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List of Publications by Year
in descending order

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193 papers	19,562 citations	16437 64 h-index	12585 132 g-index
199 all docs	199 docs citations	199 times ranked	12818 citing authors

#	Article	IF	Citations
1	An overview of APSIM, a model designed for farming systems simulation. European Journal of Agronomy, 2003, 18, 267-288.	1.9	2,073
2	Temperature increase reduces global yields of major crops in four independent estimates. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, 9326-9331.	3.3	1,708
3	Rising temperatures reduce global wheatÂproduction. Nature Climate Change, 2015, 5, 143-147.	8.1	1,544
4	Uncertainty in simulating wheat yields under climate change. Nature Climate Change, 2013, 3, 827-832.	8.1	1,021
5	The impact of temperature variability on wheat yields. Global Change Biology, 2011, 17, 997-1012.	4.2	760
6	The Agricultural Model Intercomparison and Improvement Project (AgMIP): Protocols and pilot studies. Agricultural and Forest Meteorology, 2013, 170, 166-182.	1.9	715
7	Multimodel ensembles of wheat growth: many models are better than one. Global Change Biology, 2015, 21, 911-925.	4.2	387
8	Similar estimates of temperature impacts on global wheat yield by three independent methods. Nature Climate Change, 2016, 6, 1130-1136.	8.1	352
9	Integrating satellite and climate data to predict wheat yield in Australia using machine learning approaches. Agricultural and Forest Meteorology, 2019, 274, 144-159.	1.9	319
10	Climate change impact and adaptation for wheat protein. Global Change Biology, 2019, 25, 155-173.	4.2	312
11	Performance of the APSIM-wheat model in Western Australia. Field Crops Research, 1998, 57, 163-179.	2.3	267
12	Simulated wheat growth affected by rising temperature, increased water deficit and elevated atmospheric CO2. Field Crops Research, 2004, 85, 85-102.	2.3	238
13	Crop modelling for integrated assessment of risk to food production from climate change. Environmental Modelling and Software, 2015, 72, 287-303.	1.9	230
14	Ecoâ€efficient Agriculture: Concepts, Challenges, and Opportunities. Crop Science, 2010, 50, S-109.	0.8	227
15	Comparing estimates of climate change impacts from process-based and statistical crop models. Environmental Research Letters, 2017, 12, 015001.	2.2	212
16	Contribution of Crop Models to Adaptation in Wheat. Trends in Plant Science, 2017, 22, 472-490.	4.3	201
17	Towards a multiscale crop modelling framework for climate change adaptation assessment. Nature Plants, 2020, 6, 338-348.	4.7	181
18	The uncertainty of crop yield projections is reduced by improved temperature response functions. Nature Plants, 2017, 3, 17102.	4.7	170

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19	Climate change impacts on wheat production in a Mediterranean environment in Western Australia. Agricultural Systems, 2006, 90, 159-179.	3.2	162
20	Analysis of water- and nitrogen-use efficiency of wheat in a Mediterranean climate. Plant and Soil, 2001, 233, 127-143.	1.8	161
21	Putting mechanisms into crop production models. Plant, Cell and Environment, 2013, 36, 1658-1672.	2.8	159
22	Response of wheat growth, grain yield and water use to elevated <scp>CO</scp>₂ under a Freeâ€Air <scp>CO</scp>₂ Enrichment (<scp>FACE</scp>) experiment and modelling in a semiâ€arid environment. Global Change Biology, 2015, 21, 2670-2686.	4.2	155
23	Impacts of recent climate warming, cultivar changes, and crop management on winter wheat phenology across the Loess Plateau of China. Agricultural and Forest Meteorology, 2015, 200, 135-143.	1.9	152
24	Adaptation of grain legumes to climate change: a review. Agronomy for Sustainable Development, 2012, 32, 31-44.	2.2	145
25	Climate change impact on global potato production. European Journal of Agronomy, 2018, 100, 87-98.	1.9	143
26	Analysis of the benefits to wheat yield from assimilates stored prior to grain filling in a range of environments*. Plant and Soil, 2003, 256, 217-229.	1.8	141
27	Performance and application of the APSIM Nwheat model in the Netherlands. European Journal of Agronomy, 2000, 12, 37-54.	1.9	136
28	Postâ€heading heat stress and yield impact in winter wheat of China. Global Change Biology, 2014, 20, 372-381.	4.2	134
29	Root growth and water uptake during water deficit and recovering in wheat. Plant and Soil, 1998, 201, 265-273.	1.8	133
30	Use of the APSIM wheat model to predict yield, drainage, and NO3- leaching for a deep sand. Australian Journal of Agricultural Research, 1998, 49, 363.	1.5	129
31	Nitrogen and water flows under pasture - wheat and lupin - wheat rotations in deep sands in Western Australia. 2. Drainage and nitrate leaching. Australian Journal of Agricultural Research, 1998, 49, 345.	1.5	123
32	Improving the use of crop models for risk assessment and climate change adaptation. Agricultural Systems, 2018, 159, 296-306.	3.2	122
33	Temperature and precipitation effects on wheat yield across a European transect: a crop model ensemble analysis using impact response surfaces. Climate Research, 2015, 65, 87-105.	0.4	122
34	Sensitivity of productivity and deep drainage of wheat cropping systems in a Mediterranean environment to changes in CO2, temperature and precipitation. Agriculture, Ecosystems and Environment, 2003, 97, 255-273.	2.5	121
35	Multimodel ensembles improve predictions of cropâ€“environmentâ€“management interactions. Global Change Biology, 2018, 24, 5072-5083.	4.2	111
36	Crop model improvement reduces the uncertainty of the response to temperature of multi-model ensembles. Field Crops Research, 2017, 202, 5-20.	2.3	109

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37	Productivity, sustainability, and rainfall-use efficiency in Australian rainfed Mediterranean agricultural systems. Australian Journal of Agricultural Research, 2005, 56, 1123.	1.5	108
38	Optimising sowing date of durum wheat in a variable Mediterranean environment. Field Crops Research, 2009, 111, 109-118.	2.3	107
39	Testing the responses of four wheat crop models to heat stress at anthesis and grain filling. Global Change Biology, 2016, 22, 1890-1903.	4.2	107
40	Global wheat production with 1.5 and 2.0Â°C above preâ€industrial warming. Global Change Biology, 2019, 25, 1428-1444.	4.2	107
41	Potential deep drainage under wheat crops in a Mediterranean climate. I. Temporal and spatial variability. Australian Journal of Agricultural Research, 2001, 52, 45.	1.5	106
42	Potential benefits of early vigor and changes in phenology in wheat to adapt to warmer and drier climates. Agricultural Systems, 2010, 103, 127-136.	3.2	105
43	Determining the Causes of Spatial and Temporal Variability of Wheat Yields at Sub-field Scale Using a New Method of Upscaling a Crop Model. Plant and Soil, 2006, 283, 203-215.	1.8	102
44	Exploring climate change impacts and adaptation options for maize production in the Central Rift Valley of Ethiopia using different climate change scenarios and crop models. Climatic Change, 2015, 129, 145-158.	1.7	102
45	Wheat yield potential in controlled-environment vertical farms. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 19131-19135.	3.3	102
46	Climate variability and change in the Central Rift Valley of Ethiopia: challenges for rainfed crop production. Journal of Agricultural Science, 2014, 152, 58-74.	0.6	98
47	Climate-induced yield variability and yield gaps of maize (Zea mays L.) in the Central Rift Valley of Ethiopia. Field Crops Research, 2014, 160, 41-53.	2.3	97
48	Estimating spring frost and its impact on yield across winter wheat in China. Agricultural and Forest Meteorology, 2018, 260-261, 154-164.	1.9	96
49	Emergent constraint on crop yield response to warmer temperature from field experiments. Nature Sustainability, 2020, 3, 908-916.	11.5	96
50	Simulation of grain protein content with APSIM-Nwheat. European Journal of Agronomy, 2002, 16, 25-42.	1.9	95
51	Canopy temperature for simulation of heat stress in irrigated wheat in a semi-arid environment: A multi-model comparison. Field Crops Research, 2017, 202, 21-35.	2.3	91
52	A potato model intercomparison across varying climates and productivity levels. Global Change Biology, 2017, 23, 1258-1281.	4.2	90
53	Adapting to Climate Variability and Change: Experiences from Cereal-Based Farming in the Central Rift and Kobo Valleys, Ethiopia. Environmental Management, 2013, 52, 1115-1131.	1.2	82
54	Hot spots of wheat yield decline with rising temperatures. Global Change Biology, 2017, 23, 2464-2472.	4.2	80

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55	Impact of climate change on wheat flowering time in eastern Australia. Agricultural and Forest Meteorology, 2015, 209-210, 11-21.	1.9	78
56	Impact of Spatial Soil and Climate Input Data Aggregation on Regional Yield Simulations. PLoS ONE, 2016, 11, e0151782.	1.1	78
57	Potato, sweet potato, and yam models for climate change: A review. Field Crops Research, 2014, 166, 173-185.	2.3	77
58	Can Egypt become self-sufficient in wheat?. Environmental Research Letters, 2018, 13, 094012.	2.2	76
59	Performance of the SUBSTOR-potato model across contrasting growing conditions. Field Crops Research, 2017, 202, 57-76.	2.3	75
60	Simulating phenology and yield response of canola to sowing date in Western Australia using the APSIM model. Australian Journal of Agricultural Research, 2002, 53, 1155.	1.5	74
61	Optimal N fertiliser management based on a seasonal forecast. European Journal of Agronomy, 2012, 38, 66-73.	1.9	74
62	Optimizing wheat productivity in two rain-fed environments of the West Asiaâ€"North Africa region using a simulation model. European Journal of Agronomy, 2007, 26, 121-129.	1.9	73
63	Impacts of recent climate change on wheat production systems in Western Australia. Climatic Change, 2009, 92, 495-517.	1.7	73
64	Adapting dryland agriculture to climate change: Farming implications and research and development needs in Western Australia. Climatic Change, 2013, 118, 167-181.	1.7	69
65	A SIMPLE crop model. European Journal of Agronomy, 2019, 104, 97-106.	1.9	67
66	Narrowing uncertainties in the effects of elevated CO2 on crops. Nature Food, 2020, 1, 775-782.	6.2	67
67	Lessons from climate modeling on the design and use of ensembles for crop modeling. Climatic Change, 2016, 139, 551-564.	1.7	66
68	Climate change impact on Mexico wheat production. Agricultural and Forest Meteorology, 2018, 263, 373-387.	1.9	66
69	Environmental and genotypic control of time to flowering in canola and Indian mustard. Australian Journal of Agricultural Research, 2002, 53, 793.	1.5	65
70	A regional nuclear conflict would compromise global food security. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 7071-7081.	3.3	63
71	Large potential for crop production adaptation depends on available future varieties. Global Change Biology, 2021, 27, 3870-3882.	4.2	62
72	Evaluating the Impact of a Trait for Increased Specific Leaf Area on Wheat Yields Using a Crop Simulation Model. Agronomy Journal, 2003, 95, 10.	0.9	61

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73	A simulation analysis that predicts the influence of physiological traits on the potential yield of wheat. European Journal of Agronomy, 2002, 17, 123-141.	1.9	59
74	Australian wheat production expected to decrease by the late 21st century. Global Change Biology, 2018, 24, 2403-2415.	4.2	59
75	Performance of DSSAT-Nwheat across a wide range of current and future growing conditions. European Journal of Agronomy, 2016, 81, 27-36.	1.9	58
76	Canopy CO2 assimilation, energy balance, and water use efficiency of an alfalfa crop before and after cutting. Field Crops Research, 2000, 67, 191-206.	2.3	56
77	Making the most of climate impacts ensembles. Nature Climate Change, 2014, 4, 77-80.	8.1	54
78	An AgMIP framework for improved agricultural representation in integrated assessment models. Environmental Research Letters, 2017, 12, 125003.	2.2	54
79	Modelling root growth of wheat as the linkage between crop and soil. Plant and Soil, 1997, 190, 267-277.	1.8	53
80	Climate impact and adaptation to heat and drought stress of regional and global wheat production. Environmental Research Letters, 2021, 16, 054070.	2.2	52
81	Sources of uncertainty for wheat yield projections under future climate are site-specific. Nature Food, 2020, 1, 720-728.	6.2	51
82	Simulation of environmental and genetic effects on grain protein concentration in wheat. European Journal of Agronomy, 2006, 25, 119-128.	1.9	50
83	Quantifying the interactive impacts of global dimming and warming on wheat yield and water use in China. Agricultural and Forest Meteorology, 2013, 182-183, 342-351.	1.9	50
84	Multi-wheat-model ensemble responses to interannual climate variability. Environmental Modelling and Software, 2016, 81, 86-101.	1.9	50
85	Plant available soil water at sowing in Mediterranean environmentsâ€"Is it a useful criterion to aid nitrogen fertiliser and sowing decisions?. Field Crops Research, 2009, 114, 127-136.	2.3	48
86	Simulating the impact of source-sink manipulations in wheat. Field Crops Research, 2017, 202, 47-56.	2.3	48
87	Uncertainty of wheat water use: Simulated patterns and sensitivity to temperature and CO2. Field Crops Research, 2016, 198, 80-92.	2.3	47
88	Classifying multi-model wheat yield impact response surfaces showing sensitivity to temperature and precipitation change. Agricultural Systems, 2018, 159, 209-224.	3.2	47
89	Trade-off between wheat yield and drainage under current and climate change conditions in northeast Germany. European Journal of Agronomy, 2006, 24, 333-342.	1.9	46
90	Nitrogen and water flows under pasture - wheat and lupin - wheat rotations in deep sands in Western Australia. 1. Nitrogen fixation in legumes, net N mineralisation,and utilisation of soil-derived nitrogen. Australian Journal of Agricultural Research, 1998, 49, 329.	1.5	46

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91	The potential value of seasonal forecasts of rainfall categoriesâ€"Case studies from the wheatbelt in Western Australia's Mediterranean region. Agricultural and Forest Meteorology, 2008, 148, 606-618.	1.9	45
92	CGIAR modeling approaches for resourceâ€constrained scenarios: I. Accelerating crop breeding for a changing climate. Crop Science, 2020, 60, 547-567.	0.8	45
93	Potential deep drainage under wheat crops in a Mediterranean climate. II. Management opportunities to control drainage. Australian Journal of Agricultural Research, 2001, 52, 57.	1.5	45
94	Baseline simulation for global wheat production with CIMMYT mega-environment specific cultivars. Field Crops Research, 2017, 202, 122-135.	2.3	44
95	Different uncertainty distribution between high and low latitudes in modelling warming impacts on wheat. Nature Food, 2020, 1, 63-69.	6.2	43
96	Effect of weather data aggregation on regional crop simulation for different crops, production conditions, and response variables. Climate Research, 2015, 65, 141-157.	0.4	43
97	Modelling the effects of post-heading heat stress on biomass growth of winter wheat. Agricultural and Forest Meteorology, 2017, 247, 476-490.	1.9	42
98	The upper temperature thresholds of life. Lancet Planetary Health, The, 2021, 5, e378-e385.	5.1	41
99	Yield and environmental benefits of ameliorating subsoil constraints under variable rainfall in a Mediterranean environment. Plant and Soil, 2007, 297, 29-42.	1.8	40
100	Modelling wheat yield change under CO2 increase, heat and water stress in relation to plant available water capacity in eastern Australia. European Journal of Agronomy, 2017, 90, 152-161.	1.9	39
101	Variability of effects of spatial climate data aggregation on regional yield simulation by crop models. Climate Research, 2015, 65, 53-69.	0.4	39
102	Yield benefits of triticale traits for wheat under current and future climates. Field Crops Research, 2011, 124, 14-24.	2.3	38
103	Simulating cultivar variations in potato yields for contrasting environments. Agricultural Systems, 2016, 145, 51-63.	3.2	38
104	Modelling the effects of heat stress on post-heading durations in wheat: A comparison of temperature response routines. Agricultural and Forest Meteorology, 2016, 222, 45-58.	1.9	37
105	Understanding the Genetic Basis of Spike Fertility to Improve Grain Number, Harvest Index, and Grain Yield in Wheat Under High Temperature Stress Environments. Frontiers in Plant Science, 2019, 10, 1481.	1.7	37
106	Influences of increasing temperature on Indian wheat: quantifying limits to predictability. Environmental Research Letters, 2013, 8, 034016.	2.2	36
107	How does inter-annual variability of attainable yield affect the magnitude of yield gaps for wheat and maize? An analysis at ten sites. Agricultural Systems, 2018, 159, 199-208.	3.2	36
108	Physical robustness of canopy temperature models for crop heat stress simulation across environments and production conditions. Field Crops Research, 2018, 216, 75-88.	2.3	36

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109	Soil Organic Carbon and Nitrogen Feedbacks on Crop Yields under Climate Change. Agricultural and Environmental Letters, 2018, 3, 180026.	0.8	36
110	Spatial sampling of weather data for regional crop yield simulations. Agricultural and Forest Meteorology, 2016, 220, 101-115.	1.9	35
111	Title is missing!. Plant and Soil, 2003, 254, 349-360.	1.8	33
112	Simulating lucerne growth and water use on diverse soil types in a Mediterranean-type environment. Australian Journal of Agricultural Research, 2005, 56, 503.	1.5	32
113	Simulation Modeling: Applications in Cropping Systems. , 2014, , 102-112.		32
114	Wheat Responses to Climate Change and Its Adaptations: A Focus on Arid and Semi-arid Environment. International Journal of Environmental Research, 2018, 12, 117-126.	1.1	32
115	A statistical analysis of three ensembles of crop model responses to temperature and CO2 concentration. Agricultural and Forest Meteorology, 2015, 214-215, 483-493.	1.9	31
116	Adapting irrigated and rainfed wheat to climate change in semi-arid environments: Management, breeding options and land use change. European Journal of Agronomy, 2019, 109, 125915.	1.9	31
117	The chaos in calibrating crop models: Lessons learned from a multi-model calibration exercise. Environmental Modelling and Software, 2021, 145, 105206.	1.9	31
118	Spatiotemporal changes in wheat phenology, yield and water use efficiency under the CMIP5 multimodel ensemble projections in eastern Australia. Climate Research, 2017, 72, 83-99.	0.4	30
119	Mapping subsoil acidity and shallow soil across a field with information from yield maps, geophysical sensing and the grower. Precision Agriculture, 2008, 9, 3-15.	3.1	29
120	Systems analysis of wheat production on low water-holding soils in a Mediterranean-type environment. Field Crops Research, 2008, 105, 97-106.	2.3	29
121	Effects of climate trends and variability on wheat yield variability in eastern Australia. Climate Research, 2015, 64, 173-186.	0.4	29
122	Future farms without farmers. Science Robotics, 2019, 4, .	9.9	29
123	Global wheat production could benefit from closing the genetic yield gap. Nature Food, 2022, 3, 532-541.	6.2	29
124	The implication of input data aggregation on up-scaling soil organic carbon changes. Environmental Modelling and Software, 2017, 96, 361-377.	1.9	28
125	Soil water extraction and biomass production by lucerne in the south of Western Australia. Australian Journal of Agricultural Research, 2005, 56, 389.	1.5	28
126	A flexible approach to managing variability in grain yield and nitrate leaching at within-field to farm scales. Precision Agriculture, 2006, 7, 405-417.	3.1	27

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127	Estimating model prediction error: Should you treat predictions as fixed or random?. Environmental Modelling and Software, 2016, 84, 529-539.	1.9	27
128	How well do crop modeling groups predict wheat phenology, given calibration data from the target population?. European Journal of Agronomy, 2021, 124, 126195.	1.9	27
129	A wiring diagram to integrate physiological traits of wheat yield potential. Nature Food, 2022, 3, 318-324.	6.2	27
130	Simulating lupin development, growth, and yield in a Mediterranean environment. Australian Journal of Agricultural Research, 2004, 55, 863.	1.5	26
131	High ear number is key to achieving high wheat yields in the high-rainfall zone of south-western Australia. Australian Journal of Agricultural Research, 2007, 58, 21.	1.5	26
132	Evaluating the precision of eight spatial sampling schemes in estimating regional means of simulated yield for two crops. Environmental Modelling and Software, 2016, 80, 100-112.	1.9	26
133	Modelling Root System Growth and Architecture. , 2000, , 113-146.		26
134	Crop modeling for climate change impact and adaptation. , 2015, , 505-546.		25
135	Consequences of rainfall during summer - autumn fallow on available soil water and subsequent drainage in annual-based cropping systems. Australian Journal of Agricultural Research, 2006, 57, 281.	1.5	25
136	An analysis of the frequency and timing of false break events in the Mediterranean region of Western Australia. Australian Journal of Agricultural Research, 2001, 52, 367.	1.5	25
137	A review of tef physiology for developing a tef crop model. European Journal of Agronomy, 2018, 94, 54-66.	1.9	24
138	â€˜Haying-off' in wheat is predicted to increase under a future climate in south-eastern Australia. Crop and Pasture Science, 2012, 63, 593.	0.7	23
139	The value of seasonal forecasts for irrigated, supplementary irrigated, and rainfed wheat cropping systems in northwest Mexico. Agricultural Systems, 2016, 147, 76-86.	3.2	23
140	Is a 10-day rainfall forecast of value in dry-land wheat cropping?. Agricultural and Forest Meteorology, 2016, 216, 170-176.	1.9	23
141	Managing mixed wheatâ€“sheep farms with a seasonal forecast. Agricultural Systems, 2012, 113, 50-56.	3.2	21
142	Does decadal climate variation influence wheat and maize production in the southeast USA?. Agricultural and Forest Meteorology, 2015, 204, 1-9.	1.9	21
143	Modification of the CERES grain sorghum model to simulate optimum sweet sorghum rooting depth for rainfed production on coarse textured soils in a sub-tropical environment. Agricultural Water Management, 2017, 181, 47-55.	2.4	21
144	Has climate change opened new opportunities for wheat cropping in Argentina?. Climatic Change, 2013, 117, 181-196.	1.7	20

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145	Modeling the effects of tropospheric ozone on wheat growth and yield. European Journal of Agronomy, 2019, 105, 13-23.	1.9	18
146	Wheat response to alternative crops on a duplex soil. Australian Journal of Experimental Agriculture, 1998, 38, 481.	1.0	17
147	Systems analysis of wheat production on low water-holding soils in a Mediterranean-type environment. Field Crops Research, 2008, 107, 211-220.	2.3	17
148	Crop Physiology, Modelling and Climate Change. , 2009, , 511-543.		17
149	Multi-model evaluation of phenology prediction for wheat in Australia. Agricultural and Forest Meteorology, 2021, 298-299, 108289.	1.9	17
150	Modeling the response of winter wheat phenology to low temperature stress at elongation and booting stages. Agricultural and Forest Meteorology, 2021, 303, 108376.	1.9	17
151	Evaluating the fidelity of downscaled climate data on simulated wheat and maize production in the southeastern US. Regional Environmental Change, 2013, 13, 101-110.	1.4	15
152	Modelling the effects of post-heading heat stress on biomass partitioning, and grain number and weight of wheat. Journal of Experimental Botany, 2020, 71, 6015-6031.	2.4	15
153	Comparing process-based wheat growth models in their simulation of yield losses caused by plant diseases. Field Crops Research, 2021, 265, 108108.	2.3	15
154	Reliability of canola production in different rainfall zones of Western Australia. Australian Journal of Agricultural Research, 2007, 58, 326.	1.5	15
155	Estimating spatially variable deep drainage across a central-eastern wheatbelt catchment, Western Australia. Australian Journal of Agricultural Research, 2003, 54, 789.	1.5	14
156	Impacts of tropospheric ozone and climate change on Mexico wheat production. Climatic Change, 2019, 155, 157-174.	1.7	14
157	BLIGHTSIM: A New Potato Late Blight Model Simulating the Response of Phytophthora infestans to Diurnal Temperature and Humidity Fluctuations in Relation to Climate Change. Pathogens, 2020, 9, 659.	1.2	14
158	Irrigation method and application timing effect on potato nitrogen fertilizer uptake efficiency. Nutrient Cycling in Agroecosystems, 2018, 112, 253-264.	1.1	13
159	Evaluation of crop model prediction and uncertainty using Bayesian parameter estimation and Bayesian model averaging. Agricultural and Forest Meteorology, 2021, 311, 108686.	1.9	13
160	Tailoring wheat management to ENSO phases for increased wheat production in Paraguay. Climate Risk Management, 2014, 3, 24-38.	1.5	12
161	Using historical climate observations to understand future climate change crop yield impacts in the Southeastern US. Climatic Change, 2016, 134, 311-326.	1.7	12
162	Cropping Systems and Climate Change in Humid Subtropical Environments. Agronomy, 2018, 8, 19.	1.3	12

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163	Importance of genetic parameters and uncertainty of MANIHOT, a new mechanistic cassava simulation model. European Journal of Agronomy, 2020, 115, 126031.	1.9	12
164	Modeling growth, development and yield of cassava: A review. Field Crops Research, 2021, 267, 108140.	2.3	12
165	Modelling Genotype Ã— Environment Ã— Management Interactions to Improve Yield, Water Use Efficiency and Grain Protein in Wheat. , 0, , 93-103.		12
166	Rainfallâ€"humanâ€"spatial interactions in a salinity-prone agricultural region of the Western Australian wheat-belt. Ecological Modelling, 2010, 221, 812-824.	1.2	11
167	Uncertainties in Scaling-Up Crop Models for Large-Area Climate Change Impact Assessments. ICP Series on Climate Change Impacts, Adaptation, and Mitigation, 2015, , 261-277.	0.4	11
168	The AgMIP Coordinated Climate-Crop Modeling Project (C3MP): Methods and Protocols. ICP Series on Climate Change Impacts, Adaptation, and Mitigation, 2015, , 191-220.	0.4	10
169	Testing a crop model with extreme low yields from historical district records. Field Crops Research, 2020, 249, 107269.	2.3	10
170	Climate change impacts and adaptations for wheat employing multiple climate and crop modelsin Pakistan. Climatic Change, 2020, 163, 253-266.	1.7	10
171	Genetic dissection of heat-responsive physiological traits to improve adaptation and increase yield potential in soft winter wheat. BMC Genomics, 2020, 21, 315.	1.2	10
172	Protocol for life cycle assessment modeling of US fruit and vegetable supply chains- cases of processed potato and tomato products. Data in Brief, 2021, 34, 106639.	0.5	10
173	Supply chains for processed potato and tomato products in the United States will have enhanced resilience with planting adaptation strategies. Nature Food, 2021, 2, 862-872.	6.2	10
174	Simulation of winter wheat response to variable sowing dates and densities in a high-yielding environment. Journal of Experimental Botany, 2022, 73, 5715-5729.	2.4	10
175	Modelâ€Driven Multidisciplinary Global Research to Meet Future Needs: The Case for â€œImproving Radiation Use Efficiency to Increase Yieldâ€. Crop Science, 2019, 59, 843-849.	0.8	9
176	Agriculture and Climate Change in the Southeast USA. , 2013, , 128-164.		8
177	Uncertainties of Climate Change Impacts in Agriculture. Procedia Environmental Sciences, 2015, 29, 304.	1.3	8
178	Separating the impacts of heat stress events from rising mean temperatures on winter wheat yield of China. Environmental Research Letters, 2021, 16, 124035.	2.2	8
179	Benchmark data set for wheat growth models: field experiments and AgMIP multi-model simulations. Open Data Journal for Agricultural Research, 2015, 1, 1-5.	1.3	7
180	Extreme lows of wheat production in Brazil. Environmental Research Letters, 2021, 16, 104025.	2.2	6

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181	iCROPM 2020: Crop Modeling for the Future. Journal of Agricultural Science, 2020, 158, 791-793.	0.6	6
182	Adaptation of the SIMPLE Model to Oilseed Flax (Linum usitatissimum L.) for Arid and Semi-Arid Environments. Agronomy, 2022, 12, 1267.	1.3	6
183	Water excess under simulated lucerne - wheat phased systems in Western Australia. Australian Journal of Agricultural Research, 2007, 58, 826.	1.5	5
184	Optimizing triticale sowing densities across the Mediterranean Basin. Field Crops Research, 2013, 144, 167-178.	2.3	4
185	Simulation Models as Tools for Crop Management. , 2019, , 433-452.		3
186	A Crop Simulation Model for Tef (Eragrostis tef (Zucc.) Trotter). Agronomy, 2019, 9, 817.	1.3	3
187	Comparing the effects of growing conditions on simulated Ethiopian tef and wheat yields. Agricultural and Forest Meteorology, 2019, 266-267, 208-220.	1.9	3
188	Implications of new technologies for future food supply systems. Journal of Agricultural Science, 2021, 159, 315-319.	0.6	3
189	Statistical Analysis of Large Simulated Yield Datasets for Studying Climate Effects. ICP Series on Climate Change Impacts, Adaptation, and Mitigation, 2015, , 279-295.	0.4	2
190	Improving Wheat Production and Breeding Strategies Using Crop Models. , 2022, , 573-591.		2
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