Wenyuan Gao

List of Publications by Citations

103 papers	2,363 citations	27 h-index	44 g-index
110 ext. papers	2,867 ext. citations	4.6 avg, IF	5 L-index

#	Paper	IF	Citations
103	Chemical study and medical application of saponins as anti-cancer agents. *Fitoterapia*, **2010**, 81, 703-14	3.2	265
102	Jasmonic acid improves ginsenoside accumulation in adventitious root culture of Panax ginseng C.A. Meyer. *Biochemical Engineering Journal*, **2002**, 11, 211-215	4.2	161
101	Chemical composition and antioxidant and anti-inflammatory potential of peels and flesh from 10 different pear varieties (Pyrus spp.). *Food Chemistry*, **2014**, 152, 531-8	8.5	115
100	The genus Polygonatum: A review of ethnopharmacology, phytochemistry and pharmacology. *Journal of Ethnopharmacology*, **2018**, 214, 274-291	5	92
99	Anticancer drugs from traditional toxic Chinese medicines. *Phytotherapy Research*, **2012**, 26, 1449-65	6.7	84
98	Antitumor and antimetastatic activities of Rhizoma Paridis saponins. *Steroids*, **2009**, 74, 1051-6	2.8	74
97	Protective effect of tetrahydropalmatine against d-galactose induced memory impairment in rat. *Physiology and Behavior*, **2016**, 154, 114-25	3.5	70
96	Anti-diabetic activity in type 2 diabetic mice and α-glucosidase inhibitory, antioxidant and anti-inflammatory potential of chemically profiled pear peel and pulp extracts (Pyrus spp.). *Journal of Functional Foods*, **2015**, 13, 276-288	5.1	63
95	Characterization of steroidal saponins in saponin extract from Paris polyphylla by liquid chromatography tandem multi-stage mass spectrometry. *Analytical and Bioanalytical Chemistry*, **2009**, 395, 495-505	4.4	61
94	The effect of different extraction techniques on property and bioactivity of polysaccharides from Dioscorea hemsleyi. *International Journal of Biological Macromolecules*, **2017**, 102, 847-856	7.9	56
93	Purification, characterization and immunomodulatory activity of fructans from Polygonatum odoratum and P. cyrtonema. *Carbohydrate Polymers*, **2019**, 214, 44-52	10.3	51
92	Qualitative and quantitative determination of major saponins in Paris and Trillium by HPLC-ELSD and HPLC-MS/MS. *Journal of Chromatography B: Analytical Technologies in the Biomedical and Life Sciences*, **2010**, 878, 2943-8	3.2	51
91	Physicochemical properties and in vitro digestion of starches from different Dioscorea plants. *Food Hydrocolloids*, **2013**, 32, 432-439	10.6	43
90	Effects of drying processes on starch-related physicochemical properties, bioactive components and antioxidant properties of yam flours. *Food Chemistry*, **2017**, 224, 224-232	8.5	42
89	Preparation, physicochemical characterization and biological activities of two modified starches from yam (Dioscorea Opposita Thunb.). *Food Hydrocolloids*, **2016**, 55, 244-253	10.6	40
88	Chemosensitizing effect of Paris Saponin I on Camptothecin and 10-hydroxycamptothecin in lung cancer cells via p38 MAPK, ERK, and Akt signaling pathways. *European Journal of Medicinal Chemistry*, **2017**, 125, 760-769	6.8	37
87	Active compounds, antioxidant activity and α-glucosidase inhibitory activity of different varieties of Chaenomeles fruits. *Food Chemistry*, **2018**, 248, 330-339	8.5	36

86	Effects of nitrogen source and phosphate concentration on biomass and metabolites accumulation in adventitious root culture of Glycyrrhiza uralensis Fisch. *Acta Physiologiae Plantarum*, **2014**, 36, 915-921	2.6	34
85	Cluster analysis of ginseng tissue cultures, dynamic change of growth, total saponins, specific oxygen uptake rate in bioreactor and immuno-regulative effect of ginseng adventitious root. *Industrial Crops and Products*, **2013**, 41, 57-63	5.9	33
84	Effect of blanching and drying temperatures on starch-related physicochemical properties, bioactive components and antioxidant activities of yam flours. *LWT - Food Science and Technology*, **2017**, 82, 303-310	5.4	32
83	Physicochemical characterizations of polysaccharides from Angelica Sinensis Radix under different drying methods for various applications. *International Journal of Biological Macromolecules*, **2019**, 121, 381-389	7.9	32
82	Fungal elicitors enhance ginsenosides biosynthesis, expression of functional genes as well as signal molecules accumulation in adventitious roots of Panax ginseng C. A. Mey. *Journal of Biotechnology*, **2016**, 239, 106-114	3.7	31
81	Effect of methyl jasmonate on the ginsenoside content of Panax ginseng adventitious root cultures and on the genes involved in triterpene biosynthesis. *Research on Chemical Intermediates*, **2013**, 39, 1973-1980	2.8	31
80	Formosanin C-inhibited pulmonary metastasis through repression of matrix metalloproteinases on mouse lung adenocarcinoma. *Cancer Biology and Therapy*, **2011**, 11, 592-8	4.6	31
79	Induction and characterization of adventitious roots directly from the explants of Panax notoginseng. *Biotechnology Letters*, **2005**, 27, 1771-5	3	29
78	Comparative study on hemostatic, cytotoxic and hemolytic activities of different species of Paris L. *Journal of Ethnopharmacology*, **2012**, 142, 789-94	5	28
77	Chemical Composition and Bioactivities of Two Common Chaenomeles Fruits in China: Chaenomeles speciosa and Chaenomeles sinensis. *Journal of Food Science*, **2016**, 81, H2049-58	3.4	27
76	Comparative susceptibilities to alkali-treatment of A-, B- and C-type starches of Dioscorea zingiberensis, Dioscorea persimilis and Dioscorea opposita. *Food Hydrocolloids*, **2014**, 39, 286-294	10.6	27
75	Transcriptome profiling shows gene regulation patterns in ginsenoside pathway in response to methyl jasmonate in Panax Quinquefolium adventitious root. *Scientific Reports*, **2016**, 6, 37263	4.9	26
74	Characterisation and saccharide mapping of polysaccharides from four common Polygonatum spp. *Carbohydrate Polymers*, **2020**, 233, 115836	10.3	25
73	Pharmacological evaluation of sedative-hypnotic activity and gastro-intestinal toxicity of Rhizoma Paridis saponins. *Journal of Ethnopharmacology*, **2012**, 144, 67-72	5	25
72	Influence of sucrose concentration and phosphate source on biomass and metabolite accumulation in adventitious roots of Pseudostellaria heterophylla. *Acta Physiologiae Plantarum*, **2013**, 35, 1579-1585	2.6	25
71	Role of effective composition on antioxidant, anti-inflammatory, sedative-hypnotic capacities of 6 common edible Lilium varieties. *Journal of Food Science*, **2015**, 80, H857-68	3.4	24
70	Identification of triterpenoids and flavonoids, step-wise aeration treatment as well as antioxidant capacity of Glycyrrhiza uralensis Fisch. cell. *Industrial Crops and Products*, **2013**, 49, 675-681	5.9	21
69	A synergistic antitumor effect of polyphyllin I and formosanin C on hepatocarcinoma cells. *Bioorganic and Medicinal Chemistry Letters*, **2016**, 26, 4970-4975	2.9	20

68	Inhibition of matrix metalloproteinases related to metastasis by diosgenyl and pennogenyl saponins. *Journal of Ethnopharmacology*, **2011**, 137, 1221-7	5	20
67	The protective effects of Aquilariae Lignum Resinatum extract on 5-Fuorouracil-induced intestinal mucositis in mice. *Phytomedicine*, **2019**, 54, 308-317	6.5	18
66	Optimization and quality assessment of adventitious roots culture in Panax quinquefolium L.. *Acta Physiologiae Plantarum*, **2014**, 36, 713-719	2.6	17
65	Inhibition of lung cancer in diethylnitrosamine-induced mice by Rhizoma paridis saponins. *Molecular Carcinogenesis*, **2017**, 56, 1405-1413	5	16
64	Aspergillus niger Enhance Bioactive Compounds Biosynthesis As Well As Expression of Functional Genes in Adventitious Roots of Glycyrrhiza uralensis Fisch. *Applied Biochemistry and Biotechnology*, **2016**, 178, 576-93	3.2	16
63	Chemical analysis and anti-inflammatory comparison of the cell culture of Glycyrrhiza with its field cultivated variety. *Food Chemistry*, **2013**, 136, 513-7	8.5	16
62	Paris Saponin II induced apoptosis via activation of autophagy in human lung cancer cells. *Chemico-Biological Interactions*, **2016**, 253, 125-33	5	16
61	Establishment and quality assessment of tissue cultures in Glycyrrhiza uralensis Fisch. *Applied Biochemistry and Biotechnology*, **2013**, 169, 588-94	3.2	15
60	Identification of chemical constituents in Rhizoma Paridis Saponins and their oral administration in rat plasma by UPLC/Q-TOF/MS. *Biomedical Chromatography*, **2011**, 25, 712-9	1.7	15
59	Study on the effects of different drying methods on physicochemical properties, structure, and in vitro digestibility of Fritillaria thunbergii Miq. (Zhebeimu) flours. *Food and Bioproducts Processing*, **2016**, 98, 266-274	4.9	14
58	The synergistic anticancer effect of formosanin C and polyphyllin VII based on caspase-mediated cleavage of Beclin1 inhibiting autophagy and promoting apoptosis. *Cell Proliferation*, **2019**, 52, e12520	7.9	14
57	Dioscin-6'-O-acetate inhibits lung cancer cell proliferation via inducing cell cycle arrest and caspase-dependent apoptosis. *Phytomedicine*, **2019**, 53, 124-133	6.5	13
56	Complex formation, physicochemical properties of different concentration of palmitic acid yam (Dioscorea pposita Thunb.) starch preparation mixtures. *LWT - Food Science and Technology*, **2019**, 101, 130-137	5.4	13
55	Jasmonic acid and methyl dihydrojasmonate enhance saponin biosynthesis as well as expression of functional genes in adventitious roots of Panax notoginseng F.H. Chen. *Biotechnology and Applied Biochemistry*, **2017**, 64, 225-238	2.8	12
54	Protective effect of magnolol on oxaliplatin-induced intestinal injury in mice. *Phytotherapy Research*, **2019**, 33, 1161-1172	6.7	12
53	Comparative studies on characterization, saccharide mapping and antiglycation activity of polysaccharides from different Polygonatum ssp. *Journal of Pharmaceutical and Biomedical Analysis*, **2020**, 186, 113243	3.5	12
52	Advances in ginsenoside biosynthesis and metabolic regulation. *Biotechnology and Applied Biochemistry*, **2018**, 65, 514-522	2.8	12
51	Influence of the drying method on the bioactive compounds and pharmacological activities of rhubarb. *Journal of the Science of Food and Agriculture*, **2018**, 98, 3551-3562	4.3	12

50	Synergistic effects of Rhizoma Paridis and Rhizoma Curcuma longa on different animal tumor models. *Environmental Toxicology and Pharmacology*, **2014**, 38, 31-40	5.8	12
49	Metabolic regulatory network alterations reveal different therapeutic effects of cisplatin and Rhizoma paridis saponins in Lewis pulmonary adenoma mice. *RSC Advances*, **2016**, 6, 115029-115038	3.7	11
48	Assessment of genetic fidelity and composition: Mixed elicitors enhance triterpenoid and flavonoid biosynthesis of Glycyrrhiza uralensis Fisch. tissue cultures. *Biotechnology and Applied Biochemistry*, **2017**, 64, 211-217	2.8	10
47	Effect of stir-frying time during Angelica Sinensis Radix processing with wine on physicochemical, structure properties and bioactivities of polysaccharides. *Process Biochemistry*, **2019**, 81, 188-196	4.8	10
46	HPLC-ESI-MS(n) Analysis, Fed-Batch Cultivation Enhances Bioactive Compound Biosynthesis and Immune-Regulative Effect of Adventitious Roots in Pseudostellaria heterophylla. *Applied Biochemistry and Biotechnology*, **2015**, 177, 63-75	3.2	10
45	A WRKY transcription factor, PgWRKY4X, positively regulates ginsenoside biosynthesis by activating squalene epoxidase transcription in Panax ginseng. *Industrial Crops and Products*, **2020**, 154, 112671	5.9	10
44	Inhibition of urethane-induced lung carcinogenesis in mice by a Rhizoma paridis saponin involved EGFR/PI3K/Akt pathway. *RSC Advances*, **2016**, 6, 92330-92334	3.7	10
43	Effect of different solvents on the chemical composition, antioxidant activity and alpha-glucosidase inhibitory activity of hawthorn extracts. *International Journal of Food Science and Technology*, **2016**, 51, 1244-1251	3.8	10
42	Cerebralcare Granule(□), a Chinese Herb Compound Preparation, Attenuates D-Galactose Induced Memory Impairment in Mice. *Neurochemical Research*, **2016**, 41, 2199-214	4.6	9
41	Novel phenanthrene and isocoumarin from the rhizomes of Dioscorea nipponica Makino subsp. rosthornii (Prain et Burkill) C. T. Ting (Dioscoreaceae). *Bioorganic and Medicinal Chemistry Letters*, **2017**, 27, 3595-3601	2.9	8
40	Protective effect and potential mechanisms of Wei-Chang-An pill on high-dose 5-fluorouracil-induced intestinal mucositis in mice. *Journal of Ethnopharmacology*, **2016**, 190, 200-11	5	8
39	A new acetylated spirostanol saponin and other constituents from the rhizomes of Dioscorea althaeoides R. Knuth (Dioscoreaceae). *Biochemical Systematics and Ecology*, **2016**, 65, 17-22	1.4	8
38	Bidirectional effects of methanol extract of Wei-Chang-An pill on gastrointestinal transit and the spasmolytic activity on isolated rat jejunum. *Journal of Ethnopharmacology*, **2014**, 155, 203-12	5	8
37	Gene expression of glycyrrhizin acid and accumulation of endogenous signaling molecule in Glycyrrhiza uralensis Fisch adventitious roots after Saccharomyces cerevisiae and Meyerozyma guilliermondii applications. *Biotechnology and Applied Biochemistry*, **2017**, 64, 700-711	2.8	8
36	Paris saponin II-induced paraptosis-associated cell death increased the sensitivity of cisplatin. *Toxicology and Applied Pharmacology*, **2020**, 406, 115206	4.6	8
35	Effects of temperature during processing with wine on chemical composition, antioxidant capacity and enzyme inhibition activities of Angelica Sinensis Radix. *International Journal of Food Science and Technology*, **2017**, 52, 1324-1332	3.8	7
34	Screening and evaluation of adventitious root lines of Panax notoginseng by morphology, gene expression, and metabolite profiles. *Applied Microbiology and Biotechnology*, **2019**, 103, 4405-4415	5.7	7
33	Paris saponin I inhibits proliferation and promotes apoptosis through down-regulating AKT activity in human non-small-cell lung cancer cells and inhibiting ERK expression in human small-cell lung cancer cells. *RSC Advances*, **2016**, 6, 70816-70824	3.7	7

32	Reparative activity of costunolide and dehydrocostus in a mouse model of 5-fluorouracil-induced intestinal mucositis. *RSC Advances*, **2016**, 6, 5249-5258	3.7	7
31	Production of saponions and polysaccharide in the presence of lactoalbumin hydrolysate in Panax quinquefolium L. cells cultures. *Plant Growth Regulation*, **2011**, 63, 217-223	3.2	7
30	Quality evaluation of Panax ginseng adventitious roots based on ginsenoside constituents, functional genes, and ferric-reducing antioxidant power. *Journal of Food Biochemistry*, **2019**, 43, e12901	3.3	6
29	Quantitative studies of rhubarb using quantitative analysis of multicomponents by single marker and response surface methodology. *Journal of Separation Science*, **2017**, 40, 3792-3800	3.4	6
28	Gradually scale-up culture in a bioreactor promotes radical scavenging activity of Panax ginseng (C. A. Meyer) adventitious roots on 1,1-diphenyl-2-picrylhydrazyl. *Plant Growth Regulation*, **2012**, 67, 101-105	2.2	6
27	Promotion of ginsenosides production in a co-cultivation system of Panax ginseng adventitious roots and immobilized Aspergillus niger. *Industrial Crops and Products*, **2019**, 140, 111564	5.9	5
26	Chemotaxonomic studies of 12 Dioscorea species from China by UHPLC-QTOF-MS/MS analysis. *Phytochemical Analysis*, **2020**, 31, 164-182	3.4	5
25	Optimization of balloon-type bubble bioreactor angle and methyl jasmonate concentration to enhance metabolite production in adventitious roots of Pseudostellaria heterophylla. *Research on Chemical Intermediates*, **2015**, 41, 5555-5563	2.8	4
24	Protein elicitor isolated from Escherichia coli induced bioactive compound biosynthesis as well as gene expression in Glycyrrhiza uralensis Fisch adventitious roots. *RSC Advances*, **2016**, 6, 111622-111631	3.7	4
23	Effect of temperature on morphology, ginsenosides biosynthesis, functional genes, and transcriptional factors expression in Panax ginseng adventitious roots. *Journal of Food Biochemistry* , **2019**, 43, e12794	3.3	4
22	Endophytes, biotransforming microorganisms, and engineering microbial factories for triterpenoid saponins production. *Critical Reviews in Biotechnology*, **2021**, 41, 249-272	9.4	4
21	Physicochemical characterisation, digestibility and anticonstipation activity of some high-resistant untraditional starches from zingiberaceae plants. *International Journal of Food Science and Technology*, **2017**, 52, 617-625	3.8	3
20	Influence of step-wise aeration treatment on biomass and bioactive compounds of Panax ginseng adventitious root in balloon-type bubble bioreactor. *Research on Chemical Intermediates*, **2015**, 41, 623-629	2.8	3
19	Inhibitor discovery from pomegranate rind for targeting human salivary □amylase. *Medicinal Chemistry Research*, **2018**, 27, 1559-1577	2.2	3
18	Integrated morphology analysis, metabolomic analysis and gene expression to assess the quality of four adventitious roots lines of Glycyrrhiza uralensis Fisch. *Plant Cell, Tissue and Organ Culture*, **2018**, 135, 169-177	2.7	3
17	Oleanolic acid and ursolic acid as potential inhibitors of human salivary □amylase: insights from in vitro assays and in silico simulations. *Journal of Molecular Modeling*, **2017**, 23, 248	2	3
16	Dioscin-6□O-acetate impairs migration of lung cancer cells through attenuations of MMP-2 and MMP-9 via NF-□B suppression. *Medicinal Chemistry Research*, **2019**, 28, 1-12	2.2	3
15	Comparison of characterization and antioxidant activity of different citrus peel pectins.. *Food Chemistry*, **2022**, 386, 132683	8.5	3

14	Induction of signal molecules and expression of functional genes after Pichia pastoris stimulation in Glycyrrhiza uralensis Fisch adventitious roots. *Journal of Food Biochemistry*, **2019**, 43, e12798	3.3	2
13	Multicomponent quantitative analysis combined with antioxidant and alpha-glucosidase inhibitory activities for the quality evaluation of Gastrodia elata from different regions. *Biomedical Chromatography*, **2019**, 33, e4508	1.7	2
12	Effects of Rhizoma Parisdis total saponins and its main compounds on gastric emptying via regulating muscarinic receptors in vitro and in vivo. *RSC Advances*, **2017**, 7, 41163-41175	3.7	2
11	Molecular evidence supports simultaneous association of the achlorophyllous orchid Chamaegastrodia inverta with ectomycorrhizal Ceratobasidiaceae and Russulaceae. *BMC Microbiology*, **2020**, 20, 236	4.5	2
10	Cerebralcare Granule® enhances memantine hydrochloride efficacy in APP/PS1 mice by ameliorating amyloid pathology and cognitive functions. *Chinese Medicine*, **2021**, 16, 47	4.7	2
9	Chemometric analysis of active compounds and antioxidant and α-glucosidase inhibitory activities for the quality evaluation of licorice from different origins. *Biomedical Chromatography*, **2021**, 35, e5215	1.7	2
8	Microbiome-based screening and co-fermentation of rhizospheric microorganisms for highly ginsenoside Rg3 production. *Microbiological Research*, **2022**, 127054	5.3	2
7	Effects of Metal Nanoparticles and Other Preparative Materials in the Environment on Plants: From the Perspective of Improving Secondary Metabolites.. *Journal of Agricultural and Food Chemistry*, **2022**,	5.7	1
6	Pharmacokinetics profiles of polyphyllin II and polyphyllin VII in rats by liquid chromatography with tandem mass spectrometry. *Biomedical Chromatography*, **2021**, 35, e5083	1.7	1
5	Label-Free Proteomic Analysis of Smoke-Drying and Shade-Drying Processes of Postharvest Rhubarb: A Comparative Study. *Frontiers in Plant Science*, **2021**, 12, 663180	6.2	0
4	Quality evaluation of different varieties of rhubarb based on multicomponent and bioactivity: Committed to quality control in the production of rhubarb decoction pieces.. *Biomedical Chromatography*, **2022**, e5368	1.7	0
3	Physicochemical characteristics and immunoregulatory activities of polysaccharides from five cultivars of Chrysanthemi Flos.. *Food Science and Nutrition*, **2022**, 10, 1391-1400	3.2	0
2	Use of partial least-squares discriminant analysis to study the effects of gradual scale-up of culture, and optimization of bioreactor angle and aeration volume on culture of Panax quinquefolium L. adventitious roots in a 5-L balloon-type bubble bioreactor. *Research on Chemical Intermediates*, **2015**, 41, 6707-6720	2.8	
1	Combining network pharmacology with chromatographic fingerprinting and multi-component quantitative analysis for the quality evaluation of Astragali Radix.. *Biomedical Chromatography*, **2022**, e5319	1.7	