Beat Beat Keller

List of Publications by Citations

283 papers	25,830 citations	82 h-index	154 g-index
293 ext. papers	31,632 ext. citations	8.2 avg, IF	6.58 L-index

#	Paper	IF	Citations
283	The Sorghum bicolor genome and the diversification of grasses. *Nature*, **2009**, 457, 551-6	50.4	2200
282	Shifting the limits in wheat research and breeding using a fully annotated reference genome. *Science*, **2018**, 361,	33.3	1296
281	Hybridization and speciation. *Journal of Evolutionary Biology*, **2013**, 26, 229-46	2.3	1195
280	A chromosome-based draft sequence of the hexaploid bread wheat (Triticum aestivum) genome. *Science*, **2014**, 345, 1251788	33.3	1129
279	A putative ABC transporter confers durable resistance to multiple fungal pathogens in wheat. *Science*, **2009**, 323, 1360-3	33.3	843
278	Aegilops tauschii draft genome sequence reveals a gene repertoire for wheat adaptation. *Nature*, **2013**, 496, 91-5	50.4	601
277	Nuclear activity of MLA immune receptors links isolate-specific and basal disease-resistance responses. *Science*, **2007**, 315, 1098-103	33.3	574
276	Ancient hybridizations among the ancestral genomes of bread wheat. *Science*, **2014**, 345, 1250092	33.3	419
275	Map-based isolation of the leaf rust disease resistance gene Lr10 from the hexaploid wheat (Triticum aestivum L.) genome. *Proceedings of the National Academy of Sciences of the United States of America*, **2003**, 100, 15253-8	11.5	377
274	The transcriptional landscape of polyploid wheat. *Science*, **2018**, 361,	33.3	368
273	Genome analysis at different ploidy levels allows cloning of the powdery mildew resistance gene Pm3b from hexaploid wheat. *Plant Journal*, **2004**, 37, 528-38	6.9	319
272	Genetic mapping of 66 new microsatellite (SSR) loci in bread wheat. *Theoretical and Applied Genetics*, **2002**, 105, 413-422	6	310
271	The tomato fer gene encoding a bHLH protein controls iron-uptake responses in roots. *Proceedings of the National Academy of Sciences of the United States of America*, **2002**, 99, 13938-43	11.5	303
270	Gene-specific markers for the wheat gene Lr34/Yr18/Pm38 which confers resistance to multiple fungal pathogens. *Theoretical and Applied Genetics*, **2009**, 119, 889-98	6	275
269	Molecular cloning of a new receptor-like kinase gene encoded at the Lr10 disease resistance locus of wheat. *Plant Journal*, **1997**, 11, 45-52	6.9	240
268	The Arabidopsis male-sterile mutant dde2-2 is defective in the ALLENE OXIDE SYNTHASE gene encoding one of the key enzymes of the jasmonic acid biosynthesis pathway. *Planta*, **2002**, 216, 187-92	4.7	230
267	Megabase level sequencing reveals contrasted organization and evolution patterns of the wheat gene and transposable element spaces. *Plant Cell*, **2010**, 22, 1686-701	11.6	223

266	Rapid genome divergence at orthologous low molecular weight glutenin loci of the A and Am genomes of wheat. *Plant Cell*, **2003**, 15, 1186-97	11.6	210
265	Leaf rust resistance gene Lr1, isolated from bread wheat (Triticum aestivum L.) is a member of the large psr567 gene family. *Plant Molecular Biology*, **2007**, 65, 93-106	4.6	199
264	High gene density is conserved at syntenic loci of small and large grass genomes. *Proceedings of the National Academy of Sciences of the United States of America*, **1999**, 96, 8265-70	11.5	199
263	Genome-wide comparative analysis of copia retrotransposons in Triticeae, rice, and Arabidopsis reveals conserved ancient evolutionary lineages and distinct dynamics of individual copia families. *Genome Research*, **2007**, 17, 1072-81	9.7	195
262	The chimeric leucine-rich repeat/extensin cell wall protein LRX1 is required for root hair morphogenesis in Arabidopsis thaliana. *Genes and Development*, **2001**, 15, 1128-39	12.6	195
261	Analysis of a contiguous 211 kb sequence in diploid wheat (Triticum monococcum L.) reveals multiple mechanisms of genome evolution. *Plant Journal*, **2001**, 26, 307-16	6.9	190
260	Cell-autonomous expression of barley Mla1 confers race-specific resistance to the powdery mildew fungus via a Rar1-independent signaling pathway. *Plant Cell*, **2001**, 13, 337-50	11.6	188
259	A new DNA extraction method for high-throughput marker analysis in a large-genome species such as Triticum aestivum. *Plant Breeding*, **2001**, 120, 354-356	2.4	187
258	Comparative genomics in the grass family: molecular characterization of grass genome structure and evolution. *Annals of Botany*, **2002**, 89, 3-10	4.1	181
257	Multiple wheat genomes reveal global variation in modern breeding. *Nature*, **2020**, 588, 277-283	50.4	180
256	454 sequencing put to the test using the complex genome of barley. *BMC Genomics*, **2006**, 7, 275	4.5	179
255	Unlocking wheat genetic resources for the molecular identification of previously undescribed functional alleles at the Pm3 resistance locus. *Proceedings of the National Academy of Sciences of the United States of America*, **2009**, 106, 9519-24	11.5	173
254	Frequent gene movement and pseudogene evolution is common to the large and complex genomes of wheat, barley, and their relatives. *Plant Cell*, **2011**, 23, 1706-18	11.6	172
253	The maize disease resistance gene Htn1 against northern corn leaf blight encodes a wall-associated receptor-like kinase. *Proceedings of the National Academy of Sciences of the United States of America* , **2015**, 112, 8780-5	11.5	171
252	The wheat powdery mildew genome shows the unique evolution of an obligate biotroph. *Nature Genetics*, **2013**, 45, 1092-6	36.3	169
251	Colinearity and gene density in grass genomes. *Trends in Plant Science*, **2000**, 5, 246-51	13.1	164
250	Rapid gene isolation in barley and wheat by mutant chromosome sequencing. *Genome Biology*, **2016**, 17, 221	18.3	163
249	An integrative genetic linkage map of winter wheat (Triticum aestivum L.). *Theoretical and Applied Genetics*, **2003**, 107, 1235-42	6	155

248	Genebank genomics highlights the diversity of a global barley collection. *Nature Genetics*, **2019**, 51, 319-326	30.5	151
247	Comparison of orthologous loci from small grass genomes Brachypodium and rice: implications for wheat genomics and grass genome annotation. *Plant Journal*, **2007**, 49, 704-17	6.9	149
246	Identification and localization of molecular markers linked to the Lr9 leaf rust resistance gene of wheat. *Theoretical and Applied Genetics*, **1994**, 88, 110-5	6	148
245	Identification of molecular markers linked to the Agropyron elongatum-derived leaf rust resistance gene Lr24 in wheat. *Theoretical and Applied Genetics*, **1995**, 90, 982-90	6	139
244	CACTA transposons in Triticeae. A diverse family of high-copy repetitive elements. *Plant Physiology*, **2003**, 132, 52-63	6.6	138
243	ACTIN2 is essential for bulge site selection and tip growth during root hair development of Arabidopsis. *Plant Physiology*, **2002**, 129, 1464-72	6.6	138
242	Specific expression of a novel cell wall hydroxyproline-rich glycoprotein gene in lateral root initiation. *Genes and Development*, **1989**, 3, 1639-46	12.6	138
241	Glycine-rich cell wall proteins in bean: gene structure and association of the protein with the vascular system.. *EMBO Journal*, **1988**, 7, 3625-3633	13	138
240	TREP: a database for Triticeae repetitive elements. *Trends in Plant Science*, **2002**, 7, 561-562	13.1	136
239	Subgenome chromosome walking in wheat: a 450-kb physical contig in Triticum monococcum L. spans the Lr10 resistance locus in hexaploid wheat (Triticum aestivum L.). *Proceedings of the National Academy of Sciences of the United States of America*, **2000**, 97, 13436-41	11.5	136
238	Glycine-rich proteins as structural components of plant cell walls. *Cellular and Molecular Life Sciences*, **2001**, 58, 1430-41	10.3	133
237	Rapid generation of new powdery mildew resistance genes after wheat domestication. *Plant Journal*, **2006**, 47, 85-98	6.9	130
236	RNA interference-based gene silencing as an efficient tool for functional genomics in hexaploid bread wheat. *Plant Physiology*, **2006**, 142, 6-20	6.6	129
235	QTL analysis of resistance to Fusarium head blight in Swiss winter wheat (Triticum aestivum L.). *Theoretical and Applied Genetics*, **2004**, 109, 323-32	6	129
234	Specific localization of a plant cell wall glycine-rich protein in protoxylem cells of the vascular system. *Proceedings of the National Academy of Sciences of the United States of America*, **1989**, 86, 1529-33	11.5	128
233	Quantitative trait loci for resistance against powdery mildew in a segregating wheat×spelt population. *Theoretical and Applied Genetics*, **1999**, 98, 903-912	6	125
232	Diversity at the Mla powdery mildew resistance locus from cultivated barley reveals sites of positive selection. *Molecular Plant-Microbe Interactions*, **2010**, 23, 497-509	3.6	123
231	Allelic series of four powdery mildew resistance genes at the Pm3 locus in hexaploid bread wheat. *Plant Physiology*, **2005**, 139, 885-95	6.6	123

230	Sequencing of chloroplast genomes from wheat, barley, rye and their relatives provides a detailed insight into the evolution of the Triticeae tribe. *PLoS ONE*, **2014**, 9, e85761	3.7	123
229	Mapping of quantitative trait Loci for grain iron and zinc concentration in diploid A genome wheat. *Journal of Heredity*, **2009**, 100, 771-6	2.4	122
228	Ancestral genome duplication in rice. *Genome*, **2004**, 47, 610-4	2.4	120
227	Hybridization of powdery mildew strains gives rise to pathogens on novel agricultural crop species. *Nature Genetics*, **2016**, 48, 201-5	36.3	119
226	Construction and characterization of a bacterial artificial chromosome (BAC) library for the A genome of wheat. *Genome*, **1999**, 42, 1176-1182	2.4	119
225	Patching gaps in plant genomes results in gene movement and erosion of colinearity. *Genome Research*, **2010**, 20, 1229-37	9.7	117
224	A whole-genome snapshot of 454 sequences exposes the composition of the barley genome and provides evidence for parallel evolution of genome size in wheat and barley. *Plant Journal*, **2009**, 59, 712-22	6.9	116
223	Genetic mapping of the Lr20-Pm1 resistance locus reveals suppressed recombination on chromosome arm 7AL in hexaploid wheat. *Genome*, **2002**, 45, 737-44	2.4	109
222	Quantitative trait loci for lodging resistance in a segregating wheat□spelt population. *Theoretical and Applied Genetics*, **1999**, 98, 1171-1182	6	109
221	Rye Pm8 and wheat Pm3 are orthologous genes and show evolutionary conservation of resistance function against powdery mildew. *Plant Journal*, **2013**, 76, 957-69	6.9	107
220	Whole-genome comparison of leucine-rich repeat extensins in Arabidopsis and rice. A conserved family of cell wall proteins form a vegetative and a reproductive clade. *Plant Physiology*, **2003**, 131, 1313-26	6.6	107
219	Genetic analysis of durable leaf rust resistance in winter wheat. *Theoretical and Applied Genetics*, **2000**, 100, 419-431	6	107
218	Activation tagging of the LEAFY PETIOLE gene affects leaf petiole development in Arabidopsis thaliana. *Development (Cambridge)*, **2000**, 127, 4971-4980	6.6	107
217	Structural Cell Wall Proteins. *Plant Physiology*, **1993**, 101, 1127-1130	6.6	105
216	Genetic analysis of bread-making quality in wheat and spelt. *Plant Breeding*, **2001**, 120, 13-19	2.4	104
215	Tracing the ancestry of modern bread wheats. *Nature Genetics*, **2019**, 51, 905-911	36.3	99
214	Two different CC-NBS-LRR genes are required for Lr10-mediated leaf rust resistance in tetraploid and hexaploid wheat. *Plant Journal*, **2009**, 60, 1043-54	6.9	98
213	Wheat gene bank accessions as a source of new alleles of the powdery mildew resistance gene Pm3: a large scale allele mining project. *BMC Plant Biology*, **2010**, 10, 88	5.3	95

212	Dissection of quantitative and durable leaf rust resistance in Swiss winter wheat reveals a major resistance QTL in the Lr34 chromosomal region. *Theoretical and Applied Genetics*, **2004**, 108, 477-84	6	95
211	Glycine-rich cell wall proteins in bean: gene structure and association of the protein with the vascular system. *EMBO Journal*, **1988**, 7, 3625-33	13	95
210	Synergistic interaction of the two paralogous Arabidopsis genes LRX1 and LRX2 in cell wall formation during root hair development. *Plant Journal*, **2003**, 35, 71-81	6.9	94
209	Association mapping of Stagonospora nodorum blotch resistance in modern European winter wheat varieties. *Theoretical and Applied Genetics*, **2007**, 115, 697-708	6	93
208	Genetic diversity in European wheat and spelt breeding material based on RFLP data. *Theoretical and Applied Genetics*, **1994**, 88, 994-1003	6	88
207	An integrated molecular linkage map of diploid wheat based on a Triticum boeoticum x T. monococcum RIL population. *Theoretical and Applied Genetics*, **2007**, 115, 301-12	6	87
206	Mapping of adult plant stripe rust resistance genes in diploid A genome wheat species and their transfer to bread wheat. *Theoretical and Applied Genetics*, **2008**, 116, 313-24	6	87
205	The wheat Lr34 gene provides resistance against multiple fungal pathogens in barley. *Plant Biotechnology Journal*, **2013**, 11, 847-54	11.6	86
204	Fusarium graminearum exploits ethylene signalling to colonize dicotyledonous and monocotyledonous plants. *New Phytologist*, **2009**, 182, 975-983	9.8	83
203	Identification and characterization of a novel host-toxin interaction in the wheat-Stagonospora nodorum pathosystem. *Theoretical and Applied Genetics*, **2009**, 120, 117-26	6	82
202	Development of a molecular marker for the adult plant leaf rust resistance gene Lr35 in wheat. *Theoretical and Applied Genetics*, **1999**, 99, 554-60	6	81
201	Multiple Avirulence Loci and Allele-Specific Effector Recognition Control the Pm3 Race-Specific Resistance of Wheat to Powdery Mildew. *Plant Cell*, **2015**, 27, 2991-3012	11.6	80
200	The powdery mildew resistance gene Pm8 derived from rye is suppressed by its wheat ortholog Pm3. *Plant Journal*, **2014**, 79, 904-13	6.9	79
199	Development of functional markers specific for seven Pm3 resistance alleles and their validation in the bread wheat gene pool. *Theoretical and Applied Genetics*, **2006**, 114, 165-75	6	79
198	Genetic Analysis of Pre-Harvest Sprouting Resistance in a Wheat Spelt Cross. *Crop Science*, **2000**, 40, 1406	2.4	79
197	Morphological Traits Associated with Lodging Resistance of Spring Wheat (Triticum aestivum L.). *Journal of Agronomy and Crop Science*, **1999**, 182, 17-24	3.9	78
196	Characterization of Lr75: a partial, broad-spectrum leaf rust resistance gene in wheat. *Theoretical and Applied Genetics*, **2017**, 130, 1-12	6	74
195	A large rearrangement involving genes and low-copy DNA interrupts the microcollinearity between rice and barley at the Rph7 locus. *Genetics*, **2003**, 164, 673-83	4	74

194	Molecular genetics and evolution of disease resistance in cereals. *New Phytologist*, **2016**, 212, 320-32	9.8	73
193	Increased availability of phosphorus after drying and rewetting of a grassland soil: processes and plant use. *Plant and Soil*, **2013**, 370, 511-526	4.2	72
192	Molecular markers for the detection of the wheat leaf rust resistance gene Lr10 in diverse genetic backgrounds. *Molecular Breeding*, **1997**, 3, 65-74	3.4	71
191	Independent evolution of functional Pm3 resistance genes in wild tetraploid wheat and domesticated bread wheat. *Plant Journal*, **2009**, 57, 846-56	6.9	70
190	Vascular-specific expression of the bean GRP 1.8 gene is negatively regulated. *Plant Cell*, **1991**, 3, 1051-61	11.6	70
189	Development of simple sequence repeat markers specific for the Lr34 resistance region of wheat using sequence information from rice and Aegilops tauschii. *Theoretical and Applied Genetics*, **2006**, 113, 1049-62	6	69
188	The wheat durable, multipathogen resistance gene Lr34 confers partial blast resistance in rice. *Plant Biotechnology Journal*, **2016**, 14, 1261-8	11.6	67
187	Molecular evolution of receptor-like kinase genes in hexaploid wheat. Independent evolution of orthologs after polyploidization and mechanisms of local rearrangements at paralogous loci. *Plant Physiology*, **2001**, 125, 1304-13	6.6	66
186	Ultrastructural Localization of a Bean Glycine-Rich Protein in Unlignified Primary Walls of Protoxylem Cells. *Plant Cell*, **1992**, 4, 773-783	11.6	66
185	Structural cell-wall proteins in protoxylem development: evidence for a repair process mediated by a glycine-rich protein. *Plant Journal*, **1997**, 12, 97-111	6.9	64
184	Ancient haplotypes resulting from extensive molecular rearrangements in the wheat A genome have been maintained in species of three different ploidy levels. *Genome Research*, **2005**, 15, 526-36	9.7	64
183	Activation tagging of the LEAFY PETIOLE gene affects leaf petiole development in Arabidopsis thaliana. *Development (Cambridge)*, **2000**, 127, 4971-80	6.6	64
182	Molecular mapping of an adult plant stem rust resistance gene Sr56 in winter wheat cultivar Arina. *Theoretical and Applied Genetics*, **2014**, 127, 1441-8	6	63
181	Illegitimate recombination is a major evolutionary mechanism for initiating size variation in plant resistance genes. *Plant Journal*, **2007**, 51, 631-41	6.9	63
180	Lr34 multi-pathogen resistance ABC transporter: molecular analysis of homoeologous and orthologous genes in hexaploid wheat and other grass species. *Plant Journal*, **2011**, 65, 392-403	6.9	62
179	Transgene x environment interactions in genetically modified wheat. *PLoS ONE*, **2010**, 5, e11405	3.7	62
178	Rice NICOTIANAMINE SYNTHASE 2 expression improves dietary iron and zinc levels in wheat. *Theoretical and Applied Genetics*, **2017**, 130, 283-292	6	61
177	Wheat syntenome unveils new evidences of contrasted evolutionary plasticity between paleo- and neoduplicated subgenomes. *Plant Journal*, **2013**, 76, 1030-44	6.9	61

176	Substitutions of two amino acids in the nucleotide-binding site domain of a resistance protein enhance the hypersensitive response and enlarge the PM3F resistance spectrum in wheat. *Molecular Plant-Microbe Interactions*, **2014**, 27, 265-76	3.6	59
175	Genetic linkage map of a wheat□spelt cross. *Theoretical and Applied Genetics*, **1999**, 98, 1163-1170	6	59
174	Intragenic allele pyramiding combines different specificities of wheat Pm3 resistance alleles. *Plant Journal*, **2010**, 64, 433-45	6.9	58
173	Specific patterns of changes in wheat gene expression after treatment with three antifungal compounds. *Plant Molecular Biology*, **2005**, 57, 693-707	4.6	58
172	Large intraspecific haplotype variability at the Rph7 locus results from rapid and recent divergence in the barley genome. *Plant Cell*, **2005**, 17, 361-74	11.6	58
171	In vitro binding of the tomato bZIP transcriptional activator VSF-1 to a regulatory element that controls xylem-specific gene expression. *Plant Journal*, **1996**, 9, 283-96	6.9	58
170	Genetic and physical characterization of the LR1 leaf rust resistance locus in wheat (Triticum aestivum L.). *Molecular Genetics and Genomics*, **1995**, 248, 553-62		57
169	AvrPm2 encodes an RNase-like avirulence effector which is conserved in the two different specialized forms of wheat and rye powdery mildew fungus. *New Phytologist*, **2017**, 213, 1301-1314	9.8	55
168	The NLR-Annotator Tool Enables Annotation of the Intracellular Immune Receptor Repertoire. *Plant Physiology*, **2020**, 183, 468-482	6.6	55
167	Suppression among alleles encoding nucleotide-binding-leucine-rich repeat resistance proteins interferes with resistance in F1 hybrid and allele-pyramided wheat plants. *Plant Journal*, **2014**, 79, 893-903	6.9	54
166	Transgenic Pm3 multilines of wheat show increased powdery mildew resistance in the field. *Plant Biotechnology Journal*, **2012**, 10, 398-409	11.6	54
165	Functional variability of the Lr34 durable resistance gene in transgenic wheat. *Plant Biotechnology Journal*, **2012**, 10, 477-87	11.6	54
164	Comparative mapping of the two wheat leaf rust resistance loci Lr1 and Lr10 in rice and barley. *Genome*, **1998**, 41, 328-36	2.4	54
163	Construction and characterization of a bacterial artificial chromosome (BAC) library for the A genome of wheat. *Genome*, **1999**, 42, 1176-82	2.4	52
162	Transgenic Pm3b wheat lines show resistance to powdery mildew in the field. *Plant Biotechnology Journal*, **2011**, 9, 897-910	11.6	51
161	A new family of Ty1-copia-like retrotransposons originated in the tomato genome by a recent horizontal transfer event. *Genetics*, **2009**, 181, 1183-93	4	51
160	Detection of QTLs for Stagonospora glume blotch resistance in Swiss winter wheat. *Theoretical and Applied Genetics*, **2003**, 107, 1226-34	6	51
159	The wheat Mla homologue TmMla1 exhibits an evolutionarily conserved function against powdery mildew in both wheat and barley. *Plant Journal*, **2011**, 65, 610-21	6.9	50

158	Comparative gene expression analysis of susceptible and resistant near-isogenic lines in common wheat infected by Puccinia triticina. *DNA Research*, **2010**, 17, 211-22	4.5	50
157	In silico comparative analysis reveals a mosaic conservation of genes within a novel colinear region in wheat chromosome 1AS and rice chromosome 5S. *Functional and Integrative Genomics*, **2004**, 4, 47-58	3.8	50
156	The durable wheat disease resistance gene Lr34 confers common rust and northern corn leaf blight resistance in maize. *Plant Biotechnology Journal*, **2017**, 15, 489-496	11.6	49
155	Physical mapping and identification of a candidate for the leaf rust resistance gene Lr1 of wheat. *Theoretical and Applied Genetics*, **2007**, 115, 159-68	6	48
154	A new role for the Arabidopsis AP2 transcription factor, LEAFY PETIOLE, in gibberellin-induced germination is revealed by the misexpression of a homologous gene, SOB2/DRN-LIKE. *Plant Cell*, **2006**, 18, 29-39	11.6	48
153	A gene in European wheat cultivars for resistance to an African isolate of Mycosphaerella graminicola. *Plant Pathology*, **2007**, 56, 73	2.8	47
152	A diagnostic molecular marker allowing the study of Th. intermedium-derived resistance to BYDV in bread wheat segregating populations. *Theoretical and Applied Genetics*, **2001**, 102, 942-949	6	47
151	Vascular expression of a bean cell wall glycine-rich protein-□glucuronidase gene fusion in transgenic tobacco. *EMBO Journal*, **1989**, 8, 1309-1314	13	47
150	Map-based isolation of disease resistance genes from bread wheat: cloning in a supersize genome. *Genetical Research*, **2005**, 85, 93-100	1.1	45
149	Identification and Evaluation of Sources of Resistance to Stem Rust Race Ug99 in Wheat. *Plant Disease*, **2010**, 94, 413-419	1.5	44
148	Fine-mapping of a major QTL controlling angular leaf spot resistance in common bean (Phaseolus vulgaris L.). *Theoretical and Applied Genetics*, **2015**, 128, 813-26	6	43
147	Recent emergence of the wheat Lr34 multi-pathogen resistance: insights from haplotype analysis in wheat, rice, sorghum and Aegilops tauschii. *Theoretical and Applied Genetics*, **2013**, 126, 663-72	6	43
146	Molecular mapping of the Rph7.g leaf rust resistance gene in barley (Hordeum vulgare L.). *Theoretical and Applied Genetics*, **2000**, 101, 783-788	6	43
145	The wheat Lr34 multipathogen resistance gene confers resistance to anthracnose and rust in sorghum. *Plant Biotechnology Journal*, **2017**, 15, 1387-1396	11.6	41
144	The AvrPm3-Pm3 effector-NLR interactions control both race-specific resistance and host-specificity of cereal mildews on wheat. *Nature Communications*, **2019**, 10, 2292	17.4	41
143	Cloning and characterization of a wound-specific hydroxyproline-rich glycoprotein in Phaseolus vulgaris. *Plant, Cell and Environment*, **1990**, 13, 257-266	8.4	41
142	Inheritance of field resistance to Stagonospora nodorum leaf and glume blotch and correlations with other morphological traits in hexaploid wheat (Triticum aestivum L.). *Theoretical and Applied Genetics*, **2005**, 111, 325-36	6	40
141	Occurrence of Fusarium species and mycotoxins in Swiss oats□mpact of cropping factors. *European Journal of Agronomy*, **2018**, 92, 123-132	5	40

140	Abscisic acid is a substrate of the ABC transporter encoded by the durable wheat disease resistance gene Lr34. *New Phytologist*, **2019**, 223, 853-866	9.8	38
139	Direct targeting and rapid isolation of BAC clones spanning a defined chromosome region. *Functional and Integrative Genomics*, **2005**, 5, 97-103	3.8	37
138	Avirulence Genes in Cereal Powdery Mildews: The Gene-for-Gene Hypothesis 2.0. *Frontiers in Plant Science*, **2016**, 7, 241	6.2	37
137	Ancient diversity of splicing motifs and protein surfaces in the wild emmer wheat (Triticum dicoccoides) LR10 coiled coil (CC) and leucine-rich repeat (LRR) domains. *Molecular Plant Pathology*, **2012**, 13, 276-87	5.7	36
136	The physical map of wheat chromosome 1BS provides insights into its gene space organization and evolution. *Genome Biology*, **2013**, 14, R138	18.3	36
135	Molecular characterization of a new type of receptor-like kinase (wlrk) gene family in wheat. *Plant Molecular Biology*, **1998**, 37, 943-53	4.6	36
134	Molecular approaches for characterization and use of natural disease resistance in wheat. *European Journal of Plant Pathology*, **2008**, 121, 387-397	2.1	36
133	Broad-spectrum resistance loci for three quantitatively inherited diseases in two winter wheat populations. *Molecular Breeding*, **2012**, 29, 731-742	3.4	35
132	The wheat resistance gene Lr34 results in the constitutive induction of multiple defense pathways in transgenic barley. *Plant Journal*, **2015**, 84, 202-15	6.9	35
131	Cytological and molecular analysis of the Hordeum vulgare-Puccinia triticina nonhost interaction. *Molecular Plant-Microbe Interactions*, **2003**, 16, 626-33	3.6	35
130	Vascular expression of a bean cell wall glycine-rich protein-beta-glucuronidase gene fusion in transgenic tobacco. *EMBO Journal*, **1989**, 8, 1309-14	13	35
129	Chromosome-scale genome assembly provides insights into rye biology, evolution and agronomic potential. *Nature Genetics*, **2021**, 53, 564-573	36.3	35
128	Specific interaction of the tomato bZIP transcription factor VSF-1 with a non-palindromic DNA sequence that controls vascular gene expression. *Plant Molecular Biology*, **1998**, 37, 977-88	4.6	34
127	Analysis of intraspecies diversity in wheat and barley genomes identifies breakpoints of ancient haplotypes and provides insight into the structure of diploid and hexaploid triticeae gene pools. *Plant Physiology*, **2009**, 149, 258-70	6.6	33
126	Identification of QTLs for BYDV tolerance in bread wheat. *Euphytica*, **2002**, 128, 249-259	2.1	33
125	Fungal resistance mediated by maize wall-associated kinase ZmWAK-RLK1 correlates with reduced benzoxazinoid content. *New Phytologist*, **2019**, 221, 976-987	9.8	33
124	Fusarium and mycotoxin spectra in Swiss barley are affected by various cropping techniques. *Food Additives and Contaminants - Part A Chemistry, Analysis, Control, Exposure and Risk Assessment*, **2016**, 33, 1608-1619	3.2	32
123	Comparative analysis of genome composition in Triticeae reveals strong variation in transposable element dynamics and nucleotide diversity. *Plant Journal*, **2013**, 73, 347-56	6.9	32

122	Comparative sequence analysis of wheat and barley powdery mildew fungi reveals gene colinearity, dates divergence and indicates host-pathogen co-evolution. *Fungal Genetics and Biology*, **2011**, 48, 327-34	3.9	32
121	A major invasion of transposable elements accounts for the large size of the Blumeria graminis f.sp. tritici genome. *Functional and Integrative Genomics*, **2011**, 11, 671-7	3.8	32
120	Tagging and validation of a major quantitative trait locus for leaf rust resistance and leaf tip necrosis in winter wheat cultivar Forno. *Phytopathology*, **2004**, 94, 1036-41	3.8	32
119	Evolutionary divergence of the rye Pm17 and Pm8 resistance genes reveals ancient diversity. *Plant Molecular Biology*, **2018**, 98, 249-260	4.6	32
118	Identification and mapping of two powdery mildew resistance genes in Triticum boeoticum L. *Theoretical and Applied Genetics*, **2012**, 124, 1051-8	6	31
117	Comprehensive functional analyses of expressed sequence tags in common wheat (Triticum aestivum). *DNA Research*, **2012**, 19, 165-77	4.5	31
116	Activation tagging of the two closely linked genes LEP and VAS independently affects vascular cell number. *Plant Journal*, **2002**, 32, 819-30	6.9	31
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