Marc-Henri Derron

List of Publications by Year
in descending order

63 papers	2,392 citations	346980 22 h-index	242451 47 g-index
96 all docs	96 docs citations	96 times ranked	2843 citing authors

#	Article	IF	Citations
1	Evaluation of InfraRed Thermography Supported by UAV and Field Surveys for Rock Mass Characterization in Complex Settings. Geosciences (Switzerland), 2022, 12, 116.	1.0	6
2	Remote thermal detection of exfoliation sheet deformation. Landslides, 2021, 18, 865-879.	2.7	12
3	MATLAB Virtual Toolbox for Retrospective Rockfall Source Detection and Volume Estimation Using 3D Point Clouds: A Case Study of a Subalpine Molasse Cliff. Geosciences (Switzerland), 2021, 11, 75.	1.0	5
4	The Rockfall Failure Hazard Assessment: Summary and New Advances. ICL Contribution To Landslide Disaster Risk Reduction, 2021, , 55-83.	0.3	1
5	QDC-2D: A Semi-Automatic Tool for 2D Analysis of Discontinuities for Rock Mass Characterization. Remote Sensing, 2021, 13, 5086.	1.8	3
6	Comparison of Remote Sensing Techniques for Geostructural Analysis and Cliff Monitoring in Coastal Areas of High Tourist Attraction: The Case Study of Polignano a Mare (Southern Italy). Remote Sensing, 2021, 13, 5045.	1.8	10
7	A review of methods used to estimate initial landslide failure surface depths and volumes. Engineering Geology, 2020, 267, 105478.	2.9	72
8	A method to assess the probability of thickness and volume estimates of small and shallow initial landslide ruptures based on surface area. Landslides, 2020, 17, 975-982.	2.7	11
9	Quantifying 40 years of rockfall activity in Yosemite Valley with historical Structure-from-Motion photogrammetry and terrestrial laser scanning. Geomorphology, 2020, 356, 107069.	1.1	32
10	Landslide analysis using laser scanners. Developments in Earth Surface Processes, 2020, 23, 207-230.	2.8	16
11	Dense point cloud acquisition with a low-cost Velodyne VLP-16. Geoscientific Instrumentation, Methods and Data Systems, 2020, 9, 385-396.	0.6	7
12	Detection of rock bridges by infrared thermal imaging and modeling. Scientific Reports, 2019, 9, 13138.	1.6	46
13	Testing a failure surface prediction and deposit reconstruction method for a landslide cluster that occurred during Typhoon Talas (Japan). Earth Surface Dynamics, 2019, 7, 439-458.	1.0	16
14	Assessment of the Potential Pollution of the Abidjan Unconfined Aquifer by Hydrocarbons. Geosciences (Switzerland), 2019, 9, 60.	1.0	3
15	Land use changes, landslides and roads in the Phewa Watershed, Western Nepal from 1979 to 2016. Applied Geography, 2018, 94, 30-40.	1.7	32
16	Pros and Cons of Structure for Motion Embarked on a Vehicle to Survey Slopes along Transportation Lines Using 3D Georeferenced and Coloured Point Clouds. Remote Sensing, 2018, 10, 1732.	1.8	5
17	Natural hazard events affecting transportation networks in Switzerland from 2012 to 2016. Natural Hazards and Earth System Sciences, 2018, 18, 2093-2109.	1.5	19
18	Evaporite sinkhole risk for a building portfolio. Environmental Earth Sciences, 2017, 76, 1.	1.3	0

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19	Evidence of rock slope breathing using ground-based InSAR. Geomorphology, 2017, 289, 152-169.	1.1	24
20	Virtual Geoscience Conference 2016: where geomatics meets geoscience. Photogrammetric Record, 2017, 32, 346-349.	0.4	6
21	Using street view imagery for 3-D survey of rock slope failures. Natural Hazards and Earth System Sciences, 2017, 17, 2093-2107.	1.5	9
22	Brief communication: 3-D reconstruction of a collapsed rock pillar from Web-retrieved images and terrestrial lidar data â€“ the 2005 event of the west face of the Drus (Mont Blanc massif). Natural Hazards and Earth System Sciences, 2017, 17, 1207-1220.	1.5	15
23	An offlineâ€"online Web-GIS Android application for fast data acquisition of landslide hazard and risk. Natural Hazards and Earth System Sciences, 2017, 17, 549-561.	1.5	17
24	An interactive web-GIS tool for risk analysis: a case study in the Fella River basin, Italy. Natural Hazards and Earth System Sciences, 2016, 16, 85-101.	1.5	21
25	â€œUse of 3D Point Clouds in Geohazardsâ€•Special Issue: Current Challenges and Future Trends. Remote Sensing, 2016, 8, 130.	1.8	62
26	Rural earthen roads impact assessment in Phewa watershed, Western region, Nepal. Geoenvironmental Disasters, 2016, 3, .	1.8	9
27	Evaluation of an open-source collaborative web-GIS prototype in risk management with students. Spatial Information Research, 2016, 24, 169-179.	1.3	0
28	Use of targets to track 3D displacements in highly vegetated areas affected by landslides. Landslides, 2016, 13, 821-831.	2.7	14
29	Correction of terrestrial LiDAR intensity channel using Orenâ€"Nayar reflectance model: An application to lithological differentiation. ISPRS Journal of Photogrammetry and Remote Sensing, 2016, 113, 17-29.	4.9	58
30	A collaborative (web-GIS) framework based on empirical data collected from three case studies in Europe for risk management of hydro-meteorological hazards. International Journal of Disaster Risk Reduction, 2016, 15, 10-23.	1.8	26
31	Large slope deformations detection and monitoring along shores of the Potrerillos dam reservoir, Argentina, based on a small-baseline InSAR approach. Landslides, 2016, 13, 451-465.	2.7	28
32	Common problems encountered in 3D mapping of geological contacts using high-resolution terrain and image data. European Journal of Remote Sensing, 2015, 48, 661-672.	1.7	5
33	Geological mapping and fold modeling using Terrestrial Laser Scanning point clouds: application to the Dents-du-Midi limestone massif (Switzerland). European Journal of Remote Sensing, 2015, 48, 569-591.	1.7	15
34	Introduction to Vertical Geology thematic issue. European Journal of Remote Sensing, 2015, 48, 479-487.	1.7	5
35	Prototype of a Web-based Participative Decision Support Platform in Natural Hazards and Risk Management. ISPRS International Journal of Geo-Information, 2015, 4, 1201-1224.	1.4	18
36	Landslide detection and monitoring capability of boat-based mobile laser scanning along Dieppe coastal cliffs, Normandy. Landslides, 2015, 12, 403-418.	2.7	46

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37	Impacts of fracturing patterns on the rockfall susceptibility and erosion rate of stratified limestone. Geomorphology, 2015, 241, 83-97.	1.1	16
38	Analyses of past and present rock slope instabilities in a fjord valley: Implications for hazard estimations. Geomorphology, 2015, 248, 464-474.	1.1	37
39	Slope Instability Detection Along the National 7 and the Potrerillos Dam Reservoir, Argentina, Using the Small-Baseline InSAR Technique. , 2015, , 295-299.		2
40	Velocity Prediction on Time-Variant Landslides Using Moving Response Functions: Application to La Barmasse Rockslide (Valais, Switzerland). , 2015, , 323-327.		4
41	Automatic Rockfalls Volume Estimation Based on Terrestrial Laser Scanning Data. , 2015, , 425-428.		13
42	Arctic–alpine blockfields in the northern Swedish Scandes: late Quaternary – not Neogene. Earth Surface Dynamics, 2014, 2, 383-401.	1.0	17
43	From deep seated slope deformation to rock avalanche: Destabilization and transportation models of the Sierre landslide (Switzerland). Tectonophysics, 2013, 605, 149-168.	0.9	39
44	Analyzing complex rock slope deformation at Stampa, western Norway, by integrating geomorphology, kinematics and numerical modeling. Engineering Geology, 2013, 154, 116-130.	2.9	36
45	Analysis of past and future dam formation and failure in the Santa Cruz River (San Juan province,) Tj ETQq1 1 0.784314 rgBT /Overloc	1.1	16
46	Experiences from site-specific landslide early warning systems. Natural Hazards and Earth System Sciences, 2013, 13, 2659-2673.	1.5	86
47	Monitoring Natural Hazards. Encyclopedia of Earth Sciences Series, 2013, , 686-696.	0.1	2
48	Dynamic risk simulation to assess natural hazards risk along roads. Natural Hazards and Earth System Sciences, 2013, 13, 2763-2777.	1.5	13
49	The 2006 Eiger rockslide, European Alps. , 2012, , 282-296.		9
50	A case study of coping strategies and landslides in two villages of Central-Eastern Nepal. Applied Geography, 2012, 32, 680-690.	1.7	52
51	Rockfall hazard and risk assessments along roads at a regional scale: example in Swiss Alps. Natural Hazards and Earth System Sciences, 2012, 12, 615-629.	1.5	113
52	Use of LIDAR in landslide investigations: a review. Natural Hazards, 2012, 61, 5-28.	1.6	789
53	Detailed DEM analysis of a rockslide scar to characterize the basal sliding surface of active rockslides. Journal of Geophysical Research, 2011, 116, .	3.3	41
54	Complex landslide behaviour and structural control: a three-dimensional conceptual model of Åknes rockslide, Norway. Geological Society Special Publication, 2011, 351, 147-161.	0.8	19

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55	Statistical analysis of seasonal displacements at the Nordnes rockslide, northern Norway. Engineering Geology, 2010, 114, 228-237.	2.9	20
56	Preface "LIDAR and DEM techniques for landslides monitoring and characterization". Natural Hazards and Earth System Sciences, 2010, 10, 1877-1879.	1.5	60
57	Characterization and monitoring of the Ã…knes rockslide using terrestrial laser scanning. Natural Hazards and Earth System Sciences, 2009, 9, 1003-1019.	1.5	198
58	Weathering processes and Quaternary origin of an alpine blockfield in Arctic Sweden. Boreas, 2009, 38, 379-398.	1.2	30
59	The Goli dâ€™Aget Member: Early Permian volcanoclastic and volcanic rocks within the BrianÃ§onnais Grand St-Bernard Nappe (Valais, Switzerland). Eclogae Geologicae Helveticae, 2006, 99, 301-307.	0.6	3
60	Preliminary assessment of rockslide and rockfall hazards using a DEM (Oppstadhornet, Norway). Natural Hazards and Earth System Sciences, 2005, 5, 285-292.	1.5	39
61	Note on seismic hazard assessment using gradient of uplift velocities in the Turan block (Central) Tj ETQq1 1 0.784314 rgBT /Overloc	1.5	3
62	The 500 Ma-old Thy on metagranite: a new A-type granite occurrence in the western Penninic Alps (Wallis, Switzerland). European Journal of Mineralogy, 1996, 8, 565-576.	0.4	25
63	Definition and mapping of potential rockfall source and propagation areas at a regional scale in Basilicata region (Southern Italy). Rendiconti Online Societa Geologica Italiana, 0, 41, 175-178.	0.3	5