

Geoffrey B Fincher

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/9432932/publications.pdf>

Version: 2024-02-01

172
papers

13,473
citations

23544

58
h-index

24961

109
g-index

177
all docs

177
docs citations

177
times ranked

11507
citing authors

#	ARTICLE	IF	CITATIONS
1	A physical, genetic and functional sequence assembly of the barley genome. <i>Nature</i> , 2012, 491, 711-716.	13.7	1,416
2	Determining the polysaccharide composition of plant cell walls. <i>Nature Protocols</i> , 2012, 7, 1590-1607.	5.5	557
3	Heterogeneity in the chemistry, structure and function of plant cell walls. <i>Nature Chemical Biology</i> , 2010, 6, 724-732.	3.9	509
4	An Arabidopsis Callose Synthase, GSL5, Is Required for Wound and Papillary Callose Formation. <i>Plant Cell</i> , 2003, 15, 2503-2513.	3.1	443
5	Cellulose Synthase-Like CslF Genes Mediate the Synthesis of Cell Wall (1,3;1,4)- β -D-Glucans. <i>Science</i> , 2006, 311, 1940-1942.	6.0	422
6	The Cesa Gene Family of Barley. Quantitative Analysis of Transcripts Reveals Two Groups of Co-Expressed Genes. <i>Plant Physiology</i> , 2004, 134, 224-236.	2.3	275
7	Evolution of the Grain Dispersal System in Barley. <i>Cell</i> , 2015, 162, 527-539.	13.5	265
8	Virus-Induced Silencing of a Plant Cellulose Synthase Gene. <i>Plant Cell</i> , 2000, 12, 691-705.	3.1	249
9	A barley cellulose synthase-like CSLH gene mediates (1,3;1,4)- β -D-glucan synthesis in transgenic Arabidopsis. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2009, 106, 5996-6001.	3.3	246
10	Changes in Cell Wall Composition during Ripening of Grape Berries. <i>Plant Physiology</i> , 1998, 118, 783-792.	2.3	229
11	Three-dimensional structure of a barley β -D-glucan exohydrolase, a family 3 glycosyl hydrolase. <i>Structure</i> , 1999, 7, 179-190.	1.6	219
12	Starch granule initiation and growth are altered in barley mutants that lack isoamylase activity. <i>Plant Journal</i> , 2002, 31, 97-112.	2.8	219
13	The Genetics and Transcriptional Profiles of the Cellulose Synthase-Like HvCslF Gene Family in Barley. <i>Plant Physiology</i> , 2008, 146, 1821-1833.	2.3	204
14	Plant cell wall biosynthesis: genetic, biochemical and functional genomics approaches to the identification of key genes. <i>Plant Biotechnology Journal</i> , 2006, 4, 145-167.	4.1	183
15	Revolutionary Times in Our Understanding of Cell Wall Biosynthesis and Remodeling in the Grasses. <i>Plant Physiology</i> , 2009, 149, 27-37.	2.3	182
16	Changes in cell wall polysaccharides in developing barley (<i>Hordeum vulgare</i>) coleoptiles. <i>Planta</i> , 2005, 221, 729-738.	1.6	181
17	An Investigation of Boron Toxicity in Barley Using Metabolomics. <i>Plant Physiology</i> , 2006, 142, 1087-1101.	2.3	174
18	Expression patterns of cell wall-modifying enzymes during grape berry development. <i>Planta</i> , 2001, 214, 257-264.	1.6	172

#	ARTICLE	IF	CITATIONS
19	Overexpression of specific HvCslF cellulose synthase-like genes in transgenic barley increases the levels of cell wall (1,3;1,4)-D-glucans and alters their fine structure. <i>Plant Biotechnology Journal</i> , 2011, 9, 117-135.	4.1	171
20	REVIEW: Variability in Fine Structures of Noncellulosic Cell Wall Polysaccharides from Cereal Grains: Potential Importance in Human Health and Nutrition. <i>Cereal Chemistry</i> , 2010, 87, 272-282.	1.1	167
21	(1,3;1,4)-D-Glucans in Cell Walls of the Poaceae, Lower Plants, and Fungi: A Tale of Two Linkages. <i>Molecular Plant</i> , 2009, 2, 873-882.	3.9	164
22	Bifunctional Family 3 Glycoside Hydrolases from Barley with α -L-Arabinofuranosidase and β -D-Xylosidase Activity. <i>Journal of Biological Chemistry</i> , 2003, 278, 5377-5387.	1.6	156
23	The sequence statistics and solution conformation of a barley (1 \rightarrow 3, 1 \rightarrow 4)-D-glucan. <i>Carbohydrate Research</i> , 1986, 157, 139-156.	1.1	142
24	Barley β -D-Glucan Exohydrolases with β -D-Glucosidase Activity. <i>Journal of Biological Chemistry</i> , 1996, 271, 5277-5286.	1.6	137
25	Purification and Chemical Properties of Two 1,3;1,4-beta-Glucan Endohydrolases from Germinating Barley. <i>FEBS Journal</i> , 1982, 121, 663-669.	0.2	135
26	A Barley Xyloglucan Xyloglucosyl Transferase Covalently Links Xyloglucan, Cellulosic Substrates, and (1,3;1,4)-D-Glucans. <i>Journal of Biological Chemistry</i> , 2007, 282, 12951-12962.	1.6	135
27	Temporal and spatial appearance of wall polysaccharides during cellularization of barley (<i>Hordeum</i>) Tj ETQq1 1 0.784314 rgBT /Overl 1.6 130	1.6	130
28	Differential accumulation of callose, arabinoxylan and cellulose in nonpenetrated versus penetrated papillae on leaves of barley infected with <i>Blumeria graminis</i> f. sp. <i>hordei</i> . <i>New Phytologist</i> , 2014, 204, 650-660.	3.5	125
29	Evolution and development of cell walls in cereal grains. <i>Frontiers in Plant Science</i> , 2014, 5, 456.	1.7	124
30	Revised Phylogeny of the Cellulose Synthase Gene Superfamily: Insights into Cell Wall Evolution. <i>Plant Physiology</i> , 2018, 177, 1124-1141.	2.3	118
31	Molecular evolution of plant beta-glucan endohydrolases. <i>Plant Journal</i> , 1995, 7, 367-379.	2.8	117
32	Binding interactions between barley thaumatin-like proteins and (1,3)-D-glucans. <i>FEBS Journal</i> , 2001, 268, 4190-4199.	0.2	113
33	Structure-function relationships of β -D-glucan endo- and exohydrolases from higher plants. , 2001, 47, 73-91.		110
34	Comparative modeling of the three-dimensional structures of family 3 glycoside hydrolases. <i>Proteins: Structure, Function and Bioinformatics</i> , 2000, 41, 257-269.	1.5	109
35	Grape marc as a source of carbohydrates for bioethanol: Chemical composition, pre-treatment and saccharification. <i>Bioresource Technology</i> , 2015, 193, 76-83.	4.8	105
36	Molecular modeling of family GH16 glycoside hydrolases: Potential roles for xyloglucan transglucosylases/hydrolases in cell wall modification in the poaceae. <i>Protein Science</i> , 2009, 13, 3200-3213.	3.1	104

#	ARTICLE	IF	CITATIONS
37	Alanine aminotransferase controls seed dormancy in barley. <i>Nature Communications</i> , 2016, 7, 11625.	5.8	101
38	Characterization of the Genes Encoding the Cytosolic and Plastidial Forms of ADP-Glucose Pyrophosphorylase in Wheat Endosperm. <i>Plant Physiology</i> , 2002, 130, 1464-1475.	2.3	100
39	Purification of (1 α 3)- β -glucan endohydrolase isoenzyme II from germinated barley and determination of its primary structure from a cDNA clone. <i>Plant Molecular Biology</i> , 1989, 13, 31-42.	2.0	95
40	Substrate specificities and kinetic properties of two (1 α 3), (1 α 4)- β -d-glucan endo-hydrolases from germinating barley (<i>Hordeum vulgare</i>). <i>Carbohydrate Research</i> , 1982, 106, 111-122.	1.1	94
41	Development of (1 α 3,1 α 4)- β -d-Glucan Endohydrolase Isoenzymes in Isolated Scutella and Aleurone Layers of Barley (<i>Hordeum vulgare</i>). <i>Plant Physiology</i> , 1986, 80, 310-314.	2.3	89
42	Structural Basis for Broad Substrate Specificity in Higher Plant β -d-Glucan Glucohydrolases. <i>Plant Cell</i> , 2002, 14, 1033-1052.	3.1	89
43	Substrate Binding and Catalytic Mechanism of a Barley β -d-Glucosidase/(1,4)- β -d-Glucan Exohydrolase. <i>Journal of Biological Chemistry</i> , 1998, 273, 11134-11143.	1.6	86
44	A Brief and Informationally Rich Naming System for Oligosaccharide Motifs of Heteroxylans Found in Plant Cell Walls. <i>Australian Journal of Chemistry</i> , 2009, 62, 533.	0.5	84
45	Current challenges in cell wall biology in the cereals and grasses. <i>Frontiers in Plant Science</i> , 2012, 3, 130.	1.7	84
46	Developmental Regulation of (1 α 3, 1 α 4)- β -Glucanase Gene Expression in Barley. <i>Plant Physiology</i> , 1992, 99, 1226-1231.	2.3	79
47	Mutated Barley (1,3)- β -d -Glucan Endohydrolases Synthesize Crystalline (1,3)- β -d -Glucans. <i>Journal of Biological Chemistry</i> , 2002, 277, 30102-30111.	1.6	79
48	Exploring the evolution of (1,3;1,4)- β -d-glucans in plant cell walls: comparative genomics can help!. <i>Current Opinion in Plant Biology</i> , 2009, 12, 140-147.	3.5	77
49	Barley arabinoxylan arabinofuranohydrolases: purification, characterization and determination of primary structures from cDNA clones. <i>Biochemical Journal</i> , 2001, 356, 181-189.	1.7	75
50	Catalytic Mechanisms and Reaction Intermediates along the Hydrolytic Pathway of a Plant β -D-glucan Glucohydrolase. <i>Structure</i> , 2001, 9, 1005-1016.	1.6	73
51	Prospecting for Energy-Rich Renewable Raw Materials: Agave Leaf Case Study. <i>PLoS ONE</i> , 2015, 10, e0135382.	1.1	73
52	Structure and Function of Cereal and Related Higher Plant (1 α 4)- β -Xylan Endohydrolases. <i>Journal of Cereal Science</i> , 2003, 37, 111-127.	1.8	72
53	Members of a New Group of Chitinase-Like Genes are Expressed Preferentially in Cotton Cells with Secondary Walls. <i>Plant Molecular Biology</i> , 2004, 54, 353-372.	2.0	71
54	A Single Limit Dextrinase Gene Is Expressed Both in the Developing Endosperm and in Germinated Grains of Barley1. <i>Plant Physiology</i> , 1999, 119, 859-872.	2.3	70

#	ARTICLE	IF	CITATIONS
55	Discovery of Cyclotide-Like Protein Sequences in Graminaceous Crop Plants: Ancestral Precursors of Circular Proteins?. <i>Plant Cell</i> , 2006, 18, 2134-2144.	3.1	70
56	Biochemical evidence linking a putative callose synthase gene with (1 \rightarrow 3)- β -D-glucan biosynthesis in barley. <i>Plant Molecular Biology</i> , 2003, 53, 213-225.	2.0	68
57	Plant cell wall engineering: applications in biofuel production and improved human health. <i>Current Opinion in Biotechnology</i> , 2014, 26, 79-84.	3.3	67
58	Molecular cloning of a cDNA encoding a (1 \rightarrow 4)- β -mannan endohydrolase from the seeds of germinated tomato (<i>Lycopersicon esculentum</i>). <i>Planta</i> , 1997, 203, 454-459.	1.6	66
59	Induction of (1 \rightarrow 3,1 \rightarrow 4)- α -D-glucan hydrolases in leaves of dark-incubated barley seedlings. <i>Planta</i> , 2002, 215, 51-59.	1.6	62
60	Reducing haziness in white wine by overexpression of <i>Saccharomyces cerevisiae</i> genes YOL155c and YDR055w. <i>Applied Microbiology and Biotechnology</i> , 2007, 73, 1363-1376.	1.7	61
61	Barley arabinoxylan arabinofuranohydrolases: purification, characterization and determination of primary structures from cDNA clones. <i>Biochemical Journal</i> , 2001, 356, 181.	1.7	59
62	Isolation and characterization of cell walls from the mesocarp of mature grape berries (<i>Vitis</i>). <i>Journal of Agricultural and Food Chemistry</i> , 2000, 48, 1504-1512.	1.6	57
63	A genome wide association scan for (1,3;1,4)- β -glucan content in the grain of contemporary 2-row Spring and Winter barleys. <i>BMC Genomics</i> , 2014, 15, 907.	1.2	57
64	Genome Wide Association Mapping for Arabinoxylan Content in a Collection of Tetraploid Wheats. <i>PLoS ONE</i> , 2015, 10, e0132787.	1.1	56
65	Purification and characterization of three (1,4)-beta-D-xylan endohydrolases from germinated barley. <i>FEBS Journal</i> , 1989, 185, 533-539.	0.2	55
66	Evolutionary Dynamics of the Cellulose Synthase Gene Superfamily in Grasses. <i>Plant Physiology</i> , 2015, 168, 968-983.	2.3	55
67	Emerging Technologies for the Production of Renewable Liquid Transport Fuels from Biomass Sources Enriched in Plant Cell Walls. <i>Frontiers in Plant Science</i> , 2016, 7, 1854.	1.7	55
68	Gene Structure and Expression Pattern Analysis of Three Monodehydroascorbate Reductase (MdhAr) Genes in <i>Physcomitrella patens</i> : Implications for the Evolution of the MDHAR Family in Plants*. <i>Plant Molecular Biology</i> , 2006, 60, 259-275.	2.0	53
69	Fine structure of the arabinogalactan-protein from <i>Lolium multiflorum</i> . <i>Carbohydrate Research</i> , 1987, 162, 85-93.	1.1	52
70	Rice family GH1 glycoside hydrolases with β -D-glucosidase and β -D-mannosidase activities. <i>Archives of Biochemistry and Biophysics</i> , 2009, 491, 85-95.	1.4	52
71	Powerful regulatory systems and post-transcriptional gene silencing resist increases in cellulose content in cell walls of barley. <i>BMC Plant Biology</i> , 2015, 15, 62.	1.6	52
72	The barley (<i>Hordeum vulgare</i>) cellulose synthase-like D2 gene (<i>HvCslD2</i>) mediates penetration resistance to host-adapted and nonhost isolates of the powdery mildew fungus. <i>New Phytologist</i> , 2016, 212, 421-433.	3.5	52

#	ARTICLE	IF	CITATIONS
73	Barley β -D-glucan exohydrolases. Substrate specificity and kinetic properties. <i>Carbohydrate Research</i> , 1997, 305, 209-221.	1.1	50
74	Pattern of Deposition of Cell Wall Polysaccharides and Transcript Abundance of Related Cell Wall Synthesis Genes during Differentiation in Barley Endosperm. <i>Plant Physiology</i> , 2012, 159, 655-670.	2.3	50
75	Spatial gradients in cell wall composition and transcriptional profiles along elongating maize internodes. <i>BMC Plant Biology</i> , 2014, 14, 27.	1.6	50
76	Messenger RNAs from the Scutellum and Aleurone of Germinating Barley Encode $(1\alpha,3,1\alpha,4)\beta$ -D-Glucanase, α -Amylase and Carboxypeptidase. <i>Plant Physiology</i> , 1985, 79, 867-871.	2.3	49
77	Grain development in Brachypodium and other grasses: possible interactions between cell expansion, starch deposition, and cell-wall synthesis. <i>Journal of Experimental Botany</i> , 2013, 64, 5033-5047.	2.4	48
78	Molecular cloning of cDNAs encoding (1,4)- β -xylan endohydrolases from the aleurone layer of germinated barley (<i>Hordeum vulgare</i>). <i>Plant Molecular Biology</i> , 1996, 31, 1163-1172.	2.0	47
79	The Dynamics of Transcript Abundance during Cellularization of Developing Barley Endosperm. <i>Plant Physiology</i> , 2016, 170, 1549-1565.	2.3	47
80	Tissue Slice and Particulate β -Glucan Synthetase Activities from Pisum Epicotyls. <i>Plant Physiology</i> , 1978, 61, 938-942.	2.3	46
81	Hydrolysis of (1,4)- β -D-mannans in barley (<i>Hordeum vulgare</i> L.) is mediated by the concerted action of (1,4)- β -D-mannan endohydrolase and β -D-mannosidase. <i>Biochemical Journal</i> , 2006, 399, 77-90.	1.7	46
82	Polysaccharide hydrolases in germinated barley and their role in the depolymerization of plant and fungal cell walls. <i>International Journal of Biological Macromolecules</i> , 1997, 21, 67-72.	3.6	43
83	Flt-2L, a locus in barley controlling flowering time, spike density, and plant height. <i>Functional and Integrative Genomics</i> , 2009, 9, 243-254.	1.4	43
84	In vitro synthesis of a microfibrillar (1,3)- β -glucan by a ryegrass (<i>Lolium multiflorum</i>) endosperm (1,3)- β -glucan synthase enriched by product entrapment. <i>Plant Journal</i> , 1995, 8, 213-225.	2.8	42
85	A Tetrad of Ionizable Amino Acids Is Important for Catalysis in Barley β -Glucanases. <i>Journal of Biological Chemistry</i> , 1995, 270, 8093-8101.	1.6	41
86	Down-regulation of the <i>glucan synthase-like 6</i> gene (<i>HvGsl6</i>) in barley leads to decreased callose accumulation and increased cell wall penetration by <i>Blumeria graminis</i> f. sp. <i>hordei</i> . <i>New Phytologist</i> , 2016, 212, 434-443.	3.5	41
87	The dynamics of cereal cyst nematode infection differ between susceptible and resistant barley cultivars and lead to changes in (1,3;1,4)- β -glucan levels and <i>HvCslF</i> gene transcript abundance. <i>New Phytologist</i> , 2015, 207, 135-147.	3.5	40
88	Genetic Diversity and Genome Wide Association Study of β -Glucan Content in Tetraploid Wheat Grains. <i>PLoS ONE</i> , 2016, 11, e0152590.	1.1	40
89	The Barley Genome Sequence Assembly Reveals Three Additional Members of the CslF (1,3;1,4)- β -Glucan Synthase Gene Family. <i>PLoS ONE</i> , 2014, 9, e90888.	1.1	39
90	Substrate specificity and catalytic mechanism of a xyloglucan xyloglucosyl transferase HvXET6 from barley (<i>Hordeum vulgare</i> L.). <i>FEBS Journal</i> , 2009, 276, 437-456.	2.2	38

#	ARTICLE	IF	CITATIONS
91	Hyphal cell walls from the plant pathogen <i>Rhynchosporium secalis</i> contain (1,3/1,6)- β -glucans, galactose and rhamnomannans, (1,3;1,4)- β -glucans and chitin. <i>FEBS Journal</i> , 2009, 276, 3698-3709.		38
92	Subsite Affinities and Disposition of Catalytic Amino Acids in the Substrate-binding Region of Barley 1,3- β -Glucanases. IMPLICATIONS IN PLANT-PATHOGEN INTERACTIONS. <i>Journal of Biological Chemistry</i> , 1995, 270, 14556-14563.	1.6	37
93	A Customized Gene Expression Microarray Reveals That the Brittle Stem Phenotype <i>fs2</i> of Barley Is Attributable to a Retroelement in the <i>HvCesA4</i> Cellulose Synthase Gene. <i>Plant Physiology</i> , 2010, 153, 1716-1728.	2.3	37
94	(1,3;1,4)- β -Glucan Biosynthesis by the CSLF6 Enzyme: Position and Flexibility of Catalytic Residues Influence Product Fine Structure. <i>Biochemistry</i> , 2016, 55, 2054-2061.	1.2	37
95	The CELLULOSE-SYNTHASE LIKE C (CSLC) Family of Barley Includes Members that Are Integral Membrane Proteins Targeted to the Plasma Membrane. <i>Molecular Plant</i> , 2009, 2, 1025-1039.	3.9	36
96	Three-dimensional Structure of the Barley β -D-Glucan Glucohydrolase in Complex with a Transition State Mimic. <i>Journal of Biological Chemistry</i> , 2004, 279, 4970-4980.	1.6	35
97	Endo-(1,4)- β -Glucanase gene families in the grasses: temporal and spatial Co-transcription of orthologous genes. <i>BMC Plant Biology</i> , 2012, 12, 235.	1.6	35
98	Targeted mutation of barley (1,3;1,4)- β -glucan synthases reveals complex relationships between the storage and cell wall polysaccharide content. <i>Plant Journal</i> , 2020, 104, 1009-1022.	2.8	35
99	Purification and characterization of (1,3, 1,4)- β -glucan endohydrolases from germinated wheat (<i>Triticum aestivum</i>). <i>Plant Molecular Biology</i> , 1993, 22, 847-859.	2.0	34
100	Reconstitution of cyanogenesis in barley (<i>Hordeum vulgare</i> L.) and its implications for resistance against the barley powdery mildew fungus. <i>Planta</i> , 2006, 223, 1010-1023.	1.6	34
101	Distribution, structure and biosynthetic gene families of (1,3;1,4)- β -glucan in <i>Sorghum bicolor</i> . <i>Journal of Integrative Plant Biology</i> , 2015, 57, 429-445.	4.1	33
102	Non-Starch Polysaccharides in Durum Wheat: A Review. <i>International Journal of Molecular Sciences</i> , 2020, 21, 2933.	1.8	33
103	Isolation and characterization of a (1 \rightarrow 3)- β -glucan endohydrolase from germinating barley (<i>Hordeum</i>) Tj ETQq1 1,0,784314,rgBT /O 1.3 32		
104	Chromosomal Location of Genes Encoding Barley (1 \rightarrow 3, 1 \rightarrow 4)- β -Glucan 4-Glucanohydrolases. <i>Plant Physiology</i> , 1988, 87, 300-302.	2.3	30
105	Altered Expression of Genes Implicated in Xylan Biosynthesis Affects Penetration Resistance against Powdery Mildew. <i>Frontiers in Plant Science</i> , 2017, 8, 445.	1.7	30
106	Amino acid sequence homology in two 1,3;1,4- β -glucan endohydrolases from germinating barley (<i>hordeum vulgare</i>). <i>FEBS Letters</i> , 1982, 138, 198-200.	1.3	29
107	Polyproline II Confirmation in the Protein Component of Arabinogalactan-Protein from <i>Lolium multiflorum</i> . <i>Plant Physiology</i> , 1984, 75, 1163-1164.	2.3	29
108	Characterization and Expression Patterns of UDP-d-Glucuronate Decarboxylase Genes in Barley. <i>Plant Physiology</i> , 2005, 138, 131-141.	2.3	29

#	ARTICLE	IF	CITATIONS
109	Dissecting the catalytic mechanism of a plant β -D-glucan glucohydrolase through structural biology using inhibitors and substrate analogues. <i>Carbohydrate Research</i> , 2007, 342, 1613-1623.	1.1	29
110	Varietal and chromosome 2H locus-specific frost tolerance in reproductive tissues of barley (<i>Hordeum vulgare</i> L.) detected using a frost simulation chamber. <i>Theoretical and Applied Genetics</i> , 2009, 119, 685-694.	1.8	28
111	Isolation of tissues and preservation of <i>scp</i> RNA from intact, germinated barley grain. <i>Plant Journal</i> , 2017, 91, 754-765.	2.8	28
112	Synthesis of Complex Oligosaccharides by Using a Mutated (1,3)-D-Glucan Endohydrolase from Barley. <i>Chemistry - A European Journal</i> , 2003, 9, 2603-2610.	1.7	26
113	Co-evolution of Enzymes Involved in Plant Cell Wall Metabolism in the Grasses. <i>Frontiers in Plant Science</i> , 2019, 10, 1009.	1.7	26
114	Effects of gibberellic acid and abscisic acid on levels of translatable mRNA (β 3, β 4)-D-glucanase in barley aleurone. <i>FEBS Letters</i> , 1986, 198, 349-352.	1.3	25
115	Purification and characterization of a (β 3)-D-glucan endohydrolase from rice (<i>Oryza sativa</i>) bran. <i>Carbohydrate Research</i> , 1997, 297, 365-374.	1.1	25
116	Virus-Induced Silencing of a Plant Cellulose Synthase Gene. <i>Plant Cell</i> , 2000, 12, 691.	3.1	25
117	Soluble arabinoxylan alters digesta flow and protein digestion of red meat-containing diets in pigs. <i>Nutrition</i> , 2015, 31, 1141-1147.	1.1	25
118	Title is missing!. <i>ScienceAsia</i> , 2002, 28, 29.	0.2	25
119	Barley (β 3, β 4)-glucanase isoenzyme EI gene expression is mediated by auxin and gibberellic acid. <i>FEBS Letters</i> , 1992, 306, 98-102.	1.3	24
120	Genes and traits associated with chromosome 2H and 5H regions controlling sensitivity of reproductive tissues to frost in barley. <i>Theoretical and Applied Genetics</i> , 2009, 118, 1465-1476.	1.8	24
121	Morphology, Carbohydrate Distribution, Gene Expression, and Enzymatic Activities Related to Cell Wall Hydrolysis in Four Barley Varieties during Simulated Malting. <i>Frontiers in Plant Science</i> , 2017, 8, 1872.	1.7	24
122	Barley grain (1,3;1,4)- β -glucan content: effects of transcript and sequence variation in genes encoding the corresponding synthase and endohydrolase enzymes. <i>Scientific Reports</i> , 2019, 9, 17250.	1.6	24
123	A Genome-Wide Association Study for Culm Cellulose Content in Barley Reveals Candidate Genes Co-Expressed with Members of the CELLULOSE SYNTHASE A Gene Family. <i>PLoS ONE</i> , 2015, 10, e0130890.	1.1	24
124	Biosynthesis of Arabinogalactan-Protein in <i>Lolium multiflorum</i> (Ryegrass) Endosperm Cells. <i>Plant Physiology</i> , 1983, 72, 754-758.	2.3	23
125	Genetic and environmental factors contribute to variation in cell wall composition in mature desi chickpea (<i>Cicer arietinum</i> L.) cotyledons. <i>Plant, Cell and Environment</i> , 2018, 41, 2195-2208.	2.8	23
126	Differences in the thermostabilities of barley (β 3, β 4)-glucanases are only partly determined by N-glycosylation. <i>FEBS Letters</i> , 1992, 309, 265-271.	1.3	22

#	ARTICLE	IF	CITATIONS
127	Purification, characterization and gene structure of (1,3)-beta-glucanase isoenzyme GIII from barley (<i>Hordeum vulgare</i>). <i>FEBS Journal</i> , 1992, 209, 103-109.	0.2	22
128	Gene flow from transgenic wheat and barley under field conditions. <i>Euphytica</i> , 2006, 151, 383-391.	0.6	22
129	Functional Characterization of a Glycosyltransferase from the Moss <i>Physcomitrella patens</i> Involved in the Biosynthesis of a Novel Cell Wall Arabinoglucan. <i>Plant Cell</i> , 2018, 30, 1293-1308.	3.1	22
130	Plant Enzyme Structure. Explaining Substrate Specificity and the Evolution of Function. <i>Plant Physiology</i> , 2001, 125, 54-57.	2.3	21
131	Soluble cell wall carbohydrates and their relationship with sensory attributes in Cabernet Sauvignon wine. <i>Food Chemistry</i> , 2019, 298, 124745.	4.2	21
132	Analysis of the (1,3)- β -D-glucan synthase gene family of barley. <i>Phytochemistry</i> , 2009, 70, 713-720.	1.4	19
133	Immunological determination of (1 \rightarrow 3),(1 \rightarrow 4)- β -D-glucan endohydrolase development in germinating barley (<i>Hordeum vulgare</i>). <i>FEBS Letters</i> , 1983, 155, 201-204.	1.3	18
134	Heterologous expression of cDNAs encoding monodehydroascorbate reductases from the moss, <i>Physcomitrella patens</i> and characterization of the expressed enzymes. <i>Planta</i> , 2007, 225, 945-954.	1.6	17
135	Distribution, Fine Structure and Function of (1,3;1,4)- β -Glucans in the Grasses and Other Taxa. , 2009, , 621-654.		17
136	Cell Wall Modifications in Maize Pulvini in Response to Gravitational Stress \hat{A} \hat{A} . <i>Plant Physiology</i> , 2011, 156, 2155-2171.	2.3	17
137	Differential expression of the HvCslF6 gene late in grain development may explain quantitative differences in (1,3;1,4)- β -glucan concentration in barley. <i>Molecular Breeding</i> , 2015, 35, 20.	1.0	17
138	Transcriptional and biochemical analyses of gibberellin expression and content in germinated barley grain. <i>Journal of Experimental Botany</i> , 2020, 71, 1870-1884.	2.4	17
139	Identification of individual (1 \rightarrow 3,1 \rightarrow 4)- β -D-glucanase isoenzymes in extracts of germinated barley using specific monoclonal antibodies. <i>Journal of Cereal Science</i> , 1990, 11, 261-268.	1.8	16
140	Heterologous expression of diverse barley XTH genes in the yeast <i>Pichia pastoris</i> . <i>Plant Biotechnology</i> , 2010, 27, 251-258.	0.5	16
141	Genetics and physiology of cell wall polysaccharides in the model C4 grass, <i>Setaria viridis</i> spp. <i>BMC Plant Biology</i> , 2015, 15, 236.	1.6	16
142	Crystallization and preliminary X-ray analysis of β -glucan exohydrolase isoenzyme ExoI from barley (<i>Hordeum vulgare</i>). <i>Acta Crystallographica Section D: Biological Crystallography</i> , 1998, 54, 687-689.	2.5	15
143	The Genetics, Transcriptional Profiles, and Catalytic Properties of UDP- β -Xylose 4-Epimerases from Barley \hat{A} . <i>Plant Physiology</i> , 2010, 153, 555-568.	2.3	15
144	Regulation of genes encoding β -D-glucan glucohydrolases in barley (<i>Hordeum vulgare</i>). <i>Physiologia Plantarum</i> , 2001, 113, 108-120.	2.6	14

#	ARTICLE	IF	CITATIONS
145	Plant cell wall polysaccharide biosynthesis: real progress in the identification of participating genes. <i>Planta</i> , 2005, 221, 309-312.	1.6	14
146	Heterologous expression of cDNAs encoding barley (<i>Hordeum vulgare</i>) (1 \rightarrow 3)- β -glucanase isoenzyme GV. <i>FEBS Letters</i> , 1994, 348, 206-210.	1.3	13
147	Genetics, Transcriptional Profiles, and Catalytic Properties of the UDP-Arabinose Mutase Family from Barley. <i>Biochemistry</i> , 2016, 55, 322-334.	1.2	13
148	Method for hull-less barley transformation and manipulation of grain mixed-linkage beta-glucan. <i>Journal of Integrative Plant Biology</i> , 2018, 60, 382-396.	4.1	13
149	Crystallization and Preliminary X-ray Analysis of (1,3)- and (1,3;1,4)- β -D-Glucanases from Germinating Barley. <i>Journal of Molecular Biology</i> , 1993, 234, 888-889.	2.0	12
150	Analysis of the arabinoxylan arabinofuranohydrolase gene family in barley does not support their involvement in the remodelling of endosperm cell walls during development. <i>Journal of Experimental Botany</i> , 2012, 63, 3031-3045.	2.4	12
151	Genes That Mediate Starch Metabolism in Developing and Germinated Barley Grain. <i>Frontiers in Plant Science</i> , 2021, 12, 641325.	1.7	12
152	Combining transcriptional datasets using the generalized singular value decomposition. <i>BMC Bioinformatics</i> , 2008, 9, 335.	1.2	11
153	Gene structure and a possible cytoplasmic location for (1 \rightarrow 3)- β -glucanase isoenzyme GI from barley (<i>Hordeum vulgare</i>). <i>Plant Science</i> , 1998, 135, 39-47.	1.7	10
154	High-yield production, refolding and a molecular modelling of the catalytic module of (1,3)- β -D-glucan (curdlan) synthase from <i>Agrobacterium</i> sp.. <i>Glycoconjugate Journal</i> , 2010, 27, 461-476.	1.4	10
155	Barley Grain Carbohydrates: Starch and Cell Walls. , 2014, , 71-95.		10
156	Water uptake in barley grain: Physiology; genetics and industrial applications. <i>Plant Science</i> , 2016, 242, 260-269.	1.7	10
157	Title is missing!. <i>Plant Cell, Tissue and Organ Culture</i> , 1997, 49, 121-127.	1.2	9
158	A Chemoenzymatic Route to Conjugatable β -(1 \rightarrow 3)-Glucan Oligosaccharides. <i>Australian Journal of Chemistry</i> , 2009, 62, 575.	0.5	9
159	Low-Input Fermentations of Agave tequilana Leaf Juice Generate High Returns on Ethanol Yields. <i>Bioenergy Research</i> , 2016, 9, 1142-1154.	2.2	9
160	Low-cost cross-taxon enrichment of mitochondrial DNA using in-house synthesised RNA probes. <i>PLoS ONE</i> , 2019, 14, e0209499.	1.1	9
161	The Synthesis of 3-O-(β -D-Glucopyranosyl)- and 3-O-(β -Laminaribiosyl)-isofagomines, Potent Inhibitors of a 1,3- β -D-Glucan endo-Hydrolase. <i>Australian Journal of Chemistry</i> , 2004, 57, 187.	0.5	8
162	Barley xyloglucan xyloglucosyl transferases bind xyloglucan-derived oligosaccharides in their acceptor-binding regions in multiple conformational states. <i>Archives of Biochemistry and Biophysics</i> , 2010, 496, 61-68.	1.4	7

#	ARTICLE	IF	CITATIONS
163	Plant and Microbial Enzymes Involved in the Depolymerization of (1,3)- β -D-Glucans and Related Polysaccharides. , 2009, , 119-170.		6
164	Biochemical and Molecular Properties of Biosynthetic Enzymes for (1,3)- β -Glucans in Embryophytes, Chlorophytes and Rhodophytes. , 2009, , 283-326.		6
165	N-acetylchitooligosaccharides elicit expression of a single (1,3)-beta-glucanase gene in suspension-cultured cells from barley (<i>Hordeum vulgare</i>). <i>Physiologia Plantarum</i> , 1997, 100, 111-118.	2.6	6
166	Prospecting for Energy-Rich Renewable Raw Materials: Sorghum Stem Case Study. <i>PLoS ONE</i> , 2016, 11, e0156638.	1.1	6
167	Development and regulation of (1,3,4)- β -glucan endohydrolases in germinating wheat (<i>Triticum aestivum</i>) Tj ETQq1 0.784314 rgBT	0.8	5
168	Letter to the Glycoforum Transforming Glycoscience: An Australian Perspective. <i>Glycobiology</i> , 2014, 24, 1-3.	1.3	1
169	Engineering Disease Resistance in Crop Plants: Callosic Papillae as Potential Targets. <i>Engineering</i> , 2020, 6, 505-508.	3.2	1
170	Establishment of Fine Suspension Cultures of <i>Triticum tauschii</i> ([Coss.] Schmal.) which remain Embryogenic for Several Years. <i>Australian Journal of Botany</i> , 1999, 47, 611.	0.3	0
171	Functional Analysis of Polysaccharide Synthases Responsible for Cell Wall Synthesis in Higher Plants. <i>Progress in Biotechnology</i> , 2001, 18, 77-84.	0.2	0
172	Identification and spatio-temporal expression analysis of barley genes that encode putative modular xylanolytic enzymes. <i>Plant Science</i> , 2021, 308, 110792.	1.7	0