,

- Indonesia. *Remote Sensing*, 8(3), 190. <https://doi.org/10.3390/rs8030190>
- Donchyts, G., Baart, F., Winsemius, H., Gorelick, N., Kwadijk, J., & Van De Giesen, N. (2016). Earth's surface water change over the past 30 years. In *Nature Climate Change* (Vol. 6, Issue 9, pp. 810–813). <https://doi.org/10.1038/nclimate3111>
- Dong, J., Xiao, X., Menarguez, M. A., Zhang, G., Qin, Y., Thau, D., Biradar, C., & Moore, B. (2016). Mapping paddy rice planting area in northeastern Asia with Landsat 8 images, phenology-based algorithm and Google Earth Engine. *Remote Sensing of Environment*, 185, 142–154. <https://doi.org/10.1016/j.rse.2016.02.016>
- dos Reis, M., Graça, P. M. L. de A., Yanai, A. M., Ramos, C. J. P., & Fearnside, P. M. (2021). Forest fires and deforestation in the central Amazon: Effects of landscape and climate on spatial and temporal dynamics. *Journal of Environmental Management*, 288, 112310. <https://doi.org/10.1016/j.jenvman.2021.112310>
- Drusch, M., Del Bello, U., Carlier, S., Colin, O., Fernandez, V., Gascon, F., Hoersch, B., Isola, C., Laberinti, P., Martimort, P., Meygret, A., Spoto, F., Sy, O., Marchese, F., & Bargellini, P. (2012). Sentinel-2: ESA's Optical High-Resolution Mission for GMES Operational Services. *Remote Sensing of Environment*, 120, 25–36. <https://doi.org/10.1016/j.rse.2011.11.026>
- Engelbrecht, J., Theron, A., Vhengani, L., & Kemp, J. (2017). A Simple Normalized Difference Approach to Burnt Area Mapping Using Multi-Polarisation C-Band SAR. *Remote Sensing*, 9(8), 764. <https://doi.org/10.3390/rs9080764>
- ESA. (2015). SENTINEL-2 User Handbook Sentinel-2 User Handbook SENTINEL-2 User Handbook Title Sentinel -2 User Handbook SENTINEL-2 User Handbook. *Euroean Space Agency*, 1, 1–64.

[https://sentinel.esa.int/documents/247904/685211/Sentinel-2\\_User\\_Handbook](https://sentinel.esa.int/documents/247904/685211/Sentinel-2_User_Handbook)

- Eva, H., & Lambin, E. F. (2000). Fires and land-cover change in the tropics: A remote sensing analysis at the landscape scale. *Journal of Biogeography*, 27(3), 765–776. <https://doi.org/10.1046/j.1365-2699.2000.00441.x>
- Farr, T. G., Rosen, P. A., Caro, E., Crippen, R., Duren, R., Hensley, S., Kobrick, M., Paller, M., Rodriguez, E., Roth, L., Seal, D., Shaffer, S., Shimada, J., Umland, J., Werner, M., Oskin, M., Burbank, D., & Alsdorf, D. E. (2007). The shuttle radar topography mission. *Reviews of Geophysics*, 45(2), RG2004. <https://doi.org/10.1029/2005RG000183>
- Flores, A., Herndon, K., Thapa, R. B., C. (2019). The SAR Handbook: Comprehensive Methodologies for Forest Monitoring and Biomass Estimation. *Https://Servirglobal.Net/Resources/Sar-Handbook*. <https://doi.org/https://doi.org/10.25966/nr2c-s697>
- Froude, M. J., & Petley, D. N. (2018). Global fatal landslide occurrence from 2004 to 2016. *Natural Hazards and Earth System Sciences*, 18(8), 2161–2181. <https://doi.org/10.5194/nhess-18-2161-2018>
- Furberg, D., Ban, Y., & Nascetti, A. (2019). Monitoring of urbanization and analysis of environmental impact in Stockholm with Sentinel-2A and SPOT-5 Multispectral Data. *Remote Sensing*, 11(20). <https://doi.org/10.3390/rs11202408>
- Gao, M., Gong, H., Zhao, W., Chen, B., Chen, Z., & Shi, M. (2016). An improved topographic correction model based on Minnaert. *GIScience and Remote Sensing*, 53(2), 247–264. <https://doi.org/10.1080/15481603.2015.1118976>
- Gaveau, D. L. A., Descals, A., Salim, M. A., Sheil, D., & Sloan, S. (2021). Refined burned-area mapping protocol using Sentinel-2 data increases estimate of 2019 Indonesian burning. *Earth System Science Data*, 13(11), 5353–5368.

<https://doi.org/10.5194/essd-13-5353-2021>

- Ghorbanzadeh, O., Blaschke, T., Gholamnia, K., Meena, S. R., Tiede, D., & Aryal, J. (2019). Evaluation of different machine learning methods and deep-learning convolutional neural networks for landslide detection. *Remote Sensing*, *11*(2), 196. <https://doi.org/10.3390/rs11020196>
- Giesen, W. (2004). Causes of peat swamp forest degradation in Berbak National Park and recommendations for restoration. *Arnhem, The Netherlands: ARCADIS Euroconsult*.
- Giglio, L., Loboda, T., Roy, D. P., Quayle, B., & Justice, C. O. (2009). An active-fire based burned area mapping algorithm for the MODIS sensor. *Remote Sensing of Environment*, *113*(2), 408–420. <https://doi.org/10.1016/j.rse.2008.10.006>
- Gimeno, M., San-Miguel-Ayanz, J., & Schmuck, G. (2004). Identification of burnt areas in Mediterranean forest environments from ERS-2 SAR time series. *International Journal of Remote Sensing*, *25*(22), 4873–4888. <https://doi.org/10.1080/01431160412331269715>
- Gorelick, N., Hancher, M., Dixon, M., Ilyushchenko, S., Thau, D., & Moore, R. (2017). Google Earth Engine: Planetary-scale geospatial analysis for everyone. *Remote Sensing of Environment*, *202*, 18–27. <https://doi.org/10.1016/j.rse.2017.06.031>
- Guyon, D., & Bréda, N. (2016). Applications of Multispectral Optical Satellite Imaging in Forestry. In *Land Surface Remote Sensing in Agriculture and Forest* (pp. 249–329). Elsevier. <https://doi.org/10.1016/B978-1-78548-103-1.50007-8>
- Hakim, W. L., Achmad, A. R., & Lee, C. W. (2020). Land subsidence susceptibility mapping in jakarta using functional and meta-ensemble machine learning algorithm based on time-series insar data. *Remote Sensing*, *12*(21), 1–26.

<https://doi.org/10.3390/rs12213627>

- Handwerger, A. L., Huang, M. H., Fielding, E. J., Booth, A. M., & Bürgmann, R. (2019). A shift from drought to extreme rainfall drives a stable landslide to catastrophic failure. *Scientific Reports*, 9(1), 1569. <https://doi.org/10.1038/s41598-018-38300-0>
- Harp, E. L., & Jibson, R. W. (1996). Landslides triggered by the 1994 Northridge, California, earthquake. *Bulletin of the Seismological Society of America*, 86(1B), S319–S332.
- Hawbaker, T. J., Vanderhoof, M. K., Beal, Y.-J., Takacs, J. D., Schmidt, G. L., Falgout, J. T., Williams, B., Fairaux, N. M., Caldwell, M. K., Picotte, J. J., Howard, S. M., Stitt, S., & Dwyer, J. L. (2017). Mapping burned areas using dense time-series of Landsat data. *Remote Sensing of Environment*, 198, 504–522. <https://doi.org/10.1016/j.rse.2017.06.027>
- Hervás, J., & Bobrowsky, P. (2009). Mapping: Inventories, Susceptibility, Hazard and Risk. In *Landslides – Disaster Risk Reduction* (pp. 321–349). Springer Berlin Heidelberg. [https://doi.org/10.1007/978-3-540-69970-5\\_19](https://doi.org/10.1007/978-3-540-69970-5_19)
- Hilley, G. E., Bürgmann, R., Ferretti, A., Novali, F., & Rocca, F. (2004). Dynamics of slow-moving landslides from permanent scatterer analysis. *Science*, 304(5679), 1952–1955. <https://doi.org/10.1126/science.1098821>
- Hölbling, D., Friedl, B., & Eisank, C. (2015). An object-based approach for semi-automated landslide change detection and attribution of changes to landslide classes in northern Taiwan. *Earth Science Informatics*, 8(2), 327–335. <https://doi.org/10.1007/s12145-015-0217-3>
- Huang, H., Chen, Y., Clinton, N., Wang, J., Wang, X., Liu, C., Gong, P., Yang, J., Bai, Y., Zheng, Y., & Zhu, Z. (2017). Mapping major land cover dynamics in Beijing using all Landsat images in Google Earth Engine. *Remote Sensing of Environment*, 202, 166–176. <https://doi.org/10.1016/j.rse.2017.02.021>

- Huang, M. H., Fielding, E. J., Liang, C., Milillo, P., Bekaert, D., Dreger, D., & Salzer, J. (2017). Coseismic deformation and triggered landslides of the 2016 Mw 6.2 Amatrice earthquake in Italy. *Geophysical Research Letters*, 44(3), 1266–1274. <https://doi.org/10.1002/2016GL071687>
- Huang, S., & Siegert, F. (2006). Backscatter change on fire scars in Siberian boreal forests in ENVISAT ASAR wide-swath images. *IEEE Geoscience and Remote Sensing Letters*, 3(1), 154–158. <https://doi.org/10.1109/LGRS.2005.860483>
- IASC. (2015). *Multi-Sector Initial Rapid Assessment Guidance: July 2015 Revision*. OCHA.
- Immitzer, M., Vuolo, F., & Atzberger, C. (2016). First experience with Sentinel-2 data for crop and tree species classifications in central Europe. *Remote Sensing*, 8(3), 166. <https://doi.org/10.3390/rs8030166>
- Intrieri, E., Raspini, F., Fumagalli, A., Lu, P., Del Conte, S., Farina, P., Allievi, J., Ferretti, A., & Casagli, N. (2018). The Maoxian landslide as seen from space: detecting precursors of failure with Sentinel-1 data. *Landslides*, 15(1), 123–133. <https://doi.org/10.1007/s10346-017-0915-7>
- J, Tang, S, Alelyani, H, & Liu. (2014). Data Classification. In C. C. Aggarwal (Ed.), *Data Classification: Algorithms and Applications*. Chapman and Hall/CRC. <https://doi.org/10.1201/b17320>
- Jung, J., & Yun, S. H. (2020). Evaluation of coherent and incoherent landslide detection methods based on synthetic aperture radar for rapid response: A case study for the 2018 Hokkaido landslides. *Remote Sensing*, 12(2), 265. <https://doi.org/10.3390/rs12020265>
- Kadavi, P. R., Lee, W. J., & Lee, C. W. (2017). Analysis of the pyroclastic flow deposits of Mount Sinabung and Merapi using Landsat imagery and the artificial neural networks approach. *Applied Sciences (Switzerland)*, 7(9), 935. <https://doi.org/10.3390/app7090935>

- Kalogirou, V., Ferrazzoli, P., Vecchia, A. Della, & Foumelis, M. (2014). On the SAR backscatter of burned forests: A model-based study in C-band, over burned pine canopies. *IEEE Transactions on Geoscience and Remote Sensing*, 52(10), 6205–6215. <https://doi.org/10.1109/TGRS.2013.2295594>
- Kasischke, E. S., Melack, J. M., & Craig Dobson, M. (1997). The use of imaging radars for ecological applications—A review. *Remote Sensing of Environment*, 59(2), 141–156. [https://doi.org/10.1016/S0034-4257\(96\)00148-4](https://doi.org/10.1016/S0034-4257(96)00148-4)
- Kern, A. N., Addison, P., Oommen, T., Salazar, S. E., & Coffman, R. A. (2017). Machine Learning Based Predictive Modeling of Debris Flow Probability Following Wildfire in the Intermountain Western United States. *Mathematical Geosciences*, 49(6), 717–735. <https://doi.org/10.1007/s11004-017-9681-2>
- Kirschbaum, D., & Stanley, T. (2018). Satellite-Based Assessment of Rainfall-Triggered Landslide Hazard for Situational Awareness. *Earth's Future*, 6(3), 505–523. <https://doi.org/10.1002/2017EF000715>
- Kirschbaum, D., Stanley, T., & Zhou, Y. (2015). Spatial and temporal analysis of a global landslide catalog. *Geomorphology*, 249, 4–15. <https://doi.org/10.1016/j.geomorph.2015.03.016>
- Kumar, L., & Mutanga, O. (2018). Google Earth Engine applications since inception: Usage, trends, and potential. *Remote Sensing*, 10(10), 1–15. <https://doi.org/10.3390/rs10101509>
- Kurum, M. (2015). C-band SAR backscatter evaluation of 2008 gallipoli forest fire. *IEEE Geoscience and Remote Sensing Letters*, 12(5), 1091–1095. <https://doi.org/10.1109/LGRS.2014.2382716>
- Kusumastuti, R. D., Viverita, Husodo, Z. A., Suardi, L., & Danarsari, D. N. (2014). Developing a resilience index towards natural disasters in Indonesia. *International Journal of Disaster Risk Reduction*, 10(PA), 327–340. <https://doi.org/10.1016/j.ijdr.2014.10.007>

- Kyriou, A., & Nikolakopoulos, K. (2018). Assessing the suitability of Sentinel-1 data for landslide mapping. *European Journal of Remote Sensing*, 51(1), 402–411. <https://doi.org/10.1080/22797254.2018.1444944>
- Lacroix, P., Bièvre, G., Pathier, E., Kniess, U., & Jongmans, D. (2018). Use of Sentinel-2 images for the detection of precursory motions before landslide failures. *Remote Sensing of Environment*, 215, 507–516. <https://doi.org/10.1016/j.rse.2018.03.042>
- Lapini, A., Pettinato, S., Santi, E., Paloscia, S., Fontanelli, G., & Garzelli, A. (2020). Comparison of Machine Learning Methods Applied to SAR Images for Forest Classification in Mediterranean Areas. *Remote Sensing*, 12(3), 369. <https://doi.org/10.3390/rs12030369>
- Lasaponara, R., & Tucci, B. (2019). Identification of Burned Areas and Severity Using SAR Sentinel-1. *IEEE Geoscience and Remote Sensing Letters*, 16(6), 917–921. <https://doi.org/10.1109/LGRS.2018.2888641>
- Laurance, W. F., & Bruce Williamson, G. (2001). Positive feedbacks among forest fragmentation, drought, and climate change in the Amazon. *Conservation Biology*, 15(6), 1529–1535. <https://doi.org/10.1046/j.1523-1739.2001.01093.x>
- Le Toan, T., Beaudoin, A., Riou, J., & Guyon, D. (1992). Relating Forest Biomass to SAR Data. *IEEE Transactions on Geoscience and Remote Sensing*, 30(2), 403–411. <https://doi.org/10.1109/36.134089>
- Lee, C.-W., Lu, Z., & Kim, J. W. (2017). Monitoring Mount Sinabung in Indonesia Using Multi-Temporal InSAR. *Korean Journal of Remote Sensing*, 33(1), 37–46. <https://doi.org/10.7780/kjrs.2017.33.1.4>
- Lee, S. (2007). Application and verification of fuzzy algebraic operators to landslide susceptibility mapping. *Environmental Geology*, 52(4), 615–623. <https://doi.org/10.1007/s00254-006-0491-y>

- Leite-Filho, A. T., Costa, M. H., & Fu, R. (2020). The southern Amazon rainy season: The role of deforestation and its interactions with large-scale mechanisms. *International Journal of Climatology*, 40(4), 2328–2341. <https://doi.org/10.1002/joc.6335>
- Lertsakdadet, B. S., Kennedy, G. T., Stone, R., Kowalczewski, C., Kowalczewski, A. C., Natesan, S., Christy, R. J., Durkin, A. J., & Choi, B. (2022). Assessing multimodal optical imaging of perfusion in burn wounds. *Burns*, 48(4), 799–807. <https://doi.org/10.1016/j.burns.2021.08.026>
- Levin, N., Yebra, M., & Phinn, S. (2021). Unveiling the Factors Responsible for Australia's Black Summer Fires of 2019/2020. *Fire*, 4(3), 58. <https://doi.org/10.3390/fire4030058>
- Li, Maolin. (2021). Dynamic monitoring algorithm of natural resources in scenic spots based on modis remote sensing technology. *Earth Sciences Research Journal*, 25(1), 57–64. <https://doi.org/10.15446/esrj.v25n1.93869>
- Li, Miao, Zang, S., Zhang, B., Li, S., & Wu, C. (2014). A review of remote sensing image classification techniques: The role of Spatio-contextual information. *European Journal of Remote Sensing*, 47(1), 389–411. <https://doi.org/10.5721/EuJRS20144723>
- Li, Xinghua, Li, Z., Feng, R., Luo, S., Zhang, C., Jiang, M., & Shen, H. (2020). Generating high-quality and high-resolution seamless satellite imagery for large-scale urban regions. *Remote Sensing*, 12(1). <https://doi.org/10.3390/RS12010081>
- Li, Xuecao, Zhou, Y., Gong, P., Seto, K. C., & Clinton, N. (2020). Developing a method to estimate building height from Sentinel-1 data. *Remote Sensing of Environment*, 240, 111705. <https://doi.org/10.1016/j.rse.2020.111705>
- Liao H W, L. C. T. . (2022). Landslides triggered by the Chi-Chi earthquake. *Proceedings of the 21st Asian Conference on Remote Sensing*, 1–7.

- Liu, J., Heiskanen, J., Maeda, E. E., & Pellikka, P. K. E. (2018). Burned area detection based on Landsat time series in savannas of southern Burkina Faso. *International Journal of Applied Earth Observation and Geoinformation*, 64, 210–220. <https://doi.org/10.1016/j.jag.2017.09.011>
- Lohberger, S., Stängel, M., Atwood, E. C., & Siegert, F. (2018). Spatial evaluation of Indonesia's 2015 fire-affected area and estimated carbon emissions using Sentinel-1. *Global Change Biology*, 24(2), 644–654. <https://doi.org/10.1111/gcb.13841>
- Lu, P., Qin, Y., Li, Z., Mondini, A. C., & Casagli, N. (2019). Landslide mapping from multi-sensor data through improved change detection-based Markov random field. *Remote Sensing of Environment*, 231, 111235. <https://doi.org/10.1016/j.rse.2019.111235>
- Main, R., Mathieu, R., Kleynhans, W., Wessels, K., Naidoo, L., & Asner, G. P. (2016). Hyper-temporal C-band SAR for baseline woody structural assessments in deciduous savannas. *Remote Sensing*, 8(8), 661. <https://doi.org/10.3390/rs8080661>
- Malenovský, Z., Rott, H., Cihlar, J., Schaepman, M. E., García-Santos, G., Fernandes, R., & Berger, M. (2012). Sentinels for science: Potential of Sentinel-1, -2, and -3 missions for scientific observations of ocean, cryosphere, and land. *Remote Sensing of Environment*, 120, 91–101. <https://doi.org/10.1016/j.rse.2011.09.026>
- Marc, O., Meunier, P., & Hovius, N. (2017). Prediction of the area affected by earthquake-induced landsliding based on seismological parameters. *Natural Hazards and Earth System Sciences*, 17(7), 1159–1175. <https://doi.org/10.5194/nhess-17-1159-2017>
- Massey, C. I., Townsend, D. T., Lukovic, B., Morgenstern, R., Jones, K., Rosser, B., & de Vilder, S. (2020). Landslides triggered by the MW7.8 14 November

- 2016 Kaikōura earthquake: an update. *Landslides*, 17(10), 2401–2408.  
<https://doi.org/10.1007/s10346-020-01439-x>
- Melo, V. F., Barros, L. S., Silva, M. C. S., Veloso, T. G. R., Senwo, Z. N., Matos, K. S., & Nunes, T. K. O. (2021). Soil bacterial diversities and response to deforestation, land use and burning in North Amazon, Brazil. *Applied Soil Ecology*, 158, 103775. <https://doi.org/10.1016/j.apsoil.2020.103775>
- Meng, R., Wu, J., Zhao, F., Cook, B. D., Hanavan, R. P., & Serbin, S. P. (2018). Measuring short-term post-fire forest recovery across a burn severity gradient in a mixed pine-oak forest using multi-sensor remote sensing techniques. *Remote Sensing of Environment*, 210, 282–296.  
<https://doi.org/10.1016/j.rse.2018.03.019>
- Menges, C. H., Bartolo, R. E., Bell, D., & Hill, G. J. E. (2004). The effect of savanna fires on SAR backscatter in northern Australia. *International Journal of Remote Sensing*, 25(22), 4857–4871.  
<https://doi.org/10.1080/01431160410001712945>
- Mondini, A. C., Guzzetti, F., Reichenbach, P., Rossi, M., Cardinali, M., & Ardizzone, F. (2011). Semi-automatic recognition and mapping of rainfall induced shallow landslides using optical satellite images. *Remote Sensing of Environment*, 115(7), 1743–1757. <https://doi.org/10.1016/j.rse.2011.03.006>
- Mondini, A., Santangelo, M., Rocchetti, M., Rossetto, E., Manconi, A., & Monserrat, O. (2019). Sentinel-1 SAR Amplitude Imagery for Rapid Landslide Detection. *Remote Sensing*, 11(7), 760.  
<https://doi.org/10.3390/rs11070760>
- Mondini, Alessandro C., Marchesini, I., Rossi, M., Chang, K. T., Pasquariello, G., & Guzzetti, F. (2013). Bayesian framework for mapping and classifying shallow landslides exploiting remote sensing and topographic data. *Geomorphology*, 201, 135–147.

<https://doi.org/10.1016/j.geomorph.2013.06.015>

Mouillot, F., Schultz, M. G., Yue, C., Cadule, P., Tansey, K., Ciais, P., & Chuvieco, E. (2014). Ten years of global burned area products from spaceborne remote sensing-A review: Analysis of user needs and recommendations for future developments. In *International Journal of Applied Earth Observation and Geoinformation* (Vol. 26, Issue 1, pp. 64–79).  
<https://doi.org/10.1016/j.jag.2013.05.014>

Murphy, K. A., Reynolds, J. H., & Koltun, J. M. (2008). Evaluating the ability of the differenced Normalized Burn Ratio (dNBR) to predict ecologically significant burn severity in Alaskan boreal forests. *International Journal of Wildland Fire*, 17(4), 490. <https://doi.org/10.1071/WF08050>

Nandi, A., & Shakoor, A. (2010). A GIS-based landslide susceptibility evaluation using bivariate and multivariate statistical analyses. *Engineering Geology*, 110(1–2), 11–20. <https://doi.org/10.1016/j.enggeo.2009.10.001>

Nasirzadehdizaji, R., Balik Sanli, F., Abdikan, S., Cakir, Z., Sekertekin, A., & Ustuner, M. (2019). Sensitivity Analysis of Multi-Temporal Sentinel-1 SAR Parameters to Crop Height and Canopy Coverage. *Applied Sciences*, 9(4), 655. <https://doi.org/10.3390/app9040655>

Navarro, G., Caballero, I., Silva, G., Parra, P.-C., Vázquez, Á., & Caldeira, R. (2017). Evaluation of forest fire on Madeira Island using Sentinel-2A MSI imagery. *International Journal of Applied Earth Observation and Geoinformation*, 58, 97–106. <https://doi.org/10.1016/j.jag.2017.02.003>

Nesha, M. K., Hussin, Y. A., van Leeuwen, L. M., & Sulistioadi, Y. B. (2020). Modeling and mapping aboveground biomass of the restored mangroves using ALOS-2 PALSAR-2 in East Kalimantan, Indonesia. *International Journal of Applied Earth Observation and Geoinformation*, 91(May), 102158. <https://doi.org/10.1016/j.jag.2020.102158>

- Nicolau, A. P., Flores-Anderson, A., Griffin, R., Herndon, K., & Meyer, F. J. (2021). Assessing SAR C-band data to effectively distinguish modified land uses in a heavily disturbed Amazon forest. *International Journal of Applied Earth Observation and Geoinformation*, 94, 102214. <https://doi.org/10.1016/j.jag.2020.102214>
- Nkwunonwo, U. C., Whitworth, M., & Baily, B. (2020). A review of the current status of flood modelling for urban flood risk management in the developing countries. In *Scientific African* (Vol. 7, p. e00269). Elsevier B.V. <https://doi.org/10.1016/j.sciaf.2020.e00269>
- Nugroho, F. S., Danoedoro, P., Arjasakusuma, S., Candra, D. S., Bayanuddin, A. A., Jatmiko, R. H., & Wicaksono, P. (2023). The utilization of multi-sensor remote sensing and cloud-computing platform for mapping burned areas. *AIP Conference Proceedings 2654, PROCEEDINGS OF THE 7TH INTERNATIONAL CONFERENCE ON SCIENCE AND TECHNOLOGY*, 050005. <https://doi.org/10.1063/5.0114317>
- Nugroho, F. S., Danoedoro, P., Arjasakusuma, S., Candra, D. S., Bayanuddin, A. A., & Samodra, G. (2021). Assessment of Sentinel-1 and Sentinel-2 Data for Landslides Identification using Google Earth Engine. *2021 7th Asia-Pacific Conference on Synthetic Aperture Radar (APSAR)*, 1–6. <https://doi.org/10.1109/APSAR52370.2021.9688356>
- Olofsson, P., Foody, G. M., Herold, M., Stehman, S. V., Woodcock, C. E., & Wulder, M. A. (2014). Good practices for estimating area and assessing accuracy of land change. *Remote Sensing of Environment*, 148, 42–57. <https://doi.org/10.1016/j.rse.2014.02.015>
- Osmanoğlu, B., Sunar, F., Wdowinski, S., & Cabral-Cano, E. (2016). Time series analysis of InSAR data: Methods and trends. In *ISPRS Journal of Photogrammetry and Remote Sensing* (Vol. 115, pp. 90–102). <https://doi.org/10.1016/j.isprsjprs.2015.10.003>

- Padilla, M., Stehman, S. V., Ramo, R., Corti, D., Hantson, S., Oliva, P., Alonso-Canas, I., Bradley, A. V., Tansey, K., Mota, B., Pereira, J. M., & Chuvieco, E. (2015). Comparing the accuracies of remote sensing global burned area products using stratified random sampling and estimation. *Remote Sensing of Environment*, 160, 114–121. <https://doi.org/10.1016/j.rse.2015.01.005>
- Page, S. E., Siegert, F., Rieley, J. O., Boehm, H. D. V., Jaya, A., & Limin, S. (2002). The amount of carbon released from peat and forest fires in Indonesia during 1997. *Nature*, 420(6911), 61–65. <https://doi.org/10.1038/nature01131>
- Parks, S., Dillon, G., & Miller, C. (2014). A New Metric for Quantifying Burn Severity: The Relativized Burn Ratio. *Remote Sensing*, 6(3), 1827–1844. <https://doi.org/10.3390/rs6031827>
- Philipp, M. B., & Levick, S. R. (2019). Exploring the Potential of C-Band SAR in Contributing to Burn Severity Mapping in Tropical Savanna. *Remote Sensing*, 12(1), 49. <https://doi.org/10.3390/rs12010049>
- Prasetyo, L. B., Dharmawan, A. H., Nasdian, F. T., & Ramdhoni, S. (2016). Historical Forest fire Occurrence Analysis in Jambi Province During the Period of 2000 – 2015: Its Distribution & Land Cover Trajectories. *Procedia Environmental Sciences*, 33, 450–459. <https://doi.org/10.1016/j.proenv.2016.03.096>
- Priyono, K. D., Saifuddin, A., Nugroho, F. S., & Jumadi, J. (2022). Identification Of Mangrove Changes In The Mahakam Delta In 2007-2017 Using Alos/Palsar And Landsat. *International Journal of GEOMATE*, 23(96). <https://doi.org/10.21660/2022.96.3312>
- Quegan, S., Le Toan, T., Yu, J. J., Ribbes, F., & Floury, N. (2000). Multitemporal ERS SAR analysis applied to forest mapping. *IEEE Transactions on Geoscience and Remote Sensing*, 38(2), 741–753. <https://doi.org/10.1109/36.842003>

- Radoux, J., Chomé, G., Jacques, D. C., Waldner, F., Bellemans, N., Matton, N., Lamarche, C., D'Andrimont, R., & Defourny, P. (2016). Sentinel-2's potential for sub-pixel landscape feature detection. *Remote Sensing*, 8(6), 488. <https://doi.org/10.3390/rs8060488>
- Rignot, E. J. M., & Zyl, J. J. va. (1993). Change Detection Techniques for ERS-1 SAR Data. *IEEE Transactions on Geoscience and Remote Sensing*, 31(4), 896–906. <https://doi.org/10.1109/36.239913>
- Roback, K., Clark, M. K., West, A. J., Zekkos, D., Li, G., Gallen, S. F., Chamlagain, D., & Godt, J. W. (2018). The size, distribution, and mobility of landslides caused by the 2015 Mw7.8 Gorkha earthquake, Nepal. *Geomorphology*, 301, 121–138. <https://doi.org/10.1016/j.geomorph.2017.01.030>
- Robinson, T. R., Rosser, N., & Walters, R. J. (2019). The Spatial and Temporal Influence of Cloud Cover on Satellite-Based Emergency Mapping of Earthquake Disasters. *Scientific Reports*, 9(1), 12455. <https://doi.org/10.1038/s41598-019-49008-0>
- Roering, J. J., Stimely, L. L., Mackey, B. H., & Schmidt, D. A. (2009). Using DInSAR, airborne LiDAR, and archival air photos to quantify landsliding and sediment transport. *Geophysical Research Letters*, 36(19), L19402. <https://doi.org/10.1029/2009GL040374>
- Samodra, G., Ngadisih, N., Malawani, M. N., Mardiatno, D., Cahyadi, A., & Nugroho, F. S. (2020). Frequency–magnitude of landslides affected by the 27–29 November 2017 Tropical Cyclone Cempaka in Pacitan, East Java. *Journal of Mountain Science*, 17(4), 773–786. <https://doi.org/10.1007/s11629-019-5734-y>
- Santos, A. M. dos, Silva, C. F. A. da, Rudke, A. P., & Oliveira Soares, D. de. (2021). Dynamics of active fire data and their relationship with fires in the areas of regularized indigenous lands in the Southern Amazon. *Remote Sensing*

*Applications: Society and Environment*, 23, 100570.  
<https://doi.org/10.1016/j.rsase.2021.100570>

Santoso, A. W., Pebrianti, D., Bayuaji, L., & Zain, J. M. (2015). Performance of various speckle reduction filters on Synthetic Aperture Radar image. *2015 4th International Conference on Software Engineering and Computer Systems (ICSECS)*, 11–14. <https://doi.org/10.1109/ICSECS.2015.7333103>

Schlögel, R., Doubre, C., Malet, J. P., & Masson, F. (2015). Landslide deformation monitoring with ALOS/PALSAR imagery: A D-InSAR geomorphological interpretation method. *Geomorphology*, 231, 314–330.  
<https://doi.org/10.1016/j.geomorph.2014.11.031>

Scholz, U. (1983). The natural regions of Sumatra and their agricultural production pattern : a regional analysis. *Central Research Institute for Food Crops*.

Seydi, S. T., Hasanlou, M., & Chanussot, J. (2021). DSMNN-Net: A Deep Siamese Morphological Neural Network Model for Burned Area Mapping Using Multispectral Sentinel-2 and Hyperspectral PRISMA Images. *Remote Sensing*, 13(24), 5138. <https://doi.org/10.3390/rs13245138>

Shahabi, H., & Hashim, M. (2015). Landslide susceptibility mapping using GIS-based statistical models and Remote sensing data in tropical environment. *Scientific Reports*, 5(1), 9899. <https://doi.org/10.1038/srep09899>

Shirvani, Z., Abdi, O., & Buchroithner, M. (2019). A Synergetic analysis of Sentinel-1 and -2 for mapping historical landslides using object-oriented random forest in the Hyrcanian forests. *Remote Sensing*, 11(19), 2300. <https://doi.org/10.3390/rs11192300>

Siegert, F., & Ruecker, G. (2000). Use of multitemporal ERS-2 SAR images for identification of burned scars in south-east Asian tropical rainforest. *International Journal of Remote Sensing*, 21(4), 831–837. <https://doi.org/10.1080/014311600210632>

- Siebert, F., Ruecker, G., Hinrichs, A., & Hoffmann, A. A. (2001). Increased damage from fires in logged forests during droughts caused by El Niño. *Nature*, 414(6862), 437–440. <https://doi.org/10.1038/35106547>
- Siebert, Florian, & Hoffmann, A. A. (2000). The 1998 forest fires in East Kalimantan (Indonesia): A quantitative evaluation using high resolution, multitemporal ERS-2 SAR images and NOAA-AVHRR hotspot data. *Remote Sensing of Environment*, 72(1), 64–77. [https://doi.org/10.1016/S0034-4257\(99\)00092-9](https://doi.org/10.1016/S0034-4257(99)00092-9)
- Silalahi, F. E. S., Pamela, Arifianti, Y., & Hidayat, F. (2019). Landslide susceptibility assessment using frequency ratio model in Bogor, West Java, Indonesia. *Geoscience Letters*, 6(1), 10. <https://doi.org/10.1186/s40562-019-0140-4>
- Stevens, L. E., Schenk, E. R., & Springer, A. E. (2021). Springs ecosystem classification. *Ecological Applications*, 31(1). <https://doi.org/10.1002/eap.2218>
- Stickler, C. M., Nepstad, D. C., Coe, M. T., McGrath, D. G., Rodrigues, H. O., Walker, W. S., Soares-Filho, B. S., & Davidson, E. A. (2009). The potential ecological costs and cobenefits of REDD: A critical review and case study from the Amazon region. *Global Change Biology*, 15(12), 2803–2824. <https://doi.org/10.1111/j.1365-2486.2009.02109.x>
- Stroppiana, D., Azar, R., Calò, F., Pepe, A., Imperatore, P., Boschetti, M., Silva, J., Brivio, P., & Lanari, R. (2015). Integration of Optical and SAR Data for Burned Area Mapping in Mediterranean Regions. *Remote Sensing*, 7(2), 1320–1345. <https://doi.org/10.3390/rs70201320>
- Stumpf, A., & Kerle, N. (2011). Object-oriented mapping of landslides using Random Forests. *Remote Sensing of Environment*, 115(10), 2564–2577. <https://doi.org/10.1016/j.rse.2011.05.013>

- Syifa, M., Kadavi, P. R., & Lee, C. W. (2019). An artificial intelligence application for post-earthquake damage mapping in Palu, central Sulawesi, Indonesia. *Sensors (Switzerland)*, 19(3), 542. <https://doi.org/10.3390/s19030542>
- Syifa, M., Kadavi, P. R., Lee, C. W., & Pradhan, B. (2020). Landsat images and artificial intelligence techniques used to map volcanic ashfall and pyroclastic material following the eruption of Mount Agung, Indonesia. *Arabian Journal of Geosciences*, 13(3), 133. <https://doi.org/10.1007/s12517-020-5060-2>
- Tanase, M. A., Kennedy, R., & Aponte, C. (2015). Fire severity estimation from space: a comparison of active and passive sensors and their synergy for different forest types. *International Journal of Wildland Fire*, 24(8), 1062. <https://doi.org/10.1071/WF15059>
- Tanase, M.A., Kennedy, R., & Aponte, C. (2015). Radar Burn Ratio for fire severity estimation at canopy level: An example for temperate forests. *Remote Sensing of Environment*, 170, 14–31. <https://doi.org/10.1016/j.rse.2015.08.025>
- Tanase, Mihai A., Belenguer-Plomer, M. A., Roteta, E., Bastarrika, A., Wheeler, J., Fernández-Carrillo, Á., Tansey, K., Wiedemann, W., Navratil, P., Lohberger, S., Siegert, F., & Chuvieco, E. (2020). Burned area detection and mapping: Intercomparison of Sentinel-1 and Sentinel-2 based algorithms over tropical Africa. *Remote Sensing*, 12(2), 334. <https://doi.org/10.3390/rs12020334>
- Tanase, Mihai A., Santoro, M., Aponte, C., & De La Riva, J. (2014). Polarimetric properties of burned forest areas at C- and L-band. *IEEE Journal of Selected Topics in Applied Earth Observations and Remote Sensing*, 7(1), 267–276. <https://doi.org/10.1109/JSTARS.2013.2261053>
- Tariq, A., Shu, H., Li, Q., Altan, O., Khan, M. R., Baqa, M. F., & Lu, L. (2021). Quantitative Analysis of Forest Fires in Southeastern Australia Using SAR Data. *Remote Sensing*, 13(12), 2386. <https://doi.org/10.3390/rs13122386>
- Tay, C. W. J., Yun, S. H., Chin, S. T., Bhardwaj, A., Jung, J., & Hill, E. M. (2020).

Rapid flood and damage mapping using synthetic aperture radar in response to Typhoon Hagibis, Japan. *Scientific Data*, 7(1), 100. <https://doi.org/10.1038/s41597-020-0443-5>

Taylor, F. E., Malamud, B. D., Freeborough, K., & Demeritt, D. (2015). Enriching Great Britain's National Landslide Database by searching newspaper archives. *Geomorphology*, 249, 52–68. <https://doi.org/10.1016/j.geomorph.2015.05.019>

Tzouvaras, M., Danezis, C., & Hadjimitsis, D. G. (2020). Small Scale Landslide Detection Using Sentinel-1 Interferometric SAR Coherence. *Remote Sensing*, 12(10), 1560. <https://doi.org/10.3390/rs12101560>

Ulaby, F. T., Sarabandi, K., McDonald, K., Whitt, M., & Craig Dobson, M. (1990). Michigan microwave canopy scattering model. *International Journal of Remote Sensing*, 11(7), 1223–1253. <https://doi.org/10.1080/01431169008955090>

Umar, Z., Pradhan, B., Ahmad, A., Jebur, M. N., & Tehrany, M. S. (2014). Earthquake induced landslide susceptibility mapping using an integrated ensemble frequency ratio and logistic regression models in West Sumatera Province, Indonesia. *Catena*, 118, 124–135. <https://doi.org/10.1016/j.catena.2014.02.005>

Van Den Eeckhaut, M., & Hervás, J. (2012). State of the art of national landslide databases in Europe and their potential for assessing landslide susceptibility, hazard and risk. *Geomorphology*, 139–140, 545–558. <https://doi.org/10.1016/j.geomorph.2011.12.006>

Verhegghen, A., Eva, H., Ceccherini, G., Achard, F., Gond, V., Gourlet-Fleury, S., & Cerutti, P. (2016). The Potential of Sentinel Satellites for Burnt Area Mapping and Monitoring in the Congo Basin Forests. *Remote Sensing*, 8(12), 986. <https://doi.org/10.3390/rs8120986>

- Vetrita, Y., & Cochrane, M. A. (2020). Fire frequency and related land-use and land-cover changes in Indonesia's Peatlands. *Remote Sensing*, 12(1), 5. <https://doi.org/10.3390/RS12010005>
- Viedma, O., Chico, F., Fernández, J. J., Madrigal, C., Safford, H. D., & Moreno, J. M. (2020). Disentangling the role of prefire vegetation vs. burning conditions on fire severity in a large forest fire in SE Spain. *Remote Sensing of Environment*, 247, 111891. <https://doi.org/10.1016/j.rse.2020.111891>
- Voight, B., Constantine, E. K., Siswowidjoyo, S., & Torley, R. (2000). Historical eruptions of Merapi Volcano, Central Java, Indonesia, 1768-1998. *Journal of Volcanology and Geothermal Research*, 100(1-4), 69-138. [https://doi.org/10.1016/S0377-0273\(00\)00134-7](https://doi.org/10.1016/S0377-0273(00)00134-7)
- Wang, G., Joyce, J., Phillips, D., Shrestha, R., & Carter, W. (2013). Delineating and defining the boundaries of an active landslide in the rainforest of Puerto Rico using a combination of airborne and terrestrial LIDAR data. *Landslides*, 10(4), 503-513. <https://doi.org/10.1007/s10346-013-0400-x>
- Wang, Jiajun, He, Z., & Weng, W. (2020). A review of the research into the relations between hazards in multi-hazard risk analysis. *Natural Hazards*, 104(3), 2003-2026. <https://doi.org/10.1007/s11069-020-04259-3>
- Wang, Jian, & Peng, X. (2009). GIS-based landslide hazard zonation model and its application. *Procedia Earth and Planetary Science*, 1(1), 1198-1204. <https://doi.org/10.1016/j.proeps.2009.09.184>
- Westen, C. Van. (2000). Remote sensing for natural disaster management. *International Archives of the Photogrammetry, Remote Sensing and Spatial Information Sciences - ISPRS Archives*, 33, 1609-1617.
- Whelley, P. L., Newhall, C. G., & Bradley, K. E. (2015). The frequency of explosive volcanic eruptions in Southeast Asia. *Bulletin of Volcanology*, 77(1), 1. <https://doi.org/10.1007/s00445-014-0893-8>

- Williams, J. G., Rosser, N. J., Kinsey, M. E., Benjamin, J., Oven, K. J., Densmore, A. L., Milledge, D. G., Robinson, T. R., Jordan, C. A., & Dijkstra, T. A. (2018). Satellite-based emergency mapping using optical imagery: Experience and reflections from the 2015 Nepal earthquakes. *Natural Hazards and Earth System Sciences*, 18(1), 185–205. <https://doi.org/10.5194/nhess-18-185-2018>
- Wösten, J. H. M., Van Den Berg, J., Van Eijk, P., Gevers, G. J. M., Giesen, W. B. J. T., Hooijer, A., Idris, A., Leenman, P. H., Rais, D. S., Siderius, C., Silvius, M. J., Suryadiputra, N., & Wibisono, I. T. (2006). Interrelationships between Hydrology and Ecology in Fire Degraded Tropical Peat Swamp Forests. *International Journal of Water Resources Development*, 22(1), 157–174. <https://doi.org/10.1080/07900620500405973>
- Yun, S. H., Hudnut, K., Owen, S., Webb, F., Simons, M., Sacco, P., Gurrola, E., Manipon, G., Liang, C., Fielding, E., Milillo, P., Hua, H., & Coletta, A. (2015). Rapid damage mapping for the 2015 Mw 7.8 Gorkha Earthquake Using synthetic aperture radar data from COSMO-SkyMed and ALOS-2 satellites. *Seismological Research Letters*, 86(6), 1549–1556. <https://doi.org/10.1785/0220150152>
- Zhong, C., Liu, Y., Gao, P., Chen, W., Li, H., Hou, Y., Nuremanguli, T., & Ma, H. (2020). Landslide mapping with remote sensing: challenges and opportunities. *International Journal of Remote Sensing*, 41(4), 1555–1581. <https://doi.org/10.1080/01431161.2019.1672904>
- Zhong, C., Wang, C., Li, H., Chen, W., & Hou, Y. (2018). Mapping Inter-Annual Land Cover Variations Automatically Based on a Novel Sample Transfer Method. *Remote Sensing*, 10(9), 1457. <https://doi.org/10.3390/rs10091457>
- Zhou, S., & Fang, L. (2015). Support vector machine modeling of earthquake-induced landslides susceptibility in central part of Sichuan province, China. *Geoenvironmental Disasters*, 2(1), 2. <https://doi.org/10.1186/s40677-014-0006-1>