Athanassios A. Argiriou

List of Publications by Year
in descending order

99 papers	4,608 citations	136740 32 h-index	102304 66 g-index
100 all docs	100 docs citations	100 times ranked	4508 citing authors

#	Article	IF	Citations
1	On the impact of urban climate on the energy consumption of buildings. Solar Energy, 2001, 70, 201-216.	2.9	689
2	Infrared thermography for building diagnostics. Energy and Buildings, 2002, 34, 171-183.	3.1	412
3	European residential buildings and empirical assessment of the Hellenic building stock, energy consumption, emissions and potential energy savings. Building and Environment, 2007, 42, 1298-1314.	3.0	405
4	Energy performance assessment of existing dwellings. Energy and Buildings, 2007, 39, 393-403.	3.1	209
5	Heating energy consumption and resulting environmental impact of European apartment buildings. Energy and Buildings, 2005, 37, 429-442.	3.1	194
6	Building typologies as a tool for assessing the energy performance of residential buildings â€" A case study for the Hellenic building stock. Energy and Buildings, 2011, 43, 3400-3409.	3.1	171
7	Potential for energy conservation in apartment buildings. Energy and Buildings, 2000, 31, 143-154.	3.1	150
8	Energy efficiency of PV panels under real outdoor conditionsâ€"An experimental assessment in Athens, Greece. Renewable Energy, 2017, 101, 236-243.	4.3	114
9	Data collection and analysis of the building stock and its energy performanceâ€"An example for Hellenic buildings. Energy and Buildings, 2010, 42, 1231-1237.	3.1	94
10	Energy conservation and retrofitting potential in Hellenic hotels. Energy and Buildings, 1996, 24, 65-75.	3.1	93
11	Comparison of methodologies for tmy generation using 20 years data for Athens, Greece. Solar Energy, 1999, 66, 33-45.	2.9	92
12	Mapping the energy performance of hellenic residential buildings from EPC (energy performance) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 3	4.5	90
13	Deterioration of European apartment buildings. Energy and Buildings, 2005, 37, 515-527.	3.1	89
14	Isotopic modeling of the sub-cloud evaporation effect in precipitation. Science of the Total Environment, 2016, 544, 1059-1072.	3.9	85
15	Empirical assessment of the Hellenic non-residential building stock, energy consumption, emissions and potential energy savings. Energy Conversion and Management, 2007, 48, 1160-1175.	4.4	76
16	On the combination of air velocity and flow measurements in single sided natural ventilation configurations. Energy and Buildings, 1996, 24, 155-165.	3.1	73
17	Energy conservation in greenhouses with buried pipes. Energy, 1996, 21, 353-360.	4.5	72
18	Empirical assessment of calculated and actual heating energy use in Hellenic residential buildings. Applied Energy, 2016, 164, 115-132.	5.1	69

#	Article	IF	Citations
19	A neural network controller for hydronic heating systems of solar buildings. Neural Networks, 2004, 17, 427-440.	3.3	68
20	Energy consumption and the potential of energy savings in Hellenic office buildings used as bank branchesâ€"A case study. Energy and Buildings, 2011, 43, 770-778.	3.1	66
21	Intelligent control system for reconciliation of the energy savings with comfort in buildings using soft computing techniques. Energy and Buildings, 2011, 43, 66-74.	3.1	65
22	Isotopic composition of precipitation in Greece. Journal of Hydrology, 2006, 327, 486-495.	2.3	63
23	Development of a neural network heating controller for solar buildings. Neural Networks, 2000, 13, 811-820.	3.3	58
24	Energy performance of European residential buildings: Energy use, technical and environmental characteristics of the Greek residential sector â€" energy conservation and COâ‚‚ reduction. Energy and Buildings, 2019, 183, 86-104.	3.1	52
25	Gridded data set of the stable isotopic composition of precipitation over the eastern and central Mediterranean. Journal of Geophysical Research, 2007, 112, .	3.3	51
26	Determination of measuring sites for solar irradiance, based on cluster analysis of satellite-derived cloud estimations. Solar Energy, 2013, 97, 1-11.	2.9	51
27	Numerical simulation and performance assessment of a low capacity solar assisted absorption heat pump coupled with a sub-floor system. Solar Energy, 2005, 79, 290-301.	2.9	49
28	Energy certification of Hellenic buildings: First findings. Energy and Buildings, 2013, 65, 429-437.	3.1	43
29	Stable isotopic composition of atmospheric water vapor in Patras, Greece: A concentration weighted trajectory approach. Atmospheric Research, 2015, 152, 93-104.	1.8	43
30	Combined analysis of rainfall and lightning data produced by mesoscale systems in the central and eastern Mediterranean. Atmospheric Research, 2007, 83, 55-63.	1.8	36
31	The impact of the energy performance regulationsâ€™ updated on the construction technology, economics and energy aspects of new residential buildings: The case of Greece. Energy and Buildings, 2017, 155, 225-237.	3.1	35
32	Homogenization of mean monthly temperature time series of Greece. International Journal of Climatology, 2013, 33, 2649-2666.	1.5	34
33	EPIQR surveys of apartment buildings in Europe. Energy and Buildings, 2000, 31, 111-128.	3.1	33
34	Assessment of energy and natural resources conservation in office buildings using TOBUS. Energy and Buildings, 2002, 34, 135-153.	3.1	33
35	Active solar space heating of residential buildings in northern Hellasâ€"a case study. Energy and Buildings, 1997, 26, 215-221.	3.1	31
36	Storms and Lightning Activity in Greece during the Warm Periods of 2003â€"06. Journal of Applied Meteorology and Climatology, 2008, 47, 3089-3098.	0.6	30

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37	The sensitivity of numerical forecasts to convective parameterization during the warm period and the use of lightning data as an indicator for convective occurrence. Atmospheric Research, 2009, 94, 704-714.	1.8	29
38	Detection and correction of inhomogeneities in Greek climate temperature series. International Journal of Climatology, 2014, 34, 3024-3043.	1.5	29
39	On the efficiency of night ventilation techniques for thermostatically controlled buildings. Solar Energy, 1996, 56, 479-483.	2.9	26
40	Single-sided ventilation of buildings through shaded large openings. Energy, 2002, 27, 93-115.	4.5	24
41	Spatially interpolated time series of Î´18ÎŸ in Eastern Mediterranean precipitation. Global and Planetary Change, 2010, 71, 150-159.	1.6	24
42	Energy policy and an action plan for renewable energy sources (RES) for the Hellenic islands of the North Aegean region. Energy, 1999, 24, 335-350.	4.5	22
43	The Relationship of Lightning Activity with Microwave Brightness Temperatures and Spaceborne Radar Reflectivity Profiles in the Central and Eastern Mediterranean. Journal of Applied Meteorology and Climatology, 2007, 46, 1901-1912.	0.6	22
44	CSHPSS systems in Greece: Test of simulation software and analysis of typical systems. Solar Energy, 1997, 60, 159-170.	2.9	20
45	The solar thermal market in Greeceâ€"review and perspectives. Renewable and Sustainable Energy Reviews, 2003, 7, 397-418.	8.2	18
46	Urban Sustainability Audits and Ratings of the Built Environment. Energies, 2019, 12, 4243.	1.6	18
47	Reverse flood routing with the inverted Muskingum storage routing scheme. Natural Hazards and Earth System Sciences, 2012, 12, 217-227.	1.5	17
48	The Air Quality of a Mediterranean Urban Environment Area and Its Relation to Major Meteorological Parameters. Water, Air, and Soil Pollution, 2015, 226, 1.	1.1	17
49	The test of the ecohydrological separation hypothesis in a dry zone of the northeastern Tibetan Plateau. Ecohydrology, 2019, 12, e2077.	1.1	17
50	Stable isotopic signature of precipitation under various synoptic classifications. Physics and Chemistry of the Earth, 2010, 35, 530-535.	1.2	16
51	Neural Network Model for Greenhouse Microclimate Predictions. Agriculture (Switzerland), 2022, 12, 780.	1.4	16
52	TOBUS â€" A European method and software for office building refurbishment. Energy and Buildings, 2002, 34, 111-112.	3.1	15
53	On the Methods for the Delimitation of Seasons. Water, Air and Soil Pollution, 2004, 4, 65-74.	0.8	15
54	Lightning activity in the Mediterranean: quantification of cyclones contribution and relation to their intensity. Atmospheric Science Letters, 2016, 17, 510-516.	0.8	15

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55	Periodicity analysis of Î´18O in precipitation over Central Europe: Timeâ€"frequency considerations of the isotopic â€˜temperatureâ€™ effect. Journal of Hydrology, 2016, 534, 150-163.	2.3	15
56	Benchmarks for Embodied and Operational Energy Assessment of Hellenic Single-Family Houses. Energies, 2020, 13, 4384.	1.6	15
57	Stable Isotope Composition in Surface Water in the Upper Yellow River in Northwest China. Water (Switzerland), 2019, 11, 967.	1.2	12
58	Baselines for Energy Use and Carbon Emission Intensities in Hellenic Nonresidential Buildings. Energies, 2020, 13, 2100.	1.6	11
59	Thermal storage efficiencies of two solar saltless water ponds. Solar Energy, 2003, 75, 207-216.	2.9	9
60	An advanced method for classifying atmospheric circulation types based on prototypes connectivity graph. Atmospheric Research, 2012, 118, 180-192.	1.8	9
61	High resolution air temperature climatology for <scp>G</scp>reece for the period 1971â€"2000. Meteorological Applications, 2017, 24, 191-205.	0.9	9
62	Unveiling the existing condition and energy use in Hellenic school buildings. Energy and Buildings, 2021, 247, 111150.	3.1	9
63	Social cost of electricity generation in Greece. Renewable Energy, 1997, 12, 281-289.	4.3	8
64	Experimental Study of a Earth-to-Air Heat Exchanger Coupled to a Photovoltaic System. Journal of Solar Energy Engineering, Transactions of the ASME, 2004, 126, 620-625.	1.1	8
65	Temporal trends in the stable isotope composition of precipitation: a comparison between the eastern Mediterranean and central Europe. Theoretical and Applied Climatology, 2011, 105, 199-207.	1.3	8
66	Water Stable Isotopes in an Alpine Setting of the Northeastern Tibetan Plateau. Water (Switzerland), 2019, 11, 770.	1.2	8
67	Deuterium Excess in Precipitation Reveals Water Vapor Source in the Monsoon Margin Sites in Northwest China. Water (Switzerland), 2020, 12, 3315.	1.2	8
68	Local Meteoric Water Lines in a Semi-Arid Setting of Northwest China Using Multiple Methods. Water (Switzerland), 2021, 13, 2380.	1.2	8
69	An application of a feed-forward neural network model for wind speed predictions. International Journal of Sustainable Energy, 2022, 41, 323-340.	1.3	6
70	Tropospheric Correction of Sentinel-1 Synthetic Aperture Radar Interferograms Using a High-Resolution Weather Model Validated by GNSS Measurements. Remote Sensing, 2021, 13, 2258.	1.8	6
71	Optical and thermal performance simulation of a micro-mirror solar collector. Energy Reports, 2022, 8, 6624-6632.	2.5	6
72	Site adaptation of global horizontal irradiance from the Copernicus Atmospheric Monitoring Service for radiation using supervised machine learning techniques. Renewable Energy, 2022, 195, 92-106.	4.3	6

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73	Isoscape of Î¹8O in Precipitation of the Qinghai-Tibet Plateau: Assessment and Improvement. Water (Switzerland), 2020, 12, 3392.	1.2	5
74	Use of GNSS Tropospheric Delay Measurements for the Parameterization and Validation of WRF High-Resolution Re-Analysis over the Western Gulf of Corinth, Greece: The PaTrop Experiment. Remote Sensing, 2021, 13, 1898.	1.8	5
75	Energy Use Intensities for Asset Rating of Hellenic Non-Residential Buildings. Global Journal of Energy Technology Research Updates, 2018, 5, 19-36.	0.2	5
76	Climate Change Scenarios and Their Implications on the Energy Performance of Hellenic Non-Residential Buildings. Sustainability, 2021, 13, 13005.	1.6	5
77	A Triple Hot-Wire System for Indoor Air Flow Measurements. Journal of Solar Energy Engineering, Transactions of the ASME, 1996, 118, 168-176.	1.1	4
78	Comparing Control Strategies Using Experimental and Simulation Results: Methodology and Application to Heating Control of Passive Solar Buildings. HVAC and R Research, 2006, 12, 715-737.	0.9	4
79	Stable Hydrogen and Oxygen Isotope Characteristics of Bottled Water in China: A Consideration of Water Source. Water (Switzerland), 2019, 11, 1065.	1.2	4
80	Modeling Insights into Precipitation Deuterium Excess as an Indicator of Raindrop Evaporation in Lanzhou, China. Water (Switzerland), 2021, 13, 193.	1.2	4
81	A Stable Isotope Approach for Estimating the Contribution of Recycled Moisture to Precipitation in Lanzhou City, China. Water (Switzerland), 2021, 13, 1783.	1.2	4
82	Impacts on Indoor Thermal Comfort and Heating Energy Use in Hellenic Dwellings from Occupant Behavioral Reactions. Applied Sciences (Switzerland), 2021, 11, 6254.	1.3	4
83	Homogenization of Precipitation Series in Greece. Springer Atmospheric Sciences, 2017, , 583-590.	0.4	3
84	The sensitivity of warm period precipitation forecasts to various modifications of the Kain-Fritsch Convective Parameterization scheme. Natural Hazards and Earth System Sciences, 2011, 11, 1327-1339.	1.5	2
85	An Efficient Approach to Spatiotemporal Analysis and Modeling of Air Pollution Data. Journal of Agricultural, Biological, and Environmental Statistics, 2011, 16, 371-388.	0.7	2
86	Stable Isotope Signatures and Moisture Transport of a Typical Heavy Precipitation Case in the Southern Tianshan Mountains. Chinese Geographical Science, 2020, 30, 180-188.	1.2	2
87	The Dark Universe Is Not Invisible. Physical Sciences Forum, 2021, 2, 10.	0.3	2
88	Recharge and Infiltration Mechanisms of Soil Water in the Floodplain Revealed by Water-Stable Isotopes in the Upper Yellow River. Sustainability, 2021, 13, 9369.	1.6	2
89	Plant water resource partitioning and xylem-to-leaf deuterium enrichment in Lanzhou, northwest China. Water Science and Technology: Water Supply, 2020, 20, 1127-1140.	1.0	2
90	Testing mean air temperature trends in southern Greece: A Bayesian approach. International Journal of Climatology, 2022, 42, 4989-5015.	1.5	2

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91	Representative typology of buildings: case study of hellenic non residential buildings. Energy Sources, Part A: Recovery, Utilization and Environmental Effects, 0, , 1-21.	1.2	2
92	Low-Cost Data Acquisition System for Solar Thermal Collectors. Electronics (Switzerland), 2022, 11, 934.	1.8	2
93	Building Energy Auditsâ€"Diagnosis and Retrofitting towards Decarbonization and Sustainable Cities. Energies, 2022, 15, 2039.	1.6	2
94	Use of shadowband correction models for predicting direct solar irradiance. , 2013, , .		1
95	Validation and Bias Correction of Monthly Î´18O Precipitation Time Series from ECHAM5-Wiso Model in Central Europe. Oxygen, 2022, 2, 109-124.	1.6	1
96	A machine vision based method for atmospheric circulation classification. , 2009, , .		0
97	Weather maps classification over Greek domain based on isobaric line patterns. Theoretical and Applied Climatology, 2013, 114, 691-704.	1.3	0
98	Efficient ANN Training for the Reconstruction of Isotopic Time Series. Springer Atmospheric Sciences, 2013, , 825-831.	0.4	0
99	Optimizing the input vectors of applied artificial neural network models for wind power production forecasting. Wind Engineering, 0, , 0309524X2110463.	1.1	0