Sabine Sauvage

List of Publications by Year
in descending order

105 papers	2,891 citations	172457 29 h-index	214800 47 g-index
114 all docs	114 docs citations	114 times ranked	3480 citing authors

#	Article	IF	Citations
1	Density Effect of Eisenia sp. Epigeic Earthworms on the Hydraulic Conductivity of Sand Filters for Wastewater Treatment. Water (Switzerland), 2022, 14, 1048.	2.7	5
2	SWATLitho: A hydrogeochemical model to estimate daily geochemical loads at the catchment scale. Environmental Modelling and Software, 2021, 135, 104893.	4.5	2
3	Denitrification in wetlands: A review towards a quantification at global scale. Science of the Total Environment, 2021, 754, 142398.	8.0	77
4	A modelling-based assessment of suspended sediment transport related to new damming in the Red River basin from 2000 to 2013. Catena, 2021, 197, 104958.	5.0	19
5	Estimation of the Climate Change Impact on the Hydrological Balance in Basins of South-Central Chile. Water (Switzerland), 2021, 13, 794.	2.7	16
6	Long-term and event-scale sub-daily streamflow and sediment simulation in a small forested catchment. Hydrological Sciences Journal, 2021, 66, 862-873.	2.6	5
7	Spatio-temporal trends of hydrological components: the case of the Tafna basin (northwestern) Tj ETQq1 1 0.784314 rgBT /Overlock 10	2.9	2
8	The Role of Ponds in Pesticide Dissipation at the Agricultural Catchment Scale: A Critical Review. Water (Switzerland), 2021, 13, 1202.	2.7	20
9	Sediment Balance Estimation of the 'Cuvette Centrale' of the Congo River Basin Using the SWAT Hydrological Model. Water (Switzerland), 2021, 13, 1388.	2.7	5
10	Assessment of suspended sediment load variability in the Tonle Sap and Lower Mekong Rivers, Cambodia. Catena, 2021, 202, 105291.	5.0	4
11	Evolution of N-balance with qualitative expert evaluation approach. Journal of Environmental Management, 2021, 291, 112713.	7.8	1
12	Accounting for flow intermittence in freshwater species distribution modelling. Ecohydrology, 2021, 14, e2346.	2.4	1
13	Future climatic and hydrologic changes estimated by bias-adjusted regional climate model outputs of the Cordex-Africa project: case of the Tafna basin (North-Western Africa). International Journal of Global Warming, 2021, 23, 58.	0.5	2
14	Assessment of Water Quality Regulation Functions in Southwestern Europe Watersheds. Water (Switzerland), 2021, 13, 2980.	2.7	1
15	Assessment of ecological function indicators related to nitrate under multiple human stressors in a large watershed. Ecological Indicators, 2020, 111, 106016.	6.3	13
16	Applications of a SWAT model to evaluate the contribution of the Tafna catchment (north-west) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 1 Assessment, 2020, 192, 510.	2.7	11
17	Assessment of Hydrology and Sediment Yield in the Mekong River Basin Using SWAT Model. Water (Switzerland), 2020, 12, 3503.	2.7	25
18	Global-scale daily riverine DOC fluxes from lands to the oceans with a generic model. Global and Planetary Change, 2020, 194, 103294.	3.5	11

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19	A model for evaluating continental chemical weathering from riverine transports of dissolved major elements at a global scale. Global and Planetary Change, 2020, 192, 103226.	3.5	9
20	Economic valuation of the natural service of nitrate regulation provided by rivers including dilution effects: Application to a semiarid region, the Ebro basin (Spain). Ecological Indicators, 2020, 117, 106608.	6.3	2
21	Hydrological Alteration Index as an Indicator of the Calibration Complexity of Water Quantity and Quality Modeling in the Context of Global Change. Water (Switzerland), 2020, 12, 115.	2.7	13
22	Effect of Land Use/Cover Change on the Hydrological Response of a Southern Center Basin of Chile. Water (Switzerland), 2020, 12, 302.	2.7	25
23	Daily denitrification rates in floodplains under contrasting pedo-climatic and anthropogenic contexts: modelling at the watershed scale. Biogeochemistry, 2020, 149, 317-336.	3.5	12
24	Denitrification and associated nitrous oxide and carbon dioxide emissions from the Amazonian wetlands. Biogeosciences, 2020, 17, 4297-4311.	3.3	9
25	A Modeling Approach to Diagnose the Impacts of Global Changes on Discharge and Suspended Sediment Concentration within the Red River Basin. Water (Switzerland), 2019, 11, 958.	2.7	16
26	Total water storage variability from GRACE mission and hydrological models for a 50,000 km2 temperate watershed: the Garonne River basin (France). Journal of Hydrology: Regional Studies, 2019, 24, 100609.	2.4	17
27	Assessment of sediment and organic carbon exports into the Arctic ocean: The case of the Yenisei River basin. Water Research, 2019, 158, 118-135.	11.3	46
28	Water resources and nitrate discharges in relation to agricultural land uses in an intensively irrigated watershed. Science of the Total Environment, 2019, 659, 1293-1306.	8.0	24
29	ASSESSING THE CLIMATE FORECAST SYSTEM REANALYSIS WEATHER DATA DRIVEN HYDROLOGICAL MODEL FOR THE YANGTZE RIVER BASIN IN CHINA. Applied Ecology and Environmental Research, 2019, 17, 3615-3632.	0.5	18
30	Modelling the role of riverbed compartments in the regulation of water quality as an ecological service. Ecological Engineering, 2018, 118, 19-30.	3.6	19
31	Coevolution of Hydrological Cycle Components under Climate Change: The Case of the Garonne River in France. Water (Switzerland), 2018, 10, 1870.	2.7	16
32	Using SWAT-LUD Model to Estimate the Influence of Water Exchange and Shallow Aquifer Denitrification on Water and Nitrate Flux. Water (Switzerland), 2018, 10, 528.	2.7	6
33	Integrated Effects of Land Use and Topography on Streamflow Response to Precipitation in an Agriculture-Forest Dominated Northern Watershed. Water (Switzerland), 2018, 10, 633.	2.7	9
34	Multiobjective optimization of eco-industrial parks: evaluation of environmental impacts at the watershed scale. Computer Aided Chemical Engineering, 2018, 43, 67-72.	0.5	2
35	Assessing the Water Footprint of Wheat and Maize in Haihe River Basin, Northern China (1956–2015). Water (Switzerland), 2018, 10, 867.	2.7	26
36	Water balance assessment of an ungauged area in Poyang Lake watershed using a spatially distributed runoff coefficient model. Journal of Hydroinformatics, 2018, 20, 1009-1024.	2.4	18

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37	Biodiversity and ecosystem purification service in an alluvial wetland. Ecological Engineering, 2017, 103, 359-371.	3.6	20
38	Spatio-temporal analysis of factors controlling nitrate dynamics and potential denitrification hot spots and hot moments in groundwater of an alluvial floodplain. Ecological Engineering, 2017, 103, 372-384.	3.6	60
39	Role of biodiversity in the biogeochemical processes at the water-sediment interface of macroporous river bed: An experimental approach. Ecological Engineering, 2017, 103, 385-393.	3.6	14
40	Does land use impact on groundwater invertebrate diversity and functionality in floodplains?. Ecological Engineering, 2017, 103, 394-403.	3.6	11
41	Modelling trace metal transfer in large rivers under dynamic hydrology: A coupled hydrodynamic and chemical equilibrium model. Environmental Modelling and Software, 2017, 89, 77-96.	4.5	19
42	Assessing the hydrological response from an ensemble of CMIP5 climate projections in the transition zone of the Atlantic region (Bay of Biscay). Journal of Hydrology, 2017, 548, 46-62.	5.4	45
43	Assessing the Climatic and Temporal Transposability of the SWAT Model across a Large Contrasted Watershed. Journal of Hydrologic Engineering - ASCE, 2017, 22, .	1.9	9
44	Macroinvertebrate community traits and nitrate removal in stream sediments. Freshwater Biology, 2017, 62, 929-944.	2.4	15
45	Evaluation of hydrological response to extreme climate variability using SWAT model: application to the Fuhe basin of Poyang Lake watershed, China. Hydrology Research, 2017, 48, 1730-1744.	2.7	5
46	Comparison of Langmuir and Freundlich adsorption equations within the SWAT-K model for assessing potassium environmental losses at basin scale. Agricultural Water Management, 2017, 180, 205-211.	5.6	59
47	A simple multi-criteria approach to delimitate nitrate attenuation zones in alluvial floodplains. Four cases in south-western Europe. Ecological Engineering, 2017, 103, 315-331.	3.6	17
48	Floodplain capacity to depollute water in relation to the structure of biological communities. Ecological Engineering, 2017, 103, 301-314.	3.6	7
49	Testing the SWAT Model with Gridded Weather Data of Different Spatial Resolutions. Water (Switzerland), 2017, 9, 54.	2.7	29
50	Modelling Hydrology and Sediment Transport in a Semi-Arid and Anthropized Catchment Using the SWAT Model: The Case of the Tafna River (Northwest Algeria). Water (Switzerland), 2017, 9, 216.	2.7	60
51	Using Modeling Tools to Better Understand Permafrost Hydrology. Water (Switzerland), 2017, 9, 418.	2.7	18
52	Simulating Flash Floods at Hourly Time-Step Using the SWAT Model. Water (Switzerland), 2017, 9, 929.	2.7	55
53	Stream flow simulation and verification in ungauged zones by coupling hydrological and hydrodynamic models: a case study of the Poyang Lake ungauged zone. Hydrology and Earth System Sciences, 2017, 21, 5847-5861.	4.9	31
54	Can Recent Global Changes Explain the Dramatic Range Contraction of an Endangered Semi-Aquatic Mammal Species in the French Pyrenees?. PLoS ONE, 2016, 11, e0159941.	2.5	20

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55	Development and applications of the SWAT model to support sustainable river basin management on different scales. Sustainability of Water Quality and Ecology, 2016, 8, 1-3.	2.0	7
56	Water age prediction and its potential impacts on water quality using a hydrodynamic model for Poyang Lake, China. Environmental Science and Pollution Research, 2016, 23, 13327-13341.	5.3	55
57	Spatially distributed modelling of surface water-groundwater exchanges during overbank flood events â€" a case study at the Garonne River. Advances in Water Resources, 2016, 94, 146-159.	3.8	25
58	Improved simulation of river water and groundwater exchange in an alluvial plain using the SWAT model. Hydrological Processes, 2016, 30, 187-202.	2.6	53
59	Different modelling approaches to evaluate nitrogen transport and turnover at the watershed scale. Journal of Hydrology, 2016, 539, 478-494.	5.4	20
60	On the Use of Hydrological Models and Satellite Data to Study the Water Budget of River Basins Affected by Human Activities: Examples from the Garonne Basin of France. Surveys in Geophysics, 2016, 37, 223-247.	4.6	36
61	Assessing potassium environmental losses from a dairy farming watershed with the modified SWAT model. Agricultural Water Management, 2016, 175, 91-104.	5.6	8
62	On the Use of Hydrological Models and Satellite Data to Study the Water Budget of River Basins Affected by Human Activities: Examples from the Garonne Basin of France. Space Sciences Series of ISSI, 2016, , 33-57.	0.0	1
63	Evaluation of hydrology, suspended sediment and Nickel loads in a small watershed in Basque Country (Northern Spain) using eco-hydrological SWAT model. Annales De Limnologie, 2015, 51, 59-70.	0.6	7
64	Role of Local Flow Conditions in River Biofilm Colonization and Early Growth. River Research and Applications, 2015, 31, 350-367.	1.7	10
65	Estimating sediment and particulate organic nitrogen and particulate organic phosphorous yields from a volcanic watershed characterized by forest and agriculture using SWAT model. Annales De Limnologie, 2015, 51, 23-35.	0.6	11
66	Integrating hydrological features and genetically validated occurrence data in occupancy modelling of an endemic and endangered semi-aquatic mammal, Galemys pyrenaicus , in a Pyrenean catchment. Biological Conservation, 2015, 184, 182-192.	4.1	19
67	Sediment and nutrient dynamics during storm events in the EnxoÃ© temporary river, southern Portugal. Catena, 2015, 127, 177-190.	5.0	54
68	Assessing the capability of the SWAT model to simulate snow, snow melt and streamflow dynamics over an alpine watershed. Journal of Hydrology, 2015, 531, 574-588.	5.4	121
69	Modelling of trace metal transfer in a large river under different hydrological conditions (the) Tj ETQq1 1 0.784314 rgBT /Overlock 10	2.5	15
70	Modeling environmental services in rivers at catchment scale. Annales De Limnologie, 2015, 51, A1-A2.	0.6	1
71	Daily Nitrate Losses: Implication on Long-Term River Quality in an Intensive Agricultural Catchment of Southwestern France. Journal of Environmental Quality, 2014, 43, 46-54.	2.0	31
72	Modelling epilithic biofilms combining hydrodynamics, invertebrate grazing and algal traits. Freshwater Biology, 2014, 59, 1213-1228.	2.4	27

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73	New insight into pesticide partition coefficient Kd for modelling pesticide fluvial transport: Application to an agricultural catchment in south-western France. Chemosphere, 2014, 99, 134-142.	8.2	43
74	Application date as a controlling factor of pesticide transfers to surface water during runoff events. Catena, 2014, 119, 97-103.	5.0	43
75	Simulating Land Management Options to Reduce Nitrate Pollution in an Agricultural Watershed Dominated by an Alluvial Aquifer. Journal of Environmental Quality, 2014, 43, 67-74.	2.0	46
76	The MAELIA Multi-Agent Platform for Integrated Analysis of Interactions Between Agricultural Land-Use and Low-Water Management Strategies. Lecture Notes in Computer Science, 2014, , 85-100.	1.3	19
77	Interaction between local hydrodynamics and algal community in epilithic biofilm. Water Research, 2013, 47, 2153-2163.	11.3	70
78	Role of the hyporheic heterotrophic biofilm on transformation and toxicity of pesticides. Annales De Limnologie, 2013, 49, 87-95.	0.6	12
79	A modelling approach to quantify the influence of fine sediment deposition on biogeochemical processes occurring in the hyporheic zone. Annales De Limnologie, 2012, 48, 279-287.	0.6	5
80	The role of organisms in hyporheic processes: gaps in current knowledge, needs for future research and applications. Annales De Limnologie, 2012, 48, 253-266.	0.6	81
81	On modeling chronic detachment of periphyton in artificial rough, open channel flow. Desalination and Water Treatment, 2012, 41, 79-87.	1.0	7
82	Longitudinal transformation of nitrogen and carbon in the hyporheic zone of an N-rich stream: A combined modelling and field study. Physics and Chemistry of the Earth, 2011, 36, 599-611.	2.9	37
83	Occurrence of metolachlor and trifluralin losses in the Save river agricultural catchment during floods. Journal of Hazardous Materials, 2011, 196, 210-219.	12.4	61
84	Assessment of hydrology, sediment and particulate organic carbon yield in a large agricultural catchment using the SWAT model. Journal of Hydrology, 2011, 401, 145-153.	5.4	171
85	Fluvial transport of suspended sediment and organic carbon during flood events in a large agricultural catchment in southwest France. Hydrological Processes, 2011, 25, 2365-2378.	2.6	60
86	Temporal variability of nitrate transport through hydrological response during flood events within a large agricultural catchment in south-west France. Science of the Total Environment, 2010, 409, 140-149.	8.0	61
87	Dynamics of suspended sediment transport and yield in a large agricultural catchment, southwest France. Earth Surface Processes and Landforms, 2010, 35, 1289-1301.	2.5	142
88	Temporal Dynamics of River Biofilm in Constant Flows: A Case Study in a Riverside Laboratory Flume. International Review of Hydrobiology, 2010, 95, 156-170.	0.9	12
89	Effect of near‐bed turbulence on chronic detachment of epilithic biofilm: Experimental and modeling approaches. Water Resources Research, 2010, 46, .	4.2	25
90	Eutrophication and its effect on dissolved Si concentrations in the Garonne River (France). Journal of Limnology, 2009, 68, 368.	1.1	22

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91	Influence of the hyporheic zone on the phosphorus dynamics of a large gravel‑bed river, Garonne River, France. Hydrological Processes, 2009, 23, 1801-1812.	2.6	33
92	Effects of wastewater treatment plant pollution on in-stream ecosystems functions in an agricultural watershed. Annales De Limnologie, 2009, 45, 79-92.	0.6	19
93	The role of the hyporheic zone in the nitrogen dynamics of a semi‑arid gravel bed stream located downstream of a heavily polluted reservoir (Tafna wadi, Algeria). River Research and Applications, 2008, 24, 183-196.	1.7	18
94	Identification of a minimal adequate model to describe the biomass dynamics of river epilithon. River Research and Applications, 2008, 24, 36-53.	1.7	23
95	A mass-balance approach to estimate in-stream processes in a large river. Hydrological Processes, 2008, 22, 420-428.	2.6	8
96	A coupled vertically integrated model to describe lateral exchanges between surface and subsurface in large alluvial floodplains with a fully penetrating river. Hydrological Processes, 2008, 22, 4257-4273.	2.6	44
97	Bioturbation in the Venice Lagoon: Rates and relationship to organisms. Acta Oecologica, 2007, 32, 14-25.	1.1	34
98	Cadmium transport in sediments by tubificid bioturbation: An assessment of model complexity. Geochimica Et Cosmochimica Acta, 2007, 71, 844-862.	3.9	26
99	Assessing the importance of a self-generated detachment process in river biofilm models. Freshwater Biology, 2006, 51, 901-912.	2.4	95
100	Influence of nontrophic interactions between benthic invertebrates on river sediment processes: a microcosm study. Canadian Journal of Fisheries and Aquatic Sciences, 2004, 61, 1817-1831.	1.4	13
101	Bioturbation experiments in the Venice Lagoon. Hydrobiologia, 2003, 494, 245-250.	2.0	20
102	Assessment of the quantitative and qualitative buffer function of an alluvial wetland: hydrological modelling of a large floodplain (Garonne River, France). Hydrological Processes, 2003, 17, 2375-2392.	2.6	45
103	A numerical tool to integrate biophysical diversity of a large regulated river: hydrobiogeochemical bases. The case of the Garonne River (France). River Research and Applications, 2003, 19, 181-198.	1.7	15
104	Epilithic biomass in a large gravel-bed river (the Garonne, France): a manifestation of eutrophication?. River Research and Applications, 2002, 18, 343-354.	1.7	28
105	Application of the SWAT model to assess the impact of changes in agricultural management practices on water quality. Hydrological Sciences Journal, 0, , 1-19.	2.6	21