VÃ-ctor Resco de Dios

List of Publications by Year
in descending order

117 papers	6,403 citations	94433 37 h-index	74163 75 g-index
137 all docs	137 docs citations	137 times ranked	9579 citing authors

#	Article	IF	Citations
1	TRY plant trait database â€“ enhanced coverage and open access. Global Change Biology, 2020, 26, 119-188.	9.5	1,038
2	The FLUXNET2015 dataset and the ONEFlux processing pipeline for eddy covariance data. Scientific Data, 2020, 7, 225.	5.3	646
3	Unprecedented burn area of Australian mega forest fires. Nature Climate Change, 2020, 10, 171-172.	18.8	406
4	Optimal stomatal behaviour around the world. Nature Climate Change, 2015, 5, 459-464.	18.8	397
5	Causes and consequences of eastern Australia's 2019â€“20 season of megaâ€fires. Global Change Biology, 2020, 26, 1039-1041.	9.5	292
6	An introduction to the Australian and New Zealand flux tower network â€“ OzFlux. Biogeosciences, 2016, 13, 5895-5916.	3.3	159
7	Largeâ€scale, dynamic transformations in fuel moisture drive wildfire activity across southeastern Australia. Geophysical Research Letters, 2016, 43, 4229-4238.	4.0	148
8	Climate Change Effects on Mediterranean Forests and Preventive Measures. New Forests, 2006, 33, 29-40.	1.7	134
9	Forests synchronize their growth in contrasting Eurasian regions in response to climate warming. Proceedings of the National Academy of Sciences of the United States of America, 2016, 113, 662-667.	7.1	126
10	Woody plants optimise stomatal behaviour relative to hydraulic risk. Ecology Letters, 2018, 21, 968-977.	6.4	109
11	Droughtâ€induced hydraulic limitations constrain leaf gas exchange recovery after precipitation pulses in the C₃ woody legume, Prosopis velutina. New Phytologist, 2009, 181, 672-682.	7.3	108
12	Genetic variation in circadian regulation of nocturnal stomatal conductance enhances carbon assimilation and growth. Plant, Cell and Environment, 2016, 39, 3-11.	5.7	93
13	A semi-mechanistic model for predicting the moisture content of fine litter. Agricultural and Forest Meteorology, 2015, 203, 64-73.	4.8	91
14	Fireâ€induced deforestation in droughtâ€prone Mediterranean forests: drivers and unknowns from leaves to communities. Ecological Monographs, 2018, 88, 141-169.	5.4	90
15	Limits to postâ€fire vegetation recovery under climate change. Plant, Cell and Environment, 2021, 44, 3471-3489.	5.7	90
16	Climate-change-driven growth decline of European beech forests. Communications Biology, 2022, 5, 163.	4.4	89
17	Processes driving nocturnal transpiration and implications for estimating land evapotranspiration. Scientific Reports, 2015, 5, 10975.	3.3	85
18	Plant water potential improves prediction of empirical stomatal models. PLoS ONE, 2017, 12, e0185481.	2.5	77

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19	Utilizing intraspecific variation in phenotypic plasticity to bolster agricultural and forest productivity under climate change. Plant, Cell and Environment, 2015, 38, 1752-1764.	5.7	74
20	Predicting dead fine fuel moisture at regional scales using vapour pressure deficit from MODIS and gridded weather data. Remote Sensing of Environment, 2016, 174, 100-108.	11.0	74
21	Changing Weather Extremes Call for Early Warning of Potential for Catastrophic Fire. Earth's Future, 2017, 5, 1196-1202.	6.3	73
22	Invasive forb benefits from water savings by native plants and carbon fertilization under elevated <scp>CO</scp>₂ and warming. New Phytologist, 2013, 200, 1156-1165.	7.3	67
23	Linking Forest Flammability and Plant Vulnerability to Drought. Forests, 2020, 11, 779.	2.1	64
24	Woody clockworks: circadian regulation of nightâ€time water use in <scp>E</scp>ucalyptus globulus. New Phytologist, 2013, 200, 743-752.	7.3	56
25	Rainfall patterns after fire differentially affect the recruitment of three Mediterranean shrubs. Biogeosciences, 2011, 8, 3721-3732.	3.3	55
26	Assessing the potential functions of nocturnal stomatal conductance in C₃ and C₄ plants. New Phytologist, 2019, 223, 1696-1706.	7.3	55
27	Ecological implications of plantsâ€™ ability to tell the time. Ecology Letters, 2009, 12, 583-592.	6.4	50
28	Chlorophyll fluorescence, predawn water potential and photosynthesis in precipitation pulseâ€driven ecosystems â€“ implications for ecological studies. Functional Ecology, 2008, 22, 479-483.	3.6	48
29	Carbon uptake and water use in woodlands and forests in southern Australia during an extreme heat wave event in the â€œAngry Summerâ€•of 2012/2013. Biogeosciences, 2016, 13, 5947-5964.	3.3	48
30	A new family of standardized and symmetric indices for measuring the intensity and importance of plant neighbour effects. Methods in Ecology and Evolution, 2017, 8, 580-591.	5.2	44
31	Future changes in climatic water balance determine potential for transformational shifts in Australian fire regimes. Environmental Research Letters, 2016, 11, 065002.	5.2	43
32	Circadian regulation of photosynthesis and transpiration from genes to ecosystems. Environmental and Experimental Botany, 2018, 152, 37-48.	4.2	42
33	Physiological drought responses improve predictions of live fuel moisture dynamics in a Mediterranean forest. Agricultural and Forest Meteorology, 2018, 263, 417-427.	4.8	42
34	Globe-LFMC, a global plant water status database for vegetation ecophysiology and wildfire applications. Scientific Data, 2019, 6, 155.	5.3	41
35	Leaf photosynthetic, economics and hydraulic traits are decoupled among genotypes of a widespread species of eucalypt grown under ambient and elevated <scp>CO</scp>₂. Functional Ecology, 2016, 30, 1491-1500.	3.6	40
36	Analyzing the major drivers of NEE in a Mediterranean alpine shrubland. Biogeosciences, 2010, 7, 2601-2611.	3.3	38

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37	Pretreatment of rice straw by newly isolated fungal consortium enhanced lignocellulose degradation and humification during composting. Bioresource Technology, 2022, 354, 127150.	9.6	36
38	Endogenous circadian regulation of carbon dioxide exchange in terrestrial ecosystems. Global Change Biology, 2012, 18, 1956-1970.	9.5	35
39	Intraspecific variation in juvenile tree growth under elevated CO₂alone and with O₃: a meta-analysis. Tree Physiology, 2016, 36, 682-693.	3.1	34
40	Intra-specific association between carbon isotope composition and productivity in woody plants: A meta-analysis. Plant Science, 2016, 251, 110-118.	3.6	34
41	Unraveling the effects of arbuscular mycorrhizal fungi on cadmium uptake and detoxification mechanisms in perennial ryegrass (Lolium perenne). Science of the Total Environment, 2021, 798, 149222.	8.0	34
42	Soil phosphorous and endogenous rhythms exert a larger impact than CO2 or temperature on nocturnal stomatal conductance in Eucalyptus tereticornis. Tree Physiology, 2013, 33, 1206-1215.	3.1	33
43	Gastropod diversity in aspen stands in coastal northern Sweden. Forest Ecology and Management, 2003, 175, 403-412.	3.2	31
44	Circadian rhythms have significant effects on leaf-to-canopy scale gas exchange under field conditions. GigaScience, 2016, 5, 43.	6.4	31
45	Circadian Regulation and Diurnal Variation in Gas Exchange. Plant Physiology, 2017, 175, 3-4.	4.8	30
46	Climate change induced declines in fuel moisture may turn currently fire-free Pyrenean mountain forests into fire-prone ecosystems. Science of the Total Environment, 2021, 797, 149104.	8.0	30
47	Modifying rainfall patterns in a Mediterranean shrubland: system design, plant responses, and experimental burning. International Journal of Biometeorology, 2012, 56, 1033-1043.	3.0	29
48	Postfire nitrogen balance of Mediterranean shrublands: Direct combustion losses versus gaseous and leaching losses from the postfire soil mineral nitrogen flush. Global Change Biology, 2018, 24, 4505-4520.	9.5	29
49	Using unmanned aerial vehicleâ€based multispectral, RGB and thermal imagery for phenotyping of forest genetic trials: A case study in <scp>Pinus halepensis</scp>. Annals of Applied Biology, 2019, 174, 262-276.	2.5	29
50	Effects of topsoil removal by soil-scarification on regeneration dynamics of mixed forests in Hokkaido, Northern Japan. Forest Ecology and Management, 2005, 215, 138-148.	3.2	28
51	Upside-down fluxes Down Under: CO₂ net sink in winter and net source in summer in a temperate evergreen broadleaf forest. Biogeosciences, 2018, 15, 3703-3716.	3.3	28
52	Transitions from grassland to savanna under drought through passive facilitation by grasses. Journal of Vegetation Science, 2014, 25, 937-946.	2.2	27
53	Diurnal and seasonal variation in the carbon isotope composition of leaf darkâ€respired CO₂ in velvet mesquite (Prosopis velutina). Plant, Cell and Environment, 2009, 32, 1390-1400.	5.7	26
54	Endogenous circadian rhythms in pigment composition induce changes in photochemical efficiency in plant canopies. Plant, Cell and Environment, 2017, 40, 1153-1162.	5.7	26

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55	Extreme drought affects the productivity, but not the composition, of a desert plant community in Central Asia differentially across microtopographies. Science of the Total Environment, 2020, 717, 137251.	8.0	25
56	Hydraulic and photosynthetic limitations prevail over root nonâ€structural carbohydrate reserves as drivers of resprouting in two Mediterranean oaks. Plant, Cell and Environment, 2020, 43, 1944-1957.	5.7	24
57	Adjustment of annual NEE and ET for the open-path IRGA self-heating correction: Magnitude and approximation over a range of climate. Agricultural and Forest Meteorology, 2011, 151, 1856-1861.	4.8	23
58	Differences in morpho-physiological leaf traits reflect the response of growth to drought in a seeder but not in a resprouter Mediterranean species. Functional Plant Biology, 2012, 39, 332.	2.1	23
59	Fire increases the risk of higher soil N2O emissions from Mediterranean Macchia ecosystems. Soil Biology and Biochemistry, 2015, 82, 44-51.	8.8	23
60	Night and day â€“ Circadian regulation of night-time dark respiration and light-enhanced dark respiration in plant leaves and canopies. Environmental and Experimental Botany, 2017, 137, 14-25.	4.2	23
61	The stable isotope ecology of terrestrial plant succession. Plant Ecology and Diversity, 2011, 4, 117-130.	2.4	22
62	DendroSync: An R package to unravel synchrony patterns in tree-ring networks. Dendrochronologia, 2018, 47, 17-22.	2.2	22
63	Understorey productivity in temperate grassy woodland responds to soil water availability but not to elevated [CO₂]. Global Change Biology, 2018, 24, 2366-2376.	9.5	21
64	Photosynthesis and carbon allocation are both important predictors of genotype productivity responses to elevated CO2 in Eucalyptus camaldulensis. Tree Physiology, 2018, 38, 1286-1301.	3.1	21
65	Plant-Fire Interactions. Managing Forest Ecosystems, 2020, , .	0.9	20
66	A broader perspective on the causes and consequences of eastern Australia's 2019â€“20 season of megaâ€fires: A response to Adams et al.. Global Change Biology, 2020, 26, e8-e9.	9.5	20
67	A hydroclimatic model for the distribution of fire on Earth. Environmental Research Communications, 2021, 3, 035001.	2.3	20
68	Nocturnal and seasonal patterns of carbon isotope composition of leaf dark-respired carbon dioxide differ among dominant species in a semiarid savanna. Oecologia, 2010, 164, 297-310.	2.0	19
69	Convergence in critical fuel moisture and fire weather thresholds associated with fire activity in the pyroregions of Mediterranean Europe. Science of the Total Environment, 2022, 806, 151462.	8.0	19
70	Similar diurnal, seasonal and annual rhythms in radial root expansion across two coexisting Mediterranean oak species. Tree Physiology, 2020, 40, 956-968.	3.1	17
71	Environmental and physiological controls on the carbon isotope composition of CO₂ respired by leaves and roots of a C₃ woody legume (Prosopis velutina) and a C₄ perennial grass (Sporobolus wrightii). Plant, Cell and Environment, 2012, 35, 567-577.	5.7	15
72	Effects of competition and herbivory over woody seedling growth in a temperate woodland trump the effects of elevated CO2. Oecologia, 2018, 187, 811-823.	2.0	15

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73	Crown bulk density and fuel moisture dynamics in Pinus pinaster stands are neither modified by thinning nor captured by the Forest Fire Weather Index. Annals of Forest Science, 2017, 74, 1.	2.0	14
74	Bridging the genotypeâ€“phenotype gap for a Mediterranean pine by semiâ€automatic crown identification and multispectral imagery. New Phytologist, 2021, 229, 245-258.	7.3	14
75	Some Challenges for Forest Fire Risk Predictions in the 21st Century. Forests, 2021, 12, 469.	2.1	13
76	Testing the limits of plant drought stress and subsequent recovery in four provenances of a widely distributed subtropical tree species. Plant, Cell and Environment, 2022, 45, 1187-1203.	5.7	13
77	Live Fuel Moisture Content Mapping in the Mediterranean Basin Using Random Forests and Combining MODIS Spectral and Thermal Data. Remote Sensing, 2022, 14, 3162.	4.0	13
78	Windows of opportunity for Prosopis velutina seedling establishment and encroachment in a semiarid grassland. Perspectives in Plant Ecology, Evolution and Systematics, 2012, 14, 275-282.	2.7	12
79	A trade-off between embolism resistance and bark thickness in conifers: are drought and fire adaptations antagonistic?. Plant Ecology and Diversity, 2018, 11, 253-258.	2.4	12
80	Acclimation to nitrogen Ã— salt stress in Populus bolleana mediated by potassium/sodium balance. Industrial Crops and Products, 2021, 170, 113789.	5.2	12
81	Sink and source co-limitation in the response of stored non-structural carbohydrates to an intense but short drought. Trees - Structure and Function, 2021, 35, 1751-1754.	1.9	11
82	Day length regulates seasonal patterns of stomatal conductance in Quercus species. Plant, Cell and Environment, 2020, 43, 28-39.	5.7	10
83	The brassinosteroid biosynthesis enzyme gene PeCPD improves plant growth and salt tolerance in Populus tomentosa. Industrial Crops and Products, 2021, 162, 113218.	5.2	10
84	Iron and copper micronutrients influences cadmium accumulation in rice grains by altering its transport and allocation. Science of the Total Environment, 2021, 777, 146118.	8.0	10
85	Effects of a Heat Wave on Nocturnal Stomatal Conductance in Eucalyptus camaldulensis. Forests, 2018, 9, 319.	2.1	9
86	Agroforestry shows higher potential than reforestation for soil restoration after slash-and-burn: a case study from Bangladesh. , 2020, , 1-7.		9
87	Needle Senescence Affects Fire Behavior in Aleppo Pine (Pinus halepensis Mill.) Stands: A Simulation Study. Forests, 2020, 11, 1054.	2.1	9
88	Climate and stomatal traits drive covariation in nighttime stomatal conductance and daytime gas exchange rates in a widespread C₄ grass. New Phytologist, 2021, 229, 2020-2034.	7.3	9
89	Circadian Regulation Does Not Optimize Stomatal Behaviour. Plants, 2020, 9, 1091.	3.5	8
90	Ground-Penetrating Radar as phenotyping tool for characterizing intraspecific variability in root traits of a widespread conifer. Plant and Soil, 2021, 468, 319-336.	3.7	8

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91	Pretreating poplar cuttings with low nitrogen ameliorates salt stress responses by increasing stored carbohydrates and priming stress signaling pathways. Ecotoxicology and Environmental Safety, 2021, 225, 112801.	6.0	8
92	Drivers of nocturnal stomatal conductance in C3 and C4 plants. Science of the Total Environment, 2022, 814, 151952.	8.0	8
93	Metal tolerance protein MTP6 is involved in Mn and Co distribution in poplar. Ecotoxicology and Environmental Safety, 2021, 226, 112868.	6.0	7
94	A semi-mechanistic model for predicting daily variations in species-level live fuel moisture content. Agricultural and Forest Meteorology, 2022, 323, 109022.	4.8	7
95	Stable isotope views on ecosystem function: challenging or challenged?. Biology Letters, 2010, 6, 287-289.	2.3	6
96	When fire acts like an irrigation: competition release after burning enhances growth. Trees - Structure and Function, 2016, 30, 579-580.	1.9	6
97	Circadian rhythms regulate the environmental responses of net CO2 exchange in bean and cotton canopies. Agricultural and Forest Meteorology, 2017, 239, 185-191.	4.8	6
98	Announcing the Grubb Reviews. Plant Ecology and Diversity, 2016, 9, 1-1.	2.4	5
99	Relationships between climate of origin and photosynthetic responses to an episodic heatwave depend on growth CO2 concentration for Eucalyptus camaldulensis var. camaldulensis. Functional Plant Biology, 2017, 44, 1053.	2.1	4
100	Life after Harvest: Circadian Regulation in Photosynthetic Pigments of Rocket Leaves during Supermarket Storage Affects the Nutritional Quality. Nutrients, 2019, 11, 1519.	4.1	4
101	Radiation and Drought Impact Residual Leaf Conductance in Two Oak Species With Implications for Water Use Models. Frontiers in Plant Science, 2020, 11, 603581.	3.6	4
102	On the persistence of memory. Plant Signaling and Behavior, 2013, 8, e26964.	2.4	3
103	Leaf vein density enhances vascular redundancy instead of carbon uptake at the expense of increasing water leaks in oaks. Environmental and Experimental Botany, 2021, 188, 104527.	4.2	3
104	Ethylene activates poplar defense against Dothiorella gregaria Sacc by regulating reactive oxygen species accumulation. Physiologia Plantarum, 2022, 174, .	5.2	3
105	The Evolution of Physiological Adaptations in a Flammable Planet. Managing Forest Ecosystems, 2020, , 53-73.	0.9	2
106	Letter to the editor regarding Rodrigues et al. 2020: Is COVID-19 halting wildfires in the Mediterranean? Insights for wildfire science under a pandemic context. Science of the Total Environment, 2021, 766, 143347.	8.0	2
107	Plant Carbon Economies and the Dynamics of Wildland Fuels. Managing Forest Ecosystems, 2020, , 93-115.	0.9	1
108	Effects of Fire on Plant Performance. Managing Forest Ecosystems, 2020, , 117-132.	0.9	1

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109	Forest Succession, Alternative States, and Fire-Vegetation Feedbacks. Managing Forest Ecosystems, 2020, , 133-153.	0.9	1
110	When fire acts like an irrigation: competition release after burning enhances growth. , 2016, 30, 579.		1
111	Fires: degree courses for fire professionals. Nature, 2017, 551, 300-300.	27.8	1
112	Assessing Plant Pigment Regulation in Circadian Experiments. Methods in Molecular Biology, 2022, 2494, 135-148.	0.9	1
113	Global Change, Pyrophysiology, and Wildfires. Managing Forest Ecosystems, 2020, , 177-197.	0.9	0
114	Fire Regimes Across Space. Managing Forest Ecosystems, 2020, , 15-29.	0.9	0
115	Fire as an Earth System Process. Managing Forest Ecosystems, 2020, , 31-51.	0.9	0
116	Environmental Plant Responses and Wildland Fire Danger. Managing Forest Ecosystems, 2020, , 75-92.	0.9	0
117	Pyrophysiology and Wildfire Management. Managing Forest Ecosystems, 2020, , 155-175.	0.9	0